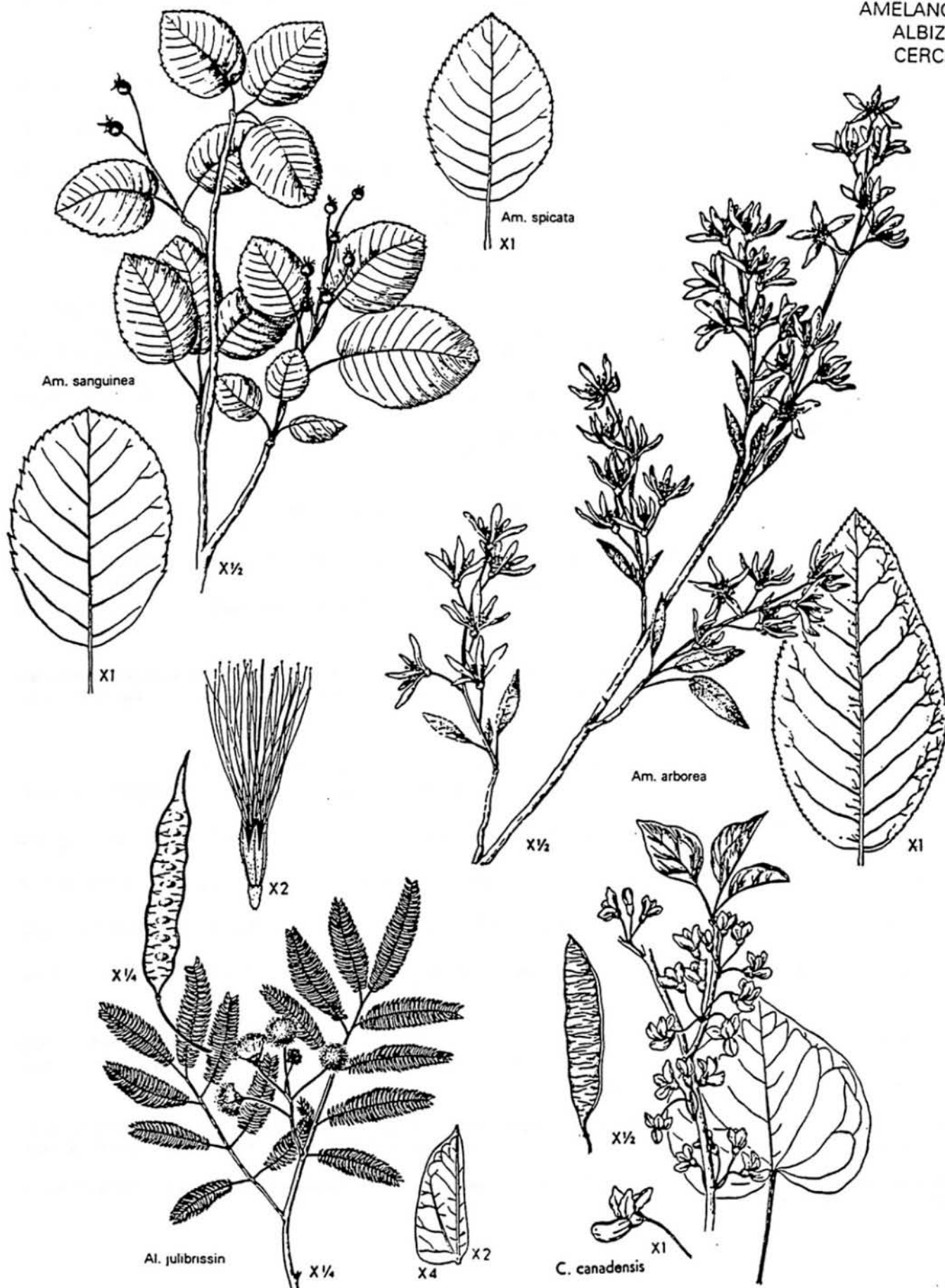


AMELANCHIER
ALBIZIA.
CERCIS



2. *Amelanchier arborea* (F.Michx.) Fernald

Downy Serviceberry, Juneberry, Shadbush

Tall erect shrub or slender tree; leaves oblong-ovate, much less than half-grown at anthesis, densely pubescent beneath when young, not coppery; summit of the ovary glabrous. Syn.: *A. canadensis* Torr. & A.Gray, *A. canadensis* var. *botryapium* (L.f.) Torr. & A.Gray

REFERENCES: Riddell 1834:118 (*Aronia botryapium*); Sullivant 1840:18 (*Amelanchier botryapium* Lindl.); Craig 1890:79 (there is but one specimen on the grounds, a small tree standing on the campus N of the botanical bldg., 14 Apr 1882, 28 Apr 1883, 30 Apr 1884, 24 Apr 1885, 19 Apr 1886, 25 Apr 1887, 27 Apr 1888); Selby & Craig 1890:9; Kellerman & Werner 1893:227; Werner 1893:93 (Georgesville 1891, Selby); Braun 1961:170 (illus. pp. 168 & 171).

HERBARIUM RECORDS: 22 Apr & 6 May 1899—Franklin Co., Fullmer; 3 May 1911—2½ mi. E of Westerville, open woods, Hanawalt; 25 Apr 1925—Big Walnut Creek, Westerville, wooded hillsides, Camp; 15 Jun 1925—Flint, R. Crane (OWU); 8 Apr 1967—OSU, Drackett Tower, cult., Cols., Stuckey & Cooke; 22 Apr 1982—Highbanks Metro Park (Franklin & Delaware Cos.), bluff face, G. Moore 268 & 269; 13 Jul 1982—Highbanks Metro Park (Franklin & Delaware Cos.), bluff face, Brauning 267; 26 Aug 1982 (sterile)—Highbanks Metro Park (Franklin & Delaware Cos.), bluff face, G. Moore 270; 5 Apr 1986—Highbanks Metro Park (Delaware Co.), tops of bluffs & ravines E of Olentangy R., Witsberger; 17 Jun 1986 (sterile)—Highbanks Metro Park, woods, Kosko; 17 Apr 1988—OSU Campus, planted N side of Howlett Hall, Gerberick 8; 20 Apr 1992—Camp May Orton (Godman Guild), N of Worthington, W of Rt. 23, Sharon Twp., Lowden 4918.

The following hybrid is recognized:

Amelanchier arborea* × *Amelanchier laevis

Leaves at anthesis lesser pubescent, with a prominent coppery-red cast.

HERBARIUM RECORDS: 18 Apr 1991—Hoover Dam Park, woods W of entrance off Cubbage Rd., Blendon Twp., Lowden 4589; 19 Apr 1992—Overbrook Drive Ravine, between N. High St. & E. Cooke Rd., Clinton Twp., Lowden 4914.

NOTE: See Braun 1961:172.

MIMOSACEAE, Mimosa Family

Tree or shrub; flowers in peduncled heads; corolla regular; leaves bipinnate; filaments conspicuous, distinct or connate below, colored and exserted. (Leguminosae-Mimosoideae)

1. *ALBIZIA* Durazz.

Calyx 5-toothed; corolla funnelform, deeply 5-lobed; stamens numerous, long-exserted, filaments connate below.

1. **Albizia julibrissin* Durazz.

"Mimosa," Silk-tree

Cultivated (native of tropical Asia)

Tree to 10 m high; leaves twice pinnately compound; pinnae numerous, in pairs; flowers pink, in long-peduncled lobular heads, calyx 2-3 mm long; petals approx. 7 mm long; fruits a broad flat legume.

HERBARIUM RECORD: 6 Jul 1967—OSU, courtyard behind Math. Hall, cult., Cols., Cooke.

NOTE: See Braun 1961:223.

CAESALPINIACEAE, Caesalpinia Family

Trees and herbs; stems with or without thorns; leaves alternate, pinnate or bipinnate compound, seldom simple; flowers in small clusters, racemes or panicles, perfect or sometimes unisexual; corolla regular, petals united or separate; or corolla somewhat zygomorphic, petals separate below, odd petal enclosed by the others in bud, not papilionaceous. (Leguminosae-Caesalpinioideae)

a Trees.

b Leaves simple, ovate-cordate, entire; flowers bisporangiate, pink- or red-purple, in small clusters along branches of previous years. **1. CERCIS**

b' Leaves compound, even-pinnate; petals greenish-yellow or -white; flowers monosporangiate or some bisporangiate, in racemes or panicles.

c Flowers in slender racemes; hypanthium cup-shaped; early leaves pinnate, later ones bipinnate; with or without thorns. **2. GLEDITSIA**

c' Flowers in panicles; hypanthium tubular; leaflets (except 2-4 basal ones) again compound; thorns absent.

3. GYMNOCLADUS

a' Herbs.

- d Leaflets 2 cm long or less, somewhat sensitive to touch; anthers all perfect but unequal; stipules persistent; petiole-gland saucer-shaped. 4. **CHAMAECRISTA**
d' Leaflets usually 3 cm long or more, not sensitive to touch; 3 upper anthers imperfect; stipules deciduous; petiole-gland stalked or sessile. 5. **SENNA**

1. CERCIS L.

Small tree; leaves simple, entire, ovate-cordate, palmately veined, 2-ranked; flowers pink-purple, zygomorphic, in small clusters along branches of preceding years, appearing before leaves of the season; calyx 5-toothed; petals 5, uppermost smallest, in bud enfolded by the lateral ones; fruit flat, 6-10 cm long, several-seeded.

Cercis chinensis-alba has been planted on the OSU Campus (Art Bldg., courtyard).

1. *Cercis canadensis* L.

Redbud

Tree, small; leaves simple, palmately veined, ovate-cordate, entire, obtuse to shortly acuminate; flowers appearing before the leaves, pink or red-purple, in small clusters along branches; calyx 5-toothed; petals 5, uppermost smallest, in bud enfolded by the lateral ones; fruit flat, several seeded.

REFERENCES: Riddell 1834:118; Sullivant 1840:19 (Judas tree); Craig 1890:76 (very rare, occurs on the campus E of the college bldg. and along the river, 30 Apr 1882, 11 May 1883, 12 May 1884, 12 May 1885, 20 Apr 1886, 24 Apr 1887, 5 May 1888, 20 Apr 1889); Selby & Craig 1890:9; Braun 1961:225 (illus. p. 226).

HERBARIUM RECORDS: Apr 1888—Cols., Craig; 1897—OSU Campus, Ruppertsberg 43; 20 Jun 1901—Marble Cliff, Mead; 19 May 1974—OSU Botany Garden, Cols., D. Johnson; 27 Apr 1986—along the Scioto R., approx. 40 m N of the intersection of Rt. 33 with Henderson Rd., Cols., Taylor-Lehman 39; 10 May (flowers) & 29 May (leaves) 1986—OSU Campus, S side of Mirror Lake off Neil Ave., Yang 125; 20 Apr 1988—SW corner of Antrim Lake, Chinery 06; 20 Apr 1988—OSU campus, just W of Agriculture Admin. Bldg., Gerberick 12; 29 Apr 1988—Worthington, between Short St. & South St., just W of Rt. 23, M. Hoffman 38; 8 May 1989—Overbrook Drive Ravine, between N. High St. & E. Cooke Rd., Cols., Clinton Twp., Lowden 4003.

2. GLEDITSIA L.

Tree with branched supra-axillary thorns; leaves pinnately compound or the later ones partly or wholly decomposed, often crowded on short branchlets, leaflets obscurely serrate; buds superposed, at least the lower at each node beneath base of petiole; flowers monosporangiate or rarely bisporangiate, in spikelike racemes; sepals and petals 3-5; stamens 3-10, separate; fruit large, with sweet pulp between the many seeds. Some cultivated forms thornless.

The cultivated Thornless Honey-locust, *Gleditsia triacanthos* L. var. *inermis* Willd. is commonly planted as an ornamental (Chadwick Arboretum).

1. *Gleditsia triacanthos* L.

Honey-locust

Native and Cultivated

Tree, with or without thorns; leaves even-pinnate, often crowded on short branchlets; early leaves pinnate, later ones bipinnate; flowers monosporangiate or rarely bisporangiate, in slender spikelike racemes; hypanthium cup-shaped; sepals and petals 3-5; stamens 3-10, separate; fruit large, pulpy, many seeded.

REFERENCES: Riddell 1834:118 (bottomland); Sullivant 1840:19; Craig 1890:77 (in the woods and along the river, there is a large one on Neil Ave. N of the large dormitory, 10 Jun 1882, 7 Jun 1884, 30 May 1887, 10 Jun 1888); Selby & Craig 1890:9; Braun 1961:225 (illus. p. 226).

HERBARIUM RECORDS: 10 Jun 1882—Cols., Devol; Jun 1888—Cols., Craig; 189—Olentangy R., coll. ?; 21 Jun 1892—near Cols., E. M. Wilcox; 31 May 1902—High St. [Cols.], Skidmore; 3 Oct 1965—W bank of Olentangy R., ½ mi. S of Henderson Rd. on Rt. 315, Anderson 2004 (KE); [ca. 1982]—Blendon Woods, Owens; 14 Jun 1989—OSU Campus, walkway between B&Z Bldg. and Biological Science Bldg., Cols., Lowden 4160.

3. GYMNOCLADUS Lam. Kentucky Coffee Tree

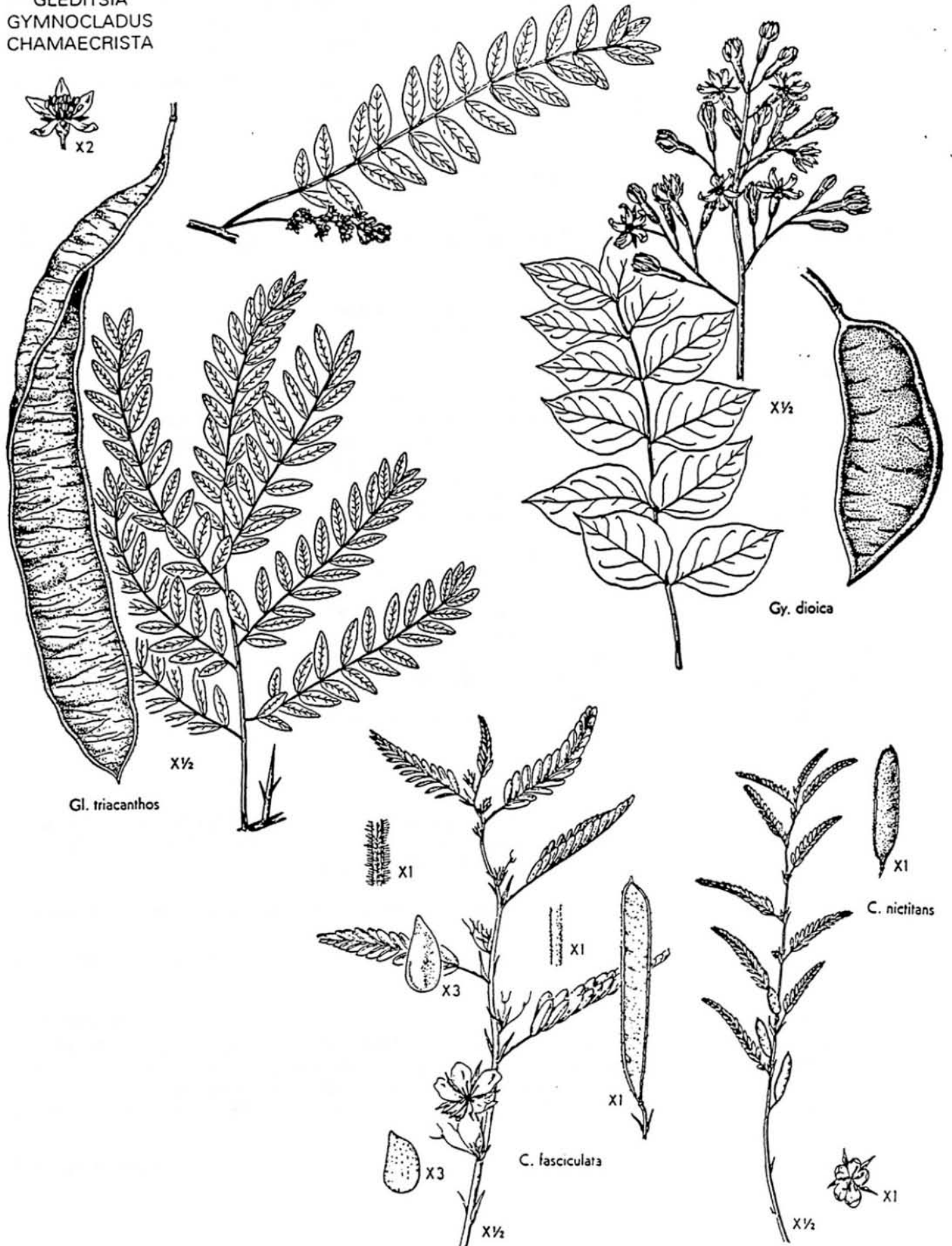
Tree with stout branchlets; leaves large, compound, upper leaflets again compound; leaflets ovate; axillary buds superposed, sunken; pith large, pinkish-brown; imperfectly dioecious; flowers monosporangiate, each with vestiges of the other sporophylls, in terminal panicles; hypanthium tubular; corolla regular, greenish-white; stamens 10, separate; fruit large and woody, pulpy between the few large seeds.

1. *Gymnocladus dioica* (L.) K.Koch

Kentucky Coffee-tree

Native and Cultivated

GLEDITSIA
 GYMNOCLADUS
 CHAMAECRISTA



Tree, imperfectly dioecious, branches stout, thorns absent; axillary buds superposed, sunken; pith pinkish-brown; leaves large; leaflets (except 2-4 basal ones) again compound; flowers monosporangiate, in panicles; hypanthium tubular; corolla regular, greenish-white, stamens 10, separate; fruits large, woody; seeds few, large.

REFERENCES: Riddell 1834:118 (*Gymnocladus canadensis*); Sullivant 1840:19 (*Gymnocladus canadensis* Lam.); Selby & Craig 1890:9 (*Gymnocladus canadensis* Lam.); Braun 1961:223 (illus. p. 224).

HERBARIUM RECORDS: 20 May 1894—Cols., E. M. Wilcox; 15 May 1896—Cols., W. Kellerman; 1897—OSU Campus, Ruppertsberg 6; 7 Jun 1904—Cols., Sockman; 11 Feb 1938—1 mi. SW of Dublin, Frantz; 25 May 1980—OSU Campus, Neil Ave., cult., H. Liu 2250; [ca. 1982]—Blendon Woods, Owens; 14 Jun 1989—OSU campus, Neil Ave., front S side of Campbell Hall, Cols., Lowden 4198.

4. CHAMAECRISTA (L.) Moench

Herbs; leaves even-pinnate, leaflets oblong, entire; corolla nearly regular or zygomorphic; petals yellow; stamens 5 or 10, separate, all with anthers; anthers basifixed, longer than the short filaments, opening by 2 apical pores; fruit compressed, not segmented. (Often incl. in *Cassia* L.)

a Stamens 10; calyx about 1 cm long; petals 1-2 cm long. 1. *C. fasciculata*

a' Stamens 5; calyx 3-4 mm long; petals 4-8 mm long. 2. *C. nictitans*

1. *Chamaecrista fasciculata* (Michx.) Greene

Partridge-pea, Locust-weed

Herb; leaves even-pinnate, somewhat sensitive to touch; petiolar gland saucer-shaped, nearly sessile or stalked; petals 1-2 cm long, subequal, yellow, sometimes marked with red at base; stamens 10, separate, unequal, normal; longest anther approx. 8 mm; pods linear-oblong, 3-6 cm, flat, straight. Syn.: *Cassia chamaecrista* L.

REFERENCES: Riddell 1834:118 (dry prairies); Sullivant 1840:19 (Prairie Senna); Selby & Craig 1890:9.

HERBARIUM RECORDS: 14 Aug 1839—Duncan's Plains, J. Paddock Collection (ILL); 1840—Cols., Sullivant; Summer 1889—Cols., Weed; 8 Aug 1890—Central College, Selby; 14 Sep 1890—Central College, Selby (OS, WOOS); 10 Oct 1891—Georgesville, Werner (CLM); 15 Jul 1892—Franklin Co., Bogue; Aug 1892—Georgesville, Werner (CLM); 9 Aug 1982—Hoover Reservoir, 0.1 mi. W of Cubbage Rd., & 0.5-0.6 mi. N of jct. of Central College Rd., frequent in openings in brushy fields, Blendon Twp., New Albany Quad., Cusick 21921; 1 Aug 1990—Hoover Dam Park, just W of entrance off Cubbage Rd., open bushy area just S of Walnut St., Blendon Twp., Lowden 4481; 3 Sep 1992—W side of Cubbage Rd., ½ mi. S of Walnut St., occasional in dry openings in brushy field, Blendon Twp., New Albany Quad., McCormac 4894.

2. *Chamaecrista nictitans* (L.) Moench

Wild Sensitive Plant, False Sensitive Plant

Herb; leaves even-pinnate; leaflets less than 2 cm long, somewhat sensitive to touch; petiolar gland saucer-shaped, short-stalked; petals unequal, longest reaching 4-5 mm long; stamens 5, separate, unequal, normal; anthers about 3 mm long; pods oblong, straight, flat, 2-4 cm long. Syn.: *Cassia nictitans* L.

REFERENCES: Sullivant 1840:19; Selby & Craig 1890:9.

HERBARIUM RECORDS: 31 Jul 1932—Red Hills, Hicks; 14 Aug 1932—Red Hills, Chapman.

5. SENNA Mill.

Herbs, leaves even-pinnate; corolla nearly regular or zygomorphic; sepals 5; petals 5, often unequal; stamens mostly 10, unequal, the lowest ones fully developed, upper ones reduced without normal anthers; anthers basifixed, at least half as long as the filaments; fruit often septate. (Often incl. in *Cassia* L.)

a Ovary densely villous; fruit sparsely villous, segments as long as wide; petiole-gland club-shaped, stalked.

1. *S. hebecarpa*

a' Ovary appressed-pubescent; fruit glabrous or glabrate, segments wider than long; petiole-gland sessile.

2. *S. marilandica*

1. *Senna hebecarpa* (Fernald) Irwin & Barneby

Northern Wild Senna

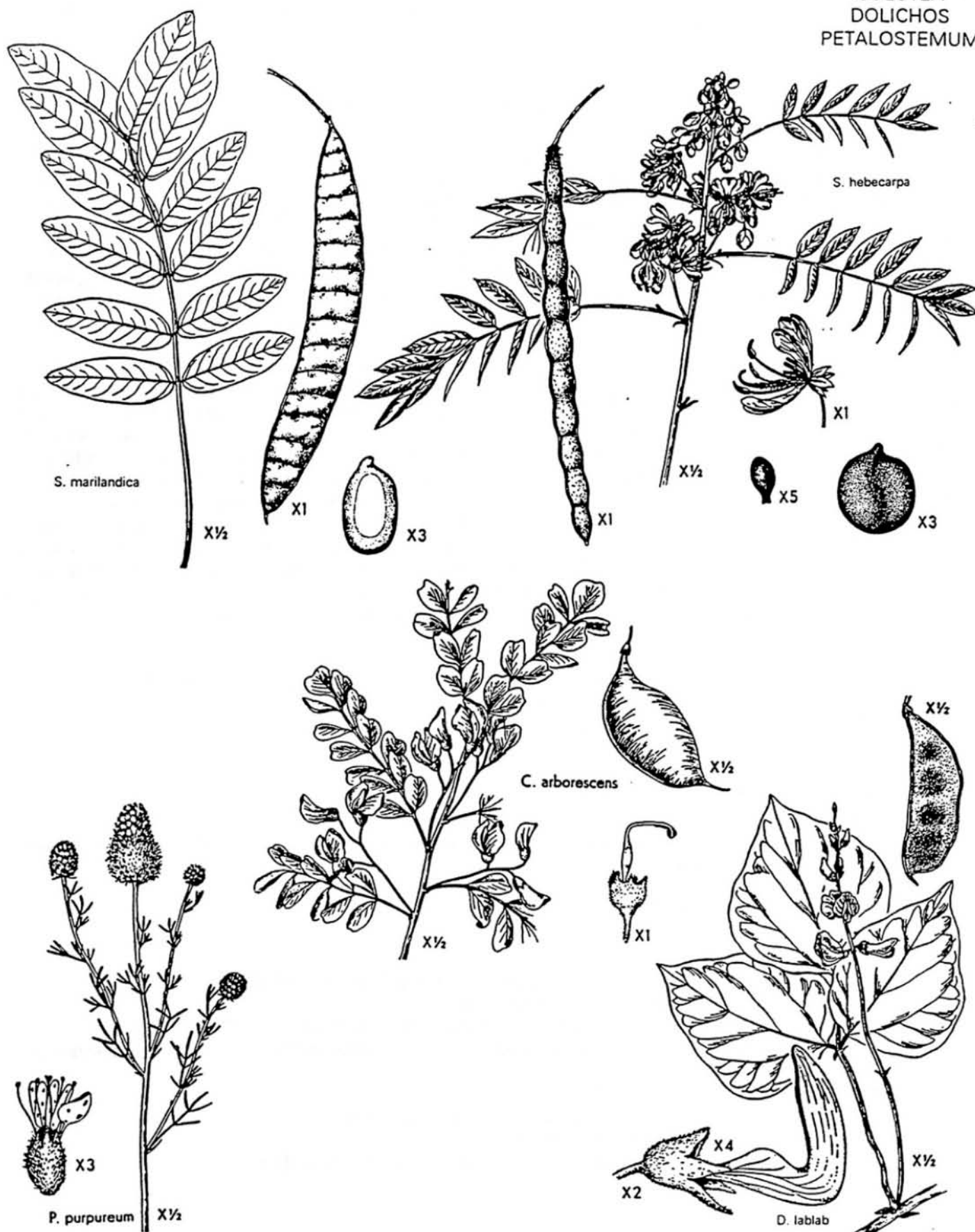
Herb, erect; leaves pinnately compound; leaflets commonly 6-10 pairs, oblong or elliptic, longer than 3 cm, not sensitive to touch; petiolar gland clavate to obovoid, stalked; stamens 10, unlike, the 3 upper without normal anthers; ovary densely villous; fruits flat, sparsely villous, segments nearly square. Syn.: *Cassia hebecarpa* Fernald

HERBARIUM RECORDS: 1840—Cols., Sullivant; 20 Jul 1890—Island Scioto R., Cols., Selby; 11 Aug 1890—Westerville, E. V. Wilcox; Aug 1892—Cols., Werner (CLM); [ca. 1982]—Blendon Woods, Owens.

2. *Senna marilandica* (L.) Link

Southern Wild Senna

SENNA
COLUTEA
DOLICHOS
PETALOSTEMUM



Herb, erect; leaves pinnately compound; leaflets commonly 4-8 pairs, oblong or elliptic, longer than 3 cm, not sensitive to touch; petiolar gland short-cylindric, rounded or dome-shaped; ovary appressed-pubescent; fruits flat, glabrous, segments wider than long. Syn.: *Cassia marilandica* L.

REFERENCES: Riddell 1834:118; Sullivant 1840:19 (Wild Senna); Craig 1890:77 (American Senna; *Ernest Evans* found this last August in the clover meadow near the river, but I have been unable to find it this spring, 2 Aug 1882); Selby & Craig 1890:9.

HERBARIUM RECORD: 3 Aug 1882—S of Cols., *W. Green*.

FABACEAE, Pea or Bean Family

Herbs and woody plants; leaves alternate, with pulvini, usually stipuled, usually compound; flowers bisporangiate, rarely solitary; inflorescence various, a spike, raceme, panicle, head or umbel; calyx of 5 (rarely fewer) united sepals, the teeth or lobes sometimes fewer than five; petals 5 (rarely 1 or none); corolla zygomorphic and papilionaceous, petals separate below, odd petal (standard) outside in bud, enclosing the 2 lateral petals (wings) and the 2 inner somewhat connivent petals (keel); stamens 5-many, rarely fewer than 5, usually 10, separate, monadelphous, or diadelphous, sometimes alternately long and short; carpel 1, ovary 1-loculed or rarely 2-loculed; placenta 1, parietal; fruit a legume, sometimes indehiscent, sometimes divided crosswise into 1-seeded segments (loment). (Papilionaceae=Leguminosae-Papilionoideae)

Planted or cultivated species not included in the key below are: *Colutea arborescens* L. (Bladder Senna), reported by Craig 1890:53 (University Farm Sep & Oct 1887), a shrub having odd-pinnate leaves; leaflets 7-13, oval to obovate; racemes axillary; flowers yellow, marked with red; stamens 10; pods inflated, bladdery, ovoid or fusiform (16 Jun 1882—University Campus, *Devol*; 6 Jul 1883—University Campus, *Devol*; Jul 1888—Cols., *Craig*). *Dolichos lablab* L. (Hyacinth Bean, Egyptian Bean), having twining stems; leaflets broadly rhombic-ovate; flowers purple or white; calyx lobes 4 by fusion of the upper 2; pods approx. 5 cm long (27 Sep 1900—Cols., *J. H. Schaffner*). *Glycine max* (L.) Merr. (Soybean), with stems erect, brown-hairy, bushy with some shoots vine-like; leaves 3-foliolate; leaflets ovate, entire, obtuse or short acute; flowers white or purple; pod brown hairy, hanging on short stalk; seeds 2-4, globose, brown, yellow or black (25 Sep 1913—Cols., *J. H. Schaffner*). *Petalostemum purpureum* (Vent.) Rydb. (22 Oct 1904—a waif on the OSU Campus, *J. H. Schaffner*; 5 Jul 1932—OSU Bot. Gardens, cult., *Hicks*). *Pisum sativum* L. (Garden Pea; May 1909—Franklin Co., cult., *A. Crane*; 6 Jun [yr.?]—Westerville, *Zinn*). *Sophora japonica* L. (30 Jul 1974—OSU Campus, near Mershon Auditorium parking lot on 17th Ave., tree to approx. 30 feet tall, *Roberts 4404*).

a Trees and shrubs.

b Petal 1, the standard, dark-purple; leaves pinnately compound, gland-dotted. 17. **AMORPHA**

b' Petals more than 1; petals white or pink; leaves odd-pinnate.

c Flowers in racemes; stamens diadelphous. 6. **ROBINIA**

c' Flowers in elongate panicles; stamens separate. 1. **CLADRASTIS**

a' Herbs, sometimes twining, and woody vines.

d Leaves with terminal tendrils.

e Style filiform, terete, hairy all around at tip. 13. **VICIA**

e' Style flattened, hairy on side toward free stamen; usually leaflets longitudinally veined or stipules conspicuous. 14. **LATHYRUS**

d' Leaves without tendrils.

f Leaves simple. 3. **CROTALARIA**

f' Leaves 3-foliolate. (See f'')

g Leaflets serrulate.

h Flowers in long slender racemes; petals white or yellow. 11. **MELILOTUS**

h' Flowers in heads, short spikes, or short racemes.

i Fruits curved or coiled; petals not united with stamen-tube. 12. **MEDICAGO**

i' Fruits not curved or coiled; keel and lateral petals somewhat united with stamen-tube.

10. **TRIFOLIUM**

g' Leaflets entire or rarely lobed.

j Stamens separate; flowers showy, in racemes. 2. **BAPTISIA**

j' Stamens monadelphous or diadelphous.

k Petals yellow or orange; flowers in headlike umbels. 8. **LOTUS**