

HERBARIUM RECORDS: 1834—Cols., *J. Paddock Collection* (ILL); 1840—Cols., *Sullivant*; May 1891—Big Darby, *Werner*; 21 Apr 1935—Franklin Co., *Strohmeier*; 27 Apr 1969—88 E. Chittenden Ave., old fence row between two parking lots, approx. ½ blk. E of the OSU Law Bldg., Cols., *W. Wentz 064*.

NOTE: *Sullivant* 1840:6 (*Meconopsis diphylla* DC.) and *Selby & Craig* 1890:7 reported on plants collected in adjacent counties.

4. CHELIDONIUM L. Celandine

Leaves glaucous beneath, pinnatifid, alternate; flowers pediceled, several in peduncled umbels; sepals 2; petals 4, yellow, about 1 cm long; stamens many; carpels 2; capsule linear-cylindric.

1. **Chelidonium majus* L.

Celandine

Naturalized (Eurasian)

Herb with saffron-colored juice; leaves glaucous beneath, pinnatifid, alternate; flowers pediceled, approx. 1.5-2.0 cm wide, several in peduncled umbels; sepals 2; petals 4, yellow; stamens many; carpels 2; capsule linear-cylindric.

REFERENCES: Riddell 1834:116 (naturalized); *Selby & Craig* 1890:7 (introduced).

HERBARIUM RECORDS: 1890—Central College, *Selby*; May 1890—Central College, *Selby*; 28 May 1896—Cols., *W. Kellerman*; 12 May 1977—OSU, South Campus, waste area along alley, Cols., *W. Carr*; 13 Jul 1982—Highbanks Metro Park (Franklin & Delaware Cos.), floodplain, *G. Moore 221*; 31 May 1986—Highbanks Metro Park (Delaware Co.), floodplain, river trail, *Morawetz*; 12 May 1988—Worthington, bike path ½ mi. N of Rt. 161, 1 mi. W of Rt. 23, abundant, *M. Hoffman 62*; 3 May 1991—E bank of the Scioto R., just W of Rt. 257 & N of Rt. 161, along limestone cliffs, Perry Twp., *Lowden 4600*.

5. PAPAVER L. Poppy

Sepals 2; petals usually 4; stamens many; carpels 4 to many; stigmas in a sessile crown with rays as many as carpels; capsule many-seeded, dehiscent near the top with slits or pores.

1. **Papaver rhoeas* L.

Corn Poppy

Cultivated to Adventive (native of Eurasia and N Africa)

Cauline leaves pinnatifid, not clasping; blade segments lanceolate, incised and toothed; flowers bright orange-red, drying purple; capsule subglobose.

HERBARIUM RECORD: 23 May 1989—Overbrook Drive Ravine, just E of N. High St. & S of E. Cooke Rd., Cols., Clinton Twp., *Lowden 4084*.

FUMARIACEAE, Fumitory Family

Herbs; leaves alternate or all basal, usually decompound or dissected; flowers hypogynous, bisporangiate, bracted, in racemes; sepals 2, sometimes early deciduous, minute; petals 4, one or both of the 2 outer ones spurred, the 2 inner narrow below, wider and somewhat connivent above; stamens 6, in 2 sets of 3 each, in each set filaments united, anther of middle one 2-loculed, of the outer ones 1-loculed; carpels 2, style 1, ovary 1-loculed; placentae 2, parietal.

a Corolla isobilateral; both outer petals spurred or saccate at base; plant not climbing; leaves all basal; racemes scapose. 1. DICENTRA

a' Corolla zygomorphic; only 1 outer petal spurred.

b Sepals not toothed; ovary and capsule elongate; seeds several. 2. CORYDALIS

b' Sepals toothed; ovary and indehiscent fruit subglobose; seed 1. 3. FUMARIA

1. DICENTRA Bernh. Bleeding-heart

Delicate, somewhat fleshy, herbs; leaves dissected, all basal in our species; corolla about 2 cm long, white or tinged with pink; capsule linear.

a Spurs of corolla long, divergent, tapering to base; underground stems white or pink granulate bulbs.

1. *D. cucullaria*

a' Spurs of corolla short, rounded; flowers fragrant; underground stems yellow pea-shaped tubers. 2. *D. canadensis*

1. *Dicentra cucullaria* (L.) Bernh.

Dutchman's-breeches

Herbs with underground white or pink granulate bulbs; leaves delicate, dissected, all basal; racemes scapose; corolla isobilateral with long divergent tapering spurs.

REFERENCES: Riddell 1834:117 (*Diclytra cucullaria* DC., dense & shady woods); Sullivant 1840:6 (*Dielytra cucullaria* DC.); Craig 1890:65 (common in moist shady places along the river and in the woods, 7 Apr 1882, 14 Apr 1883, 16 Apr 1884, 25 Apr 1885, 15 Apr 1886, 13 Apr 1887, 10 Apr 1888, 11 Apr 1889); Selby & Craig 1890:7.

HERBARIUM RECORDS: 1840—Cols., Sullivant; 19 Apr 1882—Olentangy R., *W. Green*; 10 May 1888—Neil's Run, Selby; Spring 1889—Cols., Craig; May 1890—Cols., Selby; 11 Apr 1892—Cols., Bogue; May 1892—near Cols., E. M. Wilcox; 15 Apr 1899—Blendon, Helfrich; [ca. 1925]—Westerville, moist beech upland, Camp; 14 Apr 1963—Cols., both sides of Olentangy R. N of Lane Ave., Cusick; 9 Apr 1967—W facing slope of ravine W side of cemetery, approx. 3/4 mi. W of Darbydale, Pleasant Twp., Stuckey 3413; 14 Apr 1967—E bank of Scioto R., approx. 1/4 mi. S of Dublin, common on broken limestone rocky slope, Perry Twp., Stuckey 3419; 19 Apr 1970—Scioto R. 1/2 mi. S of Dublin, E side along River Rd., abundant on floodplain and hillside, Roberts 144; 26 Apr 1970—Clintonville, abundant along stream in Whetstone Park, W. Owen 094; 2 Apr 1977—Rt. 315 N of Plesenton Dr. (N of Rt. 161 & Rt. 315 jct.), steep wooded roadside, Tyrrell 10; 23 Apr 1982—Blendon Woods, fairly common along connecting trails, Owens; 6 May 1982—Highbanks Metro Park (Franklin & Delaware Cos.), G. Moore 220; 29 Apr 1984—Glick Rd., 0.7 mi. W of Rt. 745, Cols., Valdebenito 10; 5 Apr 1986—Highbanks Metro Park (Delaware Co.), mound bottom & forest near Olentangy R., Witsberger 878 (OS, OWU); 10 Apr 1988—Highbanks Metro Park (Delaware Co.), between Rt. 23 & Olentangy R., M. Hoffman 9; 16 Apr 1988—3 mi. N of Rt. 161 & Rt. 33, floodplain near stream, Kelly 1; 20 Apr 1988—3/5 mi. N of Henderson Rd., bike path, W bank of Olentangy R., Chinery 10; 6 Apr 1989—E of Rt. 315 between Antrim Lake & Olentangy R., damp woods, Sutherland 1; 8 May 1989—Overbrook Drive Ravine, E of N. High St. & S of E. Cooke Rd., woods, Cols., Clinton Twp., Lowden 4022; 9 Apr 1991—Antrim Lake, floodplain woods between W bank of Olentangy R. & E side of lake, E of Rt. 315 & N of Bethel Rd., Sharon Twp., Lowden 4575; 18 Apr 1991—Overbrook Dr. between High St. & Canyon Dr., Cols., Gara 4; 12 Apr 1992—Whetstone Park, W of N. High St., woods, Clinton Twp., Condit.

2. *Dicentra canadensis* (Goldie) Walp.

Squirrel-corn

Herbs with underground yellow pea-shaped tubers; leaves delicate, all basal; racemes scapose; corolla isobilateral with short rounded spurs.

REFERENCES: Riddell 1834:117 (*Diclytra canadensis* DC., dense & shady woods); Sullivant 1840:6 (*Dielytra canadensis* DC.); Craig 1890:65 (occurs in the same localities as *Dicentra cucullaria* but is not so common, 10 Apr 1882, 19 Apr 1883, 19 Apr 1884, 29 Apr 1885, 13 Apr 1887, 13 Apr 1889); Selby & Craig 1890:7.

HERBARIUM RECORDS: 22 Apr 1882—Olentangy R., Devol; May 1890—Olentangy R., Cols., Selby (WOOS); May 1890—Cols., Selby; 23 Apr 1892—Cols., Werner; 26 Apr 1894—Cols., W. Kellerman; 1 May 1924—Westerville, rich woods, cemetery, R. Musselman; 8 May 1924—near Westerville, Hell's Half Acre, Hatton; [ca. 1925]—Westerville, moist beech upland, Camp; 4 May 1968—E bank of Alum Creek, S side of Rt. 161 at YWCA Camp, approx. 0.5 mi. E of Worthington, common, Stuckey 6416; 30 Apr 1969—E side of the Scioto R., approx. 1/4 mi. S of Dublin, rare on lower portion of slope & floodplain, Stuckey 8051; 26 Apr 1970—Clintonville, abundant along stream in Whetstone Park, W. Owen 100; 6 May 1982—Highbanks Metro Park (Franklin & Delaware Cos.), G. Moore 218 & 219; 18 Apr 1986—Highbanks Metro Park (Delaware Co.), woods, Watts 280 (OS, OWU); 11 Apr 1991—Antrim Park, floodplain woods, between W bank of Olentangy R. & E side of lake, E of Rt. 315 & N of Bethel Rd., Sharon Twp., Lowden 4584; 16 Apr 1992—Whetstone Park of Roses, S of shelter house just N of Adena Run, Clintonville, Clinton Twp., Condit.

2. CORYDALIS Vent. Corydalis

Stems leafy; leaves decompose; flowers zygomorphic; capsule many-seeded; seeds with crests or arils.

1. *Corydalis flavula* (Raf.) DC.

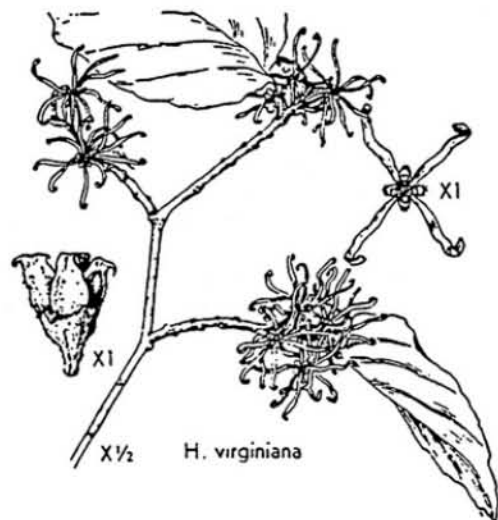
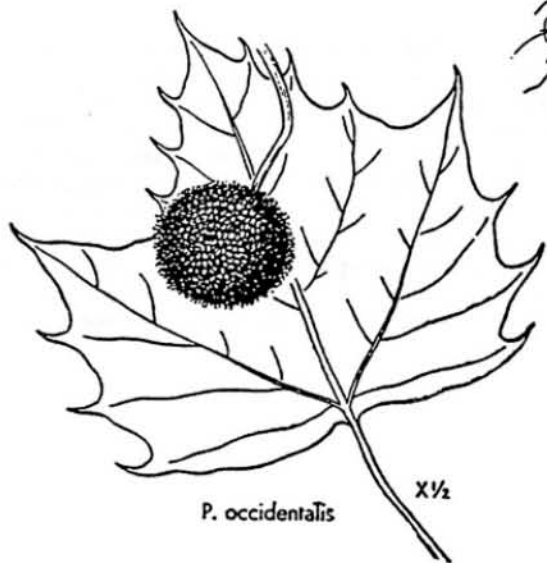
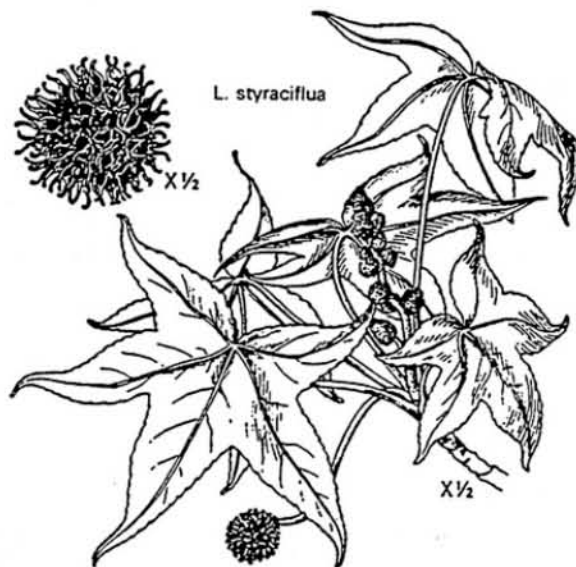
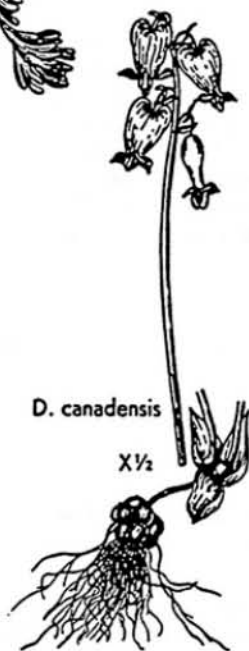
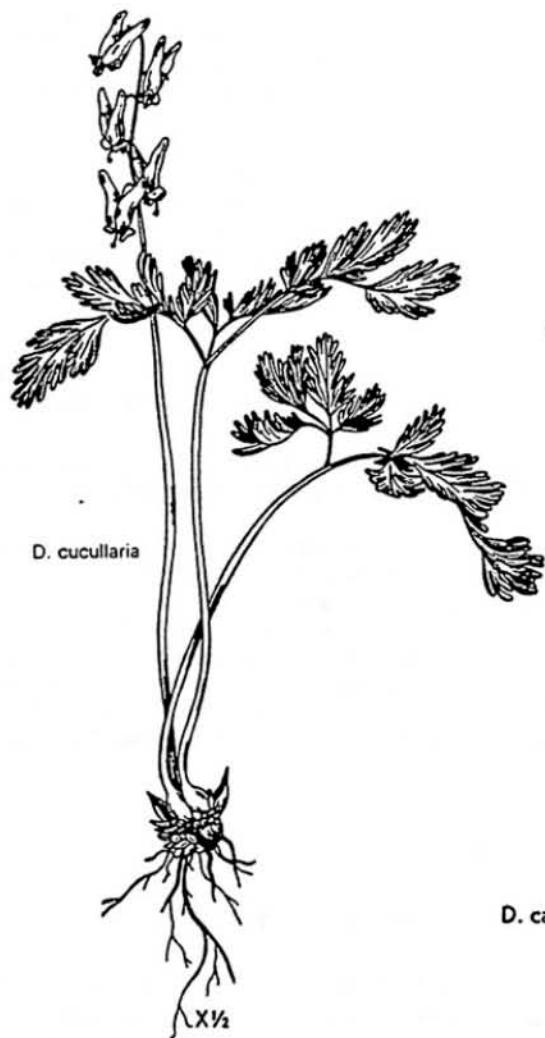
Pale Corydalis, Short-spurred Corydalis

Stems diffuse, plants erect or becoming prostrate, green or glaucous; leaves decompose; sepals 2, minute, not toothed; outer petals with toothed crest on back; corolla zygomorphic, 6-9 mm long, pale yellow; capsule elongate, several seeded. Syn.: †*C. aurea* Willd., misapplied

REFERENCES: Riddell 1834:117 (*Corydalis aurea*, bottomland); Sullivant 1840:6 (*Corydalis aurea* Willd.); Craig 1890:65 (*Corydalis aurea* Willd., abundant on the island in the cornfield S of the dike, it seems to grow best in cultivated fields, 7 Apr 1882, 5 May 1883, 23 Apr 1884, 29 Apr 1885, 11 Apr 1887, 7 Apr 1888); Selby & Craig 1890:7 (#43 *Corydalis aurea* Willd. & #44 *Corydalis flavula* DC.); Kellerman & Werner 1893:225 (the plants of the given localities and all the herbarium specimens labeled *Corydalis aurea*, are *Corydalis flavula* DC.); Roberts & Cooperrider 1982:76. HERBARIUM RECORDS: 1840—Cols., Sullivant; 13 Apr 1882—Olentangy R., *W. Green*; May 1888—Cols., Craig; 1889—Cols., Craig; May 1889—Wyandot Grove, Selby; 1890—Wyandot Grove, near Cols., Selby; Apr 1890—Cols., Selby; Apr 1890—near Sellsville, Cols., Selby; 25 Apr 1891—Sellville Swamp, Cols., Selby (WOOS); Jun 1891—Cols., Werner (CLM); 11 Apr 1892—Scioto R., Bogue; May 1892—S of Sellsville, near Cols., E. M. Wilcox; May 1892—near Cols. & Cols., E. M. Wilcox; May 1893—near Cols., E. M. Wilcox; May 1893—Cols., Selby; 20 May 1893—Cols., W. Kellerman; 21 Apr 1919—Halyjden's Fall, Scioto R., mesophytic forest, E. & S. Raymond; 25 Apr 1925—Big Walnut Creek, Westerville, moist wooded bank, Camp; 22 Apr 1982—Highbanks Metro Park (Franklin & Delaware Cos.), uncommon, G. Moore 217; 22 Apr 1987—Highbanks Metro Park (Delaware Co.), floodplain woods, Morawetz; 9 Apr 1991—Antrim Lake, floodplain woods, between W bank of Olentangy R. & E side of lake, E of Rt. 315 & N of Bethel Rd., Sharon Twp., Lowden 4573.

3. FUMARIA L. Fumitory

DICENTRA
CORYDALIS
FUMARIA
PLATANUS
LIQUIDAMBAR
HAMAMELIS



Stem diffusely branched; leaves decompose; flowers zygomorphic; sepals somewhat toothed; petals pink- or red-purple with darker tips; fruit 1-seeded, globose, 2-3 mm wide, indehiscent.

1. *Fumaria officinalis* L.

Fumitory

Adventive (native of Europe)

Stems diffusely branched; leaves decompose; flowers zygomorphic; sepals 2, minute, somewhat toothed; petals pink or red-purple, darker at tips; fruit globose, 2-3 mm wide, 1-seeded.

HERBARIUM RECORD: 1837—Cols., *J. Paddock Collection*, I. G. Jones (ILL).

PLATANACEAE, Plane-Tree Family

1. PLATANUS L. Plane Tree

Large trees with peeling bark; leaves alternate, simple, palmately veined and lobed; stipules foliaceous, encircling twig; flowers monosporangiate, the 2 kinds in separate spherical heads on same tree; staminate flower with small calyx, 3-7 stamens, and minute petals, filaments short or none, a fleshy cap at top of anthers; carpellate flower hypogynous, calyx small, petals present or absent, staminodes present, carpels several, separate; fruit an aggregate of achenes.

a Exposed inner bark white; fruiting heads usually solitary. 1. *P. occidentalis*

a' Exposed inner bark greenish or yellowish; fruiting heads 1-3 per peduncle; often planted. 2. *P. × hybrida*

1. *Platanus occidentalis* L.

Sycamore, Button-wood

Large tree, bark peeling, exposed inner bark white; fruiting heads usually solitary; fruit an aggregate of achenes. REFERENCES: Riddell 1834:119 (bottomland); Sullivant 1840:23; Craig 1890:101 (very common on the campus and along the river; some attain a large size, one being 130 feet high and 18 feet in circumference four feet above the ground); Selby & Craig 1890:15; Braun 1961:159 (illus. p. 160).

HERBARIUM RECORDS: 1897—OSU Campus, *Ruppersberg*; 11 May 1901—Marble Cliff, *Mead*; 10 Sep 1901—Cols., *Tyler & Jennings*; 4 Oct 1901—Cols., OSU Campus, *Hartford*; 11 Jun 1937—Hayden Falls, *J. H. Schaffner*; 3 Oct 1965—W bank Olentangy R., ½ mi. S of Henderson Rd. on Rt. 315, *Anderson* (KE); [ca. 1982]—Blendon Woods, common, *Owens*; 30 Aug 1982—Highbanks Metro Park (Franklin & Delaware Cos.), floodplain, *Brauning* 228; 6 May 1984—OSU Campus, *Kattler* 35; 16 Apr 1986—OSU, close to Biological Science Bldg., Cols., *Cooperband* 33; 21 Jul 1986—Highbanks Metro Parks (Franklin Co.), floodplain, *Kosko*; 14 Jun 1989—OSU Campus, behind B&Z bldg., 1735 Neil Ave., Cols., *Lowden* 4189.

2. *Platanus × hybrida* Brot.

London Planetree

Cultivated along streets; planted on the OSU Campus (Trees OSU)

Exposed inner bark greenish or yellowish, fruiting heads 1-3 per peduncle, and the leaves often more truncate or broadly cuneate at the base. Syn.: *P. × acerifolia* (a fertile putative hybrid of *P. occidentalis* and the Old World *P. orientalis* L.)

HERBARIUM RECORDS: 24 Apr 1986—OSU Campus, Millikin Rd., E of Larkins Hall, Cols., *Hollander* 016; 29 Apr 1988—OSU campus, W of B&Z Bldg., N of greenhouse, *M. Hoffman* 37.

NOTE: See Braun 1961:159.

HAMAMELIDACEAE, Witch Hazel Family

Trees and shrubs with alternate simple leaves; flowers monosporangiate or bisporangiate; perianth regular, of 4 sepals and 4 petals, or none; stamens 4-many; carpels 2, united, styles 2, ovary 2-loculed, partly inferior.

a Leaves palmately veined, palmately lobed; petals none; flowers in dense globular clusters. 1. LIQUIDAMBAR

a' Leaves pinnately veined, margins repand; petals 4, yellow, linear; flowers in small axillary clusters.

2. HAMAMELIS

1. LIQUIDAMBAR L. Sweet or Red Gum