Wildflowers of Medicine Bow

Flowers and Nature







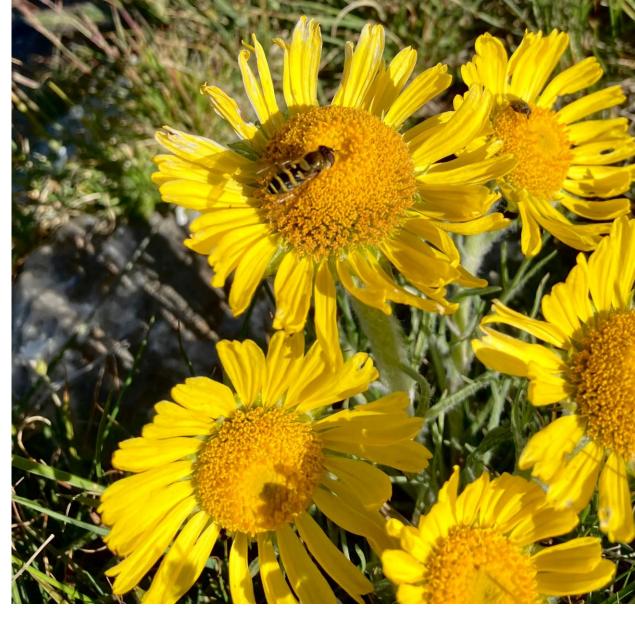
Old man of Mountain
Alpine sunflower
Tetraneuris grandiflora
Perennial
Mid spring brilliant
flower of high alpine
areas



Old man of the Mountain

White = Cerastrum arvense ssp strictum Prairie mouse ear Stitchwort chickweed



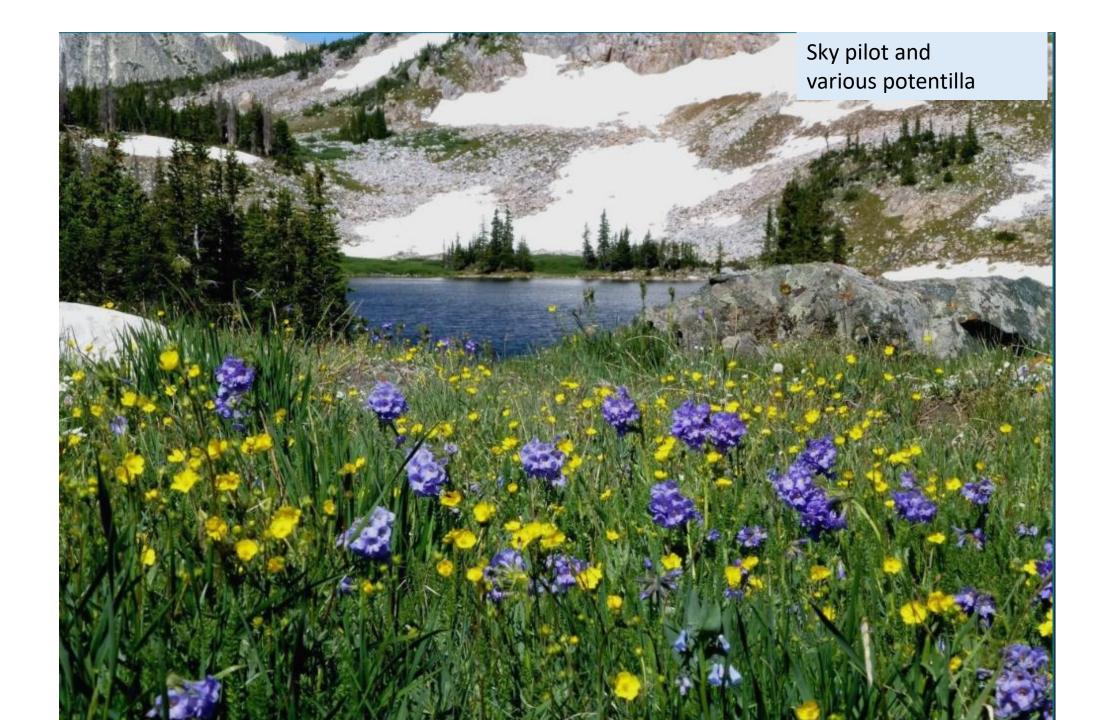


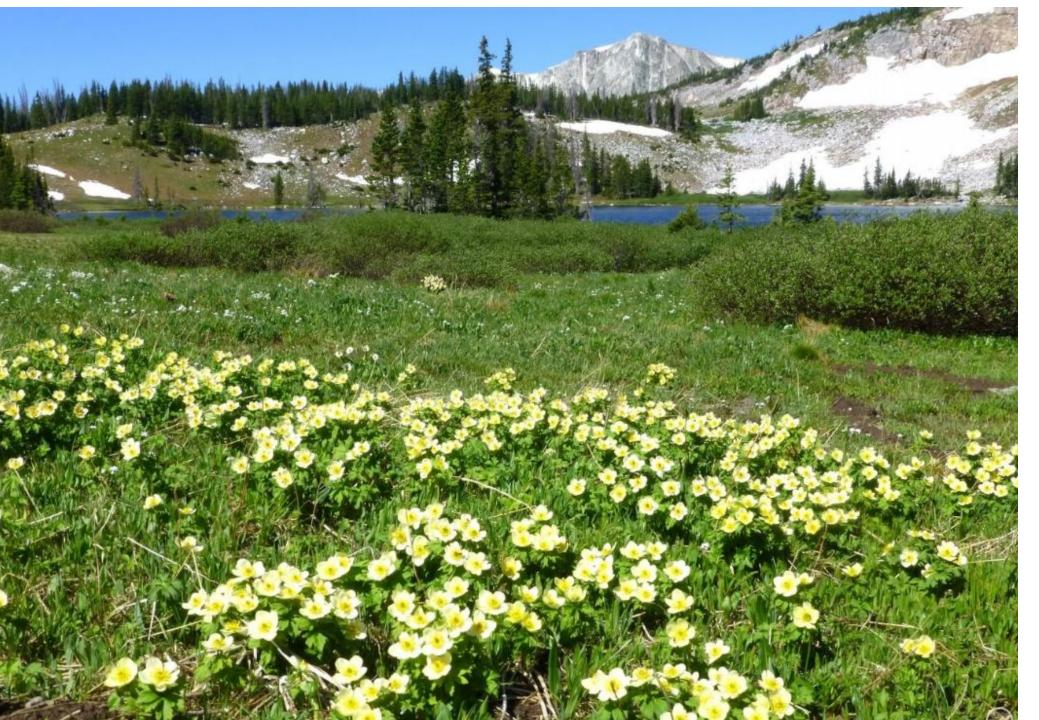
Hover Fly / Flower fly



Rocky Mtn Jacobs ladder Or Sky Pilot

Polemonium sp





Libby lake Marshes early spring

Trollius albiflorus
Globeflower
Buttercup
/ranunculus family
The leaves are
divided



Streamside early spring Marsh Marigold Caltha leptosepala

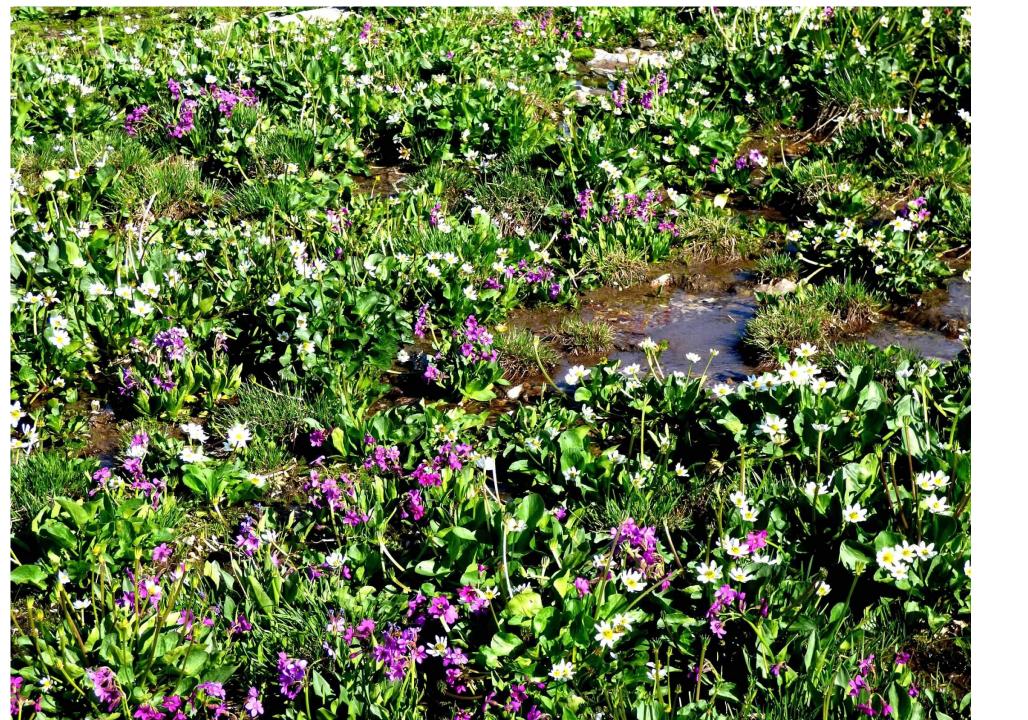
Yes its white – leaves are heart shaped.



Marsh Marigold - left

Globeflower – right

These are the first spring flowers in high Snowies



Snowy range marsh

White are Marsh Marigolds

Pink are Parry's Primrose

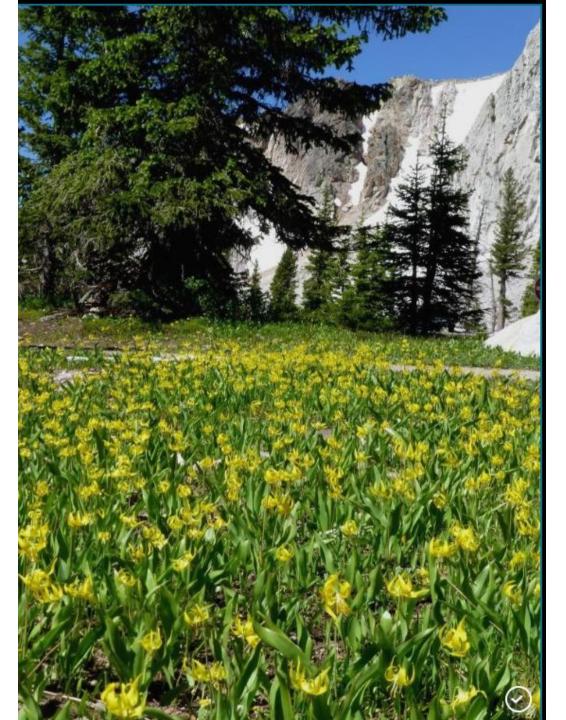
Primula parryi -Said to have a "rankly aromatic skunky smell"



Parry's Primrose







Glacier lilies Avalanche lily

Beautiful in early spring and found next to melting snow in summer.

Erythronium grandiflorum

Picnic loop Mirror lake









Libby flats is a botanical paradise of diversity. Alpine plants. Various Erigeron (asters) daisies

Potentilla – yellow

Bistort – polygonuma type of buckwheatwhite on stalks

Blue – Sky Pilot



Marsh near telephone lake

Yellow paintbrush
White orchids
Erigeron daises
Arnica - /sunflower
And many more



White bog orchids

Platanthera dilata

These are found in wet places throughout snowy range and also Vedauwoo



Twinflower – Linnea borealis Found alpine moist forests circumpolar

After famous Swedish Botanist and physician Carl Linnaeus (1707 – 1778)
Binomial nomenclature

CAROLI LINNÆI

EQUITIS DE STELLA POLARI, Archiatri Regii, Med. & Botan, Paotess. Upsal.; Acad. Upsal. Holdhins. Pieropol. Berol. Infer-Lond. Monshel. Tolos. Florint. Soc.

SYSTEMA NATURÆ

REGNA TRIA NATURÆ,

CLASSES, ORDINES, GENERA, SPECIES,

CHARACTERIBUS, DIFFERENTIIS, STNONTMIS, LOCIS.

Tomus L

Cam Privilegie Sie Rie Milie Spetie.

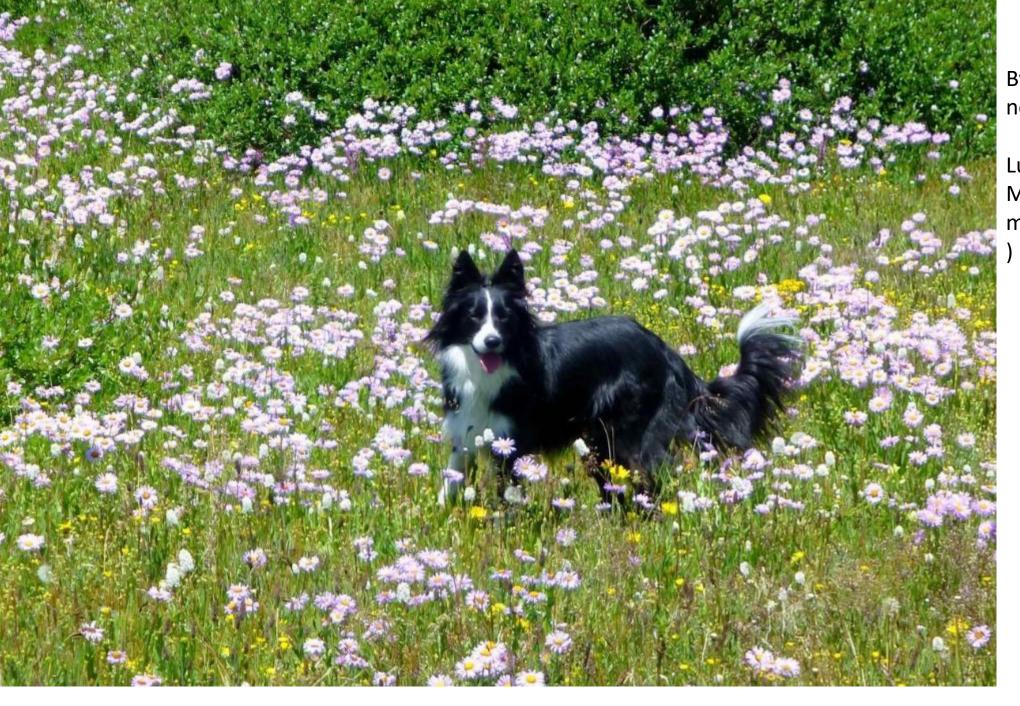
HOLMIÆ, IMPENSIS DIRECT. LAURENTII SALVII, 1758.





Little Brooklyn Lake
Diverse flowers
The Blue is mostly
Lupines and
Penstemon
whippleanus

Whipples Penstemon



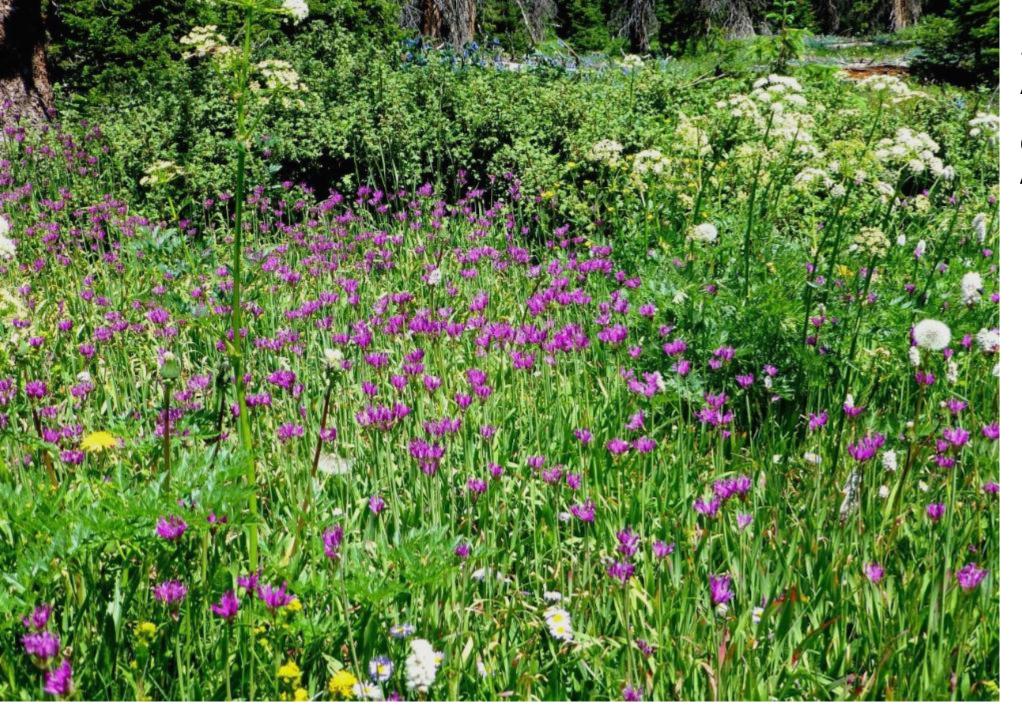
By Little Brooklyn lake, next to Willows

Lucy – my partner Mostly Erigeron daises but many more (potentilla plus)



Looking up to road by St Albans chapel.

Penstemon, lupines and Erigeron



"short styled onion" Allium brevistylum

Quite common in spring /summer



Short styled onion is an Allium

Allium do very well in our climate and many garden varieties are introduced from the dry mountainous areas of Asia, Turkey, Iran and the "stans" plus Himalayas.



Elephant heads Pedicularis groenlandica

Parasitic and non specific, mostly sedges but any plant will do. Most pedicularis are parasitic

. Lousewort (*Pedicularis*) got its name because of the belief that livestock grazing on the plant would get lice (and possibly transmit them to humans). There seems to be little evidence to support this claim, but it did not prevent Linnaeus from using the Latin word *Pediculus* (louse) for the plant's genus name.





The high alpine areas have numerous "mat forming" plants. For many reasons this promotes their survival.

These two are often found growing in large clumps together (and apart) along with many other species especially near or above tree line. Tundra.

Blue phlox and alpine pinks



Phlox pulvinate Cushion phlox

With a few pinks left side



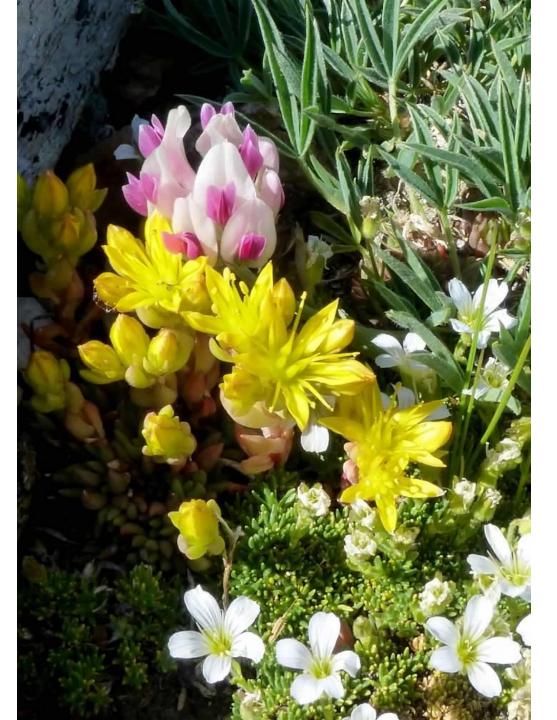
In the Caryophyllaceae "Pinks and Campions"



Eritrichium nanum Alpine forget me not

Official flower of Grand Teton Park

Grows up on Libby flats and high snowies.
Circumpolar
Scented.



The mat forming tundra plants in a good year can meld together

Here is Stitchwort, sedum and a vetch looking pretty.





Columbines can vary in color



Columbines have a long flowering season





Columbine Aquilegia coerulea

And Phacelia sericea - Silky Phacelia

Columbine is state flower of Colorado





Mid July Snowies



Bog Laurel Kalmia microphylla Very pretty

Especially common near South Gap lake trail. Grows 6-8" tall Likes wet areas





Fringed Gentian Gentianopsis detonsa

Floral emblem of Yellowstone park

Late summer common up in snowies and along roadsides



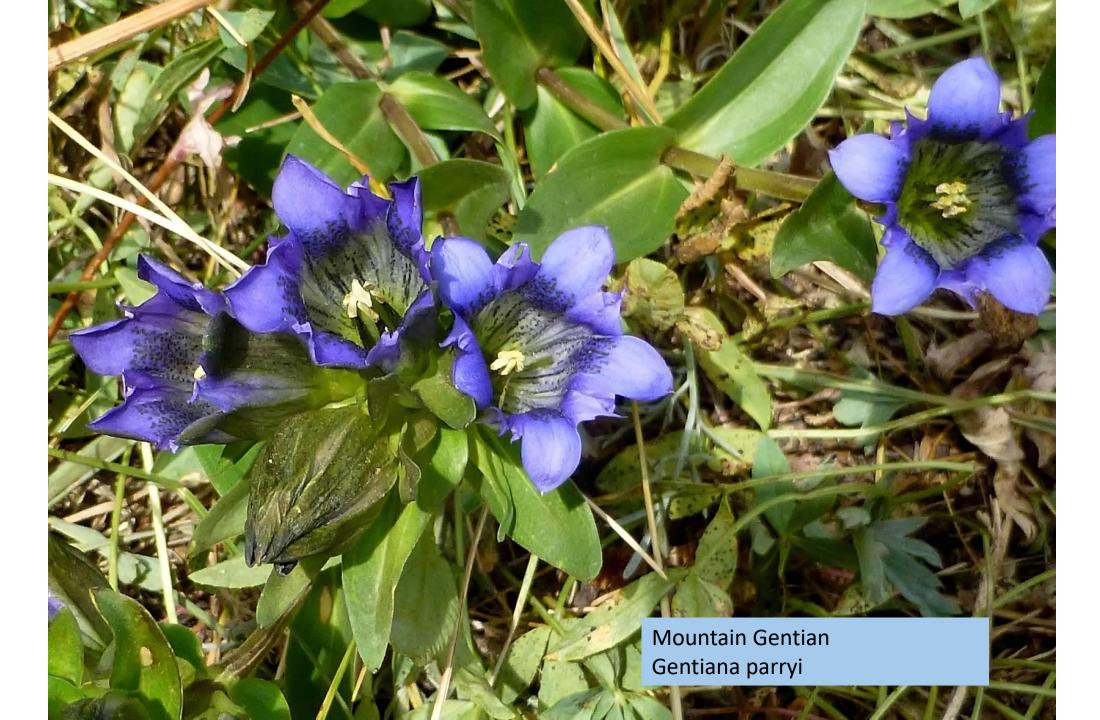




Arctic Gentian Gentiana algida

Circumpolar

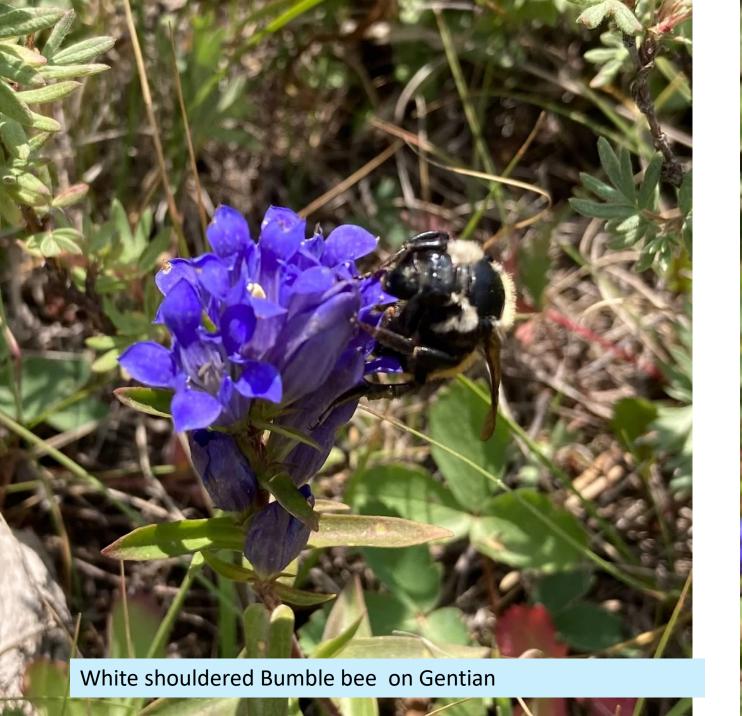
Late summer Esp along Lewis lake and up trails





Star Gentian Swertia perennis Found in wet areas









Left Wyoming Paintbrush Castilleja linarifolia

State flower of Wyoming (1917)



Hemiparasitic

Host for Ediths Checkerspot Butterfly .

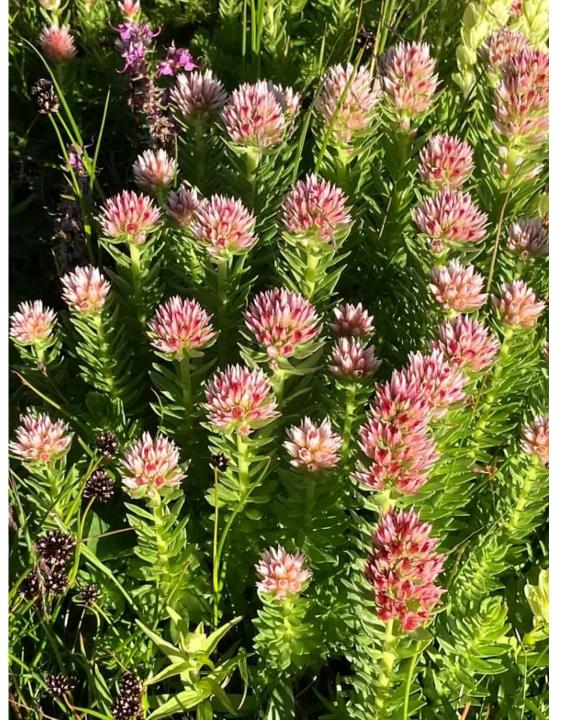
Right Rosy Paintbrush Castilleja rhexifolia













Rhodiola rhodantha- **Rose crown** Along streams Stone crop family - crassulaceae

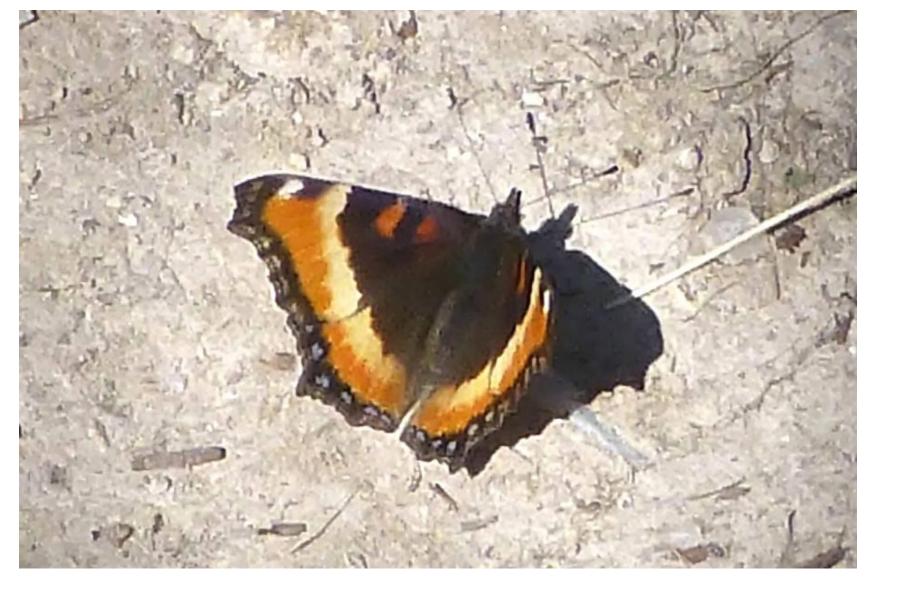
Crassulacean acid metabolism, also known as CAM photosynthesis, is a <u>carbon fixation</u> pathway that evolved in some <u>plants</u> as an adaptation to <u>arid</u> conditions^[1] that allows a plant to <u>photosynthesize</u> during the day, but only exchange gases at night



Penstemon whippleanus
Whipple's Penstemon
Varies in color across its range in the alpine areas
Common in the snowies



Later summer in wet areas BLUE- mountain larkspur Delphinium ramosum Cowparsnip - white



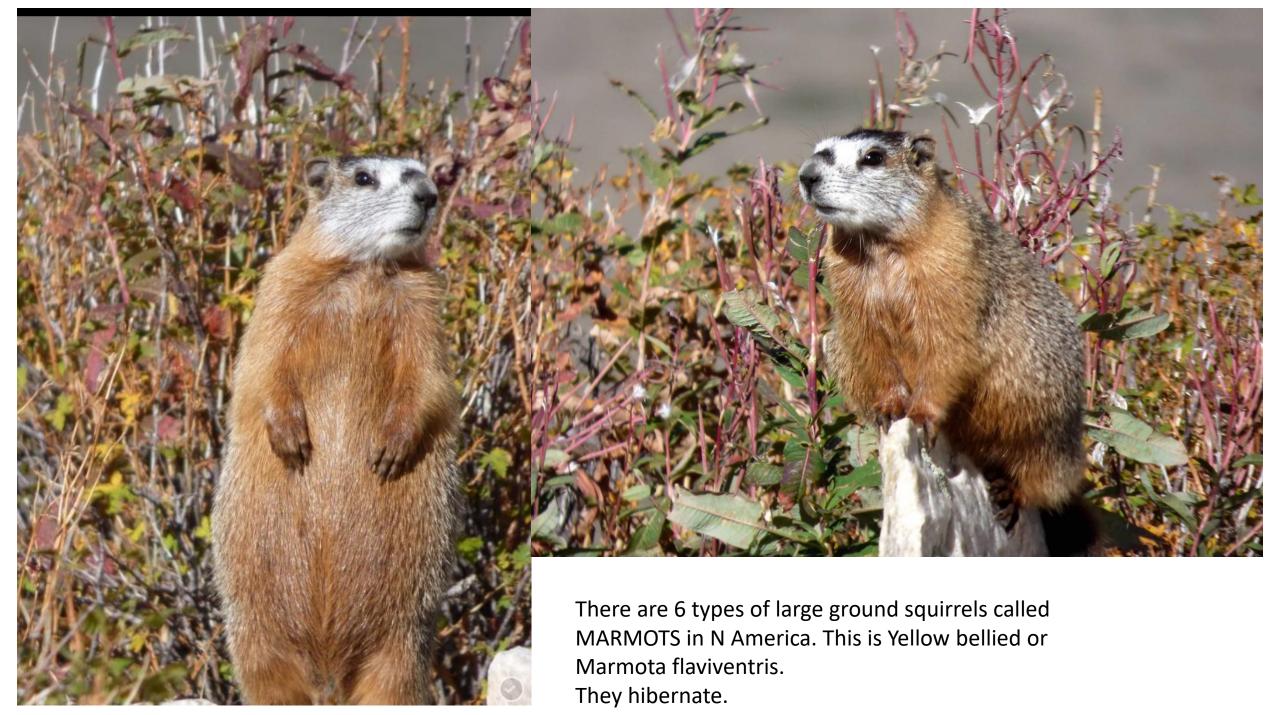
Milberts Tortoiseshell

Nymphalis milberti

Often seen in the snowies and occasionally Happy Jack and in Laramie.
A large distinctive butterfly.

There are others especially Checkerspots and Parnassians are found in the Snowies Happy Jack has a large and diverse butterfly population.







BIRDS

There are many birds in the Medicine bows.

Many elusive warblers esp Wilsons and yellow. This is a RED CROSSBILL Found on Brooklyn lake road.

Specialized beaks for foraging on ponderosa and lodgepole pine cones



White crowed Sparrow Easy to see in Snowies

also lives in Laramie town – eats bugs in my garden.



American Pipit
Anthus rubrescens alticola
Rocky mtn birds said to be paler than
arctic ones
Alpine/ tundra bird



Lewis lake in the Fall Fireweed



Fireweed – known to be one of the first to colonize after forest fires.

Mullen Fire

Aka Greater Willowherb

Epilobium angustifolium

Spread by rhizomes aggressively .

VERY Loved by pollinators

Makes excellent honey

Circumpolar.

Edible – they say.

The territorial flower of The YUKON







Eastern Medicine Bow forest

- Today that includes the Happy Jack and Vedauwoo areas
- Which are higher and wetter than the pole mtn area

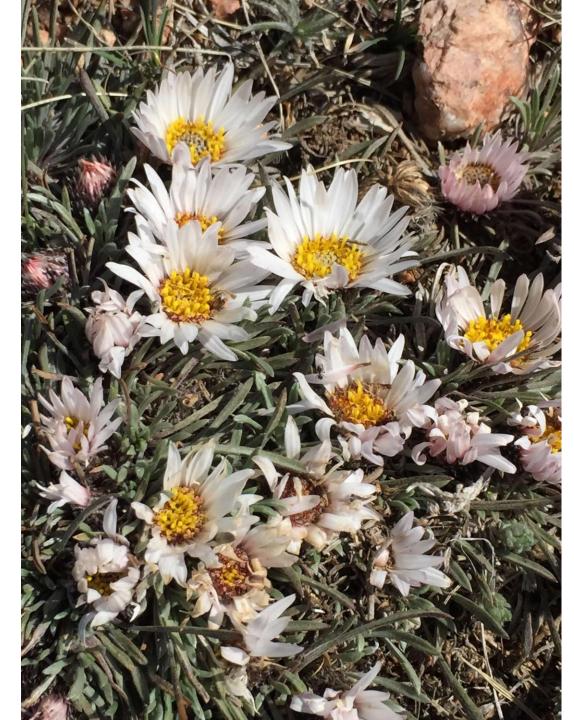






First week May

Easter daisies Townsendia hookeri



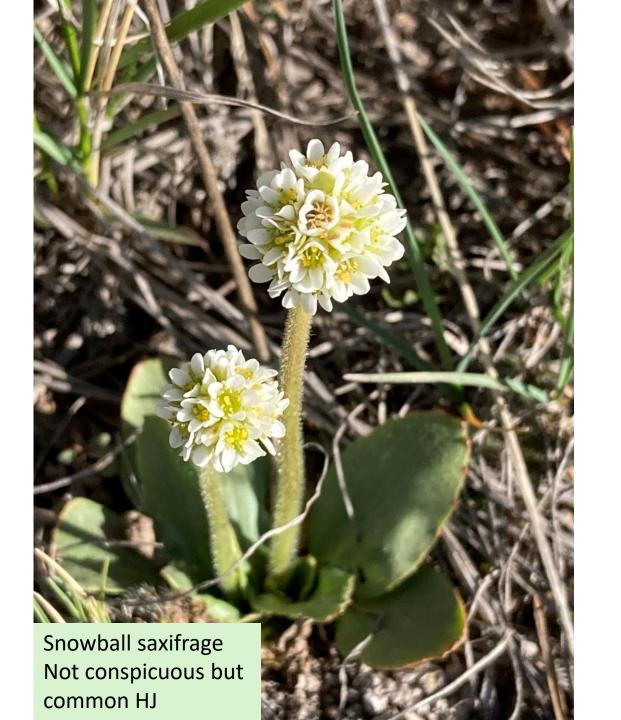
Several small flowers can be found in May Left – Easter daisies

Below Prairie phlox –Phlox hoodii

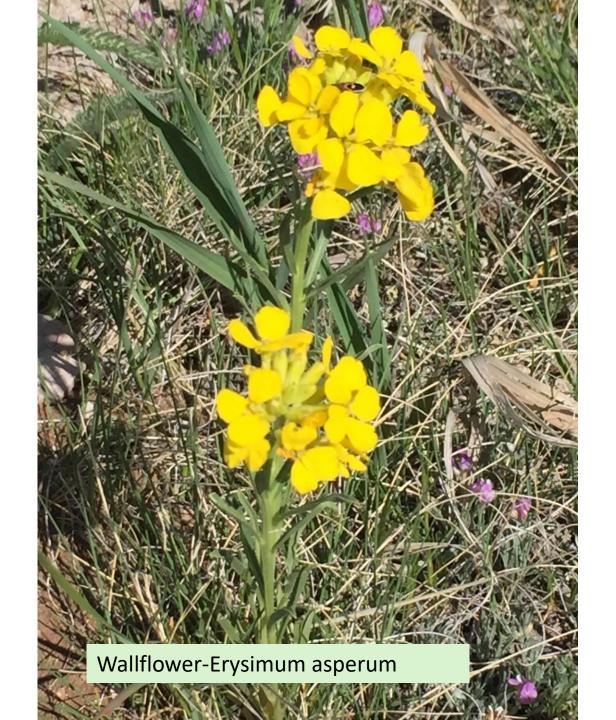




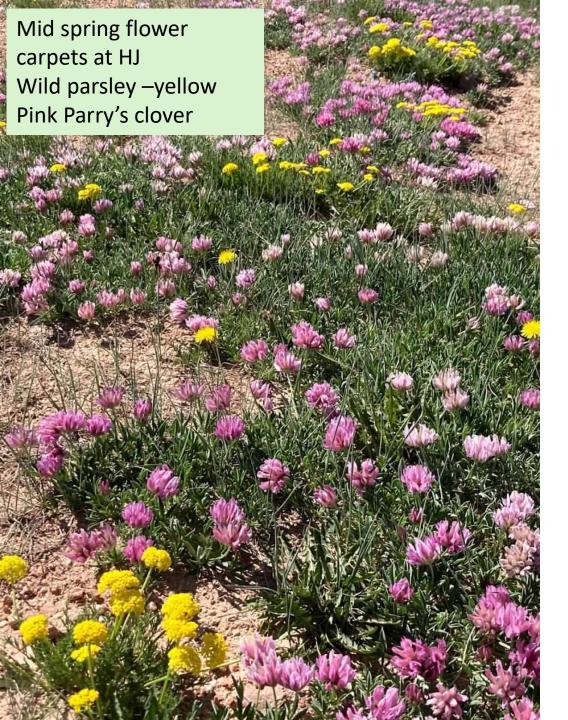
Spring beauty Claytonia lanceolata Happy jack area in spring















Pasque flower (from Pasque / Pasqua meaning Easter) Anemone patens Or Pulsatilla patens





Pasque flower – Anemone patens or Pulsatilla patens





Pasque flower – Anemone patens or Pulsatilla patens
In some places called "prairie crocus" it is not a bulb or corm.

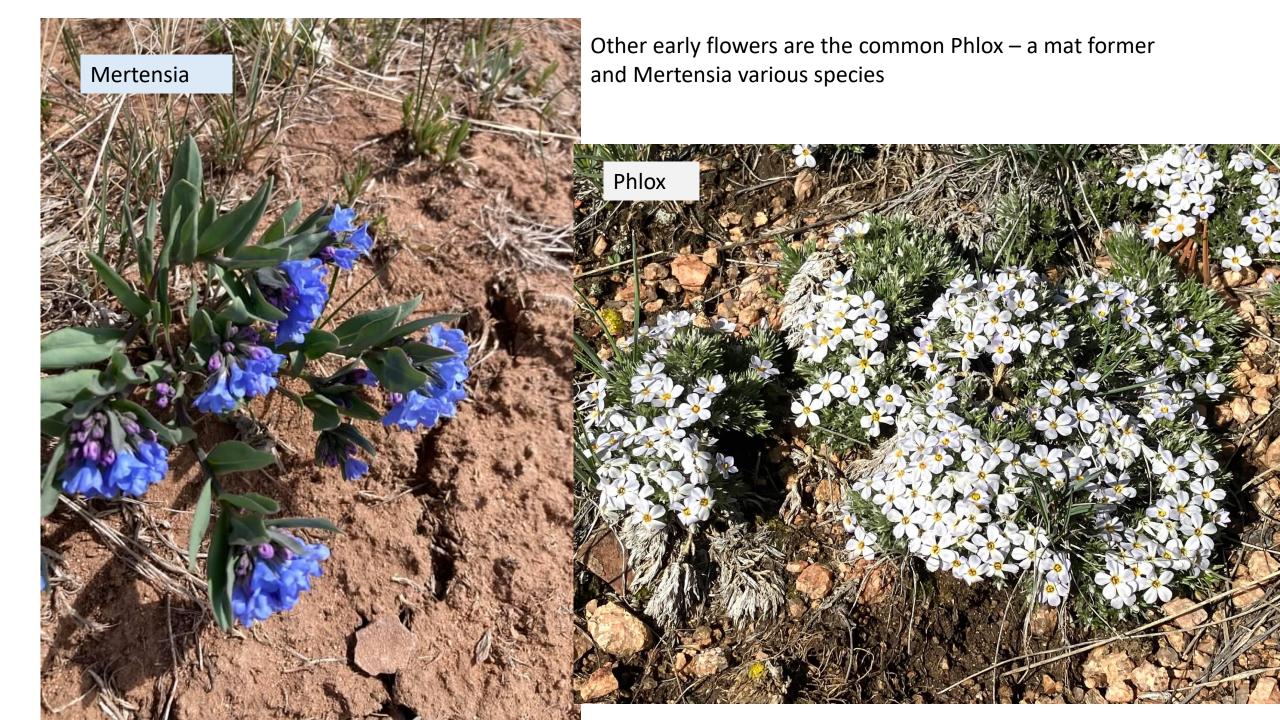
Flowers early: is state flower of South Dakota

Provincial flower of Manitoba (1906)

This a different variant as it does not look like the local Laramie Pasque flowers and indeed somewhat resembles a crocus .











Parnassian – male has only 1 red spot on hind wing Parnassiius phoebus / smitheus



Moist meadow near parking lot at old ski area.

Iris and
"prairie golden
Banner "
Thermopsis
and others





Iris missouriensis Quite variable in color even in same place

Iris missouriensis Common in wet meadows



The provincial flag of Quebec shows the French Fleur de lis which lost its r in history .
After discussion in 1999 Quebec chose an iris The blue flag iris

Iris versicolor which actually grows in Quebec The flag of New Orleans shows the original European yellow flag iris



Iris versicolor Also state flower of Tennessee













Clump of the diminutive Pink Lady's slipper Calypso bulbosa

Needs deep old soils of evergreen woods. They do NOT transplant

Found at HJ and lower trails of the Snowies



Close up of the tiny slipper orchids



Checkerspot on Sage Euphydras anica Relatively common with large range in most of Rockies

Also called variable Identified by the white spots on abdomen

Larvae – penstemon and paintbrush

Thin knobbed antennae

Lilac bordered Copper Lycaena nivalis

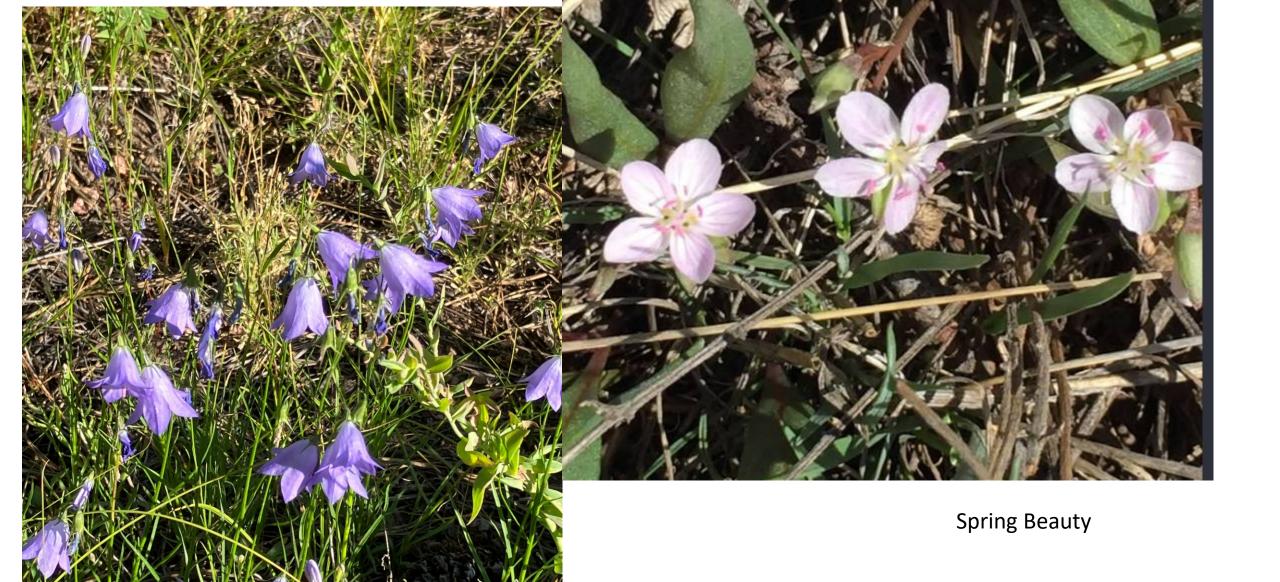


Fritillary- identified by spots on underwing





Mid Spring especially in a wetter year the meadows are full of Lupines and more . Usually the common Lupinus argenteus Silvery Lupine - varies in color



Harebells aka Bluebell. Circumpolar and adaptable Campanula rotundifolia The Scottish Bluebell



Miners candle- there are 22 species in Wyoming various sizes , seasons and habitats. But all have the same overall color and shape Cryptantha species





Gnophaela vermiculata Aka Police car moth Western Rockies Canada to New Mexico On Erigeron

It is a moth –NOTE feathery antennae

Some moths are seen in daytime although most prefer evening/ night





Sagebrush and Paintbrush which is hemiparasitic. The Paintbrush is State flower of Wyoming



The sagebrush is state flower of Nevada.





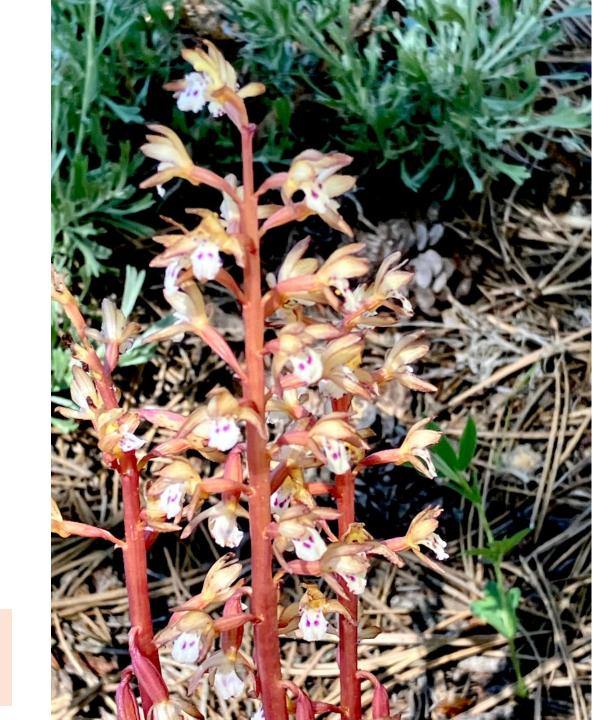




Western Yellow Paintbrush, there are MANY species of paintbrush throughout N America and especially the WEST with many variable names and variable colors depending on location.

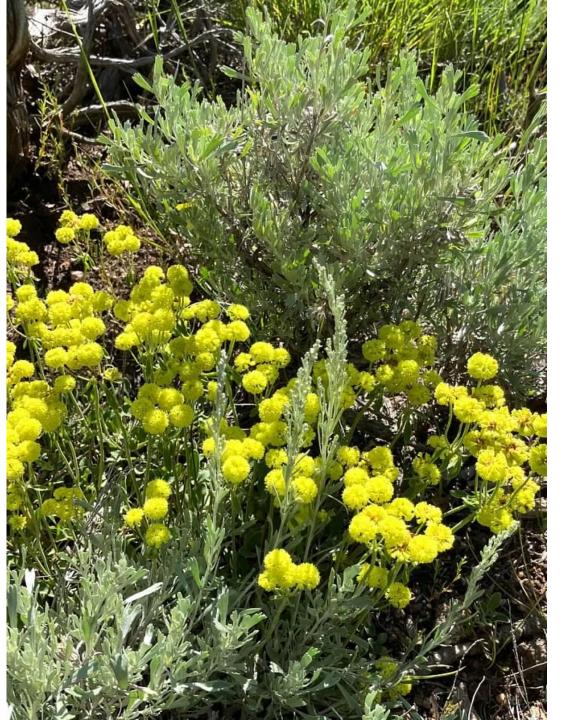


Coral root – corallorrhiza maculata. Saprophyte Complex interaction with roots and mycorrhizae and more Pine forests.









Sulfur buckwheat
Eriogonum umbellatum
Long lived, drought tolerant perennial

Makes great xeric garden plant Favored by many pollinators Variable in form



Sulphur Buckwheat Eriogonum umbellatum

With a "Blue"
Possibly Buckwheat
Blue
Buckwheats are larvae
source for many of the
"Blues"

Buckwheats 30 sp in Wyoming are an important ecosystem plant.
They also grow well in a

They also grow well in a relatively dry home garden.





One of the best ways to find butterflies is when they are "puddling" Here a Branded Skipper Hesperia nevada sucks it up (water /minerals) big looped proboscis

Note Knobbed antenna

Larvae - grasses



A "Blue" – there are VERY manyidentified by spots under wing as well as top side
This is most likely an Acmon Blue
Plebejus acmon male.
The females are brown to blackish with spots.

Larvae - buckwheats



Common Ringlet Coenonyphha tllia Larvae grasses



A "Blue" may have no top spots and some especially the females are actually brownish and unidentifiable from above. This Blue looks like "Silvery Blue" – has no marks on the wing fringes.





Leopard Lily
Fritillaria atropurpurea
Seems to bloom more
in wetter years
Spring with lupines





Common Alpine Erebia episodea

Larvae – grasses

Flower is Bistort
Polygonum bistortoides
Widespread mountain plant
Roots edible



Common Alpine On Agoseris False Dandelion





Blanket flower

Gaillardia aristata
Grows well in gardens – very variable in color and size
Native entire rocky mountains

Has a special relationship with the "flower moth" known as fire moth or blanket flower moth

Schinia masoni which spends its entire life with the plant

The moth hangs out on the flower

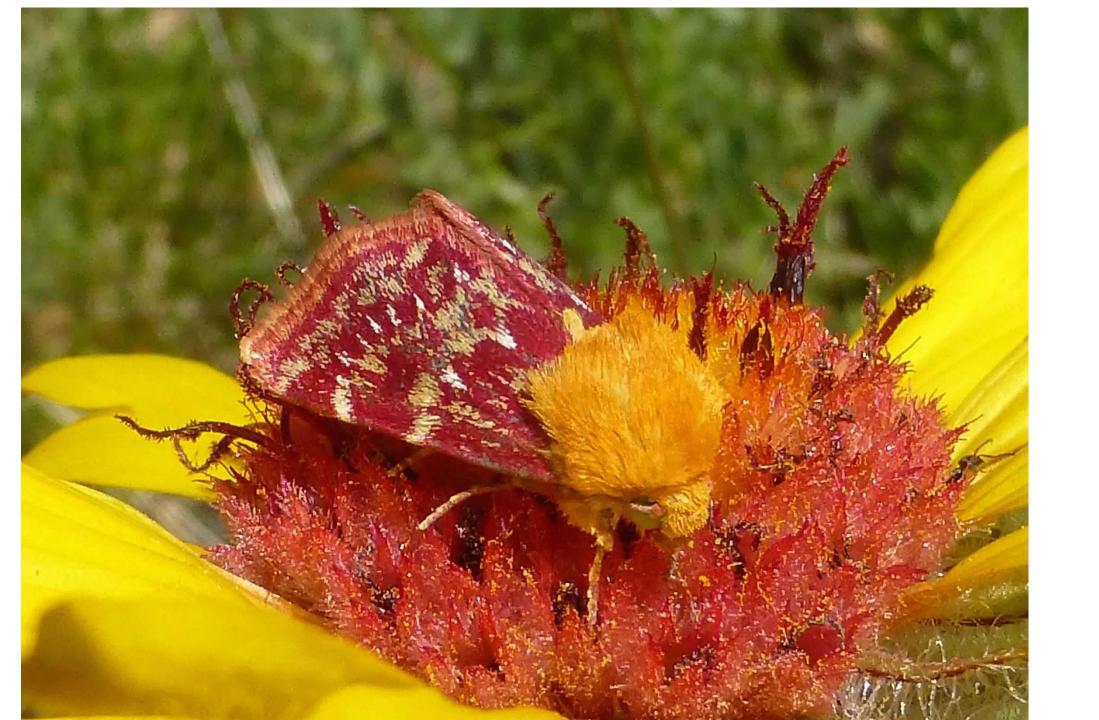
The caterpillars live on the disk flowers

The chrysalis live in the ground next to plant

Some say it is dependent on forest fires?

The area I find them does not have recent forest fires

Endemic to front range and Laramie mtns

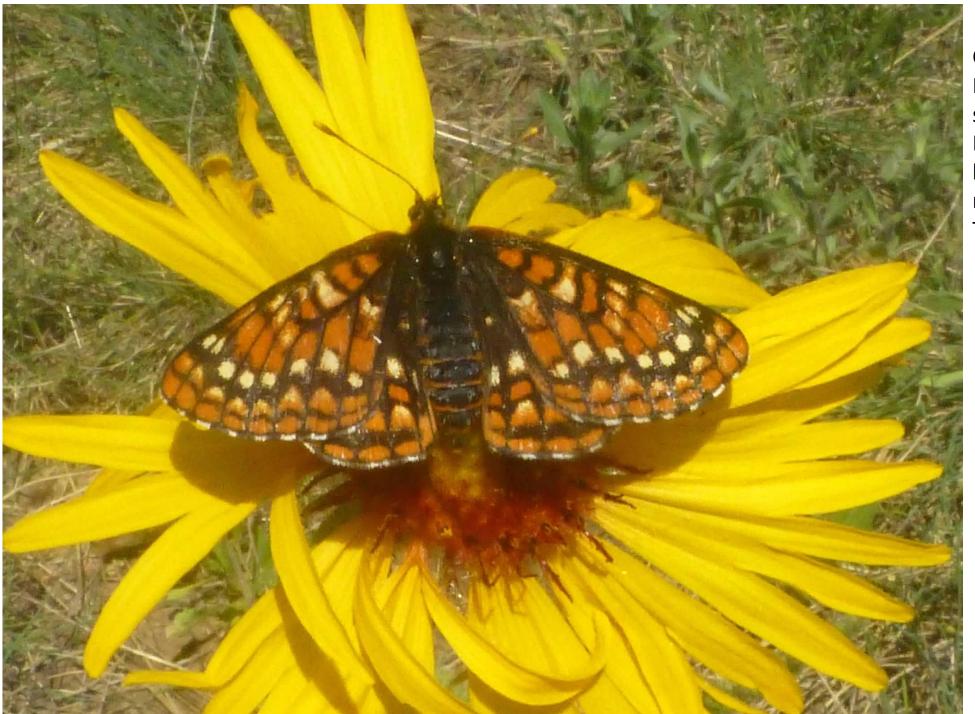








Blanket flower moth is small



Checker spot butterfly
Probably Anica a variable
species
It is not a large butterfly
but bigger than flower
moth.

The larvae eat penstemon



A "Blue" on sagebrush Probably Boisduvals

Host plant lupines



Knapweed is invasive weed but loved by pollinators because it produces masses of nectar.



Usually sulfur butterflies are skittish This one was pigging out on the nectar and allowed me to get close.

This is most likely a Clouded sulfur

Larvae – clovers and legume family





Melissa Blue Double set of pretty underwing spots

Larvae lupines



Fuzzy tongued Penstemon Penstemon eriantherus



Green Gentian Monument plant Elkweed

Frasera speciosa

Obvious on dry upland prairie with low mat formers – it has a large black tap root.

There is the common Ornate checkered flower beetle Trichodes ornatus at lower right Often found on buckwheat they eat pollen



Fossil records suggest that beetles, along with flies, were probably the first insect pollinators of prehistoric flowering plants in the late Jurassic era, around 150 million years ago way before bees, 30 million years later.

Here an ornate checkered flower beetle is on Gaillardia.



There area least two geraniums up at HJ This is sticky Geranium Geranium viscosissimum

There is a white one that grows in the moister areas Richardsons.

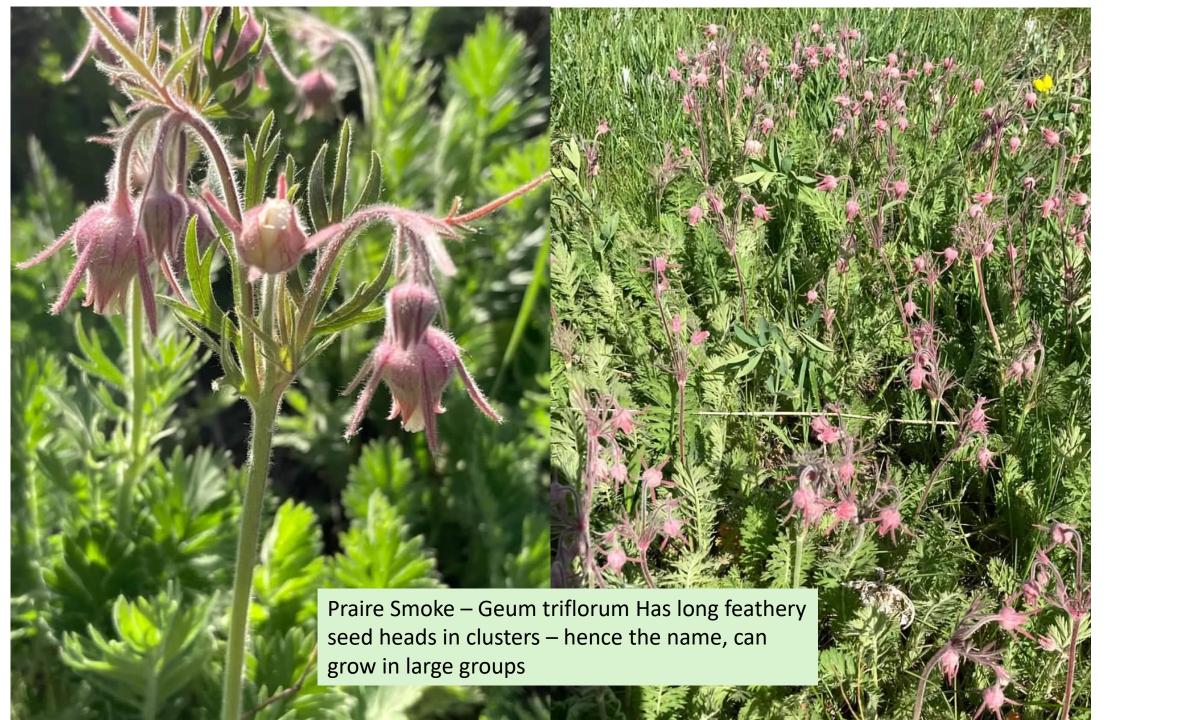






Both of these are found in drier areas HJ











Shooting Star

Dodecatheon pulchellum and other sp

Moist meadows

Emblem of the North American Rock Garden Society

A very pretty spring flower up at Vedauwoo and Happy Jack.

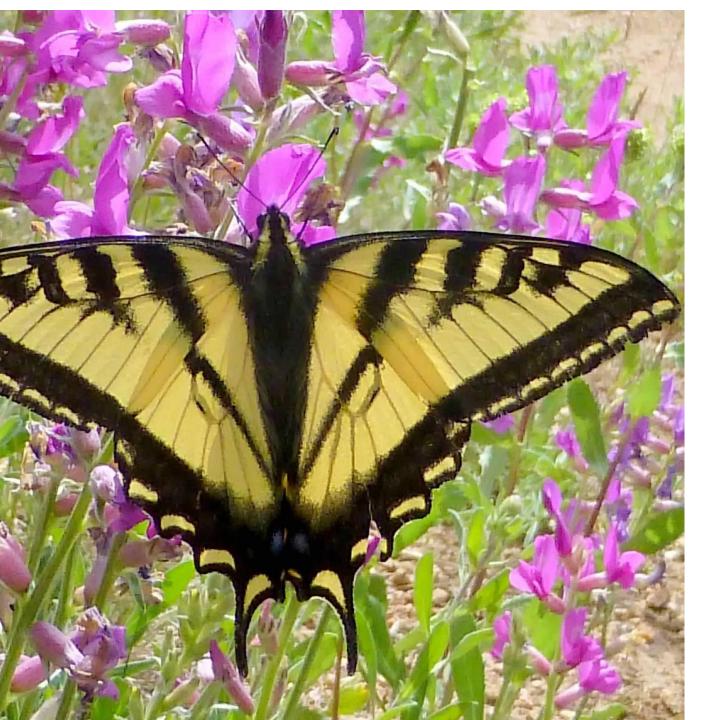


Western Tiger swallowtail Papio rutulus

Larvae eat willows aspens etc

Eastern has an orange spot (first spot on hindwing.

This is probably a female as they show more blue (true of most swallowtails)



Western Tiger Swallowtail Probable male on probably lamberts locoweed -Oxytropis lambertii

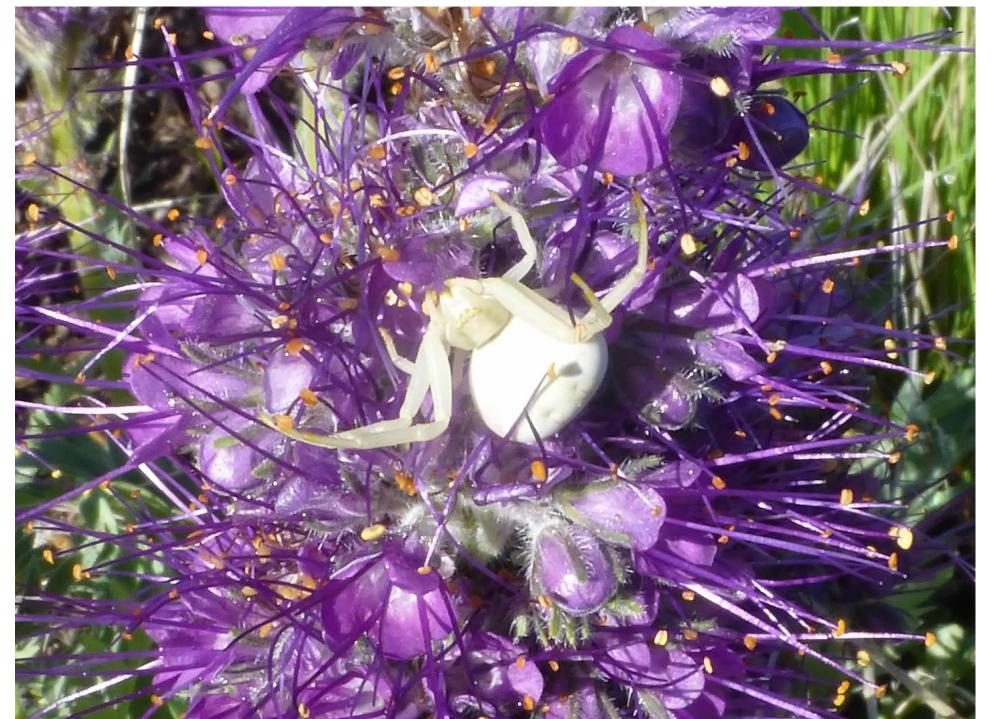


Anise swallowtail

Papio zelican

Larvae eat parsleys etc, love Dill plants

Here on lupine with nearby larkspur.



Misumena vatia Golden crab spider

Can change color slowly to yellow and likes golden rod.

Here on a phacelia – insect pollinator magnet.

Its fangs cannot penetrate human skin so it is harmless to humans except for the fear factor

I have seen several of these on different plants up at HJ etc



Allium texile - prairie onion Grows in dry sagebrush areas

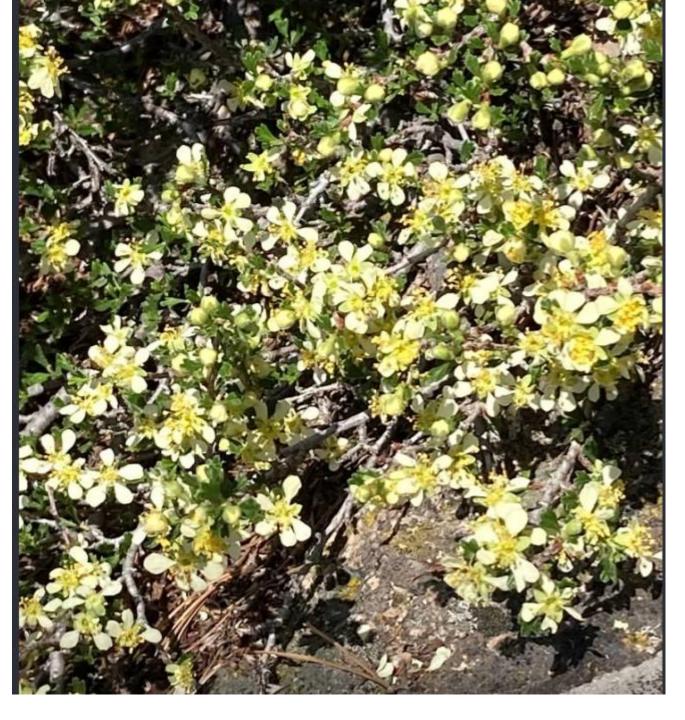






Oregon Grape Mahonia repens Has clusters of dark blue berries in the Fall Grows plentifully HJ

Edible but bitter and has side effects in large quantities.



Antelope Bitterbush- Pushia tridentata Common in Hj scrub and throughout Rockies Browse plant for deer, antelope. Has separate male / female plants.



Mid July Pole mtn Fritillaries

The flowers are Erigeron daisies.

