

# Common SE US Wetland Plant Families with Herbaceous Species



\*Caution-This is a limited species key  
NWPL

**Key terms for families:**

Alternate/Opposite/Whorled leaves  
Bell shaped flowers  
Capsule  
Floral cup  
Lobed or clawed petals  
Nut  
Pod  
Raceme (inflorescence)  
Sheathing leaves

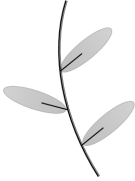
Banner and wings of flower  
Bilateral or Irregular flowers  
Compound head (inflorescence)  
Inferior/Superior ovary  
Long tubed flowers  
Panicle (inflorescence)  
Radial or Regular flowers  
Scorpion tail shaped inflorescence  
Spike (inflorescence)

1. Flower parts in 3's or multiples of 3, leaves parallel veined.
2. Flowers **bilateral**, lower petal lipped & bowl-like.....Orchidaceae
2. Flowers **radial** or nearly so but not with lipped bowl.
  3. Flower with many **carpels** (fruits) in the center (like a raspberry); leaves linear, elliptic to arrowhead shaped.....Alismataceae
  3. Flower with one **carpel** (fruit) in the center; leaves linear, long and narrow.
    4. Leaves mostly basal and flattened sideways, **ovary inferior**, 3 stamens. ....Iridaceae
    4. Leaves basal and on the stem and not flattened; **ovary superior**, 6 stamens. ....Liliaceae
1. Flower parts in 4's, 5's, or more, leaves net veined (reticulate).
5. Plants with square stems.
  6. Stems with stinging hairs (except Boehmeria, see lead 10).....Urticaceae
  6. Stems lacking stinging hairs.
    7. Flowers **radial**.
      8. Stamens 2 times as many as petals.....Lythraceae
      8. Stamens equal the number of petals.....Rubiaceae
    7. Flowers **bilateral**.
      9. Flowers obviously **bilateral**, mint odor; inflorescence solitary or terminal with aggregated into clusters in the axils of leaves.....Lamiaceae
      9. Flowers slightly **bilateral**, lacking mint odor; inflorescence with terminal clusters of tightly packed small flowers.....Verbenaceae
5. Stems round.
  10. Flowers and fruits in a series of beaded clusters in the axils of leaves. ....Utricaceae (Boehmeria)
  10. Flowers or fruits may be present in leaf axils but not as a series of beaded clusters.
    11. Plants with milky juices.
      12. Plants with modified flower, floral bracts petal like.....Euphorbiaceae
      12. Plant inflorescence a **compound head** (sunflower family) .....Tribe Ligulatea
    11. Plants lacking milky juices.
      13. Flower parts (sepals/petals) in 4's.
        14. Leaves **opposite** or **whorled** with translucent dots.....Clusiaceae
        14. Leaves **alternate** and lacking translucent dots.
          15. **Ovary inferior**, 4-8 stamens attached to petals.....Onagraceae
          15. **Ovary superior**, 2 or 6 stamens attached near the base of the ovary. ....Brassicaceae
      13. Flower parts (sepals/petals) in 5's or more.
        16. Leaves **opposite** or **whorled**.
          17. Stamens many, leaves with translucent dots.....Clusiaceae
          17. Stamens 10, leaves lacking translucent dots.....Caryophyllaceae
        16. Leaves **alternate**.
          18. Flowers **bilateral**.
            19. Flowers with a **banner** and **wings**, fruit a **pod**.....Fabaceae
            19. Flowers lacking banner and wings, fruit a **nut** or **capsule**. ....Scrophulariaceae

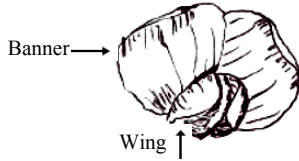
18. Flowers **radial** (or round composite heads).
20. Flowers of inflorescence in tight flowering clusters.
21. Compound flower head (sunflower type); leaves not sheathing the stem.  
.....Asteraceae
21. Tightly clustered flowers in inflorescence but not fully compound;  
leaves sheathing the stem (ocrea).....Polygonaceae
20. Flowers of inflorescence in **umbels** or single flowered.
22. Flowers in tight clusters.
23. Small flowers in **umbel** inflorescence, stamens 5, pistil 1, leaves sheathing the  
stems.....Apiaceae
23. Flowers generally larger, stamens and pistil 1 to many, leaves with **stipule**, not  
sheathing.....Rosaceae
22. Flowers either singular or loosely arranged but not in tight clusters.
24. Flowers with >10 stamens crowded in center of flower.
25. Leaves **opposite** or **whorled** with translucent dots.....Clusiaceae
25. Leaves **alternate** and lacking translucent dots.
26. **Floral cup** present, leaves with **stipules**.....Rosaceae
26. Floral cup lacking, leaves lacking stipules.....Ranunculaceae
24. Flowers with <10 stamens crowded in the center.
27. Petals fused.
28. Inflorescence is **scorpion tail shaped, corolla throat with small .  
appendages**.....Boraginaceae
28. Inflorescence a **spike, raceme, or panicle** but not scorpion shaped; corolla  
throat lacking appendages.
29. Flowers **urn** shaped, **anthers open by splitting**.....Ericaceae
29. Flower not urn shaped, anthers not opening by splitting.
30. Flowers **bell** shaped (campanulate).....Campanulaceae
30. Flowers not bell shaped.
31. Flowers **long tubed**, stigmas 3, stems leafy but not whorled at  
base.....Polemoniaceae
31. Corolla tube shorter but mostly reflexed, stigma 1, leafy whorled  
basal leaves.....Primulaceae
27. Petals not fused.
32. Stems swollen at nodes; stigmas 2-5, **petals lobed** or clawed.  
.....Caryophyllaceae
32. Stems not swollen, stigmas 2, petals not lobed or clawed.....Saxifragaceae

# Key Terms

## Alternate (Leaves)



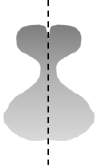
## Banner and Wings (Flower)



## Bell Shaped (Flowers)



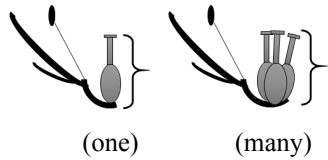
## Bilateral/Irregular (Flowers)



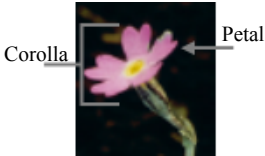
## Capsule

A dry fruit that releases seeds by splitting.

## Carpels



## Corolla



All the petals of the flower together. The petals as a whole compose the corolla.

## Corolla throat with small appendages

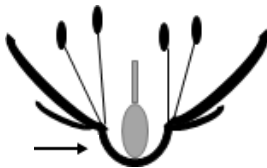


## Compound head (Inflorescence)



Many flowers in a compact inflorescence. Ex. Clover & Dandelion

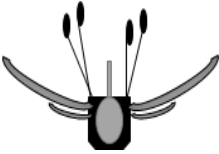
## Floral Cup



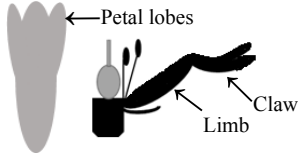
Sepals, petals, and stamens are fused together for some portion of the flower.



**Inferior ovary**



**Lobed or clawed petals**



**Long tubed flowers**



**Nut**



A dry fruit that encloses the seeds and does not split open to release the seed.

**Opposite leaves**



**Panicle (Inflorescence)**

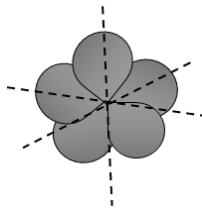


A branching cluster of flowers

**Pod**



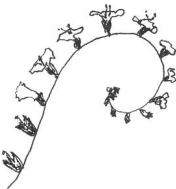
**Radial flower**



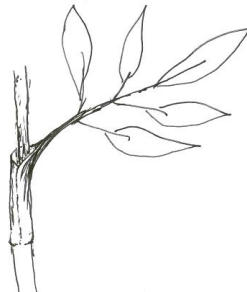
**Raceme (Inflorescence)**



**Scorpion tail shaped (Inflorescence)**



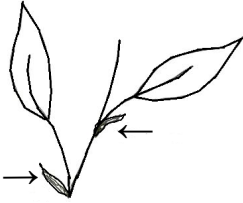
**Sheathing (Leaves)**



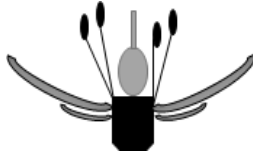
**Spike (Inflorescence)**



**Stipule**



**Superior ovary**



**Umbel (Inflorescence)**



**Urn Shaped (Flowers)**



**Whorled (Leaves)**



NOTE: Ratings shown for plant species are from the 2016 edition of the National Wetland Plant List for the Eastern Mountains and Piedmont (EMP) and Atlantic and Gulf Coastal Plain (AGCP) regions (url: [http://rsgisias.crrel.usace.army.mil/nwpl\\_static/index.html](http://rsgisias.crrel.usace.army.mil/nwpl_static/index.html)). If the rating differs between regions, both ratings are shown.

## Family Groups

**Flower Bilateral:** Fabaceae, Scrophulariaceae, Orchidaceae, Lamiaceae, Verbenaceae.

**Flower Parts in 3's; leaves with parallel veins:** Liliaceae, Iridaceae, Alismataceae,  
Orchidaceae (bilateral flowers).

**Parts in 4 or 5's; square stems:** Urticaceae, Lythraceae, Rubiaceae, Lamiaceae,  
Verbenaceae, Scrophulariaceae (split into  
Orobanchaceae & Plantaginaceae).

**Plants with milky juices:** Asclepiadaceae, Euphorbiaceae, Asteraceae Order Ligulatea.

**Opposite Leaves:** Asclepiadaceae, Clusiaceae, Caryophyllaceae.

**Flowering heads in a cluster:** Euphorbiaceae, Asclepiadaceae, Asteraceae, Polygonaceae.

**Stamens > 10:** Ranunculaceae, Rosaceae, Clusiaceae.

**Fused flowers:**

**Bell shaped:** Campanulaceae.

**Urn shaped:** Ericaceae.

**Long fused tube:** Polemoniaceae.

**Short and reflexed petal tube:** Primulaceae.

## **Alismataceae**

Arrowhead shaped leaves; flowers with many  
carpels at the center, like a raspberry

*Alisma subcordatum*

American Water-Plantain (OBL)



*Sagittaria latifolia*

Duck-Potato (OBL)



# Apiaceae

(the umbels or carrot family)

Inflorescence an umbel; often having highly lobed or dissected, sheathing leaves

*Chaerophyllum tainturieri*

Hairy-Fruit Chervil (AGCP: FAC; EMP: FACW)



*Daucus carota*

Queen Anne's-Lace (UPL)



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Available at: [https://en.wikipedia.org/wiki/Carrot#/media/File:Daucus\\_carota\\_May\\_2008-1\\_edit.jpg](https://en.wikipedia.org/wiki/Carrot#/media/File:Daucus_carota_May_2008-1_edit.jpg)

**Apiaceae**  
(the umbels or carrot family)

*Eryngium yuccifolium*  
Button Eryngo (FAC)



*Sanicula canadensis*  
Canadian Black-Snakeroot (AGCP: FACU & EMP: UPL)



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# Asclepiadaceae

Opposite leaves; milky sap

*Asclepias variegata*  
Red-Ring Milkweed (FACU)



*Gonolobus suberosus*  
Angular-Fruit Anglepod (FACW)





# Asteraceae

Aster or sunflower family  
Inflorescence a compound  
head

*Ambrosia artemisiifolia*  
Annual Ragweed (FACU)



*Elephantopus carolinianus*  
Carolina Elephant's-Foot (FACU)



*Erigeron strigosus*  
Prairie Fleabane  
(AGCP: FAC & EMP: FACU)



*Eupatorium serotinum*  
Late-Flowering Thoroughwort  
(FAC)





**Asteraceae**

Aster or sunflower family

*Helenium amarum*  
Yellowdicks (FACU)



*Rudbeckia hirta*  
Black-Eyed-Susan (FACU)



*Solidago altissima*  
Tall Goldenrod (FACU)



*Symphotrichum pilosum*  
White Oldfield American-Aster  
(AGCP: FACW & EMP: FAC)



# Boraginaceae

Scorpion shaped inflorescence with 4  
nutlets

*Heliotropium indicum*  
Indian Heliotrope (FAC)



*Myosotis verna*  
Spring Forget-Me-Not (ACGP: FACU & EMP: FAC)



# Brassicaceae

(Cruciferae or mustard family)

Has 6 stamens 4+2 in a cross shape (thus Cruciferae) and a fruit that splits along the sides either long (silique) or short (silicle)

*Capsella bursa-pastoris*  
Shepherd's-Purse (FACU)



*Cardamine hirsuta*  
Hairy Bittercress (FACU)



*Lepidium virginicum*  
Poorman's-Pepperwort  
(ACGP: UPL & EMP: FACU)



*Rorippa palustris*  
Bog Yellowcress (OBL)



# Campanulaceae

Often having bell shaped flowers;  
corolla fused with five lobes

*Lobelia cardinalis*  
Cardinal Flower (FACW)



*Triodanis perfoliata*  
Clasping-Leaf Venus'-Looking-Glass  
(AGCP: FACU & EMP: FAC)





# Caryophyllaceae

(Pink family)

Opposite leaves, spilt or fringed petals, mostly  
5-merous, stamens 5-10, pistil 1

*Arenaria serpyllifolia*

Thyme-Leaf Sandwort

(AGCP: UPL & EMP: FAC)



*Cerastium glomeratum*

Sticky Mouse-Ear Chickweed

(AGCP: FACU & EMP: UPL)



*Dianthus armeria*

Deptford Pink (UPL)



*Stellaria media*

Common Chickweed

(AGCP: FACU & EMP: UPL)



# Clusiaceae

Often with translucent glands on leaf;  
opposite leaves; stamens > 10

*Hypericum hypericoides*  
St. Andrew's-Cross (ACGP:  
FAC & EMP: FACU)



*Hypericum mutilum*  
Dwarf St. John's-Wort (FACW)



*Hypericum punctatum*  
Spotted St. John's-Wort (FAC)



# Ericaceae

(Heath family)

Plant woody, bell shaped fused petal, fruits  
or berry or drupe

*Vaccinium stamineum*  
Deerberry (FACU)



# Euphorbiaceae

Milky sap; modified  
flower

*Acalypha rhomboidea*

Common Three-Seed-Mercury  
(AGCP: FAC & EMP: FACU)



*Euphorbia maculata*

Spotted Sandmat (FACU)



*Phyllanthus caroliniensis*

Carolina Leaf-Flower (FAC)



# Fabaceae

(Pea family)

Irregular lowers with a banner and wings, fruit a pod

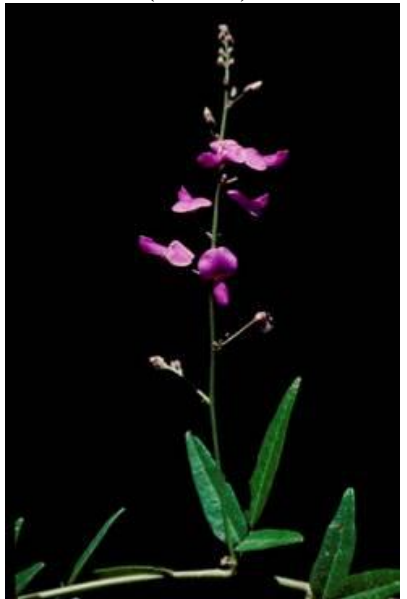
*Amorpha fruticosa*  
False Indigo-Bush (FACW)



*Chamaecrista fasciculata*  
Sleepingplant (FACU)



*Desmodium paniculatum*  
Panicked-Leaf Tick-Trefoil (FACU)



*Clitoria mariana*  
Atlantic Pigeonwings (FACU)





**Fabaceae**

(Pea family)

*Lespedeza cuneata*  
Chinese Bush-Clover (FACU)



*Trifolium repens*  
White Clover (FACU)



*Senna marilandica*  
Maryland Wild Sensitive-Plant (FAC)



# Iridaceae

Irregular showy flowers

*Iris virginica*  
Virginia Blueflag (OBL)



*Sisyrinchium angustifolium*  
Narrow-Leaf Blue-Eyed-Grass (FACW)



# Lamiaceae

(Mint family)

Square stems and opposite leaves; often  
with minty smell

*Lycopus virginicus*  
Virginia Water-Horehound  
(OBL)



*Pycnanthemum tenuifolium*  
Narrow-Leaf Mountain-Mint  
(FACW)



*Trichostema  
dichotomum*  
Forked Bluecurls  
(UPL)



*Scutellaria integrifolia*  
Helmet-Flower  
(ACGP:FAC &  
EMP:FACW)



*Teucrium canadense*  
American Germander  
(FACW)



# Liliaceae

(Lily family)

Part's in 3's, mostly regular flowers, monocots

*Allium canadense*  
Meadow Garlic (FACU)



*Uvularia perfoliata*  
Perfoliate Bellwort (FACU)



*Polygonatum biflorum*  
King Solomon's-Seal (FACU)





# Lythraceae

Flower parts in 4's or 6's; well developed floral cup;  
twice as many stamens as petals; ovary typically  
superior

*Ammannia coccinea*  
Valley Redstem (OBL)



*Cuphea viscosissima*  
Blue Waxweed (FAC)



*Lythrum alatum*  
Wing-Angle Loosestrife  
(ACGP: OBL & EMP:FACW)



*Rotala ramosior*  
Lowland Toothcup (OBL)



# Onagraceae

(Evening primrose family)

parts in 4's with a corolla tube sitting on top  
of the ovary

*Circaea canadensis*  
Broad-Leaf  
Enchanter's-Nightshade  
(FACU)



*Oenothera biennis*  
Kings-Cureall (FACU)



*Ludwigia palustris*  
Marsh Primrose-Willow (OBL)



# Orchidaceae

(Orchid family)

A monocot with beautifully shaped irregular flowers

*Spiranthes vernalis*

Spring Ladies' Tresses

(AGCP: FACW & EMP:FAC)



*Tipularia discolor*

Crippled-Cranefly (FACU)



# Polemoniaceae

Flower parts in 5, fused corolla tube, ovary superior

*Phlox divaricate*

Wild Blue Phlox (FACU)



# Polygonaceae

Parts appearing 6 with ocreae

*Persicaria punctata*  
Dotted Smartweed (OBL)



*Rumex crispus*  
Curly Dock (FAC)



*Polygonum aviculare*  
Yard Knotweed (AGCP:FAC & EMP:FACU)





# Primulaceae

Petals united at base, stamens  
opposite corolla lobes

*Lysimachia ciliata*

Fringed Yellow-Loosestrife  
(FACW)



*Samolus parviflorus*

Seaside Brookweed (OBL)



# Ranunculaceae

(Buttercup family)

Numerous stamens and carpels

*Anemone virginiana*

Tall Thimbleweed  
(FACU)



*Thalictrum*

*thalictroides*  
Rue-Anemone  
(FACU)



*Ranunculus*

*abortivus*  
Kidney-Leaf  
Buttercup (FACW)



# Rosaceae

(Rose family)

Petals in 5's, flowers mostly white, pink or rose; fleshy fruits; plants mostly thorny; regular flowers with many stamens

*Geum canadense*

White Avens

(AGCP:FAC & EMP:FACU)



*Potentilla simplex*

Oldfield Cinquefoil (FACU)



*Rosa carolina*

Carolina Rose (FACU)



*Rubus flagellaris*

Whiplash Dewberry

(AGCP: UPL & EMP:FACU)



# Rubiaceae

(Coffee family)

Petals fused; corolla tube with 4 or  
5 parts

*Diodia teres*

Poorjoe (AGCP:FACU & EMP:UPL)



*Galium tinctorium*

Stiff Marsh Bedstraw (AGCP:FACW & EMP:OBL)



*Mitchella repens*

Partridge-Berry



# Saxifragaceae

(Saxifrage family)

Basal leaves, mostly 5-merous, “styles or pistils 2”

*Heuchera americana*

American Alumroot (FACU)



*Micranthes virginiensis*

Early Pseudosaxifrage (FAC)



# Scrophulariaceae

(Snapdragon family)

Irregular flowers;  
generally alternate leaves and round stems

*Agalinis tenuifolia*

Slender-Leaf False Foxglove  
(ACGP:FACU & EMP:FAC)



*Gratiola virginiana*

Round-Fruit  
Hedge-Hyssop (OBL)



*Lindernia dubia*

Yellow-Seed False Pimpernel  
(OBL)



*Mimulus alatus*

Sharp-Wing Monkey-Flower  
(OBL)





**Scrophulariaceae**  
(Snapdragon family)

*Pedicularis canadensis*  
Canadian Lousewort (FACU)



*Verbascum thapsus*  
Great Mullein (FACU)



*Veronica arvensis*  
Corn Speedwell (UPL)



# Urticaceae

Stinging hairs

*Boehmeria cylindrica*

Small-Spike False Nettle (FACW)



*Pilea pumila*

Canadian Clearweed (FACW)



*Laportea canadensis*

Canadian Wood-Nettle (AGCP:FACW & EMP:FAC)



# Verbenaceae

Opposite leaves; square stems; lack mint odor;  
inflorescence of terminal or axillary tightly clustered  
small flowers

*Callicarpa americana*

American Beauty-Berry (FACU)



*Verbena urticifolia*

White Vervain (FAC)



*Phryma leptostachya*

American Lopseed (FACU)

