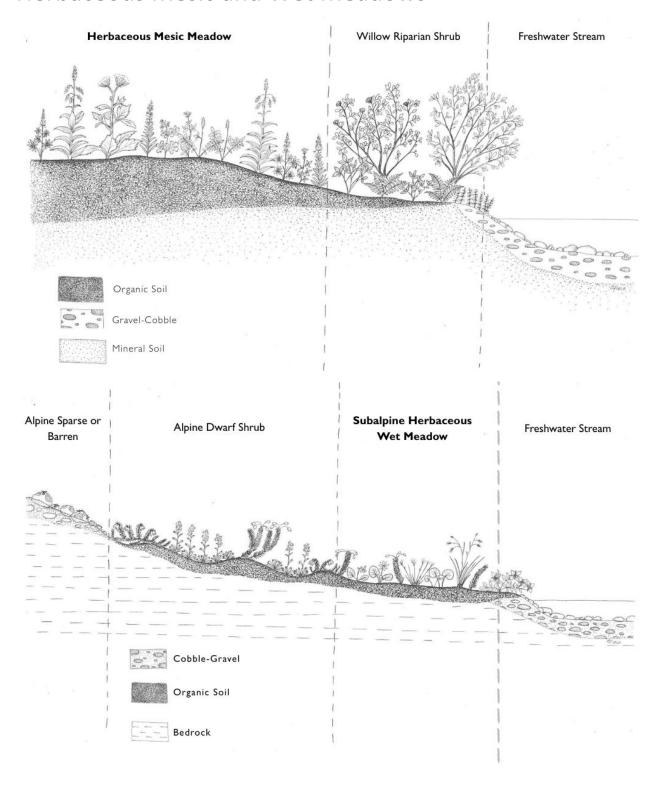
Herbaceous Mesic and Wet Meadows







Herbaceous Mesic Meadow

Herbaceous mesic meadows support a rich assemblage of ferns, forbs, and graminoids including: ladyfern (*Athyrium filix-femina*), bluejoint (*Calamagrostis canadensis*), fireweed (*Chamaenerion angustifolium*), cow parsnip (*Heracleum maximum*), false hellebore (*Veratrum viride*), Sitka valerian (*Valeriana sitchensis*), Nootka lupine (*Lupinus nootkatensis*), subalpine fleabane (*Erigereron peregrinus*), sweet coltsfoot (*Petasites frigidus*), Canadian burnet (*Sangusorbia canadensis*), and heartleaf saxifrage (*Micranthes nelsoniana*).

Herbaceous Wet Meadow

The species composition of herbaceous wet meadows is similar to mesic meadows yet, with greater contributions of deercabbage (*Nephrophyllidium crista-galli*), white marsh marigold (*Caltha leptosepala*), marsh violet (*Viola epipsila*), tufted bulrush (*Trichophorum caespitosum*), longawn sedge (*Carex macrochaeta*), and *Sphagnum* mosses; wet meadows are also characterized by the replacement of *Chamerion angustifolium* by *C. latifolium*. Specific to alpine wet meadows, communities may include: mountain heather (*Harrimanella stelleriana*), partridge foot (*Luetkea pectinata*), small-awn sedge (*Carex microchaeta*), alpine clubmoss (*Diphasiastrum alpinum*), Altai fescue (*Festuca altaica*), small-flowered woodrush (*Luzula parviflora*), and Canadian burnet (*Sanguisorba canadensis*).

Environment:

Herbaceous meadows occur across a broad range of elevations and moisture regimes with species composition dependent on the frequency of flooding and the ability of the site to retain surface water. Mesic meadows occur on gentle slopes that are typically underlain by deep, well-drained loams. Wet meadows develop on more organic-rich soils along shorelines of lakes, ponds, and streams or within basins and alpine floodplains.

Disturbance:

Both mesic and wet herbaceous meadows generally occur on gentle terrain are thus relatively stable. Wet meadows are typically subject to seasonal flooding.

Animal Species Supported:

Mammals:

Moose (Alces alces) – Tunturpak, Teqliq [Chenega], Teggliq [NW, PG]

Showshoe hare (Lepus americanus) - Uskaanaq [NW, PG]





Northern vole (Microtus oeconomus) – Kriisaq [N Alutiiq], Ugna'aq [S Alutiiq]

<u>Sitka black-tailed deer</u> (*Odocoileus hemionus* ssp. *sitkensis*) – **Tuntuq, Puhgutaaq** [Chenega]

Ground squirrel (Spermophilus parryii) - Qanganaq

Black bear (Ursus americanus) - Tan'erliq

<u>Fox</u> (Vulpes vulpes) – **Kaugya'aq; Kangilngaq, Uuquciik** [NW, PG]

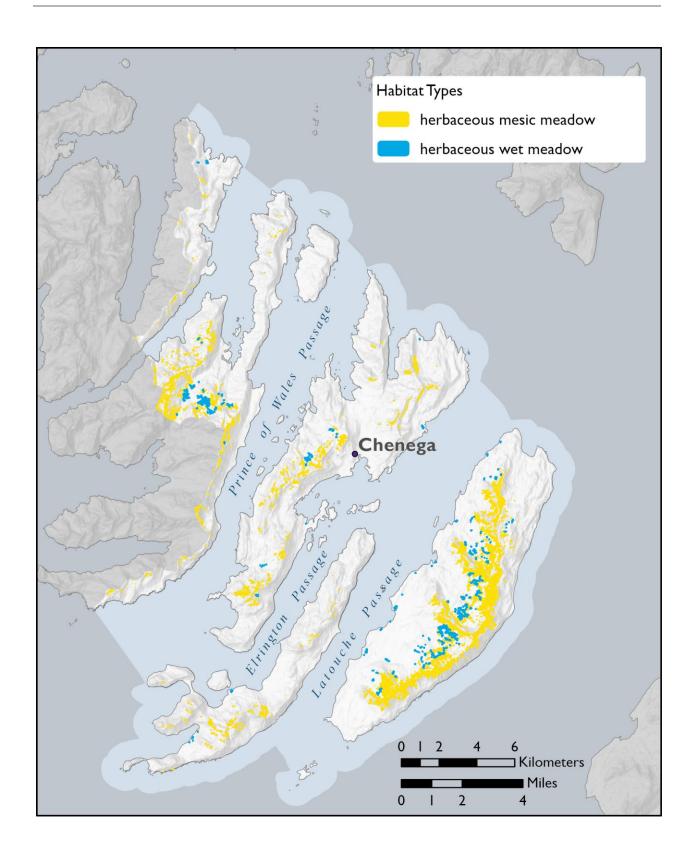
Birds:

<u>Cackling goose</u> (*Branta hutchinsii*) – **Lagiq** [Kodiak], **Neqlleq** [NW, PG]

Common snipe (Gallinago gallinago) - Kulic'kiiq

<u>Sandhill crane</u> (*Grus canadensis*) – **Tatellgaq** [NW, PG]





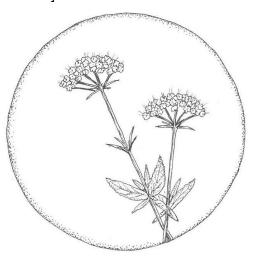


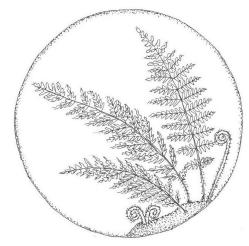
Subsistence Plants:

Species: <u>Common name</u> (Scientific name) – **Alutiiq name** [if known] [NW = Nanwalek; PG = Port Graham; PWS = Prince William Sound]

<u>Sitka valerian</u> (*Valeriana sitchensis*): No documented use by Alutiiq, but other regional groups collect leaves to make a tranquilizing tea to treat insomnia, constipation, and sore muscles. Leaves can be heated and applied as a poultice to treat stomach troubles. Roots can be boiled as a sedative. **CAUTION**: large and frequent doses can cause poisoning symptoms.

<u>Subalpine fleabane</u> (*Erigeron peregrinus*) – **Teptukuiraat** [PWS], **Teptukui'aq** [PG]: Roots can be chewed raw or dried and boiled into a tea to alleviate colds, flu, congestion, measles, or pneumonia.





<u>Lady fern</u> (*Athyrium filix-femina*) — **Qaataq, Qaataqutaq, Kun'aquataq, Kunraanguasaaq**: Fiddleheads are collected early spring and cooked in butter, while rhizomes are steamed and eaten. Shoots are high in iron, potassium, and vitamins A, B, and C. **CAUTION**: fronds become toxic with age; only young fiddleheads should be consumed.

American burnet (Sanguisorba canadensis): No documented use by Alutiiq, but other regional groups collect fresh leaves for eating and use as seasoning. Leaves also can be used to stop internal and external bleeding.

<u>Sweet coltsfoot</u> (*Petasites frigidus, P. hyperboreus*) – **Nausak** [PG]: Roots are collected in the summer cleaned, cut into small pieces, and dried for long-term storage. Roots can be chewed raw or brewed into a decoction to relieve colds, chest congestion, ear problems, measles, pneumonia, sore throat, stomach troubles, and tuberculosis. Coltsfoot is also reported to relieve menstrual cramps and may have been used to treat venereal disease.

<u>Wild chive</u> (*Allium schoenoprasum*) – **Luuruat; Luk** [Chenega]; **Lut, Luugat** [NW, PG]: Chives can be eaten raw and or as seasoning in cooked dishes. Some people use the bulbs and the leaves, while others use only the leaves. Chives can be dried or diced and preserved in salt, or frozen.





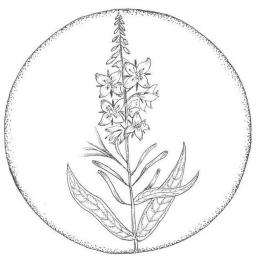
<u>Spring beauty</u> (*Claytonia sibirica*) – **Naanaaruaq; Naanaakaaq** [NW]: All parts of the plants are edible and used in salads, vegetable dishes, or dessert garnishes. Leaves are high in vitamins A and C.

<u>Cow parsnip</u> (*Heracleum lanatum*) — **Ugsuuteq** [N Alutiiq], **Ugyuuteq** [S Alutiiq], **Ugyutak, Ugsutak, Vgyuun** [PWS, PG, Kodiak], **Amuulraaq, Ammuul'aq**: Stems are harvested in the spring

and peeled and eaten raw, dipped in oil, or pickled. Tender stems are also added to soups, stews, salads, or cooked with fish. Hollow stems can be used as straws or made into children's toys (pop guns, pipes). Roots can be heated and smashed into a tooth poultice for toothache relief. Leaves can be chewed for sore throats, colds, and mouth sores, while a tea can alleviate symptoms of tuberculosis. The large, oversized leaves can also be used to wipe surfaces, wrap fish or fish eggs while steaming, or line bowls to add flavor during cooking. **CAUTION**: surficial hairs and exudates can cause rashes, blisters and itching.

<u>Fireweed</u> (Chamerion angustifolium) – Cillqaq, Cillqaqtaq (plant)[PWS], Cillaq (flower) [PWS, PG, Kodiak]: Shoots are picked in early spring and used in soups or steamed as vegetables. Young leaves can be eaten fresh or cooked in seal oil. Blossoms are picked during the summer for use in salads, jellies, or for flavoring syrups. Leaves can be dried and boiled into a tea to help stimulate breast milk production or to treat constipation. Shoots can be used as steam bath switches to help with colds, and were once used as thatching in sod houses. Roots can be crushed and placed on boils to help with healing.





<u>Common wormwood</u> (*Artemisia tilesii*) — **Caik, Apalngaaqutaq** [NW, PG]: Also known as 'stinkweed'. Typically used either fresh or dried. Stems can be used as steam bath switches to help with aches and pains. Leaves can be boiled into a tea to treat heart and stomach problems, sore throats, and headaches, help flush kidneys, shrink hernias, and remove lumps and pains from varicose veins. Chewing leaves can help relieve cold and flu symptoms. Flowers and leaves can be soaked in hot water and sat upon to relieve hemorrhoids or wrapped around feet to draw





out fever. Dry leaves can be rubbed and shredded until soft like cotton and applied to slow healing cuts. Crushed leaves can be placed inside socks and shoes to cure athlete's foot and stinky feet.

<u>False hellebore</u> (*Veratrum viride*): The lower stem can be burned and mixed with breast milk before applying to the eye to treat cataracts. Other regional groups report Shamanic uses. **CAUTION**: ingestion can cause death by asphyxiation.

<u>Pacific red elder</u> (Sambucus racemosa) – **Tuuciik, Qaruckaq, Angutgwakutaq** [NW, PG], **Sanuuliiq, Cirt'aungkaaq**: Berries can be preserved as jelly. Hollow stems can be used to make children's pop guns. Flowers and unripe berries can be boiled into a tea that flushes kidneys and induces a cleansing sweat in those with fever, pneumonia, chills, flu, and tuberculosis and other chronic diseases. The inner and outer bark can both be used to relieve back problems in the steam bath. Branches can be used as steam bath switches used to relieve aches, pains, rheumatism, and menstrual cramps. **CAUTION:** seeds are poisonous and can cause diarrhea and vomiting.

Marsh marigold (Caltha leptosepala): No documented use by Alutiiq, however other regional groups ate leaves and flower buds raw, cooked, or pickled. Roots can be eaten, but must be well-cooked. Sap can irritate sensitive skin. Leaves can be used as a poultice to remove warts and treat inflamed wounds.





<u>Meadow rue</u> (*Thalictrum sparsiflorum*) – **Wasillisaaq** [PG]: Leaves can be picked and boiled for an hour into a tea to treat pneumonia, while roots can be boiled into a decoction and drunk to treat tuberculosis.

<u>Purple daisy</u> (*Symphyotrichum subspicatum*) — **Teptukuil'aq** [PG]: Roots can be boiled for one hour into a tea and frequently consumed to treat colds, fevers, coughs, congestion, measles, and pneumonia.

<u>Nootka rose</u> (*Rosa nutkana*) – **Shnipiishniik**, **Cipau'iniik** (flower); **Qelempaq** (rose hip): Petals can be collected and eaten fresh or boiled into a tea to help with coughs and colds. Rose hips are picked in the fall once sweetened and softened by frost. Hips can be dried and boiled into a cleansing tea and used to treat colds and bronchitis. Sitting on rose hips soaked in hot water can





help a woman pass her placenta after giving birth. Hips can also be eaten raw and used in jams, jellies, syrups, and desserts.



An example of mesic herbaceous meadow habitat in foreground and wet herbaceous meadow habitat ringing pond in midground (PC: ACCS – Copper River Delta, AK)







An example of alpine herbaceous mesic meadow habitat (PC: ACCS – Kenai Fjords NP)

