

A sepia-toned photograph of a mountainous landscape. In the foreground, a person wearing a hat and a backpack is crouching in a grassy field, looking at a clipboard or small book. To the right, a white horse stands near some tall, dried plants. In the background, there are several mountain peaks under a cloudy sky.

Part 3

Systematic Conservation Planning

As the field of ecology has advanced over the last several decades and conservation biology has emerged as a discipline in itself, increased concern has been placed into identifying and protecting remaining natural areas from the accelerated pace of habitat change and natural resource utilization (Cameron et al. 2008). Historically, conservation planning was done by subjectively picking and choosing areas that were deemed important due to some of their intrinsic characteristics (Pressey et al. 1993). As a consequence, existing reserve systems throughout the world tend to contain a biased sample of biophysical elements, usually that of remote places and other areas that are unsuitable for commercial activities (Pressey et al. 2000). In more recent years, emphasis has been shifted into making this process more systematic, scientifically defensible, and rigorous, through the use of a systematic conservation planning approach.

Systematic conservation planning is defined as the science of systematically locating and designing reserves (Margules and Pressey 2000). It requires methodological rigor and scientific defensibility, which are enhanced by the establishment of conceptual frameworks for planning, and the setting of standards and criteria to guide and evaluate individual conservation plans (Margules and Pressey 2000; Noss 2003; Pressey and Bottrill 2008). The first critical step is to clearly identify conservation targets - the elements of biological and physical diversity or their surrogates that will be the focus of the planning efforts. Because it is impractical to plan for all elements of biodiversity, known or unknown, a subset of targets are generally selected at multiple spatial scales and levels of biological organization to represent biophysical diversity as a whole (Margules et al. 2002; Sarkar and Margules 2002). Second, systematic conservation planning requires explicit conservation goals for each target, preferably translated into quantitative, operational measures of abundance. Third, it recognizes the extent to which conservation goals have been met in existing reserves; and then using simple, explicit methods locates and designs new reserves to complement existing ones in achieving conservation goals (Justus and Sarkar 2002). Finally, it adopts explicit objectives and mechanisms for maintaining the conditions within reserves that are needed to foster the persistence of key natural features, together with monitoring of those features and adaptive management as required.

The aim of conservation planning is to identify areas of conservation importance that contain multiple, viable (or feasibly restorable) examples of all native plants, animals, and ecological communities and systems within a region. To achieve this, the "coarse-fine filter" strategy has been adopted by several organizations such as The Nature Conservancy (Groves et al. 2000) and the World Wildlife Fund (The Nature Conservancy and World Wildlife Fund 2006). This approach assumes that conservation of multiple, viable examples of all coarse-filter targets (communities and ecological systems) will also conserve the majority of biodiversity within the defined region. Thus, defining ecological communities and systems as targets requires careful consideration of their level of resolution, spatial scale, ability to be mapped, and overall abundance. If ecological communities and systems are to work as coarse filters, they must be conserved as part of dynamic, intact landscapes, maintain some level of connectivity between examples, and be represented sufficiently across environmental gradients. Those elements that the coarse filter cannot reliably conserve will require individual attention through the fine-filter approach. Very rare, extremely localized and narrowly endemic species or communities, as well as wide-ranging or keystone species, are all likely to need fine-filter strategies. The coarse-filter/fine-filter strategy strongly suggests that the most effective means to conserve biological diversity will be at many different spatial scales and biological levels of organization.

The effectiveness of systematic conservation planning comes from its efficiency in using limited resources to achieve conservation goals, its defensibility and flexibility in the face of competing land uses, and its accountability in allowing decisions to be critically reviewed (Noss 2003). In practice however, this is an idealized description of a process that is difficult to achieve. Furthermore, the science of conservation planning is evolving rapidly and should not be restricted by inflexible rules and procedures. It is recognized that regions that differ in their physical environment, biogeography, ecology, and land-use history also differ in the kinds of analyses and plans appropriate for them. Nevertheless, every conservation plan must be scientifically defensible and must make the best use of available data and resources. Some consistency across plans is also necessary for their effective integration into a national and/or continental-scale design (Noss 2003).

Literature Cited

- Cameron, S.E., K.J. Williams, and D. K. Mitchell. 2008. Efficiency and Concordance of Alternative Methods for Minimizing Opportunity Costs in Conservation Planning. *Conservation Biology* 22: 886-896.
- Groves, C., L. Valutis, D. Vosick, B. Neely, K. Wheaton, J. Touval, and B. Runnels. 2000. Designing a Geography of Hope: A Practitioner's Handbook to Ecoregional Conservation Planning. Second Edition. The Nature Conservancy.
- Justus, J., and S. Sarkar. 2002. The Principle of Complementarity in the Design of Reserve Networks to Conserve Biodiversity: A Preliminary History. *Journal of Bioscience* 27: 421-435.
- Margules, C.R., and R.L. Pressey. 2000. Systematic Conservation Planning. *Nature* 405: 243-253.
- Margules, C.R., R.L. Pressey, and P. H. Williams. 2002. Representing Biodiversity: Data and Procedures for Identifying Priority Areas for Conservation. *Journal of Bioscience* 27: 309-326.
- Noss, R.F. 2003. A Checklist for Wildlands Network Designs. *Conservation Biology* 17: 1270-1275.
- Pressey, R.L., and M.C. Bottrill. 2008. Opportunism, Threats, and the Evolution of Systematic Conservation Planning. *Conservation Biology* 22: 1340-1345.
- Pressey, R.L., C.J. Humphries, C.R. Margules, R.I. Vane-Wright, and P.H. Williams. 1993. Beyond Opportunism: Key Principles for Systematic Reserve Selection. *Trends in Ecology & Evolution* 8: 124-128.
- Pressey, R.L., T.C. Hager, K.M. Ryan, J. Schwarz, S. Wall, S. Ferrier, and P.M. Creaser. 2000. Using Abiotic Data for Conservation Assessments Over Extensive Regions: Quantitative Methods Applied Across New South Wales, Australia. *Biological Conservation* 69: 55-82.
- Sarkar, S., and C. Margules. 2002. Operationalizing Biodiversity for Conservation Planning. *Journal of Bioscience* 27: 299-308.
- The Nature Conservancy and World Wildlife Fund. 2006. Standards for Ecoregional Assessments and Biodiversity Visions. The Nature Conservancy, Arlington, VA.

GIS layers

NAME	DESCRIPTION	SOURCE	DATE
ab_basins (Arc/Info coverage)	Drainage Basins of Alberta	Alberta Environment	2003
AB_FLF_2Approx.shp	Forest landscape fragment polygons larger than 5,000 ha for boreal forest ecozones in Alberta	Global Forest Watch	July 2007
ab_ibas.shp	Important Bird Areas of Canada Database	Bird Studies Canada and The Canadian Nature Federation	2004
anhic_element_occurrence.shp	Element occurrence database maintained by the Alberta Natural Heritage Information Centre.	Alberta Natural Heritage Information Centre - Alberta Parks, Tourism and Recreation	December 2008
at0ltpa_10TM.shp	Caribou Planning Area Boundary used by the Athabasca Landscape Team, including the WSAR, ESAR, CLAWR, and Richardson herds	Alberta Caribou Committee	June 2008
badlands_milk_river.shp	Badland Topography in South-eastern Alberta	Parks and Protected Areas Division, Alberta Community Development	November 2003
bf_provincial_polygon.shp	Alberta Base Features, provincial boundary	Resource Data Branch, Alberta Sustainable Resource Development	
ch0ltpa_10TM.shp	Caribou Referral Boundary for the Chinchaga range.	Alberta Caribou Committee	November 2000
CHRS_designation_Clearwater_Christina.shp	Canadian Heritage Rivers System, Clearwater and Christina rivers	Canadian Heritage Rivers System	Designated in 2004
cm0ref_10TM.shp	Caribou Referral Boundary for the Caribou Mountains range (including the Bitscho herd)	Alberta Caribou Committee	November 2006
CriticalHabitatPatches.shp	Critical habitat patches for selected mammal species for the Kananaskis County area		
County_10TM.shp	Alberta Base Features, municipal and improvement districts	Resource Data Branch, Alberta Sustainable Resource Development	
cutlines.shp	Alberta Base Features, cutlines and trails	Resource Data Branch, Alberta Sustainable Resource Development	May 2003
dunes_ab_nrcan.shp	Sand dunes	Natural Resources Canada	January 2001
esa_prov.shp	Environmentally Significant Areas of the Rocky Mountain Natural Region - 1998	Parks and Protected Areas Division, Alberta Community Development	March 1997

NAME	DESCRIPTION	SOURCE	DATE
esa_rocky.shp	ESA Provincial Overview - 1997	Parks and Protected Areas Division, Alberta Community Development	January 1998
Ferruginous_Hawk.shp	Habitat Suitability Index (HSI) model for the ferruginous hawk, SHARP study area	Southern Headwaters At Risk Project, Fish and Wildlife Division, Alberta Sustainable Resource Development.	2004
green-white_zones.shp	Alberta Base Features, green and white zones in Alberta	Resource Data Branch, Alberta Sustainable Resource Development	
Hawkmap (raster map)	Habitat Suitability Index (HSI) model for ferruginous hawk, MULTISAR study area	The Milk River Basin Habitat Suitability Models project, Fish and Wildlife Division, Alberta Sustainable Resource Development.	2004
hydro_polys.shp	Alberta Base Features, hydrography polygons	Resource Data Branch, Alberta Sustainable Resource Development	
hydro_slnet.shp	Alberta Base Features, hydrography single line network	Resource Data Branch, Alberta Sustainable Resource Development	
npviext (Arc/Info coverage)	Native Prairie Vegetation Inventory (Extended)	Resource Data Branch, Alberta Sustainable Resource Development	Latest updates done in 2003
NSR2005 (Arc/Info coverage)	2005 Natural Regions and Subregions of Alberta	Alberta Sustainable Resource Development, Alberta Environment, Alberta Community Development, Agriculture and Agri-Food Canada	June 2005
nts_1250.shp	National topographic system grid, 1:250 000 scale .	Natural Resources Canada	
Owlmap (raster map)	Habitat Suitability Index (HSI) model for the western burrowing owl, MULTISAR study area	The Milk River Basin Habitat Suitability Models project, Fish and Wildlife Division, Alberta Sustainable Resource Development.	2004
pashape_ocsites_10tm.shp	Protected Areas in Alberta	Alberta Parks, Tourism and Recreation	September 2008
peatlands_alberta.shp	Peatland Inventory of Alberta	Vitt, D.H., L.A. Halsey, M.N. Thormann and T. Martin, University of Alberta	Fall 1996
pipelines.shp	Alberta Base Features, pipelines	Resource Data Branch, Alberta Sustainable Resource Development	May 2003
pnv_all (Arc/Info coverage)	Central Parkland Native Vegetation Inventory-Version 1.2	Resource Data Branch, Alberta Sustainable Resource Development	August 2003
priority_landform_points.shp	Priority landforms points in Alberta	Special Places Provincial Co-ordinating Committee	July 1998

Appendix 2

NAME	DESCRIPTION	SOURCE	DATE
PriorityAreas_2.shp	Grizzly Bear Priority Areas: Delineation of areas to serve as grizzly bear population source, as per Grizzly Bear Recovery Plan.	Foothills Model Forest Grizzly Bear Research Program	November 2007
quarter_section_poly.shp	Alberta Base Features, Alberta township system grid, quarter-section scale.	Resource Data Branch, Alberta Sustainable Resource Development	September 1997
RAMSAR_sites_10TM.shp	Wetlands identified as internationally important by the Ramsar Convention on Wetlands	Ramsar Convention on Wetlands	
re0ltpa_10TM.shp	Caribou Planning Area Boundary to be used by the Red Earth Landscape Team, including the Red Earth and Slave Lake herds	Alberta Caribou Committee	November 2008
regional_esapolygon.shp	Regional ESA Polygon 1997	Parks and Protected Areas Division, Alberta Community Development	March 1997
roads.shp	Alberta Base Features, road network	Resource Data Branch, Alberta Sustainable Resource Development	May 2003
special_features_of_alberta.shp	Special Features in Alberta	Alberta Environmental Protection	July 1998
sub_4c.shp	Environment Canada 4-Character Sub-basin	Prairie Farm Rehabilitation Administration / Agriculture and Agri-Food Canada	March 2008
township_poly.shp	Alberta Base Features, Alberta township system grid, township scale.	Resource Data Branch, Alberta Sustainable Resource Development	September 1997
UNESCO_WHS_allsites.shp	World Heritage Sites defined by the United Nations Educational, Scientific and Cultural Organization (UNESCO)	Parks and Protected Areas Division, Alberta Community Development	November 2004
wc0ltpa_10TM.shp	Caribou Planning Area Boundary used by the West Central Landscape Team, including the Narraway, Redrock-Prairie Creek, A La Peche, Little Smoky, Jasper, and Banff	Alberta Caribou Committee	September 2007
wells_surface_2007_june.shp	Geographical location for surface holes of wells in Alberta	Resource Land Access Branch, Mineral Development and Strategic Resources Division, Alberta Department of Energy	June 2007

Elements of Conservation Concern

AMPHIBIANS & REPTILES

SCIENTIFIC NAME	COMMON NAME	G RANK	S RANK	WILDLIFE ACT STATUS	AB. WILDLIFE SPECIES '05	COSEWIC STATUS	SARA STATUS
<i>Bufo cognatus</i>	Great plains toad	G5	S2	Special Concern	May Be At Risk	Special Concern	Special Concern
<i>Chrysemys picta belli</i>	Painted turtle	G5	S1		Sensitive	Not At Risk	
<i>Phrynosoma hernandesi</i>	Short-horned lizard	G5	S2	Endangered	At Risk	Endangered	Special Concern
<i>Rana pipiens</i>	Leopard frog	G5	S2S3	Threatened	At Risk	Special Concern	Special Concern
BIRDS							
<i>Anthus spragueii</i>	Sprague's pipit	G4	S4	Special Concern	Sensitive	Threatened	Threatened
<i>Carpodacus cassini</i>	Cassin's finch	G5	S2				
<i>Catharus minimus</i>	Gray-cheeked thrush	G5	S1				
<i>Centrocercus urophasianus</i>	Greater sage-grouse		S2	Endangered	At Risk	Endangered	Endangered
<i>Charadrius melanotos circumcinctus</i>	Piping plover		S2B	Endangered		Endangered	Endangered
<i>Charadrius montanus</i>	Mountain plover		S1	Endangered	At Risk	Endangered	Endangered
<i>Cygnus buccinator</i>	Trumpeter swan		S3	Threatened	At Risk		Not At Risk
<i>Cypseloides niger</i>	Black swift	G4	S1				
<i>Dendroica tigrina</i>	Cape may warbler	G5	S2	In Process			
<i>Falco peregrinus</i>	Peregrine falcon		S3	Threatened	At Risk		
<i>Gavia stellata</i>	Red-throated loon	G5	S1				
<i>Grus americana</i>	Whooping crane		S1	Endangered	At Risk	Endangered	Endangered
<i>Himantopus mexicanus</i>	Black-necked stilt	G5	S2				
<i>Lagopus lagopus</i>	Willow ptarmigan	G5	S1				
<i>Lanius ludovicianus</i>	Loggerhead shrike	G4	S3	Special Concern	Sensitive	Threatened	Threatened
<i>Larus canus</i>	Mew gull	G5	S2				
<i>Limnodromus griseus</i>	Short-billed dowitcher	G5	S2				
<i>Lophodytes cucullatus</i>	Hooded merganser	G5	S2				
<i>Melanerpes erythrocephalus</i>	Red-headed woodpecker	G5	S1				
<i>Oreoscoptes montanus</i>	Sage thrasher		SNA		Undetermined	Endangered	Endangered
<i>Pelecanus erythrorhynchos</i>	American white pelican	G3	S2				

Appendix 3

BIRDS (continued)

SCIENTIFIC NAME	COMMON NAME	G RANK	S RANK	WILDLIFE ACT STATUS	AB. WILDLIFE SPECIES '05	COSEWIC STATUS	SARA STATUS	
<i>Pheucticus melanocephalus</i>	Black-headed grosbeak	G5	S2					
<i>Picoides arcticus</i>	Black-backed woodpecker	G5	S2S3					
<i>Plegadis chihi</i>	White-faced ibis	G5	S1					
<i>Stellula calliope</i>	Calliope hummingbird	G5	S2					
<i>Sterna caspia</i>	Caspian tern	G5	S2					
<i>Sterna paradisaea</i>	Arctic tern	G5	S1					
FISH	<i>Acipenser fulvescens</i>	Lake Sturgeon	G3G4	S2	Threatened	At Risk	Endangered	No Status
	<i>Catostomus macrocheilus</i>	Largescale sucker	G5	S2		Sensitive		
	<i>Coregonus zenithicus</i>	Shortjaw cisco	G3	S1	Threatened	At Risk	Threatened	Threatened
	<i>Cottus asper</i>	Prickly sculpin	G5	S1		Not Assessed	Threatened	Threatened
	<i>Cottus bairdi</i>	Mottled sculpin	G5	SU	Threatened	At Risk	Threatened	Threatened
	<i>Hybognathus argyritis</i>	Western silvery minnow	G4	S1	Threatened	At Risk	Endangered	Threatened
	<i>Hybognathus hankinsoni</i>	Brassy minnow	G5	S2		Undetermined		
	<i>Lampetra japonica</i>	Arctic lamprey	G4	S1		Secure		
	<i>Moxostoma anisurum</i>	Silver redhorse	G5	S2		Undetermined		
	<i>Myoxocephalus thompsoni</i>	Deepwater sculpin	G5	S1		Undetermined	Not At Risk	
	<i>Notropis blennius</i>	River shiner	G5	S2		Undetermined		
	<i>Noturus flavus</i>	Stonecat	G5	S1	Threatened	At Risk		
	<i>Percina caprodes</i>	Logperch	G5	S1		Undetermined		
	<i>Prosopium coulteri</i>	Pygmy whitefish	G5	S1	Data Deficient	May Be At Risk		
	<i>Ptychocheilus oregonensis</i>	Northern squawfish	G5	S1		Sensitive		
INSECTS	<i>Acrolopus coloradensis</i>	Rocky Mountain capshell	G3	S1		May Be At Risk	Not at Risk	
	<i>Aeshna constricta</i>	Lance-tipped darner	G5	S1S2		Secure		
	<i>Aeshna multicolor</i>	Blue-eyed darner	G5	S1		Undetermined		
	<i>Aeshna septentrionalis</i>	Azure darner	G5	S1S2		Undetermined		

INSECTS (continued)

SCIENTIFIC NAME	COMMON NAME	G RANK	S RANK	WILDLIFE ACT STATUS	AB. WILDLIFE SPECIES '05	COSEWIC STATUS	SARA STATUS
<i>Aeshna tuberculifera</i>	Black-tipped darner	G4	S2S3		Undetermined		
<i>Amblyscirtes oslari</i>	Oslar's roadside-skipper	G4	S1		Undetermined		
<i>Amphiagrion abbreviatum</i>	Western red damsel	G5	S2		Sensitive		
<i>Anatrytone logan</i>	Delaware skipper	G5	S2		Undetermined		
<i>Anax junius</i>	Common green darner	G5	S2		Undetermined		
<i>Argia vivida</i>	Vivid dancer	G5	S1		Sensitive		
<i>Boloria astarte</i>	Astarte fritillary	G5	S2		Secure		
<i>Boloria epithore</i>	Pacific fritillary	G5	S2		Undetermined		
<i>Boloria improba</i>	Dingy arctic fritillary	G5	S2		Undetermined		
<i>Boloria napaea</i>	Napaea fritillary	G5	S2		Sensitive		
<i>Callophrys mossii</i>	Moss's elfin	G4	S1		Sensitive		
<i>Callophrys sheridanii</i>	Sheridan's green hairstreak	G5	S1		Sensitive		
<i>Callophrys spinetorum</i>	Thicket hairstreak	G5	S1S2		Undetermined		
<i>Calopteryx aequabilis</i>	River jewelwing	G5	S2		Undetermined		
<i>Celastrina ladon nigrescens</i>	Purple azure	G5T4	S1				
<i>Chlosyne acastus</i>	Acastus checkerspot	G4G5	S2		Sensitive		
<i>Chlosyne gorgone carlotta</i>	Carlota checkerspot	G5T5	S2				
<i>Cicindela formosa</i>	Beautiful tiger beetle	G5	S1S2				
<i>Cicindela lepida</i>	Ghost tiger beetle	G4	S1				
<i>Cicindela nevadica</i>	Salt Creek tiger beetle	G5	S2				
<i>Coenonympha tullia ochracea</i>	Ochre ringlet	G5T5	S1				
<i>Colias palaeno</i>	Palaeno sulphur	G5	S1S2		Undetermined		
<i>Copablepharon grande</i>	Pale yellow dune moth	G4G5	S1				
<i>Copablepharon longipenne</i>	Dusky dune moth		S1			Endangered	No Status
<i>Copablepharon viridisparsa</i>		G4	S1				
<i>Enallagma anna</i>	River bluet	G5	S1				
<i>Enodia anthedon</i>	Northern pearly-eye	G5	S1		Undetermined		

Appendix 3

INSECTS (continued)

SCIENTIFIC NAME	COMMON NAME	G RANK	S RANK	WILDLIFE ACT STATUS	AB. WILDLIFE SPECIES '05	COSEWIC STATUS	SARA STATUS
<i>Erebia magdalena</i>	Magdalena alpine	G5	S1		Undetermined		
<i>Euphilotes ancilla</i>	Rocky Mountain dotted blue	G5	S2		Sensitive		
<i>Euphydryas gillettii</i>	Gillette's checkerspot	G2G3	S2		Sensitive		
<i>Glauopsyche piasus</i>	Arrowhead blue	G5	S2		Sensitive		
<i>Gomphus graslinellus</i>	Pronghorn clubtail	G5	S1		Undetermined		
<i>Hemileuca hera</i>	Sagebrush sheepmoth	G5	S1				
<i>Icaricia icarioides</i>	Icariooides blue	G5	S2S3		Sensitive		
<i>Ischnura cervula</i>	Pacific forktail	G5	S2		Undetermined		
<i>Ischnura damula</i>	Plains forktail	G5	S1		Undetermined		
<i>Ischnura perparva</i>	Western forktail	G5	S1		Undetermined		
<i>Leucorrhinia glacialis</i>	Crimson-ringed whiteface	G5	S1S3		Undetermined		
<i>Leucorrhinia intacta</i>	Dot-tailed whiteface	G5	S2S3		Secure		
<i>Libellula pulchella</i>	Twelve-spotted skimmer	G5	S1		Undetermined		
<i>Limenitis lorquini</i>	Lorquin's admiral	G5	S1S2		Sensitive		
<i>Limenitis weidemeyerii</i>	Weidemeyer's admiral	G5	S1	Special Concern	May Be At Risk	Special Concern	Special Concern
<i>Lycaena cupreus henryae</i>	Henry's copper	G5T5	S2S3				
<i>Lycaena heteronea</i>	Blue copper	G5T4T5	S2		Undetermined		
<i>Lycaena heteronea heteronea</i>	Blue copper	G5T4T5	S2				
<i>Lycaena hyllus</i>	Bronze copper	G5	S2		Secure		
<i>Lycaena phlaeas</i>	Little copper	G5	S2		Secure		
<i>Lycaena rubidus</i>	Ruddy copper	G5	S2		Undetermined		
<i>Megathymus streckeri</i>	Strecker's giant-skipper	G5	S1				
<i>Ochlodes sylvanoides</i>	Woodland skipper	G5T5	S2		Undetermined		
<i>Oeneis chryxus caryi</i>	Cary's arctic	G5T4	S1S2				
<i>Papilio eurymedon</i>	Pale swallowtail	G5	S2		Undetermined		

INSECTS (continued)

SCIENTIFIC NAME	COMMON NAME	G RANK	S RANK	WILDLIFE ACT STATUS	AB. WILDLIFE SPECIES '05	COSEWIC STATUS	SARA STATUS
<i>Papilio machaon dodi</i>	Dod's old world swallowtail	G4T4T5	S2S3				
<i>Papilio machaon hudsonianus</i>	Hudsonian old world swallowtail	G4T4	S2S3				
<i>Papilio machaon pikei</i>	Pike's old world swallowtail	G5T3	S1S2				
<i>Papilio multicaudatus</i>	Two-tailed swallowtail	G5	S1		Undetermined		
<i>Physella johnsoni</i>	Banff springs physa		S1	In Process	At Risk	Endangered	Endangered
<i>Poanes hobomok</i>	Hobomok skipper	G5	S2		Undetermined		
<i>Polygonia oreas</i>	Oreas anglewing	G5	S2		Undetermined		
<i>Prodoxus quinquepunctellus</i>	Five-spotted bogus yucca moth	G4G5	S1			Endangered	Endangered
<i>Salmasellus steganothrix</i>		G2G3	S1				
<i>Satyrium acadicum</i>	Acadian hairstreak	G5	S2		Undetermined		
<i>Satyrium semiluna</i>	Semiluna hairstreak	G4TNR	S1			Endangered	Endangered
<i>Satyrium sylvinum</i>	Sylvan hairstreak	G5	S1		Undetermined		
<i>Schinia verna</i>	Verna flower moth	GU	SU			Threatened	No Status
<i>Senecella calanooides</i>		GNR	S1				
<i>Somatochlora albicincta</i>	Ringed emerald	G5	S2				
<i>Somatochlora cingulata</i>	Lake emerald	G5	S2S4		Undetermined		
<i>Somatochlora forcipata</i>	Forcipate emerald	G5	S1		Undetermined		
<i>Somatochlora kennedyi</i>	Kennedy's emerald	G5	S1S2		Undetermined		
<i>Somatochlora whitehousei</i>	Whitehouse's emerald	G5	S2		Secure		
<i>Speyeria egleis</i>	Egleis fritillary	G5	S1				
<i>Stygobromus canadensis</i>		G1G2	S1				
<i>Stygobromus secundus</i>		G1G2	S1				
<i>Stylurus intricatus</i>	Brimstone clubtail	G4	S1S2		Sensitive		
<i>Sympetrum corruptum</i>	Variegated meadowhawk	G5	S2S3		Secure		
<i>Sympetrum pallipes</i>	Striped meadowhawk	G5	S2S4		Undetermined		

Appendix 3

LIVERWORTS

SCIENTIFIC NAME	COMMON NAME	G RANK	S RANK	WILDLIFE ACT STATUS	AB. WILDLIFE SPECIES '05	COSEWIC STATUS	SARA STATUS
<i>Tegeticula corruptrix</i>	Non-pollinating yucca moth	G4G5	S1			Endangered	Endangered
<i>Tegeticula yuccasella</i>	Yucca moth	G4G5	S1	In Process		Endangered	Endangered
<i>Vacciniina optilete</i>	Cranberry blue	G5	S2S3		Undetermined		
<i>Anastrophyllum assimile</i>		G3?	S1S2				
<i>Anastrophyllum hellerianum</i>		G5	S2				
<i>Anastrophyllum michauxii</i>		G4	S1				
<i>Anastrophyllum saxicola</i>		G3G4	S1?				
<i>Arnellia fennica</i>		G5	S2				
<i>Asterella lindenbergiana</i>		G3G5	S1				
<i>Asterella saccata</i>		G4G5	S1				
<i>Athalamia hyalina</i>		G5	S2				
<i>Barbilophozia attenuata</i>		G5	S1				
<i>Barbilophozia binsteadii</i>		G4	S1				
<i>Barbilophozia kunzeana</i>		G5	S2				
<i>Barbilophozia quadriloba</i>		G5	S2				
<i>Blasia pusilla</i>		G5	S1				
<i>Calypogeia integriflora</i>		G4G5	S1				
<i>Calypogeia suecica</i>		G5	S1				
<i>Cephalozia bicuspidata</i>		G5	S1				
<i>Cephaloziella hampeana</i>		G5	S1				
<i>Chandonanthus setiformis</i>		G5	S1				
<i>Chiloscyphus pallescens</i>		G5	S1				
<i>Chiloscyphus polyanthos</i>		G5	S1				
<i>Conocephalum conicum</i>		G5	S2				

LIVERWORTS (continued)

SCIENTIFIC NAME	COMMON NAME	G RANK	S RANK	WILDLIFE ACT STATUS	AB. WILDLIFE SPECIES '05	COSEWIC STATUS	SARA STATUS
<i>Cryptocolea imbricata</i>		G3	S1				
<i>Diplophyllum taxifolium</i>		G5	S1				
<i>Frullania inflata</i>		G5	S1				
<i>Gymnocolea inflata</i>		G5	S1				
<i>Gymnomitrion concinnatum</i>		G5	S1				
<i>Gymnomitrion corallioides</i>		G4G5	S1				
<i>Harpanthus flotovianus</i>		G5	S1				
<i>Jungermannia atrovirens</i>		G4G5	S2				
<i>Jungermannia obovata</i>		G4G5	S1				
<i>Jungermannia pumila</i>		G5	S1				
<i>Jungermannia sphaerocarpa</i>		G5	S1				
<i>Lophozia ascendens</i>		G4	S1				
<i>Lophozia badensis</i>		G5?	S1				
<i>Lophozia capitata</i>		G4	S1				
<i>Lophozia excisa</i>		G5	S1				
<i>Lophozia grandiretis</i>		G3?	S2				
<i>Lophozia guttulata</i>		G4G5	S2				
<i>Lophozia heterocolpos</i>		G5	S2				
<i>Lophozia incisa</i>		G5	S2				
<i>Lophozia laxa</i>		G4	S1				
<i>Lophozia longidens</i>		G5	S1				
<i>Lophozia obtusa</i>		G4G5	S1				
<i>Lophozia opacifolia</i>		G4	S1				
<i>Lophozia pellucida</i>		G3?	S1				
<i>Lophozia rutheana</i>		G4?	S1				

Appendix 3

LIVERWORTS (continued)

SCIENTIFIC NAME	COMMON NAME	G RANK	S RANK	WILDLIFE ACT STATUS	AB. WILDLIFE SPECIES '05	COSEWIC STATUS	SARA STATUS
<i>Lophozia wenzelii</i>		G4G5	S1				
<i>Mannia fragrans</i>		G5	S1				
<i>Mannia pilosa</i>		G4?	S1				
<i>Mannia triandra</i>		G3G4	S1				
<i>Marchantia alpestris</i>		G3G5	S1				
<i>Marsupella alpina</i>		G3G5	S1				
<i>Marsupella brevissima</i>		G4?	S1				
<i>Marsupella commutata</i>		G2G4	S1				
<i>Marsupella revoluta</i>		G3G5	S1S2				
<i>Marsupella sparsifolia</i>		G3G4	S1				
<i>Marsupella sphacelata</i>		G5	S1				
<i>Moerckia blyttii</i>		G4	S1				
<i>Moerckia hibernica</i>		G4?	S1S2				
<i>Nardia breidleri</i>		G4G5	S1				
<i>Nardia geoscyphus</i>		G5	S1				
<i>Pellia endiviifolia</i>		G5	S2				
<i>Pellia epiphylla</i>		G5	S1				
<i>Pellia neesiana</i>		G5	S2				
<i>Pleuroclada albescens</i>		G4G5	S2				
<i>Porella cordaeana</i>		G4	S1				
<i>Porella platyphylla</i>		G5	S1				
<i>Radula complanata</i>		G4	S1				
<i>Reboulia hemisphaerica</i>		G5	S1				
<i>Riccardia latifrons</i>		G4G5	S2				
<i>Riccardia multifida</i>		G5	S2S3				
<i>Riccardia palmata</i>		G5	S1				
<i>Riccia beyrichiana</i>		G5	S1				
<i>Riccia cavernosa</i>		G5	S1				

LIVERWORTS (continued)

SCIENTIFIC NAME	COMMON NAME	G RANK	S RANK	WILDLIFE ACT STATUS	AB. WILDLIFE SPECIES '05	COSEWIC STATUS	SARA STATUS
<i>Riccia fluitans</i>		G5	S2				
<i>Ricciocarpos natans</i>		G5	S2				
<i>Sauteria alpina</i>		G4?	S1				
<i>Scapania apiculata</i>		G5?	S1				
<i>Scapania brevicaulis</i>		G2G3	S1				
<i>Scapania curta</i>		G5	S2				
<i>Scapania cuspiduligera</i>		G5	S2				
<i>Scapania glaucocephala</i>		G4G5	S2				
<i>Scapania mucronata</i>		G5	S1				
<i>Scapania paludicola</i>		G5	S2				
<i>Scapania paludososa</i>		G5	S2				
<i>Scapania subalpina</i>		G4G5	S1				
<i>Scapania undulata</i>		G5	S1				
<i>Tritomaria exsecta</i>		G5	S1				
<i>Tritomaria polita</i>		G4	S2				
<i>Tritomaria scitula</i>		G4	S2S3				
<hr/>							
MAMMALS							
<i>Dipodomys ordii</i>	Ord's kangaroo rat	G5	S2	Endangered	At Risk	Endangered	Endangered
<i>Lasiurus cinereus</i>	Hoary bat	G5	S2		Sensitive		
<i>Lemmus sibiricus</i>	Brown lemming	G5	S1		Undetermined		
<i>Marmota flaviventris</i>	Yellow-bellied marmot	G5	S2S3				
<i>Microtus ochrogaster</i>	Prairie vole	G5	S2		Secure		
<i>Myotis evotis</i>	Long-eared bat	G5	S2		Secure		
<i>Myotis septentrionalis</i>	Northern long-eared bat	G4	S2S3		May Be At Risk		
<i>Myotis volans</i>	Long-legged bat	G5	S2		Undetermined		
<i>Onychomys leucogaster</i>	Northern grasshopper mouse	G5	S2		Secure		
<i>Perognathus fasciatus</i>	Olive-backed pocket mouse	G5	S2		Sensitive		

Appendix 3

MAMMALS
(continued)

SCIENTIFIC NAME	COMMON NAME	G RANK	S RANK	WILDLIFE ACT STATUS	AB. WILDLIFE SPECIES '05	COSEWIC STATUS	SARA STATUS
<i>Reithrodontomys megalotis</i>	Western harvest mouse	G5	S1		Undetermined	Endangered	No Status
<i>Sorex vagrans</i>	Wandering shrew	G5	S1		May Be At Risk		
<i>Tamias ruficaudus</i>	Red-tailed chipmunk	G5	S2	Not At Risk	Sensitive		
<i>Vulpes velox</i>	Swift fox	G3	S1	Endangered	At Risk	Endangered	Endangered

MOSSES

<i>Aloina brevirostris</i>	Short-beaked rigid screw moss	G3G5	S2				
<i>Aloina rigida</i>	Aloe-like rigid screw moss	G3G5	S2				
<i>Amblyodon dealbatus</i>		G3G5	S2				
<i>Amphidium mougeotii</i>		G5	S1				
<i>Andreaea alpestris</i>		G5?	S1				
<i>Andreaea blyttii</i>		G5	S1				
<i>Andreaea nivalis</i>	Red rock moss	G5	S2				
<i>Anoectangium aestivum</i>		G3G5	S1				
<i>Anomobryum filiforme</i>		G4	S1				
<i>Anomodon minor</i>		G5	S1				
<i>Aongstroemia longipes</i>		G3G5	S2				
<i>Arctoa fulvella</i>		G3G5	S1				
<i>Atrichum selwynii</i>		G4	S2				
<i>Atrichum undulatum</i>	Undulated crane's bill moss	G5	S1S2				
<i>Aulacomnium acuminatum</i>		G3?	S1				
<i>Aulacomnium androgynum</i>		G5	S2				
<i>Bartramia halleriana</i>	Haller's apple moss	G4G5	S1		Threatened	No Status	
<i>Bartramia pomiformis</i>		G5	S2				
<i>Blindia acuta</i>	Sharp-pointed weissia	G5	S2				
<i>Brachythecium calcareum</i>		G3G4	S1				
<i>Brachythecium plumosum</i>		G5	S2				

MOSSES (continued)

SCIENTIFIC NAME	COMMON NAME	G RANK	S RANK	WILDLIFE ACT STATUS	AB. WILDLIFE SPECIES '05	COSEWIC STATUS	SARA STATUS
<i>Brachythecium reflexum</i>		G4G5	S2				
<i>Brachythecium rutabulum</i>		G5	S2?				
<i>Bryobrittonia longipes</i>		G3	S2				
<i>Bryoerythrophyllum ferruginascens</i>	Red leaf moss	G3G4	S1				
<i>Bryohaplocladium virginianum</i>		G5	S1				
<i>Bryum algovicum</i>		G4G5	S2				
<i>Bryum amblyodon</i>		G5?	S1				
<i>Bryum arcticum</i>		G5?	S1				
<i>Bryum calobryoides</i>		G3	S1				
<i>Bryum calophyllum</i>		G5?	S1				
<i>Bryum cyclophyllum</i>		G4G5	S2				
<i>Bryum dichotomum</i>		GNR	S1				
<i>Bryum knowltonii</i>		G3G4	S1				
<i>Bryum marratii</i>		G3G4	S1				
<i>Bryum muehlenbeckii</i>		G4G5	S1S2				
<i>Bryum pallens</i>		G4G5	S2				
<i>Bryum porsildii</i>	Porsild's bryum	G2G3	S1	In Process		Threatened	No Status
<i>Bryum purpurascens</i>		G3G4	S1				
<i>Bryum schleicheri</i>		G5?	S1				
<i>Bryum stirtonii</i>		G5?	S1S2				
<i>Bryum turbinatum</i>		G5	S2				
<i>Bryum uliginosum</i>		G3G5	S2				
<i>Buxbaumia aphylla</i>	Bug on a stick	G4G5	S2				
<i>Buxbaumia piperi</i>		G4	S1				
<i>Buxbaumia viridis</i>	Green shield moss	G3G4	S1				
<i>Callicladium haldanianum</i>		G5	S1				
<i>Campylium radicale</i>		G3G5	S2				

Appendix 3

MOSSES (continued)

SCIENTIFIC NAME	COMMON NAME	G RANK	S RANK	WILDLIFE ACT STATUS	AB. WILDLIFE SPECIES '05	COSEWIC STATUS	SARA STATUS
<i>Cirriphyllum cirrosum</i>		G5?	S2				
<i>Cirriphyllum piliferum</i>		G5	S1				
<i>Claopodium bolanderi</i>		G4	S1S2				
<i>Conardia compacta</i>		G3G5	S2				
<i>Coscinodon cribrosus</i>	Sieve-toothed moss	G3G4	S1				
<i>Cynodontium alpestre</i>		G3G5	S1				
<i>Cynodontium glaucescens</i>	Glaucous shield moss	G3G4	S1				
<i>Cynodontium schisti</i>		G3G5	S1S2				
<i>Cynodontium tenellum</i>		G3G5Q	S2S3				
<i>Cyrtomnium hymenophylloides</i>		G5?	S1S2				
<i>Desmatodon heimii</i>	Long-stalked beardless moss	G5	S2				
<i>Desmatodon laureri</i>		G5?	S1				
<i>Desmatodon leucostoma</i>		G2G4	S2				
<i>Desmatodon systylius</i>		G4G5	S2				
<i>Dichelyma falcatum</i>		G4G5	S2				
<i>Dichodontium olympicum</i>		G3G5	S1				
<i>Dicranella cerviculata</i>	Red-necked fork moss	G5?	S1				
<i>Dicranella crispa</i>	Curl-leaved fork moss	G3G5	S2				
<i>Dicranella heteromalla</i>	Silky fork moss	G5?	S1				
<i>Dicranella palustris</i>	Drooping-leaved fork moss	G5?	S1				
<i>Dicranella subulata</i>	Awl-leaved fork moss	G5?	S2				
<i>Dicranum angustum</i>		G5?	S1S2				

MOSSES (continued)

SCIENTIFIC NAME	COMMON NAME	G RANK	S RANK	WILDLIFE ACT STATUS	AB. WILDLIFE SPECIES '05	COSEWIC STATUS	SARA STATUS
<i>Dicranum ontariense</i>		G4G5	S1				
<i>Dicranum pallidisetum</i>	Alpine curly heron's bill moss	GU	S1S2				
<i>Dicranum spadiceum</i>		G5?	S2				
<i>Dicranum tauricum</i>	Broken-leaf moss	G4	S1S2				
<i>Didymodon asperifolius</i>		G3G5	S1				
<i>Didymodon fallax</i>	Fallacious screw moss	G5	S2				
<i>Didymodon johansenii</i>		G5?	S2				
<i>Didymodon nigrescens</i>		G3G5	S1				
<i>Didymodon rigidulus</i>	Rigid screw moss	G5	S2				
<i>Didymodon subandreaeoides</i>		GU	S2				
<i>Didymodon tophaceus</i>	Blunt-leaved hair moss	G5	S1S2				
<i>Didymodon vinealis</i>		G5	S1				
<i>Disclerium nudum</i>	Naked weissia	G3G4	S1				
<i>Ditrichum montanum</i>		GU	S1				
<i>Drepanocladus crassicostatus</i>		G3G5	S2				
<i>Drepanocladus sendtneri</i>		G5?	S1				
<i>Dryptodon patens</i>	Spreading fringe moss	G4G5	S2				
<i>Encalypta brevicolla</i>		G4	S2				
<i>Encalypta brevipes</i>		G3	S1				
<i>Encalypta intermedia</i>		G4	S1				
<i>Encalypta longicolla</i>		G3	S1				
<i>Encalypta spathulata</i>		G3	S1				

Appendix 3

MOSSES (continued)

SCIENTIFIC NAME	COMMON NAME	G RANK	S RANK	WILDLIFE ACT STATUS	AB. WILDLIFE SPECIES '05	COSEWIC STATUS	SARA STATUS
<i>Encalypta vulgaris</i>	Common extinguisher moss	G5	S1S2				
<i>Entodon concinnus</i>		G4G5	S2				
<i>Entodon schleicheri</i>		G3G5	S1			Data Deficient	
<i>Fissidens adianthoides</i>	Maidenhair moss	G5	S2				
<i>Fissidens grandifrons</i>	Narrow-leaved Chinese phoenix moss	G4	S2				
<i>Fissidens limbatus</i>		G3G5	S1				
<i>Fontinalis antipyretica</i>		G5	S1				
<i>Fontinalis missourica</i>		G4G5	S1				
<i>Fontinalis neomexicana</i>		G3G5	S1S2				
<i>Funaria muhlenbergii</i>	Muhlenberg's cord moss	G4	S1				
<i>Grimmia alpestris</i>	Alpine grimmia	G3G5	S2				
<i>Grimmia anomala</i>	Mountain forest grimmia	G5	S2				
<i>Grimmia caespiticia</i>		GNR	S1				
<i>Grimmia donniana</i>	Donian grimmia	G4G5	S2				
<i>Grimmia elatior</i>	Large grimmia	G3G5	S1S2				
<i>Grimmia incurva</i>	Black grimmia	G4G5	S1				
<i>Grimmia mollis</i>		G3G5	S2				
<i>Grimmia montana</i>	Sun grimmia	G5?	S2				
<i>Grimmia ovalis</i>		G5?	S1				
<i>Grimmia teretinervis</i>		G3G5	S1				
<i>Grimmia torquata</i>	Twisted-leaved grimmia	G3G5	S2				
<i>Grimmia trichophylla</i>	Hair-pointed grimmia	G5?	S1				
<i>Herzogiella seligeri</i>		G3G4	S1				
<i>Heterocladium dimorphum</i>		G4G5	S1				

MOSSES (continued)

SCIENTIFIC NAME	COMMON NAME	G RANK	S RANK	WILDLIFE ACT STATUS	AB. WILDLIFE SPECIES '05	COSEWIC STATUS	SARA STATUS
<i>Homalothecium nevadense</i>		G4	S2				
<i>Homalothecium pinnatifidum</i>		G4	S2				
<i>Hygroamblystegium tenax</i>		G5	S2				
<i>Hygrohypnum alpestre</i>		G3G5	S1				
<i>Hygrohypnum cochlearifolium</i>		G4	S1				
<i>Hygrohypnum eugyrium</i>		G3G5	S1				
<i>Hygrohypnum molle</i>		G4G5	S1S2				
<i>Hygrohypnum ochraceum</i>		G5	S2				
<i>Hygrohypnum smithii</i>		G3G5	S1				
<i>Hygrohypnum styriacum</i>		GU	S2				
<i>Hylocomiastrum pyrenaicum</i>		G4G5	S1				
<i>Hypnum callitrichrum</i>		G5?	S1				
<i>Hypnum pallescens</i>		G5	S2				
<i>Hypnum procerrimum</i>		G3G4	S2				
<i>Hypnum recurvatum</i>		G3G5	S2				
<i>Jaffueliobryum raui</i>		G4?	S1				
<i>Jaffueliobryum wrightii</i>		G4G5	S2				
<i>Kiaeria blyttii</i>	Blytt's fork moss	G5	S2				
<i>Kiaeria starkei</i>	Alpine broom moss	G5	S2				
<i>Leptodictyum humile</i>		G5	S1				
<i>Lescuraea saxicola</i>		G4G5	S1				
<i>Leskea graciliscescens</i>		G5	S1				
<i>Leskea obscura</i>		G5	S1				

Appendix 3

MOSSES (continued)

SCIENTIFIC NAME	COMMON NAME	G RANK	S RANK	WILDLIFE ACT STATUS	AB. WILDLIFE SPECIES '05	COSEWIC STATUS	SARA STATUS
<i>Leskeella nervosa</i>		G5	S2				
<i>Loeskypnum badium</i>		G4G5	S1				
<i>Meesia longiseta</i>		G4?	S1				
<i>Mnium ambiguum</i>		G5	S2				
<i>Myurella sibirica</i>		G4?	S1				
<i>Myurella tenerima</i>		G3G4	S2				
<i>Neckera pennata</i>		G5	S2S3				
<i>Oligotrichum aligerum</i>		G5	S1S2				
<i>Oligotrichum hercynicum</i>	Hercynian hair moss	G5	S2				
<i>Oligotrichum parallelum</i>		G5	S1S2				
<i>Oreas martiana</i>		G5?	S1				
<i>Orthothecium intricatum</i>		G4G5	S1				
<i>Orthothecium strictum</i>		G5?	S1S2				
<i>Orthotrichum pallens</i>		G5	S2				
<i>Orthotrichum pumilum</i>		G5	S1S2				
<i>Orthotrichum pylaisii</i>		G4G5	S1S2				
<i>Orthotrichum rivulare</i>		G4	S1				
<i>Oxystegus tenuirostris</i>	Acid-soil moss	G4	S1				
<i>Phascum cuspidatum</i>	Cuspidate earth moss	G5	S2				
<i>Philonotis marchica</i>		G5	S1				
<i>Physcomitrium hookeri</i>	Bladder-cap moss	G2G4	S1				
<i>Physcomitrium pyriforme</i>	Urn moss	G5	S1				
<i>Plagiobryum demissum</i>		G3G5	S1				
<i>Plagiobryum zieri</i>		G4G5	S2				

MOSSES (continued)

SCIENTIFIC NAME	COMMON NAME	G RANK	S RANK	WILDLIFE ACT STATUS	AB. WILDLIFE SPECIES '05	COSEWIC STATUS	SARA STATUS
<i>Plagiomnium ciliare</i>		G5	S2				
<i>Pogonatum dentatum</i>	Hair-like pagonatum	G3G5	S2				
<i>Pogonatum urnigerum</i>	Urn-like pagonatum	G5	S2S3				
<i>Pohlia andalusica</i>		G3G5	S1				
<i>Pohlia annotina</i>		G4G5	S1				
<i>Pohlia atropurpurea</i>		G4G5	S1				
<i>Pohlia brevinervis</i>		G1G2	S1				
<i>Pohlia bulbifera</i>		G4G5	S1				
<i>Pohlia crudoides</i>		G2G4	S1				
<i>Pohlia drummondii</i>		G3G4	S2				
<i>Pohlia filum</i>		G4G5	S1				
<i>Pohlia longicolla</i>		G4G5	S1				
<i>Pohlia obtusifolia</i>		G2G4	S1				
<i>Pohlia vexans</i>		G3G5	S1				
<i>Polytrichum longisetum</i>	Slender hairy-cap	G5	S1				
<i>Pseudobryum cinclidioides</i>		G5	S2				
<i>Pseudoleskeia patens</i>		G5	S2				
<i>Pseudoleskeia stenophylla</i>		G5?	S2				
<i>Pseudoleskeella sibirica</i>		G5?	S2				
<i>Pterygoneurum ovatum</i>	Hairy-leaved beardless moss	G5	S1				
<i>Pterygoneurum subsessile</i>		G4?	S2				
<i>Racomitrium aciculare</i>		G5	S1				
<i>Racomitrium elongatum</i>		GU	S1				
<i>Racomitrium fasciculare</i>		G5	S2				
<i>Racomitrium heterostichum</i>		G5	S2?				

Appendix 3

MOSSES (continued)

SCIENTIFIC NAME	COMMON NAME	G RANK	S RANK	WILDLIFE ACT STATUS	AB. WILDLIFE SPECIES '05	COSEWIC STATUS	SARA STATUS
<i>Racomitrium microcarpon</i>		GNRQ	S1?				
<i>Racomitrium sudeticum</i>		G5?	S1S2				
<i>Rhizomnium andrewsianum</i>		G3G5	S1				
<i>Rhizomnium magnifolium</i>		G4G5	S2				
<i>Rhizomnium nudum</i>		G4	S2				
<i>Rhodobryum ontariense</i>		G5	S2				
<i>Rhytidadelphus squarrosus</i>		G4G5	S1				
<i>Schistidium agassizii</i>	Elf bloom moss	G3G5	S1				
<i>Schistidium pulvinatum</i>		G5	S1				
<i>Schistidium tenerum</i>	Thread bloom moss	G5?	S2				
<i>Schistidium trichodon</i>		G2G4	S1				
<i>Schistostega pennata</i>	Luminous moss	G3G4	S1S2				
<i>Scouleria aquatica</i>		G4	S2				
<i>Seligeria calcarea</i>	Chalk brittle moss	G4?	S1				
<i>Seligeria campylopoda</i>		G3G5	S2				
<i>Seligeria donniana</i>	Donian beardless moss	G4G5	S2				
<i>Seligeria subimmersa</i>		G5?	S1				
<i>Sphagnum balticum</i>	Peat moss	G2G4	S1				
<i>Sphagnum compactum</i>	Neat bog moss	G5	S2				
<i>Sphagnum contortum</i>	Twisted bog moss	G5	S2				
<i>Sphagnum fallax</i>		G5	S2				
<i>Sphagnum fimbriatum</i>	Fringed bog moss	G5	S2				
<i>Sphagnum lindbergii</i>	Lindberg's bog moss	G5?	S2				

MOSSES (continued)

SCIENTIFIC NAME	COMMON NAME	G RANK	S RANK	WILDLIFE ACT STATUS	AB. WILDLIFE SPECIES '05	COSEWIC STATUS	SARA STATUS
<i>Sphagnum platyphyllum</i>		G5	S1				
<i>Splachnum ampullaceum</i>	Flagon-fruited splachnum	G5	S2				
<i>Splachnum sphaericum</i>	Globe-fruited splachnum	G3G5	S2				
<i>Splachnum vasculosum</i>	Large-fruited splachnum	G3G5	S2				
<i>Tayloria froelichiana</i>	Froelichian splachnum	G3G5	S1				
<i>Tayloria hornschuchii</i>	Small-kettle moss	G3G5	S1				
<i>Tayloria lingulata</i>	Tongue-leaf small-kettle moss	G3G5	S2				
<i>Tayloria serrata</i>	Slender splachnum	G4	S2				
<i>Tayloria splachnooides</i>	Splachnoid cyrtodon	G2G3	S1				
<i>Tetraplodon urceolatus</i>	Alpine lemming moss	G3G5	S2				
<i>Thamnobryum neckeroides</i>		G4	S1				
<i>Thuidium philibertii</i>		G5	S1S2				
<i>Timmia norvegica</i>		G4?	S2				
<i>Timmia sibirica</i>		G5?	S1				
<i>Tortella inclinata</i>	Bent screw moss	G4G5	S2				
<i>Tortula bartramii</i>		G2G4	S1				
<i>Tortula caninervis</i>		G5?	S1				
<i>Tortula subulata</i>		G5?	S1				
<i>Trichodon cylindricus</i>	Narrow-fruited fork moss	G4G5	S1				
<i>Ulota curvifolia</i>		G3G5	S2S3				
<i>Voitia nivalis</i>	Hidden kettle moss	G4	S1				
<i>Warnstorffia pseudostraminea</i>	Brown moss	G3	S1				
<i>Warnstorffia tundrae</i>	Brown moss	GU	S2				
<i>Weissia controversa</i>	Green-cushioned weissia	G5	S2				
<i>Zygodon viridissimus</i>		G5	S1				

Appendix 3

VASCULAR PLANTS

SCIENTIFIC NAME	COMMON NAME	G RANK	S RANK	WILDLIFE ACT STATUS	AB. WILDLIFE SPECIES '05	COSEWIC STATUS	SARA STATUS
<i>Adenocaulon bicolor</i>	Pathfinder	G5?	S2		May Be At Risk		
<i>Adiantum aleuticum</i>	Western maidenhair fern	G5?	S2		Sensitive		
<i>Agoseris lackschewitzii</i>	Pink false dandelion	G4	S2		Sensitive		
<i>Agrostis exarata</i>	Spike redtop	G5	S2		May Be At Risk		
<i>Agrostis humilis</i>	Low bent grass	G4	S1		Sensitive		
<i>Agrostis mertensii</i>	Northern bent grass	G5	S2		Sensitive		
<i>Agrostis thurberiana</i>	Thurber's bent grass	G5	S2				
<i>Allium geyeri</i>	Geyer's onion	G4G5	S2		May Be At Risk		
<i>Almutaster pauciflorus</i>	Few-flowered aster	G4	S2				
<i>Alopecurus alpinus</i>	Alpine foxtail	G5	S2		May Be At Risk		
<i>Amaranthus californicus</i>	Californian amaranth	G4	S1S2		May Be At Risk		
<i>Ambrosia acanthicarpa</i>	Bur ragweed	G5	S2		May Be At Risk		
<i>Anagallis minima</i>	Chaffweed	G5	S1S2		May Be At Risk		
<i>Anemone quinquefolia</i>	Wood anemone	G5	S1		May Be At Risk		
<i>Antennaria aromatica</i>	Scented everlasting	G4	S2		May Be At Risk		
<i>Antennaria corymbosa</i>	Corymbose everlasting	G5	S1		May Be At Risk		
<i>Antennaria luzuloides</i>	Silvery everlasting	G5	S1		May Be At Risk		
<i>Antennaria monocephala ssp angustata</i>	One-headed everlasting	G4G5 TNR	S2				
<i>Aquilegia formosa</i>	Sitka columbine	G5	S2		Sensitive		
<i>Aquilegia jonesii</i>	Jones' columbine	G4	S2		Sensitive		
<i>Arabidopsis salsuginea</i>	Mouse-ear cress	G4G5	S1		May Be At Risk		
<i>Arabis lemmonii</i>	Lemmon's rock cress	G5	S2		Sensitive		
<i>Arctagrostis arundinacea</i>	Polar grass	G5T5	S1				
<i>Arenaria longipedunculata</i>	Sandwort	G3Q	S1		May Be At Risk		

VASCULAR PLANTS (continued)

SCIENTIFIC NAME	COMMON NAME	G RANK	S RANK	WILDLIFE ACT STATUS	AB. WILDLIFE SPECIES '05	COSEWIC STATUS	SARA STATUS
<i>Aristida purpurea var longiseta</i>	Red three-awn	G5T5?	S1		May Be At Risk		
<i>Arnica amplexicaulis</i>	Stem-clasping arnica	G4G5	S2		May Be At Risk		
<i>Arnica longifolia</i>	Long-leaved arnica	G5	S2		Sensitive		
<i>Arnica parryi</i>	Nodding arnica	G5	S2		May Be At Risk		
<i>Artemisia furcata var furcata</i>	Forked wormwood	G4TNR	S1		May Be At Risk		
<i>Artemisia tilesii</i>	Herriot's sagewort	G5	S2		Sensitive		
<i>Artemisia tridentata</i>	Big sagebrush	G5	S2		May Be At Risk		
<i>Asclepias viridiflora</i>	Green milkweed	G5	S1		May Be At Risk		
<i>Aster campestris</i>	Meadow aster	G5	S2		May Be At Risk		
<i>Aster eatonii</i>	Eaton's aster	G5	S2		May Be At Risk		
<i>Aster umbellatus</i>	Flat-topped white aster	G5	S2		May Be At Risk		
<i>Aster x macallae</i>		GNA	S1S2				
<i>Astragalus bodinii</i>	Bodin's milk vetch	G4	S1		May Be At Risk		
<i>Astragalus kentrophyta var kentrophyta</i>	Prickly milk vetch	G5T4	S1S2		May Be At Risk		
<i>Astragalus purshii</i>	Pursh's milk vetch	G5	S2		Sensitive		
<i>Athyrium alpestre var americanum</i>	Alpine spleenwort	G4G5	S1				
<i>Atriplex powelli</i>	Powell's saltbush	G4	S1		Sensitive		
<i>Atriplex truncata</i>	Saltbush	G5	S1		May Be At Risk		
<i>Bidens frondosa</i>	Common beggarticks	G5	S2		May Be At Risk		
<i>Blysmus rufus</i>	Red bulrush	G5	S1		Sensitive		
<i>Boisduvalia glabella</i>	Smooth boisduvalia	G5	S2		May Be At Risk		
<i>Bolboschoenus fluvialis</i>	River bulrush	G5	S1		May Be At Risk		
<i>Boschniakia rossica</i>	Ground-cone	G5	S1		May Be At Risk		
<i>Botrychium ascendens</i>	Ascending grape fern	G2G3	S1		May Be At Risk		
<i>Botrychium campestre</i>	Field grape fern	G3G4	S1		May Be At Risk		
<i>Botrychium crenulatum</i>		G3	S1		May Be At Risk		

Appendix 3

VASCULAR PLANTS (continued)

SCIENTIFIC NAME	COMMON NAME	G RANK	S RANK	WILDLIFE ACT STATUS	AB. WILDLIFE SPECIES '05	COSEWIC STATUS	SARA STATUS
<i>Botrychium lanceolatum</i>	Lance-leaved grape fern	G5	S2		Sensitive		
<i>Botrychium lineare</i>	Straight-leaf moonwort	G1	S1		May Be At Risk		
<i>Botrychium matricariifolium</i>	Chamomile grape-fern	G5	S1				
<i>Botrychium michiganense</i>		G1	SU		Undetermined		
<i>Botrychium minganense</i>	Mingan grape fern	G4	S2S3				
<i>Botrychium multifidum var intermedium</i>	Leather grape fern	G5	S2				
<i>Botrychium pallidum</i>		G3	S1		May Be At Risk		
<i>Botrychium paradoxum</i>	Paradoxical grape fern	G2	S1		May Be At Risk		
<i>Botrychium pedunculosum</i>		G2G3	S1		May Be At Risk		
<i>Botrychium pinnatum</i>		G4?	S1		Sensitive		
<i>Botrychium simplex</i>	Dwarf grape fern	G5	S2		May Be At Risk		
<i>Botrychium spathulatum</i>		G3	S2		May Be At Risk		
<i>Botrychium x watertonense</i>		GNA	S1				
<i>Bouteloua curtipendula</i>	Side-oats grama	G5	S1				
<i>Boykinia heucheriformis</i>	Telesonix	G4	S2		Sensitive		
<i>Brasenia schreberi</i>	Watershield	G5	S1		May Be At Risk		
<i>Braya humilis var maccallae</i>	Leafy braya	G5T2 T3Q	S1		May Be At Risk		
<i>Braya humilis var porsildii</i>		G5TNRQ	S1				
<i>Braya purpurascens</i>	Alpine braya	G5T4T5	S1S2				
<i>Brickellia grandiflora</i>	Large-flowered brickellia	G5	S1S2		Sensitive	Not At Risk	
<i>Bromus latiglumis</i>	Canada brome	G5	S1		May Be At Risk		
<i>Bromus vulgaris</i>	Woodland brome	G5	S2S3		May Be At Risk		

VASCULAR PLANTS (continued)

SCIENTIFIC NAME	COMMON NAME	G RANK	S RANK	WILDLIFE ACT STATUS	AB. WILDLIFE SPECIES '05	COSEWIC STATUS	SARA STATUS
<i>Calamagrostis lapponica</i>	Lapland reed grass	G5	S1		Sensitive		
<i>Calylophus serrulatus</i>	Shrubby evening-primrose	G5	S2		May Be At Risk		
<i>Camassia quamash var quamash</i>	Blue camas	G5T3T5	S2		May Be At Risk		
<i>Camissonia andina</i>	Upland evening-primrose	G4	S1		May Be At Risk		
<i>Campanula aparinooides</i>	Marsh bellflower	G5	S1		May Be At Risk		
<i>Campanula uniflora</i>	Alpine harebell	G4	S2		Sensitive		
<i>Cardamine bellidifolia</i>	Alpine bitter cress	G5	S2S3		Sensitive		
<i>Cardamine oligosperma var kamtschatica</i>	Mountain cress	G5T3T5	S2S3				
<i>Cardamine pratensis</i>	Meadow bitter cress	G5	S2		May Be At Risk		
<i>Carex adusta</i>	Browned sedge	G5	S1		May Be At Risk		
<i>Carex aperta</i>	Open sedge	G4	S1		Sensitive		
<i>Carex arcta</i>	Narrow sedge	G5	S1		May Be At Risk		
<i>Carex backii</i>	Back's sedge	G4	S2		May Be At Risk		
<i>Carex capitata</i>	Capitate sedge	G5	S2		Sensitive		
<i>Carex cordillerana</i>		GNR	S1		Undetermined		
<i>Carex crawei</i>	Crawe's sedge	G5	S2		May Be At Risk		
<i>Carex echinata</i> ssp <i>echinata</i>	Little prickly sedge	G5T5	S1		Undetermined		
<i>Carex glacialis</i>	Glacier sedge	G5	S2		Sensitive		
<i>Carex heleonastes</i>	Hudson Bay sedge	G4	S2		Sensitive		
<i>Carex heteroneura</i> var <i>epapilloosa</i>	Blackened sedge	G5TNR	S1		Sensitive		
<i>Carex hookeriana</i>	Hooker's sedge	G4?	S2		Sensitive		
<i>Carex houghtoniana</i>	Sand sedge	G5	S2		May Be At Risk		
<i>Carex hystericina</i>	Porcupine sedge	G5	S1		May Be At Risk		
<i>Carex illota</i>	Small-headed sedge	G4G5	S1		Sensitive		
<i>Carex incurviformis</i> var <i>incurviformis</i>	Seaside sedge	G4G5 T4T5	S2		Sensitive		

Appendix 3

VASCULAR PLANTS (continued)

SCIENTIFIC NAME	COMMON NAME	G RANK	S RANK	WILDLIFE ACT STATUS	AB. WILDLIFE SPECIES '05	COSEWIC STATUS	SARA STATUS
<i>Carex infirminervia</i>		G4G5	S1		Undetermined		
<i>Carex lachenalii</i>	Two-parted sedge	G5	S2		Sensitive		
<i>Carex lacustris</i>	Lakeshore sedge	G5	S2		May Be At Risk		
<i>Carex lenticularis</i> var <i>dolia</i>	Lens-fruited sedge	G5T3Q	S1				
<i>Carex lenticularis</i> var <i>lenticularis</i>		G5T5	S1				
<i>Carex leptopoda</i>	Taper-fruit short-scale sedge	G5	S1		May Be At Risk		
<i>Carex mertensii</i>	Purple sedge	G5	S1		Sensitive		
<i>Carex misandra</i>	Nodding sedge	G5	S1S2				
<i>Carex nebrascensis</i>	Nebraska sedge	G5	S2		May Be At Risk	Not At Risk	
<i>Carex oligosperma</i>	Few-fruited sedge	G5?	S1S2		Sensitive		
<i>Carex parryana</i> var <i>parryana</i>	Parry's sedge	G4T4	S1S2		Sensitive		
<i>Carex paysonis</i>	Payson's sedge	G4	S1S2		Sensitive		
<i>Carex pedunculata</i>	Stalked sedge	G5	S1		May Be At Risk		
<i>Carex petasata</i>	Pasture sedge	G5	S1S2		May Be At Risk		
<i>Carex platylepis</i>	Broad-scaled sedge	G4?	S1S2				
<i>Carex podocarpa</i>	Alpine sedge	G4G5	S2		Sensitive		
<i>Carex preslii</i>	Presl sedge	G4	S2		May Be At Risk		
<i>Carex saximontana</i>		G5	S1		May Be At Risk		
<i>Carex scoparia</i>	Broom sedge	G5	S1		May Be At Risk		
<i>Carex supina</i>	Weak sedge	G5	S1		Sensitive		
<i>Carex umbellata</i>	Umbellate sedge	G5	S1		Undetermined		
<i>Carex vesicaria</i>	Blister sedge	G5	S1		Undetermined		
<i>Carex vulpinoidea</i>	Fox sedge	G5	S2		May Be At Risk		
<i>Castilleja parviflora</i>	Small-flowered Indian paintbrush	G5?	S1		Sensitive		
<i>Castilleja sessiliflora</i>	Downy paintbrush	G5	S1		May Be At Risk		
<i>Cerastium brachypodium</i>		G5	S1		May Be At Risk		
<i>Cheilanthes gracillima</i>	Lace fern	G4G5	S1		May Be At Risk		

VASCULAR PLANTS (continued)

SCIENTIFIC NAME	COMMON NAME	G RANK	S RANK	WILDLIFE ACT STATUS	AB. WILDLIFE SPECIES '05	COSEWIC STATUS	SARA STATUS
<i>Chenopodium atrovirens</i>		G5	S1		May Be At Risk		
<i>Chenopodium desiccatum</i>		G5	S1S2		May Be At Risk		
<i>Chenopodium incanum</i>		G5	S1		May Be At Risk		
<i>Chenopodium subglabrum</i>	Smooth narrow-leaved goosefoot	G3G4	S1		May Be At Risk	Threatened	Threatened
<i>Chenopodium watsonii</i>	Watson's goosefoot	G5	S1		May Be At Risk		
<i>Conimitella williamsii</i>		G3?	S2		May Be At Risk		
<i>Coreopsis tinctoria</i>	Common tickseed	G5	S2S3		Sensitive		
<i>Crepis atribarba</i>	Hawk's-beard	G5	S2		May Be At Risk		
<i>Crepis intermedia</i>	Intermediate hawk's-beard	G5	S2		May Be At Risk		
<i>Crepis occidentalis</i>	Small-flowered hawk's-beard	G5	S2		May Be At Risk		
<i>Cryptantha kelseyanus</i>	Kelsey's cat's eye	G4	S1		May Be At Risk		
<i>Cryptantha minima</i>	Tiny cryptanthe	G5	S2	Endangered	At Risk	Endangered	Endangered
<i>Cryptogramma stelleri</i>	Steller's rock brake	G5	S2		May Be At Risk		
<i>Cuscuta gronovii</i>	Common dodder	G5	S1		May Be At Risk		
<i>Cynoglossum virginianum var boreale</i>	Wild comfrey	G5T4T5	S1		May Be At Risk		
<i>Cyperus schweinitzii</i>	Sand nut-grass	G5	S2		May Be At Risk		
<i>Cyperus squarrosus</i>	Awned nut-grass	G5	S1		May Be At Risk		
<i>Cypripedium montanum</i>	Mountain lady's-slipper	G4	S2		May Be At Risk		
<i>Cystopteris montana</i>	Mountain bladder fern	G5	S2		May Be At Risk		
<i>Danthonia spicata</i>	Poverty oat grass	G5	S1S2		May Be At Risk		
<i>Deschampsia elongata</i>	Slender hair grass	G5	S1		May Be At Risk		
<i>Diphasiastrum sitchense</i>	Ground-fir	G5	S2		May Be At Risk		

Appendix 3

VASCULAR PLANTS (continued)

SCIENTIFIC NAME	COMMON NAME	G RANK	S RANK	WILDLIFE ACT STATUS	AB. WILDLIFE SPECIES '05	COSEWIC STATUS	SARA STATUS
<i>Douglasia montana</i>	Mountain dwarf-primula	G4?	S1		May Be At Risk		
<i>Downingia laeta</i>	Downingia	G5	S2		May Be At Risk		
<i>Draba densifolia</i>		G5	S1S2		Sensitive		
<i>Draba fladnizensis</i>		G4	S1S2		May Be At Risk		
<i>Draba glabella</i>		G4G5	S1		May Be At Risk		
<i>Draba kananaskis</i>	Kananaskis whitlow-grass	G1Q	S1				
<i>Draba longipes</i>		G4	S1S2				
<i>Draba macounii</i>	Macoun's whitlow-grass	G3G4	S2		Sensitive		
<i>Draba porsildii</i>	Porsild's whitlow-grass	G3G4	S2		May Be At Risk		
<i>Draba reptans</i>		G5	S1S2		May Be At Risk		
<i>Draba ventosa</i>		G3	S2		Sensitive		
<i>Drosera linearis</i>	Slender-leaved sundew	G4	S2		Sensitive		
<i>Dryopteris cristata</i>	Crested shield fern	G5	S1		May Be At Risk		
<i>Dryopteris filix-mas</i>	Male fern	G5	S1		May Be At Risk		
<i>Elatine triandra</i>	Waterwort	G5	S1		May Be At Risk		
<i>Eleocharis compressa var borealis</i>	Flattened spike-rush	G5T5	S1				
<i>Eleocharis engelmannii</i>	Engelmann's spike-rush	G4G5Q	S1		May Be At Risk		
<i>Ellisia nyctelea</i>	Waterpod	G5	S2		May Be At Risk		
<i>Elodea bifoliata</i>	Two-leaved waterweed	G4G5	S1		May Be At Risk		
<i>Elymus scribneri</i>	Scribner's wheat grass	G5	S2		Sensitive		
<i>Epilobium clavatum</i>		G5	S2		Sensitive		
<i>Epilobium glaberrimum ssp fastigiatum</i>		G5T4T5	S1		Sensitive		
<i>Epilobium haleanum</i>		G5	S1		May Be At Risk		
<i>Epilobium lactiflorum</i>		G5	S2		May Be At Risk		
<i>Epilobium leptocarpum</i>		G5	S1		May Be At Risk		

VASCULAR PLANTS (continued)

SCIENTIFIC NAME	COMMON NAME	G RANK	S RANK	WILDLIFE ACT STATUS	AB. WILDLIFE SPECIES '05	COSEWIC STATUS	SARA STATUS
<i>Epilobium luteum</i>		G5	S1		Sensitive		
<i>Epilobium saximontanum</i>	Rocky Mountain willowherb	G5	S1		May Be At Risk		
<i>Erigeron divergens</i>	Fleabane	G5	S1		May Be At Risk		
<i>Erigeron flagellaris</i>	Creeping fleabane	G5	S1S2		May Be At Risk		
<i>Erigeron hyssopifolius</i>	Wild daisy fleabane	G5	S1		May Be At Risk		
<i>Erigeron lackschewitzii</i>	Front-range fleabane	G3	S1		May Be At Risk		
<i>Erigeron pallens</i>	Pale alpine fleabane	G4	S2		Sensitive		
<i>Erigeron radicatus</i>	Dwarf fleabane	G3	S2		Sensitive	Not At Risk	
<i>Erigeron trifidus</i>	Trifid-leaved fleabane	G2G3Q	S1S2		Sensitive		
<i>Eriogonum cernuum</i>	Nodding umbrella-plant	G5	S2		May Be At Risk		
<i>Eriophorum callitrix</i>	Beautiful cotton grass	G5	S2		Sensitive		
<i>Eupatorium maculatum</i>	Spotted Joe-pye weed	G5	S1S2		May Be At Risk		
<i>Festuca altaica</i>	Northern rough fescue	G5	S2		Sensitive		
<i>Festuca minutiflora</i>	Tiny-flowered fescue	G5	S2		Sensitive		
<i>Festuca occidentalis</i>	Western fescue	G5	S1		May Be At Risk		
<i>Festuca subulata</i>		G5	S1		May Be At Risk		
<i>Festuca viviparoidea ssp krajinae</i>	Viviparous fescue	G4G5TNR	S1		Sensitive		
<i>Fraxinus pennsylvanica</i>	Green ash	G5	S1		May Be At Risk		
<i>Galium bifolium</i>	Two-leaved Bedstraw	G5	S1		May Be At Risk		
<i>Gayophytum racemosum</i>	Low willowherb	G5	S1		May Be At Risk		
<i>Gentiana fremontii</i>	Marsh gentian	G4	S2		May Be At Risk		
<i>Gentianopsis detonsa ssp raupii</i>	Northern fringed gentian	G3G5T3T5	S1		Sensitive		
<i>Geranium carolinianum</i>	Carolina wild geranium	G5	S1		Sensitive		
<i>Glyceria elata</i>	Tufted tall manna grass	G4G5	S2		Sensitive		

Appendix 3

VASCULAR PLANTS (continued)

SCIENTIFIC NAME	COMMON NAME	G RANK	S RANK	WILDLIFE ACT STATUS	AB. WILDLIFE SPECIES '05	COSEWIC STATUS	SARA STATUS
<i>Gratiola neglecta</i>	Clammy hedge-hyssop	G5	S2S3		Sensitive		
<i>Gymnocarpium disjunctum</i>		G4	S1		Sensitive		
<i>Gymnocarpium jessoense</i>	Northern oak fern	G5	S1		May Be At Risk		
<i>Halimolobos virgata</i>	Slender mouse-ear-cress	G4	S1S2	Data Deficient	At Risk	Threatened	Threatened
<i>Hedyotis longifolia</i>	Long-leaved bluets	G4G5	S2		May Be At Risk		
<i>Heliotropium curassavicum</i>	Spatulate-leaved heliotrope	G5	S1		Sensitive		
<i>Heuchera glabra</i>	Alpine alumroot	G5	S1		Sensitive		
<i>Hierochloe alpina</i>	Alpine sweet grass	G5	S2		Sensitive		
<i>Hippuris montana</i>	Mountain mare's-tail	G4	S1		May Be At Risk		
<i>Huperzia haleakalae</i>		G4G5	S2		Undetermined		
<i>Huperzia selago</i>	Mountain club-moss	G5	S1		Undetermined		
<i>Hydrophyllum capitatum</i>	Woollen-breeches	G4?	S2S3		Sensitive		
<i>Hymenopappus filifolius</i>	Tufted hymenopappus	G5	S2		May Be At Risk		
<i>Hypericum majus</i>	Large Canada St. John's-wort	G5	S2		Sensitive		
<i>Hypericum scouleri ssp scouleri</i>	Western St. John's-wort	G5T3T5	S1S2		Sensitive		
<i>Iliamna rivularis</i>	Mountain hollyhock	G5	S2		May Be At Risk		
<i>Iris missouriensis</i>	Western blue flag	G5	S1	Special Concern	At Risk	Threatened	Threatened
<i>Isoetes bolanderi var bolanderi</i>	Bolander's quillwort	G4	S1		May Be At Risk	Threatened	Threatened
<i>Isoetes echinospora</i>	Northern quillwort	G5?	S1		May Be At Risk		
<i>Isoetes maritima</i>		G4	S1		May Be At Risk		
<i>Isoetes occidentalis</i>		G4G5	S1		May Be At Risk		
<i>Isoetes x truncata</i>		GNA	S1				
<i>Juncus biglumis</i>	Two-glumed rush	G5	S2		Sensitive		
<i>Juncus brevicaudatus</i>	Short-tail rush	G5	S2		Sensitive		
<i>Juncus nevadensis</i>	Nevada rush	G5	S1		May Be At Risk		

VASCULAR PLANTS (continued)

SCIENTIFIC NAME	COMMON NAME	G RANK	S RANK	WILDLIFE ACT STATUS	AB. WILDLIFE SPECIES '05	COSEWIC STATUS	SARA STATUS
<i>Juncus parryi</i>	Parry's rush	G4G5	S2		Secure		
<i>Juncus regelii</i>	Regel's rush	G4?	S1		May Be At Risk		
<i>Juncus stygius</i> var <i>americanus</i>	Marsh rush	G5T5	S2		May Be At Risk		
<i>Koenigia islandica</i>	Koenigia	G4	S1		May Be At Risk		
<i>Lactuca biennis</i>	Tall blue lettuce	G5	S2		May Be At Risk		
<i>Larix occidentalis</i>	Western larch	G5	S2		May Be At Risk		
<i>Lathyrus palustris</i>	Vetchling peavine	G5	S1				
<i>Lesquerella arctica</i> var <i>purshii</i>	Northern bladderpod	G4TNR	S2		Sensitive		
<i>Lewisia pygmaea</i> var <i>pygmaea</i>	Dwarf bitter-root	G5T5	S2		Sensitive		
<i>Lewisia rediviva</i>	Bitter-root	G5	S1		May Be At Risk		
<i>Leymus mollis</i>	American dune grass	G5	S1		May Be At Risk		
<i>Lilaea scilloides</i>	Flowering-quillwort	G5?	S1		May Be At Risk		
<i>Linanthus septentrionalis</i>	Linanthus	G5	S2		May Be At Risk		
<i>Listera caurina</i>	Western twayblade	G4?	S1		May Be At Risk		
<i>Listera convallarioides</i>	Broad-lipped twayblade	G5	S2		May Be At Risk		
<i>Lithophragma glabrum</i>	Rockstar	G4G5	S2		May Be At Risk		
<i>Lithophragma parviflorum</i>	Small-flowered rockstar	G5	S2		May Be At Risk		
<i>Lobelia spicata</i>	Spiked lobelia	G5	S1		May Be At Risk		
<i>Loiseleuria procumbens</i>	Alpine azalea	G5	S1S2		Sensitive		
<i>Lomatium coulteri</i>	Biscuit-root	G5	S1S2		May Be At Risk		
<i>Lomatogonium rotatum</i>	Marsh felwort	G5	S2S3		May Be At Risk		
<i>Lupinus minimus</i>	Least lupine	G3G4	S1		May Be At Risk		
<i>Lupinus polyphyllus</i>	Large-leaved lupine	G5	S1		May Be At Risk		
<i>Lupinus wyethii</i>	Wyeth's lupine	G5	S1		May Be At Risk		
<i>Luzula acuminata</i>		G5	S1		May Be At Risk		
<i>Luzula groenlandica</i>		G4	S1		Sensitive		
<i>Luzula rufescens</i>	Reddish wood-rush	G5	S1		Sensitive		
<i>Lycopodiella inundata</i>	Bog club-moss	G5	S1		Sensitive		

Appendix 3

VASCULAR PLANTS (continued)

SCIENTIFIC NAME	COMMON NAME	G RANK	S RANK	WILDLIFE ACT STATUS	AB. WILDLIFE SPECIES '05	COSEWIC STATUS	SARA STATUS
<i>Lysimachia hybrida</i>	Lance-leaved loosestrife	G5	S2		May Be At Risk		
<i>Malaxis monophylla</i>	White adder's-mouth	G5	S2		Sensitive		
<i>Malaxis paludosa</i>	Bog adder's-mouth	G4	S1		May Be At Risk		
<i>Marsilea vestita</i>	Hairy pepperwort	G5	S2		May Be At Risk		
<i>Melica smithii</i>	Melic grass	G4	S1S2		May Be At Risk		
<i>Melica spectabilis</i>	Onion grass	G5	S2		May Be At Risk		
<i>Mertensia lanceolata</i>	Lance-leaved lungwort	G5	S2		May Be At Risk		
<i>Mertensia longiflora</i>	Large-flowered lungwort	G4G5	S2		May Be At Risk		
<i>Microseris nutans</i>	Nodding scorzonella	G5	S2		May Be At Risk		
<i>Mimulus breweri</i>	Brewer's monkeyflower	G5	S1		May Be At Risk		
<i>Mimulus floribundus</i>	Small yellow monkeyflower	G5	S1		Sensitive		
<i>Mimulus glabratus</i>	Smooth monkeyflower	G5	S1		May Be At Risk		
<i>Mimulus ringens</i>	Square-stem monkeyflower	G5	S1		May Be At Risk		
<i>Mimulus tilingii</i>		G5	S1		May Be At Risk		
<i>Minuartia elegans</i>	Purple alpine sandwort	G4G5	S1S2		Sensitive		
<i>Monotropa hypopithys</i>	Pinesap	G5	S2		May Be At Risk		
<i>Montia linearis</i>	Linear-leaved montia	G5	S1		May Be At Risk		
<i>Montia parvifolia</i>	Small-leaved montia	G4G5	S1		May Be At Risk		
<i>Muhlenbergia racemosa</i>	Marsh muhly	G5	S1		May Be At Risk		
<i>Munroa squarrosa</i>	False buffalo grass	G5	S1		May Be At Risk		
<i>Najas flexilis</i>	Slender naiad	G5	S1S2		May Be At Risk		
<i>Nemophila breviflora</i>	Small baby-blue-eyes	G5	S1S2		May Be At Risk		
<i>Nothocalais cuspidata</i>	Prairie false dandelion	G5	S2		May Be At Risk		
<i>Nuttallanthus canadensis</i>	Field toad-flax	G5	S1		May Be At Risk		
<i>Nymphaea leibergii</i>	Pygmy water-lily	G5	S1		May Be At Risk		
<i>Nymphaea tetragona</i>	White water-lily	G5	S1		May Be At Risk		

VASCULAR PLANTS (continued)

SCIENTIFIC NAME	COMMON NAME	G RANK	S RANK	WILDLIFE ACT STATUS	AB. WILDLIFE SPECIES '05	COSEWIC STATUS	SARA STATUS
<i>Oenothera flava</i>	Low yellow evening-primrose	G5	S2		May Be At Risk		
<i>Onosmodium molle</i>	Western false gromwell	G4G5	S2		May Be At Risk		
<i>Oryzopsis canadensis</i>	Canadian rice grass	G5	S1		Undetermined		
<i>Oryzopsis exigua</i>	Little rice grass	G5	S1		May Be At Risk		
<i>Oryzopsis micrantha</i>	Little-seed rice grass	G5	S2		May Be At Risk		
<i>Osmorrhiza longistylis</i>	Smooth sweet cicely	G5	S2		May Be At Risk		
<i>Osmorrhiza purpurea</i>	Purple sweet cicely	G4G5	S2		May Be At Risk		
<i>Oxytropis campestris var davisii</i>		G5T3	S2?				
<i>Oxytropis lagopus var conjugans</i>	Hare-footed locoweed	G4G5T3	S1		May Be At Risk		
<i>Packera subnuda</i>	Ragwort	G5	S2		May Be At Risk		
<i>Panicum leibergii</i>	Leiberg's millet	G5	S1				
<i>Panicum wilcoxianum</i>		G5	S1				
<i>Papaver pygmaeum</i>		G3	S2		Sensitive		
<i>Papaver radicatum ssp kluanense</i>		G5T3T4	S2		May Be At Risk		
<i>Parietaria pensylvanica</i>	American pellitory	G5	S2		Sensitive		
<i>Pedicularis capitata</i>	Large-flowered lousewort	G5	S2		Sensitive		
<i>Pedicularis flammea</i>	Flame-colored lousewort	G3G5	S2		May Be At Risk		
<i>Pedicularis lanata</i>	Woolly lousewort	G4G5	S2		Sensitive		
<i>Pedicularis langsdorffii ssp arctica</i>	Arctic lousewort	G5T5	S2		Sensitive		
<i>Pedicularis oederi</i>		G5	S1		May Be At Risk		
<i>Pedicularis racemosa</i>	Leafy lousewort	G5	S1		Sensitive		
<i>Pedicularis sudetica</i>	Purple rattle	G5	S1		May Be At Risk		
<i>Pellaea gastonyi</i>	Gaston's cliff brake	G2G4	S2		May Be At Risk		

Appendix 3

VASCULAR PLANTS (continued)

SCIENTIFIC NAME	COMMON NAME	G RANK	S RANK	WILDLIFE ACT STATUS	AB. WILDLIFE SPECIES '05	COSEWIC STATUS	SARA STATUS
<i>Pellaea glabella</i>	Smooth cliff brake	G5	S2		May Be At Risk		
<i>Pellaea glabella ssp occidentalis</i>		G5T4	S1				
<i>Pellaea glabella ssp simplex</i>		G5T4?	S2				
<i>Penstemon fruticosus var scouleri</i>	Shrubby beardtongue	G4T4	S2		Sensitive		
<i>Phacelia linearis</i>	Linear-leaved scorpionweed	G5	S2		May Be At Risk		
<i>Phacelia lyallii</i>	Lyall's scorpionweed	G3	S2		May Be At Risk		
<i>Phegopteris connectilis</i>	Northern beech fern	G5	S2		May Be At Risk		
<i>Philadelphus lewisii</i>	Mock orange	G5	S1		May Be At Risk		
<i>Phlox gracilis ssp gracilis</i>	Slender phlox	G5T5	S1		May Be At Risk		
<i>Physocarpus malvaceus</i>	Mallow-leaved ninebark	G4G5	S1		May Be At Risk		
<i>Physostegia ledinghamii</i>	False dragonhead	G3?	S2		May Be At Risk		
<i>Picradeniopsis oppositifolia</i>	Picradeniopsis	G5?	S1		May Be At Risk		
<i>Pinguicula villosa</i>	Small butterwort	G4	S1		Sensitive		
<i>Pinus albicaulis</i>	Whitebark pine	G4	S2		May Be At Risk		
<i>Pinus flexilis</i>	Limber pine	G5	S2		May Be At Risk		
<i>Plantago canescens</i>	Western ribgrass	G4G5	S2		Sensitive		
<i>Plantago maritima</i>	Sea-side plantain	G5	S1		May Be At Risk		
<i>Platanthera stricta</i>	Slender bog orchid	G5	S2		May Be At Risk		
<i>Poa gracillima</i>	Pacific bluegrass	G4	S2				
<i>Poa laxa ssp banffiana</i>		G5?T1	S1		Secure		
<i>Poa lettermanii</i>	Letterman's bluegrass	G4	S1		Exotic/Alien		
<i>Poa stenantha</i>	Bluegrass	G5	S1		May Be At Risk		
<i>Polanisia dodecandra</i>	Clammyweed	G5	S2		May Be At Risk		
<i>Polygala paucifolia</i>	Fringed milkwort	G5	S1		May Be At Risk		

VASCULAR PLANTS (continued)

SCIENTIFIC NAME	COMMON NAME	G RANK	S RANK	WILDLIFE ACT STATUS	AB. WILDLIFE SPECIES '05	COSEWIC STATUS	SARA STATUS
<i>Polygonum minimum</i>	Least knotweed	G5	S2		May Be At Risk		
<i>Polygonum polystachys ssp. confertiflorum</i>	Watson's knotweed	G4G5T3T4	S2		Sensitive		
<i>Polypodium hesperium</i>	Western polypody	G5	S1S2		Sensitive		
<i>Polypodium sibiricum</i>		G5?	S2S3		Sensitive		
<i>Potamogeton foliosus</i>	Leafy pondweed	G5	S2		Secure		
<i>Potamogeton nodosus</i>	Longleaf pondweed	G5	S1		May Be At Risk		
<i>Potamogeton obtusifolius</i>	Blunt-leaved pondweed	G5	S2		Sensitive		
<i>Potamogeton robbinsii</i>	Robbins' pondweed	G5	S1		Sensitive		
<i>Potamogeton strictifolius</i>	Linear-leaved pondweed	G5	S2		Sensitive		
<i>Potentilla drummondii</i>	Drummond's cinquefoil	G5	S2		Sensitive		
<i>Potentilla finitima</i>	Sandhills cinquefoil	G2G4Q	S1		May Be At Risk		
<i>Potentilla hookeriana</i>	Hooker's cinquefoil	G4	S2		Undetermined		
<i>Potentilla macounii</i>	Macoun's cinquefoil	G1?	S1		May Be At Risk		
<i>Potentilla multifida</i>	Branched cinquefoil	G5	S1		May Be At Risk		
<i>Potentilla multisecta</i>	Smooth-leaved cinquefoil	GNR	S2		Sensitive		
<i>Potentilla paradoxa</i>	Bushy cinquefoil	G5	S2		Sensitive		
<i>Potentilla plattensis</i>	Low cinquefoil	G4	S1S2		May Be At Risk		
<i>Potentilla subjugata</i>		G4	S1		May Be At Risk		
<i>Potentilla villosa</i>	Hairy cinquefoil	G4	S2		Sensitive		
<i>Prenanthes alata</i>	White lettuce	G5	S1		May Be At Risk		
<i>Prenanthes sagittata</i>	Purple rattlesnakeroot	G3G4	S2		May Be At Risk		
<i>Primula egaliksensis</i>	Primrose	G4	S2		Sensitive		
<i>Psilocarphus brevissimus var. brevissimus</i>	Dwarf woollyheads	G4T4?	S2		May Be At Risk		

Appendix 3

VASCULAR PLANTS (continued)

SCIENTIFIC NAME	COMMON NAME	G RANK	S RANK	WILDLIFE ACT STATUS	AB. WILDLIFE SPECIES '05	COSEWIC STATUS	SARA STATUS
<i>Puccinellia distans ssp hauptiana</i>		G5T3T4	S1		May Be At Risk		
<i>Pyrola grandiflora</i>	Arctic wintergreen	G5	S2		Sensitive		
<i>Pyrola picta</i>	White-veined wintergreen	G4G5	S1		May Be At Risk		
<i>Ranunculus glaberrimus</i>	Early buttercup	G5	S2		May Be At Risk		
<i>Ranunculus nivalis</i>	Snow buttercup	G5	S1		Sensitive		
<i>Ranunculus occidentalis var brevistylis</i>	Western buttercup	G5T5	S2		Secure		
<i>Ranunculus uncinatus</i>	Hairy buttercup	G5	S2		Sensitive		
<i>Rhododendron lapponicum</i>	Lapland rose-bay	G5	S2		Sensitive		
<i>Rhynchospora capillacea</i>	Slender beak-rush	G4	S1		May Be At Risk		
<i>Ribes laxiflorum</i>	Mountain currant	G5	S2		May Be At Risk		
<i>Romanzoffia sitchensis</i>	Sitka romanzoffia	G4	S2		Sensitive		
<i>Rorippa curvipes var truncata</i>	Blunt-leaved yellow cress	G5	S1S2		May Be At Risk		
<i>Rorippa sinuata</i>	Spreading yellow cress	G5	S1		May Be At Risk		
<i>Rorippa tenerrima</i>	Slender cress	G5	S1S2		May Be At Risk		
<i>Rubus x paracaulis</i>	Hybrid dwarf raspberry	GNA	S1				
<i>Rumex paucifolius</i>	Alpine sheep sorrel	G5	S1		Sensitive		
<i>Ruppia cirrhosa</i>	Widgeon-grass	G5	S1S2		Sensitive		
<i>Sagina nodosa</i>		G5	S1		May Be At Risk		
<i>Sagittaria latifolia</i>	Broad-leaved arrowhead	G5	S1		May Be At Risk		
<i>Salix alaxensis var alaxensis</i>	Alaska willow	G5T4T5	S2		Sensitive		
<i>Salix commutata</i>	Changeable willow	G5	S2		Sensitive		
<i>Salix lanata ssp calcicola</i>	Woolly willow	G4T4	S1		May Be At Risk		
<i>Salix raupii</i>	Raup's willow	G2	S1		May Be At Risk		
<i>Salix sitchensis</i>	Sitka willow	G5	S1		May Be At Risk		
<i>Salix stolonifera</i>	Willow	G4G5	S1		May Be At Risk		

VASCULAR PLANTS (continued)

SCIENTIFIC NAME	COMMON NAME	G RANK	S RANK	WILDLIFE ACT STATUS	AB. WILDLIFE SPECIES '05	COSEWIC STATUS	SARA STATUS
<i>Salix tyrellii</i>	Tyrrell's willow	G5T2	S1				
<i>Sarracenia purpurea</i>	Pitcher-plant	G5	S2		Sensitive		
<i>Saussurea americana</i>	American saw-wort	G5	S1		May Be At Risk		
<i>Saxifraga ferruginea</i>		G5	S2		Sensitive		
<i>Saxifraga flagellaris ssp setigera</i>	Spiderplant	G5T3T5	S2		May Be At Risk		
<i>Saxifraga nivalis</i>	Alpine saxifrage	G4G5	S2		Sensitive		
<i>Saxifraga odontoloma</i>		G5	S1		May Be At Risk		
<i>Schoenoplectus heterochaetus</i>	Slender bulrush	G5	S1		Undetermined		
<i>Scirpus pallidus</i>	Pale bulrush	G5	S1		May Be At Risk		
<i>Sedum divergens</i>	Spreading stonecrop	G5?	S2		Sensitive		
<i>Selaginella wallacei</i>	Wallace's little club-moss	G5	S1		Sensitive		
<i>Shinnersoseris rostrata</i>	Annual skeletonweed	G5?	S2		May Be At Risk		
<i>Silene antirrhina</i>	Sleepy catchfly	G5	S1		May Be At Risk		
<i>Silene involucrata</i>	Alpine bladder catchfly	G5	S1S2		May Be At Risk		
<i>Sisyrinchium septentrionale</i>	Pale blue-eyed grass	G3G4	S2S3		Sensitive		
<i>Sparganium fluctuans</i>		G5	S1		May Be At Risk		
<i>Sparganium glomeratum</i>		G4?	S1		May Be At Risk		
<i>Sparganium hyperboreum</i>	Northern bur-reed	G5	S1		Sensitive		
<i>Spartina pectinata</i>	Prairie cord grass	G5	S1		May Be At Risk		
<i>Spergularia salina</i>	Salt-marsh sand spurry	G5	S2		May Be At Risk		
<i>Sphenopholis obtusata</i>	Prairie wedge grass	G5	S2		May Be At Risk		
<i>Spiraea splendens</i>	Pink meadowsweet	G5	S1		May Be At Risk		
<i>Spiranthes lacera</i>	Northern slender ladies'-tresses	G5	S1		May Be At Risk		
<i>Stellaria americana</i>	American chickweed	G3G4	S1		May Be At Risk		
<i>Stellaria arenicola</i>	Sand-dune chickweed	G5T3	S1		Not At Risk		

Appendix 3

VASCULAR PLANTS (continued)

SCIENTIFIC NAME	COMMON NAME	G RANK	S RANK	WILDLIFE ACT STATUS	AB. WILDLIFE SPECIES '05	COSEWIC STATUS	SARA STATUS
<i>Stellaria crispa</i>	Wavy-leaved chickweed	G5	S2		May Be At Risk		
<i>Stellaria obtusa</i>		G5	S1		May Be At Risk		
<i>Stellaria umbellata</i>		G5	S1		May Be At Risk		
<i>Streptopus roseus</i>	Rose mandarin	G5	S1		May Be At Risk		
<i>Streptopus streptopoides</i>	Twisted-stalk	G5	S1		May Be At Risk		
<i>Suaeda moquinii</i>	Moquin's sea-blite	G5	S2		Sensitive		
<i>Suckleya suckleyana</i>	Poison suckleya	G5	S1S2		May Be At Risk		
<i>Suksdorfia ranunculifolia</i>	Suksdorfia	G5	S2		Sensitive		
<i>Suksdorfia violacea</i>	Blue suksdorfia	G4	S1		Sensitive		
<i>Tanacetum bipinnatum ssp huronense</i>	Indian tansy	G5T4T5	S2		May Be At Risk		
<i>Taxus brevifolia</i>	Western yew	G4G5	S1		Sensitive		
<i>Tellima grandiflora</i>	Fringe-cups	G5	S1		May Be At Risk		
<i>Thelesperma subnudum var marginatum</i>	Greenthread	G5T5	S1		May Be At Risk		
<i>Thuja plicata</i>	Western red cedar	G5	S1S2		May Be At Risk		
<i>Torreyochloa pallida var pauciflora</i>	Few-flowered salt-meadow grass	G5T5	S1				
<i>Townsendia condensata</i>	Alpine townsendia	G4	S2		May Be At Risk		
<i>Townsendia exscapa</i>	Low townsendia	G5	S2		May Be At Risk		
<i>Tradescantia occidentalis</i>	Western spiderwort	G5	S1	Endangered	At Risk	Threatened	Threatened
<i>Triantha occidentalis ssp brevistyla</i>	Western false-asphodel	G5T4	S1		Sensitive		
<i>Triantha occidentalis ssp montana</i>	Western false-asphodel	G5T4T5	S1		Sensitive		
<i>Trichophorum clintonii</i>	Clinton's bulrush	G4	S1		May Be At Risk		
<i>Trichophorum pumilum</i>	Dwarf bulrush	G5	S2		Sensitive		

VASCULAR PLANTS (continued)

SCIENTIFIC NAME	COMMON NAME	G RANK	S RANK	WILDLIFE ACT STATUS	AB. WILDLIFE SPECIES '05	COSEWIC STATUS	SARA STATUS
<i>Trillium ovatum</i>	Western wakerobin	G5	S1		May Be At Risk		
<i>Tripteroxyx micranthus</i>	Sand verbena	G5	S1S2	Threatened	At Risk	Endangered	Endangered
<i>Trisetum cernuum</i>	Nodding trisetum	G5	S2				
<i>Trisetum cernuum var canescens</i>	Tall trisetum	G5TNR	S2		May Be At Risk		
<i>Trisetum montanum</i>	Mountain trisetum	G4G5	S1				
<i>Trisetum wolfii</i>	Awnless trisetum	G4	S1		May Be At Risk		
<i>Tsuga heterophylla</i>	Western hemlock	G5	S1		Sensitive		
<i>Utricularia cornuta</i>	Horned bladderwort	G5	S1		May Be At Risk		
<i>Vaccinium ovalifolium</i>	Oval-leaved blueberry	G5	S2		Sensitive		
<i>Veronica catenata</i>	Water speedwell	G5	S2S3		May Be At Risk		
<i>Viola pallens</i>	Macloskey's violet	G5T5	S2				
<i>Viola pedatifida</i>	Crowfoot violet	G5	S2		May Be At Risk		
<i>Viola praemorsa ssp linguifolia</i>		G5T5	S2		May Be At Risk		
<i>Wolffia columbiana</i>	Watermeal	G5	S2		Sensitive		
<i>Woodsia glabella</i>	Smooth woodsia	G5	S1		May Be At Risk		
<i>Yucca glauca</i>	Soapweed	G5	S1	Endangered	At Risk	Threatened	Threatened
<i>Abies bifolia - Pinus albicaulis - Picea engelmannii / Empetrum nigrum</i>	Subalpine fir - whitebark pine - Engelmann spruce / crowberry		S2				
<i>Abies bifolia - Pinus flexilis - Populus tremuloides / Thalictrum venulosum</i>	Subalpine fir - limber pine - aspen / veiny meadow rue		S2?				
<i>Acer negundo / Prunus virginiana</i>	Manitoba maple / choke cherry		S1S2				
<i>Amelanchier alnifolia / Arctostaphylos uva-ursi / Oryzopsis pungens</i>	Saskatoon / common bearberry / northern rice grass		S2S3				

VEGETATION COMMUNITIES

Appendix 3

VEGETATION COMMUNITIES (continued)

SCIENTIFIC NAME	COMMON NAME	G RANK	S RANK	WILDLIFE ACT STATUS	AB. WILDLIFE SPECIES '05	COSEWIC STATUS	SARA STATUS
<i>Andromeda polifolia</i> / <i>Sarracenia purpurea</i> / <i>Sphagnum angustifolium</i>	Bog rosemary / pitcher-plant / peat moss			S1S2			
<i>Artemisia cana</i> / <i>Festuca campestris</i> - <i>Stipa curtiseta</i>	Silver sagebrush / mountain rough fescue - western porcupine grass			S1?			
<i>Artemisia longifolia</i> - <i>Chrysothamnus nauseosus</i>	Long-leaved sagewort - rabbitbrush			S1			
<i>Artemisia norvegica</i> - <i>Mertensia paniculata</i> - <i>Leymus innovatus</i>	Mountain sagewort - tall lungwort - hairy wild rye			S1			
<i>Artemisia tridentata</i> ssp. <i>vaseyana</i> - <i>Amelanchier alnifolia</i>	Big sagebrush - saskatoon			S1			
<i>Artemisia tridentata</i> ssp. <i>vaseyana</i> - <i>Rhamnus alnifolia</i>	Big sagebrush - alder-leaved buckthorn			S1			
<i>Atriplex subspicata</i> - <i>Puccinellia nuttalliana</i> - <i>Triglochin palustris</i> string fen	Spearscale saltbrush - Nuttall's salt-meadow grass - slender arrow grass string fen			S1S3			
<i>Betula glandulosa</i> / <i>Festuca campestris</i>	Bog birch / mountain rough fescue			S2S3			
<i>Betula neoalaskana</i> / <i>Ledum groenlandicum</i>	Alaska birch / common Labrador tea			S1S2			
<i>Betula papyrifera</i> - <i>Betula occidentalis</i> / <i>Arctostaphylos uva-ursi</i>	White birch - water birch / common bearberry			S1			

VEGETATION COMMUNITIES (continued)

SCIENTIFIC NAME	COMMON NAME	G RANK	S RANK	WILDLIFE ACT STATUS	AB. WILDLIFE SPECIES '05	COSEWIC STATUS	SARA STATUS
<i>Calamovilfa longifolia</i> - <i>Sporobolus cryptandrus</i>	Sand grass - sand dropseed			S2S3			
<i>Carex limosa</i> - <i>Menyanthes trifoliata</i> - <i>Cardamine pratensis</i>	Mud sedge - buck-bean - meadow bitter cress			S1S2			
<i>Carex limosa</i> - <i>Scheuchzeria palustris</i> / <i>Sphagnum teres</i> - <i>S. subsecundum</i>	Mud sedge - scheuchzeria / thin-leaved peat moss			S1			
<i>Carex limosa</i> / <i>Sphagnum jensenii</i>	Mud sedge / pendant branch peat moss			S1			
<i>Carex oligosperma</i> / <i>Sphagnum subsecundum</i>	Few-fruited sedge / twisted bog moss			S1S2			
<i>Carex pseudocyperus</i> - <i>Calla palustris</i>	Cyperus-like sedge - water arum			S1S2			
<i>Carex rostrata</i> marsh	Beaked sedge marsh			S2			
<i>Chamaedaphne calyculata</i> - <i>Kalmia polifolia</i> / <i>Cladina mitis</i>	Leatherleaf - northern laurel / green reindeer lichen			S1S2			
<i>Crataegus rotundifolia</i> / <i>Heracleum lanatum</i> - <i>Urtica dioica</i> - <i>Viola canadensis</i>	Round-leaved hawthorn / cow parsnip - common nettle - western Canada violet			S1S2			
<i>Danthonia californica</i> - <i>Carex brevior</i>	California oat grass - slender-beaked sedge			S2			
<i>Distichlis stricta</i> - <i>Pascopyrum smithii</i>	Salt grass - western wheat grass			S2			
<i>Eleocharis quinqueflora</i> community	Few-flowered spike-rush community			S1S2			

Appendix 3

VEGETATION COMMUNITIES (continued)

SCIENTIFIC NAME	COMMON NAME	G RANK	S RANK	WILDLIFE ACT STATUS	AB. WILDLIFE SPECIES '05	COSEWIC STATUS	SARA STATUS
<i>Elymus lanceolatus</i> - <i>Antennaria parvifolia</i>	Northern wheat grass - small-leaved everlasting		S1				
<i>Elymus lanceolatus</i> - <i>Artemisia dracunculus</i> - <i>Artemisia frigida</i>	Northern wheat grass - dragonwort - pasture sagewort		S1				
<i>Elymus lanceolatus</i> - <i>Elymus trachycaulus</i>	Northern wheat grass - slender wheat grass		S1				
<i>Elymus lanceolatus</i> - <i>Stipa comata</i>	Northern wheat grass - needle-and-thread		S2				
<i>Festuca altaica</i> - <i>Deschampsia caespitosa</i>	Northern rough fescue - tufted hair grass		S1				
<i>Festuca altaica</i> - <i>Leymus innovatus</i>	Northern rough fescue - hairy wild rye		S1				
<i>Festuca campestris</i> - <i>Deschampsia caespitosa</i>	Mountain rough fescue - tufted hair grass		S1				
<i>Festuca campestris</i> - <i>Leymus innovatus</i>	Mountain rough fescue - hairy wild rye		S2S3				
<i>Festuca hallii</i> - <i>Calamovilfa longifolia</i>	Plains rough fescue - sand grass		S1				
<i>Festuca hallii</i> - <i>Koeleria macrantha</i> / <i>Juniperus horizontalis</i> / forbs	Plains rough fescue - June grass / juniper / forbs		S2				
<i>Festuca hallii</i> grassland	Plains rough fescue grassland		S1				
<i>Glyceria borealis</i> - <i>Sium suave</i> - <i>Sparganium angustifolium</i>	Northern manna grass - water parsnip - narrow leaved bur-reed		S1?				
<i>Isoetes bolanderi</i> aquatic community	Bolander's quillwort aquatic community		S1				

VEGETATION COMMUNITIES (continued)

SCIENTIFIC NAME	COMMON NAME	G RANK	S RANK	WILDLIFE ACT STATUS	AB. WILDLIFE SPECIES '05	COSEWIC STATUS	SARA STATUS
<i>Isoetes echinospora</i> <i>aquatic community</i>	Northern quillwort aquatic community		S1				
<i>Juncus filiformis</i> / <i>Sphagnum spp.</i>	Thread rush / peat moss		S1S2				
<i>Juniperus horizontalis</i> / <i>Koeleria macrantha</i> / <i>Cladina mitis</i>	Creeping juniper / (June grass) / green reindeer lichen		S1S2				
<i>Juniperus horizontalis</i> / <i>Carex pensylvanica</i> - <i>Eriogonum flavum</i>	Creeping juniper / sun-loving sedge - yellow umbrella-plant		S1S2				
<i>Koeleria macrantha</i> - <i>Artemisia frigida</i> - <i>Linum lewisii</i>	June grass - pasture sagewort - wild blue flax		S2S3				
<i>Larix occidentalis</i> / <i>Rubus parviflorus</i>	Western larch / thimbleberry		S1				
<i>Leymus mollis</i> - <i>Tanacetum bipinnatum</i> <i>ssp. huronense</i> shoreline dune	American dune grass - Indian tansy shoreline dune		S1				
<i>Muhlenbergia asperifolia</i> - <i>Scirpus nevadensis</i> - <i>Distichlis stricta</i>	Scratch grass - Nevada bulrush - salt grass		S1S2				
<i>Pascopyrum smithii</i> - <i>Artemisia ludoviciana</i>	Western wheat grass - prairie sagewort		S1S2				
<i>Pascopyrum smithii</i> - <i>Atriplex nuttallii</i>	Western wheat grass - atriplex		S1				
<i>Pascopyrum smithii</i> - <i>Pyrrocoma uniflora</i>	Western wheat grass - one-flowered ironplant		S1				
<i>Picea engelmannii</i> / <i>Salix vestita</i>	Engelmann spruce / rock willow		S2?				

Appendix 3

VEGETATION COMMUNITIES (continued)

SCIENTIFIC NAME	COMMON NAME	G RANK	S RANK	WILDLIFE ACT STATUS	AB. WILDLIFE SPECIES '05	COSEWIC STATUS	SARA STATUS
<i>Picea glauca / Abietinella abietina</i>	White spruce / fern moss		S2S3				
<i>Picea glauca / Betula pumila - Salix bebbiana / Carex eburnea</i>	White spruce / dwarf birch - beaked willow / bristle-leaved sedge		S1?				
<i>Picea glauca / Cetraria islandica</i>	White spruce / lichen		S1?				
<i>Picea glauca / Rosa acicularis / Abietinella abietina</i>	White spruce / prickly rose / fern moss		S1				
<i>Picea mariana / Cladina stellaris</i>	Black spruce / star-tipped reindeer lichen		S1				
<i>Pinus albicaulis - Pinus contorta / Juniperus communis - Leymus innovatus - Linnaea borealis</i>	Whitebark pine - lodgepole pine / ground juniper - hairy wild rye - twinflower		S2S3				
<i>Pinus albicaulis / Juniperus communis - Arctostaphylos uva ursi</i>	Whitebark pine / ground juniper - common bearberry		S2S3				
<i>Pinus flexilis / Arctostaphylos uva ursi - Juniperus horizontalis</i>	Limber pine / common bearberry - creeping juniper		S2S3				
<i>Pinus flexilis scree woodland</i>	Limber pine scree woodland		S1S2				
<i>Populus balsamifera - P. tremuloides / Alopocurus alpinus - Calamagrostis canadensis</i>	Balsam poplar - aspen / alpine foxtail - bluejoint		S1S2				
<i>Populus balsamifera / Rhamnus alnifolia / Equisetum arvense</i>	Balsam poplar / alder-leaved buckthorn		S1				

VEGETATION COMMUNITIES (continued)

SCIENTIFIC NAME	COMMON NAME	G RANK	S RANK	WILDLIFE ACT STATUS	AB. WILDLIFE SPECIES '05	COSEWIC STATUS	SARA STATUS
<i>Populus balsamifera / Viburnum opulus / Matteuccia struthiopteris</i>	Balsam poplar / high-bush cranberry / ostrich fern		S1S2				
<i>Populus deltoides / Glycyrrhiza lepidota - Juncus balticus</i>	Plains cottonwood / wild licorice - wire rush		S2S3				
<i>Populus deltoides / Symphoricarpos occidentalis</i>	Plains cottonwood / buckbrush		S2S3				
<i>Populus tremuloides / Juniperus horizontalis / Carex siccata</i>	Aspen / creeping juniper / hay sedge		S2S3				
<i>Populus tremuloides / Leymus innovatus - Aster conspicuus avalanche community</i>	Aspen / hairy wild rye - showy aster avalanche community		S2				
<i>Populus tremuloides / Rubus parviflorus</i>	Aspen / thimbleberry		S2				
<i>Populus tremuloides / Rubus parviflorus / Aralia nudicaulis</i>	Aspen / thimbleberry / wild sarsaparilla		S2S3				
<i>Pseudotsuga menziesii - Pinus flexilis / Juniperus communis / Festuca campestris</i>	Douglas-fir - limber pine / ground juniper / mountain rough fescue		S2S3				
<i>Puccinellia nuttalliana - Suaeda calceoliformis - Spargularia marina barren</i>	Nuttall's salt-meadow grass - western seablite - salt-marsh sand spurry barren		S2				
<i>Rumex venosus sand dune community</i>	Wild begonia sand dune community		S2S3				
<i>Salicornia rubra emergent marsh</i>	Samphire emergent marsh		S2				

Appendix 3

VEGETATION COMMUNITIES (continued)

SCIENTIFIC NAME	COMMON NAME	G RANK	S RANK	WILDLIFE ACT STATUS	AB. WILDLIFE SPECIES '05	COSEWIC STATUS	SARA STATUS
<i>Salix drummondiana</i> / <i>Calamagrostis canadensis</i>	Drummond's willow / bluejoint		S1				
<i>Salix drummondiana</i> / <i>Scirpus microcarpus</i> - <i>Calamagrostis canadensis</i>	Drummond's willow / small-fruited bulrush - bluejoint		S1				
<i>Salix drummondiana</i> / <i>Thalictrum venulosum</i>	Drummond's willow / veiny meadow rue		S1				
<i>Sarcobatus vermiculatus</i> silt dune shrubland	Greasewood silt dune shrubland		S1				
<i>Schizachyrium scoparium</i> - <i>Festuca campestris</i>	Little bluestem - mountain rough fescue		S1?				
<i>Scirpus nevadensis</i> - (<i>Triglochin maritima</i>)	Nevada bulrush - (seaside arrow-grass)		S2S3				
<i>Spartina gracilis</i> - (<i>Pascopyrum smithii</i>)	Alkali cord grass - (western wheat grass)		S2S3				
<i>Stipa curtiseta</i> - <i>S. viridula</i> - <i>Carex spp.</i>	Western porcupine grass - green needle grass - sedges		S2S3				
<i>Stipa richardsonii</i> - <i>Koeleria macrantha</i> - <i>Antennaria parvifolia</i>	Richardson needlegrass - June grass - small-leaved everlasting		S2S3				
<i>Triglochin maritima</i> emergent marsh	Seaside arrow-grass emergent marsh		S2?				

Priority Landforms

SITE NAME	GEOMORPHOLOGY	SUBELEMENT	SIGNIFICANCE
Abraham Lake Area	Flatirons		Provincial
Aden Area	Dikes		Provincial
Airdrie Area	Murdllins		Provincial
Algar Lake	Wooded Bogs with Internal Lawns	Flat Bogs	Provincial
Algar River Sand Hills	Dunes	Transverse Dunes	Provincial
Athabasca Town Area	Flutings	Giant Flutings	Provincial
Audet Lake Area	Patterned Fens	Northern Ribbed Fens	Provincial
Barnaby Ridge Area	Patterned Ground		National
Beaver Mines Area	Valleys	V-Shaped Valleys	Provincial
Beaver Mines Area	Volcanic Rocks		Provincial
Bindloss Area	Salt Depositing Springs		Provincial
Birch Mountains	Non-Patterned Fens with Internal Lawns	Horizontal Fens	Provincial
Birch Mountains	Wooded Bogs without Internal Lawns	Northern Plateau Bogs	Provincial
Bistcho Lake Area	Peat Plateaux		Provincial
Bourque Lake	Glacial Tunnel Lakes		Provincial
Bow Island Area	Megablocks		Provincial
Boyle Area	Glacial Tunnel Lakes		Provincial
Brazeau Reservoir Area	Braided Streams		Provincial
Buffalo Lake Area	Moraine Plateaux		National
Cache Creek Sand Hills	Dunes	Transverse Dunes	Provincial
Cadomin Area	Karst Caves	Joint Caves	National
Calahoo Creek-Wapiti River Area	Warm Springs		Provincial
Cameron Hills	Flutings	Giant Flutings	National
Canmore Area	Hoodoos		Provincial
Canmore Area	Kames	Kame Terraces	Provincial
Canmore Area	Rock-Shelters		Provincial
Canmore Area	Speleothems		Provincial
Cardinal/Brazeau Confluence Area	Eskers		Provincial
Caribou Mountains	Veneer Bogs		Provincial
Chappice Lake	Drift Basins	Saline/Alkaline Lakes	Provincial
Charles Lake	Tectonic Lake Basins	Fault Lakes	Provincial
Chelsea Creek Area	Flutings		National
Cherry Point Area	Earth Flows		Provincial
Clear Hills	Iron Depositing Springs		National

Appendix 4

SITE NAME	GEOMORPHOLOGY	SUBELEMENT	SIGNIFICANCE
Coal Lake	Glacial Tunnel Lakes		Provincial
Coal Lake Area	Meltwater Channels	Subglacial Channels	Provincial
Cold Lake	Ice Scour Lakes		Provincial
Cold Lake Area	Baymouth Bars		Provincial
Coleman Area	Volcanic Rocks		Provincial
Comrey Area	Honeycomb Weathering		National
Cooking Lake Area	Megablocks		Provincial
Crowsnest Lake Area	Karst Springs		National
Crowsnest Mountain	Klippe		Provincial
Crowsnest Pass	Flatirons		Provincial
Cypress Hills Area	Ventifacts		National
Davey Lake Area	Murdins		Provincial
Del Bonita Area	Asymmetric Valleys		National
Drumheller Area	Badlands		Provincial
Drywood Mountain Area	Hanging Valleys		National
Eagle Butte	Impact Structures		Provincial
Edgerton Landslides	Rock Slides		Provincial
Edgerton Sand Hills	Dune Ridges	North Battleford Ridges	Provincial
Elk Lake Area	Non-Patterned Fens with Internal Lawns	Horizontal Fens	Provincial
Empress Area	River Terraces		National
Evansburg Area	Gorges/Canyons		Provincial
Fairview Area	Marl Lakes		Provincial
Fitzgerald Area	Rapids		National
Fort Assiniboine Sand Hills	Dunes	Transverse Dunes	Provincial
Fort Chipewyan Area	Deltas	Stable Channel-mouth Bar Deltas	Provincial
Fort Chipewyan Area	Raised Beaches		Provincial
Fort Chipewyan Area	Shoreline Cliffs		Provincial
Fort Chipewyan Area	Spits		Provincial
Fort Fitzgerald Area	River Islands	Bedrock Islands	Provincial
Fort Hills Area	Kames	Kame Deltas	Provincial
Fort MacKay	River Meanders	Incised Meanders	Provincial
Fort MacKay Area	Dolines	Collapse	Provincial
Fort MacKay Area	River Meanders	Incised Meanders	Provincial
Fort McMurray Area	Patterned Fens	Spring Fens	Provincial
Fort Saskatchewan Area	Soapholes		Provincial
Fort Vermilion Sand Hills	Dunes	Transverse Dunes	National
Fox Creek Area	Marl Bogs		Provincial

SITE NAME	GEOMORPHOLOGY	SUBELEMENT	SIGNIFICANCE
Ghost River Area	Klippes		Provincial
Ghost River-Waiparous Creek	Braided Streams		Provincial
Glenwood Area	Erratics		Provincial
Grand Rapids Area	Rapids		Provincial
Grande Cache Area	Hogbacks		Provincial
Grande Cache area	Water Gaps		Provincial
Grande Prairie Area	Dunes	Parabolic Dunes	Provincial
Granum Area	Murdlines		Provincial
Guy Area	Rock Slides		Provincial
Hawk Hills Area	Non-Patterned Fens without Internal Lawns	Slope Fens	Provincial
Hay Lake Area	Thermokarst Lakes		Provincial
Hay River-Chinchaga River Area	River Meanders	Incised Meanders	Provincial
Heatherdown Area	Patterned Fens	Spring Fens	Provincial
Horseshoe Lake	Drift Basins	Saline/Alkaline Lakes	Provincial
Iddesleigh Area	Playa Lakes		Provincial
Indian Cabins Area	Peat Plateaux		Provincial
Island Lake	Drift Basins	Holm Lakes	Provincial
Kananaskis Country	Anticlinal Mountains		Provincial
Kananaskis Country	Karst Caves	Joint Caves	Provincial
Kananaskis Country	Rockglaciers		Provincial
Keho Lake Area	Flutings	Giant Flutings	Provincial
Kinsella Area	Meltwater Channels	Ice-walled Channels	Provincial
Kipp Area	Megablocks		National
Lac des Arcs	Fluviatile Lakes	Alluvial Fan Dammed Lakes	Provincial
Lac Magloire Area	Moraine	Rogen Moraine	Provincial
Lake Athabasca Area	Dunes	Parabolic Dunes	National
Lake Athabasca Area	Beaches		Provincial
Landslide Lake Area	Landslide Lakes		Provincial
Leduc Area	Glacial Tunnel Lakes		Provincial
Leland Lakes Area	Plutons		Provincial
Lesser Slave Lake Area	Aeolian Beach Ridges		Provincial
Lesser Slave Lake Area	Non-Patterned Fens without Internal Lawns	Horizontal Fens	Provincial
Lethbridge Area	Aligned Coulees		Provincial
Limestone Mountain	Rock Labyrinths		Provincial
Lloydminster Area	Crevasse Fillings		Provincial

Appendix 4

SITE NAME	GEOMORPHOLOGY	SUBELEMENT	SIGNIFICANCE
Lodgepole Area	Tufa Depositing Springs		Provincial
Lonepine Creek Area	Eskers		Provincial
Lost River Area	Drumlins		Provincial
Lower Sweetgrass Hills	Dikes		National
Lundbreck Area	Hogbacks		Provincial
Lundbreck Area	River Terraces	Rock-cut Terraces	Provincial
Lutose Creek Area	Burning Gas		Provincial
Ma Butte Area	Volcanic Rocks		Provincial
Mackay River Area	Palsa Bogs		Provincial
Manning Area	Bar-and-Swale Topography		Provincial
Manning Area	Fluviatile Lakes	Oxbow Lakes	Provincial
Many Island Lake	Dunes	Silt/Clay Dunes	Provincial
Manyberries Area	Sandstone Dikes		National
Marguerite River Wildland	Eskers		Provincial
Marguerite River Wildland	Kames	Kame Moraines	Provincial
Mariana Lake Area	Wooded Bogs with Internal Lawns	Northern Plateau Bogs	Provincial
Marlboro Area	Marl Bogs		Provincial
Marten Mountain Area	Patterned Fens	Northern Ribbed Fens	Provincial
McClelland Lake Area	Dolines	Collapse	Provincial
McLennan Area	Non-Patterned Fens without Internal Lawns	Slope Fens	Provincial
Medicine Hat Area	Neck Cutoffs		National
Medicine Hat Area	Earth Slides		Provincial
Medicine Hat Area	Gorges/Canyons		Provincial
Middle Sand Hills	Dunes	Parabolic Dunes	National
Milk River	Underfit Streams		Provincial
Milk River Area	Dikes		Provincial
Mokowan Butte	Erosional Remnants		National
Monarch Area	Reverse Faults		Provincial
Monitor Area	Hill-hole Pairs		Provincial
Montagneuse River	Earth Slides		National
Moose Point Area	Moraine	de Geer Moraine	Provincial
Morley Flats Area	Drumlins		Provincial
Muddy River Area	Burning Sulphur		Provincial
Mudspring Lake Area	Soapholes		Provincial
Muriel Lake Area	Hill-hole Pairs		Provincial

SITE NAME	GEOMORPHOLOGY	SUBELEMENT	SIGNIFICANCE
Muskeg Mountain	Non-Patterned Fens without Internal Lawns	Channel Fens	Provincial
Muskeg River Area	Wooded Bogs with Internal Lawns	Northern Plateau Bogs	Provincial
Neutral Hills Area	Hill-hole Pairs		Provincial
Newman Peak Area	Volcanic Rocks		Provincial
Nordegg Area	Karst Caves	Bedding Caves	Provincial
Nordegg Area	Non-Patterned Fens without Internal Lawns	Spring Fens	Provincial
Nordegg Area	Tufa Depositing Springs		Provincial
Obed Creek-Athabasca River Area	Kames	Moulin Kames	Provincial
Okotoks Area	Erratics		International
Oliva Lake	Drift Basins	Saline/Alkaline Lakes	Provincial
Onefour Area	Eskers		National
Onefour Area	Rock-Shelters		National
Pakan Area	Iron Depositing Springs		Provincial
Pakowki Lake	Playa Lakes		National
Pakowki Lake Area	Dikes		Provincial
Pakowki Lake Sand Hills	Blowouts		National
Parkland Area	Moraine	de Geer Moraine	Provincial
Peace River Town	Debris Slides		Provincial
Pekisko Area	Crag-and-Tail		Provincial
Pelican Lake Area	Wooded Bogs with Internal Lawns	Northern Plateau Bogs	Provincial
Pinhorn Area	Badlands		National
Pinhorn Area	Neck Cutoffs		National
Pinhorn Area	Stocks		National
Pinto Lake Area	Paternoster Lakes		Provincial
Pinto Lake Area	Speleothems		Provincial
Plateau Mountain Area	Limestone Pavement		Provincial
Porcupine Hills	Kames	Kame Terraces	Provincial
Porcupine Hills	Meltwater Channels	Subglacial Channels	Provincial
Ram Falls Area	Waterfalls		Provincial
Redrock Creek-Kakwa River Area	Gorges/Canyons		Provincial
Reflex Lake	Salt Depositing Springs		National
Rocky Mountain House Area	Non-Patterned Fens without Internal Lawns	Spring Fens	Provincial
Rosebud Creek Area	Murdocks		Provincial

Appendix 4

SITE NAME	GEOMORPHOLOGY	SUBELEMENT	SIGNIFICANCE
Round Hill Area	Ice-Thrust Ridges		Provincial
Rumsey Area	Moraine Plateaux		Provincial
Rycroft Area	Earth Slides		Provincial
Shunda Area	Water Gaps		National
St. Agnes Lake Area	Crag-and-Tail		Provincial
St. Agnes Lake Area	Wooded Bogs with Internal Lawns	Basin Bogs	Provincial
St. Albert Area	Deltas	Stable Channel-mouth Bar Deltas	Provincial
St. Mary Dam Area	River Meanders	Incised Meanders	Provincial
St. Mary River-Pothole Creek Area	Neck Cutoffs		Provincial
Stinking Creek-South Torren River	Warm Springs		Provincial
Stirling Lake Area	Kettles		Provincial
Sundance Lake Area	Hoodoos		Provincial
Swan Hills	Wooded Bogs without Internal Lawns	Northern Plateau Bogs	Provincial
Swinnerton Lake Area	Fault-line Scarps		Provincial
Taber Area	Megablocks		Provincial
Tawatinaw Valley-Athabasca River Area	Meltwater Channels	Subglacial Channels	Provincial
Thickwood Hills	Patterned Fens	Northern Ribbed Fens	Provincial
Thistle Creek-Brazeau River Area	Blue-hole Springs		Provincial
Thunder Mountain Area	Water Gaps		Provincial
Tomahawk Area	Wooded Bogs without Internal Lawns	Flat Bogs	Provincial
Town of Milk River Area	Overflow Channels		National
Turtle Mountain Area	Rock Falls		National
Valleyview Area	Wooded Bogs without Internal Lawns	Flat Bogs	Provincial
Vermilion Chutes Area	Rapids		Provincial
Vermillion Area	Ice-Thrust Moraine		Provincial
Wainwright Area	Dune Ridges	North Battleford Ridges	Provincial
Wallace Creek-Firebag River Area	Kames	Moulin Kames	Provincial
Wandering River Area	Non-Patterned Fens without Internal Lawns	Horizontal Fens	Provincial
Wappau Lake	Patterned Fens	Net Fens	Provincial
Wardlow Area	Alluvial Fans	Coalescing Fans	Provincial

SITE NAME	GEOMORPHOLOGY	SUBELEMENT	SIGNIFICANCE
Water Valley Area	Braided Streams		Provincial
West Castle Mountain	Mountains	Castellated Mountains	Provincial
Westlock Area	Neck Cutoffs		Provincial
Whaleback Ridge	Hogbacks		National
Whisky Gap Area	Erosional Remnants		National
Whitefish Lake Area	Ice-Thrust Moraine		Provincial
Whitemud Creek Area	Kames	Moulin Kames	Provincial
Whitemud Falls Area	Moraine	Rogen Moraine	Provincial
Whitemud Falls Area	Stacks		Provincial
Wolf Lake Area	Hill-hole Pairs		Provincial
Wolverine River Sand Hills	Dune Ridges	Lacadena Ridges	Provincial
Writing-On-Stone Area	Honeycomb Weathering		Provincial
Ya Ha Tinda Area	Rock Labyrinths		Provincial
Zama City Area	Patterned Fens	Net Fens	Provincial
Zama Lakes Area	Levee Dammed Lakes		Provincial

Focal Species

SCIENTIFIC NAME	COMMON NAME	G RANK	S RANK	WILDLIFE ACT STATUS	AB. WILDLIFE SPECIES '05	COSEWIC STATUS	SARA STATUS
<i>Athene cunicularia hypugaea</i>	Western burrowing owl		S2	Endangered	At Risk	Endangered	Endangered
<i>Buteo regalis</i>	Ferruginous hawk	G4	S3	Endangered	At Risk	Threatened	Special Concern
<i>Rangifer tarandus caribou</i>	Woodland caribou	G5T4	S1	Threatened	At Risk	Threatened	Threatened
<i>Ursus arctos</i>	Grizzly Bear (western AB population)	G4TNR	SNR	May Be at Risk	May Be at Risk	Special Concern	No Status

Sites of Recognized Significance

NAME OF SITE	SOURCE	SIGNIFICANCE
Athabasca Dunes Ecological Reserve	Alberta Parks, Tourism and Recreation	Provincial
Banff World Heritage Site	Unesco	International
Bearhills Lake Important Bird Area	Important Bird Areas	Global
Beauvais Lake Provincial Park	Alberta Parks, Tourism and Recreation	Provincial
Beaverhill Lake Heritage Rangeland Natural Area	Alberta Parks, Tourism and Recreation	Provincial
Beaverhill Lake Important Bird Area	Important Bird Areas	Global
Beaverhill Lake RAMSAR Site	Ramsar Convention on Wetlands	Global
Beehive Natural Area	Alberta Parks, Tourism and Recreation	Provincial
Bellis North Natural Area	Alberta Parks, Tourism and Recreation	Provincial
Bellshill Lake Important Bird Area	Important Bird Areas	Global
Big Lake Important Bird Area	Important Bird Areas	Global
Birch Mountains Wildland Provincial Park	Alberta Parks, Tourism and Recreation	Provincial
Black Creek Heritage Rangeland	Alberta Parks, Tourism and Recreation	Provincial
Blue Rapids Provincial Recreation Area	Alberta Parks, Tourism and Recreation	Provincial
Bluerock Wildland Provincial Park	Alberta Parks, Tourism and Recreation	Provincial
Bob Creek Wildland Provincial Park	Alberta Parks, Tourism and Recreation	Provincial
Bow Valley Provincial Recreation Area	Alberta Parks, Tourism and Recreation	Provincial
Bow Valley Wildland Provincial Park	Alberta Parks, Tourism and Recreation	Provincial
Brazeau Canyon Wildland Provincial Park	Alberta Parks, Tourism and Recreation	Provincial
Cardinal Lake Important Bird Area	Important Bird Areas	Global
Caribou Mountains Wildland Provincial Park	Alberta Parks, Tourism and Recreation	Provincial
Carson-Pegasus Provincial Park	Alberta Parks, Tourism and Recreation	Provincial
Cavendish Rail Line Important Bird Area	Important Bird Areas	National
Chain, Spiers and Farrell Lakes Important Bird Area	Important Bird Areas	Global
Chappice Lake Important Bird Area	Important Bird Areas	Global
Chinchaga Wildland Provincial Park	Alberta Parks, Tourism and Recreation	Provincial
Clearwater Christina Canadian Heritage River System	Canadian Heritage Rivers System	National
Cold Lake Provincial Park	Alberta Parks, Tourism and Recreation	Provincial
Colin-Cornwall Lakes Wildland Provincial Park	Alberta Parks, Tourism and Recreation	Provincial
Cooking Lake-Blackfoot Provincial Recreation Area	Alberta Parks, Tourism and Recreation	Provincial
Crimson Lake Provincial Park	Alberta Parks, Tourism and Recreation	Provincial
Cross Lake Provincial Park	Alberta Parks, Tourism and Recreation	Provincial
Cypress Hills Provincial Park	Alberta Parks, Tourism and Recreation	Provincial
Dillberry Lake Provincial Park	Alberta Parks, Tourism and Recreation	Provincial
Dinosaur Provincial Park	Alberta Parks, Tourism and Recreation	Provincial

Appendix 6

NAME OF SITE	SOURCE	SIGNIFICANCE
Dinosaur World Heritage Site	Unesco	International
Don Getty Wildland Provincial Park	Alberta Parks, Tourism and Recreation	Provincial
Dowling Lake Important Bird Area	Important Bird Areas	Continental
Dry Island Buffalo Jump Provincial Park	Alberta Parks, Tourism and Recreation	Provincial
Dunvegan West Wildland Provincial Park	Alberta Parks, Tourism and Recreation	Provincial
Eagle Point Provincial Park	Alberta Parks, Tourism and Recreation	Provincial
Eagle, Namaka and Stobart Lakes Important Bird Area	Important Bird Areas	Global
Elbow-Sheep Wildland Provincial Park	Alberta Parks, Tourism and Recreation	Provincial
Elk Island National Park	Parks Canada	National
Evan-Thomas Provincial Recreation Area	Alberta Parks, Tourism and Recreation	Provincial
Ewing and Erskine Lakes Important Bird Area	Important Bird Areas	Global
Fickle Lake Provincial Recreation Area	Alberta Parks, Tourism and Recreation	Provincial
Fidler-Greywillow Wildland Provincial Park	Alberta Parks, Tourism and Recreation	Provincial
Fish Creek Provincial Park	Alberta Parks, Tourism and Recreation	Provincial
Fort Assiniboine Sandhills Wildland Provincial Park	Alberta Parks, Tourism and Recreation	Provincial
Frank Lake north Important Bird Area	Important Bird Areas	Continental
Frank Lake south Important Bird Area	Important Bird Areas	Global
Ghost River Wilderness Area	Alberta Parks, Tourism and Recreation	Provincial
Gipsy Lake Wildland Provincial Park	Alberta Parks, Tourism and Recreation	Provincial
Glenbow Ranch Provincial Park	Alberta Parks, Tourism and Recreation	Provincial
Goose Mountain Ecological Reserve	Alberta Parks, Tourism and Recreation	Provincial
Gooseberry Lake Important Bird Area	Important Bird Areas	Global
Grand Rapids Wildland Provincial Park	Alberta Parks, Tourism and Recreation	Provincial
Grande Prairie Important Bird Area	Important Bird Areas	Global
Greene Valley Provincial Park	Alberta Parks, Tourism and Recreation	Provincial
Grizzly Ridge Wildland Provincial Park	Alberta Parks, Tourism and Recreation	Provincial
Hand Hills Ecological Reserve	Alberta Parks, Tourism and Recreation	Provincial
Handhills Lake Important Bird Area	Important Bird Areas	Continental
Hansman Lake Important Bird Area	Important Bird Areas	Global
Harper Creek Natural Area	Alberta Parks, Tourism and Recreation	Provincial
Hay and Zama Lakes Important Bird Area	Important Bird Areas	Global
Hays Reservoir Important Bird Area	Important Bird Areas	Global
Hay-Zama Lakes RAMSAR Site	Ramsar Convention on Wetlands	Global
Hay-Zama Lakes Wildland Provincial Park	Alberta Parks, Tourism and Recreation	Provincial
Head-Smashed-In Buffalo Jump World Heritage Site	Unesco	International

NAME OF SITE	SOURCE	SIGNIFICANCE
Head-Smashed-In Buffalo Jump World Heritage Site	Unesco	International
Hilliard's Bay Provincial Park	Alberta Parks, Tourism and Recreation	Provincial
Holmes Crossing Sandhills Ecological Reserve	Alberta Parks, Tourism and Recreation	Provincial
Hubert Lake Wildland Provincial Park	Alberta Parks, Tourism and Recreation	Provincial
Jasper World Heritage Site	Unesco	International
Kakwa Wildland Provincial Park	Alberta Parks, Tourism and Recreation	Provincial
Kennedy Coulee Ecological Reserve	Alberta Parks, Tourism and Recreation	Provincial
Killarney, Dillberry and Leane Lakes Important Bird Area	Important Bird Areas	Global
Killarney-Reflex Lakes Heritage Rangeland Natural Area	Alberta Parks, Tourism and Recreation	Provincial
Kirkpatrick and Fitzgerald Lakes Important Bird Area	Important Bird Areas	Global
Kootenay Plains Ecological Reserve	Alberta Parks, Tourism and Recreation	Provincial
La Biche River Wildland Provincial Park	Alberta Parks, Tourism and Recreation	Provincial
La Butte Creek Wildland Provincial Park	Alberta Parks, Tourism and Recreation	Provincial
Lac la Biche, Sir Winston Churchill Provincial Park Important Bird Area	Important Bird Areas	Global
Lake Newell and Kitsim Reservoir Important Bird Area	Important Bird Areas	National
Lakeland Important Bird Area	Important Bird Areas	Global
Lakeland Provincial Recreation Area	Alberta Parks, Tourism and Recreation	Provincial
Lakeland Provincial Recreation Area	Alberta Parks, Tourism and Recreation	Provincial
Lesser Slave Lake Important Bird Area	Important Bird Areas	Global
Lesser Slave Lake Provincial Park	Alberta Parks, Tourism and Recreation	Provincial
Lesser Slave Lake Wildland Provincial Park	Alberta Parks, Tourism and Recreation	Provincial
Little Fish Lake Important Bird Area	Important Bird Areas	National
Lois Hole Centennial Provincial Park	Alberta Parks, Tourism and Recreation	Provincial
Manitou Lake Important Bird Area	Important Bird Areas	Global
Marguerite River Wildland Provincial Park	Alberta Parks, Tourism and Recreation	Provincial
Maybelle River Wildland Provincial Park	Alberta Parks, Tourism and Recreation	Provincial
McGregor Lake and Travers Reservoir Important Bird Area	Important Bird Areas	National
Metiskow and Sunken Lakes Important Bird Area	Important Bird Areas	Global
Milk River Natural Area	Alberta Parks, Tourism and Recreation	Provincial
Ministik, Joseph and Oliver Lakes Important Bird Area	Important Bird Areas	Global
Miquelon Lake Important Bird Area	Important Bird Areas	Global

Appendix 6

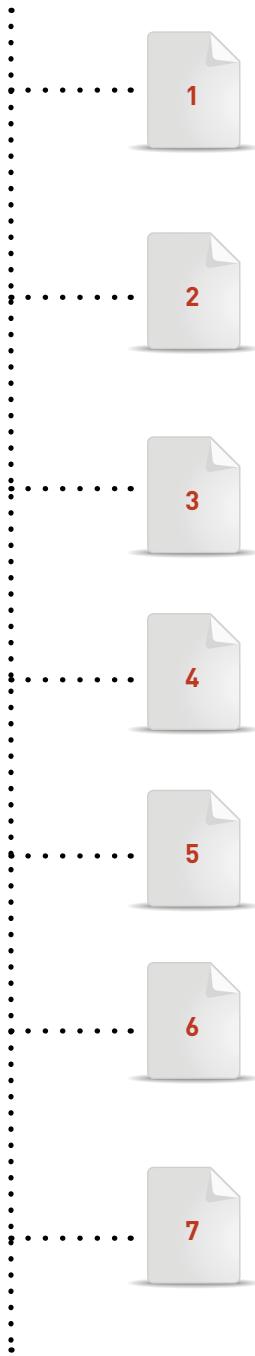
NAME OF SITE	SOURCE	SIGNIFICANCE
Miquelon Lake Provincial Park	Alberta Parks, Tourism and Recreation	Provincial
Moonshine Lake Provincial Park	Alberta Parks, Tourism and Recreation	Provincial
Muriel Lake Important Bird Area	Important Bird Areas	National
Musreau Lake Provincial Recreation Area	Alberta Parks, Tourism and Recreation	Provincial
Notikewin Provincial Park	Alberta Parks, Tourism and Recreation	Provincial
Obed Lake Provincial Park	Alberta Parks, Tourism and Recreation	Provincial
OH Ranch Heritage Rangeland	Alberta Parks, Tourism and Recreation	Provincial
Oldman Dam Provincial Recreation Area	Alberta Parks, Tourism and Recreation	Provincial
Onefour Heritage Rangeland Natural Area	Alberta Parks, Tourism and Recreation	Provincial
Otter-Orloff Lakes Wildland Provincial Park	Alberta Parks, Tourism and Recreation	Provincial
Pakowki Lake Important Bird Area	Important Bird Areas	Global
Peace River Wildland Provincial Park	Alberta Parks, Tourism and Recreation	Provincial
Peace-Athabasca Delta Important Bird Area	Important Bird Areas	Global
Peace-Athabasca Delta RAMSAR Site	Ramsar Convention on Wetlands	Global
Pelican Lake Important Bird Area	Important Bird Areas	Global
Peter Lougheed Provincial Park	Alberta Parks, Tourism and Recreation	Provincial
Pinto Creek Canyon Natural Area	Alberta Parks, Tourism and Recreation	Provincial
Plateau Mountain Ecological Reserve	Alberta Parks, Tourism and Recreation	Provincial
Poacher's Landing Provincial Recreation Area	Alberta Parks, Tourism and Recreation	Provincial
Prairie Coulees Natural Area	Alberta Parks, Tourism and Recreation	Provincial
Primrose Lake Important Bird Area	Important Bird Areas	Global
Redwater Natural Area	Alberta Parks, Tourism and Recreation	Provincial
Ribstone Creek Heritage Rangeland Natural Area	Alberta Parks, Tourism and Recreation	Provincial
Richardson River Dunes Wildland Provincial Park	Alberta Parks, Tourism and Recreation	Provincial
Rock Lake Provincial Park	Alberta Parks, Tourism and Recreation	Provincial
Rock Lake-Solomon Creek Wildland Provincial Park	Alberta Parks, Tourism and Recreation	Provincial
Ross Lake Natural Area	Alberta Parks, Tourism and Recreation	Provincial
Rumsey Natural Area	Alberta Parks, Tourism and Recreation	Provincial
Rumsey Natural Area	Alberta Parks, Tourism and Recreation	Provincial
Sand Lake Natural Area	Alberta Parks, Tourism and Recreation	Provincial
Sheep River Provincial Park	Alberta Parks, Tourism and Recreation	Provincial
Shultz Lake Important Bird Area	Important Bird Areas	Global
Siffleur Wilderness Area	Alberta Parks, Tourism and Recreation	Provincial
Silver Valley Ecological Reserve	Alberta Parks, Tourism and Recreation	Provincial
Sounding Lake Important Bird Area	Important Bird Areas	Global

NAME OF SITE	SOURCE	SIGNIFICANCE
South Saskatchewan River Important Bird Area	Important Bird Areas	Global
Spray Valley Provincial Park	Alberta Parks, Tourism and Recreation	Provincial
St. Lawrence Lake Important Bird Area	Important Bird Areas	Global
St. Mary Reservoir Important Bird Area	Important Bird Areas	Global
Stony Mountain Wildland Provincial Park	Alberta Parks, Tourism and Recreation	Provincial
Sullivan Lake Important Bird Area	Important Bird Areas	Global
Sulphur Gates Provincial Recreation Area	Alberta Parks, Tourism and Recreation	Provincial
Sundance Provincial Park	Alberta Parks, Tourism and Recreation	Provincial
Tolman Badlands Heritage Rangeland Natural Area	Alberta Parks, Tourism and Recreation	Provincial
Twin River Heritage Rangeland Natural Area	Alberta Parks, Tourism and Recreation	Provincial
Two Lakes Provincial Park	Alberta Parks, Tourism and Recreation	Provincial
Utikuma and Utikumasis Lakes Important Bird Area	Important Bird Areas	Global
Wainwright Dunes Ecological Reserve	Alberta Parks, Tourism and Recreation	Provincial
Wapiabi Provincial Recreation Area	Alberta Parks, Tourism and Recreation	Provincial
Waterton Lakes World Heritage Site	Unesco	International
Wavy Lake Important Bird Area	Important Bird Areas	Global
White Earth Valley Natural Area	Alberta Parks, Tourism and Recreation	Provincial
White Goat Wilderness Area	Alberta Parks, Tourism and Recreation	Provincial
Whitehorse Wildland Provincial Park	Alberta Parks, Tourism and Recreation	Provincial
Whitemud Falls Wildland Provincial Park	Alberta Parks, Tourism and Recreation	Provincial
Whitford and Rush Lakes Important Bird Area	Important Bird Areas	Global
Whitney Lakes Provincial Park	Alberta Parks, Tourism and Recreation	Provincial
Whooping Crane nesting area and summer range Important Bird Area	Important Bird Areas	Global
Whooping Crane Summer Range RAMSAR Site	Ramsar Convention on Wetlands	Global
Wildhay Glacial Cascades Natural Area	Alberta Parks, Tourism and Recreation	Provincial
William A. Switzer Provincial Park	Alberta Parks, Tourism and Recreation	Provincial
Willmore Wilderness Park	Alberta Parks, Tourism and Recreation	Provincial
Winagami Lake Provincial Park	Alberta Parks, Tourism and Recreation	Provincial
Winagami Wildland Provincial Park	Alberta Parks, Tourism and Recreation	Provincial
Wood Buffalo World Heritage Site	Unesco	International
Writing-on-Stone Provincial Park	Alberta Parks, Tourism and Recreation	Provincial
Young's Point Provincial Park	Alberta Parks, Tourism and Recreation	Provincial

ESA Toolbox



ESA TOOLBOX



The ESA toolbox represents a series of python scripts that were created and used to perform the identification and update of ESAs in the province of Alberta. These scripts can be run from ArcCatalog, PythonWin or IDLE.

01BatchSelectQS.py

This script will loop through the rows of a table (with the 4c-subwatersheds), select the quarter sections (QS) that have their centers in a given subwatershed, and create a new shapefile of these quarter sections for the subwatershed (QSxSubwatershed).

02ESAcriteria.py

This script will loop through a folder with the shapefiles for each criterion, intersect each criterion shapefile with the QSxSubwatershed shapefiles, and if there is anything that intersects a given QS, it will write "YES" in the corresponding criteria field.

03ESAmulticriteria.py

This script will loop through the folder with the QSxSubwatershed shapefiles, and analyze each QS in terms of the minimum criteria required to be tagged as an ESA. It will also identify as "Maybe" those QS that do not fulfill the minimum criteria but that could be considered as ESAs based on adjacency rules.

04BatchSelectESAQS.py

This script will loop through a folder with the QSxSubwatersheds shapefiles, select the QS that were tagged as ESAs, and then append all of these into 1 shapefile of ESAs.

05BatchSelectESAQS_Maybe.py

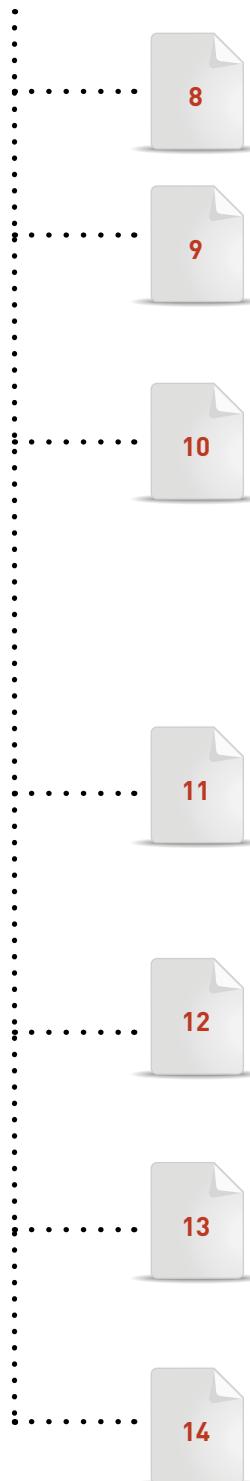
This script will loop through a folder with the QSxSubwatersheds shapefiles, select the QS that were tagged as "Maybe" ESAs, and then append all of these into 1 shapefile of Maybe ESAs.

06AddESAsbyDistance.py

This script will assess whether a given QS that was tagged as a Maybe ESA is spatially adjacent to a QS tagged as an ESAs. If so, the QS will now be re-tagged as an ESA as well.

07RemoveQSwRoads.py

This script will assess whether a given QS that was tagged as an ESA has a major highway running through it. If so, the QS will be tagged as having a major highway, but only if it doesn't fulfill Criterion 2, Criterion 7 or has a G1 species. Only those QS with no road tag will be kept in the final ESA shapefile.



08ESAsCriteria.py

This script will loop through the folder with the shapefiles for each criterion, intersect each criteria layer with the dissolved ESA shapefile (no more QS at this point), and if there is anything that intersects, then will write "YES" in the corresponding criteria field.

09ESAsRating.py

This script assesses the Significance Rating of an ESA based on the highest rating of the elements that it contains.

10CheckSpatialAdjacency.py

This script asses whether a given ESA polygon is spatially adjacent to another ESA polygon [the ID value for such ESA will be printed on the screen], in which case the two polygons should be merged (manually, within an editing session) into 1 ESA.

11DiscardESAsbyCr.py

This script analyzes those ESAs which have only 1 element under criterion 1 and either criteria 5 (a or b) or 6. If said element doesn't occur in any other ESA, then the ESA being analyzed is retained because it contains the only representative of that target. If said element occurs in another ESA, but this ESA is located more than 200 km distance from the ESA being analyzed, then the ESA being analyzed is retained because it contains a representative of a disjunct population for that target. If the element occurs in another ESA, and this ESA is located less than 200 km distance from the ESA being analyzed, then the ESA being analyzed is discarded because the target is already present somewhere else.

12DistancebetweenEOs.py

This script will calculate the maximum distance between different occurrences of the same element of conservation concern. This was then used to calculate the minimum distance to consider the 2 occurrences of the same element as representing disjunct populations. This minimum distance was set at 200 km for most species, except for large ranging animals.

13BatchIntersect.py

This script will loop through a folder with a series of shapefiles (Natural Regions, Natural subregions, Municipalities, etc), and will intersects each one of those shapefiles with the ESA shapefile. These outputs are then used to create the summary reports for each individual ESA.

14Summarytables.py

This script will loop though a table with multiple values for each ESA (resulting from intersects with Natural Regions, Municipalities, etc. shapefiles) and put the values corresponding to the same ESA on consecutive columns, on the same row. This can then be used to generate the individual reports by ESA.

Overlap with original ESAs (1997-1998)

ESA (2009)	Original ESAs (1997-1998)
1	Paine - Beaverdam, Mokowan Butte, Police Outpost, Blood Reserve 148A, Birdseye Butte Pond, Waterton Lakes National Park
2	WMU AB404, Front Range Canyons, Livingstone Range, Racehorse - Dutch Forestry Scientific Area, Front Range Ridges, Castle River Headwaters, Middle Castle River, Whaleback, Middle - Upper Crowsnest Valley, West Castle Headwaters, Oldman River Valley, Ptolemy Creek and Area, Livingstone River Valley, West Castle River Valley, Oldman River - Porcupine Hills, Tornado and North Fork Passes, Plateau Mountain and Vicinity, Seven Sisters - Crowsnest Mountains, Rock - Cow Creek Wetlands, Lynch Lakes, Mount Tecumseh and Deadman's Pass, Middle Crowsnest Valley, Gardiner Creek, Crowsnest River, Barnaby Ridge, Upper Crowsnest Valley, Mountain Goat Concentration, Connelly Creek Ridges, Porcupine Hills, Grassy Ridge High Elevation Grasslands, Allison - Sentry Connectivity Corridor, Mount Livingstone Natural Area, Ma Butte, Carbondale Hill, Turtle Mountain and Frank Slide, Blairmore Connectivity Corridor, Margaret Lake (Pincher Creek Area), Leach Colliery Connectivity Corridor, Beehive Natural Area, Frank Slide, South Plateau Mountain Low Elevation Treelines, Cloudy Ridge, Kylo Hill - Mount Backus, Crowsnest Volcanics, Upper Crowsnest Connectivity Corridor, Dungarvan Wetlands, Drywood Mountain Hanging Valley, Todd Creek Ridge, Waterton Lakes National Park, High Elevation ATV Scientific Area, Beauvais Lake Provincial Park, Red Cedar Stand on Snowshoe Creek, Rock Creek Connectivity Corridor, Western Plains Garter Snake Hibernaculum, Dry Canyon, Crowsnest Spring, Horseshoe Lake (Municipal District of Pincher Creek), Spotted Frog Occurrence, Pekisko Creek, Pine Ridge, WMU AB406.
3	Todd Creek Ridge.
4	Porcupine Hills.
5	Highwood - Pekisko Upland, Pekisko Creek.
6	
7	WMU AB406, Sheep River, WMU AB404.
8	WMU AB406, Kananaskis River Valley and Slopes, Moose Mountain Natural Area and Vicinity, Fisher Range, Forgetmenot Mountain.
9	
10	
11	
12	
13	
14	NE Woodland Caribou Winter and Year-round Range, Berland River - Hendrickson Creek, Berland River - Donald Flats, Donald Creek Drainage.
15	Winniady East Grasslands, Smoky River (Gustavs Flats to Wanyandie Creek).
16	Smoky River (Gustavs Flats to Wanyandie Creek).
17	NW Woodland Caribou Winter Range, Kakwa Wildland Provincial Park and Area, NE Woodland Caribou Winter and Year-round Range, Kakwa River, Turret - Ambler, Muskeg - Little Smoky Rivers, Sheep Creek, Narraway River, Berland River - Hendrickson Creek, Nose Creek, Winniady West Grasslands, Smoky River (Gustavs Flats to Wanyandie Creek), Woodland Caribou Summer Range, Hell's Gate, Solomon - Ice Water - Paradise Creeks.
18	NW Woodland Caribou Winter Range.
19	NW Woodland Caribou Winter Range.

ESA (2009)	Original ESAs (1997-1998)
20	Ram - Whiterabbit, WMU AB430, WMU AB418, Cardinal - McLeod Headwaters, White Goat Wilderness / Cline River and Tributaries, Brazeau River - Job Creek, Clearwater River (Foothills), Burnt Timber, Folding Mountain, Cline - Resolute - Sentinel, Red Cap, Cardinal River Headwaters, Saskatchewan River Valley, Panther Corners, Kootenay Plains, Upper North Saskatchewan River, Wapiabi Creek, Blackstone River, Ram River, Siffleur Wilderness and Saskatchewan River Connection, Upper Red Deer River, Tarpeian Rock - Opabin Creek, Redcap Mountain, North Ram River, South Ghost Wilderness, Shunda Creek, McLeod River Headwaters, Ya-Ha-Tinda, Shunda Mountain, Kootenay Plains and Vicinity, Exshaw / Grotto Mountain, Kananaskis River Valley and Slopes, Coliseum Mountain, Marshybank Ecological Reserve, Grave Flats, Whitehorse Creek, West Bow Flats, Kananaskis Range, Muskiki Lake and area, Mount Wilson Icefield, North Saskatchewan Gap, Cardinal Hills Colluviating Grasslands / Shrub, Spray Reservoir - Kananaskis Corridor, Clearwater River, Wapiabi Cave, Brule Dunes, WMU BNP8, Brule Lake, Wind Valley, White Goat Lakes, Icefields Parkway / Saskatchewan River, Mount Allan - Wind Valley, Grassi Lakes, Prow Mountain - Mount White Col / Scotch Camp, Yamnuska, Pipestone River - Mount Murchison, Upper Red Deer River and Tributaries, Bow Valley, Vermilion Lakes - Banff Sector, Bow Valley Provincial Park, Mount Rundle.
21	
22	Waterton Lakes National Park, Blood Reserve 148A, Pine Ridge, Front Range Canyons, Horseshoe Lake (Municipal District of Pincher Creek), Paine - Beaverdam, Castle River Headwaters, Birdseye Butte Pond.
23	Woodland Caribou Summer Range, Cardinal River Headwaters, Main Range Icefields / Saskat. R. Glacier, Folding Mountain, Cardinal - McLeod Headwaters, Whitehorse Creek, McLeod River Headwaters, Icefields Parkway / Saskatchewan River, White Goat Wilderness / Cline River and Tributaries, Brazeau River - Job Creek, Brule Dunes, Caribou Summer and Occasional Winter Range.
24	Main Range Icefields / Saskat. R. Glacier, WMU BNP8, Pipestone River - Mount Murchison, Bow Valley West, Icefields Parkway South, Spray Valley, WMU BNP9, South Icefields Main Ranges, Icefields Parkway / Saskatchewan River, Clearwater River, South portion of WMU BNP9, Skoki, Siffleur Headwaters and Vicinity, Bow Valley, Vermilion Lakes - Banff Sector, Upper Red Deer River and Tributaries, Cascade - Flints Park, Bow Range and Glaciers, Howse River Valley and Pass, Marvel Lake and Vicinity, WMU BNP 8 South, Sunshine Meadows and Vicinity, Mount Wilson Icefield, Prow Mountain - Mount White Col / Scotch Camp, Lake Minnewanka, Mount Rundle, Spray Reservoir - Kananaskis Corridor, Saskatchewan River Valley, Upper Kananaskis Lake Ranges and Glaciers, Cline - Resolute - Sentinel, Bonnett Glacier, South Ghost Wilderness, Ghost River Wilderness, Burnt Timber, Ram - Whiterabbit, Clearwater River (Foothills), Siffleur Wilderness and Saskatchewan River Connection, WMU AB418, Panther Corners, White Goat Wilderness / Cline River and Tributaries.
25	Kootenay Plains, Kootenay Plains and Vicinity, Saskatchewan River Valley, Ram - Whiterabbit, Siffleur Wilderness and Saskatchewan River Connection.
26	Beauvais Lake Provincial Park.
27	Solomon - Ice Water - Paradise Creeks, Rock Lake - Wildhay, Brule Dunes.
28	WMU AB406, Sheep River.
29	Mount Allan - Wind Valley, South Ghost Wilderness, Kananaskis River Valley and Slopes, Spray Reservoir - Kananaskis Corridor, Kananaskis Range, Mount Rundle, West Bow Flats, Yamnuska, Wind Valley, Mount Buller Rock Glacier and Vicinity, Bow Valley, Vermilion Lakes - Banff Sector, Exshaw / Grotto Mountain, Bow Valley Provincial Park.
30	Cardinal - McLeod Headwaters, Whitehorse Creek, McLeod River Headwaters, Cardinal River Headwaters, Red Cap, Folding Mountain.
31	Smoky River (Gustavs Flats to Wanyandie Creek), Hell's Gate.

Appendix 8

ESA (2009)	Original ESAs (1997-1998)
32	Woodland Caribou Summer Range, Caribou Summer and occasional Winter Range, NE Woodland Caribou Winter and Year-round Range, Smoky River and tributaries, Childear - Mawdsley - Kvass Creek, Turret - Ambler, Sheep Creek, Rock Lake - Wildhay, Hell's Gate, Kakwa Wildland Provincial Park and Area, Muskeg - Little Smoky Rivers, Berland River - Hendrickson Creek.
33	Rock Lake - Wildhay.
34	Kakwa Wildland Provincial Park and Area, Woodland Caribou Summer Range, NW Woodland Caribou Winter Range.
35	Beehive Natural Area, Tornado and North Fork Passes, Oldman River Valley.
36	White Goat Wilderness / Cline River and Tributaries, Icefields Parkway / Saskatchewan River, Brazeau River - Job Creek.
37	Ghost River Wilderness, WMU BNP8, Burnt Timber.
38	Siffleur Wilderness and Saskatchewan River Connection, Ram - Whiterabbit, Pipestone River - Mount Murchison, Saskatchewan River Valley, Siffleur Headwaters and Vicinity, Clearwater River.
39	Plateau Mountain and Vicinity, South Plateau Mountain Low Elevation Treelines, WMU AB404.
40	WMU AB406, Sheep River.
41	Upper Kananaskis Lake Ranges and Glaciers, Spray Reservoir - Kananaskis Corridor, Opal Range, Kananaskis Range, Highwood Pass, Kananaskis River Valley and Slopes, WMU AB406, Spray Valley.
42	Kananaskis River Valley and Slopes, Mount Allan - Wind Valley.
43	Spray Reservoir - Kananaskis Corridor, Kananaskis River Valley and Slopes, Kananaskis Range, Spray Valley, Upper Kananaskis Lake Ranges and Glaciers, Evan - Thomas Critical Wildlife Area, Mount Buller Rock Glacier and Vicinity, Opal Range, Mount Rundle.
44	Bow Valley Provincial Park, Kananaskis River Valley and Slopes, West Bow Flats, South Ghost Wilderness, Exshaw / Grotto Mountain
45	WMU AB406, Opal Range, Evan - Thomas Critical Wildlife Area, Highwood Pass, Fisher Range, WMU AB404, Kananaskis River Valley and Slopes, Mist Mountain Grasslands.
46	Burnt Timber, WMU AB406, WMU AB404, South Ghost Wilderness, Forgetmenot Mountain, Ghost River Wilderness, Mount Livingstone Natural Area, WMU BNP8, Beehive Natural Area, Bow Valley, Vermilion Lakes - Banff Sector, WMU BNP 8 South.
47	Cypress Hills, Eagle Butte.
48	Whaleback, Livingstone Range.
49	Whaleback.
50	Highwood - Pekisko Upland, WMU AB406.
51	
52	Burnstick Lake.
53	
54	Baseline Mountain.
55	Cow Lake.
56	
57	Ram Mountain, North Ram River, North Saskatchewan Gap.

ESA (2009)	Original ESAs (1997-1998)
58	Crimson - Louis Lake Wetlands.
59	
60	
61	
62	
63	
64	
65	
66	Coal Valley Highland.
67	
68	
69	
70	
71	
72	
73	
74	
75	
76	Muskeg - Little Smoky Rivers, NE Woodland Caribou Winter and Year-round Range.
77	
78	Little Smoky Caribou Range, NE Woodland Caribou Winter and Year-round Range
79	Little Smoky Caribou Range, NE Woodland Caribou Winter and Year-round Range.
80	
81	Little Smoky Caribou Range, NE Woodland Caribou Winter and Year-round Range.
82	
83	
84	
85	NE Woodland Caribou Winter and Year-round Range, Simonette River.
86	
87	Little Smoky River, Tony Creek.
88	
89	
90	Swan Hills Plateau Remnant.
91	NW Woodland Caribou Winter Range, Narraway River.
92	NW Woodland Caribou Winter Range.

Appendix 8

ESA (2009)	Original ESAs (1997-1998)
93	
94	
95	Goose - Wallace Mountain, Swan Hills Plateau Remnant, Freeman River.
96	
97	
98	Marten Mountain.
99	Athabasca River - Whitecourt - Vega, Athabasca River - Foothills, Brule Dunes, Brule Lake, Holmes Crossing Sand Hills, Freeman River.
100	North Saskatchewan Gap, Upper North Saskatchewan River.
101	Crimson - Louis Lake Wetlands.
102	
103	Goose - Wallace Mountain.
104	Athabasca River - Foothills.
105	NW Woodland Caribou Winter Range.
106	Lower Pinto Creek.
107	
108	
109	Wapiabi Creek, Blackstone River, Canadian Toad Occurrence, WMU AB430.
110	Jarvis Creek, Lower Wildhay River.
111	
112	
113	Muskiki Lake and area, Marshybank Ecological Reserve.
114	Lower Wildhay River, Jarvis Creek.
115	Milk River Ridge - Unglaciated.
116	Upper St. Mary River, Carway Iris.
117	Jenner Moraine, Native Prairie (Major Lake), Louisiana Lakes, Suffield, Grassy Island Native Prairie, Sounding Creek Native Prairie, Gough Lake, Majorville, Muddy Buttes, Alkali Creek Moraine, Eagle Butte, Ross Creek, Rumsey North, Lafine White-tailed Deer Habitat, Grassy Island Lake, Esther / Douglas Lake Native Prairie, Hand Hills, Marion - Shooting Lake Wetlands, Kirkpatrick Native Prairie, Neutral Hills, Deer Creek, Youngstown Aspen Groveland, Willow Lake, Little Rolling Hills, Sullivan Lake, Native Prairie (Brostern Reservoir), Wintering Hills, Lake Newell, Cypress Hills, Kininvie, Bodo, Silver Heights (wetlands only), Gillespie Lake, Milk River Ridge - Northeast, Pine Lake, Dinosaur, Battle River - Driedmeat Lake, Milk River - Breed Creek, Bow River - Majorville, Milk River Canyon, Etzikom Coulee, Milk River Ridge - Northeast Slope, Sounding Dunes, Middle Lakes, Ribstone Creek - Nose Hill, Clarke Lake, Wainwright Base, Coleman Lake, Rumsey South, Delburne Wetlands.
118	
119	Sage Creek.
120	

ESA (2009)	Original ESAs (1997-1998)
121	
122	Sage Creek.
123	Sage Creek.
124	Upper St. Mary River.
125	Sage Creek.
126	Sage Creek.
127	Milk River Ridge - Northwest.
128	
129	Verdigris Coulee.
130	Milk River Ridge - Northeast.
131	Sage Creek.
132	Sage Creek.
133	Sage Creek.
134	Sage Creek.
135	Milk River Ridge - Northeast.
136	Sage Creek
137	Milk River Ridge - Northeast, Milk River Ridge - Northeast Slope, Twin River Valley.
138	Sage Creek.
139	
140	Milk River Ridge - Northeast Slope.
141	Milk River Ridge - Northwest.
142	Sage Creek.
143	Sage Creek.
144	Sage Creek.
145	Milk River Ridge - Northeast Slope, Milk River Ridge - Northeast.
146	
147	Milk River Ridge Reservoir.
148	St. Mary Reservoir, Lower St. Mary River, Upper St. Mary River.
149	
150	Sage Creek.
151	Milk River Ridge Reservoir.
152	Tyrell - Rush Lakes.
153	Etzikom Coulee.
154	Lower St. Mary River.
155	Glenwoodville Erratic.

Appendix 8

ESA (2009)	Original ESAs (1997-1998)
156	Etzikom Coulee.
157	
158	Sage Creek.
159	Sage Creek.
160	
161	Etzikom Coulee.
162	
163	Stirling Lake.
164	Sage Creek.
165	
166	
167	Cypress Hills.
168	Lower St. Mary River.
169	
170	
171	
172	
173	
174	
175	Red Rock Coulee.
176	
177	
178	Eagle Butte, Cypress Hills.
179	
180	
181	
182	
183	Porcupine Hills, Bluestem.
184	
185	Murray Lake.
186	Purple Springs Dunes, Fincastle Lake, Taber Lake.
187	
188	
189	
190	

ESA (2009)	Original ESAs (1997-1998)
191	Canon Coulee, Porcupine Hills.
192	Keho Lake.
193	
194	
195	
196	Ross Creek, McAlpine Creek.
197	
198	Ross Creek.
199	Ross Creek.
200	
201	Hays Reservoir.
202	Many Island Lake, Ross Creek.
203	
204	
205	Coulee Ridges.
206	
207	
208	
209	
210	
211	Chappice - Sam Lakes.
212	Coulee Ridges.
213	Little Rolling Hills.
214	
215	Coulee Ridges.
216	Suffield.
217	
218	
219	Kininvie.
220	
221	Lake Newell, Little Rolling Hills.
222	
223	Suffield.
224	
225	

Appendix 8

ESA (2009)	Original ESAs (1997-1998)
226	
227	Kininvie.
228	
229	Lake Newell.
230	
231	
232	
233	
234	
235	
236	
237	Frank Lake (Calgary Area).
238	Travers Reservoir, McGregor Lake, Little Bow Reservoir, Majorville.
239	
240	Louisiana Lakes.
241	Louisiana Lakes.
242	Louisiana Lakes.
243	Lathom - San Francisco Lakes.
244	Middle Sand Hills.
245	Suffield.
246	
247	
248	Middle Sand Hills.
249	
250	Suffield.
251	Jenner Springs.
252	
253	
254	
255	Remount.
256	
257	
258	Grassy Island Native Prairie, Youngstown Aspen Groveland, Samson Lake, Jenner Moraine.
259	Jenner Moraine.
260	Namaka - Stobart Lakes.

ESA (2009)	Original ESAs (1997-1998)
261	Jenner Moraine, Native Prairie (Major Lake).
262	
263	
264	Wintering Hills.
265	Alkali Creek Moraine.
266	Irricana Reservoir.
267	Jenner Moraine.
268	
269	Coleman Lake.
270	Hand Hills Lake.
271	
272	
273	Jenner Moraine, Plover Lake.
274	Chain - Farrell Lakes, Dowling Lake.
275	Kirkpatrick Native Prairie, Kirkpatrick Lake, Youngstown Aspen Groveland.
276	Mudspring Lake.
277	Bodo.
278	Grassy Island Native Prairie, Muddy Buttes Badlands, Muddy Buttes.
279	Bodo.
280	Middle Lakes.
281	Sullivan Lake.
282	Ribstone Creek - Nose Hill.
283	Neutral Hills, Gooseberry Lake.
284	
285	Neutral Hills.
286	South Saskatchewan River - Medicine Hat North, Suffield, Chappice - Sam Lakes.
287	Suffield, Remount, South Saskatchewan Canyon, Middle Sand Hills.
288	Red Deer River - Finnegan / Steveville Terraces, Alkali Creek Moraine, Red Deer River - Bindloss / Empress Terraces, Red Deer River - Jenner, Native Prairie (Major Lake), Dinosaur, Red Deer River - Alkali Creek / Dune Point, Jenner Moraine, Suffield, Remount, Wintering Hills, Dune Point Springs.
289	South Saskatchewan River - Medicine Hat West, Majorville, Bow River - Calgary to Siksika Reserve, Bow River - Majorville, Bow River - Hays, Bow River - Bow City / Scandia, South Saskatchewan River - Medicine Hat North, Lower Bow Dunes, Purple Springs Dunes, Chappice - Sam Lakes, Little Rolling Hills.
290	Willow Creek, Tolman Badlands, Hand Hills Fescue, Wintering Hills.
291	Porcupine Hills, Oldman River - Macleod, Bluestem, Oldman River - Lethbridge East, Oldman River - Brocket, Kipp Section, Lenzie Section, Oldman Section.

Appendix 8

ESA (2009)	Original ESAs (1997-1998)
292	Suffield, South Saskatchewan Canyon, South Saskatchewan River - Medicine Hat North.
293	South Saskatchewan River - Medicine Hat North.
294	Oldman River - Lethbridge East, Turin Dunes.
295	
296	Eagle Butte, Manyberries Creek Badlands, Sage Creek.
297	Pakowki Lake, Milk River - Pakowki / Pinhorn.
298	Twin River Valley, Milk River Ridge - Northeast, Writing-on-Stone, Milk River Ridge - Northwest, Verdigris Coulee, Twin River Ash.
299	Milk River - Pakowki / Pinhorn, Milk River Canyon, Sage Creek, Milk River - Breed Creek, Deer Creek, Writing-on-Stone, Lower Sweetgrass Hills, Pakowki Lake, Milk River Section, Black Butte.
300	Pakowki Lake.
301	Lower Belly River.
302	North Fork Milk River A, Milk River Ridge - Unglaciated.
303	Little Rolling Hills.
304	Sage Creek, Manyberries Creek Badlands.
305	Dinosaur, Jenner Moraine.
306	Porcupine Hills, Bluestem.
307	Rumsey South.
308	
309	Milk River Ridge - Northwest, North Fork Milk River A, Ross Lake Unglaciated, Milk River Ridge - Unglaciated.
310	Milk River Canyon, Sage Creek.
311	Milk River Canyon.
312	Milk River Canyon.
313	Hand Hills Fescue, Little Fish Lake.
314	Twin River Valley, Milk River Ridge - Northeast, Milk River Ridge - Northeast Slope.
315	South Saskatchewan Canyon.
316	Writing-on-Stone.
317	Oldman River - Brocket, Oldman River - Porcupine Hills.
318	Dinosaur, Red Deer River - Finnegan / Steveville Terraces.
319	Red Deer River - Bindloss / Empress Terraces.
320	Sounding Dunes, Coulee Ridges, Rumsey North, Willow Lake, Marion - Shooting Lake Wetlands, Battle River - Brownfield, Pine Ridge, Pine Lake, Gillespie Lake, Rumsey South.
321	
322	Meinsinger Lake.
323	
324	

ESA (2009)	Original ESAs (1997-1998)
325	
326	Sarcee (Tsuu Tina) Reserve.
327	Sarcee (Tsuu Tina) Reserve.
328	
329	Big Hill Creek.
330	
331	
332	
333	
334	
335	
336	Mikwan - Goosequill - Hummock Lakes.
337	
338	Delburne Wetlands.
339	
340	Sounding Lake, Sounding Dunes.
341	
342	Battle River - Brownfield.
343	
344	
345	Sounding Dunes, Horseshoe Lake (Municipal District of Provost), Sunken Lake, Metiskow Lake.
346	Battle River – Bigknife.
347	
348	Sounding Dunes.
349	
350	Sounding Dunes.
351	
352	
353	
354	Buffalo Lake.
355	Battle River - Bigknife.
356	
357	
358	
359	

Appendix 8

ESA (2009)	Original ESAs (1997-1998)
360	
361	Bellhill Lake.
362	Battle River - Brownfield, Silver Heights (wetlands only).
363	Battle River - Bigknife.
364	
365	Red Deer Lake.
366	Red Deer Lake.
367	Samson Lake.
368	
369	Red Deer Lake.
370	
371	Battle River - Driedmeat Lake.
372	Wainwright Base, Battle River - Camp Wainwright.
373	Ribstone Lake, Wainwright Base.
374	
375	Battle River - Driedmeat Lake.
376	
377	
378	Wainwright Base, Ribstone Creek - Camp Wainwright.
379	
380	Wavy Lake.
381	
382	
383	Bearhills Lake.
384	Battle River - Driedmeat Lake.
385	Battle River - Marsden.
386	Baxter Lake.
387	Battle River - Wainwright.
388	
389	
390	Coal Lake.
391	Battle River - Wainwright.
392	
393	
394	Albert Lake.

ESA (2009)	Original ESAs (1997-1998)
395	
396	
397	
398	
399	
400	
401	
402	
403	Kenilworth Lake.
404	
405	
406	
407	
408	Watt Lake.
409	
410	Whitford - Rush Lakes.
411	Wood Lake (Parkland).
412	Kleskun Lake.
413	
414	Sounding Dunes, Greenlee Lake.
415	Ewing Lake, Erskine Lake, Lowden Wetlands.
416	Tolman Badlands, Lousana Canyon, Peter's Pond, Wood Lake (Red Deer Area).
417	Edgerton Dunes, Ribstone Creek - Edgerton.
418	Rumsey South.
419	Killarney / Dillberry / Leane Lake Complex, Reflex Lake, Cipher Lake.
420	Tolman Badlands, Lousana Canyon.
421	Tolman Badlands.
422	Big Lake.
423	Wainwright Dunes Ecological Reserve, Sounding Dunes, Wainwright Base, Ribstone Creek - Camp Wainwright.
424	Killarney / Dillberry / Leane Lake Complex.
425	Beaverhill Lake.
426	
427	
428	Raven River.
429	

Appendix 8

ESA (2009)	Original ESAs (1997-1998)
430	
431	
432	Dick Lake.
433	
434	
435	Buck Lake.
436	Pigeon Lake.
437	
438	
439	
440	
441	
442	Wabamun Lake.
443	
444	Pembina River.
445	Glory Hills.
446	Plain Lake.
447	
448	Chip Lake.
449	
450	Lac St. Anne.
451	
452	
453	
454	
455	
456	
457	
458	
459	
460	
461	Lac Canard.
462	
463	
464	George Lake.

ESA (2009) Original ESAs (1997-1998)

465

466

467

468

469 Frog Lake.

470

471

472

473 Cache Lake.

474

475

476

477

478

479

480

481

482

483

484 Reita Lake.

485

486 Wakomao Lake.

487

488 Muriel Lake.

489

490

491 Reed Lake.

492

493

494

495

496 Charlotte Lake, Jessie Lake.

497

498

499

Appendix 8

ESA (2009)	Original ESAs (1997-1998)
500	Bunder Lake.
501	
502	
503	Forsyth Lake.
504	
505	Little Smoky River.
506	Stebbing Lake.
507	
508	Erickson Lake.
509	
510	Edward Lake.
511	
512	
513	Kerr Lake.
514	
515	Harold Lake.
516	Maloney Lake.
517	
518	
519	
520	Amisk Lake, Amisk Valley.
521	
522	
523	
524	
525	Bleak Lake Wetlands.
526	
527	
528	
529	Little Smoky River, Tufa - Unusual Wetland Feature.
530	
531	
532	
533	
534	

ESA (2009)	Original ESAs (1997-1998)
535	Simonette River.
536	Beaver Lake.
537	
538	
539	Wolf Lake, Sand River.
540	
541	
542	Simonette River, Smoky River, Side Lake, Cutbank River.
543	
544	
545	
546	
547	Lac La Biche, Lac La Biche Peatland.
548	Chinchaga Diversity Area, Egg Lake - Algar Lake Diversity Area, Parallel Creek Peatland, Trout River Delta, Winefred / Grist Watershed, Schultz's Bog Diversity Area, Ells River, Athabasca River - Rapids Reach, Harper Springs Natural Area, South Notikewin / Deadwood Caribou Range, Caribou Mountains Escarpment, Bistcho Lake, Bistcho Lake Peat Plateau Bog, Gordon Lake.
549	
550	
551	Heart Lake.
552	Sturgeon Lake.
553	Sand River.
554	Sand River.
555	
556	Bear Lake, Saskatoon Lake, La Glace Lake, Clairmount Lake, Buffalo Lake Complex, Bush (Wilkin) Lake, Ferguson Lake, Valhalla Lake, Flyingshot Lake, Wolfe Lake, Flyingshot Lake (SW).
557	Snipe Lake.
558	
559	
560	McNaught Lake.
561	Primrose Lake South Basin.
562	Lesser Slave River.
563	Lesser Slave River.
564	Lesser Slave Lake Horizontal Fen.
565	
566	Lesser Slave Lake Horizontal Fen.
567	

Appendix 8

ESA (2009)	Original ESAs (1997-1998)
568	
569	
570	
571	
572	
573	
574	Lesser Slave Lake, North Shore Moose Area, Marten Mountain.
575	
576	Winefred Lake.
577	
578	Winefred Lake.
579	Winefred / Grist Watershed.
580	
581	Buffalo Bay / Horse Lake.
582	Little Smoky River.
583	Winefred Lake.
584	Smoky River, Little Smoky River, Puskwaskau River.
585	
586	Utikuma Lake, Utikumasis Lake.
587	
588	
589	
590	Egg Lake - Algar Lake Diversity Area.
591	Frank Lake (Peace River Area).
592	North Wabasca Lake, Wabasca River - Wabasca Lake, South Wabasca Lake.
593	Egg Lake - Algar Lake Diversity Area.
594	Nipisi Lake.
595	Birch Lake, Gordon Lake, Gipsy Lake.
596	Parallel Creek Peatland.
597	Egg Lake - Algar Lake iversity Area.
598	Egg Lake - Algar Lake Diversity Area.
599	Upper Wabasca River.
600	Cardinal Lake.
601	Egg Lake - Algar Lake Diversity Area.
602	

ESA (2009) Original ESAs (1997-1998)

- | | |
|------------|--|
| 603 | Peace River – Dunvegan. |
| 604 | |
| 605 | Lower Christina River. |
| 606 | Upper Wabasca River. |
| 607 | Egg Lake - Algar Lake Diversity Area. |
| 608 | Peerless / Graham Lake Watershed. |
| 609 | |
| 610 | South Notikewin / Deadwood Caribou Range. |
| 611 | |
| 612 | South Notikewin / Deadwood Caribou Range. |
| 613 | |
| 614 | |
| 615 | Gods Lake. |
| 616 | |
| 617 | South Notikewin / Deadwood Caribou Range. |
| 618 | |
| 619 | Upper Wabasca River, Wabasca River (Canyon). |
| 620 | |
| 621 | Ells River. |
| 622 | Wabasca River (Canyon). |
| 623 | |
| 624 | |
| 625 | |
| 626 | Birch Mountains Diversity Area. |
| 627 | |
| 628 | |
| 629 | |
| 630 | |
| 631 | |
| 632 | |
| 633 | |
| 634 | |
| 635 | Eymundson Sinkholes. |
| 636 | Wabasca River. |
| 637 | |

Appendix 8

ESA (2009)	Original ESAs (1997-1998)
638	McClelland Lake Sinkholes, McClelland Lake.
639	
640	
641	
642	Wadlin Lake.
643	Wabasca River.
644	Chinchaga River.
645	
646	Chinchaga River, Chinchaga Diversity Area.
647	Chinchaga River, Haig River.
648	Wabasca River, Wabasca Bison Range.
649	Wabasca Bison Range.
650	Chinchaga River.
651	Peace - Athabasca Rivers Delta, Richardson River Sand Hills.
652	
653	
654	
655	
656	
657	Hay River.
658	Hay River.
659	Old Fort Bay Dunes.
660	
661	Lake Athabasca - South Shore.
662	Hay River.
663	Hay River.
664	Hay River.
665	Zama Lake Ribbed Fen.
666	Lake Athabasca - South Shore.
667	Hay River
668	
669	
670	
671	Bistcho Lake.
672	Bistcho Lake Peat Plateau Bog, Bistcho Lake.

ESA (2009)	Original ESAs (1997-1998)
673	
674	Cameron Hills Glacial Flutings.
675	Slave River Rapids.
676	Peace - Athabasca Rivers Delta, Glacial Lake Berg, Lake Athabasca - Shelter - Sand Points, Slave River, Richardson River Sand Hills.
677	
678	Slave River, Slave River Rapids, Stony Islands, La Butte Creek.
679	McClelland Lake Fen, McClelland Lake, Firebag River.
680	Pelican Lake, Parallel Creek Peatland.
681	Cache Creek - Wolverine Sand Hills, Peace River.
682	Peace River.
683	Cache Creek - Wolverine Sand Hills, Peace River.
684	Peace River, Peace River - Dunvegan, Peace River - Smoky Junction, Smoky River, Clear River Moose Range, Cache Creek - Wolverine Sand Hills, Peace River - Parkland, Representative Area #89, Representative Area #84.
685	Bear River Sandhills.
686	NW Woodland Caribou Winter Range, Wapiti River, Pinto Creek Elk Range, Narraway River, Stony Creek Moose and Grizzly Range, Nose Creek, Unnamed Lakes [T68 R11 S27 W6], Pipestone Creek.
687	
688	Schultz's Bog Diversity Area.
689	Fort Vermilion Sand Hills, Peace River, La Crete Sand Hills, Child Lake [Child Lake Salt Meadows Natural Area].
690	North Saskatchewan River - Drayton Valley, North Saskatchewan River - Elk Point, North Saskatchewan River - Genessee - Drayton Valley, North Saskatchewan River - Edmonton, Upper North Saskatchewan River, Lac Sante, North Saskatchewan Gap, Crimson - Louis Lake Wetlands, Genessee Natural Area, Ram River, Shunda Creek.
691	Parallel Creek Peatland.
692	Athabasca River - Pembina Reach, Athabasca River - Tar Sands Reach, Richardson River Sand Hills, Athabasca River - Rapids Reach, Maybelle River Sand Hills, Egg Lake - Algar Lake Diversity Area, Crag and Tail, Parallel Creek Peatland, Firebag River, Boivin Creek Peatland, Lower Christina River, Peace - Athabasca Rivers Delta, Paxton - Larocque Lakes, Pembina River, Richardson Tower Lakes (also called Archer-Bowen-Brander Lakes), Richardson River Active Sand Dunes, La Saline Springs Natural Area, Ronald Lake, Ells River, Clearwater River (NE Alberta), Lesser Slave River.
693	Schultz's Bog Diversity Area, Athabasca River - Rapids Reach.
694	Garden River Bison Range, Pine Lake Bison Range, Peace - Athabasca Rivers Delta, Peace River, Lake Claire, Needle Lake Bison Range, Caribou Mountains Escarpment, Sweetgrass Bison Range, Kilome Lake Complex, Slave River, Brine Creek Salt Plain, Whooping Crane Nesting Habitat, Raup Lake Salt Plains, Athabasca River - Tar Sands Reach, Salt River, Salt River Salt Plains, Square Lake, Merryweather Lake, Unnamed Lake [T121 R19 S32 W4], Stony Islands.
695	Elk Island National Park, Blackfoot Grazing Reserve.
696	

Appendix 8

ESA (2009)	Original ESAs (1997-1998)
697	Sturgeon Lake.
698	Lake Athabasca - Shelter - Sand Points, Lake Athabasca - North Shore / Fidler - Gray Willow Points, Wylie Lake.
699	Crag and Tail, Firebag River, Marguerite River Dissected Kame.
700	Harper Springs Natural Area.
701	
702	Winagami Lake / South Heart River.
703	Lakeland Provincial Recreation Area, Lakeland Diversity Area, Touchwood Lake, Seibert Lake, Frenchman Lake, Spencer Lake, Ironwood Lake, Lakeland Provincial Park, Rich Lake.
704	Birch Mountains Diversity Area.
705	
706	Orloff Lake.
707	Lesser Slave Lake, Marten Mountain.
708	Peace River.
709	Gordon Lake, Gipsy Lake, Birch Lake.
710	Smoky River, Peace River - Dunvegan, Peace River - Smoky Junction, Peace River.
711	Peace River.
712	Maybelle River Sand Hills, Paxton - Larocque Lakes.
713	Richardson River Sand Hills, Athabasca River - Tar Sands Reach.
714	Lesser Slave Lake.
715	Lesser Slave Lake, North Shore Moose Area.
716	Athabasca River - Pembina Reach.
717	Ministik Lake, Miquelon Lake.
718	Lakeland Provincial Park, Lakeland Diversity Area, Lakeland Provincial Recreation Area.
719	Athabasca River - Whitecourt - Vega, Athabasca Sand Dune - Peatland Complex, Athabasca River - Pembina Reach, Fort Assiniboine Horizontal Fen.
720	North Saskatchewan River - Genessee - Drayton Valley, North Saskatchewan River - Drayton Valley.
721	North Saskatchewan River - Drayton Valley, North Saskatchewan River - Genessee - Drayton Valley.
722	Paxton - Larocque Lakes, Maybelle River Sand Hills.
723	Peace River - Dunvegan.
724	Blackfoot Grazing Reserve, Cooking Lake, Hastings Lake, Elk Island National Park.
725	White Earth Natural Area, Long Lake.
726	
727	Athabasca River - Pembina Reach.
728	Steele Lake.

ESA (2009)	Original ESAs (1997-1998)
729	Holmes Crossing Sand Hills.
730	Cold Lake.
731	Winagami Lake / South Heart River.
732	Peace River - Dunvegan, Pouce Coupe River, Representative Area #89.
733	
734	Egg Lake - Algar Lake Diversity Area.
735	Athabasca River - Pembina Reach.
736	Caribou Mountains Escarpment, Hay River, Margaret Lake (Boreal), Caribou Mountains Northern Ribbed Fens, Lessard Creek Peat Plateau Bog, Caribou Mountains Peat Plateau Bog.
737	Athabasca River - Rapids Reach, Egg Lake - Algar Lake Diversity Area, Parallel Creek Peatland.
738	Hay - Zama Lakes Complex, Hay River.
739	Chinchaga Diversity Area.
740	Clearwater River (NE Alberta), Lower Christina River, High Hill River, Athabasca River - Tar Sands Reach.
741	Clearwater River (NE Alberta).
742	
743	
744	
745	Wylie Lake.
746	Wylie Lake.
747	Wylie Lake.
748	
749	
750	Charles - Cornwall Lakes.
751	Leland - Tulip Lakes.
752	Waugh Lake.
753	La Butte Creek, Slave River.
754	Charles - Cornwall Lakes, Colin Lake, Woodman - Alexander Lakes.

Appendix 9

ESAs by Provincial and National Grids

ESA	Alberta Township System (ATS)								National Topographic System (NTS)				
1	1-27-4 1-29-4	1-28-4	2-27-4	2-28-4	2-26-4	1-26-4	2-29-4			82H			
2	11-4-5 13-4-5 14-5-5 8-4-5 6-2-5 12-5-5 10-2-5 3-30-4 6-5-5 6-1-5 2-29-4 8-2-5	7-4-5 10-4-5 5-2-5 14-4-5 14-3-5 7-5-5 10-3-5 4-4-5 15-6-5 17-7-5 2-1-5 11-6-5	4-3-5 6-4-5 3-2-5 8-3-5 5-1-5 9-5-5 13-5-5 17-6-5 10-1-5 8-1-5 2-2-5 18-6-5	4-2-5 11-5-5 5-4-5 5-1-5 15-4-5 3-3-5 16-5-5 9-1-5 5-5-5 14-6-5 11-2-5 7-1-5	12-4-5 4-1-5 5-3-5 15-4-5 10-5-5 9-3-5 16-4-5 16-6-5 7-6-5 18-7-5 16-3-5 17-4-5	6-3-5 3-1-5 15-5-5 8-5-5 10-5-5 13-3-5 12-3-5 11-3-5 5-30-4 8-6-5 13-6-5 2-30-4	9-4-5 7-3-5 8-5-5 15-3-5 13-3-5 12-3-5 11-3-5 5-30-4 3-29-4 9-2-5			82G	82J	82H	
3	9-2-5								82G				
4	10-30-4	11-30-4	11-1-5	10-1-5	10-29-4				82H		82G		
5	17-3-5	16-3-5	17-4-5	16-4-5					82J				
6	17-4-5								82J				
7	17-5-5 16-5-5	18-5-5 18-6-5	19-4-5	19-5-5	18-4-5	17-4-5	17-6-5	82J					
8	23-6-5 21-6-5 24-8-5	21-5-5 20-6-5 21-4-5	23-7-5 20-5-5 23-5-5	22-6-5 24-6-5 19-4-5	24-7-5 21-7-5 22-4-5	22-5-5 20-4-5 20-7-5	22-7-5 23-8-5 19-6-5	82J		820			
9	22-4-5								82J				
10	23-4-5								82J				
11	23-5-5								82J				
12	23-5-5	23-4-5						82J					
13	27-5-5	26-5-5	27-6-5	26-4-5					820				
14	56-3-6 55-1-6	55-2-6 57-3-6	55-3-6	54-2-6	56-1-6	56-2-6	56-4-6	83E					
15	57-8-6	57-7-6	58-8-6	58-7-6					83E	83L			
16	59-6-6	59-7-6	59-5-6	58-6-6	58-7-6					83L			
17	59-10-6 61-12-6 61-8-6 62-11-6 61-9-6 56-9-6 62-10-6 59-6-6 52-28-5 55-2-6	59-9-6 61-11-6 59-11-6 60-8-6 55-5-6 58-11-6 62-14-6 58-8-6 62-8-6 57-11-6	60-10-6 57-10-6 57-9-6 62-13-6 56-10-6 63-11-6 60-14-6 57-8-6 63-13-6 55-7-6	60-9-6 58-10-6 58-9-6 60-13-6 55-3-6 56-8-6 52-27-5 57-5-6 63-10-6 54-4-6	60-11-6 58-9-6 58-9-6 56-5-6 55-3-6 56-8-6 52-1-6 64-11-6 52-2-6 53-2-6	56-6-6 60-12-6 61-10-6 59-7-6 61-7-6 61-14-6 52-1-6 64-11-6 64-12-6 53-3-6	61-13-6 60-12-6 61-10-6 59-7-6 55-4-6 57-7-6 56-4-6 53-27-5 64-12-6 53-3-6	83L		83E	83F		
18	64-11-6								83L				
19	64-11-6								83L				

ESA	Alberta Township System (ATS)								National Topographic System (NTS)		
20	43-17-5	35-14-5	35-15-5	35-13-5	31-11-5	40-18-5	47-23-5		83C	820	83F
	43-18-5	43-19-5	39-20-5	36-15-5	42-19-5	36-16-5	44-18-5		83B	83N	82J
	36-19-5	41-19-5	40-17-5	42-18-5	45-18-5	37-17-5	37-15-5				
	37-16-5	33-13-5	33-11-5	41-18-5	41-15-5	38-16-5	42-16-5				
	34-13-5	34-14-5	46-23-5	46-22-5	32-12-5	33-12-5	48-25-5				
	32-11-5	40-20-5	45-20-5	38-19-5	41-16-5	44-21-5	45-21-5				
	45-19-5	42-17-5	43-16-5	36-18-5	29-10-5	39-16-5	35-16-5				
	48-22-5	45-22-5	46-21-5	42-15-5	44-17-5	36-14-5	35-18-5				
	44-19-5	47-22-5	34-12-5	46-20-5	30-11-5	47-24-5	34-15-5				
	41-20-5	39-17-5	33-14-5	34-16-5	43-20-5	36-20-5	34-11-5				
	39-18-5	49-25-5	38-17-5	39-19-5	44-20-5	41-14-5	32-13-5				
	36-13-5	48-24-5	35-12-5	39-21-5	41-17-5	49-26-5	40-19-5				
	42-20-5	40-16-5	45-23-5	31-10-5	29-11-5	45-17-5	35-19-5				
	48-23-5	44-22-5	34-10-5	37-18-5	38-15-5	42-14-5	39-15-5				
	43-21-5	35-10-5	36-17-5	31-12-5	46-19-5	38-20-5	33-10-5				
	46-18-5	40-15-5	31-9-5	32-10-5	47-25-5	35-17-5	24-9-5				
	36-12-5	49-24-5	30-10-5	37-19-5	44-16-5	42-13-5	32-14-5				
	31-8-5	40-21-5	37-13-5	35-11-5	47-21-5	38-18-5	34-4-5				
	37-14-5	24-10-5	32-6-5	35-3-5	31-7-5	33-5-5	48-26-5				
	25-8-5	34-18-5	38-12-5	32-5-5	37-12-5	37-20-5	33-16-5				
	39-14-5	49-22-5	44-23-5	47-20-5	43-15-5	46-24-5	21-9-5				
	45-24-5	25-9-5	24-8-5	34-19-5	34-5-5	46-17-5	48-21-5				
	33-15-5	36-21-5	41-21-5	41-13-5	34-9-5	25-10-5	42-21-5				
	22-9-5	34-3-5	30-12-5	38-11-5	49-27-5	29-9-5	34-17-5				
	50-25-5	40-14-5	49-23-5	25-11-5	31-6-5	24-11-5	31-13-5				
	36-11-5	35-9-5	35-4-5	35-20-5	28-10-5	28-11-5					
21	25-7-5	25-8-5	25-6-5					820			
22	1-29-4	1-30-4	2-30-4	2-1-5	1-1-5	1-28-4	2-29-4		82H	82G	
	2-2-5	3-30-4	3-1-5	1-2-5							
23	39-25-5	39-24-5	39-23-5	39-22-5	43-27-5	43-26-5	43-25-5		83C	83E	83D
	43-24-5	43-23-5	47-4-6	47-3-6	47-2-6	47-1-6	43-1-6		83F		
	43-2-6	47-26-5	47-27-5	48-1-6	51-9-6	48-4-6	48-2-6				
	48-3-6	44-2-6	44-1-6	48-5-6	48-27-5	44-27-5	44-26-5				
	40-26-5	44-25-5	44-24-5	40-25-5	40-24-5	40-23-5	40-22-5				
	49-5-6	49-1-6	45-1-6	49-4-6	49-2-6	45-2-6	49-8-6				
	49-3-6	41-1-6	45-27-5	41-27-5	41-26-5	45-26-5	38-26-5				
	45-25-5	41-25-5	41-24-5	38-25-5	38-24-5	41-23-5	41-22-5				
	42-27-5	42-26-5	42-25-5	42-24-5	50-9-6	42-23-5	50-8-6				
	50-7-6	50-6-6	42-22-5	46-4-6	46-3-6	50-5-6	50-4-6				
	46-2-6	42-2-6	50-3-6	46-1-6	42-1-6	46-27-5	46-26-5				
	49-6-6	51-5-6	37-25-5	45-3-6	42-21-5	51-4-6	41-21-5				
	51-7-6	40-1-6	39-26-5	41-2-6	40-27-5	38-23-5	50-1-6				
	37-24-5	51-3-6	44-23-5	51-10-6	47-5-6	51-8-6	44-3-6				
	51-6-6	43-22-5	48-26-5	49-9-6	50-2-6	42-28-5	41-28-5				
	40-21-5	45-24-5	38-27-5	46-25-5	49-27-5	37-26-5	49-7-6				
	47-25-5	40-2-6	38-22-5	43-28-5	44-28-5	45-28-5	46-28-5				
	37-23-5	46-5-6	45-4-6	48-6-6	48-8-6	47-28-5	42-20-5				
	48-28-5	49-28-5	43-21-5	40-28-5	42-3-6	50-10-6	43-3-6				
	50-28-5	37-27-5	51-2-6	43-20-5	52-10-6	52-9-6	51-11-6				
	39-21-5	45-5-6	52-7-6	47-6-6	52-5-6	37-22-5	50-27-5				
	44-22-5	48-9-6	46-24-5	45-23-5	48-7-6	52-4-6	36-24-5				
	36-25-5	36-26-5	49-26-5	41-3-6	47-24-5	39-1-6	41-20-5				
	49-10-6	48-25-5	40-20-5	39-27-5	52-6-6	0-0-0	52-3-6				
	52-11-6	51-1-6									

Appendix 9

ESA	Alberta Township System (ATS)								National Topographic System (NTS)		
24	35-21-5	35-22-5	31-15-5	31-14-5	31-16-5	31-17-5	36-22-5	820	83N	83C	
	32-18-5	24-12-5	28-16-5	32-16-5	32-15-5	28-12-5	28-15-5	82J			
	28-13-5	35-20-5	28-14-5	36-23-5	27-15-5	27-14-5	27-13-5				
	27-12-5	29-16-5	25-12-5	25-13-5	29-12-5	29-15-5	29-13-5				
	29-14-5	34-21-5	34-20-5	30-16-5	30-15-5	30-13-5	30-14-5				
	31-13-5	33-21-5	30-17-5	26-12-5	26-13-5	26-14-5	26-11-5				
	25-14-5	32-17-5	30-12-5	33-20-5	31-18-5	33-15-5	33-19-5				
	26-10-5	23-11-5	37-22-5	36-21-5	25-11-5	32-21-5	22-11-5				
	21-11-5	27-16-5	29-17-5	24-11-5	27-11-5	32-14-5	34-22-5				
	23-12-5	24-13-5	22-12-5	26-15-5	34-19-5	33-16-5	32-19-5				
	35-23-5	31-12-5	37-23-5	28-11-5	30-18-5	33-18-5	25-15-5				
	35-19-5	28-17-5	32-20-5	29-11-5	32-13-5	25-10-5	26-9-5				
	36-20-5	33-14-5	33-22-5	33-17-5	31-19-5	27-9-5	27-10-5				
	34-15-5	30-11-5	24-14-5	21-12-5	27-17-5	20-10-5	36-24-5				
	37-21-5	20-11-5	38-23-5	23-10-5	38-22-5	26-16-5	37-24-5				
	21-10-5	22-10-5	31-21-5	34-23-5	29-18-5	31-20-5	34-16-5				
	36-19-5										
25	35-17-5	35-18-5	36-17-5					83C	83N		
26	5-1-5	5-2-5						82G			
27	51-1-6	51-2-6	52-2-6	51-27-5	50-2-6	50-27-5	50-28-5	83E	83F		
	51-28-5	50-1-6	52-1-6	49-27-5	52-3-6	51-3-6					
28	19-6-5	19-5-5	20-5-5	19-4-5	20-6-5	20-4-5	18-6-5	82J			
	18-5-5										
29	23-9-5	25-10-5	24-10-5	23-10-5	24-9-5	24-8-5	22-10-5	820	82J		
	25-11-5	25-9-5	24-11-5	25-8-5	23-8-5	22-9-5					
30	46-24-5	45-23-5	46-25-5	45-24-5	47-24-5	45-22-5	47-25-5	83C	83F		
	46-23-5	47-23-5									
31	56-8-6	56-9-6	57-8-6					83E			
32	55-7-6	55-12-6	55-11-6	55-8-6	55-10-6	55-9-6	56-13-6	83E	83L		
	52-12-6	56-12-6	56-11-6	52-8-6	53-11-6	53-10-6	53-9-6				
	53-8-6	53-7-6	53-6-6	53-5-6	53-4-6	52-11-6	53-3-6				
	53-2-6	52-3-6	54-11-6	54-10-6	52-6-6	54-9-6	54-8-6				
	54-7-6	54-6-6	54-5-6	54-4-6	52-4-6	57-11-6	52-5-6				
	54-12-6	53-12-6	52-7-6	52-9-6	55-13-6	52-10-6	51-11-6				
	51-12-6	53-13-6	55-6-6	55-5-6	55-4-6	56-8-6	56-10-6				
	56-9-6	56-14-6	52-13-6	57-13-6	57-14-6	57-12-6	58-11-6				
	51-6-6	51-8-6	56-7-6	54-3-6	54-13-6	51-10-6	51-3-6				
	55-14-6	51-7-6	51-4-6	50-10-6	50-11-6	51-5-6	53-14-6				
	50-12-6	51-13-6	51-9-6	0-0-0	52-2-6						
33	52-2-6							83E			
34	59-13-6	58-13-6	58-12-6	59-12-6	57-12-6	57-13-6	58-14-6	83L	83E		
	59-14-6	58-11-6	57-14-6	60-13-6	60-14-6	57-11-6	59-11-6				
	60-12-6										
35	13-5-5	12-5-5	13-6-5					82J	82G		
36	38-21-5	37-21-5	37-20-5	37-19-5	38-20-5	38-22-5	39-21-5	83C			
	36-21-5	37-18-5	37-22-5	38-19-5	39-20-5	36-20-5					

ESA	Alberta Township System (ATS)							National Topographic System (NTS)					
37	27-10-5 28-11-5 28-10-5 27-11-5 26-10-5							820					
38	34-17-5 34-18-5 33-17-5 33-18-5 35-17-5 34-19-5 33-16-5		34-16-5 35-16-5 33-19-5 32-17-5 35-18-5				83N 83C						
39	15-4-5 14-4-5 15-5-5 14-5-5							82J					
40	19-5-5 19-6-5 20-5-5 19-4-5 20-6-5							82J					
41	20-9-5 19-9-5 21-10-5 19-8-5 20-10-5 20-8-5 21-9-5		19-10-5 18-10-5 19-7-5 21-8-5 21-11-5 22-10-5 18-7-5				82J						
42	23-9-5 22-9-5							82J					
43	22-10-5 22-9-5 23-10-5 21-9-5 22-11-5 24-11-5 23-11-5		21-10-5 21-11-5 23-9-5 24-10-5				82J 820						
44	24-8-5 23-8-5 24-9-5 24-10-5 23-9-5 25-9-5							820 82J					
45	22-8-5 21-8-5 18-6-5 19-7-5 18-7-5 20-7-5 23-8-5		20-8-5 19-6-5 21-7-5 21-9-5 22-7-5 22-9-5 18-5-5				82J 820						
46	28-10-5 27-9-5 26-9-5 25-9-5 16-6-5 17-7-5 28-9-5 17-5-5 21-6-5 16-5-5 20-7-5 21-7-5 27-10-5 14-6-5 18-5-5 15-6-5 22-7-5 28-11-5 20-6-5 17-6-5 29-11-5 14-3-5 26-10-5 15-4-5 15-5-5 16-4-5 25-10-5 13-3-5 13-6-5 14-5-5 25-8-5 22-8-5 27-8-5 29-9-5 29-10-5 16-7-5 19-5-5 18-7-5 18-6-5 26-8-5							82J 820					
47	8-2-4 7-1-4 8-1-4 8-3-4 7-2-4 7-3-4 9-2-4							72E					
48	9-1-4 8-4-4 9-3-4 6-1-4 6-3-4												
49	11-3-5 12-2-5 12-3-5 11-2-5 13-3-5 13-2-5 10-3-5							82G 82J					
50	11-2-5 12-2-5 10-2-5 10-3-5 11-3-5 11-1-5							82G 82J					
51	17-3-5 19-3-5 19-4-5 18-4-5 18-3-5 17-2-5							82J					
52	28-8-5							820					
53	35-7-5 35-6-5							820 83B					
54	35-6-5							83B					
55	37-10-5 36-11-5 37-11-5 36-10-5							83B					
56	38-8-5 38-7-5							83B					
57	38-9-5							83B					
58	39-13-5 39-12-5 38-13-5							83B					
59	39-8-5							83B					
60	41-12-5							83B					
61	44-4-5							83B					
62	44-15-5							83C					
	45-16-5 44-16-5 45-17-5 44-17-5							83C					

Appendix 9

ESA	Alberta Township System (ATS)	National Topographic System (NTS)
63	45-10-5 45-11-5	83B
64	45-11-5	83B
65	47-10-5	83G
66	47-20-5 48-20-5 47-19-5 48-19-5	83F
67	47-21-5	83F
68	50-21-5 49-21-5	83F
69	50-15-5 50-14-5 51-14-5 51-15-5	83F
70	52-21-5 52-22-5	83F
71	53-17-5	83F
72	53-19-5	83F
73	54-21-5	83F
74	55-15-5	83F
75	56-18-5	83F
76	57-4-6 57-5-6	83E
77	58-12-5	83J
78	58-27-5 58-1-6	83K 83L
79	59-26-5 58-26-5	83K
80	59-15-5 59-16-5 60-16-5 60-15-5	83K
81	59-26-5 59-27-5 59-1-6	83K 83L
82	60-21-5 59-21-5 60-20-5 59-20-5	83K
83	60-14-5 60-13-5	83J 83K
84	60-19-5 61-19-5 60-20-5 61-20-5	83K
85	60-3-6	83L
86	60-4-6 60-5-6 59-5-6	83L
87	62-20-5 62-21-5 62-19-5 63-21-5 61-20-5 61-21-5 62-22-5 61-19-5 63-20-5 62-18-5	83K
88	63-24-5	83K
89	64-13-5 65-13-5	83J
90	66-10-5 67-10-5 67-9-5	83J
91	64-13-6 64-12-6 63-12-6 63-13-6 65-13-6	83L
92	65-12-6	83L
93	66-11-6 66-10-6	83L
94	67-7-5	83J

ESA	Alberta Township System (ATS)							National Topographic System (NTS)		
95	67-12-5	64-15-5	65-15-5	66-12-5	64-14-5	65-16-5	67-13-5	83K	83J	
	65-14-5	66-14-5	67-15-5	67-16-5	66-13-5	67-11-5	68-12-5			
	67-14-5	68-13-5	63-14-5	66-15-5	64-16-5	65-12-5	63-15-5			
	66-11-5	65-13-5	62-14-5	68-11-5	65-11-5	66-16-5	67-10-5			
	68-16-5	65-17-5	67-17-5	63-16-5	68-15-5	64-17-5	66-10-5			
	68-17-5									
96	68-19-5	68-18-5						83K		
97	68-8-5	69-8-5						83J		
98	75-5-5	75-4-5						830		
99	60-8-5	61-7-5	60-14-5	50-27-5	58-20-5	60-13-5	51-25-5	83J	83F	83K
	59-11-5	57-21-5	60-12-5	60-17-5	61-6-5	55-22-5	52-23-5			
	53-23-5	60-9-5	52-24-5	54-22-5	60-11-5	58-19-5	59-18-5			
	50-26-5	59-13-5	56-22-5	59-19-5	60-10-5	60-16-5	51-26-5			
	60-15-5	59-12-5	61-15-5	59-10-5	59-9-5	53-22-5	60-7-5			
	57-20-5	60-18-5	61-16-5	62-6-5	51-24-5	61-5-5	56-21-5			
	62-5-5									
100	39-14-5	39-13-5	40-14-5	40-13-5				83B		
101	40-8-5	40-7-5						83B		
102	53-21-5	53-22-5	52-22-5	52-21-5				83F		
103	66-13-5	66-14-5	67-13-5					83J		
104	55-21-5	54-20-5	53-19-5	55-20-5	54-22-5	53-20-5	55-22-5	83F		
105	62-12-6							83L		
106	55-26-5	55-27-5	56-26-5	54-27-5				83F		
107	51-19-5	52-19-5	51-20-5	52-20-5				83F		
108	61-11-5	61-12-5						83J		
109	41-17-5	42-17-5	41-16-5	40-16-5				83C		
110	52-26-5	51-26-5	53-26-5	53-27-5	52-27-5			83F		
111	64-5-6	64-4-6						83L		
112	71-7-5	70-7-5	70-6-5	70-5-5	71-8-5	71-6-5	70-8-5	830	83J	
	69-5-5	69-6-5	69-8-5	69-7-5	72-7-5	71-5-5	72-8-5			
	70-4-5	72-6-5	69-4-5							
113	44-20-5	44-19-5	45-19-5	43-20-5	45-20-5			83C		
114	54-26-5	55-25-5	55-26-5	53-26-5				83F		
115	1-21-4	1-22-4	1-20-4					82H		
116	1-25-4	1-26-4	2-25-4					82H		

Appendix 9

ESA	Alberta Township System (ATS)								National Topographic System (NTS)		
117	15-12-4	24-8-4	18-8-4	24-17-4	14-12-4	24-10-4	37-24-4		72M	72L	83A
	23-9-4	35-22-4	14-11-4	35-18-4	24-16-4	14-10-4	25-10-4		82P	73D	82I
	36-24-4	23-10-4	25-9-4	34-20-4	39-7-4	23-8-4	25-11-4		72E	73E	82H
	27-16-4	19-11-4	25-8-4	19-7-4	33-12-4	22-11-4	24-9-4		83H	83B	
	24-4-4	18-21-4	34-12-4	19-23-4	8-6-4	43-20-4	17-7-4				
	33-3-4	17-11-4	33-13-4	32-2-4	37-25-4	30-7-4	29-12-4				
	13-11-4	23-11-4	15-11-4	34-11-4	12-15-4	19-8-4	27-11-4				
	20-7-4	35-19-4	39-8-4	33-11-4	38-9-4	27-17-4	16-11-4				
	32-4-4	34-13-4	24-7-4	37-16-4	11-2-4	18-12-4	24-11-4				
	23-17-4	19-22-4	26-11-4	37-12-4	27-6-4	32-5-4	42-19-4				
	33-4-4	34-5-4	18-9-4	20-16-4	33-6-4	30-1-4	14-9-4				
	36-17-4	30-3-4	26-13-4	30-4-4	31-1-4	24-19-4	32-3-4				
	52-11-4	14-8-4	27-14-4	27-10-4	30-6-4	16-8-4	15-8-4				
	31-7-4	36-23-4	26-7-4	18-7-4	44-12-4	22-10-4	26-8-4				
	32-12-4	31-10-4	35-23-4	36-25-4	25-13-4	13-10-4	19-12-4				
	37-5-4	33-2-4	13-20-4	35-25-4	33-5-4	32-11-4	37-23-4				
	29-14-4	37-1-4	10-5-4	42-21-4	32-10-4	27-15-4	49-7-4				
	31-8-4	41-18-4	30-8-4	37-9-4	34-22-4	35-16-4	25-1-4				
	6-7-4	27-1-4	9-3-4	43-19-4	18-5-4	18-11-4	36-8-4				
	26-15-4	2-11-4	3-18-4	48-3-4	13-12-4	34-4-4	38-3-4				
	18-6-4	26-18-4	23-20-4	35-24-4	21-13-4	16-9-4	23-7-4				
	37-2-4	28-13-4	23-12-4	37-7-4	13-9-4	26-14-4	30-17-4				
	34-6-4	30-9-4	30-15-4	43-23-4	33-7-4	35-5-4	28-15-4				
	26-1-4	28-8-4	28-14-4	27-13-4	11-4-4	11-3-4	16-12-4				
	23-16-4	36-18-4	16-17-4	40-7-4	25-14-4	13-21-4	26-6-4				
	28-2-4	17-12-4	18-20-4	29-17-4	17-14-4	35-12-4	42-11-4				
	12-14-4	39-2-4	20-10-4	29-13-4	21-20-4	17-21-4	43-10-4				
	25-4-4	13-14-4	31-6-4	16-7-4	25-7-4	20-9-4	36-10-4				
	36-7-4	6-6-4	29-2-4	27-12-4	30-13-4	29-3-4	42-10-4				
	44-19-4	32-1-4	21-12-4	2-12-4	30-5-4	20-18-4	31-11-4				
	9-8-4	5-12-4	15-10-4	28-4-4	30-2-4	43-11-4	19-18-4				
	24-18-4	15-13-4	30-11-4	22-12-4	28-11-4	12-12-4	17-18-4				
	8-17-4	29-4-4	32-13-4	23-15-4	12-19-4	42-18-4	35-1-4				
	19-19-4	37-17-4	7-13-4	54-12-4	20-13-4	29-6-4	6-24-4				
	34-23-4	40-2-4	28-16-4	28-6-4	31-16-4	43-21-4	48-13-4				
	13-15-4	50-14-4	1-7-4	26-10-4	28-12-4	18-14-4	7-7-4				
	43-22-4	20-8-4	15-7-4	36-1-4	29-5-4	17-8-4	7-24-4				
	19-20-4	46-1-4	24-3-4	28-1-4	36-9-4	27-5-4	32-7-4				
	38-1-4	38-1-5	7-9-4	34-3-4	7-17-4	57-18-4	39-4-4				
	39-12-4	10-6-4	20-5-4	6-1-4	7-6-4	18-18-4	23-13-4				
	7-8-4	19-5-4	15-9-4	2-13-4	38-7-4	49-14-4	28-7-4				
	21-7-4	7-14-4	31-12-4	26-12-4	29-18-4	42-6-4	30-16-4				
	9-2-4	39-1-4	38-2-4	25-16-4	18-13-4	29-1-4	26-9-4				
	35-11-4	30-10-4	37-8-4	41-10-4	21-17-4	29-15-4	38-8-4				
	18-2-4	26-19-4	14-13-4	31-15-4	35-17-4	19-10-4	8-9-4				
	19-17-4	20-12-4	33-20-4	57-17-4	11-12-4	18-3-4	37-6-4				
	37-13-4	45-1-4									
118	2-20-4								82H		
119	1-1-4								72E		
120	2-27-4								82H		
121	2-28-4								82H		

ESA	Alberta Township System (ATS)					National Topographic System (NTS)	
139	4-28-4					82H	
140	4-19-4					82H	
141	4-21-4	3-21-4				82H	
142	3-5-4					72E	
143	3-4-4	3-5-4				72E	
144	3-3-4	3-2-4				72E	
145	4-19-4					82H	
146	4-11-4					72E	
147	5-19-4					82H	
148	4-24-4	5-24-4	4-25-4	3-25-4	5-23-4	82H	
149	4-5-4					72E	
150	4-3-4	4-2-4				72E	
151	5-20-4					82H	
152	5-17-4	5-18-4				82H	
153	5-14-4	5-15-4				72E	
154	5-23-4					82H	
155	5-26-4					82H	
156	5-13-4	5-14-4				72E	
157	6-18-4	5-18-4				82H	
158	4-1-4	5-1-4				72E	
159	5-3-4					72E	
160	6-1-5					82G	
161	5-11-4	6-11-4				72E	
162	5-2-4					72E	
163	7-19-4					82H	
164	4-1-4 6-2-4	5-1-4 5-3-4	5-2-4	3-1-4	4-2-4	6-1-4 3-2-4	72E
165	6-12-4						72E
166	6-10-4	6-11-4					72E
167	6-1-4						72E
168	7-21-4	6-21-4					82H
169	6-3-4	6-2-4	5-2-4				72E
170	7-10-4	6-10-4					72E
171	7-15-4	7-14-4					72E
172	7-5-4	6-5-4					72E

Appendix 9

ESA	Alberta Township System (ATS)					National Topographic System (NTS)	
173	7-14-4					72E	
174	7-7-4					72E	
175	8-7-4 8-8-4 7-8-4 7-7-4					72E	
176	9-16-4					82H	
177	8-6-4 8-7-4 9-6-4 9-7-4					72E	
178	8-5-4 10-5-4 9-5-4 8-4-4 7-5-4 9-4-4 7-4-4 9-6-4					72E	
179	9-12-4					72E	
180	10-1-5					82G	
181	10-12-4					72E	
182	9-6-4 10-6-4 9-7-4 10-7-4					72E	
183	10-28-4 10-29-4 11-28-4 11-29-4 11-27-4 10-27-4					82H	
184	11-1-5 10-1-5					82G	
185	9-8-4 9-7-4 10-8-4 10-7-4					72E	
186	10-15-4 10-16-4 10-14-4 11-14-4					82H 72E	
187	11-1-5					82G	
188	11-25-4					82H	
189	10-6-4					72E	
190	10-7-4					72E	
191	12-28-4 12-29-4 13-28-4 13-29-4 11-29-4 11-28-4					82I 82H	
192	11-23-4					82H	
193	12-28-4 11-28-4					82H	
194	12-29-4 11-29-4					82H	
195	11-6-4 11-5-4					72E	
196	11-1-4 10-1-4 11-2-4					72E	
197	12-8-4					72E	
198	12-1-4 11-1-4					72E 72L	
199	11-3-4 12-3-4					72E	
200	13-22-4					82I	
201	13-14-4 12-14-4					72L	
202	13-1-4 14-1-4 12-1-4 13-2-4 15-1-4					72L	
203	13-6-4					72L	
204	12-2-4 13-2-4					72L 72E	
205	14-28-4					82I	
206	14-17-4					82I	

ESA	Alberta Township System (ATS)				National Topographic System (NTS)		
207	14-29-4	13-29-4				82I	
208	14-9-4	14-8-4	13-8-4	13-9-4		72L	
209	15-27-4					82I	
210	14-9-4	14-10-4				72L	
211	14-3-4					72L	
212	15-28-4	15-29-4				82I	
213	15-14-4					72L	
214	15-17-4					82I	
215	16-29-4					82I	
216	15-8-4	15-7-4				72L	
217	15-9-4	16-9-4	15-10-4			72L	
218	16-26-4					82I	
219	16-12-4					72L	
220	16-17-4	15-17-4	16-18-4			82I	
221	17-15-4	16-15-4	17-14-4	16-14-4	18-15-4	15-15-4	18-14-4
222	16-17-4	17-17-4				82I	
223	16-7-4	16-8-4	16-6-4			72L	
224	17-19-4					82I	
225	15-3-4	16-3-4	16-4-4	15-4-4		72L	
226	16-9-4	16-10-4				72L	
227	16-11-4	16-12-4	17-12-4	17-11-4		72L	
228	17-10-4	17-9-4				72L	
229	17-15-4	17-16-4	16-15-4			82I	
230	17-13-4					72L	
231	17-2-4	17-1-4				72L	
232	17-8-4					72L	
233	17-9-4	17-10-4				72L	
234	18-29-4					82I	
235	18-29-4	19-29-4				82I	
236	18-29-4					82I	
237	18-27-4	18-28-4	19-27-4	19-28-4		82I	
238	14-20-4	14-21-4	15-21-4	18-22-4	17-21-4	16-21-4	18-21-4
	15-22-4	14-22-4	19-22-4	19-21-4	17-22-4	15-20-4	13-20-4
239	18-10-4					72L	
240	18-12-4					72L	

Appendix 9

ESA	Alberta Township System (ATS)					National Topographic System (NTS)		
241	19-13-4					72L		
242	19-12-4	18-12-4				72L		
243	19-16-4	19-15-4				82I		
244	19-1-4	18-1-4				72L		
245	19-5-4	19-4-4				72L		
246	19-8-4	19-9-4				72L		
247	20-15-4					72L	82I	
248	19-1-4	18-1-4				72L		
249	20-8-4					72L		
250	19-6-4	19-7-4	20-7-4	20-6-4	19-5-4	72L		
251	21-8-4	21-7-4				72L		
252	21-8-4	21-9-4				72L		
253	22-18-4					82I		
254	22-27-4	23-26-4	23-27-4			82I		
255	21-3-4	22-3-4	21-2-4			72L		
256	22-17-4					82I		
257	23-17-4					82I		
258	32-10-4 23-13-4	35-4-4 25-5-4	28-13-4 32-9-4	48-13-4 34-4-4	43-23-4 28-14-4	28-14-4 43-22-4	72M 72L	83A 73E
259	23-13-4						72L	
260	23-24-4	24-24-4	23-25-4	22-23-4	23-23-4	22-24-4	24-25-4	82I 82P
261	24-9-4	23-9-4					72M	72L
262	25-17-4	26-17-4					82P	
263	26-26-4						82P	
264	26-17-4	25-17-4					82P	
265	25-3-4	24-3-4	25-4-4				72M	
266	27-26-4						82P	
267	26-9-4	26-10-4	27-9-4				72M	
268	28-28-4	27-28-4					82P	
269	28-14-4	29-14-4					72M	
270	29-16-4	29-15-4					82P	
271	29-18-4	30-18-4					82P	
272	30-28-4						82P	
273	29-10-4	29-11-4					72M	

ESA	Alberta Township System (ATS)								National Topographic System (NTS)		
274	32-15-4 34-17-4	33-16-4 31-14-4	34-16-4 33-15-4	32-16-4 34-18-4	33-17-4 33-18-4	32-14-4	31-15-4		82P	72M	
275	33-9-4 33-11-4	33-8-4 34-8-4	33-10-4	34-10-4	34-9-4	32-8-4	32-9-4		72M		
276	33-20-4							82P			
277	34-1-4							72M			
278	33-4-4	34-4-4	33-5-4					72M			
279	35-2-4	36-2-4	34-2-4	35-3-4	36-1-4	34-3-4	35-1-4	73D	72M		
280	36-7-4							73D			
281	35-14-4 33-14-4	34-14-4 33-15-4	34-15-4	36-15-4	36-14-4	35-15-4	37-15-4	72M 82P	73D	83A	
282	37-9-4							73D			
283	36-6-4	36-5-4	37-6-4					73D			
284	37-7-4	37-8-4						73D			
285	37-6-4							73D			
286	15-5-4 15-7-4	15-6-4 16-4-4	15-4-4 14-3-4	14-5-4 16-5-4	14-4-4	14-6-4	14-7-4	72L			
287	19-3-4 18-3-4 21-5-4 19-5-4	20-3-4 20-1-4 17-3-4	18-4-4 20-4-4 19-1-4	20-2-4 21-3-4 17-4-4	21-1-4 22-1-4 18-5-4	19-2-4 21-4-4 21-2-4	19-4-4 20-5-4 18-2-4	72L			
288	23-5-4 22-3-4 23-14-4 23-3-4 25-15-4 26-17-4 23-15-4 21-3-4	22-5-4 22-7-4 24-15-4 22-8-4 23-2-4 24-5-4 24-14-4 21-14-4 21-13-4	21-6-4 22-14-4 22-8-4 22-2-4 20-5-4 20-10-4 20-12-4 20-14-4 21-8-4	22-9-4 23-1-4 23-6-4 21-12-4 23-8-4 26-16-4 24-1-4 24-1-4 25-14-4	23-7-4 21-10-4 22-13-4 21-9-4 24-4-4 25-16-4 22-1-4 22-1-4 24-6-4	22-4-4 23-4-4 21-4-4 22-10-4 21-11-4 21-7-4 27-17-4 26-18-4	22-6-4 21-5-4 22-12-4 20-6-4 20-11-4 24-7-4 22-15-4 22-15-4	72L	72M	82P	
289	18-19-4 12-12-4 25-3-5 14-14-4 12-11-4 17-19-4 26-5-5 26-4-5 21-28-4 12-9-4 25-6-5 26-3-5	21-22-4 21-20-4 21-23-4 13-8-4 16-16-4 21-26-4 21-25-4 17-18-4 25-4-5 12-5-4 23-29-4 18-17-4	11-13-4 13-11-4 11-14-4 12-10-4 18-20-4 11-12-4 21-27-4 22-23-4 15-15-4 22-1-5 11-16-4 27-19-4	19-18-4 21-19-4 11-11-4 21-21-4 13-7-4 14-15-4 25-2-5 13-13-4 22-25-4 20-21-4 10-14-4 27-21-4	19-19-4 13-5-4 13-9-4 13-10-4 23-1-5 13-6-4 12-7-4 20-20-4 17-16-4 13-14-4 22-22-4	20-19-4 12-8-4 17-17-4 22-24-4 11-15-4 26-6-5 24-2-5 12-13-4 14-16-4 20-18-4 21-29-4	24-1-5 15-16-4 22-29-4 18-18-4 13-12-4 14-5-4 12-6-4 22-28-4 14-13-4 14-4-4 24-29-4	82I 820 82P	72L 82J	72E 82H	
290	28-19-4 27-20-4 29-19-4	27-18-4 29-21-4 27-19-4	28-18-4 28-17-4 27-19-4	29-20-4 28-20-4 27-22-4	27-21-4 30-21-4 31-21-4	27-17-4 29-17-4		82P			

Appendix 9

ESA	Alberta Township System (ATS)							National Topographic System (NTS)	
291	8-22-4 9-28-4 9-21-4 7-27-4	7-28-4 9-26-4 8-26-4 10-22-4	10-24-4 9-25-4 10-23-4 10-27-4	8-27-4 8-28-4 10-21-4 10-27-4	9-27-4 10-25-4 9-29-4 10-28-4	9-22-4 9-24-4 10-28-4 8-23-4	9-23-4 8-21-4 8-23-4 8-23-4	82H	
292	16-5-4 17-3-4 15-7-4	17-5-4 15-6-4 17-2-4	17-6-4 18-7-4 17-8-4	17-4-4 16-3-4 16-7-4	16-6-4 18-6-4 18-4-4	16-4-4 18-5-4 16-2-4	17-7-4 15-5-4 16-2-4	72L	
293	13-5-4	14-5-4	13-4-4						72L
294	11-19-4 10-16-4	10-17-4 12-16-4	10-21-4 11-18-4	11-16-4	10-20-4	10-18-4	10-19-4	82H	
295	11-16-4	11-15-4							82H
296	6-4-4 5-4-4	7-4-4 5-2-4	6-3-4	5-3-4	7-3-4	7-5-4	6-5-4	72E	
297	5-8-4 5-9-4	4-7-4 3-9-4	5-7-4 4-6-4	3-8-4 3-6-4	4-8-4 6-7-4	3-7-4	6-8-4	72E	
298	1-19-4 2-15-4 1-20-4	2-19-4 2-21-4 1-14-4	2-20-4 2-17-4 2-18-4	2-16-4 2-13-4	3-20-4 3-19-4	1-18-4 1-15-4	2-14-4 3-21-4	82H	72E
299	1-12-4 3-6-4 1-7-4 4-6-4 3-8-4	2-8-4 2-4-4 1-10-4 2-12-4	2-9-4 1-5-4 2-11-4 1-6-4	2-5-4 1-3-4 3-5-4 2-13-4	2-7-4 1-9-4 1-11-4 3-10-4	2-10-4 1-4-4 1-13-4 1-2-4	1-8-4 2-6-4 3-7-4 3-4-4	72E	
300	5-6-4 4-7-4	5-7-4 6-7-4	5-5-4	4-6-4	6-6-4	4-5-4	6-5-4	72E	
301	9-24-4	6-25-4	8-25-4	7-25-4	8-24-4	9-23-4	7-24-4	82H	
302	1-23-4	1-22-4							82H
303	16-14-4	15-14-4							72L
304	4-4-4 3-4-4	4-3-4 6-4-4	5-4-4 2-2-4	3-3-4	5-5-4	4-5-4	2-3-4	72E	
305	21-11-4	21-12-4	21-10-4	20-11-4	20-12-4	20-10-4			
306	9-27-4	9-28-4							82H
307	33-19-4	34-19-4	33-18-4	34-18-4	33-20-4	34-20-4			
308	23-1-5	22-1-5	22-29-4	23-2-5	23-29-4				
309	3-22-4 2-21-4	2-22-4 4-22-4	3-23-4 1-21-4	2-23-4	1-23-4	1-22-4	3-21-4	82H	
310	1-4-4 3-2-4	1-7-4	2-3-4	2-2-4	1-6-4	3-3-4	1-3-4	72E	
311	1-6-4							72E	
312	1-6-4	1-5-4	2-6-4						
313	28-17-4	28-16-4							82P

ESA	Alberta Township System (ATS)								National Topographic System (NTS)		
314	2-18-4 4-18-4	3-18-4	2-17-4	3-17-4	1-18-4	1-19-4	2-19-4		82H		
315	17-3-4	16-3-4	18-3-4	17-4-4	16-4-4				72L		
316	1-13-4	1-12-4	2-13-4						72E		
317	7-29-4	7-1-5	7-30-4	8-1-5	7-28-4				82H	82G	
318	20-11-4	21-12-4	21-10-4	21-11-4	20-12-4	22-12-4	20-10-4		72L		
319	23-1-4								72L		
320	7-27-4 41-24-4 2-26-4 13-29-4 42-25-4 39-11-4 35-1-5 40-2-4 43-4-4 3-29-4	6-27-4 3-27-4 56-18-4 53-10-4 6-1-5 16-1-5 13-30-4 46-22-4 41-4-4	15-29-4 35-20-4 3-26-4 55-5-4 3-28-4 14-30-4 38-24-4 51-11-4 14-29-4	52-12-4 47-8-4 1-26-4 51-10-4 42-10-4 38-24-4 37-18-4 55-4-4 52-11-4	52-10-4 46-12-4 6-28-4 44-5-4 40-4-4 37-3-4 50-27-4 35-24-4 58-19-4	40-5-4 35-23-4 57-17-4 44-4-4 34-20-4 53-19-4 41-19-4 57-19-4 44-1-4	45-12-4 42-24-4 53-13-4 47-27-4 8-27-4 2-28-4 2-29-4 44-2-4 50-22-4		82H 83A 82P 83B	73E 82I 82G	73D 83H 82J
321	14-2-5								82J		
322	15-2-5	16-2-5							82J		
323	20-2-5								82J		
324	20-1-5								82J		
325	20-2-5								82J		
326	23-2-5	23-1-5							82J	820	
327	24-2-5	24-3-5							820		
328	25-1-5								820		
329	26-4-5	26-3-5							820		
330	28-3-5								820		
331	30-1-5	31-1-5							820		
332	32-28-4								82P		
333	34-28-4								82P		
334	34-1-5								820		
335	34-27-4								82P		
336	36-23-4	35-23-4	35-22-4	36-22-4					83A		
337	36-25-4	36-26-4	35-25-4						83A		
338	37-23-4								83A		
339	37-25-4	37-26-4	36-25-4	36-26-4					83A		
340	37-4-4	36-4-4	36-3-4	37-3-4	36-2-4	36-5-4	37-5-4		73D		
341	39-1-4								73D		

Appendix 9

ESA	Alberta Township System (ATS)								National Topographic System (NTS)	
342	39-11-4 39-12-4 40-13-4 39-13-4 39-10-4 40-11-4 40-10-4								73D	
	38-12-4									
343	40-23-4								83A	
344	40-23-4								83A	
345	39-5-4 39-6-4 40-5-4 39-4-4 40-4-4								73D	
346	40-14-4 40-15-4 40-13-4 40-16-4								83A	73D
347	39-3-4 40-3-4 39-4-4								73D	
348	40-7-4 40-6-4								73D	
349	41-12-4 40-12-4								73D	
350	40-6-4 40-5-4								73D	
351	41-17-4								83A	
352	41-14-4								73D	
353	41-14-4								73D	
354	41-20-4 40-21-4 41-21-4 40-20-4 40-22-4 41-19-4 40-19-4 39-21-4 39-22-4								83A	
355	41-16-4 41-17-4 40-16-4								83A	
356	42-26-4 42-25-4								83A	
357	42-18-4								83A	
358	42-20-4 42-19-4								83A	
359	42-26-4								83A	
360	41-9-4 42-9-4								73D	
361	42-11-4 42-12-4 41-11-4								73D	
362	40-9-4 41-9-4 41-10-4 40-10-4 39-9-4 42-10-4 42-9-4 39-8-4 38-9-4 39-10-4 40-8-4 38-8-4								73D	
363	42-17-4 43-17-4								83A	
364	43-24-4								83A	
365	43-22-4								83A	
366	43-21-4 43-22-4								83A	
367	43-23-4								83A	
368	43-9-4 42-9-4								73D	
369	43-22-4								83A	
370	44-27-4								83A	
371	44-19-4 43-18-4 44-18-4								83A	
372	43-9-4								73D	
373	43-5-4 43-4-4 44-5-4								73D	
374	45-23-4								83A	

ESA	Alberta Township System (ATS)							National Topographic System (NTS)	
375	45-19-4 44-19-4							83A	
376	44-10-4							73D	
377	44-1-4 44-2-4							73D	
378	44-7-4 45-7-4	43-7-4 42-8-4	43-6-4 44-8-4	42-7-4 42-6-4	43-8-4	44-6-4	43-5-4	73D	
379	45-22-4 46-22-4 45-23-4							83A	
380	45-15-4	44-15-4	45-14-4					83A	
381	45-8-4	45-7-4						73D	
382	45-11-4							73D	
383	46-25-4	45-25-4	46-26-4	45-26-4				83A	
384	46-20-4	45-20-4	46-21-4	45-21-4				83A	
385	45-2-4	45-1-4	45-3-4					73D	
386	45-5-4	45-6-4	46-5-4	46-6-4				73D	
387	45-7-4	46-7-4	46-6-4	45-6-4				73D	
388	47-7-4	46-7-4						73E	73D
389	47-11-4	47-12-4						73E	
390	47-23-4	48-23-4	46-23-4					83H	83A
391	47-5-4 46-3-4	47-4-4	46-4-4	47-6-4	48-5-4	46-6-4	46-5-4	73E	73D
392	48-19-4							83H	
393	47-2-4	48-2-4	47-1-4					73E	
394	48-4-4	48-3-4						73E	
395	49-24-4							83H	
396	48-1-4							73E	
397	49-24-4							83H	
398	49-5-4	48-5-4	49-6-4	48-6-4				73E	
399	49-4-4	49-3-4	48-4-4					73E	
400	50-11-4	50-12-4						73E	
401	50-12-4	50-11-4						73E	
402	51-26-4							83H	
403	50-4-4	50-3-4						73E	
404	52-13-4							73E	
405	52-10-4	52-9-4						73E	
406	53-22-4							83H	
407	54-5-4							73E	

Appendix 9

ESA	Alberta Township System (ATS)						National Topographic System (NTS)			
408	54-13-4 54-14-4 55-13-4 55-14-4 54-12-4						73E			
409	55-6-4 54-6-4						73E			
410	56-16-4 56-15-4 55-15-4 57-16-4						83H			
411	71-5-6						83M			
412	73-4-6						83M			
413	81-26-5 81-1-6						84C	84D		
414	38-5-4	38-6-4	37-4-4	37-5-4	38-4-4	37-6-4	73D			
415	38-21-4	37-21-4	37-20-4	38-20-4	39-21-4	39-20-4	36-20-4	83A		
	36-21-4	39-19-4								
416	37-22-4	38-22-4	38-24-4	35-21-4	36-22-4	38-23-4	36-21-4	83A	82P	83B
	38-25-4	34-21-4	38-26-4	38-27-4	39-26-4	37-28-4	36-28-4			
	37-21-4	39-27-4	33-22-4	36-1-5	36-2-5	32-21-4	38-28-4			
	35-1-5	34-22-4	39-22-4	35-22-4	33-21-4	39-23-4	32-22-4			
	31-21-4	38-21-4	35-2-5							
417	43-3-4	42-3-4	43-4-4	43-2-4	44-3-4	42-4-4	44-4-4	73D		
418	34-19-4						82P			
419	42-1-4	43-1-4	41-1-4	41-2-4	42-2-4		73D			
420	32-21-4	31-21-4	35-21-4	33-22-4	30-21-4	34-22-4	36-21-4	82P	83A	
	37-22-4	36-22-4	34-21-4	33-21-4						
421	34-21-4	33-22-4	34-22-4				82P			
422	53-26-4	53-25-4					83H			
423	42-5-4	41-5-4	42-4-4				73D			
424	41-1-4	42-1-4					73D			
425	51-18-4	52-18-4	51-17-4	52-17-4	50-18-4	53-17-4	53-18-4	83H		
	50-17-4									
426	25-3-5	25-4-5	26-3-5				820			
427	33-3-5						820			
428	36-6-5	36-5-5					83B			
429	42-1-5						83B			
430	43-2-5						83B			
431	43-2-5						83B			
432	44-1-5						83B			
433	44-2-5						83B			
434	45-1-5						83B			
435	46-6-5	46-5-5	47-6-5				83B	83G		
436	47-1-5	46-1-5	46-28-4	47-2-5	47-28-4	47-27-4	83G	83H	83A	
							83B			
437	48-27-4						83H			

ESA	Alberta Township System (ATS)							National Topographic System (NTS)	
438	51-6-5							83G	
439	51-20-4							83H	
440	52-2-5							83G	
441	53-6-5	54-5-5	52-7-5	53-7-5	53-5-5	52-6-5	54-6-5	83G	
442	53-5-5	52-4-5	53-4-5	52-5-5	53-3-5	52-3-5		83G	
443	53-1-5	53-2-5						83G	
444	53-7-5	53-8-5						83G	
445	54-1-5							83G	
446	53-12-4							73E	
447	54-28-4	55-27-4	54-27-4					83H	83G
448	54-10-5	53-9-5	54-9-5	55-10-5	53-10-5	54-11-5		83G	
449	54-1-5	55-1-5	54-2-5					83G	
450	54-3-5	54-4-5	55-3-5	55-4-5	54-2-5			83G	
451	55-1-5							83G	
452	55-4-5							83G	
453	55-5-5	56-5-5						83G	
454	55-21-4							83H	
455	56-21-4							83H	
456	56-6-5	55-6-5						83G	
457	56-4-5	55-4-5	57-4-5					83G	
458	56-13-4							73E	
459	56-8-4							73E	
460	57-3-5	57-4-5	56-3-5					83G	
461	56-10-4							73E	
462	56-1-4							73E	
463	57-3-5	57-2-5						83G	
464	57-1-5							83G	
465	58-22-4	58-23-4	57-22-4	57-23-4				83H	83I
466	58-6-5							83J	
467	57-10-4	57-9-4	58-9-4					73E	
468	58-6-5							83J	
469	57-3-4	56-3-4	57-2-4	58-3-4	56-2-4			73E	
470	58-13-4							73L	
471	58-13-4							73L	
472	58-15-4	58-14-4						83I	

Appendix 9

ESA	Alberta Township System (ATS)				National Topographic System (NTS)
473	59-12-4				73L
474	59-5-5	59-6-5			83J
475	58-6-4	59-6-4	59-5-4		73L
476	58-3-4				73L
477	59-8-5				83J
478	59-10-4				73L
479	59-7-4				73L
480	60-1-5				83J
481	59-13-4	60-13-4			73L
482	60-8-4				73L
483	60-11-4				73L
484	59-3-4	59-4-4	60-3-4		73L
485	60-12-4				73L
486	60-24-4	59-24-4	60-25-4	61-24-4	83I
487	60-15-4				83I
488	59-5-4	60-5-4	59-6-4	60-6-4	73L
489	61-12-4				73L
490	60-3-4				73L
491	61-12-4	60-12-4			73L
492	61-17-4	61-18-4			83I
493	61-15-4				83I
494	61-27-4	62-27-4			83I 83J
495	61-17-4				83I
496	61-5-4	61-4-4	61-6-4		73L
497	61-8-4				73L
498	61-5-4				73L
499	61-6-4	61-7-4	60-7-4	60-6-4	73L
500	61-12-4				73L
501	62-18-4				83I
502	62-13-4				73L
503	62-6-4	62-7-4	61-7-4	61-6-4	73L
504	63-22-4				83I
505	63-20-5				83K
506	63-7-4				73L
507	63-23-4				83I

ESA	Alberta Township System (ATS)				National Topographic System (NTS)			
508	64-6-5	63-6-5			83J			
509	64-26-4				83I			
510	63-4-4				73L			
511	63-6-4				73L			
512	63-11-4	64-11-4			73L			
513	64-14-4				83I			
514	63-6-4				73L			
515	63-4-4	63-5-4			73L			
516	63-3-4				73L			
517	64-8-4				73L			
518	64-4-4				73L			
519	64-6-4	63-6-4	64-7-4	63-7-4	73L			
520	65-18-4				83I			
521	64-3-4				73L			
522	65-2-5				83J			
523	65-16-4				83I			
524	65-4-4				73L			
525	66-22-4	66-23-4			83I			
526	65-11-4				73L			
527	66-22-4				83I			
528	65-5-4	65-6-4			73L			
529	65-21-5	64-21-5	66-21-5	66-22-5	83K			
530	65-3-4				73L			
531	66-17-4	66-18-4	65-17-4	65-18-4	83I			
532	66-5-5				83J			
533	65-4-4	66-4-4			73L			
534	66-24-4	67-24-4			83I			
535	65-25-5	66-25-5	66-26-5	64-25-5	65-26-5	67-25-5		
536	66-13-4	66-12-4	65-12-4			73L		
537	67-14-4					83I		
538	67-21-4					83I		
539	66-7-4	66-8-4	65-7-4	66-6-4	65-8-4	65-6-4	67-6-4	73L
540	67-24-4	68-24-4	67-23-4				83I	
541	68-21-4	67-21-4	68-20-4	67-20-4			83I	

Appendix 9

ESA	Alberta Township System (ATS)							National Topographic System (NTS)		
542	71-2-6	68-26-5	69-4-6	69-1-6	70-1-6	67-4-6	65-4-6	83L	83M	83K
	66-4-6	71-1-6	70-3-6	69-3-6	70-2-6	67-25-5	68-4-6	83N		
	67-1-6	69-26-5	68-1-6	71-3-6	69-27-5	68-5-6	65-3-6			
	72-2-6	68-27-5	67-26-5	70-27-5	67-2-6	71-26-5	70-4-6			
	64-4-6									
543	68-24-4	69-24-4						83I		
544	68-4-5	69-4-5	68-5-5					83J		
545	69-14-4							83I		
546	69-24-4							83I		
547	68-14-4	68-15-4	67-13-4	68-13-4	67-14-4	69-15-4	67-15-4	83I	73L	
	68-16-4	67-12-4	69-14-4	69-16-4	66-14-4					

ESA	Alberta Township System (ATS)								National Topographic System (NTS)		
548	105-8-6	126-1-6	118-23-5	103-7-6	105-7-6	104-8-6	124-23-5	84N	84A	84L	
	105-9-6	104-9-6	106-7-6	125-23-5	104-10-6	93-8-5	101-8-6	73M	84M	84E	
	78-20-4	88-16-4	120-22-5	93-19-4	124-22-5	82-24-4	105-12-6	84H	84G	84J	
	106-11-6	106-8-6	118-11-6	77-2-4	119-11-6	125-1-6	118-9-6	74D	83P	84B	
	126-23-5	103-12-6	106-3-5	120-11-6	88-20-4	94-16-4	106-12-6	74E	84K	73L	
	84-13-4	93-22-4	106-10-6	119-23-5	77-1-4	78-2-4	106-2-5	840	84C		
	75-21-4	104-7-6	124-1-6	83-15-4	123-23-5	102-9-6	121-22-5				
	105-10-6	120-20-5	95-3-5	83-3-5	121-1-6	122-1-6	121-19-5				
	85-19-4	93-4-4	88-3-4	88-21-4	79-1-4	103-8-6	124-2-6				
	74-21-4	123-22-5	123-1-6	76-1-4	78-1-4	95-23-4	102-7-6				
	102-8-6	72-8-4	121-21-5	118-10-6	105-11-6	81-23-4	85-6-5				
	91-19-4	116-17-5	70-2-4	81-24-4	97-8-5	80-10-4	79-2-4				
	91-21-4	87-19-4	103-11-6	97-7-5	89-21-4	121-20-5	122-23-5				
	80-7-4	84-14-4	95-16-4	104-11-6	91-20-4	76-3-4	101-7-6				
	83-13-4	119-22-5	111-11-5	83-12-4	85-15-4	87-20-4	77-3-4				
	79-20-4	113-3-5	84-18-4	69-2-4	103-5-6	83-23-4	88-19-4				
	106-1-5	75-3-4	83-8-4	122-20-5	118-24-5	90-21-4	94-17-4				
	87-2-4	96-3-5	106-5-5	103-21-4	89-20-4	83-2-5	88-15-4				
	94-4-4	125-18-5	73-17-4	104-6-6	102-12-6	119-9-6	125-22-5				
	84-8-4	82-23-4	123-2-6	103-22-4	84-3-5	117-1-6	119-8-6				
	95-20-4	115-15-5	107-5-5	115-17-5	106-9-6	93-20-4	120-8-6				
	116-12-5	111-13-5	85-14-4	74-3-4	73-1-4	91-24-4	85-20-4				
	85-10-4	103-9-6	92-19-4	73-7-4	82-16-4	71-2-4	75-2-4				
	103-6-6	91-25-4	120-21-5	72-2-4	124-19-5	80-11-4	69-5-4				
	82-8-4	84-2-5	97-3-5	84-19-4	86-6-5	100-8-6	86-20-4				
	95-19-4	79-7-4	113-8-5	96-7-5	78-21-4	122-24-5	120-19-5				
	83-4-5	96-2-5	94-23-4	126-18-5	119-18-5	102-6-6	74-2-4				
	112-13-5	94-8-5	117-9-6	72-7-4	112-8-5	86-2-4	93-9-5				
	84-15-4	112-4-5	113-17-5	72-1-4	97-2-5	88-14-4	92-24-4				
	90-20-4	103-10-6	116-11-5	105-6-6	112-3-5	106-4-5	121-12-6				
	120-23-5	124-18-5	87-16-4	96-1-5	102-22-4	104-12-6	98-8-5				
	102-5-6	112-15-5	76-2-4	112-7-5	107-2-5	83-24-4	95-22-4				
	70-1-4	69-1-4	73-2-4	80-2-4	83-14-4	107-3-5	113-11-5				
	85-21-4	92-4-4	126-2-6	75-20-4	124-10-5	95-14-4	92-21-4				
	118-22-5	111-12-5	95-15-4	72-9-4	122-22-5	92-18-4	117-24-5				
	93-18-4	89-15-4	106-6-6	74-1-4	88-25-5	84-23-4	96-2-6				
	84-17-4	92-8-5	97-1-5	125-2-6	123-10-5	91-23-4	68-5-4				
	110-11-5	107-11-6	85-5-5	81-10-4	124-21-5	119-20-5	75-1-4				
	119-19-5	84-20-4	85-13-4	94-20-4	84-12-4	86-14-4	118-8-6				
	92-2-5	122-21-5	117-11-6	70-8-4	120-18-5	120-12-6	92-14-4				
	119-15-5	88-24-5	93-21-4	71-3-4	113-2-5	102-21-4	94-3-5				
	85-18-4	92-23-4	100-24-4	93-3-4	83-11-4	95-2-5	82-15-4				
	89-16-4	92-7-4	94-22-4	84-6-5	101-9-6	122-2-6	93-5-4				
	126-3-6	94-19-4	98-4-4	74-14-4	117-23-5	117-10-6	68-6-4				
	122-19-5	84-9-4	73-8-4	74-17-4	93-7-5	96-1-6	86-5-5				
	69-6-4	88-6-5	99-24-4	122-7-6	94-21-4	90-24-5	121-24-5				
	102-11-6	71-1-4	75-18-4	107-4-5	115-1-5	115-2-5	80-1-4				
	80-8-4	112-14-5	81-6-5	94-9-5	107-10-6	87-3-4	111-7-5				
	92-20-4	101-20-4	81-4-5	110-12-5	83-17-4	123-5-6	100-23-4				
	81-11-4	73-6-4	90-19-4	107-12-6	82-12-4	100-7-6	84-10-4				
	73-21-4	95-21-4	98-2-5	122-5-6	83-9-4	123-4-6	88-2-4				
	96-15-4	85-9-4	81-2-4	82-4-5	102-20-4	82-17-4	95-17-4				
	70-5-4	120-9-6	87-23-4	90-13-4	85-16-4	69-8-4	100-1-5				
	89-23-4	121-23-5	74-18-4	118-16-5	122-4-6	101-5-5	70-6-4				
	92-25-4	89-19-4	94-7-5	123-18-5	84-4-5	123-19-5	99-25-4				
	88-23-5	125-19-5	102-13-6	86-3-4							

Appendix 9

ESA	Alberta Township System (ATS)							National Topographic System (NTS)							
549	70-21-5							83N							
550	70-27-4							83P							
551	70-10-4							73M							
552	70-25-5 70-24-5							83N							
553	68-8-4	69-7-4	69-8-4	70-8-4	70-7-4	67-8-4		73L	73M						
554	70-6-4	70-7-4						73M							
555	71-18-4							83P							
556	72-8-6 72-9-6 71-6-6 71-5-6	72-7-6 74-9-6 72-5-6	72-6-6 74-8-6 74-10-6	73-7-6 71-7-6 72-10-6	73-9-6 71-8-6 71-9-6	73-8-6 73-10-6 73-5-6	73-6-6 74-7-6 74-6-6	83M							
557	71-19-5	70-19-5	71-18-5						83N						
558	71-13-4	71-14-4	72-13-4						73M 83P						
559	72-4-4 73-5-4	71-5-4 70-4-4	71-4-4 70-5-4	72-5-4 72-7-4	71-6-4 71-7-4	72-6-4	73-4-4	73M							
560	71-10-6							83M							
561	67-1-4	68-1-4	69-1-4	70-1-4	66-1-4	67-2-4	71-1-4	73L	73M						
562	72-3-5	72-4-5	72-2-5	71-2-5	71-3-5				830						
563	72-1-5	72-2-5	73-1-5	73-2-5					830						
564	73-3-5							830							
565	72-3-4	73-3-4	71-3-4						73M						
566	73-3-5	73-4-5	74-3-5						830						
567	73-14-4	73-13-4	72-13-4	74-14-4	74-13-4			83P	73M						
568	74-11-4							73M							
569	74-19-5	74-18-5						83N							
570	75-17-5	74-18-5	75-18-5	74-17-5					83N						
571	74-9-4	73-9-4						73M							
572	74-25-5							83N							
573	75-22-4							83P							
574	75-8-5 74-9-5 73-7-5 73-12-5 73-9-5 72-5-5	75-7-5 73-6-5 75-11-5 73-5-5 76-8-5	74-11-5 74-10-5 75-10-5 74-5-5 76-6-5	74-12-5 75-9-5 74-14-5 73-8-5 72-6-5	74-8-5 75-12-5 74-6-5 75-5-5 76-7-5	74-7-5 75-13-5 75-14-5 73-13-5 76-10-5	74-13-5 73-11-5 75-6-5 73-10-5 76-9-5	830	83N						
575	75-12-4	74-12-4						73M							
576	74-4-4							73M							
577	74-11-6							83M							

ESA	Alberta Township System (ATS)							National Topographic System (NTS)	
578	74-4-4							73M	
579	74-7-4 74-6-4 75-6-4 74-8-4 75-7-4 73-8-4							73M	
580	74-12-6							83M	
581	75-15-5 75-14-5 76-14-5							83N	
582	75-21-5 74-20-5 74-21-5 76-22-5 75-22-5							83N	
583	75-4-4							73M	
584	77-24-5 76-24-5 76-25-5 76-26-5 76-23-5 74-2-6 73-2-6 75-2-6 76-2-6 72-2-6 77-23-5 75-1-6 76-1-6 75-25-5 75-3-6 76-22-5 75-26-5							83N	83M
585	76-6-4 76-7-4 77-6-4 76-5-4							73M	
586	79-10-5 79-9-5 80-10-5 80-11-5 80-9-5 80-8-5 78-9-5 78-10-5 79-11-5 79-8-5 78-11-5 80-12-5 79-12-5 81-10-5 78-8-5 80-7-5 77-11-5 81-11-5							830	
587	78-2-5 79-2-5							830	
588	78-3-6 78-4-6							83M	
589	79-21-5							83N	
590	79-10-4 79-11-4							73M	
591	80-19-5 79-19-5 80-18-5 80-20-5 79-18-5 79-20-5							83N	
592	80-25-4							83P	
593	80-13-4							73M	
594	78-6-5 79-6-5 79-7-5 79-4-5 78-7-5 80-6-5 80-4-5 78-4-5 77-6-5 80-5-5 78-5-5 79-3-5 79-5-5 80-3-5 77-7-5 81-7-5 78-3-5 80-7-5 77-5-5 81-6-5 81-4-5 81-5-5 81-3-5							830	84B
595	86-1-4 83-2-4 85-1-4 82-3-4 82-2-4 84-1-4 81-1-4 81-3-4 81-4-4 83-1-4 82-1-4 84-2-4 81-2-4 85-3-4 83-3-4 84-3-4 80-2-4 85-2-4 80-1-4 86-3-4 87-1-4 82-4-4 86-4-4 85-4-4 80-4-4 86-2-4							74D	73M
596	82-19-4 82-20-4							84A	
597	82-12-4							74D	
598	83-13-4 83-14-4							84A	
599	83-24-4 84-24-4							84A	
600	83-24-5 84-24-5 83-25-5 84-23-5 84-25-							84C	
601	85-15-4 85-16-4 84-15-4 84-16-4							84A	
602	84-25-5							84C	
603	84-6-6							84D	
604	84-7-4							74D	
605	84-4-4 84-3-4							74D	

Appendix 9

ESA	Alberta Township System (ATS)								National Topographic System (NTS)	
606	85-24-4 84-24-4								84A	
607	85-9-4								74D	
608	87-4-5								84B	
609	88-22-5								84C	
610	89-24-5	88-24-5	90-24-5	88-25-5	89-25-5	89-23-5	90-25-5		84C	
611	88-1-4								74D	
612	89-25-5	88-25-5							84C	
613	90-15-5	89-15-5							84C	
614	89-10-6	88-10-6	88-9-6	89-9-6					84D	
615	90-2-5								84B	
616	90-16-5	91-16-5							84C	
617	90-1-6	90-25-5	91-1-6	90-26-5					84D	84C
618	91-7-4	90-7-4							74D	
619	88-23-4	89-23-4	91-1-5	87-23-4	90-23-4	90-24-4	90-25-4		84A	84B
	91-2-5	92-2-5	91-3-5	91-24-4	91-25-4	92-3-5	87-24-4			
	88-24-4	92-1-5	91-23-4							
620	91-25-5	91-24-5	91-1-6	91-23-5	92-1-6				84C	84D
621	94-14-4	94-15-4	93-15-4	94-13-4	93-14-4	95-13-4	95-14-4		84H	
622	93-4-5	94-5-5	93-5-5	92-4-5					84G	
623	92-6-4	93-7-4	92-7-4	93-6-4	92-5-4	93-5-4	93-8-4		74E	74D
624	94-10-4								74E	
625	94-12-4								74E	
626	95-17-4								84H	
627	94-11-4	95-11-4	93-11-4	93-12-4	94-12-4				74E	
628	95-7-4								74E	
629	95-7-4	96-7-4							74E	
630	95-8-4	95-9-4	96-8-4						74E	
631	96-10-4								74E	
632	96-15-4								84H	
633	97-7-4								74E	
634	98-15-5	97-15-5							84F	
635	98-10-4								74E	
636	98-10-5								84G	
637	98-15-5	98-16-5							84F	
638	98-9-4	99-9-4							74E	

ESA	Alberta Township System (ATS)							National Topographic System (NTS)				
639	99-24-4 99-23-4 99-22-4 99-25-4 98-24-							84H				
640	97-4-5 98-4-5 98-3-5 99-2-5 99-3-5 99-4-5 97-5-5 98-5-5 98-2-5 100-2-5 96-5-5 98-7-5 96-4-5 99-1-5 98-6-5 99-6-5 97-3-5 100-1-5 98-1-5 99-5-5 99-7-5 96-6-5 100-3-5 100-4-5 98-8-5 100-5-5 97-6-5							84G				
641	101-5-5 100-4-5 101-4-5							84G				
642	101-10-5 100-10-5 100-11-5 101-11-5							84G				
643	99-9-5 101-9-5 100-9-5 98-10-5 102-9-5 98-9-5 97-9-5							84G				
644	102-1-6 103-2-6 103-1-6 102-2-6							84E				
645	103-14-5							84F				
646	101-5-6 99-6-6 102-4-6 102-5-6 98-7-6 100-5-6 103-4-6 98-6-6 100-6-6 103-3-6 99-5-6 99-7-6 101-4-6							84E				
647	103-24-5 103-25-5 104-1-6 104-25-5 104-24-5 103-1-6							84F	84L	84E		
								84K				
648	105-9-5 103-9-5 104-9-5 106-9-5 107-9-5 102-9-5 107-8-5 103-8-5							84J	84G			
649	107-9-5							84J				
650	107-2-6 108-2-6 108-3-6							84L				
651	108-7-4							74L				
652	108-2-4 108-1-4							74L				
653	109-2-6							84L				
654	110-2-6							84L				
655	111-3-6							84L				
656	113-20-5 112-20-5							84K				
657	112-12-6 112-11-6							84L				
658	112-10-6							84L				
659	111-2-4 110-3-4 110-2-4 112-2-4 111-1-4 109-3-4 110-1-4 112-1-4 109-2-4 113-2-4 111-3-4 113-1-4							74L				
660	112-3-6 113-3-6 111-3-6							84L				
661	113-2-4 113-3-4 112-3-4 112-2-4							74L				
662	113-4-6 114-4-6							84L				
663	114-2-6							84L				
664	114-3-6 114-4-6 113-3-6 113-4-6							84L				
665	113-11-6 113-12-6							84L				
666	114-2-4 114-1-4 113-2-4							74L				
667	114-1-6 115-24-5 114-24-5 115-23-5 113-2-6 114-2-6 113-1-6							84L	84K			
668	115-3-4							74L				

Appendix 9

ESA	Alberta Township System (ATS)								National Topographic System (NTS)	
669	116-2-6 116-3-6								84M	
670	118-21-5								84N	
671	121-3-6 121-2-6 122-3-6 123-4-6 124-4-6 124-3-6 120-2-6 120-3-6 123-3-6 122-4-6 122-2-6 119-4-6 119-3-6 120-4-6 121-1-6 121-4-6 120-1-6								84M	
672	126-8-6 123-11-6 123-8-6 123-7-6 124-11-6 125-9-6 123-9-6 124-7-6 125-6-6 126-7-6 124-10-6 126-6-6 123-10-6 126-11-6 124-9-6 124-8-6 125-11-6 126-9-6 125-7-6 125-5-6 125-8-6 122-9-6 123-6-6 122-8-6 125-10-6 126-5-6 122-11-6 122-7-6 126-4-6 121-8-6 122-10-6 123-12-6 124-12-6 125-12-6 122-12-6 125-4-6 126-10-6 126-12-6 121-12-6 123-5-6 124-5-6 124-6-6 121-7-6 121-11-6 122-6-6 125-3-6 121-9-6 126-3-6 124-4-6 121-10-6								84M	
673	125-3-6 126-3-6								84M	
674	125-21-5 126-22-5 126-21-5 125-22-5 126-20-5 126-23-5 125-20-5 124-21-5 125-23-5								84N	
675	126-11-4 126-10-4 125-11-4 126-12-4								74M	
676	111-6-4 112-7-4 112-6-4 113-7-4 113-6-4 114-7-4 109-8-4 110-6-4 110-7-4 109-7-4 111-7-4 112-8-4 109-9-4 111-5-4 114-6-4 113-8-4 115-8-4 112-5-4 113-5-4 115-7-4 114-8-4 110-8-4 109-6-4 110-5-4 108-8-4 109-10-4 115-9-4 111-8-4 108-10-4								74L	74M
677	96-1-4								74E	
678	125-10-4 123-9-4 118-9-4 124-9-4 121-9-4 122-9-4 116-9-4 117-9-4 125-9-4 119-9-4 126-10-4 119-8-4 120-9-4 122-8-4 115-9-4 123-8-4 117-8-4 118-8-4 124-10-4								74M	
679	97-8-4 97-9-4 97-7-4 97-10-4 98-7-4 98-8-4 96-9-4 98-9-4 96-10-4 96-8-4 96-7-4								74E	
680	78-21-4 79-21-4 78-22-4 79-22-4								83P	
681	98-18-5 95-19-5 96-19-5 97-18-5 96-18-5 97-19-5 95-18-5 98-17-5 94-19-5 99-18-5 98-19-5 94-20-5								84F	
682	108-5-5 108-9-5 108-6-5 110-3-5 109-11-5 109-4-5 108-7-5 108-10-5 111-1-5 111-2-5 108-8-5 107-6-5 108-11-5 104-7-5 106-6-5 109-12-5 105-6-5 110-2-5 105-7-5 109-10-5 110-4-5 108-12-5 109-5-5 107-8-5 108-4-5 106-7-5 107-7-5 107-5-5 109-9-5 109-3-5								84J	
683	100-19-5 99-19-5 99-18-5 100-18-5 101-19-5								84F	

ESA	Alberta Township System (ATS)								National Topographic System (NTS)		
684	101-19-5 102-19-5 98-19-5 99-19-5 89-21-5 84-8-6 87-20-5 91-21-5 90-21-5 100-19-5 88-20-5 83-11-6 84-7-6 93-20-5 86-20-5 94-20-5 84-21-5 99-17-5 97-19-5 96-20-5 85-21-5 101-18-5 82-23-5 101-20-5 79-23-5 81-6-6 80-4-6 94-21-5 80-25-5 103-20-5 100-17-5 100-18-5 103-19-5 84-9-6 93-22-5 81-24-5 83-12-6 93-21-5 80-5-6 82-6-6 98-20-5 83-10-6 92-22-5 80-3-6 82-13-6 99-18-5 78-24-5 80-2-6 87-21-5 83-9-6 83-21-5 89-20-5 92-21-5 95-19-5 83-22-5 95-20-5 92-20-5 86-22-5 80-1-6 80-26-5 88-21-5 82-22-5 83-7-6 79-3-6 84-11-6 86-23-5 81-25-5 82-12-6 104-19-5 85-20-5 95-21-5 97-20-5 91-23-5 80-6-6 80-23-5 78-23-5 100-20-5 83-6-6 102-20-5 84-6-6 94-22-5 81-23-5 92-23-5 83-13-6 84-22-5 82-24-5 98-18-5 77-24-5 86-21-5 79-4-6 82-7-6 99-16-5 91-20-5 81-22-5 82-11-6								84F	84C	84D 83M 83N 84K
685	71-4-6 70-5-6 70-4-6 70-6-6 71-3-6 71-5-6 70-3-6 71-6-6								83M		
686	68-11-6 67-11-6 68-12-6 70-9-6 69-10-6 66-11-6 68-10-6 67-9-6 69-11-6 70-7-6 67-13-6 70-8-6 70-10-6 71-9-6 67-12-6 69-9-6 66-9-6 66-13-6 71-10-6 65-11-6 70-6-6 67-10-6								83L	83M	
687	65-3-5								83J		
688	89-18-4 88-18-4 88-19-4 89-19-4								84A		
689	107-17-5 106-18-5 105-19-5 108-16-5 106-17-5 108-15-5 107-16-5 106-16-5 105-17-5 108-17-5 105-18-5 108-14-5 107-15-5 105-16-5 104-19-5 105-20-5 104-20-5 107-18-5 106-19-5 108-13-5 105-15-5 107-14-5 104-16-5 104-15-5 106-15-5 108-18-5 104-18-5 108-12-5 106-20-5 109-13-5 104-17-5 109-14-5 109-16-5 109-12-5 109-17-5 109-15-5								84K	84J	
690	50-1-5 51-3-5 39-8-5 56-11-4 56-20-4 45-9-5 56-5-4 52-25-4 40-7-5 55-22-4 54-2-4 57-14-4 50-4-5 53-23-4 58-15-4 56-21-4 57-20-4 46-11-5 56-6-4 50-5-5 58-16-4 50-27-4 58-17-4 43-8-5 55-8-4 56-7-4 50-6-5 54-23-4 55-10-4 51-25-4 57-13-4 39-7-5 42-8-5 40-13-5 46-12-5 58-19-4 40-12-5 39-10-5 56-12-4 55-4-4 54-3-4 46-9-5 58-18-4 44-8-5 40-11-5 55-9-4 47-8-5 41-7-5 39-9-5 51-2-5 55-11-4 50-26-4 58-20-4 53-24-4 55-12-4 50-2-5 50-28-4 47-9-5 52-24-4 45-10-5 51-26-4 38-8-5 57-12-4 54-1-4 46-10-5 50-3-5 53-1-4 48-7-5 56-4-4 57-15-4 55-3-4 44-9-5 41-8-5 39-11-5 49-7-5 40-9-5 45-8-5 49-6-5 54-22-4 47-7-5 59-15-4 51-1-5 55-21-4 57-17-4 59-19-4 56-10-4 59-16-4 55-7-4 56-8-4 45-11-5 50-7-5 56-22-4 57-18-4								83B	73E	83H 83G 83I
691	77-19-4 78-19-4 77-18-4 78-18-4								83P		

Appendix 9

ESA	Alberta Township System (ATS)								National Topographic System (NTS)		
692	106-7-4	107-8-4	100-6-4	104-11-4	107-7-4	94-2-4	108-6-4	74E	74L	84A	
	101-7-4	101-6-4	107-9-4	103-6-4	98-6-4	96-2-4	104-6-4	83P	74D	83I	
	101-5-4	99-4-4	79-17-4	101-8-4	99-6-4	81-18-4	104-8-4	83J	83O		
	106-8-4	104-9-4	102-6-4	87-14-4	103-10-4	86-16-4	85-17-4				
	102-4-4	103-8-4	87-12-4	86-17-4	102-10-4	104-10-4	87-11-4				
	103-9-4	102-8-4	79-16-4	105-6-4	86-15-4	102-5-4	99-5-4				
	86-11-4	109-5-4	99-7-4	87-9-4	86-10-4	81-17-4	78-17-4				
	108-8-4	87-13-4	101-10-4	82-18-4	66-2-5	108-9-4	71-1-5				
	86-14-4	87-10-4	100-7-4	88-10-4	102-9-4	97-3-4	93-10-4				
	98-5-4	80-16-4	92-9-4	103-11-4	84-16-4	80-18-4	100-5-4				
	103-7-4	100-9-4	96-3-4	85-16-4	101-9-4	107-6-4	77-18-4				
	87-15-4	75-18-4	97-6-4	108-7-4	110-5-4	106-6-4	96-1-4				
	83-16-4	110-4-4	98-10-4	80-17-4	82-17-4	92-10-4	76-18-4				
	89-9-4	100-8-4	108-5-4	70-1-5	104-12-4	74-18-4	95-3-4				
	96-11-4	105-7-4	73-18-4	88-14-4	71-24-4	70-19-4	106-9-4				
	67-2-5	65-2-5	71-26-4	97-5-4	98-7-4	69-23-4	74-19-4				
	90-9-4	109-6-4	95-11-4	68-21-4	72-25-4	87-17-4	91-9-4				
	67-23-4	88-7-4	72-24-4	67-22-4	108-10-4	100-4-4	68-23-4				
	88-11-4	99-10-4	68-2-5	87-6-4	85-5-4	82-19-4	71-19-4				
	96-4-4	75-19-4	69-2-5	70-24-4	97-11-4	86-5-4	66-22-4				
	85-4-4	81-16-4	72-19-4	69-19-4	66-23-4	70-18-4	86-12-4				
	87-7-4	81-19-4	85-11-4	88-15-4	70-23-4	94-1-4	82-16-4				
	89-10-4	69-20-4	86-9-4	87-16-4	84-17-4	97-4-4	102-7-4				
	97-10-4	109-4-4	94-11-4	66-3-5	78-15-4	99-9-4	95-10-4				
	79-18-4	65-3-5	86-18-4	72-18-4	78-16-4	69-18-4	77-15-4				
	86-6-4	109-7-4	83-17-4	94-10-4	76-19-4	78-18-4	111-5-4				
	68-20-4	94-3-4	104-7-4	101-4-4	88-13-4	99-8-4	107-5-4				
	103-5-4	98-3-4	77-14-4	83-18-4	68-22-4	88-6-4	90-10-4				
	77-17-4	102-11-4	105-9-4	87-18-4	85-10-4	103-12-4	88-12-4				
	93-2-4	85-18-4	88-9-4	72-26-4	105-5-4	111-4-4	104-5-4				
	80-15-4	97-7-4	98-4-4	100-10-4	70-2-5	109-9-4	87-5-4				
	107-10-4	77-19-4	71-25-4	69-1-5	95-2-4	109-10-4	97-2-4				
	89-8-4	102-3-4	105-8-4	100-3-4	95-1-4	99-3-4					
693	90-15-4	89-12-4	90-16-4	91-15-4	89-17-4	89-13-4	91-16-4	84A	74D	84H	
	90-14-4	90-17-4	88-12-4	90-18-4	90-12-4	89-16-4	91-14-4				
	91-17-4	88-13-4	92-16-4	92-15-4	89-14-4	89-18-4	91-18-4				
	89-11-4	90-13-4	89-15-4	88-17-4	92-14-4	88-11-4	90-19-4				

ESA	Alberta Township System (ATS)	National Topographic System (NTS)
694	126-15-4 126-16-4 126-17-4 126-18-4 126-19-4 126-20-4 126-21-4 126-22-4 126-1-5 126-2-5 126-3-5 126-4-5 115-13-4 115-10-4 115-14-4 115-11-4 115-12-4 115-15-4 115-16-4 126-9-5 111-9-4 111-10-4 107-20-4 115-17-4 111-11-4 107-19-4 115-20-4 115-23-4 111-13-4 115-21-4 115-22-4 126-8-5 115-18-4 115-19-4 107-21-4 111-12-4 111-14-4 107-18-4 107-11-4 107-17-4 107-22-4 126-7-5 111-16-4 107-23-4 107-12-4 111-15-4 126-5-5 107-13-4 107-14-4 107-16-4 126-6-5 111-17-4 107-15-4 111-18-4 123-10-4 111-19-4 123-11-4 123-12-4 111-20-4 123-1-5 123-13-4 111-21-4 123-14-4 123-2-5 111-22-4 123-4-5 123-7-5 123-3-5 123-5-5 123-8-5 123-6-5 123-15-4 111-23-4 123-16-4 123-17-4 123-18-4 123-19-4 123-20-4 119-10-4 123-21-4 123-22-4 119-11-4 123-9-5 119-12-4 119-13-4 119-14-4 119-15-4 119-16-4 119-17-4 119-18-4 119-19-4 119-20-4 119-21-4 119-22-4 119-23-4 112-9-4 112-10-4 116-10-4 116-11-4 112-11-4 112-13-4 116-12-4 116-13-4 112-14-4 112-15-4 116-14-4 112-12-4 112-16-4 120-10-4 120-11-4 116-16-4 108-20-4 112-17-4 108-19-4 108-11-4 120-12-4 112-18-4 108-12-4 120-13-4 124-13-4 108-21-4 108-17-4 108-13-4 120-14-4 108-18-4 124-14-4 112-19-4 108-22-4 108-23-4 112-20-4 124-15-4 120-15-4 108-14-4 116-17-4 112-21-4 124-16-4 120-16-4 108-15-4 108-16-4 124-17-4 120-17-4 116-18-4 112-22-4 120-18-4 124-18-4 116-19-4 124-19-4 116-20-4 120-19-4 120-20-4 124-20-4 112-23-4 124-21-4 116-21-4 120-21-4 116-22-4 124-22-4 120-22-4 124-1-5 124-7-5 124-3-5 120-23-4 124-2-5 124-4-5 124-5-5 116-23-4 124-6-5 124-8-5 124-9-5 105-10-4 105-11-4 105-12-4 113-9-4 113-10-4 117-10-4 113-11-4 105-13-4 117-11-4 113-13-4 113-12-4 117-12-4 113-14-4 117-13-4 105-16-4 105-14-4 113-16-4 117-14-4 105-17-4 113-15-4 121-10-4 109-20-4 105-18-4 109-11-4 109-19-4 113-17-4 117-16-4 121-11-4 105-19-4 105-15-4 105-20-4 113-18-4 109-21-4 121-12-4 105-21-4 109-12-4 109-17-4 105-22-4 109-13-4 109-22-4 109-18-4 105-23-4 109-23-4 105-24-4 113-19-4 121-13-4 109-14-4 113-20-4 121-14-4 113-21-4 117-17-4 109-15-4 121-15-4 109-16-4 125-14-4 125-15-4 121-16-4 113-22-4 125-16-4 117-18-4 121-17-4 125-17-4 117-19-4 121-18-4 113-23-4 117-20-4 121-19-4 125-18-4 125-19-4 117-21-4 121-20-4 121-1-5 121-21-4 117-22-4 125-20-4 125-21-4 121-22-4 121-2-5 125-22-4 125-1-5 125-3-5 121-23-4 125-7-5 117-23-4 125-2-5 125-4-5 125-5-5 125-6-5 125-9-5 125-8-5 121-3-5 121-9-5 121-4-5 121-6-5 107-10-4 110-10-4 121-5-5 121-7-5 121-8-5 116-15-4 106-11-4 114-9-4 106-12-4 106-10-4 114-10-4 114-16-4 114-14-4 114-13-4 114-15-4 114-11-4 114-17-4 114-12-4 114-18-4 114-21-4 110-9-4 106-17-4 114-20-4 106-18-4 106-16-4 106-13-4 114-19-4 106-20-4 114-22-4 106-19-4 114-23-4 106-14-4 106-21-4 106-22-4 106-15-4 106-23-4 106-24-4 110-11-4 110-12-4 110-13-4 110-19-4 110-20-4 110-17-4 110-14-4 110-18-4 110-21-4 110-22-4 110-23-4 110-16-4 110-15-4 122-10-4 122-11-4 122-1-5 122-12-4 122-2-5 122-9-5 122-13-4 118-10-4 122-14-4 118-11-4 122-3-5 122-15-4 122-16-4 118-12-4 118-13-4 122-17-4 118-14-4 122-18-4 122-4-5 122-19-4 118-15-4 122-20-4 122-6-5 122-21-4 122-5-5 118-16-4 122-22-4 122-8-5 122-7-5 122-23-4 118-17-4 118-18-4 118-19-4 118-20-4 118-21-4 118-22-4 118-23-4 124-10-4 124-11-4 124-12-4 125-13-4 111-8-4 117-15-4 126-23-4 123-23-4 124-23-4 125-23-4 109-10-4 107-24-4 108-24-4 109-24-4 110-24-4 115-9-4 110-8-4 114-8-4 108-10-4 122-9-4 126-14-4 105-9-4 117-9-4 119-9-4 111-24-4 112-24-4 113-24-4 114-24-4 116-9-4 121-9-4 120-9-4 106-9-4 113-8-4 123-9-4 115-24-4 116-24-4 117-24-4 118-24-4 109-9-4 118-9-4 125-12-4 112-8-4 111-7-4 104-16-4 110-7-4 124-9-4 119-24-4 120-24-4 121-24-4 122-24-4 126-13-4 105-25-4 106-25-4 115-8-4 107-9-4 104-17-4 109-8-4 114-7-4 125-11-4	84P 84I 840 74L 74M 84J

Appendix 9

ESA	Alberta Township System (ATS)								National Topographic System (NTS)		
695	53-20-4 54-20-4 54-19-4 52-20-4 55-20-4 53-19-4 55-19-4								83H		
	53-21-4										
696	79-8-6 79-9-6								83M		
697	71-24-5 71-23-5 70-24-5								83N		
698	117-2-4	114-4-4	114-5-4	117-3-4	113-5-4	115-5-4	116-3-4		74L	74M	
	115-4-4	118-2-4	118-1-4	113-4-4	117-1-4	115-3-4	112-5-4				
699	99-1-4	99-2-4	100-1-4	100-2-4	95-1-4	100-3-4	101-2-4		74E		
	101-3-4	101-1-4	99-3-4	95-2-4	102-1-4	102-2-4	98-1-4				
	97-1-4	102-3-4	97-2-4	98-2-4	101-4-4	100-4-4	100-5-4				
	103-2-4	103-3-4	101-5-4	102-4-4	94-1-4	96-2-4					
700	106-2-5 106-3-5								84J		
701	57-20-4 57-21-								83H		
702	77-18-5	76-18-5	77-17-5	75-17-5	76-17-5	77-19-5	75-18-5		83N		
	78-17-5	78-16-5									
703	65-10-4	66-9-4	66-10-4	67-9-4	67-10-4	65-9-4	65-11-4		73L		
	68-10-4	67-11-4	66-11-4	68-9-4	64-10-4	67-12-4	64-11-4				
	66-12-4	68-11-4	67-8-4								
704	103-6-5	99-16-4	99-18-4	97-18-4	97-19-4	97-20-4	98-18-4		84H	84G	84J
	98-17-4	98-19-4	98-20-4	97-17-4	97-21-4	103-2-5	99-19-4		84I		
	102-4-5	102-15-4	99-17-4	103-3-5	102-19-4	103-5-5	101-17-4				
	101-19-4	102-3-5	102-16-4	103-1-5	102-6-5	102-2-5	101-21-4				
	99-20-4	100-20-4	96-19-4	99-21-4	98-21-4	100-18-4	103-7-5				
	102-24-4	102-7-5	96-20-4	100-19-4	102-5-5	104-6-5	100-21-4				
	101-6-5	101-20-4	101-18-4	101-16-4	102-17-4	104-2-5	104-1-5				
	102-23-4	97-22-4	102-18-4	104-5-5	103-4-5	104-3-5	101-7-5				
	101-22-4	103-15-4	102-1-5	96-18-4	103-16-4	103-19-4	102-20-4				
	103-24-4	100-22-4	102-8-5	104-4-5	101-3-5	98-16-4	96-17-4				
	103-20-4	99-15-4	102-21-4	101-15-4	101-4-5	97-23-4	99-22-4				
	103-17-4	102-22-4	102-25-4	101-2-5	101-5-5	103-18-4	104-24-4				
	95-19-4	98-22-4	95-20-4	97-16-4	100-15-4	103-23-4	104-7-5				
	100-6-5	101-8-5	103-14-4	101-23-4	100-17-4	102-14-4	104-25-4				
	100-7-5	100-5-5	103-25-4	103-8-5	96-21-4	100-14-4	95-18-4				
	106-1-5	105-1-5									
705	82-4-6	83-4-6	83-5-6					84D			
706	73-24-4	74-23-4	73-23-4	74-24-4				83P			
707	75-6-5	74-6-5	73-5-5	75-5-5	73-6-5	74-5-5		83O			
708	94-20-5	95-20-5	96-20-5	95-19-5				84F			
709	87-3-4	86-3-4	87-4-4	86-2-4	85-3-4	85-2-4	87-2-4	74D			
	86-4-4	85-1-4	86-1-4								
710	82-22-5	81-24-5	81-23-5	82-23-5	79-2-6	80-25-5	79-1-6		84C	83M	83N
	80-23-5	79-3-6	80-26-5	80-1-6	80-2-6	83-22-5	80-3-6				
	83-21-5	81-25-5	82-24-5								
711	82-21-5	83-21-5	81-21-5					84C			
712	106-6-4	105-6-4	106-5-4					74L			

ESA	Alberta Township System (ATS)								National Topographic System (NTS)	
713	105-8-4 104-7-4 105-7-4 104-8-4 105-9-4 106-8-4 104-6-4								74L	74E
	106-9-4 106-7-4									
714	75-10-5 75-11-5 75-12-5								830	
715	75-13-5 75-14-5 75-12-5								83N	830
716	64-2-5 65-2-5 64-3-5 65-3-5 64-1-5								83J	
717	50-21-4 49-20-4 50-20-4 49-21-4 50-22-4 51-21-4 51-20-4 49-22-4								83H	
718	66-11-4 67-11-4 67-10-4 66-10-4 65-11-4 66-12-4								73L	
719	64-3-5 63-4-5 62-5-5 62-4-5 65-3-5 64-4-5 63-3-5 61-5-5 65-4-5 63-5-5 61-4-5								83J	
720	49-7-5 50-6-5 49-6-5								83G	
721	48-7-5 47-7-5 49-7-5 47-8-5								83G	
722	106-5-4 107-5-4 106-6-4 105-6-4 107-6-4 105-5-4								74L	
723	83-10-6								84D	
724	52-19-4 52-20-4 52-21-4 51-21-4 51-19-4 51-20-4 53-19-4 51-22-4								83H	
725	62-19-4								83I	
726	56-4-4								73E	
727	69-19-4 69-20-4								83I	
728	65-26-4 65-25-4								83I	
729	61-6-5 61-7-5								83J	
730	64-1-4 65-1-4 63-1-4 65-2-4 64-2-4 65-3-4 63-2-4 66-1-4								73L	
731	76-18-5 77-18-5 77-19-5 76-19-5 77-17-5 76-17-5								83N	
732	81-7-6 83-10-6 82-11-6 82-13-6 83-7-6 82-12-6 81-6-6 81-12-6 79-5-6 82-6-6 83-8-6 79-6-6 80-6-6 83-11-6 82-7-6 80-5-6 84-8-6 81-13-6 84-9-6 82-10-6 83-6-6 83-9-6								84D	83M
733	59-15-4								83I	
734	83-8-4 83-9-4 84-8-4 82-9-4 82-8-4 84-9-4								74D	
735	69-18-4 69-17-4 70-17-4 69-19-4 68-18-4 68-19-4 68-17-4 70-18-4								83I	83P

Appendix 9

ESA	Alberta Township System (ATS)								National Topographic System (NTS)		
736	119-1-5	119-2-5	119-3-5	126-13-5	119-4-5	119-5-5	115-4-5		840	84N	84J
	119-6-5	115-3-5	119-11-5	119-9-5	119-7-5	119-10-5	115-8-5		84K		
	119-8-5	115-9-5	115-10-5	115-5-5	120-1-5	120-2-5	116-1-5				
	124-13-5	120-3-5	120-10-5	116-4-5	116-3-5	120-9-5	120-4-5				
	116-5-5	116-8-5	116-7-5	120-6-5	120-5-5	120-7-5	120-8-5				
	116-9-5	116-2-5	120-11-5	116-6-5	125-17-5	113-14-5	117-1-5				
	117-2-5	117-4-5	117-3-5	117-5-5	117-6-5	117-9-5	117-8-5				
	117-7-5	121-10-5	118-2-5	114-4-5	118-3-5	126-12-5	118-4-5				
	118-1-5	118-5-5	118-6-5	114-5-5	118-7-5	118-8-5	118-9-5				
	114-3-5	114-9-5	114-8-5	118-10-5	114-10-5	122-10-5	121-12-5				
	120-15-5	126-15-5	123-14-5	126-11-5	125-16-5	126-16-5	122-15-5				
	120-16-5	121-17-5	113-13-5	120-14-5	126-10-5	121-16-5	119-13-5				
	121-11-5	122-16-5	120-13-5	119-12-5	114-13-5	126-17-5	125-13-5				
	118-14-5	117-15-5	115-7-5	118-12-5	116-13-5	125-14-5	126-14-5				
	123-17-5	116-16-5	124-16-5	122-18-5	125-10-5	113-15-5	117-10-5				
	125-15-5	117-16-5	113-7-5	121-15-5	114-7-5	116-10-5	121-14-5				
	121-13-5	124-15-5	117-12-5	122-13-5	120-12-5	115-12-5	119-14-5				
	115-13-5	114-11-5	123-13-5	123-15-5	113-10-5	115-1-5	121-18-5				
	124-17-5	124-12-5	120-17-5	125-12-5	113-6-5	125-11-5	122-11-5				
	115-16-5	113-9-5	123-16-5	118-15-5	122-14-5	118-11-5	123-18-5				
	117-13-5	114-12-5	113-5-5	117-11-5	112-6-5	123-10-5	115-2-5				
	124-14-5	124-18-5	116-12-5	114-6-5	120-19-5	122-12-5	113-11-5				
	124-11-5	114-1-5	122-17-5	124-10-5	118-13-5	119-16-5	113-8-5				
	125-18-5	120-18-5	117-14-5	114-2-5	112-9-5	113-16-5	115-6-5				
	122-19-5	121-19-5	118-16-5	126-18-5	114-14-5	116-14-5	112-13-5				
	119-17-5	119-20-5	119-15-5	112-10-5	116-11-5	118-20-5	123-12-5				
	114-15-5	113-4-5	119-19-5	123-11-5	112-7-5	117-21-5	112-14-5				
	115-17-5	115-14-5	113-12-5	113-3-5	115-11-5	118-21-5	117-17-5				
	112-11-5	111-6-5	111-7-5	123-9-5							
737	84-17-4	86-17-4	88-11-4	87-15-4	85-17-4	87-16-4	87-14-4		84A	74D	
	87-13-4	87-12-4	86-18-4	87-17-4	88-12-4	83-16-4	88-13-4				
	85-18-4	83-17-4	86-16-4	87-11-4	84-16-4	88-10-4					
738	112-6-6	112-7-6	113-6-6	112-8-6	113-7-6	113-5-6	113-8-6		84L		
	111-7-6	112-5-6	111-8-6	114-5-6	111-6-6	114-6-6	112-9-6				
	114-7-6										
739	95-10-6	95-11-6	93-10-6	94-10-6	94-11-6	93-12-6	93-11-6		84E	84D	
	94-12-6	95-9-6	92-10-6	96-10-6	96-11-6	93-13-6	94-9-6				
	93-9-6	96-9-6	92-12-6	95-12-6	92-11-6	94-13-6	92-13-6				
	92-9-6										
740	89-4-4	89-3-4	89-5-4	88-4-4	88-6-4	89-1-4	89-2-4		74D		
	88-7-4	88-8-4	87-6-4	89-9-4	89-8-4	90-4-4	88-1-4				
	87-5-4	88-5-4	89-6-4	88-3-4	86-6-4	88-9-4	89-7-4				
	86-5-4	90-5-4	90-9-4	90-3-4	88-2-4						
741	89-1-4	88-1-4						74D			
742	114-6-4	115-6-4						74L			
743	115-4-4							74M			
744	118-8-4	118-7-4						74M			
745	119-3-4							74M			

ESA	Alberta Township System (ATS)	National Topographic System (NTS)
746	119-2-4 119-3-4 118-2-4 118-3-4	74M
747	119-2-4	74M
748	121-7-4 120-7-4 120-6-4 121-6-4	74M
749	123-2-4	74M
750	125-4-4 125-3-4 124-4-4 124-3-4	74M
751	126-7-4 125-7-4	74M
752	125-1-4 126-1-4 124-1-4 126-2-4 124-2-4 125-2-4	74M
753	119-7-4 119-8-4 120-8-4 120-9-4 119-6-4 119-9-4	74M
754	121-3-4 121-4-4 122-1-4 122-2-4 122-3-4 122-4-4 121-1-4 121-2-4 123-4-4 121-5-4 123-3-4 123-1-4 123-2-4 122-5-4	74M



REPORT PREPARED BY: Fiera Biological Consulting
200, 10318-82 Avenue | Edmonton, Alberta | T6E 1Z8

tel: (780) 466.6554 | fax: (780) 466.9134
w: fieraconsulting.ca | e: info@fieraconsulting.ca