GLOSSARY

acaulescent Without an aerial leaf-bearing stem. accrescent Continuing to enlarge after the usual time. achene A dry indehiscent fruit with thin pericarp fitting closely around the single seed. actinomorphic Regular; radially symmetrical; descriptive of a flower or set of flower-parts which can be cut through the center into equal and similar parts along 2 or more planes. acuminate Long-tapering to a pointed apex or base. acute Sharp-pointed. adnate United; said of unlike structures, as stamen and petal. adventive Introduced but not naturalized, or only locally established. aggregate fruit A ripened gynoecium of separate carpels. alternate Describing the arrangement of leaves or other structures which occur singly at successive nodes or levels; not opposite or whorled. alveolate Like a honeycomb. ament A slender, usually flexible, often pendent, spike or raceme of monosporangiate apetalous flowers. anastomosing Connected forming a network. androecium The set of stamens of a flower. angiosperm A member of a group of plants (Magnoliophyta) characterized by having the ovules enclosed in an ovary. annual Living through but one growing season; yearly. anther The upper part of the stamen, containing microsporangia and, later, pollen sacs. anthesis The period during which flowers are open. apetalous Without petals. appressed Closely pressed against, as a bud against a stem. aquatic Living in water. arachnoid Cobwebby. arcuate Curved in form of a bow; arching. areolate With areoles. areole A small marked off space, as one formed by anastomosing veins. aril A fleshy appendage of some seeds from the region of the hilum, partially or wholly covering the seed. aristate Tipped by a bristle or awn. articulate Jointed; consisting of segments united at joints. ascending Growing obliquely upward. attenuate Long-tapering, becoming very narrow. auricle An earlike lobe or appendage. auricled, auriculate Having an auricle or auricles. awl-shaped Tapering from a narrow base to a point. awn A slender bristlelike structure; in grasses, usually a continuation of a nerve of the lemma, the glumes, or rarely the palea. axil Angle formed by one structure with another, as a leaf with a stem. axile In the axis; descriptive of placentae at center of an ovary. axillary In the axil. barbellate Minutely barbed; said of pappus bristles that have short hairs attached along the side. bearded Bearing long or stiff hairs. berry A fruit with fleshy pericarp. biennial Living through two growing seasons. bifid Two-cleft. bipinnate Twice pinnately compound. bipinnatifid Twice pinnatifid. bisporangiate (flower). Having both stamens and carpels. blade The expanded, more or less flat, portion of a leaf, petal, sepal, etc.; the portion of a leaf above the petiole or the sheath.

Manual of the Vascular Plants of Franklin County Richard M. Lowden (1997)

bract A leaf unlike ordinary foliage leaves, usually smaller or of different shape, usually found as part of the inflorescence, subtending a flower or a flower-cluster. bractlet Secondary bract. branchlet An ultimate branch; in woody plants, the stem segment formed during the latest growing season. bulb Bud, often subterranean, with fleshy scales. bundle-scar Vein-scar. caducous Falling very early. callosity More or less protuberant thickening. callus Hardened downward extension of the lemma in grasses. calyx The set of separate or united sepals of a flower. campanulate Bell-shaped. canescent With fine close gray or white pubescence; hoary. capillary Hairlike. capitate Like a head; in a head. capsule Dry dehiscent fruit of 2 or more carpels. carpel Megasporophyll of seed plants; the ovule-bearing structure. carpellate Having only carpels or carpellate flowers. cartilaginous Tough and hard but elastic. caruncle An appendage at the hilum of a seed. catkin Ament. caudate Tailed; tail-like. caulescent Having an obvious stem above ground. cauline Of the stem. chaff Bracts on the receptacle of plants in the Aster Family. chartaceous Having texture of paper. cilia Marginal hairs. ciliate Having cilia. circumscissile Dehiscent crosswise, the top coming off as a lid. clasping (leaf) With its base partly or wholly surrounding the stem. clavate Club-shaped. claw Narrow or stalk-like base of a petal or similar structure. cleft See lobed. cleistogamous Descriptive of a flower the perianth of which remains unopened. coalescent United; said of parts or structures of the same kind. coma Tuft of hairs. comate, comose With a coma. conduplicate Folded lengthwise. cone A determinate axis bearing sporophylls in regular arrangement. confluent Merging, indistinguishable as individuals. connate United; said of like structures, as stamen and stamen. connate-perfoliate Said of opposite sessile leaves with bases united around the stem and appearing as a single blade pierced by the stem. connective The portion of an anther between the pollen sacs. connivent Not united but with margins meeting. cordate Heart-shaped. coriaceous Leathery. corm A solid fleshy upright underground stem. corolla The set of separate or united petals of a flower. corona A crownlike outgrowth from a corolla or an androecium. corymb A convex or flat-topped inflorescence, the outer flowers opening first; like a raceme except that the lower pedicels are longer than the upper. corymbiform In the form of a corymb, but not necessarily a true corymb.

crenate With rounded teeth or scallops.

crenulate Finely crenate. cucullate Hooded or hood-shaped. culm The stem of grasses; sometimes, also, the stem of sedges. cultigen A kind of plant that has originated in cultivation. cuneate Wedge-shaped. cuspidate With a stiff sharp point. cyathium Inflorescence in Euphorbia; see description of that genus. cyme A convex or flat-topped determinate inflorescence, the central flower opening first. deciduous Abscising; descriptive of a plant whose leaves all abscise at end of one growing season. decompound More than once compound. decumbent Lying on the ground, the apex ascending. decurrent Said of one organ extending along the edge of another, as of a leaf blade extending as a wing along the stem. deflexed Bent or turned abruptly downward. dehiscence Process or method of splitting open at maturity of a structure such as a fruit or a pollen sac. dehiscent Splitting open, usually in some regular way. deltoid With shape of an equilateral triangle. dentate With rather coarse teeth projecting at right angle to margin. denticulate Finely dentate. diadelphous (stamens) United in 2 groups. diaphragmed (pith) With transverse partitions or plates. dichotomous Two-forked. dioecious Descriptive of a species having only monosporangiate flowers, the staminate and carpellate flowers on separate plants. diffuse Spreading loosely. digitate (leaf) Compound with leaflets arising at one point (top of petiole). dimorphic Of two forms. disc, disk See hypogynous disc. discoid See description of Aster Family. dissected Divided into narrow segments. distal Away from the center or point of attachment. divaricate Greatly divergent. divergent Spreading; separated. divided See lobed. downy With short fine soft hairs. drupe An indehiscent fruit with outer portion of pericarp fleshy and inner portion of pericarp stony. dwarf branch A short leaf-bearing branch of pine and other conifers. echinate With prickles, the prickles often short and thick. ellipse A surface longer than wide, rounded similarly at both ends, widest at middle. ellipsoid A solid the longitudinal section of which is an ellipse. elliptic, elliptical In form of an ellipse. emarginate Shallowly notched at apex. emersed Above water. entire (margin) Unbroken by indentations. ephemeral Persisting for a short time, as a day or less. epigynous (flower) In which the sepals, petals, and stamens are borne above the gynoecium. epigynous disc, disk See hypogynous disc. epiphyte A plant growing attached to another plant but not parasitic on it. erose (margin) Appearing as if gnawed. even pinnate With an even number of leaflets. evergreen With green leaves throughout the year. excurrent Extending beyond the margin. exfoliating Peeling off.

exserted Protruding; extending beyond surrounding parts, as stamens extending beyond corolla.

falcate Scythe-shaped; with curved axis. fascicle A cluster or bundle. fertile Bearing seeds, spores, or gametes. fibrillose Containing fibers or disintegrating into fibers. filament Stalklike part of a stamen. filiform Narrow, threadlike. fimbriate Fringed. fimbrillate Minutely fringed. flexuous Wavy or more or less zigzag. floret Of grasses, consisting of lemma, palea, and flower-parts. flower A determinate sporophyll-bearing stem-tip. foliaceous Leaflike. follicle A dry fruit developing from a single carpel, dehiscing along one suture. fruit A ripened gynoecium and such parts as ripen with it; sometimes a ripened flower-cluster (multiple fruit). funnelform With shape of a funnel. fusiform Spindle-shaped; thickest at middle, tapering toward each end. galeate With a hood-shaped or helmet-shaped part. gibbous Enlarged on one side. glabrate Becoming glabrous with age; nearly glabrous. glabrous Without hairs. gland A secreting structure; a body with appearance of a gland. glaucous Covered with a whitish powdery or waxy substance that can be rubbed off. globose Sphere-shaped. glomerule A small compact cluster. glumaceous Resembling or having glumes. glume One of the 2 bracts at base of spikelet of grasses. glutinous Sticky or gummy. grain One-seeded fruit with ovule-coat adnate to pericarp; caryopsis. granular, granulate, granulose Covered with small grains or meal. gynoecium The set of carpels of a flower. habitat Place where a plant grows. halberd-shaped Hastate. hastate With shape of an arrow-head but with basal lobes divergent. head A dense globular cluster of sessile or nearly sessile flowers. hilum Scar on a seed where stalk was attached. hirsute Having coarse, rather stiff, hairs. hispid Having bristly hairs. hispidulous Minutely hispid. hoary Canescent. hyaline Thin and translucent or transparent. hypanthium As used in this manual, a cup-like, saucerlike, or tubular structure on which the sepals, petals, and stamens are borne, the structure growing from the receptacle below the gynoecium (hypanthium then hypogynous, flower perigynous); also a similar structure above the gynoecium of an epigynous flower (hypanthium epigynous). Since origin of the structure is usually not superficially apparent, this term has been chosen arbitrarily and used throughout; in some instances its technical accuracy may be questioned. hypogynous (flower) Having calyx, corolla, and androecium below the gynoeciun.

hypogynous disc or disk A fleshy cushionlike structure growing from the receptacle below the gynoecium and above the attachment of the calyx (flower hypogynous); a similar structure within the hypanthium (disk then perigynous) or upon the gynoecium of an epigynous flower (disk then epigynous).

Manual of the Vascular Plants of Franklin County Richard M. Lowden (1997) The Ohio State University Herbarium Columbus, Ohio

imbricate, imbricated Overlapping as do shingles on a roof. incised Cut sharply and irregularly. included Not projecting beyond surrounding parts. indehiscent Not opening. indusium The covering of the sorus in ferns. inequilateral With unequal sides. inferior Arising below other flower-parts; descriptive of ovary of an epigynous flower. inflexed Turned inward. inflorescence Flower-cluster. inserted Attached. internode Portion of stem between 2 successive nodes. involucral Of an involucre. involucrate With an involucre. involucre A set or circle of bracts below a flower or a flower-cluster. irregular Not regular. isobilateral Can be cut through the center into halves along 2 planes at right angle to each other, but the halves made by one plane unlike those made by the other. keel Projecting ridge; the two lower petals of a papilionaceous corolla.

laciniate Cut into narrow pointed segments.

lanceolate Lance-shaped; widest above base, tapering to apex, several times as long as wide.

leaflet One of the divisions of the blade of a compound leaf.

legume A dry fruit of one carpel dehiscent along suture and midrib.

lemma In grasses, the lower (outer) of the 2 bracts enclosing a flower.

lenticular Lens-shaped; biconvex.

ligulate With or resembling a ligule; (corolla), see description of Aster Family.

ligule A small flap or appendage; specifically, the appendage at junction of blade and sheath in grasses.

limb Expanded part of a sympetalous corolla distal to the tube.

linear Long and narrow, the sides parallel or nearly so.

lobed Separated by indentations (sinuses) into segments (lobes) longer than teeth. Strictly, relative depth of indentations (and length of segments) is indicated by the succession of terms, lobed, cleft, parted, divided, as follows: lobed, indented less than halfway to base or midvein; cleft, about halfway; parted, more than halfway; divided, most of the way. Loosely, lobed is used to mean any of these degrees of division.

locule Cavity of an ovary or anther.

loment A legume divided by transverse constrictions into 1-seeded segments that separate at maturity.

lyrate Pinnatifid, the terminal lobe largest.

marcescent Withered but persistent.

margined (petiole, rachis) With a strip of blade along each side.

membranous, membranaceous Thin and pliable.

-merous Suffix meaning in number of parts.

midrib Midvein.

monadelphous (stamens) United in one group.

monoecious Descriptive of a species having staminate and carpellate flowers on same plant.

moniliform Constricted at regular intervals; like a string of beads.

monosporangiate Descriptive of a flower having either stamens or carpels but not both.

mucronate With a sharp abrupt point.

multiple fruit Formed by ripening of a flower-cluster.

muricate With sharp points or prickles.

native Occurring naturally in an area; indigenous, not alien. naturalized Thoroughly established, but originally coming from another area. nerve Prominent vein of a leaf or flower-part. neuter, neutral (flower) With neither stamens nor carpels. node Short zone of stem at level where leaf or leaves are borne. nodulose Having little knobs. nut A hard indehiscent 1-seeded fruit.

ob- Prefix meaning in an opposite direction; thus obovate is inversely ovate. oblique With unequal sides; not at right angle to; slanting. oblong Longer than wide, the sides nearly or quite parallel and the ends rounded. obtuse Blunt. ocrea A tubular sheath around the stem formed by a pair of united stipules. ocreola Small ocrea in the inflorescence of plants in the Smartweed Family. odd pinnate (leaf) With an odd number of leaflets. opposite Two at a node or at same level of an axis or rachis. orbicular Circular. oval Broadly elliptic. ovary Lowest part of a closed carpel or set of united carpels, in which ovules are borne. ovate Having the shape of a median longitudinal section through an egg with widest portion below the middle. ovoid Egg-shaped, the widest portion below the middle. ovule Megasporangium in spermatophytes; forerunner of a seed. palate A projection on lower lip of a 2-lipped sympetalous corolla partially or wholly closing the throat. palea The bract subtending the flower of grasses. pales See chaff. palmately compound With leaflets all arising at apex of petiole. palmately veined With principal veins diverging from top of petiole. panicle A compound elongate inflorescence. paniculate Like a panicle; in a panicle. paniculiform With the form or appearance of a panicle but not necessarily a true panicle. papilionaceous (flower) See description of Pea or Bean Family. papillate, papillose With minute rounded projections. pappus The bristles, hairs, awns, or teeth at top of an achene, as in plants of the Aster Family. parietal (placenta) On the inner surface of wall of ovary. parted See lobed. pectinate Pinnatifid, with divisions narrow, resembling teeth of a comb. pedicel Stalk of a flower in a flower-cluster. peduncle Stalk of a solitary flower or of a flower-cluster. pellucid Transparent. peltate Attached by some part of the surface instead of by the margin. pepo A fruit with hard or leathery rind, as a melon or gourd. perennial Living through more than two growing seasons. perfect (flower) Bisporangiate. perfoliate (leaf) With base surrounding the stem and appearing as if pierced by the stem. perianth Calyx and corolla together or one of them, if only one is present. pericarp Wall of the fruit. perigynium A sac enclosing the ovary of a flower of Carex. perigynous (flower) Having sepals, petals, and stamens borne on a hypanthium which is free from the ovary. perigynous disc, disk See hypogynous disc. petal One member of the set of flower-parts between stamens and sepals. petaloid Like a petal or petals. petiole Stalk of a leaf. petiolule Stalk of a leaflet. phyllary One of the bracts making up the involucre subtending the head of flowers in the Aster Family. pilose With long soft hairs.

pinna A primary division of a pinnately compound leaf.

pinnate (leaf) Compound with leaflets along the rachis. pinnately compound Pinnate. pinnately veined With one main vein, the midvein, from which principal lateral veins branch. pinnatifid Pinnately cleft. pinnule A division of a pinna. placenta Ridge or surface within the ovary on which ovules are borne. placentation Type of arrangement of ovules within the ovary. plaited Having folds. plumose Like a plume or feather. pollinium A mass of coherent pollen. pome A fruit consisting of ripened ovary plus hypanthium adnate to ovary. prickle A sharp pointed outgrowth from epidermis or cortex of stem. procumbent Prostrate, not rooting at nodes. prophyll One of the bracts subtending the flower in some species of Juncus. pubescent Hairy. pulvinus An enlarged base or apex of petiole or petiolule, as in the Pea or Bean Family. punctate Dotted. pyxis A capsule with crosswise dehiscence, the top coming off as a lid. raceme Elongate inflorescence with each flower on a pedicel. racemiform With form or appearance of a raceme, but not necessarily a true raceme. racemose In a raceme; like a raceme. rachilla Branch of a rachis; axis of the spikelet of grasses. rachis Axis of a pinnately compound leaf; sometimes used, also, to mean the axis of an inflorescence. radiate (head) Having both disk and ray flowers. ray A pedicel of an umbel; a ray flower of the Aster Family. ray flower See description of Asteraceae Family. receptacle Apex of a flower-stalk on which the flower-parts are borne. reflexed Bent backward. regular (flower, corolla, calyx) Radially symmetrical; actinomorphic. reniform Kidney-shaped. repand With wavy margin. repent Prostrate on the ground. reticulate Forming a network. revolute Rolled backward or under. rhizome An underground stem. rosette A cluster of radiating leaves usually near or at ground level, separated by very short internodes. rotate (corolla or calyx of united petals or sepals) Wheel-shaped, flat, the tube very short or absent. rudimentary Vestigial. rugose With wrinkled surface. runcinate Pinnatifid with segments turned backward. saccate Sack-shaped. sagittate With shape of an arrow-head. salverform (corolla or calyx of united petals or sepals) With limb spreading abruptly at right angle to the slender tube. samara An indehiscent winged fruit. scabrous Rough. scape A leafless or nearly leafless stem bearing a flower or a flower-cluster. scapose Borne on a scape; with a scape. scarious Transparent or translucent, thin, dry, not green. scurfy Covered with scalelike particles. secund Twisted or turned to one side. seed A ripened ovule. sepal One member of the outermost set of flower-parts.

Manual of the Vascular Plants of Franklin County Richard M. Lowden (1997)

septate Divided by partitions. serrate Toothed, the teeth pointing forward, toward the apex. serrulate Finely serrate. sessile Without a stalk. setaceous Bristlelike. silicle, silique See description of Mustard Family. sinus Indentation between lobes or teeth. sorus A cluster of sporangia in ferns. spadix 'A fleshy spikelike inflorescence. spathe A bract subtending a spadix. spatulate With shape of a spatula; oblong and rounded at apex, tapering to narrow base. spike An elongate inflorescence consisting of an axis bearing sessile flowers. spikelet A secondary spike; specifically, the inflorescence-unit in grasses and some sedges; see description of Grass Family. spine A sharp-pointed structure which in origin is a leaf or part of a leaf. spinulose Having small spines. sporangium A spore-case. sporocarp A globose case containing a group of sporangia of Water Ferns. sporophyll A spore-bearing leaf. spur An elongate sac projecting from a part of a flower. squarrose With spreading or recurved tip. stamen Microsporophyll of seed plants, bearing microsporangia in which microspores and, later, pollen grains develop. staminate Having only stamens or staminate flowers. staminode A sterile structure resembling a stamen or in the position of a stamen. standard The upper (odd) petal of a papilionaceous flower. stellate Star-shaped. sterigma A short projection or peg on which the leaf of some conifers is borne, left on the stem when the leaf abscises. sterile Not forming spores, pollen, or seeds. stigma Uppermost part of a carpel or set of united carpels. stipe Stalk of a structure, as of an ovary. stipel Stipule of a leaflet. stipitate Borne on a stipe. stipules A pair of appendages, one on either side of base of petiole. stolon A basal horizontal branch rooting at nodes. striate Marked with fine lines. strict Standing upright, straight, sometimes rigid. strigose With appressed or ascending stiff hairs. style The narrow portion of a carpel or set of united carpels between stigma (or stigmas) and ovary. stylopodium Expanded style-base. submersed Under water. subtend To be below. subulate Awl-shaped. succulent Soft, fleshy, juicy. sulcate Furrowed or grooved. superior Descriptive of the ovary of a hypogynous flower or of a perigynous flower in which the hypanthium is free from the ovary. superposed Placed one above the other. suture Line of joining of margins of a carpel. sympetalous Of united petals. synsepalous Of united sepals. taxon (pl. taxa) Any taxonomic entity, of whatever rank. tendril A slender coiling segment of leaf or stem.

terete Circular in cross section.

ternate Divided into 3 segments or leaflets; in 3's. terrestrial Growing on land, not in water. thallus A plant-body not differentiated into stems, leaves, and roots. thorn A sharp-pointed stem or branch of a stem. throat The place where the tube and limb (of a corolla or calyx of united petals or sepals) join. tomentose Densely woolly. trichome A hair. trifoliolate Having 3 leaflets. truncate (base or apex) Ending with a straight or nearly straight edge or surface perpendicular to the long axis, as if cut off. tuber A short thick underground stem or part of a stem. tubercle A small knob or projection. tunicate (bulb) With coats (leaves) in concentric layers, as an onion. twig The most recently formed segment of a woody stem; branchlet. two-ranked In two vertical rows on the stem. umbel An inflorescence with all the pedicels arising from apex of peduncle. umbellate Like an umbel; in an umbel. umbellet A secondary umbel of a compound umbel. umbelliform With the form or appearance of an umbel but not necessarily a true umbel. uncinate Hooked at tip. undulate Wavy. urceolate Urn-shaped. utricle A one-seeded fruit with loose thin pericarp. valvate Dehiscent by valves; with margins meeting but not overlapping. valve One of the segments into which a capsule splits at dehiscence. vein-scar Scar within a leaf-scar resulting from breaking of a vein during leaf-abscission. venation Arrangement of veins. verrucose With wartlike protuberances. versatile (anther) Attached at or near its center to the filament. verticil A whorl. verticillate Whorled. vescicle A small sac or cavity. vestige A small undeveloped or poorly developed structure. vestigial Existing as a vestige. villous With long soft hairs. whorl A group of 3 or more leaves or other structures at a node. whorled In a whorl.

woolly Covered with long, somewhat matted, hairs that are not straight.

zygomorphic (flower, corolla, calyx) Can be cut through the center along only one plane into 2 equal and similar parts that are mirror images of each other; bilaterally symmetrical.