



Saskatchewan
Agriculture, Food
and Rural
Revitalization

FIELD GUIDE

Identification of Common Range Plants of Northern Saskatchewan



Table of Contents

Common Range Plants 1

Grasses 2

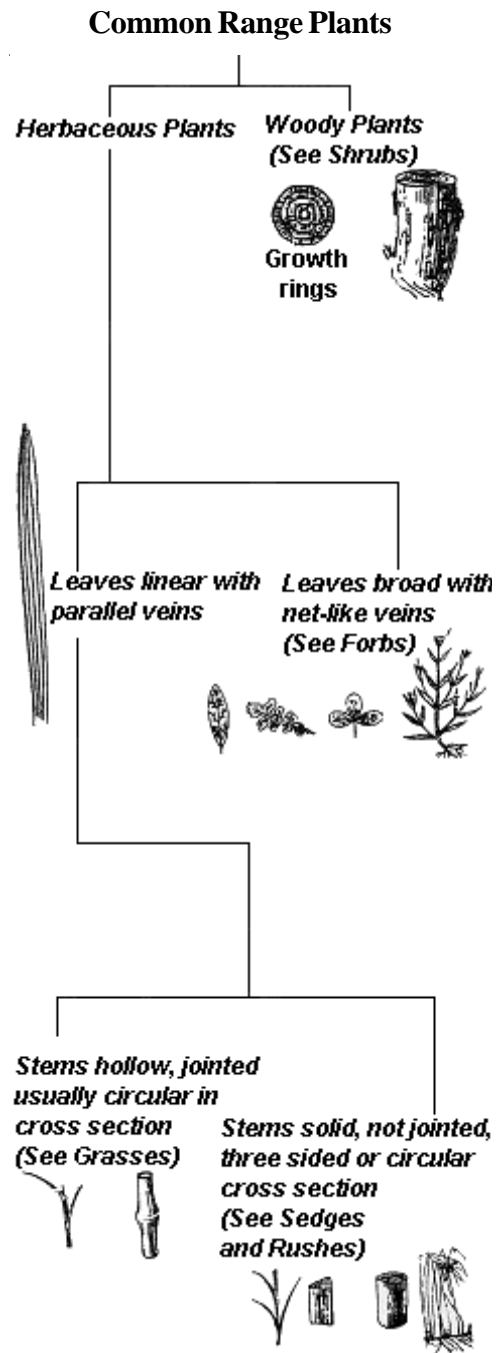
Forbs 11

Shrubs 19

Adapted from 26

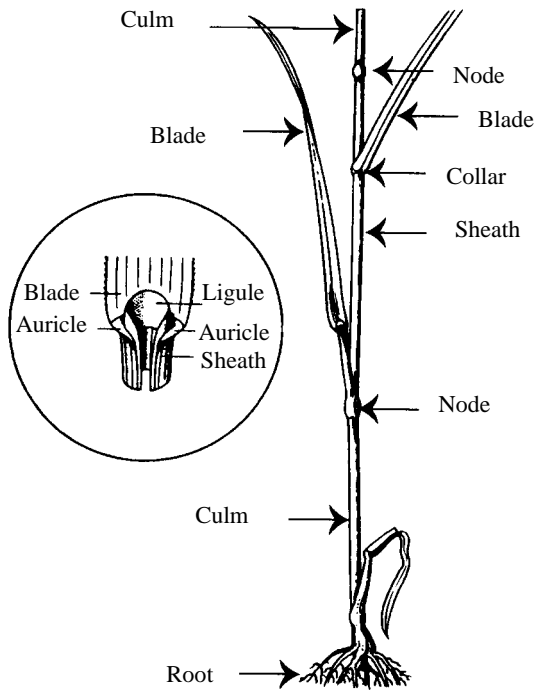
Acknowledgements 26

Sources of Information 26



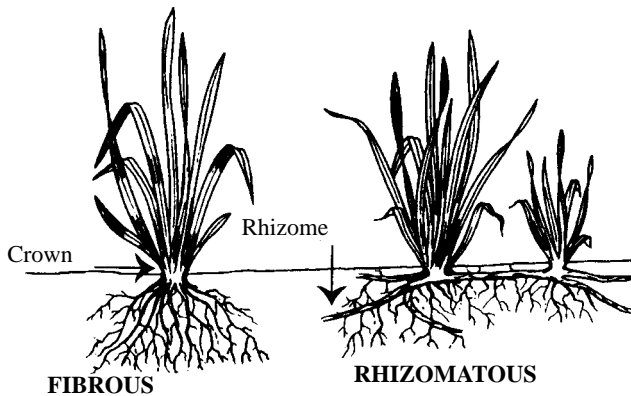
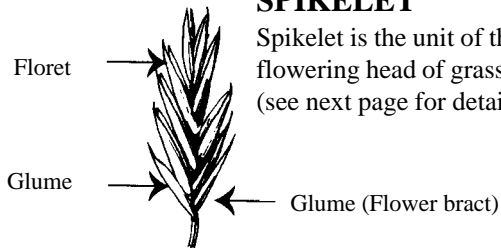
GRASSES

The Grass Plant Parts



SPIKELET

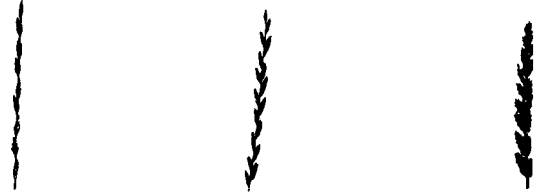
Spikelet is the unit of the flowering head of grasses (see next page for detail)



Types of Grass Flowering Heads

A. SPIKE

Unbranched terminal flowering head with spikelets attached directly to the central axis.
(Example: Wheatgrasses)



B. COMB-LIKE SPIKE

Spikelets are arranged on one side like a comb, spikes not necessarily TERMINAL.
(Example: Blue grama, side-oats grama)



C. RACEME

Unbranched flowering head with spikelets borne on stalks attached to the central axis.
(Example: Bluestems)



D. PANICLE

Branched flower head.
(Examples: June grass, Blue grasses, Hair grasses)



Common and Botanical Names of Grasses Included in the Guide

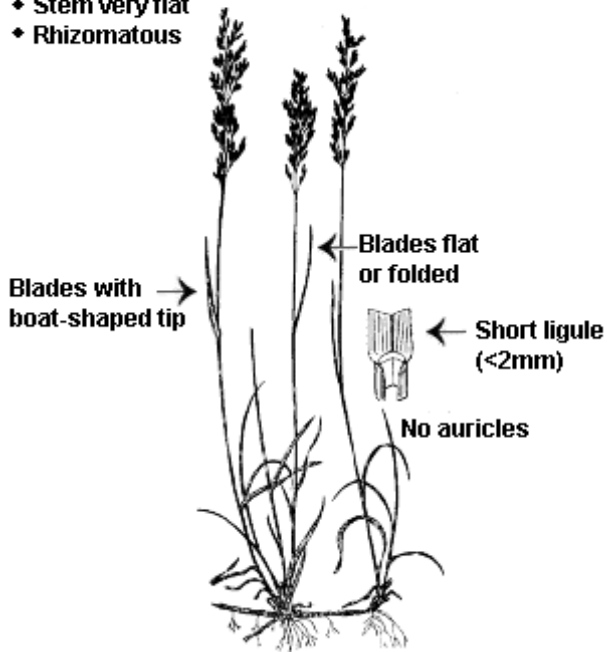
Common Names	Botanical Names
Awned wheatgrass	<i>Agropyron subsecundum</i>
Canada bluegrass	<i>Poa compressa</i>
Canada rice grass	<i>Oryzopsis Canadensis</i>
Fringed brome grass	<i>Bromus ciliatus</i>
Green needlegrass	<i>Stipa viridula</i>
Hooker's oat grass	<i>Helictotrichon hookeri</i>
Hairy wildrye	<i>Elymus innovatus</i>
Intermediate oat grass	<i>Danthonia intermedia</i>
Junegrass	<i>Koeleria gracilis</i>
Kentucky bluegrass	<i>Poa pratensis</i>
Marsh reedgrass	<i>Calamagrostis Canadensis</i>
Narrow reedgrass	<i>Calamagrostis stricta</i>
Northern rice grass	<i>Oryzopsis pungens</i>
Northern wheatgrass	<i>Agropyron dasystachyum</i>
Purple oat grass	<i>Schizachne purpurascens</i>
Plains rough fescue	<i>Festuca hallii</i>
Quackgrass	<i>Agropyron repens</i>
Rough hair grass	<i>Agrostis scabra</i>
Richardson's needlegrass	<i>Stipa richardsonii</i>
Smooth brome grass	<i>Bromus inermis</i>
Slender wood grass	<i>Cinna latifolia</i>
Slender wheat grass	<i>Agropyron trachycaulum</i>
Sweet grass	<i>Hierochloe odorata</i>
Tufted hair grass	<i>Deschampsia caespitosa</i>
Western porcupine grass	<i>Stipa curtisetia</i>
Western wheat grass	<i>Agropyron smithii</i>
White grained mountain rice grass	<i>Oryzopsis asperifolia</i>

Index to Grasses

Bluegrasses	
Canada	4
Kentucky	4
Brome grasses	
Fringed	4
Smooth	4
Wild Rye Grasses	
Hairy	5
Hairgrasses	
Rough	5
Tufted	5
Junegrass	5
Needlegrasses	
Green	6
Richardson's	6
Western Porcupine Grass	6
Oatgrasses	
Hooker's	6
Intermediate	7
Purple	7
Reedgrasses	
Marsh	7
Narrow	7
Ricegrasses	
Canada	8
Northern	8
White grained mountain	8
Plains Rough Fescue	8
Slender Wood Grass	9
Sweetgrass	9
Wheatgrasses	
Awned	9
Northern	9
Quackgrass	10
Slender	10
Western	10

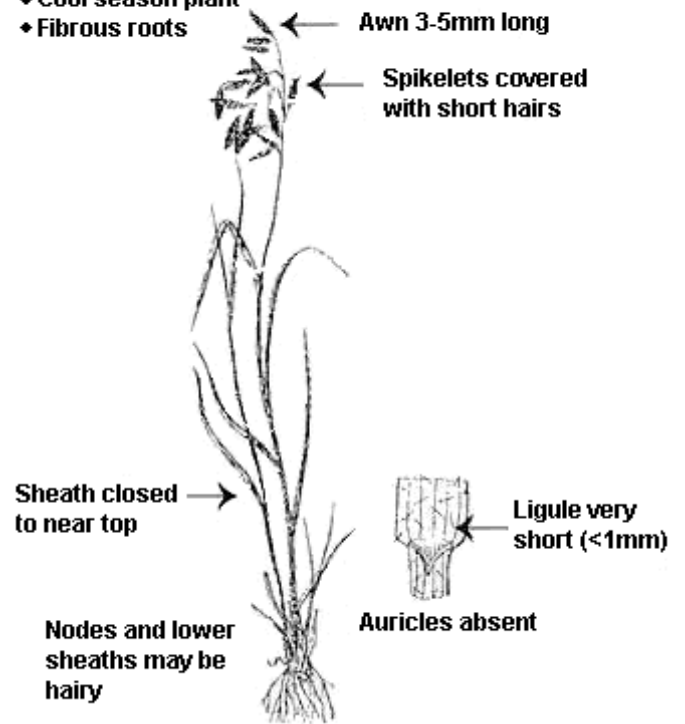
Canada blue grass
Poa compressa

- ◆ Cool season
- ◆ Stem very flat
- ◆ Rhizomatous



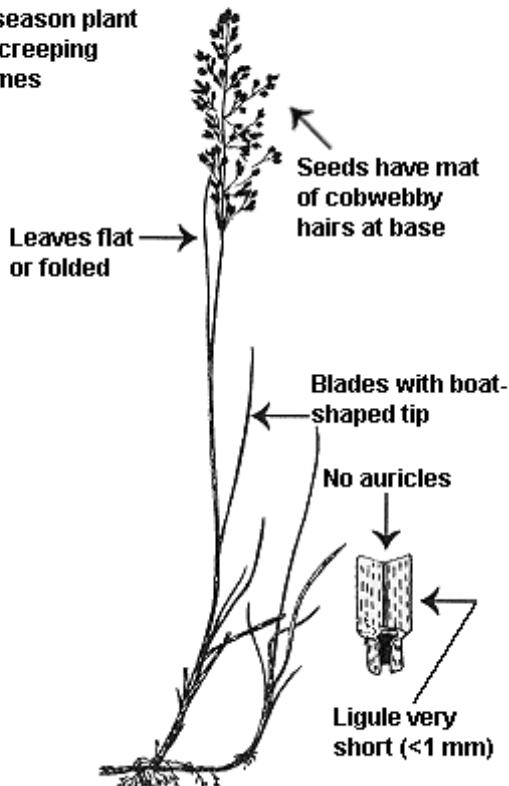
Fringed brome
Bromus ciliatus

- ◆ Cool season plant
- ◆ Fibrous roots



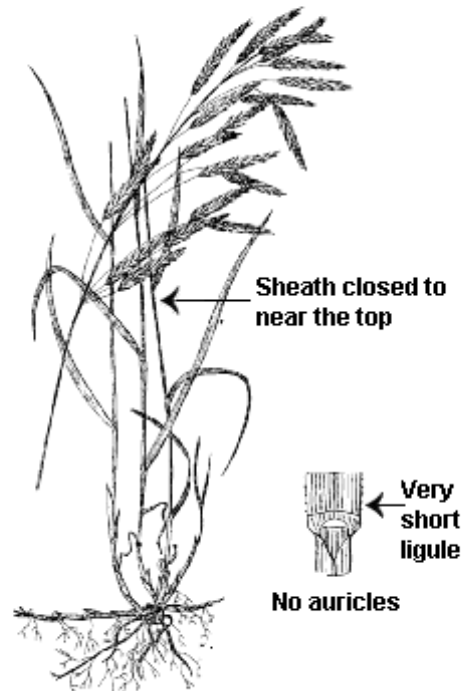
Kentucky blue grass
Poa pratensis

- ◆ Cool season plant
- ◆ Long creeping rhizomes



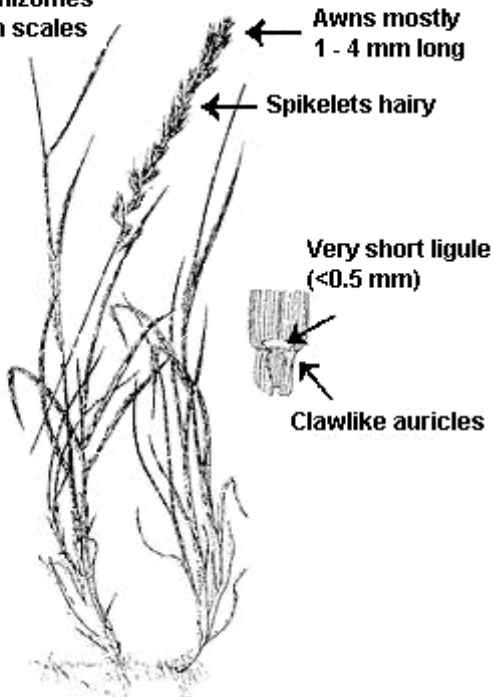
Smooth brome
Bromus inermis

- ◆ Cool season plant
- ◆ Rhizomatous



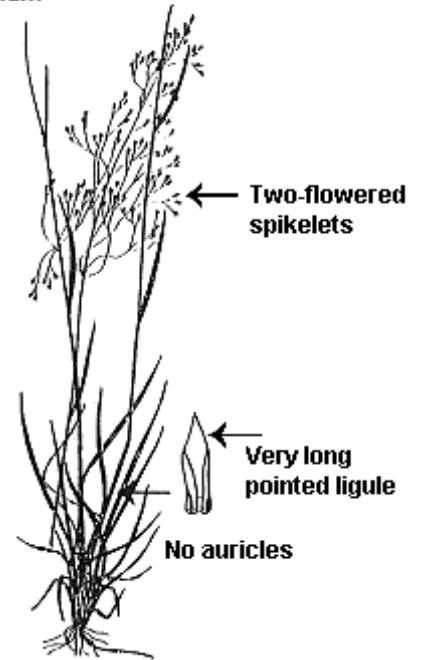
Hairy wild rye
Elymus innovatus

- ♦ Cool season plant
- ♦ Creeping rhizomes with brown scales



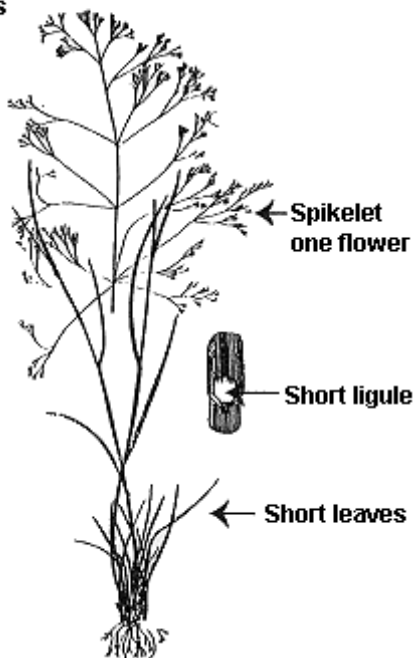
Tufted hair grass
Deschampsia caespitosa

- ♦ Cool season plant
- ♦ Fibrous roots



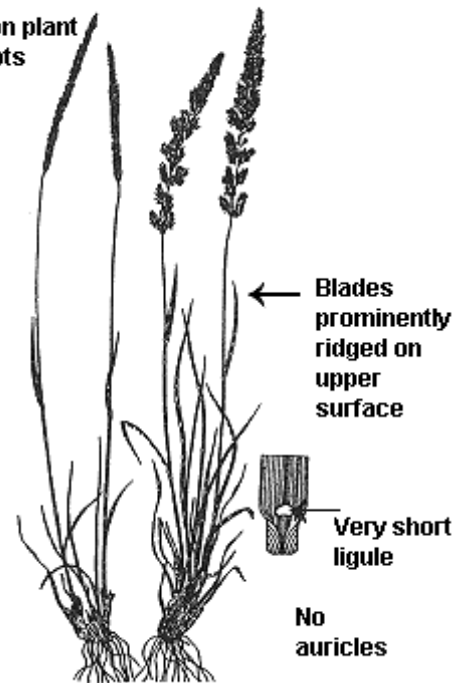
Rough hair grass
Agrostis scabra

- ♦ Cool season plant
- ♦ Finely branched panicle
- ♦ Fibrous roots



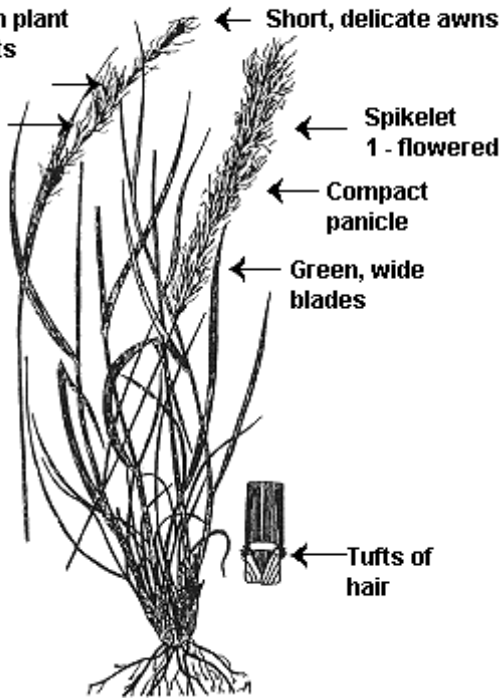
June grass
Koeleria gracilis

- ♦ Cool season plant
- ♦ Fibrous roots



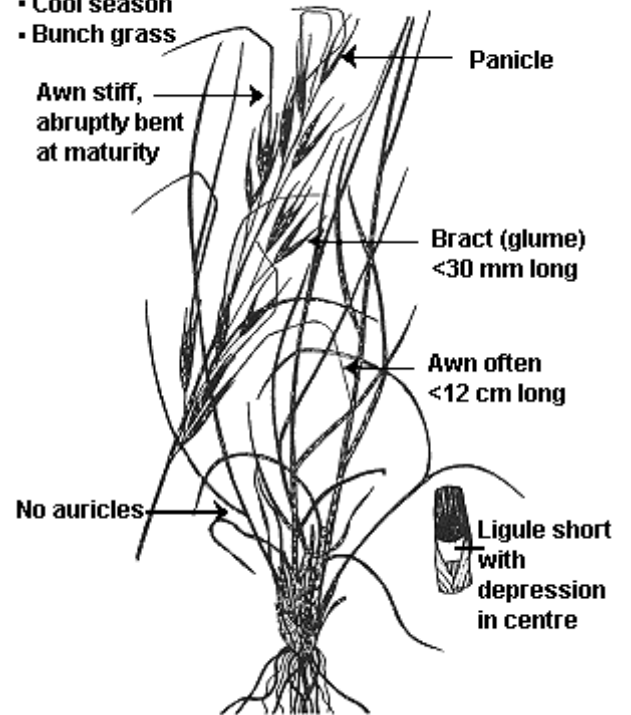
Green needle grass
Stipa viridula

- ♦ Cool season plant
- ♦ Fibrous roots



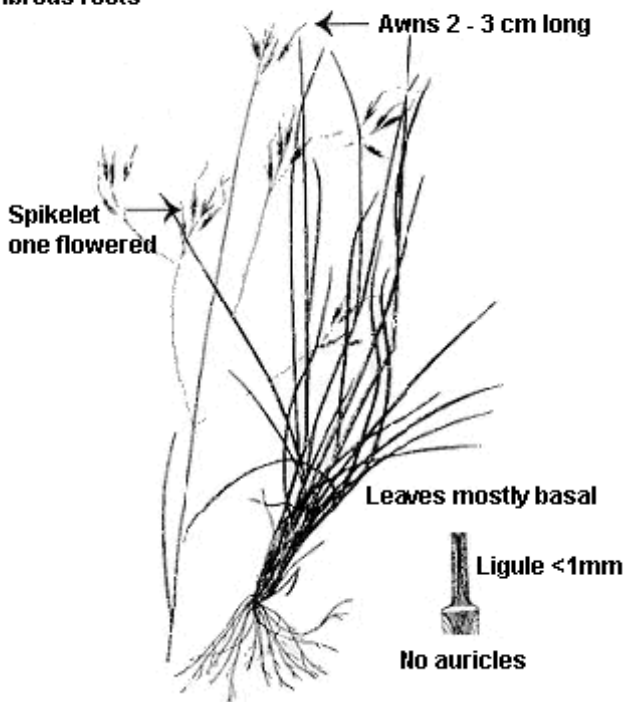
Western porcupinegrass
Stipa curtisetia

- ♦ Cool season
- ♦ Bunch grass



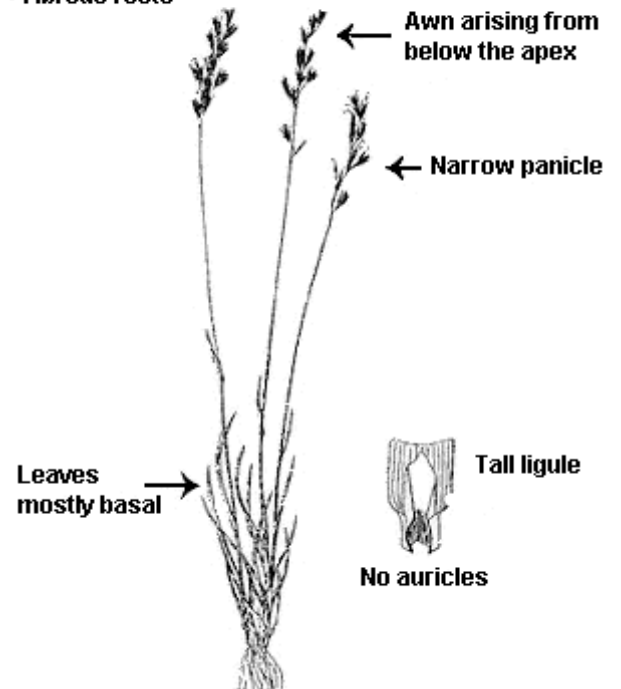
Richardson's needle grass
Stipa richardsonii

- ♦ Fibrous roots



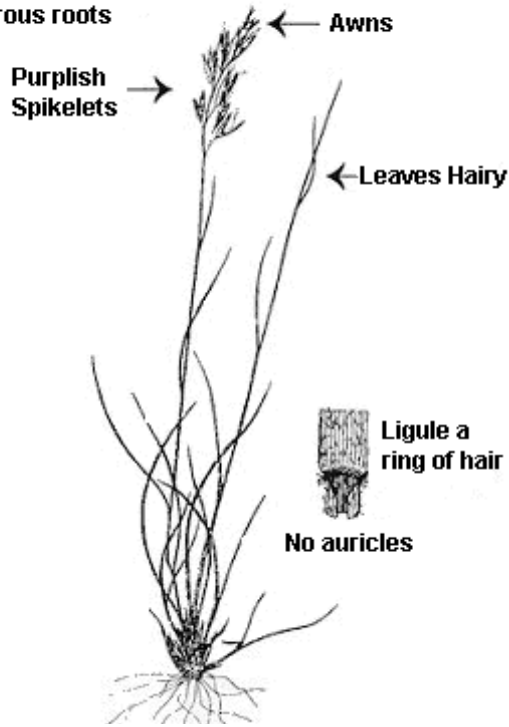
Hooker's oat grass
Helictotrichon hookeri

- ♦ Cool season plant
- ♦ Fibrous roots



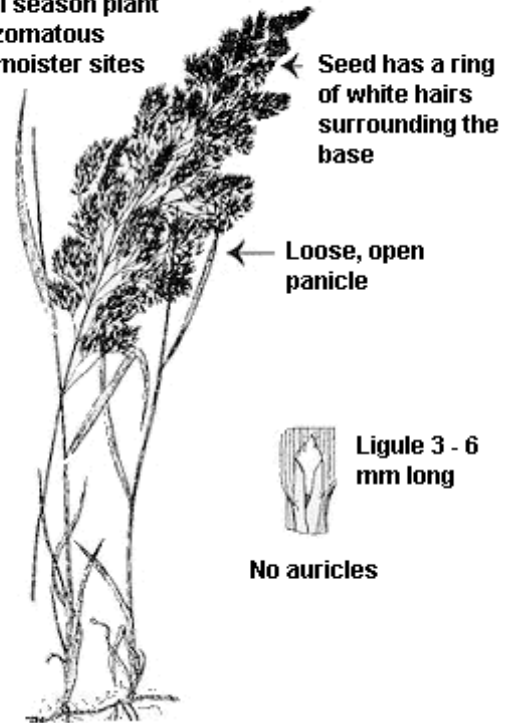
Intermediate oat grass
Danthonia californica

- ♦ Cool season plant
- ♦ Fibrous roots



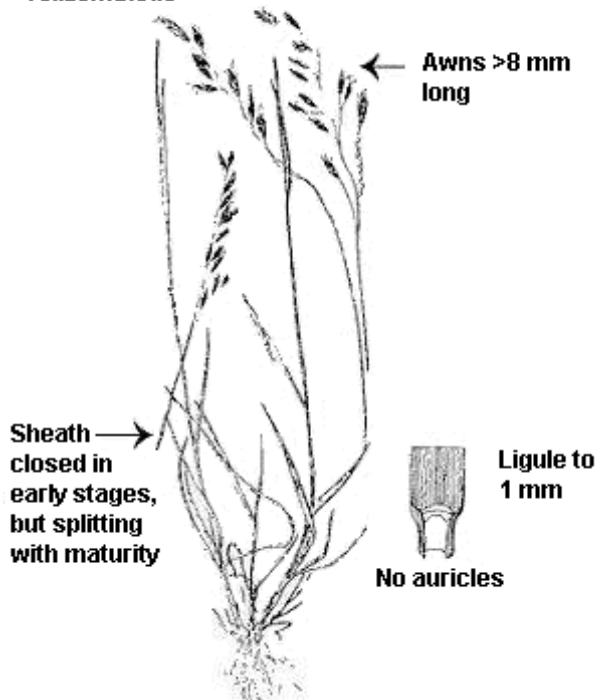
Marsh reed grass
Calamagrostis canadensis

- ♦ Cool season plant
- ♦ Rhizomatous
- ♦ On moister sites



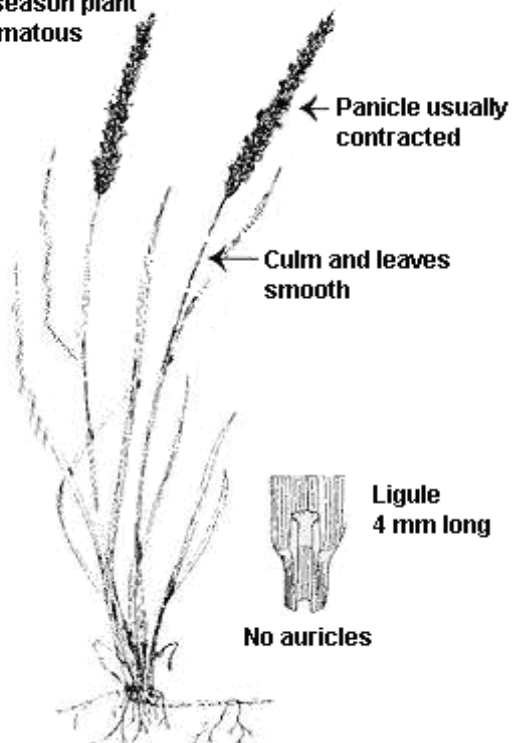
Purple oat grass
Schizachne purpurascens

- ♦ Cool season plant
- ♦ Rhizomatous



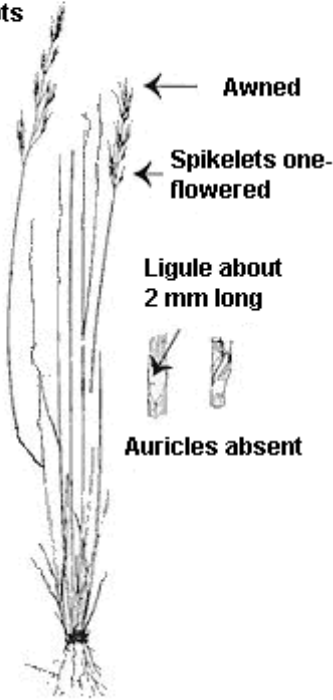
Narrow reed grass
Calamagrostis stricta

- ♦ Cool season plant
- ♦ Rhizomatous



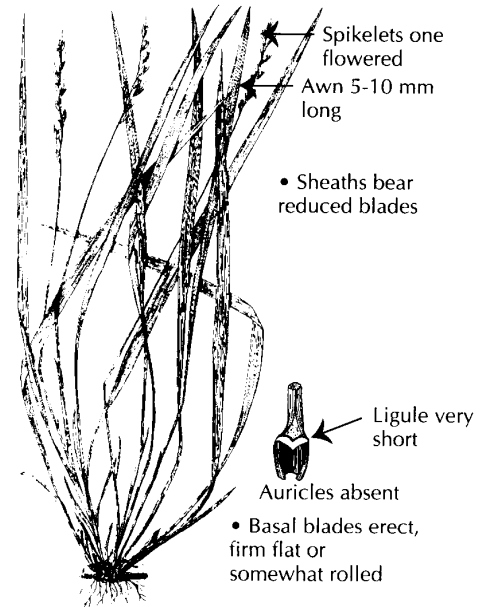
Canada rice grass
Oryzopsis canadensis

- ◆ Cool season plant
- ◆ Fibrous roots



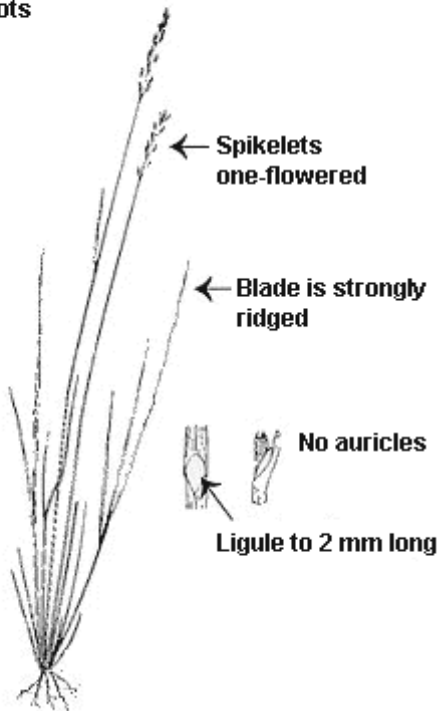
White-grained mtn. rice grass
Oryzopsis asperifolia

- Cool season plant
- Short rhizomes



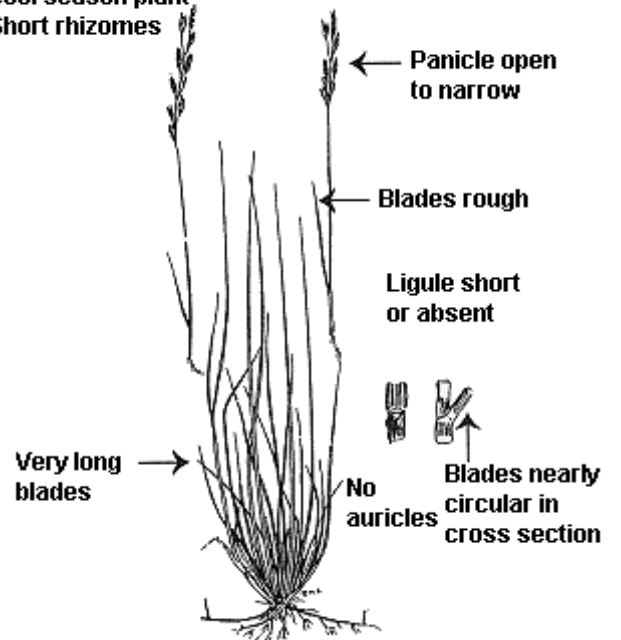
Northern rice grass
Oryzopsis pungens

- ◆ Cool season plant
- ◆ Fibrous roots



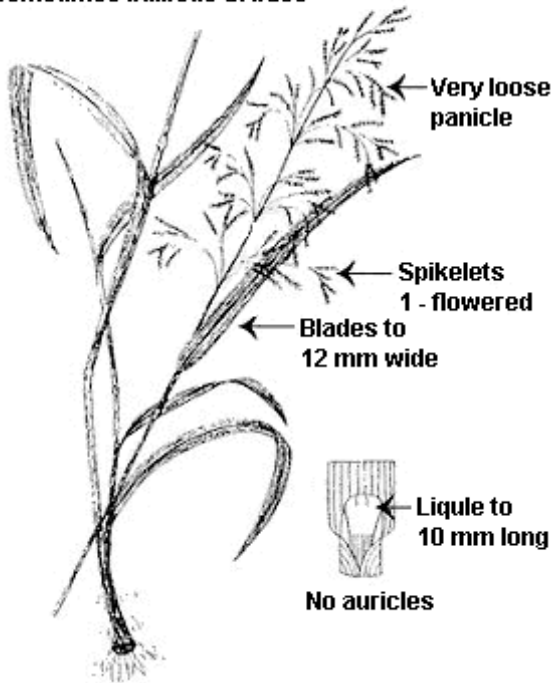
Plains rough fescue
Festuca hallii

- ◆ Cool season plant
- ◆ Short rhizomes



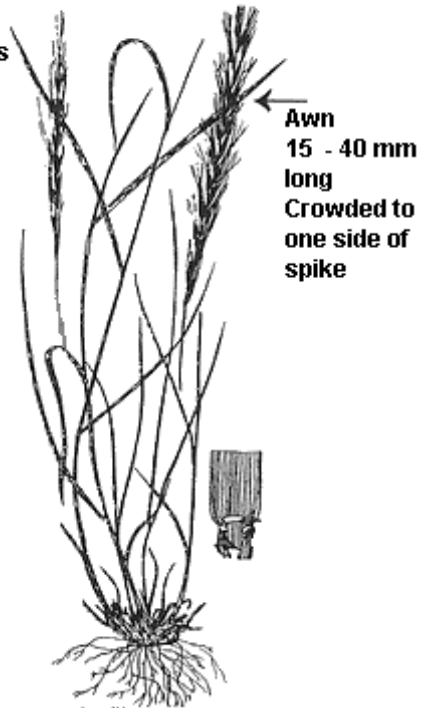
Slender wood grass
Cinna latifolia

- ♦ Cool season plant
- ♦ Fibrous roots, sometimes bulbous at base



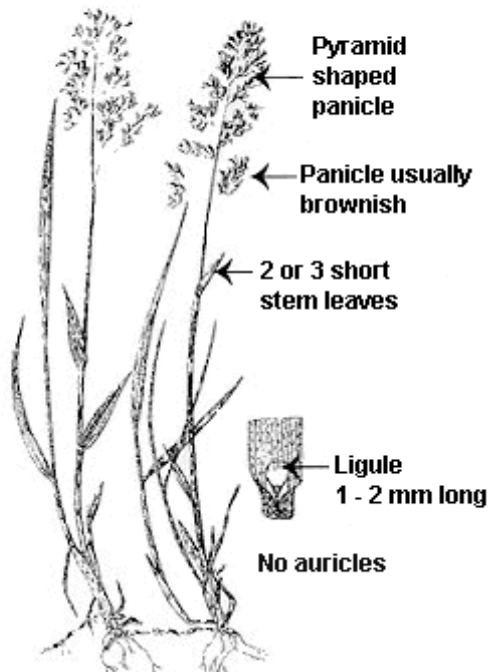
Awned wheat grass
Agropyron trachycaulum

- ♦ Cool season plant
- ♦ awned variety of slender wheat grass
- ♦ Fibrous roots



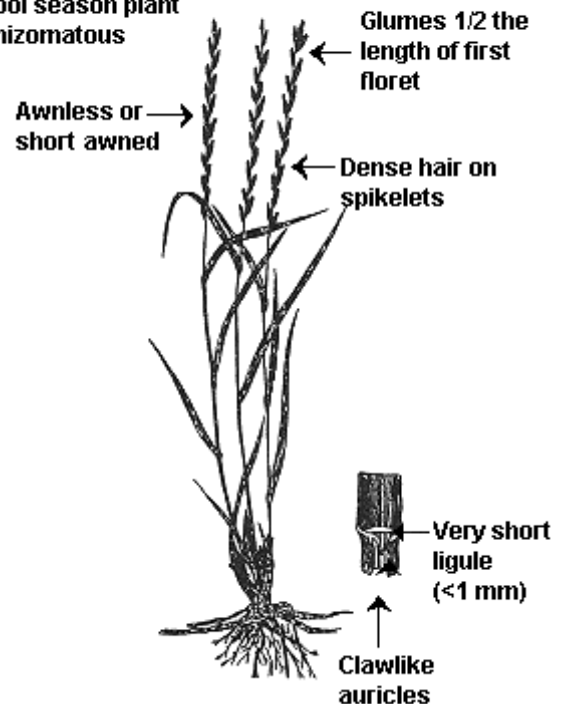
Sweet grass
Hierochloe odorata

- ♦ Cool season plant
- ♦ Extensive rhizomes



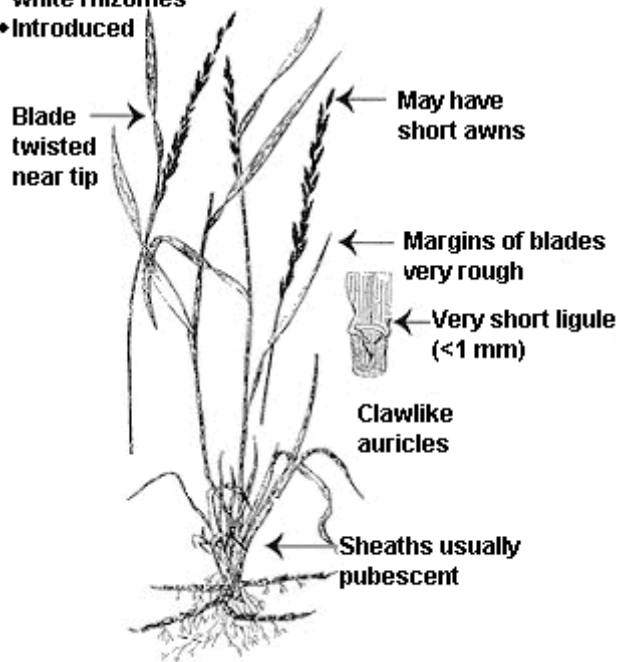
Northern wheat grass
Agropyron dasystachyum

- ♦ Cool season plant
- ♦ Rhizomatous



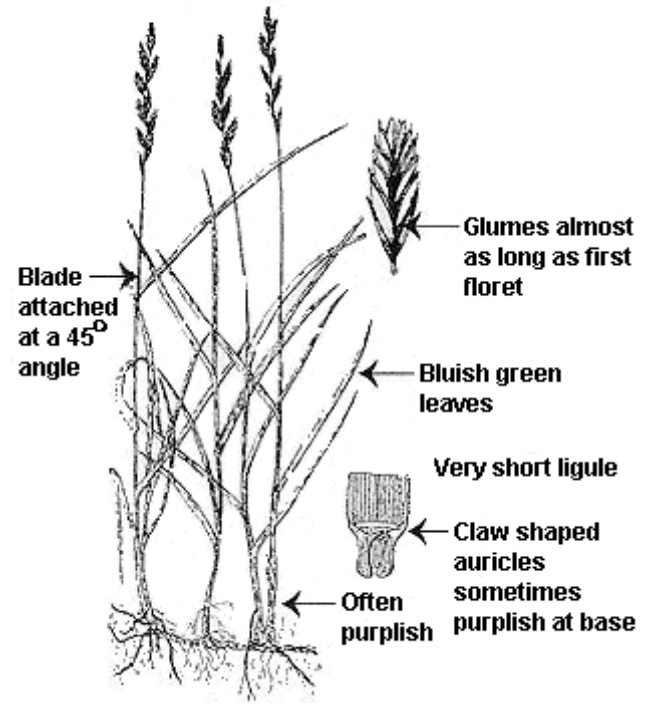
Quackgrass, couch grass
Agropyron repens

- ♦ Cool season grass
- ♦ Long yellowish white rhizomes
- ♦ Introduced



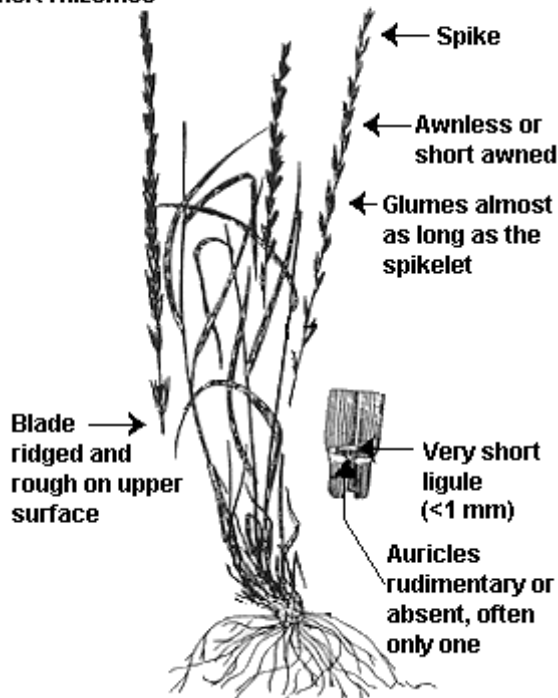
Western wheat grass, bluejoint
Agropyron smithii

- ♦ Cool season
- ♦ Rhizomatous



Slender wheat grass
Agropyron trachycaulum

- ♦ Cool season plant
- ♦ Short rhizomes



FORBS

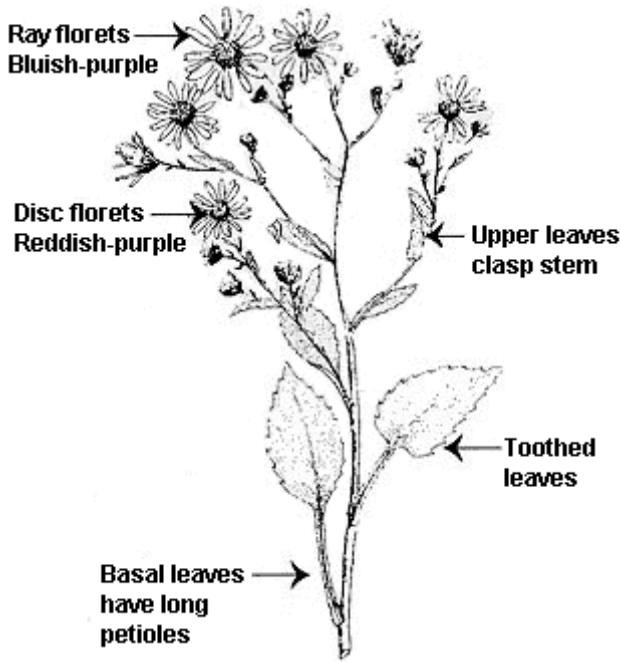
Broad-leaved Herbaceous Plants

Index of Forbs

Common Names	Botanical Names	Page
Lindley's aster	<i>Aster lindleyanus</i>	12
Spreading dogbane	<i>Apocynum androsaemifolia</i>	12
Snake root	<i>Sanicula marilandica</i>	12
Tall meadow rue	<i>Thalictrum dasycarpum</i>	12
American vetch	<i>Vicia Americana</i>	13
Philadelphia fleabane	<i>Erigeron philadelphicus</i>	13
Northern bedstraw	<i>Galium boreale</i>	13
Tall lungwort (bluebell)	<i>Mertensia paniculata</i>	13
Western Canada violet	<i>Viola rugulosa</i>	14
Common blue eyed grass	<i>Sisyrinchium angustifolium</i>	14
Canada goldenrod	<i>Solidago Canadensis</i>	14
Smooth aster	<i>Aster laevis</i>	14
Two leaved solomon's seal	<i>Maianthemum canadense</i>	15
Star-flowered solomon's seal	<i>Smilacina stellata</i>	15
Red baneberry	<i>Actaea rubra</i>	15
Canada anemone	<i>Anemone Canadensis</i>	15
Woodland strawberry	<i>Fragaria vrsca</i>	16
Yellow avens	<i>Geum aleppicum</i>	16
Three toothed cinquefoil	<i>Potentilla tridentate</i>	16
Rough cinquefoil	<i>Potentilla norvegica</i>	16
Cream colored vetchling	<i>Lathyrus ochroleucus</i>	17
Wild peavine	<i>Lathyrus venosus</i>	17
Wild sarsaparilla	<i>Arilia rudicaulis</i>	17
Fireweed	<i>Epilobium angustifolium</i>	17
Northern bog violet	<i>Viola nephrophylla</i>	18
Arrow-leaved colt's foot	<i>Petasites sagittatus</i>	18
Bunchberry	<i>Cornus Canadensis</i>	18
Cow parsnip	<i>Heracleum lanatum</i>	18

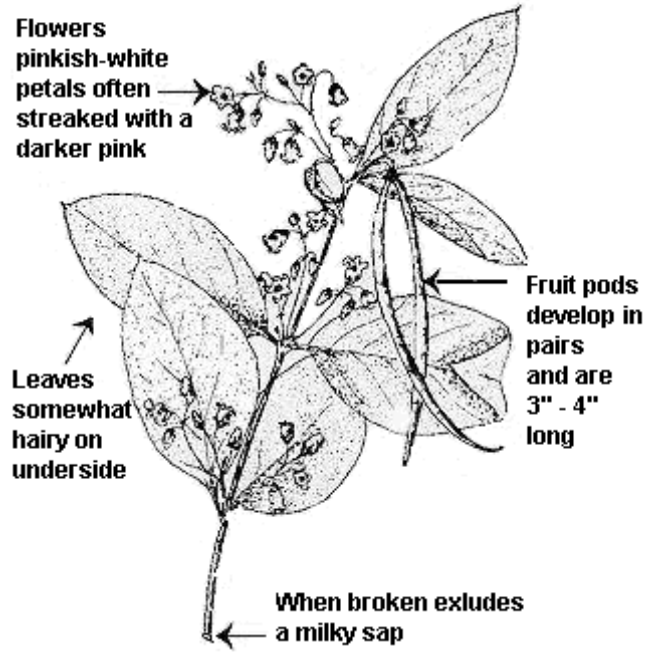
Lindley's aster
Aster Lindleyanus

◆ Perennial plant with alternate leaves



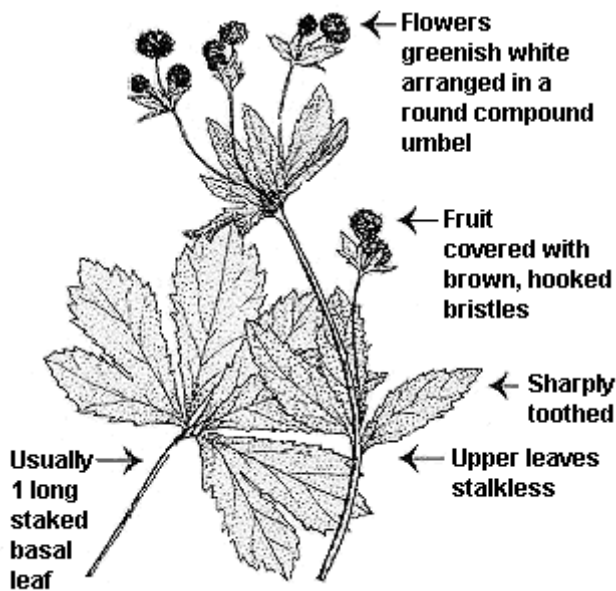
Spreading dogbane
Apocynum androsaemifolium

◆ Bushy perennial with opposite leaves



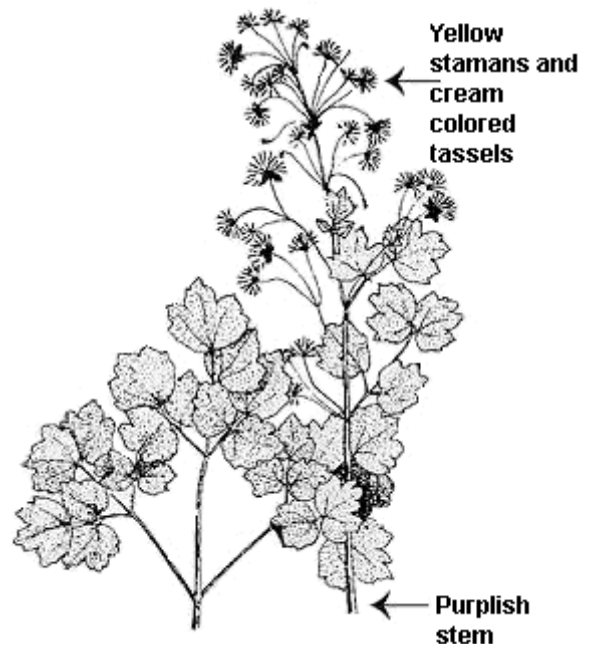
Snakeroot
Sanicula marilandica

◆ Erect perennial



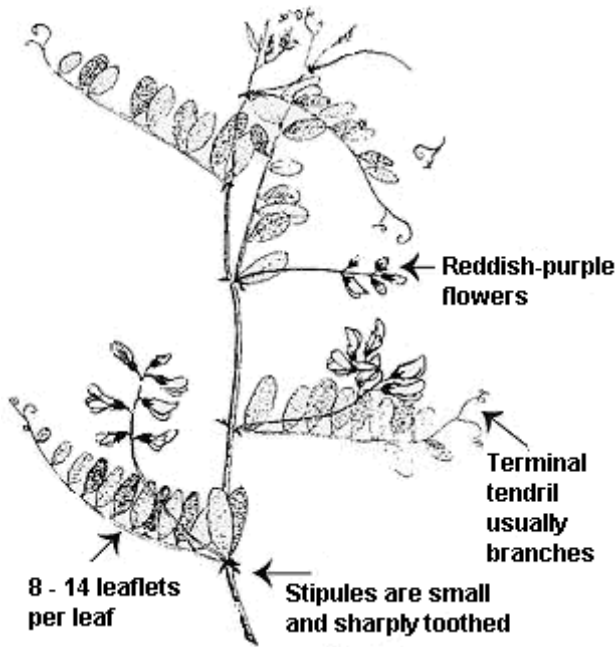
Tall meadow rue
Thalictrum dasycarpum

◆ Erect perennial with alternate leaves



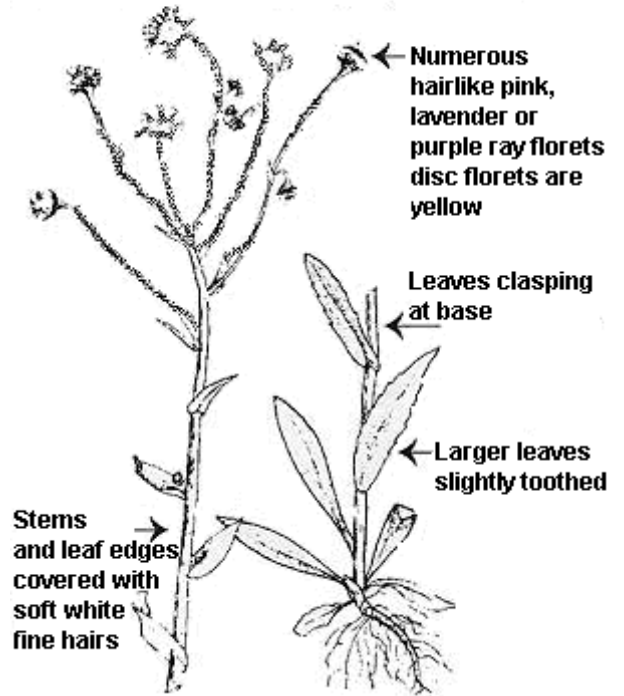
American vetch
Vicia americana

- ◆ Climbing perennial with alternate pinnately compound leaves



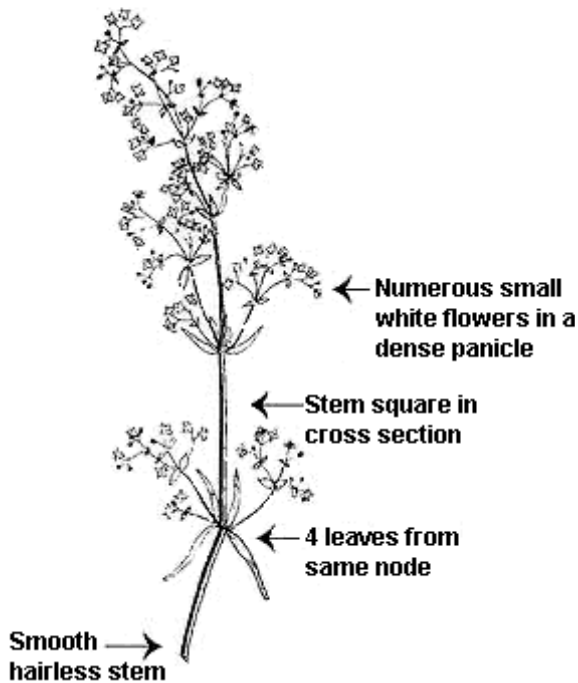
Philadelphia fleabane
Erigeron philadelphicus

- ◆ Perennial plant with alternate leaves



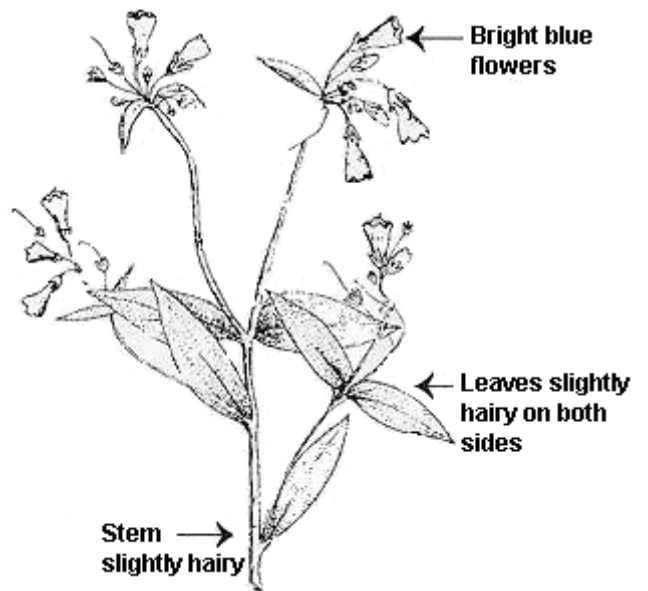
Northern bedstraw
Galium boreale

- ◆ Erect perennial with whorled leaves



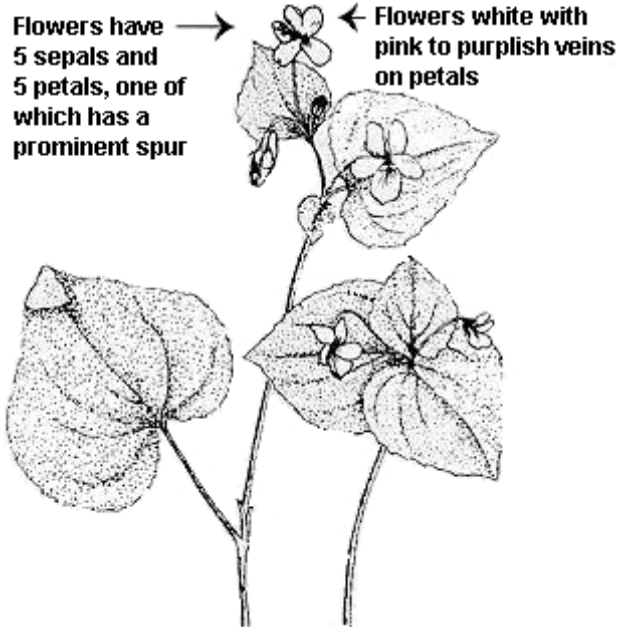
Tall lungwort
Mertensia paniculata

- ◆ Tall perennial with alternate leaves



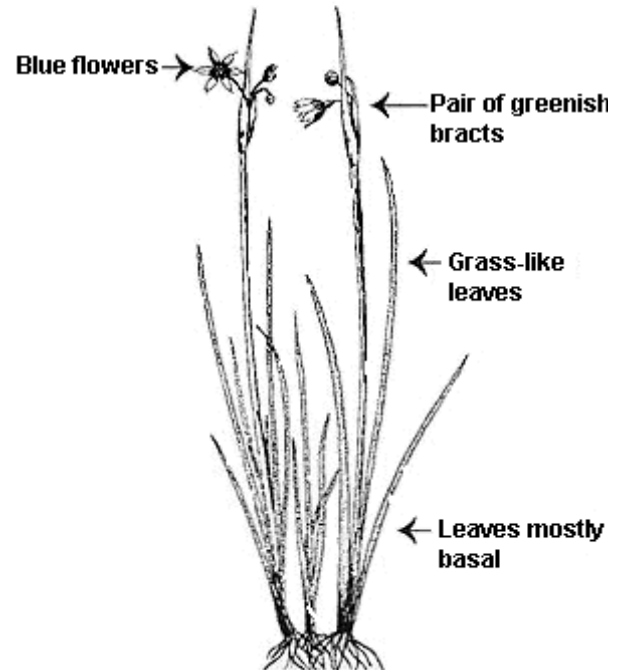
Western Canada violet
Viola rugulosa

- ◆ Perennial with alternate leaves
- ◆ Underground rootstocks



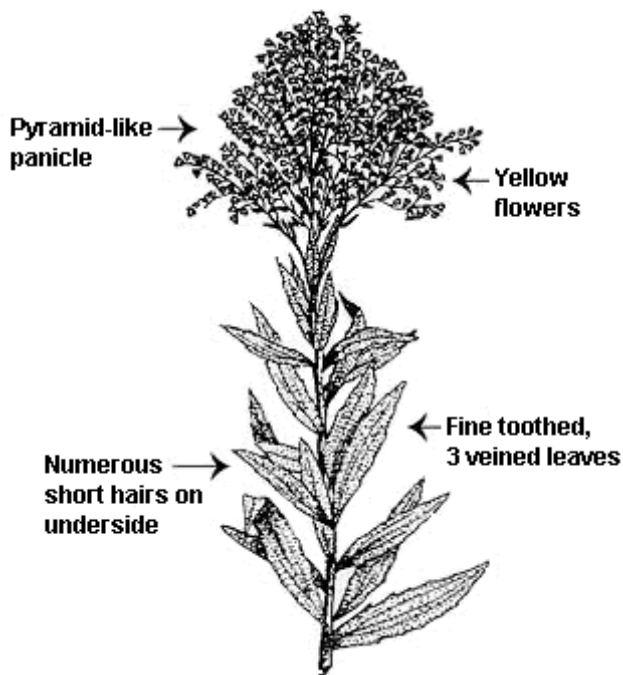
Common blue-eyed grass
Sisyrinchium montanum

- ◆ Perennial plant growing in clumps



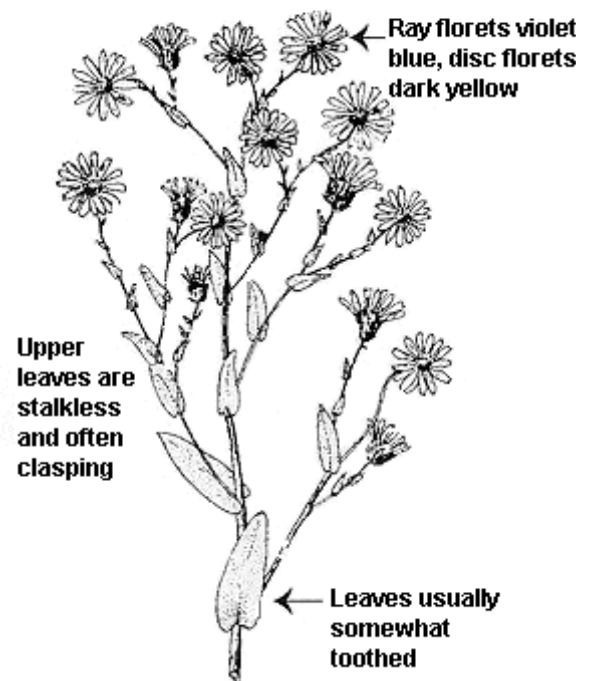
Canada goldenrod
Solidago canadensis

- ◆ Tall perennial with alternate leaves



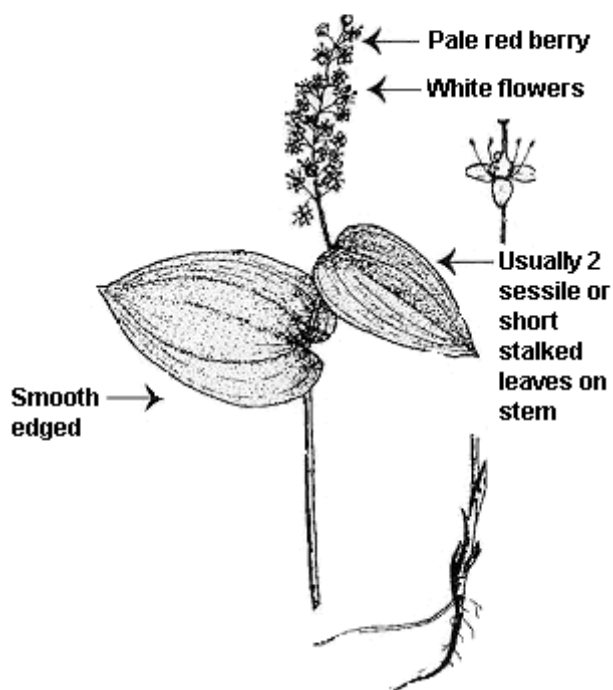
Smooth aster
Aster laevis

- ◆ Perennial plant with alternate leaves



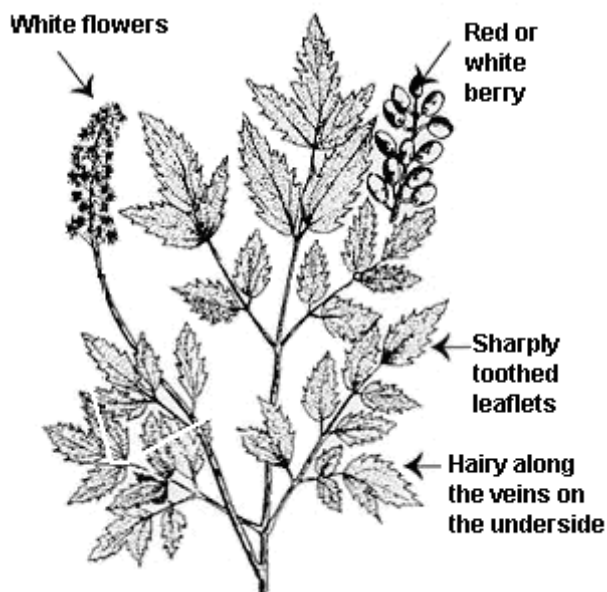
Two-leaved solomon's seal
Maianthemum canadense var.

◆ Low perennial with alternate leaves



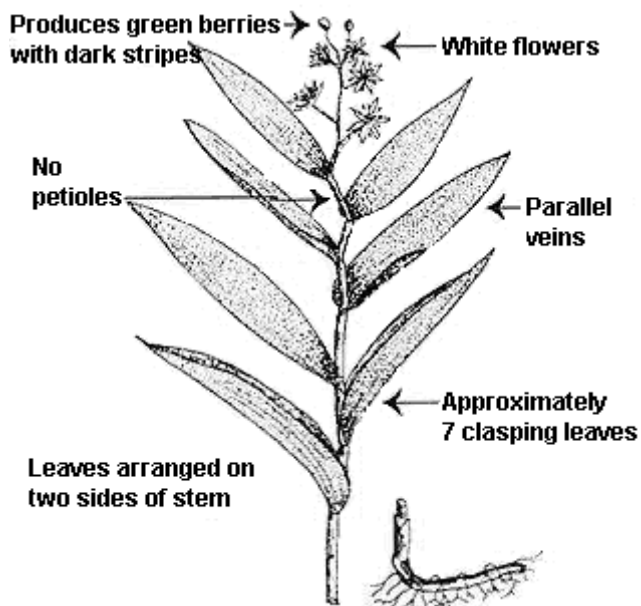
Red baneberry
Actaea rubra

◆ Erect perennial with compound leaves



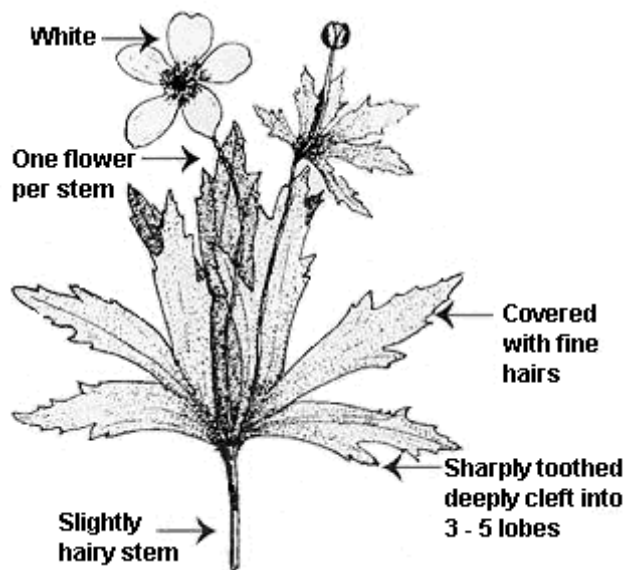
Star-flowered solomon's seal
Smilacina stellata

◆ Perennial with alternate leaves



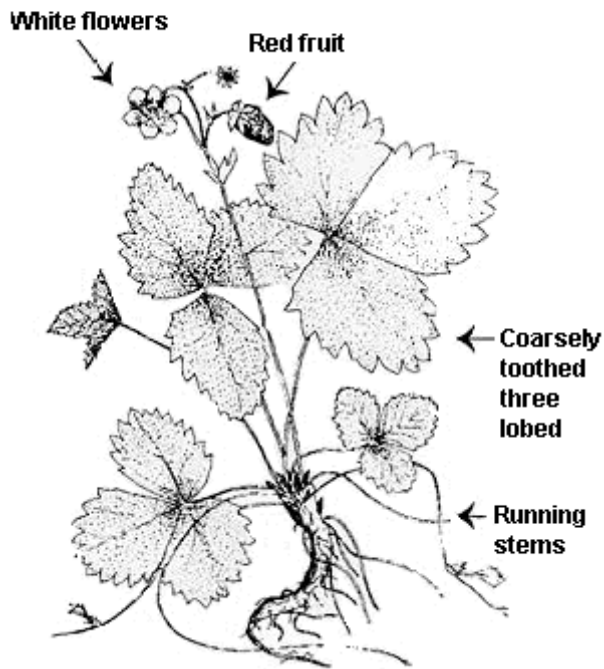
Canada anemone
Anemone canadensis

◆ Perennial
◆ Fruits enclosed in a green mace-like globular head



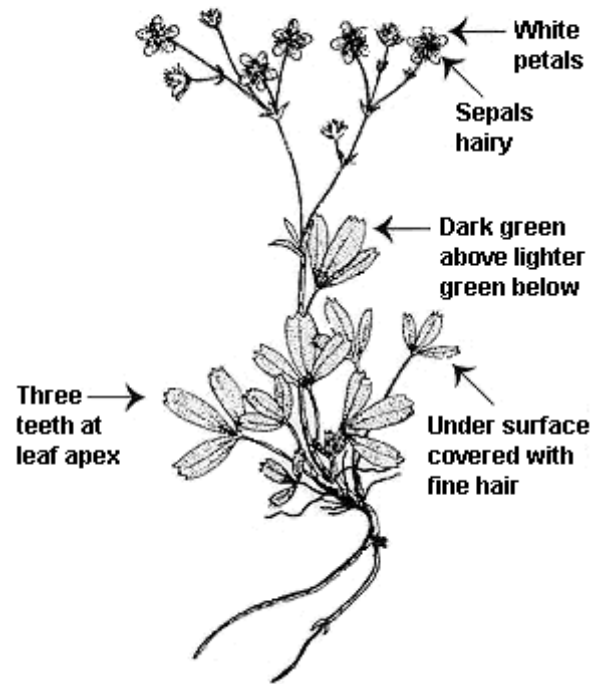
Woodland strawberry
Fragaria vesca

◆ Perennial with alternate leaves



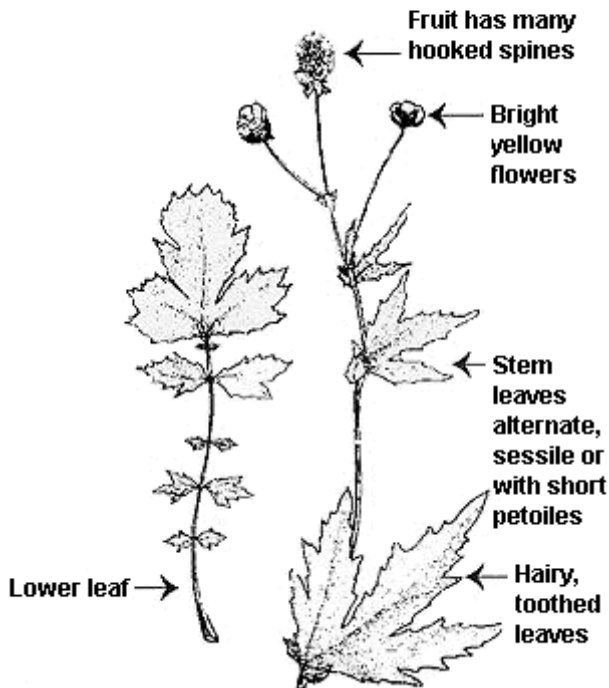
Three-toothed cinquefoil
Potentilla tridentata

◆ Woody perennial



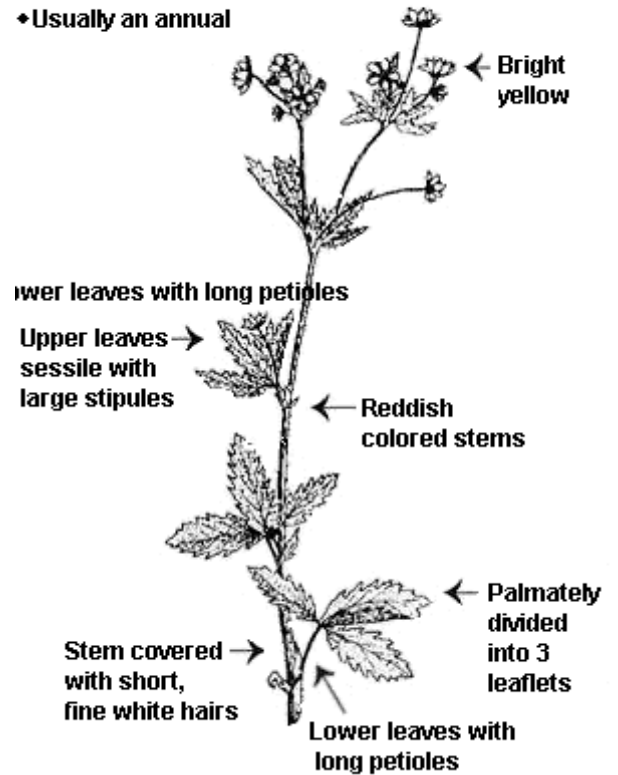
Yellow avens
Geum aleppicum

◆ Perennial with mostly basal leaves



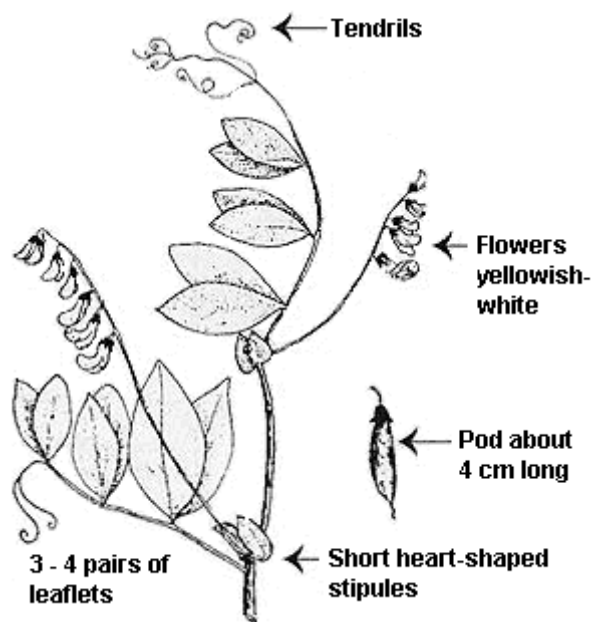
Rough cinquefoil
Potentilla norvegica

◆ Usually an annual



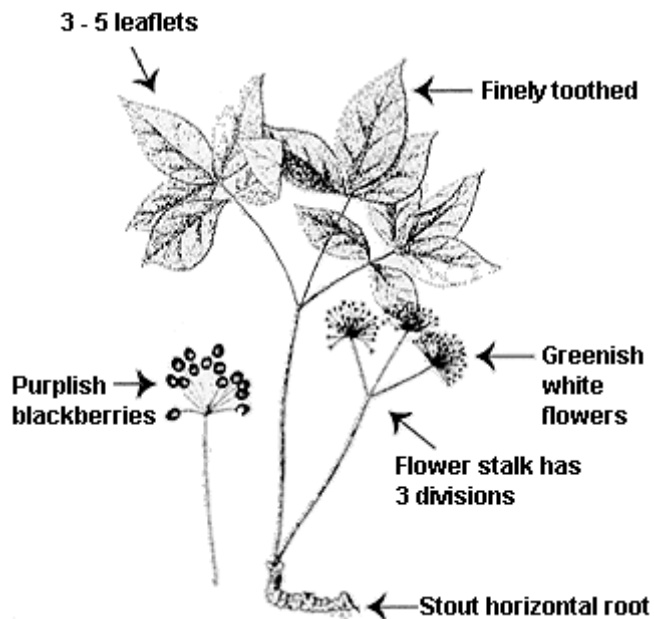
Cream colored vetchling
Lathyrus ochroleucus

- ◆ Climbing perennial with alternate pinnately compound leaves



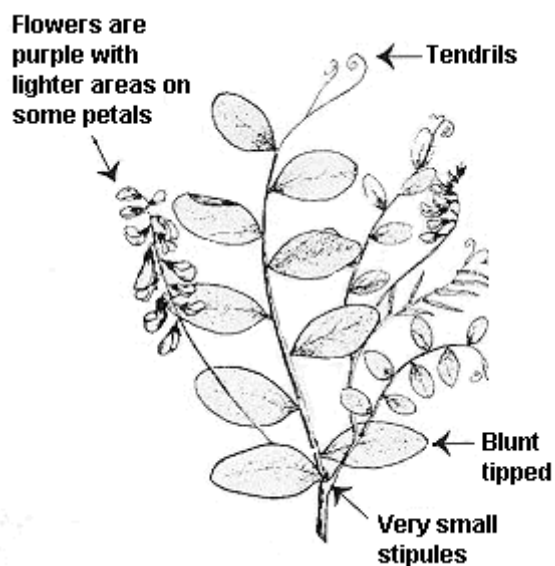
Wild sarsaparilla
Aralia nudicaulis

- ◆ Perennial with creeping root stock



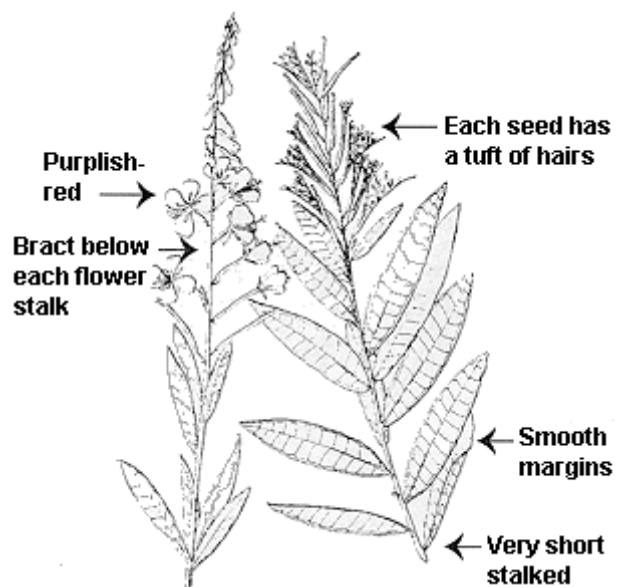
Wild pea-vine
Lathyrus venosus

- ◆ Climbing perennial with alternate pinnately compound leaves

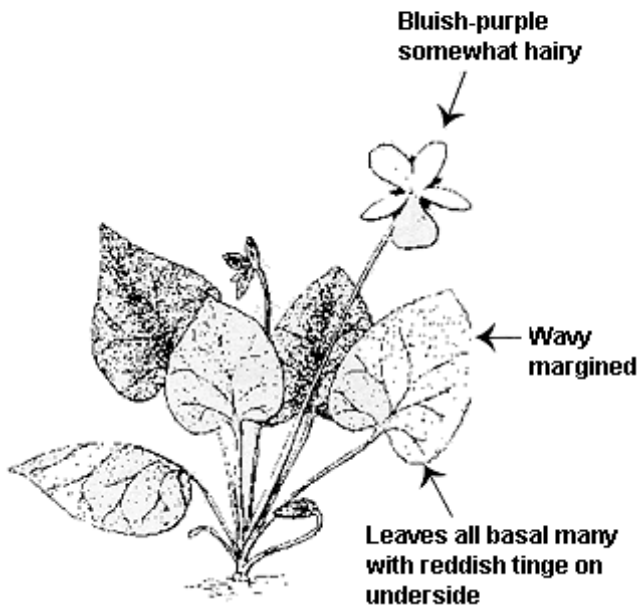


Fireweed
Epilobium angustifolium

- ◆ Tall perennial with alternate leaves

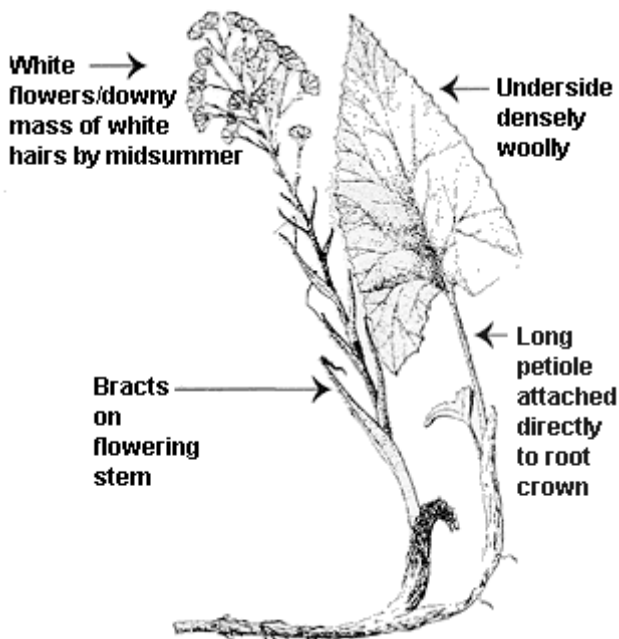


Northern bog violet
Viola nephrophylla



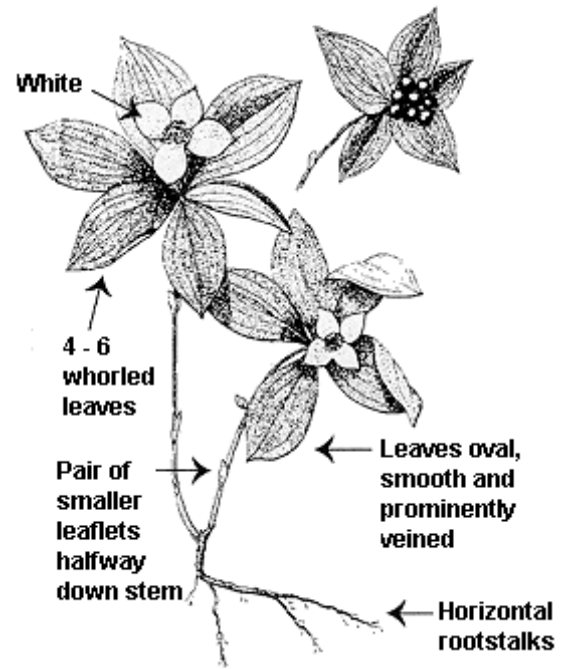
Arrow-leaved colt's foot
Petasites sagittatus

- ◆ Perennial developing flowering stem before leaves appear



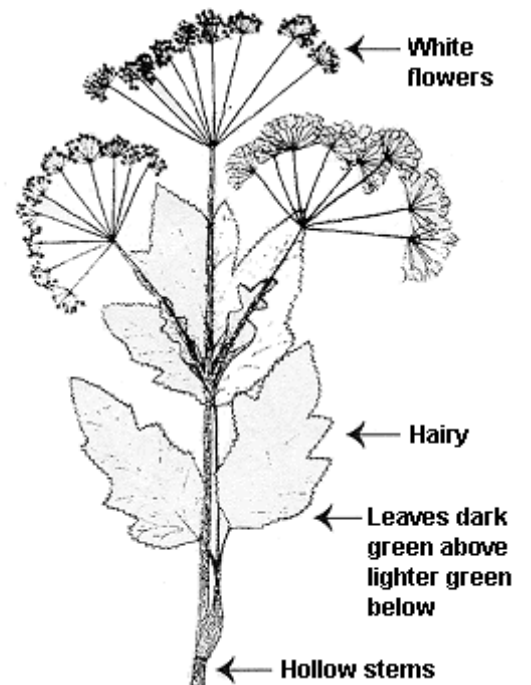
Bunchberry
Cornus canadensis

- ◆ Short perennial usually forming a dense mat
- ◆ Fruit is red orange



Cow-parsnip
Heracleum lanatum

- ◆ Tall perennial with alternate leaves



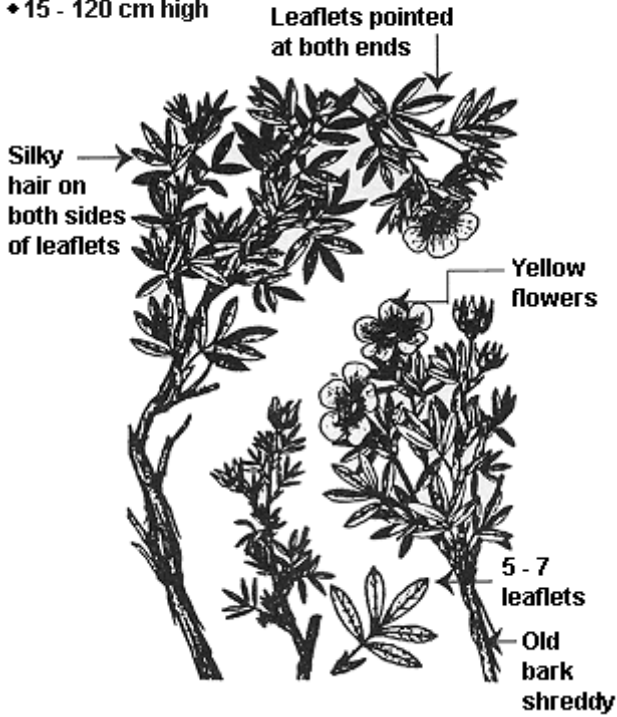
Shrubs

See leaf morphology in the
Forbs Section

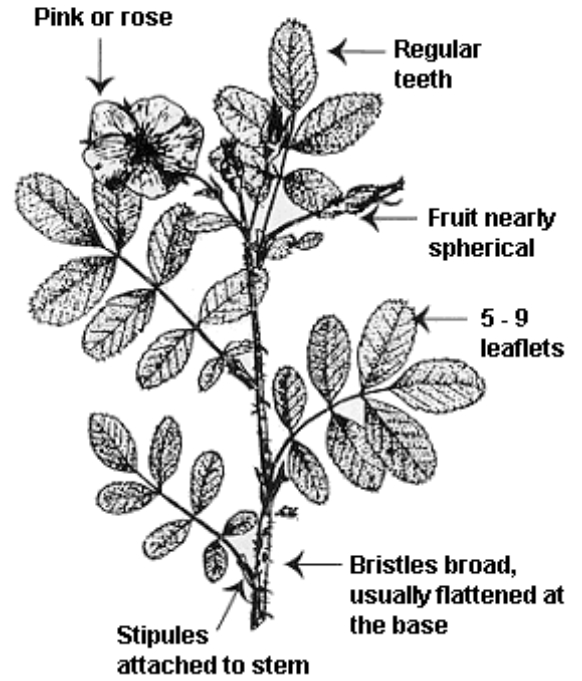
Common Names	Botanical Names	Page
Shrubby cinquefoil	<i>Potentilla pruticosa</i>	20
Bearberry	<i>Arctostaphylos uva-ursi</i>	20
Wood's rose	<i>Rosa woodsii</i>	20
Wolfwillow	<i>Elaeagnus commutata</i>	20
Saskatoon	<i>Amelanchier alnifolia</i>	21
Chokecherry	<i>Prunus virginiana</i>	21
Western snowberry	<i>Symphoricarpos occidentalis</i>	21
Labrador tea	<i>Ledum groenlandicum</i>	21
Wild black currant	<i>Ribes hudsonianum</i>	22
Northern goose berry	<i>Ribes oxycanthoides</i>	22
Beaked hazelnut	<i>Corylus cornuta</i>	22
Wild red raspberry	<i>Rubus idaeus</i>	22
Trembling Aspen	<i>Populus tremuloides</i>	23
Balsam poplar	<i>Populus balsamifera</i>	23
Red-osier dogwood	<i>Cornus stolonifera</i>	23
Green alder	<i>Alnus crispa</i>	23
Dwarf birch	<i>Betula glandulosa</i>	24
Dewberry	<i>Rubus pubescens</i>	24

Shrubby cinquefoil
Potentilla fruticosa

- ◆ Densely branched shrub
- ◆ 15 - 120 cm high

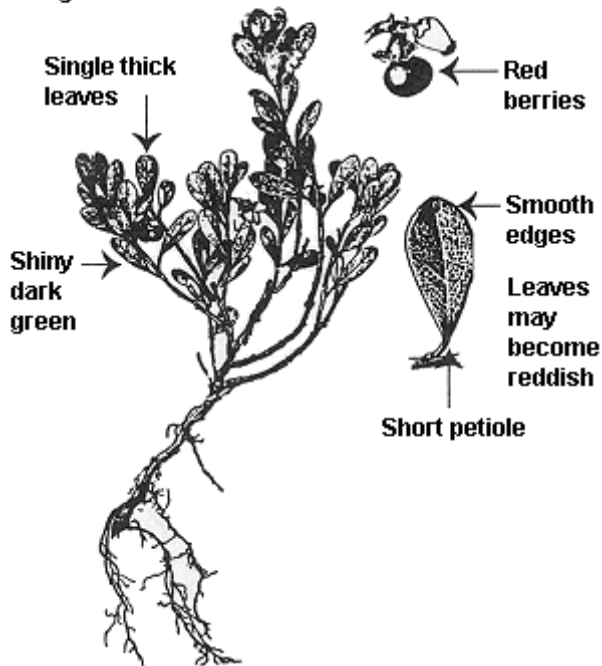


Wood's rose
Rosa woodsii

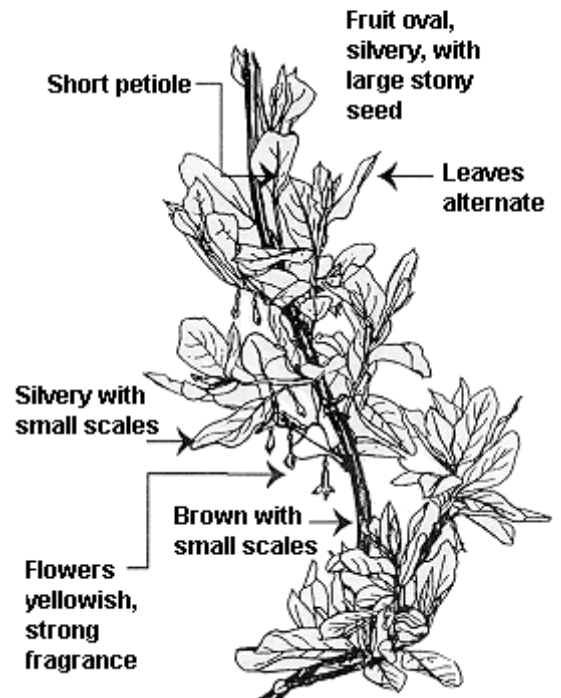


Bearberry
Arctostaphylos uva-ursi

- ◆ Flowers white or pink
- ◆ Low growing shrub
- ◆ Evergreen

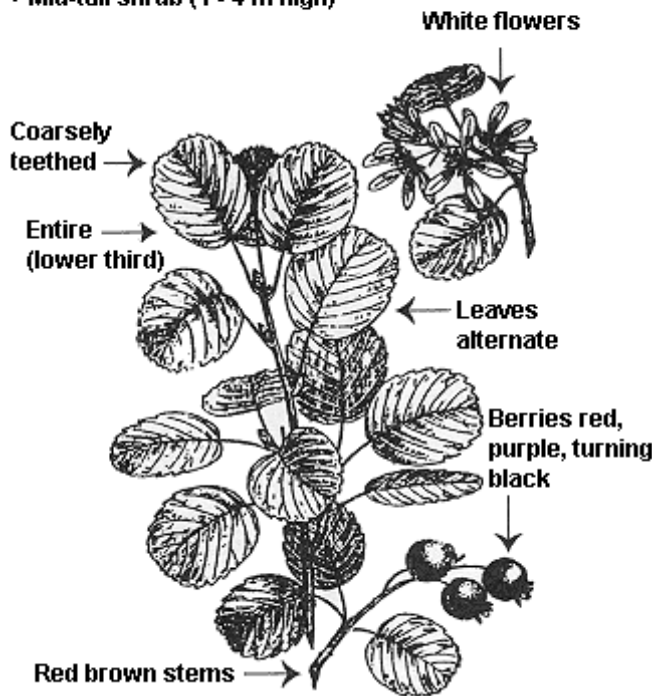


Wolfwillow (silverwillow)
Elaeagnus commutata



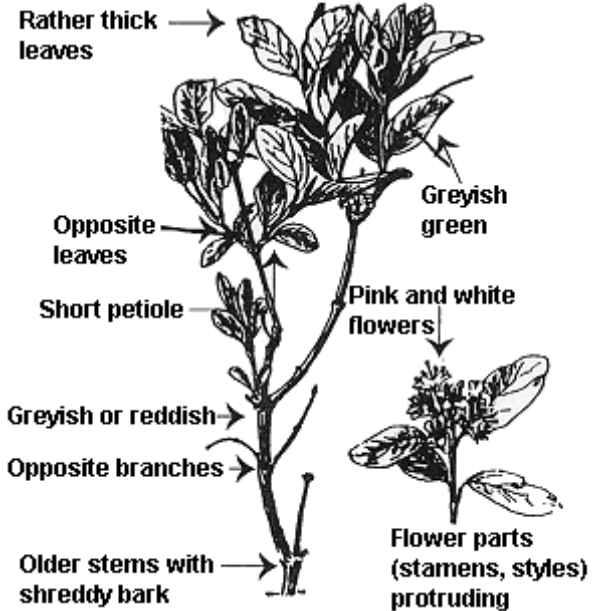
Saskatoon
Amelanchier alnifolia

- ◆ Mid-tall shrub (1 - 4 m high)



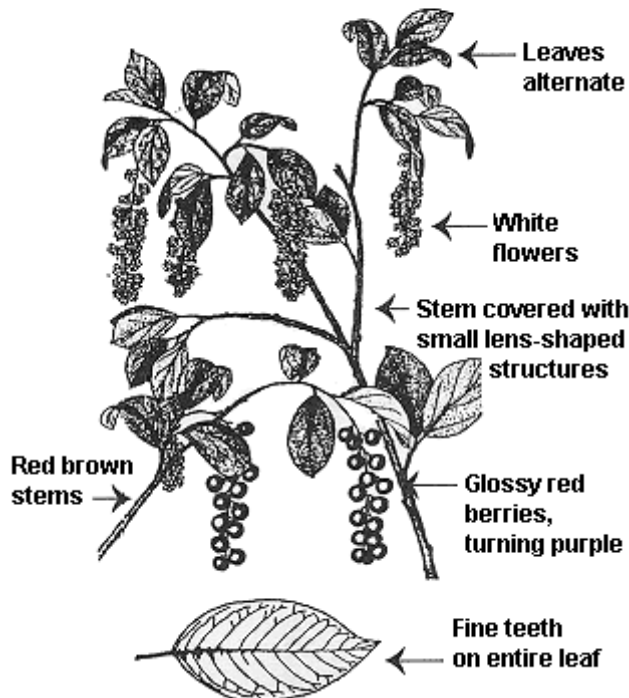
Western snowberry (buckbrush)
Symphoricarpos occidentalis

- ◆ 40 - 100 cm high
- ◆ Strongly creeping roots
- ◆ Many berries per cluster
- ◆ Berries greenish white (brown or purple with age)



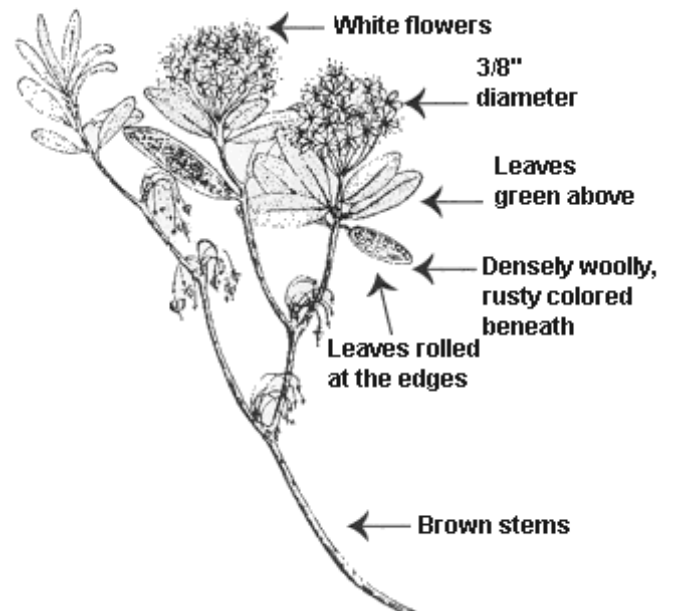
Chokecherry
Prunus virginiana

- ◆ Mid-tall shrub (1 - 3 m high)



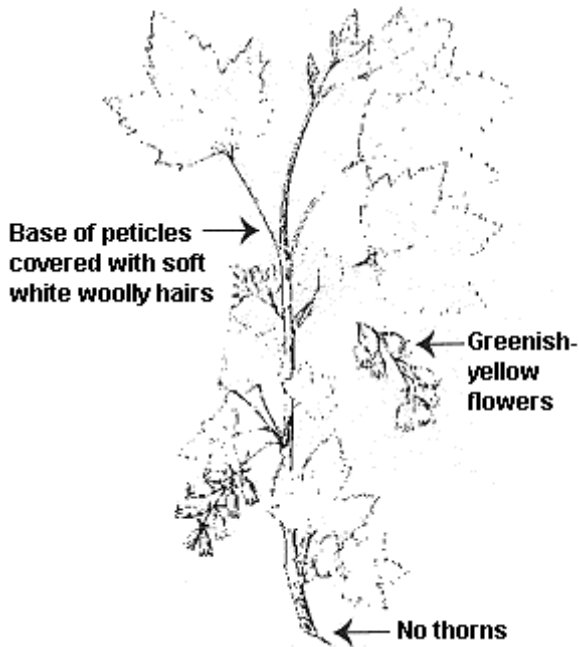
Labrador tea
Ledum groenlandicum

- ◆ 2 - 3 foot shrub

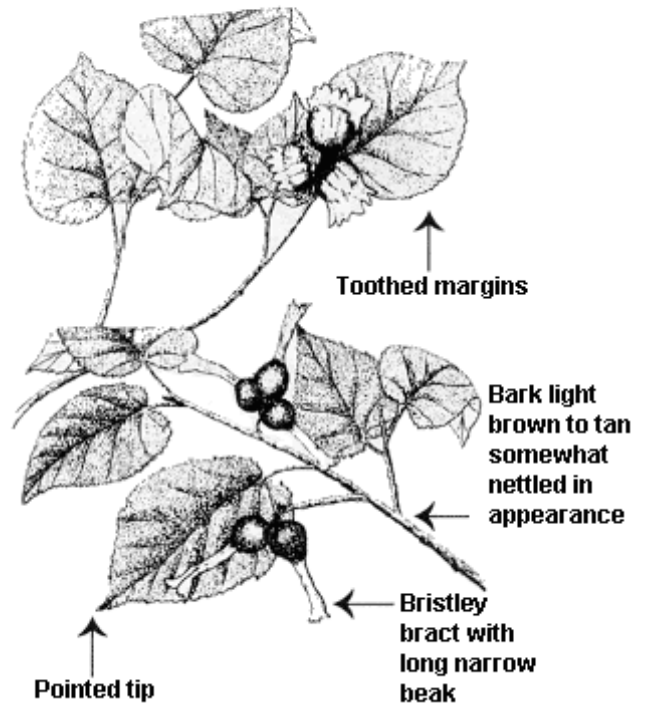


Wild black currant
Ribes americanum

- ◆ Fruit black
- ◆ Goose berry family



Beaked Hazelnut
Corylus cornuta



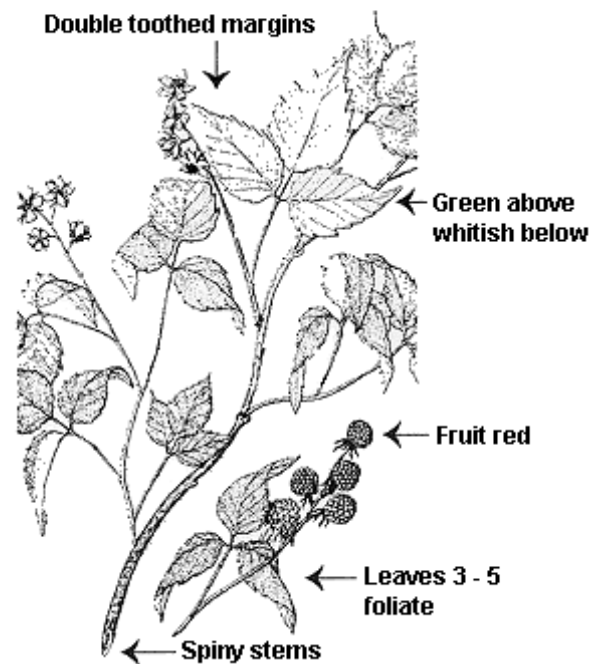
Northern gooseberry
Ribes oxycanthoides

- ◆ Flowers white sometimes tinged with purple
- ◆ Gooseberry family
- ◆ Fruit red



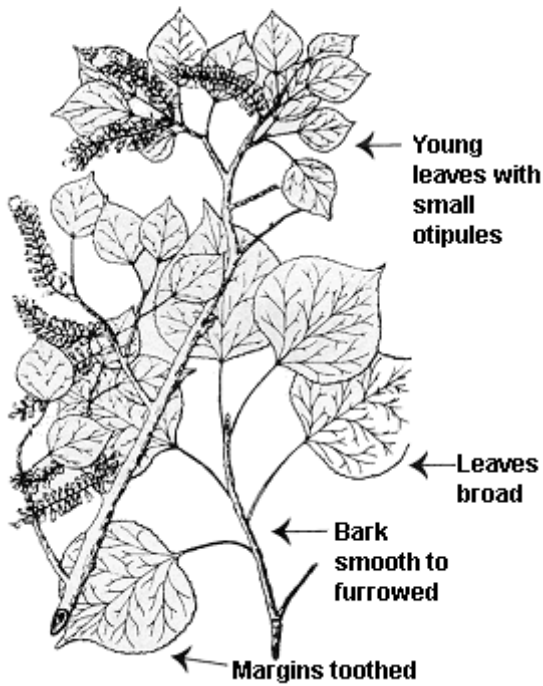
Wild red raspberry
Rubus idaeus

- ◆ Erect shrub
- ◆ Perennial with biennial stems



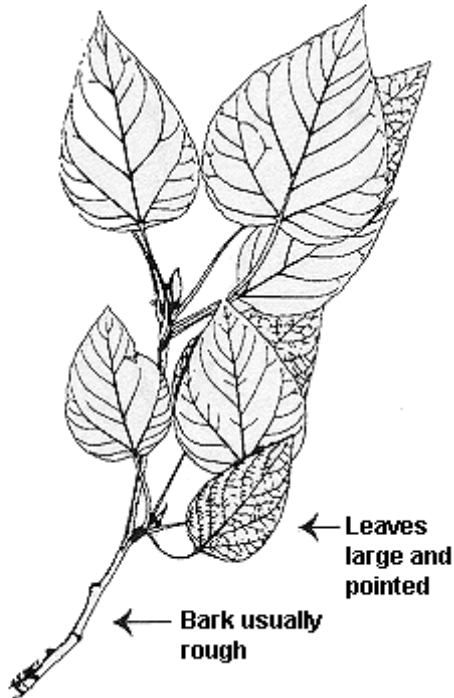
Trembling aspen
Populus tremuloides

♦ Tall tree



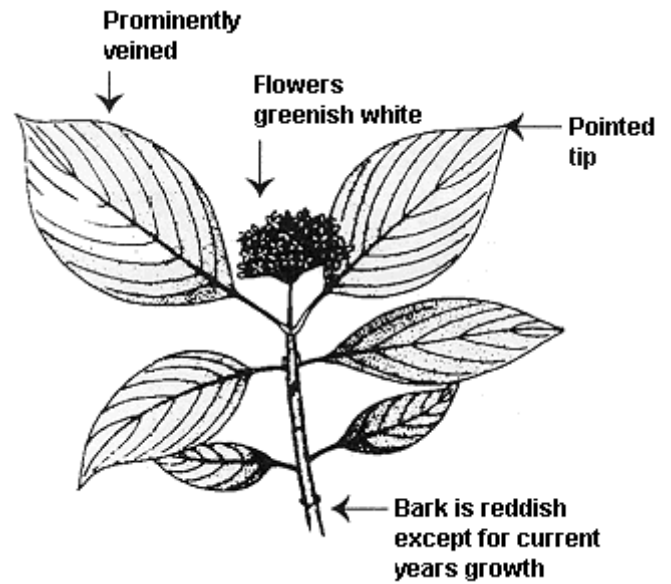
Balsam poplar
Populus balsamifera

♦ Tall tree



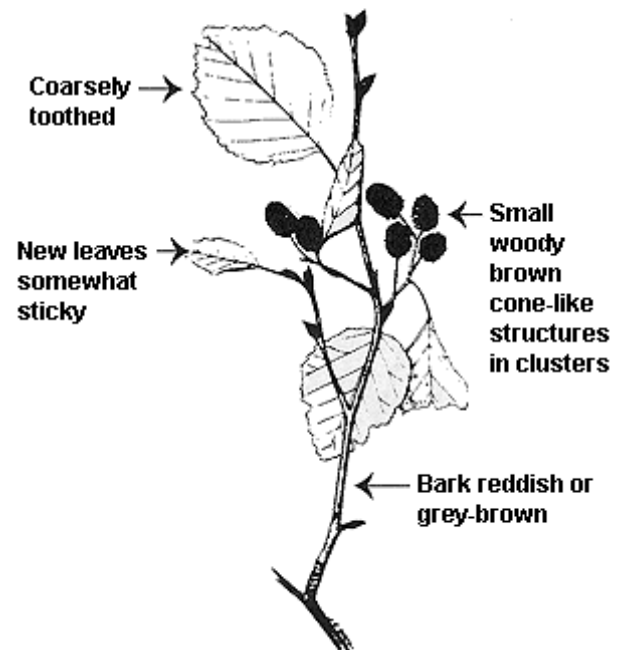
Red Osier Dogwood
Cornus stolonifera

- ♦ Branch shrub with opposite leaves
- ♦ .8 - 2m high
- ♦ Fruit green ripening to white



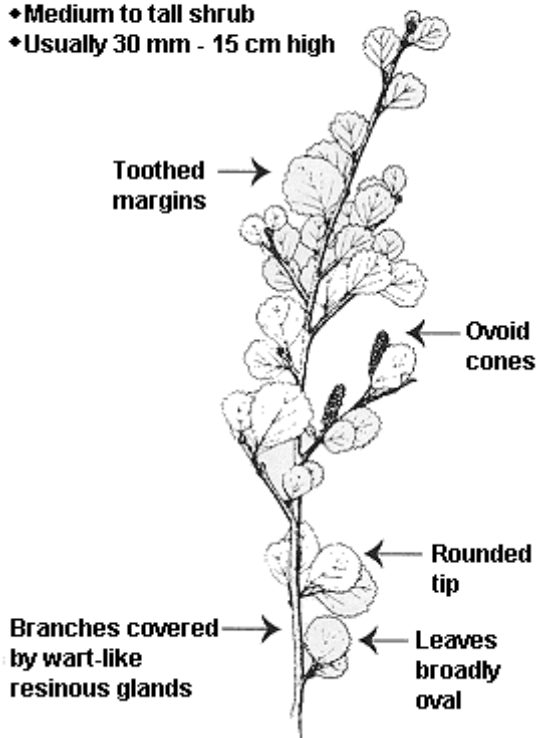
Green alder
Alnus crispa

- ♦ Tall shrub with many stems
- ♦ Usually 1 - 3 m tall
- ♦ Replaced by beaked hazelnut in southern boreal



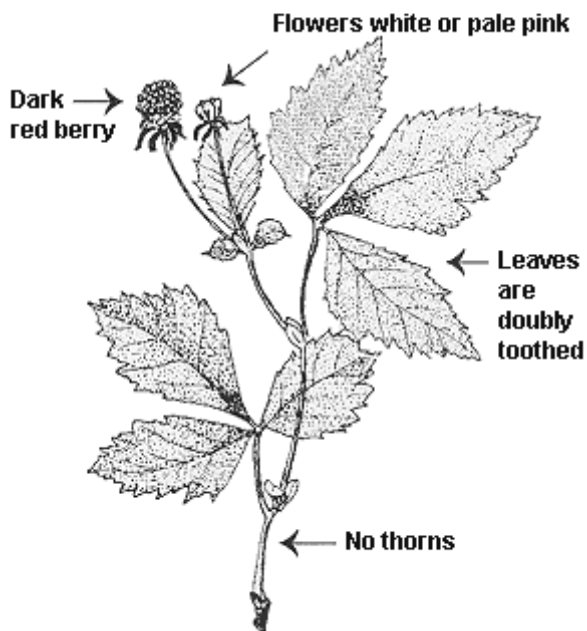
Bog birch, dwarf birch
Betula glandulosa

- ◆Medium to tall shrub
- ◆Usually 30 mm - 15 cm high



Dewberry
Rubus pubescens

- ◆Trailing or climbing perennial with alternate leaves



Grasses

Common Names	Grazing Response	Forage Value
Awned wheatgrass	Decreaser	Good
Canada bluegrass	Invader	Good
Canada rice grass	NA	NA
Fringed bromegrass	Decreaser	Good
Green needlegrass	Decreaser	Good
Hooker's oat grass	Decreaser	Good
Hairy wildrye	Increaser	Fair
Intermediate oat grass	Increaser	Fair
Junegrass	Increaser	Good
Kentucky bluegrass	Invader	Good
Marsh reedgrass	Decreaser	Fair
Narrow reedgrass	Decreaser	Fair
Northern rice grass	Decreaser	Good
Northern wheatgrass	Increaser	Good
Purple oat grass	Increaser	Fair
Plains rough fescue	Decreaser	Good
Quackgrass	Invader	Fair
Rough hair grass	Invader	Poor
Richardson's needlegrass	Decreaser	NA
Smooth bromegrass	Invader	Good
Slender wood grass	NA	Good
Slender wheat grass	Decreaser	Good
Sweet grass	Increaser	Fair
Tufted hair grass	Decreaser	Good
Western Porcupine grass	Increaser	Good
Western wheat grass	Increaser	Good
White grained grass	Decreaser	Good

Forbs

Common Names	Grazing Response	Forage Value
American vetch	Decreaser	Good
Arrow-leaved coltsfoot	Increaser	Poor
Bunchberry	Increaser	Poor
Canada goldenrod	Increaser	Fair
Canada anemone	Increaser	Fair
Common blue eyed grass	NA	NA
Cow parsnip	Decreaser	Fair
Cream colored vetchling	Decreaser	Good
Fireweed	Increaser	Fair
Lindley's Aster	Invader	Fair
Northern bog violet	Increaser	Fair
Northern bedstraw	Increaser	Fair
Philadelphia fleabane	NA	Fair
Red baneberry	Increaser	Fair
Rough cinquefoil	Increaser	Poor
Smooth aster	Increaser	NA
Snake root	Increaser	Fair
Spreading dogbane	NA	Poor
Star-flowered solomon's seal	Decreaser	Good
Tall meadow rue	Increaser	Fair
Tall lungwort (bluebell)	Decreaser	Good
Three toothed cinquefoil	Increaser	Poor
Two leaved solomon's seal	Decreaser	Good
Western Canada violet	Increaser	Fair
Wild strawberry	Increaser	Poor
Wild peavine	Decreaser	Good
Wild sarsparilla	Increaser	Poor
Yellow avens	Increaser	NA

Shrubs

Common Names	Grazing Response	Forage Value
Aspen (saplings)	Decreaser	Good
Balsam poplar (saplings)	Increaser	Fair
Beaked hazelnut	Increaser	Fair
Bear berry	Increaser	Poor
Chokecherry	Decreaser	Fair
Dewberry	Increaser	Poor
Dwarf birch	Increaser	Poor
Green alder	Increaser	Poor
Labrador tea	Increaser	Poor
Northern gooseberry	Increaser	Poor
Red-osier dogwood	Decreaser	Good
Saskatoon	Decreaser	Good
Shrubby cinquefoil	Increaser	Poor
Western snowberry	Increaser	Poor
Wild black currant	Increaser	Poor
Wild red raspberry	Increaser	Fair
Wolf willow	Increaser	Poor
Wood's rose	Increaser	Fair

NA – Information not available

Adapted from:

Anonymous, 1990. *Managing Saskatchewan Rangeland – New Pastures and Grazing Technologies Project.*

Ehlert, G., 1990. *Draft Aspen Mixedwood Range Condition Score Card and Range Management Section, Public lands Division, Northern Region.*

Acknowledgements

The field guide was compiled and edited by Allan Foster, Rangeland and Forage Agrologist, Livestock Development Branch, Saskatchewan Agriculture, Food and Rural Revitalization.

Thanks to Agriculture and Agri-Food Canada for the permission to copy and use the illustrations in this publication.

Thanks are due to Gordon Parker (Head, Technology Transfer, Agriculture and Agri-Food Canada Research Station, Swift Current) for his co-operation and for locating the illustrations.

Funding for the publication of the guide was provided by the Canada - Saskatchewan Agriculture and Food Innovation Fund.



Canada

Saskatchewan

Sources of Information and Further Readings:

Carmichael, Lloyd. 1976. *Woodland Wildflowers of Eastern Saskatchewan.* Saskatchewan Museum of Natural History, Regina, Sask.

Carmichael, Lloyd. 1967. *Saskatchewan Wildflowers, Western Area.* Saskatchewan Museum of Natural History, Regina, Sask.

Corns, I. G. W. and R. M. Annas. 1986. *Field Guide to Forest Ecosystems of West-central Alberta.* Can. For. Serv. For. Cent., Edmonton, Alberta.

Looman, J. 1983. *III Rangeland Forage Plants of the Canadian Prairies.* Research Branch, Agriculture Canada Publication 1751.

Looman, J. and K. F. Best. 1979. *Buds Flora of the Canadian Prairies.* Research Branch, Agriculture Canada publication 1662.

Moss, E. H. 1977. *Flora of Alberta.* University of Toronto Press.

Vance, F. R., J. R. Jowsey and J. S. McLean, 1991. *Wildflowers Across the Prairies.* Western Producer Books. Saskatoon, Saskatchewan.

For more information, contact:

the nearest Saskatchewan
Agriculture, Food and Rural
Revitalization Rural Service Centre