

CYPERACEAE – SEDGE FAMILY

Plant: annual or more commonly perennial

Stem: stem (solid) is termed a culm, simple, mostly erect, often angled (mostly triangular) but some round or angled; some with rhizomes or stolons

Root: fibrous

Leaves: mostly linear, alternate, parallel veins, often in 3 ranks (vertical rows), leaf sheath usually closed, leaf blade flat, folded, round or absent; a ligule is often present

Flowers: small, 2-ranked or spiraled on a spike stalk in 1 or more spikelets in simple to complex inflorescences, each flower in axil of a scale, the inflorescence itself may be subtended by a leaf-like and sometimes showy bracts; perianth usually represented by 1-6 bristles, scales or are absent; perfect or imperfect (monoecious); 3 (1-6) stamens; 1 pistil, 1 style, ovary superior, 2-3 carpels, 1-chambered ovary

Fruit: achene (lens-shaped to triangular in cross-section, achene enclosed in a sac – perigynium in the *Carex* genus)

Other: often occurring in bogs, swamps, or meadows along streams, but also in dry areas and forests; Monocotyledons Group

Genera: 100+ genera; locally many genera

2 slides per species

CYPERACEAE – GENUS SCIRPUS (A-Z)

Green [Common] Bulrush; *Scirpus atrovirens* Willd.

Wool Grass; *Scirpus cyperinus* (L.) Kunth

Rufous Bulrush; *Scirpus pendulus* Muhl.

Green [Common]

Bulrush – p1



Scirpus atrovirens Willd.

Cyperaceae (Sedge Family)

Near Bolivar, Polk County, Missouri

Notes: plant perennial, up to 150+ cm; Culm terete to triangular, glabrous, rhizomes present; roots fibrous; up to 10 Leaves to 17 mm wide, lower leaves and sheaths have abundant septa between ribs (10X), edges with fine saw teeth; inflorescence terminal with rays - many clusters of spikelets (see photos on P2 for details of clusters, achenes and floret scales); found in many habitats including along edges of ponds, streams, ditches, lakes, sloughs, etc.; late spring to early fall **[4 species can be difficult to tell apart (sometimes hybridize) – *S. atrovirens*, *S. georgianus*, *S. hattorianus* and *S. pallidus*]

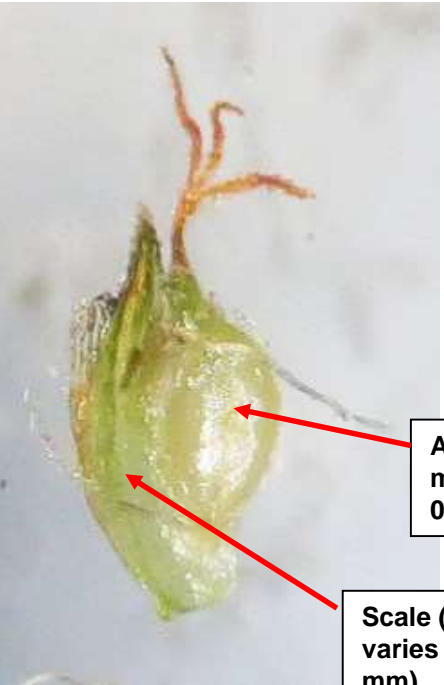
[V Max Brown, 2015]



Green [Common] Bulrush – p2

Scirpus atrovirens Willd.

[V Max Brown, 2015]



Achene (here 1.1 mm, varies from 0.8 to 1.3 mm)

Scale (here 1.5 mm, varies from 1.2 to 2+ mm)



Scale and achene, scales have a little black but minor – will become brown with maturity



Inflorescence with many spikelet clusters, each cluster with up to 25+ spikelets



****this sample is immature, scales and achenes will become darker with maturity**

Perianth bristles (5 or 6 present, 1 or 2 may be a longer than achene, barbed)



A single cluster



Wool Grass – p1

Scirpus cyperinus (L.) Kunth

Cyperaceae (Sedge Family)

Mingo Swamp Area, Stoddard County, Missouri

Notes: plant perennial, up to 200+ cm, cespitose; Culm mostly terete to somewhat triangular, glabrous, rhizomes present; roots fibrous; 5-10 leaves up to 10+ mm wide; inflorescence terminal – many rays ending in clusters or cymes of spikelets, some sessile others on short pedicellate (see photos on P2 for details of spikelets, achenes and floret scales); plant variable; emergent to many wet or moist habitats; summer to fall

[V Max Brown, 2015]



Wool Grass – p1

Scirpus cyperinus (L.) Kunth
[V Max Brown, 2015]



Achene variously shaped, here trigonous, whitish to pale brown, 0.6 to 0.9 mm tall

Six Perianth bristles, very long compared to achene, smooth, contorted, they project well beyond perianth scales

Inflorescence of terminal rays forming clusters or cymes of reddish-brown spikelets (some sessile others pedicellate), spikelets to about 8+ mm



Scales reddish-brown, from 1 to 2+ mm in length, lanceolate to somewhat elliptical



With breakup of spikelets the bristles form a brown to reddish-brown woolly appearance

Rufous Bulrush – p1

Scirpus pendulus Muhl.

Cyperaceae (Sedge Family)

Near Bolivar, Polk County, Missouri

Notes: plant perennial, up to 150+ cm, cespitose;
Culm mostly triangular, glabrous, thick and short
rhizomes present; roots fibrous; 5-9 Leaves up to 10+
mm wide, few septa present on lower leaves and leaf
sheaths; inflorescence a terminal panicle – many
branches end with a single spikelet (see photos on
P2 for details of spikelets, achenes and floret scales);
found in many habitats including wet areas,
depressions, margins of streams, ditches, lakes,
sloughs, etc.; late spring to late summer

[V Max Brown, 2015]

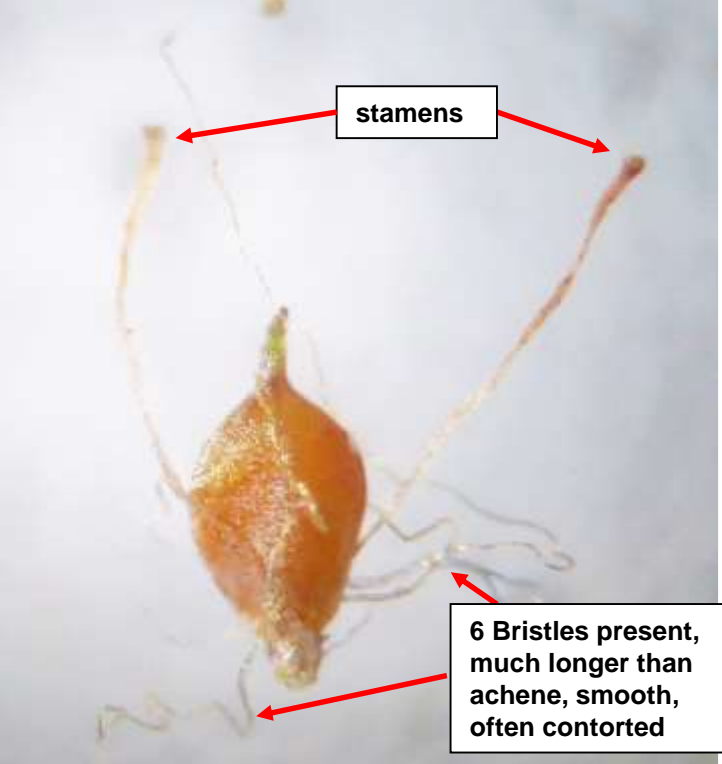


Rufous Bulrush – p2

Scirpus pendulus Muhl.

[V Max Brown, 2015]

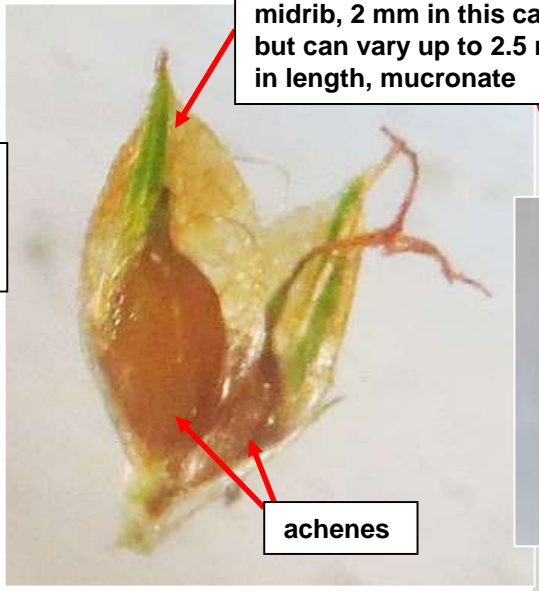
Inflorescence a panicle of spikelets, usually drooping or pendant, spikelet below is about 9.1 mm long



stamens

6 Bristles present, much longer than achene, smooth, often contorted

Achene elliptical and usually trigonous to plano-convex, here about 1 mm tall (varies from 1 to 1.5 mm), light brown in color



Scales with raised green midrib, 2 mm in this case but can vary up to 2.5 mm in length, mucronate

achenes

