

RANUNCULACEAE -- Buttercup Family



Scientific Name:

Aconitum columbianum ssp. *columbianum*

Common Name:

Monkshood

Size:

50 - 150 cm

Color:

Purple, rarely white

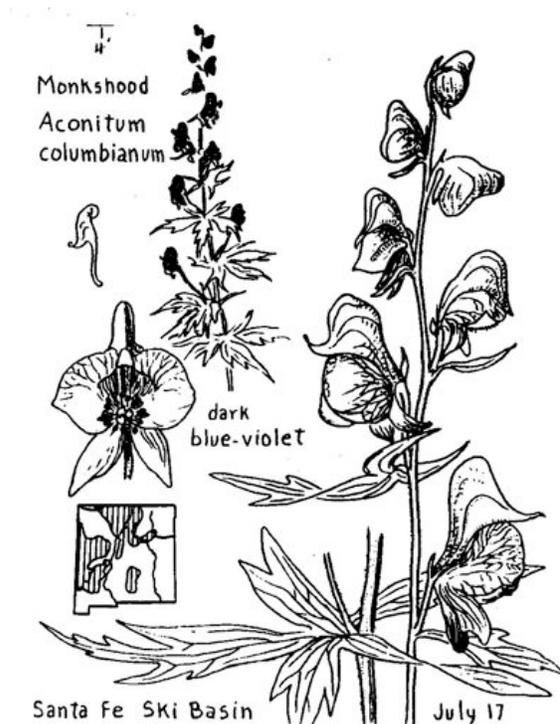
Description:

Erect perennial herb, stems mostly glabrous below, with short, soft hairs and spreading, often gland-tipped hairs above. Leaves alternate, on petioles, progressively reduced above, deeply, palmately 5-lobed, the lobes coarsely toothed or incised; blades 3 - 10 cm long, 5 - 15 cm wide. Flowers perfect, on stalks, in loose clusters at stem end or from upper leaf axils. Sepals 5, usually hairy on the outside, the uppermost hood-like, 12 - 20 mm high, the 2 laterals oval, 8 - 17 mm long, the lower 1 narrow, 7 - 12 mm long. Petals 2, small, whitish, inside upper sepal, with a narrow base, a drooping blade and a curved or coiled spur. Stamens numerous.

Notes:

Monkshood is a beautiful and remarkable flower found in higher altitudes in scattered groups. In the Manzanos it occurs often with the larkspur, *Delphinium sapellonis*, and fernleaf lousewort, *Pedicularis procera*. Monkshood contains alkaloids which affect the heart and central nervous system and is quite poisonous. It blooms from mid-July to mid-August between 8000 and 10000 ft. (See next page for flower detail.)

New Mexico Native



RANUNCULACEAE -- Buttercup Family



Scientific Name:

Aconitum columbianum ssp. columbianum
(flowers)

Common Name:

Monkshood (flowers)

Description:

See previous page.

Notes:

Monkshood flowers are generally purple, but on rare occasions it is possible to see a white one. Both are shown below.



RANUNCULACEAE -- Buttercup Family



Scientific Name:

Actaea rubra ssp. *arguta*

Common Name:

Baneberry

Size:

50 - 80 cm

Color:

White

Description:

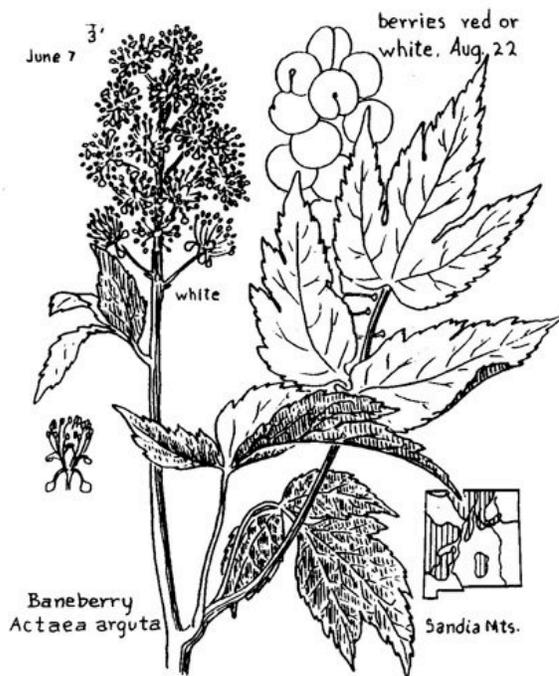
Synonym: *Actaea arguta*.

Erect perennial herb, stems glabrous below, usually finely hairy above. Leaves alternate, on petioles 1 - 12 cm long, blades 15 - 35 cm long, divided into 3 leaflets, each leaflet 3-lobed or divided again into 3 smaller leaflets, the final segments ovate to lanceolate or oblong, irregularly toothed. Flowers small, perfect, on stalks, in a dense cluster at stem end. Sepals 3 - 5, 2 - 3 mm long, early deciduous. Petals 4 - 10, spatulate, 1 - 3 mm long, early deciduous. Stamens numerous, much exceeding petals. Pistil 1, stigma sessile. Fruit an elliptical red or white berry 7 - 13 mm long.

Notes:

The prefix “bane” is derived from an Old High German word for “death”. Although not deadly, all parts of the baneberry plant are somewhat poisonous. However, birds seem to eat the berries without harm. The dense white “bottlebrush” flower clusters in spring and erect red or white berry clusters in the fall make this plant easy to spot. They are common in the moister areas of the Manzanos. Baneberry blooms from mid-May to the end of July between 7500 and 10000 ft.

New Mexico Native



RANUNCULACEAE -- Buttercup Family



Scientific Name:

Anemone canadensis

Size:

20 - 60 cm

Description:

Erect perennial herb, stems with spreading or ascending hairs, often dense above. Leaves with hairs lying flat, particularly below; basal leaves 8 - 15 cm wide, on petioles 8 - 20 cm long, palmately 3- to 5-lobed, each irregularly toothed; stem leaves 3 - 10 cm long, whorled, sessile, with 3 deep, irregularly and sharply toothed lobes. Flowers perfect, on stalks from leaf whorls often with a sessile whorl of small secondary leaves, solitary or in few-flowered clusters. Sepals mostly 5, petaloid, 8 - 20 mm long. Petals absent. Stamens numerous. Pistils numerous, forming a fruiting head.

Common Name:

Meadow anemone, windflower

Color:

White

Notes:

The genus name *Anemone* comes from *Naaman*, the Semitic name for the Greek mythological figure, Adonis. Legend has it that the crimson flowered anemone of the Middle East arose from his blood after he was killed by a wild boar. The large white sepals and numerous stamens of the anemone make it one of the more striking summer wildflowers despite its lack of petals. Meadow anemone is occasional in the Manzanos. It blooms from early June through July between 7000 and 8500 ft.



New Mexico Native



RANUNCULACEAE -- Buttercup Family



Scientific Name:
Anemone cylindrica

Size:
30 - 60 cm

Description:
Erect perennial herb, stems with short, spreading to ascending hairs. Basal leaves with short hairs lying flat above and below, on petioles 9 - 21 cm long, composed of 3 leaflets; end leaflet rhombic, sessile, 3 - 5 cm long, 4 - 10 cm wide, deeply incised, margins round or sharp toothed; lateral leaflets once or twice parted, lobes 4 - 10 mm wide. Stem terminated by a 2-layered whorl of 3 or more bracts similar to but smaller than the basal leaves, on petioles 1 - 5 cm long. Flowers perfect, on long stalks from the bract whorl, in groups of 2 - 7. Sepals 4 or 5, ovate to elliptic or obovate, 7 - 12 mm long, 3 - 6 mm wide, glabrous above, silky-hairy below. Petals none. Stamens 50 - 75. Fruiting head cylindrical, 2 - 3 cm long.

Common Name:
Candle anemone

Color:
White

Notes:
Candle anemone, like most other anemones, does not have petals. Its petal-like sepals are certainly visually equivalent. The species name *cylindrica* is in clear reference to the fruiting head at the center of the flower. At maturity, the head expands into a tangled, cottony mass which can persist on the plant through the winter. Candle anemone is unusual in the Manzanos. It blooms from early June through July between 6500 and 9000 ft.



New Mexico Native



RANUNCULACEAE -- Buttercup Family



Scientific Name:

Aquilegia desertorum

Common Name:

Red columbine

Size:

30 - 60 cm

Color:

Red with yellow

Description:

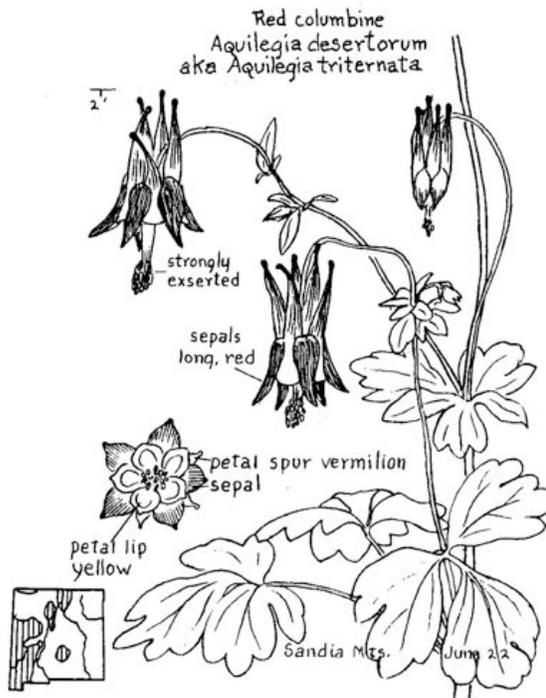
Synonym: *Aquilegia triternata*.

Erect perennial herb, stems lightly hairy. Leaves glabrous or with short hairs, in groups of 3, each group once or twice again divided into 3's, the ultimate leaflets 1 - 3 cm long, variously lobed or round toothed. Basal leaves on long petioles. Stem leaves alternate on short petioles, becoming smaller, sessile above. Flowers perfect, upside down, on long stalks, in few-flowered clusters subtended by leaf-like bracts, at stem end. Sepals 5, reddish, ovate to lanceolate, 7 - 20 mm long 3 - 8 mm wide, spreading from floral axis. Petals 5, blades yellow, oblong or rounded, 4 - 12 mm long, bases extended into red spurs 16 - 32 mm long between sepals.

Notes:

The delicate flower of the red columbine is one of the most fascinating and beautiful of the wildflowers of the Manzanos. The name columbine comes from the Latin *columbinus*, "dove-like". It is said that the columbine flower resembles a ring of 5 doves, with the long petal spurs representing the necks and heads, the spreading sepals the wings, and the petal blades the tails. Red columbine is common in canyon bottoms all over the Manzanos. It blooms from June into August between 7000 and 10000 ft.

New Mexico Native



RANUNCULACEAE -- Buttercup Family



Scientific Name:

Clematis bigelovii

Size:

30 - 50 cm

Description:

Erect perennial herb, stems with short hairs, stem base often woody. Leaves opposite, odd-pinnate with 7 - 11 leaflets, these again odd-pinnate into ovate leaflets 1 - 4 cm long, 5 - 15 mm wide, these irregularly 2 - to several-lobed, surfaces glabrous, not heavily wrinkled. Flowers solitary, perfect, at stem and branch ends, usually upside down, urn- or bell-shaped. Sepals 4, lanceolate, 1.5 - 3 cm long, thick, leathery, pressed firmly edge to edge at least at the base, but not fused, the tips bent backward, the margins thin, expanded, woolly-hairy on the back. Petals absent. Stamens many, not protruding.

Common Name:

Leatherflower

Color:

Brownish purple to purple

Notes:

Leatherflowers are certainly one of the more unusual flowers in the Manzanos. The flower has no petals. It is formed from 4 thick, leathery sepals, modified leaves which normally support and protect the petals and other floral parts. The flowers hang upside down. New Mexico has 3 species and a total of 5 varieties of leatherflower. *C. bigelovii* is the only leather flower in the Manzanos. Its leaflets are oddly lobed, often resembling little mittens. Leather flowers bloom from mid-May through July between 7500 and 9500 ft.



New Mexico Native



RANUNCULACEAE -- Buttercup Family



Scientific Name:

Clematis columbiana var. *columbiana*

Common Name:

Rocky Mountain Clematis

Size:

Vine 50 - 150 cm

Color:

Lilac to pink

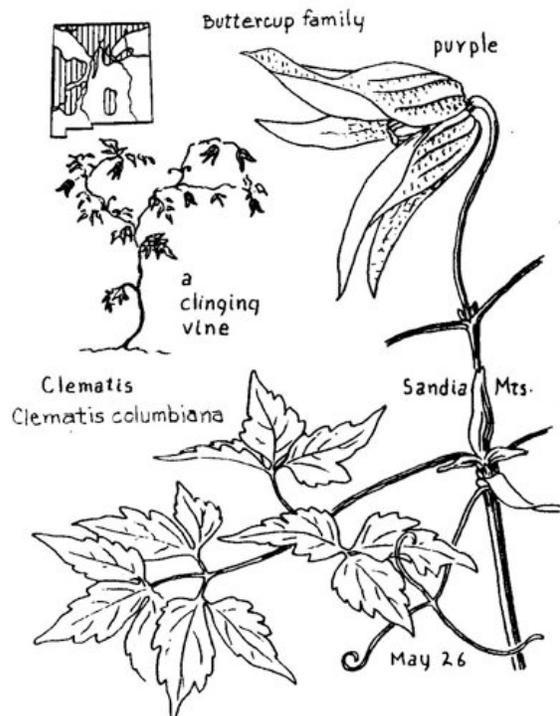
Description:

Synonym: *Clematis pseudoalpina*.

Clambering or trailing perennial woody vine, stems usually several, mostly glabrous. Leaves opposite, in groups of 3, each group once or twice further divided into 3's, the ultimate leaflets commonly ovate but variable, usually lobed or coarsely toothed. Petioles sparsely long-hairy or glabrous. Flowers perfect, solitary on stalks 3 - 15 cm long at tips of short shoots, sometimes upside down. Sepals 4, lanceolate to ovate, 1 - 6 cm long, distinct, sparsely hairy on the back, with hairy margins. Petals absent. Stamens many, sterile staminodes present, both with flattened filaments. Mature styles feathery, 2 - 6 cm long.

Notes:

This delicate plant with leaves in groups of three and its relatively large, wispy, ethereal flowers is fairly common in shadier areas in the Manzanos. Like other members of the *Clematis* genus, the mature flowers have a cluster of long feathery styles. Rocky Mountain clematis blooms in May and June between 7000 and 9000 ft.



New Mexico Native



RANUNCULACEAE -- Buttercup Family



Scientific Name:
Clematis ligusticifolia

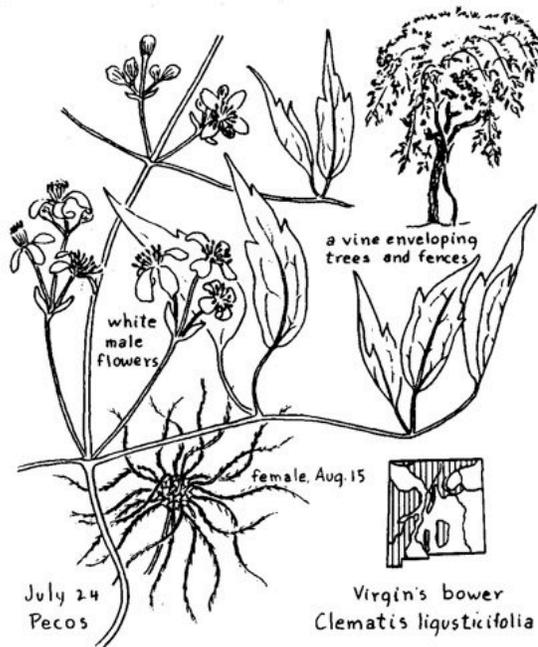
Size:
Vine

Description:
Trailing or clambering somewhat woody vine, stems glabrous to variously hairy. Leaves opposite, on petioles, odd-pinnate with 3 - 7 lanceolate to ovate, coarsely toothed leaflets 3 - 8 cm long, 1 - 5 cm wide. Flowers 1 - 2.5 cm wide, on stalks, unisexual with male and female flowers on separate plants, borne in loose, branched clusters from leaf axils. Male flowers lack pistils. Stamens many. Female flowers with sterile stamens, pistils numerous. Sepals 4, elliptic to oblanceolate, 5 - 12 mm long. Petals absent. Styles of female flowers greatly elongating in fruit, 2 - 6 cm long, feathery. Seeds hairy.

Common Name:
Virgin's bower

Color:
White

Notes:
The species name *ligusticifolia* comes from *Ligusticum*, the genus name of lovage (see *Ligusticum porteri*) and the Latin *folia*, "leaves". The leaflets of Virgin's bower resemble the leaflets of some species of *Ligusticum*. The plants tend to clamber over other vegetation, but do not have tendrils. The leaf stalks upon touching something tend to coil around it allowing the plants to climb. The male and female flowers of this plant are housed on totally separate plants (see next page). Virgin's bower blooms from mid-May through the end of August between 4000 and 8500 ft.



New Mexico Native



RANUNCULACEAE -- Buttercup Family



Scientific Name:

Clematis ligusticifolia (flowers)

Size:

Vine

Description (male):

The male (staminate) flower forms a delicate hemisphere of stamens which lasts for a few days before withering and disappearing. See photograph below.

Common Name:

Virgin's bower (flowers)

Color:

White

Description (female):

The female (pistillate) flower forms a ragged ball of styles which continue to develop and greatly lengthen into a wispy plume. See photograph below.



RANUNCULACEAE -- Buttercup Family



Scientific Name:

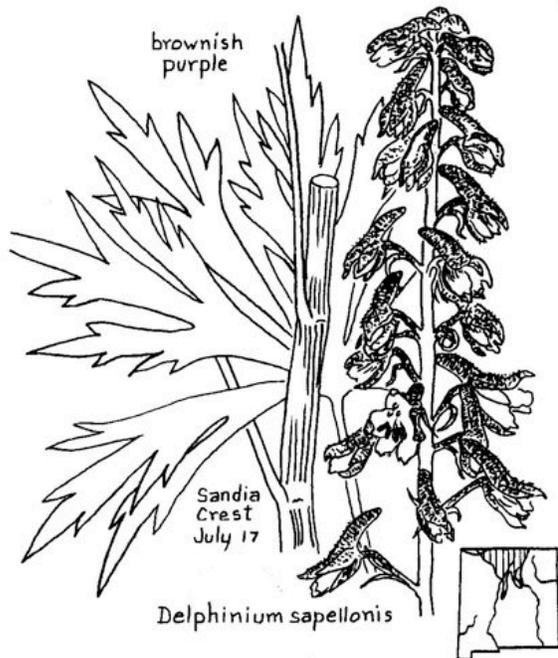
Delphinium sapellonis

Size:

100 - 200 cm

Description:

Erect perennial herb, stems hollow, sparingly branched, lower part glabrous, green or sometimes red, with short hairs among flowers. Leaves alternate, on petioles 5 - 12 cm long, blades 8 - 16 cm long, 6 - 10 cm wide, palmately 5-lobed, the lobes incised or coarsely toothed, glabrous; basal leaves early deciduous. Flowers perfect, on stalks with short hairs, in a loose, commonly branched cluster at stem end. Sepals 5, yellowish or brownish-purple, with hairs and gland-tipped hairs, the upper with a basal spur 8 - 11 mm long, 2 laterals pointing forward, 8 - 12 mm long, 2 lower angling downward. Petals 4, the upper pair spurred, glabrous, the lower pair 3 - 5 mm long, cleft, with long yellow hairs.



Common Name:

Sapello Canyon Larkspur, ugly delphinium

Color:

Bluish purple with white

Notes:

The New Mexico Rare Plant Technical Council has identified this as a rare plant. It only grows in the Jemez, Sandia, Manzano, and southern Sangre de Cristo Mountains. It was discovered in 1900 in Sapello Canyon northwest of Las Vegas, NM in San Miguel County. In the Manzanos it occurs with Monkshood (*Aconitum columbianum*) and fernleaf lousewort (*Pedicularis procera*) in moister areas of the higher elevations. Larkspurs contain delphinine and other poisonous alkaloids and can be harmful to grazing animals. Sapello Canyon larkspur blooms in July and August between 7500 and 10000 ft.

New Mexico Native



RANUNCULACEAE -- Buttercup Family



Scientific Name:

Delphinium wootonii

Size:

20 - 50 cm

Description:

Synonym: *Delphinium virescens*

Stout, erect perennial herb, stems with short hairs, some gland-tipped. At flowering, leaves alternate on bottom quarter of stem and basal, grayish with short hairs, on petioles 0.5 - 8 cm long, blades kidney- or fan-shaped, 15 - 30 mm long, 25 - 40 mm wide, palmately deeply dissected into 5 - 20 narrow lobes 2 - 6 mm wide in basal leaves, 1 - 3 mm wide in stem leaves. Flowers perfect, on strongly ascending, short-hairy stalks 10 - 20 mm long, in a long, loose cluster on upper stem. Sepals 5, the upper with an ascending spur 8 - 24 mm long, the 2 laterals ovate to elliptic, 8 - 18 mm long, bent backwards, 2 bottoms similar to laterals, spreading. Petals 4, upper 2 spurred into upper sepal, lower 2, 6 - 9 mm long, inside lateral sepals.

Common Name:

Plains larkspur

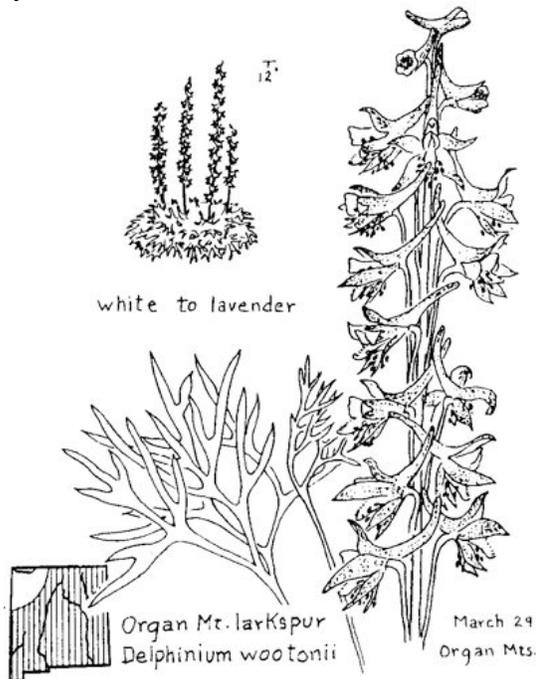
Color:

Bluish purple with white

Notes:

The long, narrow, leafless flowering stalks of plains larkspur carry up to 30, sometimes as many as 50, interesting and intricate flowers. The individual flower stalks are pressed against the stem. The long purplish spur at the rear of the flower is strongly ascending, 30 - 80 degrees above horizontal. Purple spots and tinges on the petals and sepals give the blossoms a very graceful appearance. Larkspurs, however, contain delphinine and other poisonous alkaloids harmful to grazing animals. Occurring in the plains and foothills approaching the Manzanos, plains larkspur blooms from mid-May through June between 5000 and 7000 ft.

New Mexico Native



RANUNCULACEAE -- Buttercup Family



Scientific Name:

Pulsatilla patens ssp. *multifida*

Common Name:

Pasqueflower

Size:

20 -30 cm

Color:

Lavender to white

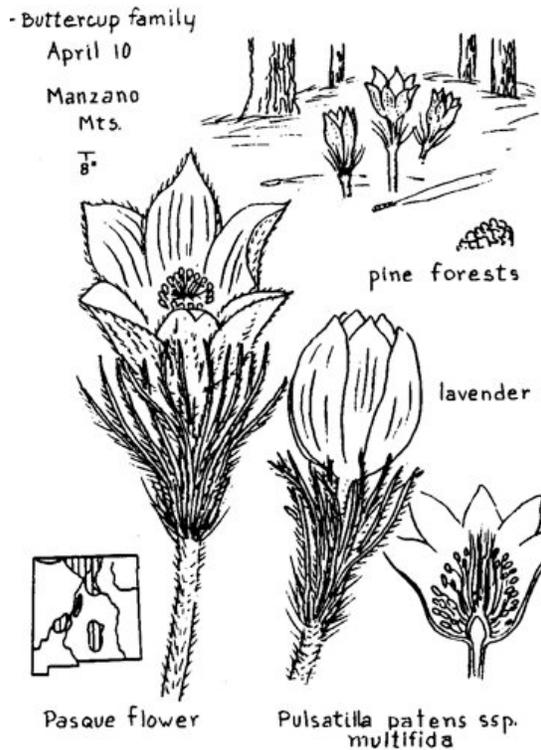
Description:

Synonym: *Anemone patens*

Erect perennial herb, stems usually several. Herbage with long, silky hairs. Basal leaves 3- to 7-lobed, each lobe further divided into narrow segments; stem leaves 2 - 5 cm long, sessile, in a single whorl; basal leaves appearing after flowers, on petioles 5 - 10 cm long, mostly 3-lobed, much divided, blades 5 - 10 cm wide. Flowers perfect, 4 - 8 cm across, solitary on a thick stalk from leaf whorl. Sepals 5 - 7, lanceolate to ovate, 2 - 4 cm long, petaloid, showy, silky-hairy on the back. Petals absent, stamens numerous. Pistils numerous, in a spherical cluster, styles feathery, 2 - 4 cm long in fruit.

Notes:

The Pasqueflower is one of the most beautiful wildflowers of the Manzanos, although rather uncommon. They tend to be found on north facing slopes. The basal leaves appear after the flowers fade. Pasqueflowers are early bloomers, and often missed by hikers since their flowering time is close to Easter. Pasque is Old French for "Easter". The Pasqueflower was named by the English surgeon/botanist, John Gerard (1545-1612). They bloom from late March to early May between 7000 and 10000 ft.



New Mexico Native



RANUNCULACEAE -- Buttercup Family



Scientific Name:

Ranunculus aquatilis var. *diffusus*

Common Name:

White water-crowfoot

Size:

Aquatic vine

Color:

White

Description:

Aquatic perennial herb with glabrous stems rooting at nodes. Leaves submersed, alternate, on petioles 5 - 15 mm long, blades 1 - 3 cm long, dissected into thread-like lobes. Flowers solitary, perfect, on glabrous stalks 1 - 6 cm long from leaf axils. Sepals 5, 2 - 4 mm long, 1 - 2 mm wide, glabrous, spreading or bent backwards, deciduous soon after flowering. Petals 5, white, 4 - 7 mm long, 1 - 5 mm wide, tapering to a narrow base, often yellow, with an attached nectar tube. Stamens 10 - 20 yellow. Pistils 30 - 50, in a hemispherical cluster. Fruiting stalks noticeably curved.

Notes:

Water-crowfoot is almost always found tangled among other plants (commonly watercress, see *Nasturtium officinale*) in running streams. The flowers can easily appear to be originating from a broad-leafed plant, but the leaves of water-crowfoot are fan-shaped and composed of many very narrow threadlike segments actually resembling fibrous roots. Water-crowfoot blooms from mid-May into August between 5000 and 9000 ft.



June 24

Clayton Lakes



Ranunculus aquatilis

New Mexico Native



RANUNCULACEAE -- Buttercup Family



Scientific Name:

Ranunculus inamoenus

Common Name:

Crowfoot, drab buttercup

Size:

10 - 30 cm

Color:

Yellow

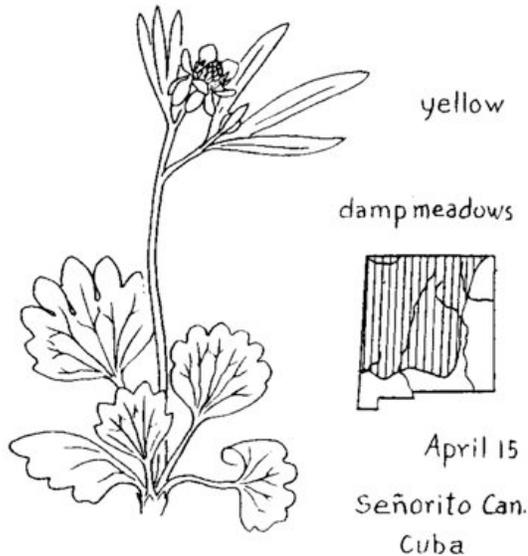
Description:

Erect perennial herb, glabrous to slightly hairy, stems often solitary, simple or sparingly branched, hollow. Basal leaves on petioles 2 - 10 cm long, the blades 1 - 5 cm long and wide, ovate to obovate or round, unlobed to somewhat 3-lobed, edges round toothed. Stem leaves alternate, on short petioles or sessile, deeply divided into 3 - 5 linear to oblanceolate lobes. Flowers perfect, 1 to several, on stalks 1 - 5 cm long, at stem end. Sepals 5, greenish, obovate, 3 - 6 mm long. Petals 5, elliptic to obovate, 4 - 8 mm long. Stamens numerous. Pistils numerous, arranged in a cylindrical head.

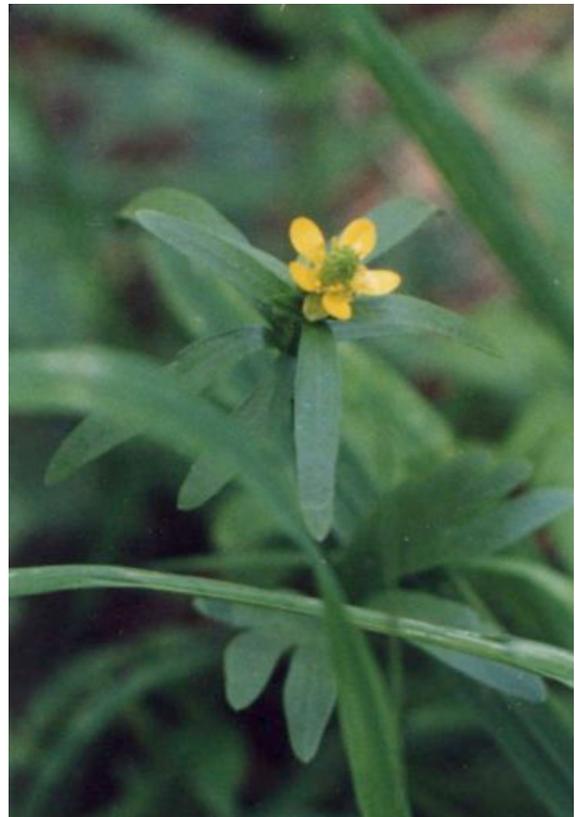
Notes:

The species name *inamoenus* comes from the Latin prefix *in-*, "not" and *amoenus*, "lovely" or "pleasing". This buttercup has many common names, drab buttercup, unlovely buttercup, ugly buttercup. It is called crowfoot since its stem leaves are narrowly lobed, resembling a bird foot. Its petals are shiny and stout and its stem leaves are quite different from the basal leaves, making it easy to identify. It blooms from late April into August between 7000 and 10000 ft.

New Mexico Native



Noxious, or fanleaf buttercup
Ranunculus inamoenus



RANUNCULACEAE -- Buttercup Family



Scientific Name:

Ranunculus macounii

Common Name:

Macoun's buttercup

Size:

20 - 80 cm

Color:

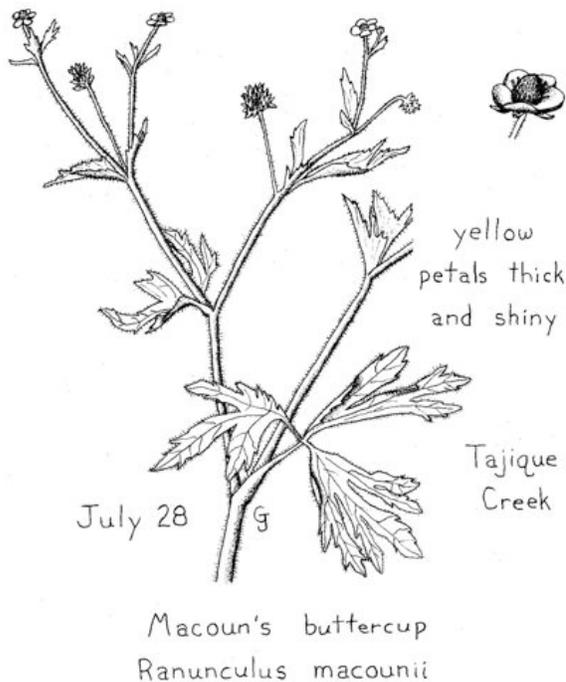
Yellow

Description:

Erect or reclining perennial herb, stems sometimes rooting on contact with the ground. Herbage with long hairs spreading or lying flat. Basal leaves deeply incised into three lobes or pinnate with 3 - 5 leaflets, each incised or lobed; petioles 5 - 20 cm long, leaf blades 3 - 9 cm long. Stem leaves alternate, similar to basal. Flowers on stalks 1 - 10 cm long. Sepals 5, 3 - 8 mm long, bent backwards, with long hairs. Petals 5, 3 - 8 mm long, barely if at all exceeding sepals. Stamens 10 or more. Fruit an almost spherical cluster of 20 - 60 achenes, the cluster 7 - 15 mm in diameter, the achenes 2 - 3 mm long, with a straight beak 1 - 1.5 mm long.

Notes:

The female part of the flower is composed of many separate pistils, a condition associated with more primitive plants, which give rise to the "ball of seeds" common in the genus *Ranunculus*. In this buttercup, the ball, composed of 30 - 50 pointed conical seeds, is attached to a long naked stalk creating an assembly resembling a medieval battle mace. The flowers and leaves strongly resemble those of yellow avens (see *Geum allepicum*), but the fruits are very different. Macoun's buttercup is named for one of Canada's first major botanists, John Macoun (1831-1920). It blooms from June into August between 6000 and 8500 ft.



New Mexico Native



RANUNCULACEAE -- Buttercup Family



Scientific Name:
Thalictrum fendleri

Common Name:
Meadow rue

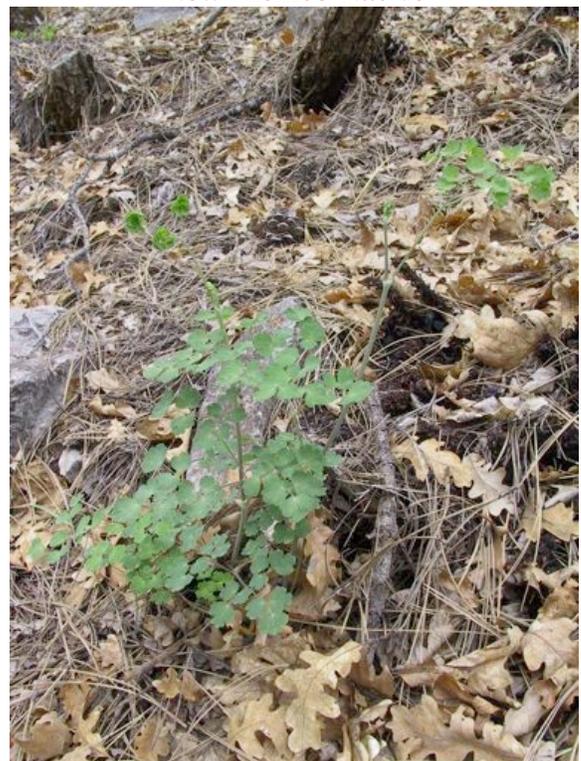
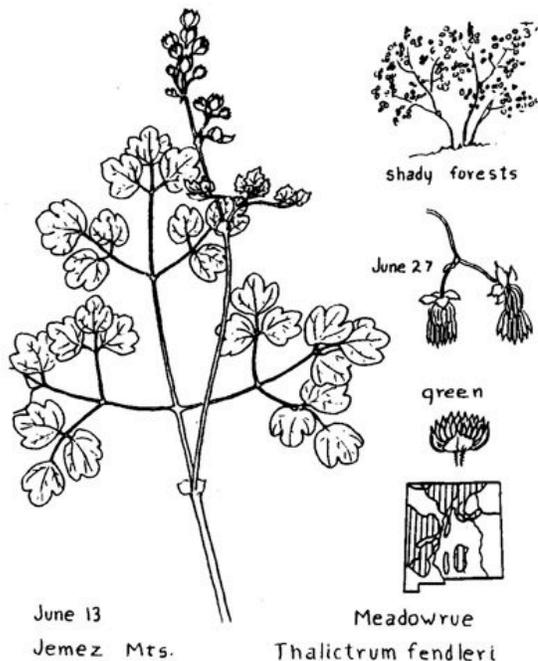
Size:
30 - 70 cm

Color:
Greenish white

Description:
Erect perennial herb, stems branched above, glabrous. Leaves alternate, on short petioles, in groups of 3 with each leaf one or more times divided into further groups of 3, the ultimate leaflets ovate to obovate or round, 8 - 20 mm long, 3-lobed at the apex, the lobes with wavy-toothed margins, glabrous above, often glandular below. Flowers on stalks, in open leafy, branched clusters at branch ends or from leaf axils. Male and female flowers on separate plants. Sepals 4 or 5, green to whitish; in males ovate to elliptic, 3 - 5 mm long; in females ovate to lanceolate, 1.5 - 2 mm long. Petals absent. Stamens 7 - 30, pendant, 6 - 10 mm long. Pistils 1 - 16, spreading.

Notes:
Meadow rue is very common all over the Manzanos. The plants have a spindly character. The small, almost round, 3-lobed leaves in groups of 3 make it easy to recognize. The male flowers (staminate) and the female flowers (pistillate) reside on totally separate plants. The males hang upside down and look like tiny mops. The females resemble a spike ball. (See the following page.) Meadow rue blooms from mid-June through July between 4000 and 10000 ft.

New Mexico Native



RANUNCULACEAE -- Buttercup Family



Scientific Name:

Thalictrum fendleri (flowers)

Common Name:

Meadow rue (flowers)

Size:

30 - 70 cm

Color:

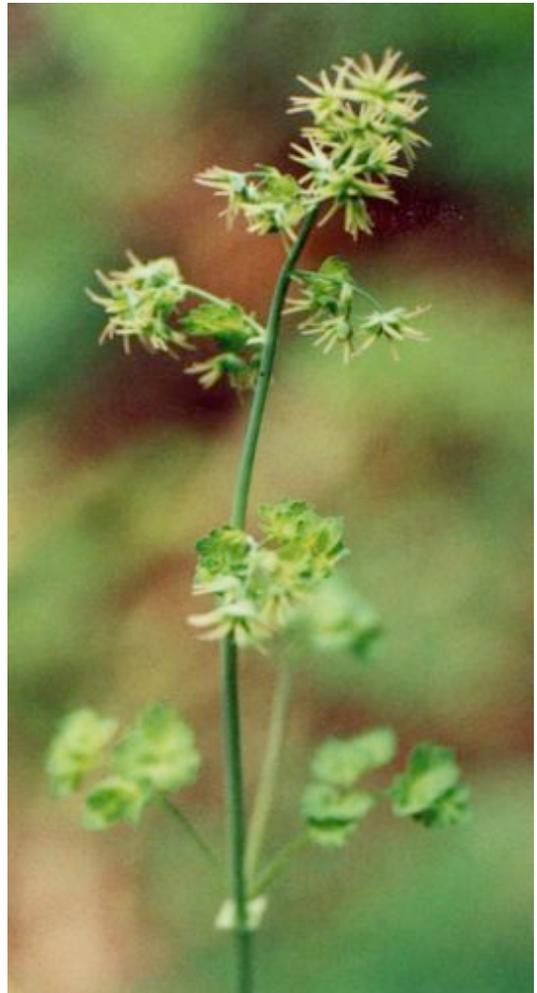
Greenish white

Description (male):

The photograph below shows a plant with male flowers. The male flowers (staminate) hang upside down and look like tiny mops. (See previous page.)

Description (female):

The photograph below shows a female plant. The female flowers (pistillate) resemble a spiked ball. (See previous page.)



RHAMNACEAE -- Buckthorn Family



Scientific Name:
Ceanothus fendleri

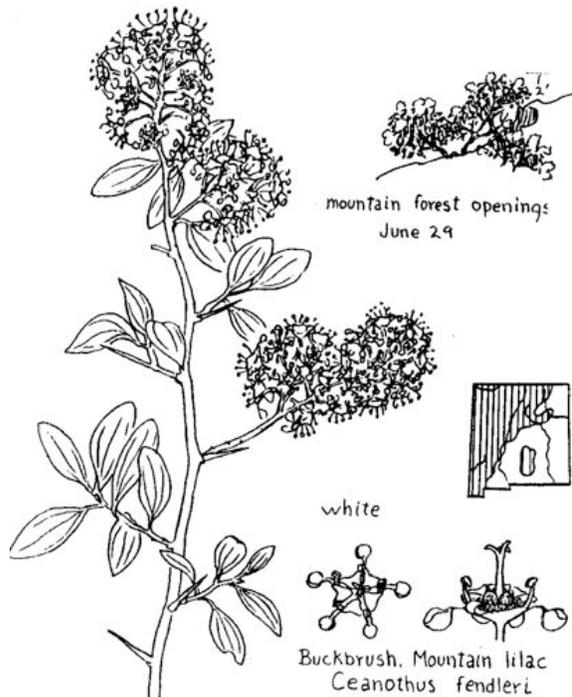
Size:
50 - 100 cm

Description:
Low, heavily branched shrub, branches grayish-white with fine, short hairs. Branches usually spine-tipped. Leaves alternate, on short petioles, narrowly elliptic to oblong, 10 - 25 mm long, 2 - 10 mm wide, mostly glabrous above, densely short-hairy below, edges smooth or minutely toothed, with 3 prominent veins running the length of the leaf. Flowers perfect, on stalks, in dense clusters at stem and branch ends. Sepals 5, about 1 mm long, united at the base, curving inward. Petals 5, 1 - 2 mm long, the blade cup-shaped tapering to a very narrow base. Stamens 5, opposite petals. Style 3-lobed.

Common Name:
Buckbrush, mountain lilac

Color:
White

Notes:
The spiny branches of buckbrush can be uncomfortable for a misplaced hand, but they don't stop deer from browsing it. The flowers and fruits of many species of *Ceanothus* contain saponin, a poisonous modified sugar which has the capability to produce a soapy lather. Buckbrush is occasional throughout the Manzanos. It blooms from April to the end of September between 5000 and 9000ft.



New Mexico Native



ROSACEAE -- Rose Family



Scientific Name:

Agrimonia striata

Size:

50 - 100 cm

Description:

Erect perennial herb, stems with long spreading hairs below, with shorter, sometimes glandular hairs above. Leaves alternate, odd-pinnate with 5 - 13 principal leaflets 4 - 8 cm long, coarsely toothed, glabrous to sparsely hairy above, with short hairs and gland dots below. Principal leaflets interspersed with much smaller ones. Stipules ovate, 1 - 2 cm long. Flowers perfect, on short stalks, in a slender, linear cluster along stem end, the central axis with short and long hairs. Floral cup 5-lobed, with hooked bristles, the cup hardening, 10-grooved in fruit. Petals 5, 2 - 5 mm long. Stamens 5 - 15. Pistils 2. Fruit of 1 or 2 seeds in the hardened floral cup.

Common Name:

Agrimony

Color:

Yellow

Notes:

The leaves of agrimony are unusual. The leaves are pinnate, having pairs of opposite leaflets, but often between the large pairs of principal leaflets there are pairs of very small, miniature leaflets. The fruit is also unusual. The hardened, grooved floral cup is crowned with numerous hooked bristles. Agrimony is unusual in the Manzanos. It blooms from June through August between 7000 and 9000 ft.

New Mexico Native



ROSACEAE -- Rose Family



Scientific Name:

Amelanchier utahensis

Size:

50 - 200 cm

Description:

Synonym: *Amelanchier oreophila*.

Much branched shrub, younger bark reddish, older gray. Leaves alternate, with petioles 2 - 10 mm long, ovate or obovate to almost round, 10 - 30 mm long, 8 - 25 mm wide, toothed on the upper half of the margin, hairy on one or both surfaces. Stipules linear, early deciduous. Flowers perfect, on woolly stalks, in clusters of 3 - 6. Floral cup and sepals woolly. Sepals 5, lanceolate, 1 - 4 mm long, bent backwards. Petals 5, oblanceolate, 5 - 10 mm long, 2 - 4 mm wide. Stamens 15 - 20, filaments white, anthers yellow, turning brown. Pistil 1, styles 2 or 3. Fruit a round to pear-shaped pome, reddish to purplish, 5 - 10 mm long.

Common Name:

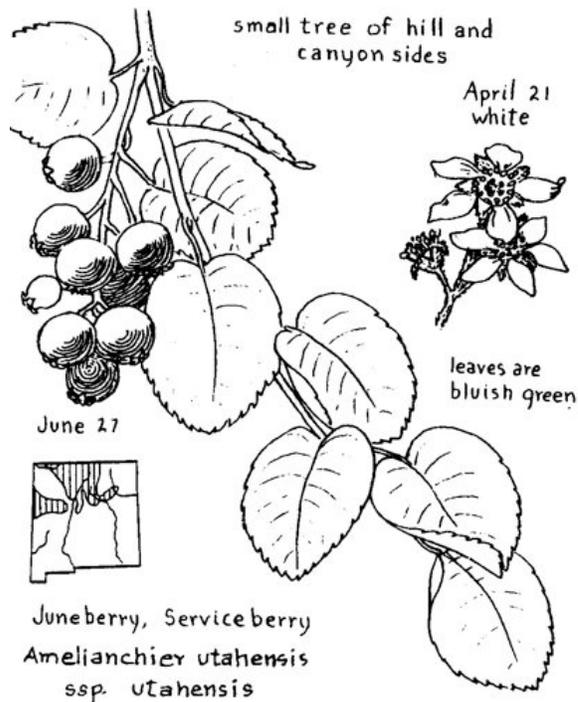
Juneberry, serviceberry

Color:

White

Notes:

Juneberry is an early bloomer. Its fruit ripens in June, hence the name. In early nineteenth century New England, the plants were called serviceberry since they bloomed in April when religious services were getting back to normal after interruption by the snowy roads of winter. The fruit looks like a berry, but is actually more like a tiny apple. Juneberry blooms in April and May between 6000 and 9500 ft.



New Mexico Native



ROSACEAE -- Rose Family



Scientific Name:

Cercocarpus montanus

Size:

100 - 300 cm

Description:

Deciduous shrub, younger bark reddish, older gray-brown. Leaves in bundles on short lateral branches, on short petioles, obovate or oblanceolate to round 12 - 30 mm long, 8 - 20 mm wide, with toothed edges, hairs spreading or lying flat above, white-woolly below. Flowers perfect, on short stalks, solitary or in bundles of 2 or 3 in axils of spur branches. Floral tube narrowly trumpet-shaped, 6 - 12 mm long, longer in fruit, crested by the 5-lobed calyx, bell-shaped 3 - 8 mm high. Petals absent. Stamens 12 - 40, anthers hairy. Pistil 1, with style from tip, style lengthening at maturity, 3 - 10 cm long, curly, feather-like.

Common Name:

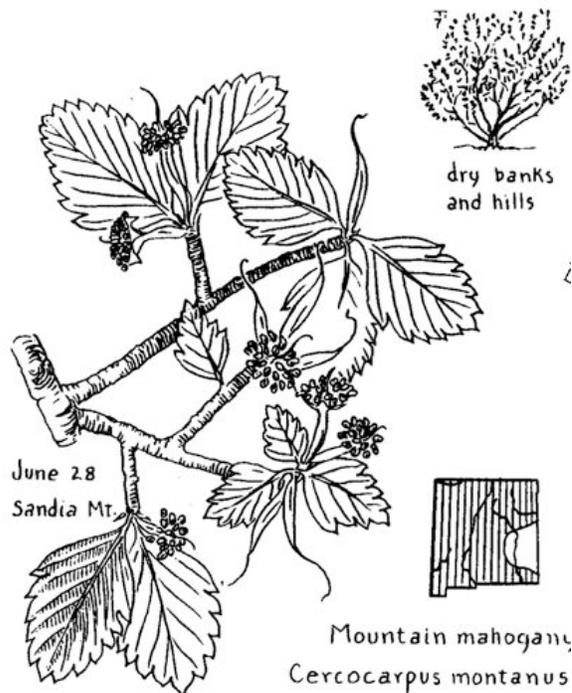
Mountain mahogany

Color:

Reddish

Notes:

The genus name *Cercocarpus* comes from the Greek *cerkos*, "tail" and *carpus*, "fruit". The long, curled, persistent, feather-like styles attached to the fruits are quite distinctive. The plants are slow-growing, with hard, dark wood. Leaves and twigs provide excellent browse for deer. Mountain mahogany blooms in May and June between 6000 and 9000 ft.



New Mexico Native



ROSACEAE -- Rose Family



Scientific Name:
Fallugia paradoxa

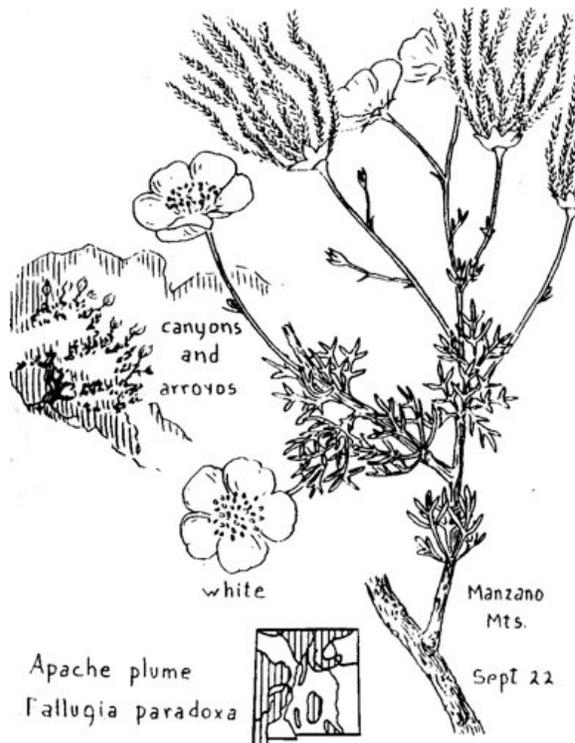
Size:
50 - 150 cm

Description:
Deciduous, much-branched shrub, young branches pale brown with white woolly hairs, older branches light gray with peeling bark. Leaves alternate, in bundles on short lateral branches, 7 - 15 mm long, pinnately 3- to 5-lobed, thick, leathery, with edges curled, with dense, yellow, woolly hairs below. Flowers 1 - 3 at branch ends. Floral cup hemispheric, 2 - 4 mm deep, woolly-hairy within, topped by 5 ovate sepals 4 - 7 mm long, ridged near tip, sepals subtended by 5 narrow bractlets. Petals 5, almost round, 9 - 16 mm long. Stamens numerous, filaments whitish, anthers yellow. Pistils numerous, tipped by a style elongating to 2 - 5 cm long in fruit, feathery, twisted.

Common Name:
Apache plume

Color:
White

Notes:
The genus *Fallugia* is named for Virgilio Fallugi, an obscure seventeenth century abbot. The genus contains only one species, Apache plume. Early botanical explorers of the Southwest had many trials and tribulations. One of the worst was the distinctly unfriendly Apache tribe. The mature flowers of this plant were thought to resemble the war bonnets of the Apache. Apache plume blooms from May into September between 5000 and 7500 ft.



New Mexico Native



ROSACEAE -- Rose Family



Scientific Name:

Fragaria vesca

Size:

5 - 20 cm

Description:

Synonym: *Fragaria americana*

Perennial herb, with long spreading hairs, stemless except for horizontal rooting stems. Leaves basal, on petioles 3 - 15 cm long, odd-pinnate with 3 elliptic to oblong or obovate leaflets 3 - 6 cm long, 20 - 45 mm wide, essentially sessile, with coarsely toothed margins, with long hairs, sparse above, denser below especially on veins. Flowers on stalks in loose clusters of 3 - 10 subtended by a bract, each cluster on a leafless stalk taller than the leaves. Floral cup flattened, topped by 5 lanceolate sepals subtended by 5 sepal-like bractlets. All parts silky-hairy. Petals 5, obovate, 5 - 8 mm long. Stamens 20. Pistils many. Fruit of many small seeds on the surface of a fleshy receptacle.

Common Name:

Wild strawberry

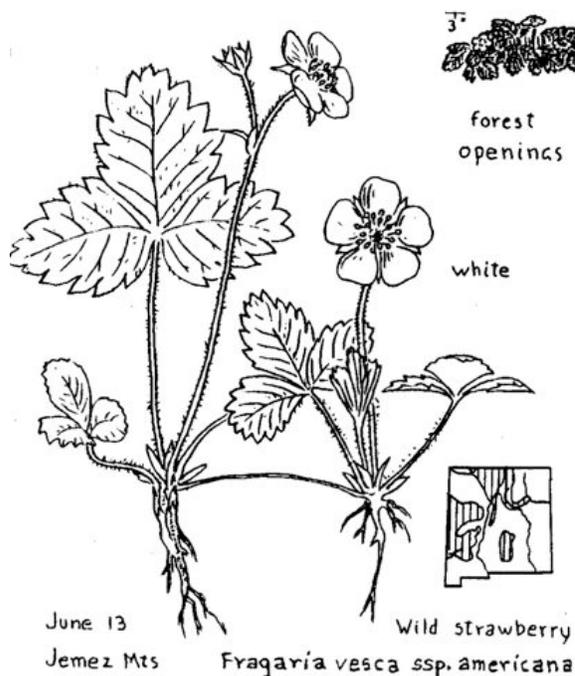
Color:

White

Notes:

The genus name *Fragaria* comes from the Latin *fraga*, "strawberry", but as a scent rather than a fruit type. The common name strawberry comes from the Old English *Streawberige*. The root *strew* means "strew" or "scatter" in reference to the way the plants scatter themselves by rooting horizontal runners. Wild strawberries bloom from May through July between 6500 and 10000 ft.

New Mexico Native



ROSACEAE -- Rose Family



Scientific Name:

Geum aleppicum

Common Name:

Yellow avens

Size:

40 - 100 cm

Color:

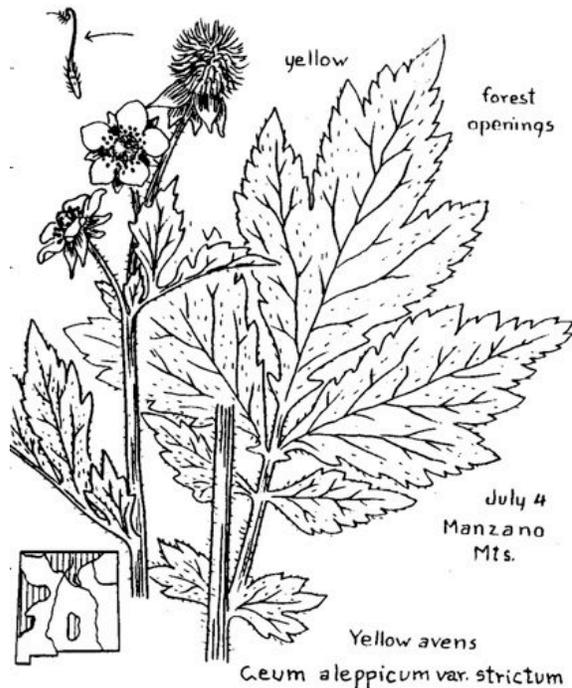
Yellow

Description:

Erect perennial herb, stems 1 to several, unbranched. Stems and petioles with coarse, stiff hairs. Basal leaves obovate in outline, 15 - 24 cm long, odd-pinnately divided into 5 - 9 irregularly toothed leaflets, the terminal one 3- to 5-lobed and larger. Stem leaves alternate, with 3 - 5 leaflets and leaflet-like stipules. Flowers perfect, on long stalks in loose clusters of 2 to several at stem ends. Floral cup flattened, topped with 5 ovate sepals 3 - 7 mm long, alternating with 5 narrow bractlets, the sepals bending backwards. Petals 5, obovate to round, 4 - 7 mm long. Stamens numerous. Pistils numerous, hairy, forming a fruiting sphere, bristly with the long styles with green bent tips.

Notes:

The flowers (and leaves) of yellow avens distinctly resemble those of the Macoun's buttercup (see *Ranunculus macounii*), but the fruiting sphere is quite different. Each of the more than 200 seeds of the avens is tipped by a long strangely bent style, forming an intricate, bristly ball. The species name *aleppicum* derives from the fact that one of the first specimens likely came from the area of Aleppo, Syria. The common name avens comes from the Medieval Latin *avencia*, a name for a kind of clover. Yellow avens blooms from May into August between 6500 and 10000 ft.



New Mexico Native



ROSACEAE -- Rose Family



Scientific Name:

Holodiscus dumosus

Size:

50 - 150 cm

Description:

Densely branched shrub. Leaves on spur branches, alternate, on short petioles, obovate to oblanceolate, 1 - 3 cm long, 5 - 20 mm wide, coarsely toothed or lobed from the middle to the apex, with shaggy hairs or almost glabrous above and below. Flowers small, perfect, numerous, subtended by bractlets, in branched clusters at branch ends. Floral cup shallow, about 2 mm across, lined with a smooth-edged disk. Sepals 5, ovate, 1 - 2 mm long. Petals 5, spatulate, about 2 mm long. Stamens 20. Pistils 5.

Common Name:

Mountain spray, ocean spray

Color:

Cream to pinkish

Notes:

The genus name *Holodiscus* comes from the Greek *holos*, "whole", and *diskos*, disk, describing a smooth-edged disk inside the floral cup. The species name *dumosus* is Latin for bushy. Some think the numerous, tiny, creamy flowers in branched clusters resemble the spray off of ocean waves. Mountain spray blooms from June into August between 6500 and 10000 ft.

New Mexico Native



ROSACEAE -- Rose Family



Scientific Name:

Physocarpus monogynus

Common Name:

Ninebark

Size:

40 - 100 cm

Color:

White

Description:

Deciduous shrub, stems reclining to spreading, much branched, with peeling bark; young twigs reddish-brown, with star-shaped hairs or glabrous. Leaves alternate, on petioles 3 - 15 mm long, ovate to almost round, 2 - 4 cm long, palmately 3- to 5-lobed, edges coarsely toothed, glabrous to somewhat hairy, especially below. Flowers perfect, on stalks 8 - 15 mm long, in dense, rounded clusters at branch ends. Floral cup with star-shaped hairs, hemispheric, about 3 mm across, topped by 5 ovate sepals 2 - 3 mm long. Petals 5, almost round, 2 - 4 mm long. Stamens 20 - 40 on a disk in the floral cup. Pistils 1 - 5. Fruits paired, fused to the middle, with star-shaped hairs.

Notes:

The bark of this plant is in several shreddy, peeling layers giving rise to the name ninebark. The genus name *Physocarpus* comes from the Greek *physis*, "bladder", and *carpos*, "fruit", referring to the somewhat inflated fruits. The species name *monogynus* means "with one ovary", but the flowers actually have up to 5. The leaves of ninebark strongly resemble the leaves of currants (see *Ribes*). Ninebark blooms in June and July between 7000 and 10000 ft.



New Mexico Native



ROSACEAE -- Rose Family



Scientific Name:

Potentilla gracilis var. *pulcherrima*

Common Name:

Pretty cinquefoil

Size:

25 - 75 cm

Color:

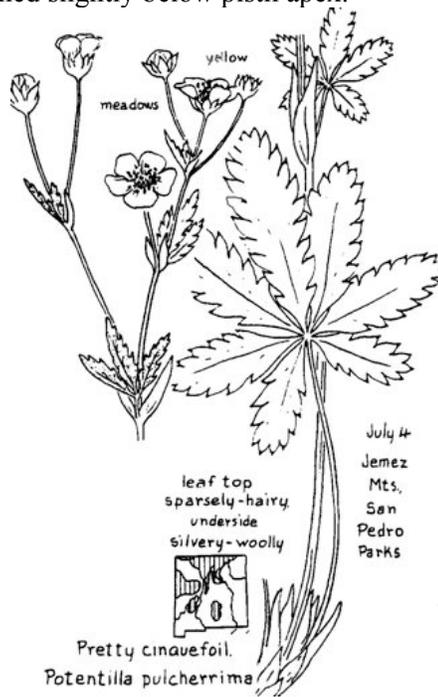
Yellow

Description:

Ascending to erect perennial herb, stems with hairs lying flat or spreading. Leaves mostly basal, on petioles 4 - 18 cm long, compound with 5 - 9 oblanceolate to obovate leaflets originating from a common point, 2.5 - 5 cm long, coarsely toothed or incised, greenish, almost glabrous above, white hairy below. Stem leaves few, alternate, reduced upward. Flowers perfect, on stalks in several-flowered branched, open clusters subtended by bracts. Floral cup shallow, topped with 5 lanceolate sepals 4 - 6 mm long, alternating with 5 lanceolate bractlets. Petals 5, obovate, 5 - 8 mm long, often notched. Stamens 20. Pistils numerous, styles threadlike, about 2 mm long, attached slightly below pistil apex.

Notes:

The genus name *Potentilla* is the diminutive of the Latin *potens*, "powerful". Cinquefoils have long been thought to have powerful medicinal properties. The common name cinquefoil comes from the Middle French *cincfoille*, meaning "5-leaved". The compound leaves often have 5 leaflets, but can certainly have more or fewer. Pretty cinquefoil is known to hybridize with woolly cinquefoil (see next page). Pretty cinquefoil blooms from late June into September between 7500 and 10000 ft.



New Mexico Native



ROSACEAE -- Rose Family



Scientific Name:

Potentilla hippiana

Size:

10 - 50 cm

Description:

Ascending to erect perennial herb, stems branched, with silky hairs. Basal leaves crowded, 3 - 18 cm long, on long petioles, odd-pinnate with 7 - 11 silky-hairy oblanceolate to oblong leaflets 10 - 40 mm long, with additional short, woolly hairs below, edges deeply toothed. Stem leaves alternate, few, similar to basal. Flowers perfect, on stalks, in few-flowered, branched, loose clusters subtended by bracts. Floral cup shallow, topped with 5 lanceolate sepals 4 - 6 mm long, alternating with 5 narrow bractlets. Petals 5, obovate, slightly longer than the sepals. Stamens about 20. Pistils numerous, styles threadlike, about 2 mm long, attached slightly below pistil apex.

Common Name:

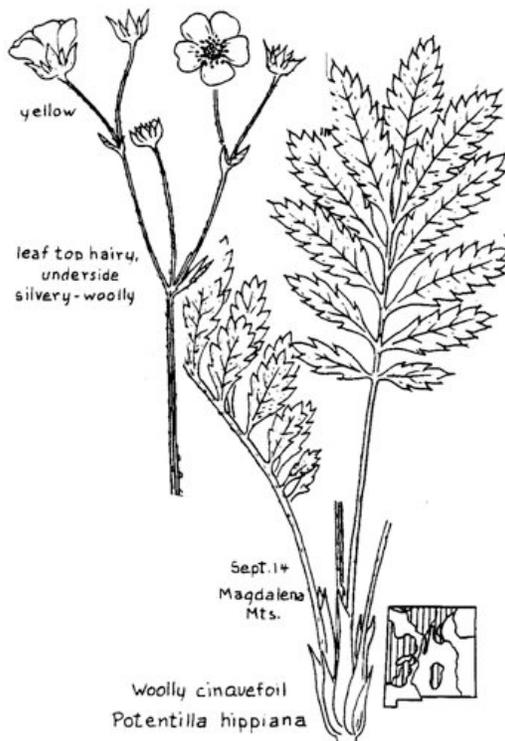
Woolly cinquefoil, Hipp's cinquefoil

Color:

Yellow

Notes:

This species was first described in 1830 by the noted German botanist and *Potentilla* expert Johann Georg Christian Lehmann (1792 -1860), director of the botanical garden in Hamburg. Lehmann named the species for his close friend, Charles Friedrich Hipp. Woolly cinquefoil is known to hybridize with pretty cinquefoil (see previous page). Woolly cinquefoil blooms from June into August between 7000 and 10000 ft.



New Mexico Native



ROSACEAE -- Rose Family



Scientific Name:

Prunus americana

Common Name:

Wild plum

Size:

1 - 5 m

Color:

White

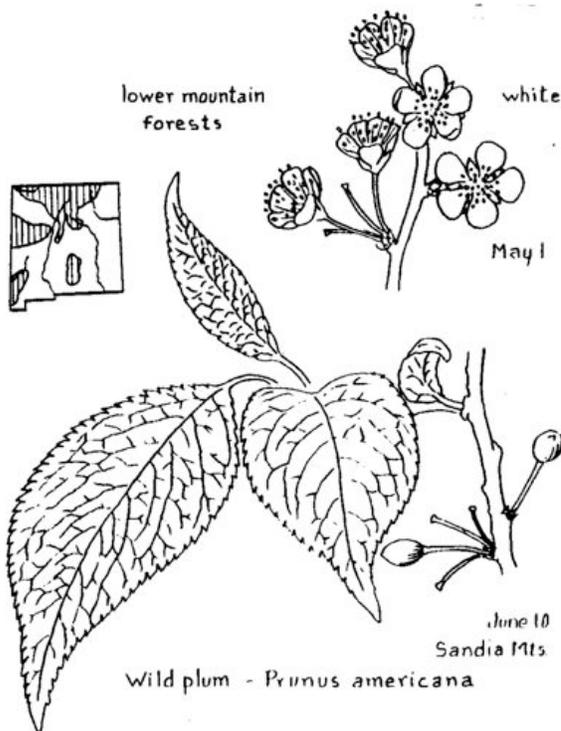
Description:

Thicket forming shrub, branches mostly glabrous. Leaves alternate, on petioles 8 - 20 mm long, elliptic to ovate or lanceolate, 3 - 8 cm long, margins sharply toothed and curving to a sharp tip, glabrous above, sometimes hairy on veins below. Flowers perfect, on stalks 7 - 20 mm long, in bundles of 2 - 5, originating at a common point, usually appearing before leaves. Floral cup goblet-shaped, about 3 mm long, topped by 5 lanceolate sepals, spreading or bent backwards. Petals 5, oblanceolate to spatulate, 8 - 12 mm long, narrowed to the base. Stamens 20 - 30, filaments long, white, anthers yellow. Pistil 1, style 1. Fruit a plum 2 - 3 cm in diameter.

Notes:

Wild plum is indigenous to the United States. The flowers have a strong, curious fragrance rather like a corn tortilla. The fruit is edible, although small. The plants are sometimes cultivated. The root stock spreads below ground often resulting in thickets. Wild plums flower before the leaves appear, often before the last frost, so fruit is unusual except in warmer areas. They bloom in April and early May between 4000 and 8000 ft.

New Mexico Native



ROSACEAE -- Rose Family



Scientific Name:

Prunus virginiana var. *melanocarpa*

Common Name:

Chokecherry

Size:

2 - 8 m

Color:

White

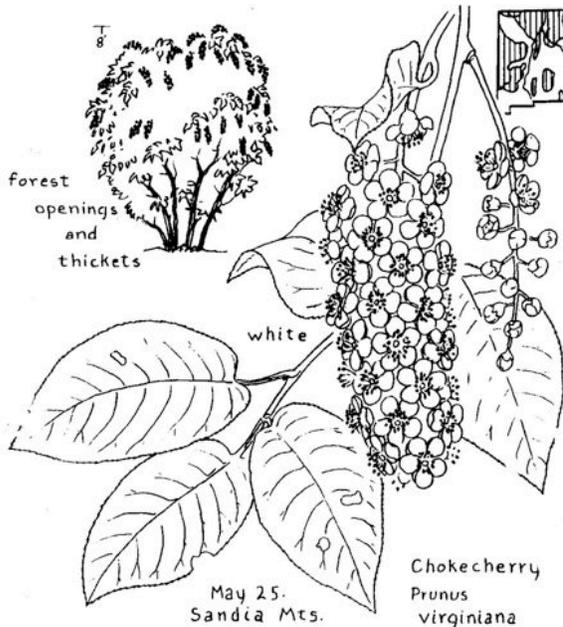
Description:

Shrub or small tree, younger branches reddish, older bark ashy gray. Leaves alternate, ovate to elliptic, 4 - 10 cm long, 2 - 5 cm wide, edges finely toothed and curving to a sharp tip, green above, paler below, mostly glabrous. Petioles with 2 red glands near leaf base. Flowers perfect, on stalks 3 - 7 mm long, in dense clusters 5 - 15 cm long at branch ends. Floral cup bell-shaped, 2 - 3 mm long, topped by 5 triangular to round sepals, bent backwards, with glandular hairs and rough edges. Petals 5, ovate to round 3 - 5 mm long. Stamens 20 - 30, with filaments 2 - 5 mm long. Pistil 1, style 1. Fruit a small cherry almost black when ripe, 6 - 8 mm across.

Notes:

This chokecherry is native to the United States and common in the Manzanos. The plants are browsed by deer and elk. The fruit is consumed by birds and bears and often made into jelly, syrup or wine by people patient enough to deal with the pits. The fruit is extremely sour and can make a person gag, giving rise to the common name. The genus *Prunus* is important for ornamental and agricultural use including peaches, apricots, plums, cherries, and almonds. Chokecherry blooms from late April into June between 6000 and 8000 ft.

New Mexico Native



ROSACEAE -- Rose Family



Scientific Name:

Rosa woodsii

Size:

40 - 150 cm

Description:

Much-branched shrub forming thickets, stems armed with prickles, with 1 or 2 below the stipules larger and different from those between nodes. Leaves alternate, odd-pinnate, with 5 - 9 elliptic to ovate or obovate leaflets 2 - 4 cm long, with toothed edges, glabrous above, sometimes hairy or glandular below. Flowers perfect, on stalks, in loose few-flowered clusters at the ends of new branches. Floral cup glabrous, urn-shaped, 3 - 5 mm across, tipped with 5 sepals 1 - 2 cm long, 2 - 3.5 mm wide at base, persistent. Petals 5, obovate, 15 - 25 mm long. Stamens numerous. Pistils more or less numerous. Fruit of 15 - 35 seeds contained in the mature floral cup (hip).

Common Name:

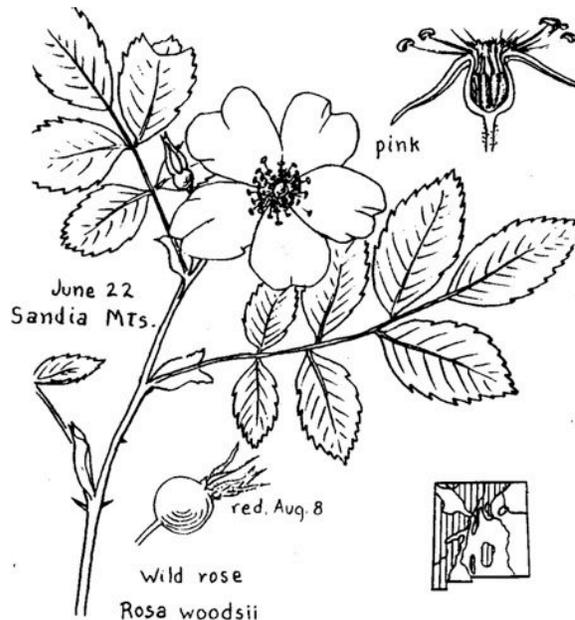
Wild rose, Wood's rose

Color:

Pink (rarely white)

Notes:

This wild rose is named for Joseph Woods (1776-1864), an English botanist for whom the fern genus *Woodsia* is also named. Wild roses are prone to hybridization and are difficult taxonomically. The cup supporting the flower matures, enclosing the seeds forming a long-lasting, edible fruiting body known as a hip, long cherished by herbalists. Wild roses bloom from June into August between 6000 and 9000 ft.



New Mexico Native



ROSACEAE -- Rose Family



Scientific Name:

Rubus idaeus ssp. *strigosus*

Size:

30 – 120 cm

Description:

Synonym: *Rubus strigosus*.

Sprawling shrub, older stems with numerous prickles and peeling bark, younger stems prickly and glandular-hairy. Leaves alternate, on petioles 2 - 4.5 cm long, odd-pinnate with 3 - 5 lanceolate to ovate leaflets 3 - 5 cm long, margins toothed, mostly glabrous above, with short grayish hairs below and prickly veins. Flowers perfect, on prickly, glandular stalks, in loose few-flowered clusters or 1 or 2 from leaf axils. Floral cup small, prickly, glandular, topped with 5 lanceolate sepals 6 - 12 mm long. Petals 5, oblanceolate to spatulate 3 - 7 mm long. Stamens numerous. Pistils numerous. Fruiting body of numerous small, red, fleshy fruits, each containing a small pit.

Common Name:

Red raspberry

Color:

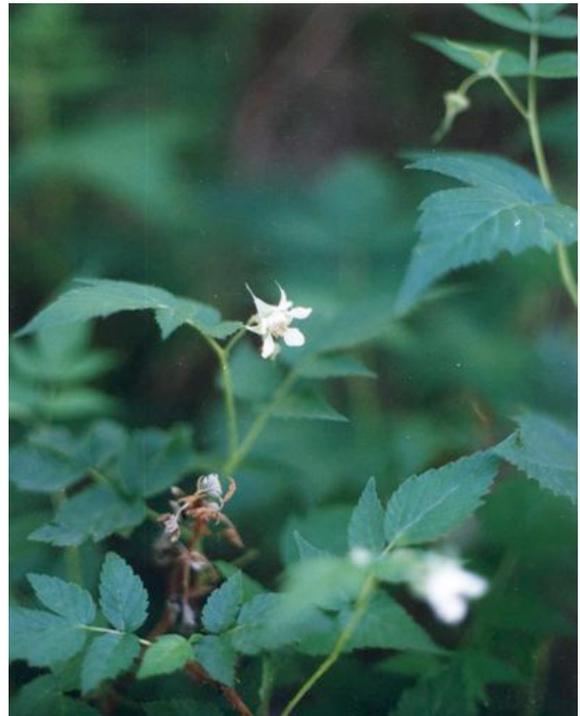
White

Notes:

Rubus idaeus was listed by Carl Linnaeus (1707-1778), the great Swedish botanist and father of the binomial nomenclature of modern botany, in his first major botanical treatise *Species Plantarum* (1753). The species name *idaeus* means “from Mount Ida (Syria)”. Red raspberries are common in the Manzanos. The ripe fruit is quite tasty, although the small plants rarely bear heavily. Raspberries bloom from late May into July between 7000 and 10000 ft.



New Mexico Native



ROSACEAE -- Rose Family



Scientific Name:

Rubus parviflorus

Size:

50 - 150 cm

Description:

Erect shrub without prickles, bark gray, shreddy, stems and petioles with stalked glands. Leaves alternate, on petioles 2 - 10 cm long, palmately 5-lobed, 10 - 18 cm long and wide, irregularly toothed, green above, pale beneath, glabrous to somewhat hairy. Flowers perfect, on glandular stalks, in loose clusters of 2 - 4 at branch ends. Floral cup small, topped with 5 ovate sepals 8 - 18 mm long, with gland-tipped hairs. Petals 5, ovate to obovate, 8 - 20 mm long. Stamens numerous, anthers about 1 mm long. Pistils numerous, each with 1 glabrous style 1 - 1.5 mm long. Fruiting body of numerous small, pink, fleshy fruits, each containing a small pit.

Common Name:

Thimbleberry

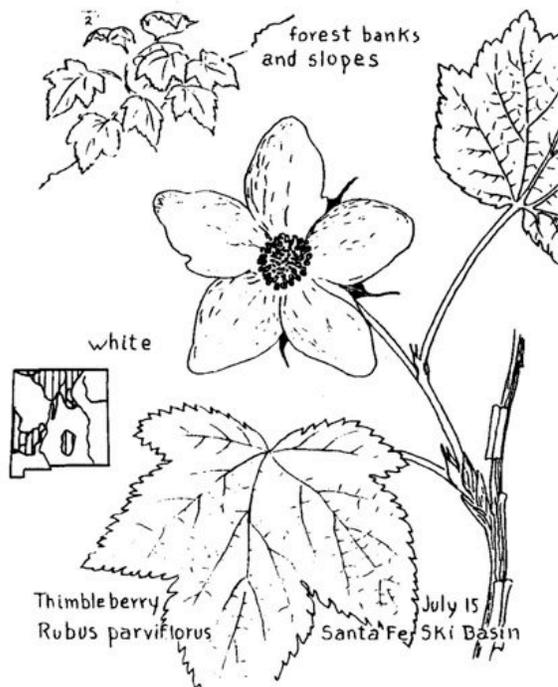
Color:

White

Notes:

The species name *parviflorus* means “small-flowered”, a curious choice since the flowers of thimble berries are large and showy. The genus name *Rubus* is Latin for “bramble”, or “thicket”, which is descriptive of both thimbleberries and raspberries. Thimble berries are composed of numerous small fruits attached together and to a dome-shaped structure in the flower. When ripe, the whole unit separates from the dome, forming a hollow fruit shaped like a thimble. They are edible and delicious. Thimbleberries bloom from late May into July between 7000 and 9500 ft. Berries ripen in late July.

New Mexico Native



RUBIACEAE -- Madder Family



Scientific Name:

Galium aparine

Size:

Vining 20 - 100 cm

Description:

Reclining annual herb, stem 4-angled, edges with stiff, downward pointing hairs. Leaves linear to linear oblong, 1 - 5 cm long, 2 - 6 mm wide, single-veined, in whorls of 6 to 8, unlobed, with hairs along edges, upper surface with hooked hairs. Flowers perfect, borne on stalks terminated by a partial to complete whorl of small leaves from which originate 1 - 5 (often 3) straight flowering stalks with individual flowers. Calyx vestigial or lacking. Corolla tubular, the 4 lobes much longer than the short tube. Stamens 4. Styles 2, stigmas head-like. Fruit with two dry lobes, borne closely together but not fused, covered with hooked bristles.

Common Name:

Cleavers, goosegrass

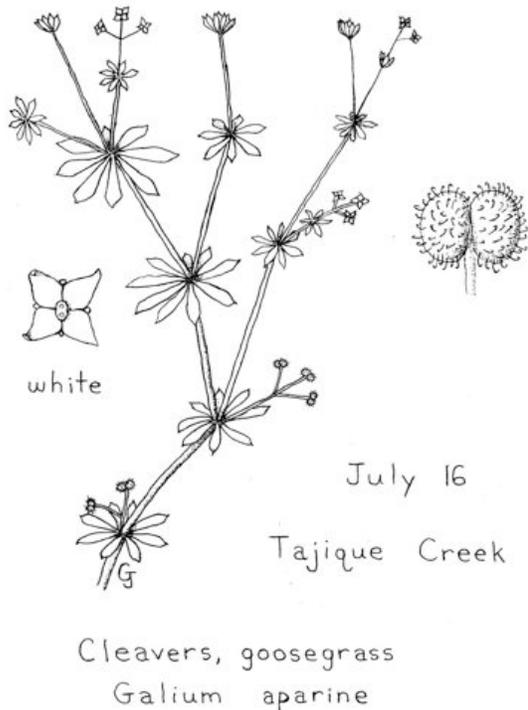
Color:

Whitish

Notes:

The hooked hairs on the leaves and stems of this plant assure that it will stick firmly to clothing or fur, giving rise to the common name, "cleavers". The plants tend to drape themselves over logs and other plants, and with their whorls of 6 to 8 leaves are distinctive. The similar native perennial *G. mexicanum* with 4 - 6 leaves per whorl is also present in the Manzanos. *G. aparine* blooms from late June into September between 5000 and 9000 ft.

Introduced*



RUBIACEAE -- Madder Family



Scientific Name:

Galium boreale

Common Name:

Northern bedstraw

Size:

20 - 80 cm

Color:

White

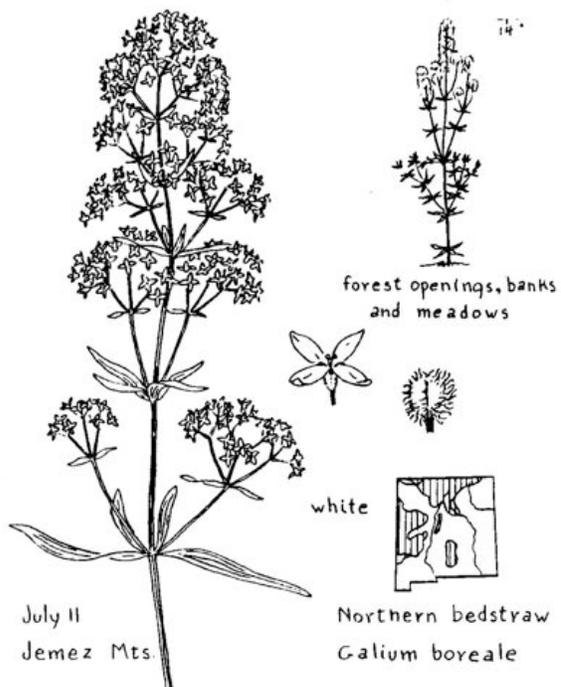
Description:

Erect perennial herb, stems 4-angled, mostly glabrous, edges rough or smooth. Leaves narrowly lanceolate to linear, 1 - 6 cm long, 2 - 12 mm wide, with smooth edges, in whorls of 4, sessile, with 3 nerves, mostly glabrous. Flowers 3 - 7 mm in diameter, perfect, numerous, borne on stalks in loose clusters at stem ends. Calyx vestigial or lacking. Corolla tubular, the 4 lobes much longer than the short tube. Stamens 4. Styles 2, stigma head-like. Fruit with two dry lobes, borne closely together but not fused, with short straight or curved (but not hooked) hairs.

Notes:

The genus *Galium* occurs in the Northern hemisphere. Plants often have hooked hairs which attach to fur, cloth, etc. The stems even stick to each other so that the dried plants resist compaction. European species, more aromatic, have been used as mattress stuffing, hence the name bedstraw. Relatives of bedstraw in the Madder family include coffee (*Coffea arabica*) and the Gardenia. Northern bedstraw blooms from mid-June into September between 6000 and 10000 ft.

New Mexico Native



RUBIACEAE -- Madder Family



Scientific Name:

Houstonia rubra

Common Name:

Desert innocence

Size:

5 - 10 cm

Color:

Pink

Description:

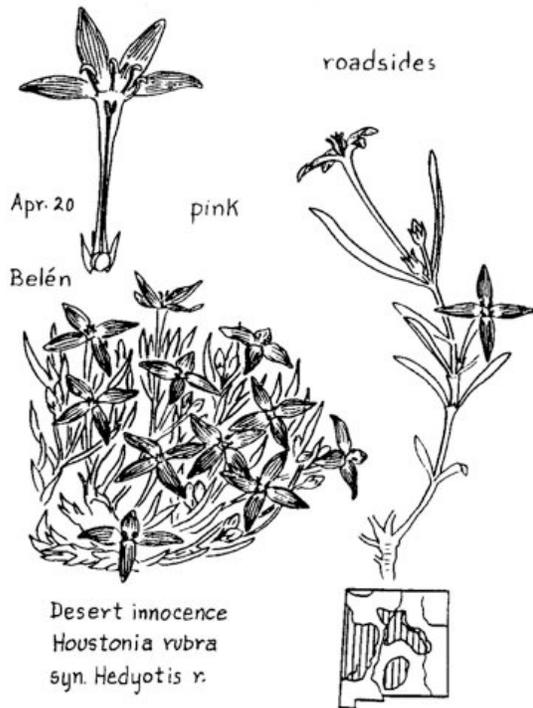
Synonym: *Hedyotis rubra*.

Small perennial herb with taproot and woody root crown, stems short, several, much branched, forming a mound. Leaves opposite, crowded, linear, with edges rolled under, 1 - 3 cm long, 1 - 3 mm wide. Flowers perfect, almost sessile in leaf axils. Calyx with 4 green lobes 2 - 4 mm long, tapering to a point. Corolla trumpet-shaped, tube narrow, 1 - 3 cm long, with 4 lobes 5 - 9 mm long. Stamens 4, attached near top of tube. Style slender, 2-lobed, longer or shorter than stamens. Fruit a dry capsule. Seeds black.

Notes:

The genus name *Houstonia* honors William Houston (1695-1733), Scottish physician and botanist who collected in Mexico and the Caribbean. This tiny plant occurs in the dry plains approaching the Manzanos. It is hard to see, but worth the effort. Its thin, long, pink, tubular flowers are delicate and beautiful. It blooms from May into August between 4500 and 6500 ft.

New Mexico Native



RUTACEAE -- Rue Family



Scientific Name:

Ptelea trifoliata

Size:

100 - 200 cm

Description:

Large aromatic shrub or small tree, petioles, flower stalks, and young twigs finely hairy. Leaves alternate, with 3 ovate to broadly elliptic, sessile leaflets 3 - 7 cm long, originating from a common point at the tip of the petiole, margins finely wavy toothed or smooth, dotted with translucent glands above and below. Flowers unisexual (sometimes perfect) with parts of one sex reduced, with male flowers and female flowers on separate plants, on stalks in branched clusters near branch ends. Stamens as many as and alternate with petals, filaments hairy. Pistil 1, style 1, stigma lobed. Fruit one-seeded, round, thin flat, with a broad papery margin.

Common Name:

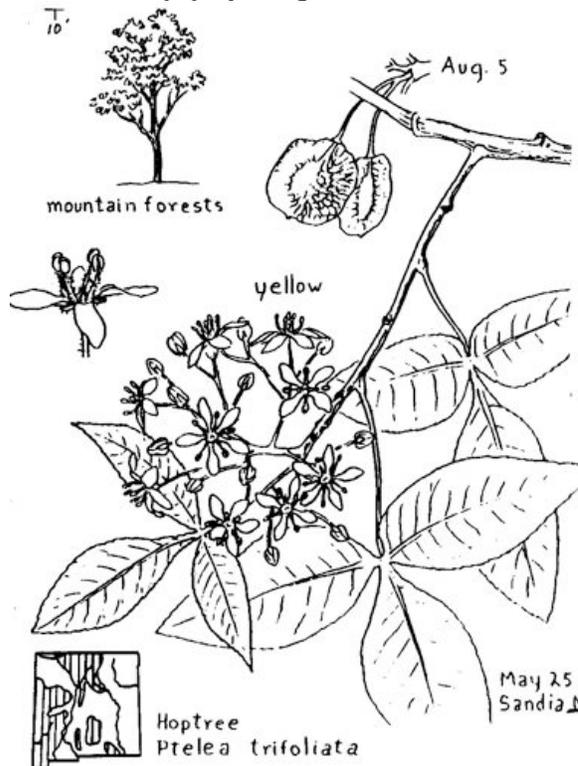
Hoptree

Color:

Greenish white

Notes:

The genus name *Ptelea* is Greek for "elm". The seeds of the hoptree strongly resemble the seeds of the ubiquitous Siberian elm. Hoptree flowers are fragrant. The leaves, when crushed, give off a strong, not always pleasant aroma. The seeds have been used in place of hops (see *Humulus lupulus*) as a bittering agent in beer making, hence the designation hoptree. Hoptrees bloom from late April into June between 5000 and 8500 ft.



New Mexico Native



SALICACEAE -- Willow Family



Scientific Name:

Salix exigua

Size:

1 – 3 m

Description:

Colonial shrub, often forming dense thickets. Leaves alternate, on petioles 1 – 5 mm long, linear to linear-lanceolate, 3 – 14 cm long, 2 – 12 mm wide, edges smooth to vaguely toothed, upper surface somewhat shiny, with long hairs lying flat or almost glabrous, lower surface somewhat waxy, with long hairs lying flat. Male and female flowers on separate plants, without sepals and petals, but each flower subtended by a hooded, deciduous, yellowish bract (scale). Flower borne in dense cylindrical clusters (catkins) appearing with or after the leaves (see next page for catkin descriptions.)

Common Name:

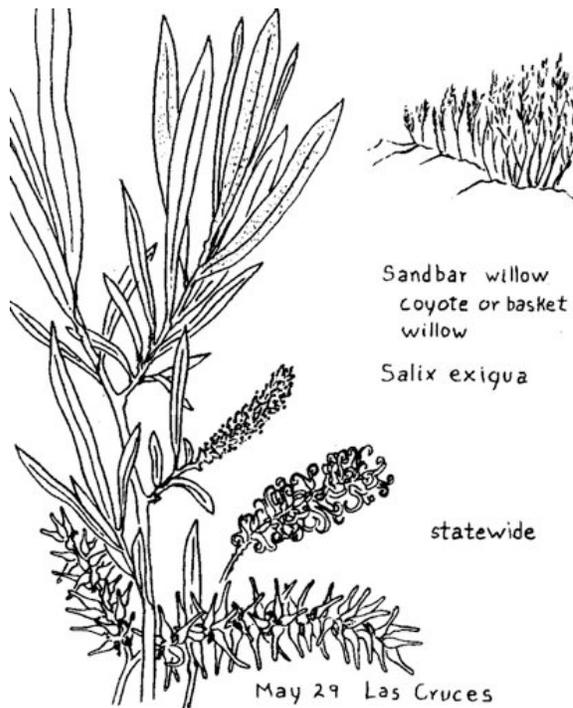
Coyote willow, sandbar willow

Color:

Greenish

Notes:

The species name *exigua* is Latin for “weak” or “feeble”. Coyote willows have slender stems and generally remain shrubby, rarely developing a significant trunk or a tree-like character. The plants spread vegetatively by means of creeping roots forming extensive colonies. The leaves of coyote willows are very long and narrow, generally 8 – 20 times longer than wide. The catkins appear in May. Coyote willow grows near water supplies between 3500 and 7500 ft.



New Mexico Native



SALICACEAE -- Willow Family



Scientific Name:

Salix exigua (flowers)

Common Name:

Coyote willow, sandbar willow

Size:

See previous page and descriptions below.

Color:

Greenish

Description (male):

Staminate catkins 1 – 6 cm long, many flowered, each flower with 2 stamens, filaments hairy, anthers yellow. (See photograph below.)

Description (female):

Pistillate catkins 2 – 8 cm long, many but loosely flowered, each flower with a single pistil, ovary glabrous to somewhat silky, stigma 4-lobed. Capsules on short stalks 0.5 – 1.0 mm long, glabrous, 4 – 5 mm long. (See photograph below.)



SALICACEAE -- Willow Family



Scientific Name:

Salix irrorata

Size:

1 - 4 m

Description:

Thicket-forming shrub along streams and drainages, stems numerous, with a whitish removable coating. Leaves alternate, on petioles, broadly linear to lanceolate or oblanceolate, 5 - 12 cm long, 8 - 22 mm wide, glabrous, sometimes waxy, dark green, shiny above, lighter below, margins mostly smooth. Male and female flowers on separate plants, without sepals or petals, but each subtended by a hooded, long-hairy bract, in dense, many-flowered, cylindrical clusters (catkins) appearing before the leaves (see next page for description). Fruit of glabrous capsules 3 - 4 mm long.

Common Name:

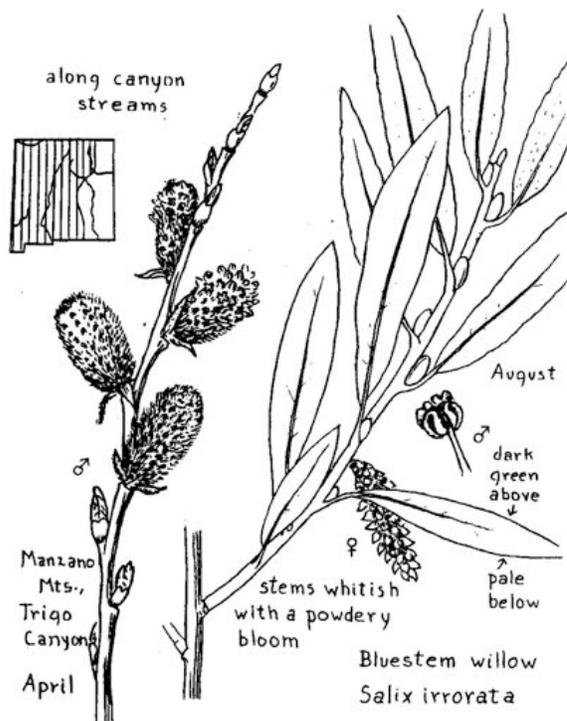
Bluestem willow

Color:

Greenish

Notes:

The species name *irrorata* comes from Latin and means “spotted with dew”. This presumably relates to the whitish coating on the twigs which can easily be rubbed off like a light layer of dew. Willow flowers are tiny, stalkless, and densely concentrated in clusters called aments or catkins, with males and females on completely separate plants. Individual flowers have undergone considerable reduction, eliminating the traditionally recognizable flower parts, the sepals and petals, forming a “bare bones” flower with only the sexual parts. Bluestem willows bloom in April between 5000 and 8500 ft.



New Mexico Native



SALICACEAE -- Willow Family



Scientific Name:

Salix irrorata (flowers)

Common Name:

Bluestem willow

Size:

See previous page and descriptions below.

Color:

Greenish

Description (male):

Staminate catkin 1.5 - 3 cm long. Floral bracts 1 per flower, dark, hooded, with long hairs. Stamens 2, filaments glabrous, anthers yellow, protruding beyond bract at maturity.

(See photograph below).

Description (female):

Pistillate catkin 2 - 4 cm long. Floral bracts 1 per flower, dark, hooded. Ovary glabrous.

(See photograph below.)



SALICACEAE -- Willow Family



Scientific Name:

Salix lucida ssp. *lasiandra*

Size:

2 – 5 m

Description:

Shrub or small tree, twigs glabrous, shiny, yellowish to reddish-brown. Leaves alternate, lanceolate to narrowly elliptical or oblanceolate, 5 – 15 cm long, 1 – 3 cm wide, gradually tapering to a long point, glabrous, dark green and very shiny above, with a whitish, waxy coating below, edges finely toothed, with yellow glands at base of blade. Petioles 5 – 15 mm long, with yellow glands near the top. Stipules often well developed, broadly rounded. Male and female flowers on separate plants, without sepals or petals, but each flower subtended by a deciduous yellow bract (scale). Flowers borne in dense cylindrical clusters (catkins) appearing with the leaves (see next page for catkin descriptions).

Common Name:

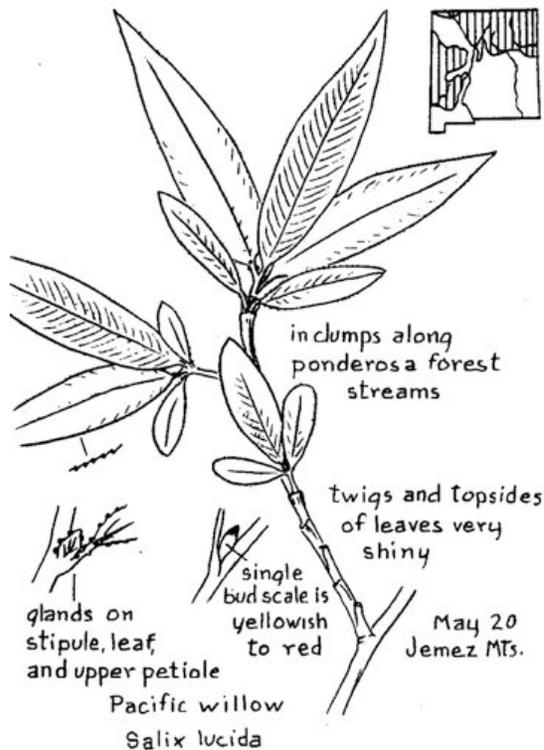
Pacific willow, shining willow

Color:

Greenish

Notes:

The species name *lucida* is Latin for shining. The twigs and upper leaf surfaces of this willow are very shiny. The subspecies name *lasiandra* comes from the Greek *lasios*, “woolly” and *andros*, “male” in reference to the hairy stamens of the male flowers. Shining willows can develop substantial trunks 10 – 20 cm in diameter. Mature leaves often have yellowish glands at the base of stalk. Shining willows flower from late April through May between 5500 and 9500 ft.



New Mexico Native



SALICACEAE -- Willow Family



Scientific Name:

Salix lucida (flowers)

Common Name:

Pacific willow, shining willow

Size:

See previous page and descriptions below.

Color:

Greenish

Description (male):

Staminate catkins 2 – 10 cm long, many flowered, each flower with 3 – 7 stamens, filaments hairy, anthers yellow. (See photograph below).

Description (female):

Pistillate catkins 2 – 10 cm long, many flowered, each flower with a single pistil, ovary glabrous, stigma 4-lobed. Capsules on short stalks 0.5 – 1.5 mm long, glabrous, 4 – 8 mm long, with a long neck. (See photograph below).



SANTALACEAE -- Sandalwood Family



Scientific Name:

Comandra umbellata ssp. *pallida*

Common Name:

Bastard toadflax

Size:

10 - 30 cm

Color:

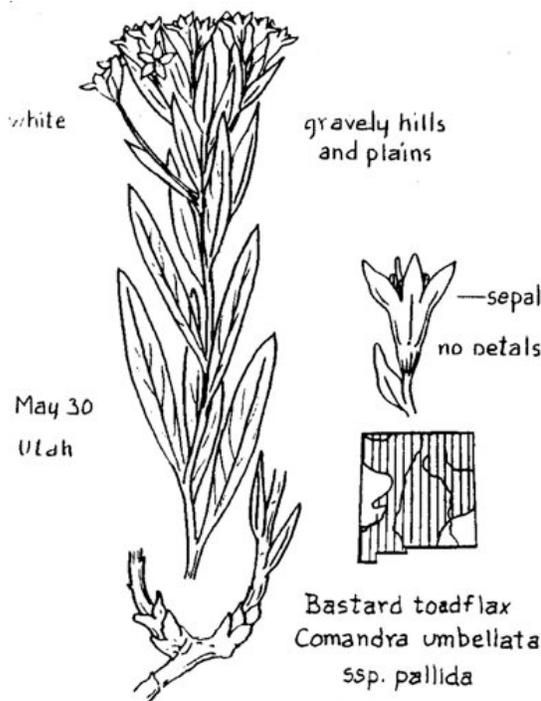
Yellow

Description:

Glabrous, green, erect perennial root-parasite, stems clustered. Leaves alternate, with short petioles or sessile, linear to narrowly elliptic or lanceolate, 1 - 4 cm long, thick, waxy. Flowers perfect, in dense clusters near stem end subtended by bracts. Floral cup stalked or sessile, subtended by a bractlet, funnel-shaped, topped by 5 oblong to lanceolate sepals 2.5 - 5 mm long, with hairs inside sticking to stamens. Petals absent. Stamens 5, opposite sepals, filaments 1 mm long. Pistil 1, style 1. Fruit round, fleshy, containing one hard seed.

Notes:

The genus name *Comandra* comes from the Greek *come*, "hair", and *andros*, "man". The flowers of bastard toadflax actually have no petals. What appear to be petals are actually the sepals which normally support the petals. The sepals have hairs on the inside which stick to the stamens. The leaves and growth habit (but not the flowers) of bastard toadflax resemble toadflax (*Linaria vulgaris*), hence the designation bastard, meaning "imitation". Bastard toad flax blooms from early May through June between 4000 and 9000 ft.



New Mexico Native

