

## *Cytisus scoparius* (L.) J.H.F. Link

## Scotch Broom

(*Genista andreana*, *Genista scoparia*, *Sarothamnus scoparius*, *Sarothamnus vulgaris*, *Spartium scoparium*)

**Other Common Names:** Broomtops, Common Broom, European Broom, Irish Broom, Scottish Broom.

**Family:** Fabaceae (Leguminosae); sometimes placed in Papilionaceae .

**Cold Hardiness:** USDA zones 6 (5) to 7 (8).

**Foliage:** Alternate, semi-evergreen to deciduous, trifoliate (mostly) to simple (tips of some twigs) leaves are small,  $\frac{1}{4}$ " to  $\frac{5}{8}$ " long, medium to dark green in color, but covered in open whitish pubescence, lending a frosted appearance to the margins; no significant fall color develops.

**Flower:** Flowering occurs in spring from buds on old wood with one or two bright yellow  $\frac{3}{4}$ " to 1" diameter individual flowers; the back petal is the largest and is bilobed; this petal may be yellow (most common color), pink, orangish red, to red outside; flowers are numerous and very showy in bloom.

**Fruit:** Small seeds are borne in  $1\frac{1}{2}$ " to 2" long pea pod-like explosively dehiscent fuzzy capsules; pods mature from green to tan-brown at maturity, but are not ornamentally effective.

**Stem / Bark:** Stems — young stems are thin, stiff and held erect in a wisp-broom fashion; young and intermediate stems are square in cross-section; new growth is covered in a sparse white pubescence which is slowly lost as the twigs mature; the bark is initially bright green, becoming mottled white and brown as twigs age; Buds — nearly foliose with poorly formed bud scales, the tiny  $\frac{1}{32}$ " to  $\frac{1}{16}$ " long roundish green buds are tightly appressed to the stems; Bark — bark changes as stems age from green on new twigs, mottled green and brown on older twigs, to striated green and brown on young limbs, to smooth greenish gray to brownish gray on older trunks.

**Habit:** Young plants are moderately fast growing mounds of rather erect stiff branches; older plants develop more open and irregular mounding habits, eventually maturing under favorable conditions as medium to large shrubs, or even occasionally small trees; ultimate size is site dependent, but on typically acceptable sites often mature as medium to large shrubs 4' to 6' (8') tall with equal or greater spreads; the overall texture as a young plant is medium-fine becoming medium with age.

**Cultural Requirements:** This species is a much better plant in cooler portions of its range than in warmer portions; some authorities list it as tolerating warmer zones than indicated herein, but these locations are in regions with much milder summer temperatures, such as Mediterranean climates; even where this species grows well, it tends to be short lived with colonies maintained from seed dispersal; plants are prone to rots and should be grown on sandy well drained lower fertility soils; best growth is on acidic soils with moderate moisture availability, this species is reported as drought tolerant in colder climates, but tends to need regular irrigation in warmer locations; salt tolerance is reportedly high; full sun in cooler climates with afternoon to partial shade is best in warmer regions; container-grown plants establish easier than those balled-and-burlapped or moved bare-root; if pruning, do so immediately after flowering.

**Pathological Problems:** Fungal leaf spots and stem blights can be serious limitations in hot humid summers.

**Ornamental Assets:** In youth the visual aspect of this plant is pleasing when not in flower, dense and a bit frosty green, less so with age; the main ornamental feature is the potentially dazzling display of bright yellow spring flowers.

**Limitations & Liabilities:** Vigor is poor in hot humid climates and plants do not age well, becoming rather ratty in appearance with age; this species can become weedy under favorable conditions; the plant is reported to be poisonous and may cause skin irritations in susceptible individuals.

**Landscape Utilization:** One option for this species is as bright spring color offering an alternative to *Forsythia* or *Spiraea* in appropriate arid regions; where adapted, plants are also used for erosion control on sandy banks.

**Other Comments:** Where adapted, this species would rank with some of the *Forsythia*, *Spiraea*, and *Weigela* as two-week wonders while in flower and then a neutral part of the landscape at best during the remainder of the year; Dirr (1998) gives a nice summary of some of the reports on this and similar species in the Southeastern USA, generally no taxa in the genus were found to be reliable durable long-term woody shrubs; the green stems of many species in this and related genera are thought to aid in photosynthesis during drought or winter when leaves are shed; the genus name is thought to be a corruption of the name for a Greek island, Cythnus, where various plants of this genus are common; the specific epithet refers to its use in making brooms.

**Native Habitat:** This European native has naturalized in many locations around the world, including the Western USA.

**Related Taxa:** There are many species of closely related plants in the genera, *Cytisus* R.L. Desfontaines, *Genista* L., *Spartium* L., and *Ulex* L. (note this is not a typo, the genus is *Ulex*, not *Ilex*), that are grown extensively as naturalized or native species in Europe and to a lesser extent in Western North America; many of these, such as *Spartium junceum* and *Ulex europaeus*, have strong tendencies to become invasive and one should probably think hard before introducing them into our regional landscapes; the above genera are taxonomically confused and most species have been placed at one time or another in two or more of the genera; it appears to depend on the authority's tendency to lump or split groups; the discussion herein follows the taxonomy listed in GRIN.

***Genista stenopetala*** P.B.Webb & S. Berthelot

#### **Sweet Broom**

(*Cytisus everestianus*, *Cytisus racemosus*, *Cytisus spachianus*,  
*Cytisus stenopetalus*, *Genista spachiana*, *Teline stenopetala*)

- *Genista stenopetala*, also known as Easter Broom or Escoba Dulce, this native of the Canary Islands is a more delicate species, erect and evergreen, but otherwise similar in general appearance to *S. scoparia*; Sweet Broom is often offered at nurseries and garden centers in our region when in spring flower; despite this frequent availability year after year, it is seldom seen as a long-term component of our regional landscapes; various authorities list it as adapted to USDA zones 9 (8b) to 11, but it appears to fair poorly in our hot humid summers; mature heights are reported as 6' to 8', but this is unlikely in our region.
- Flowering occurs in spring on 2" to 5" long terminal racemes containing bright yellow 1/4" to 3/8" diameter individual flowers; the back petal is the largest and is bilobed; the light green peduncle and calyx are covered in whitish pubescence; flowers are slightly fragrant and are very showy in bloom; small seeds are borne in 1" long pea pod-like dehiscent capsules which are covered in fuzzy pubescence; the dehiscent pods mature from green to tan-brown at maturity.
- Some consider plants sold as Sweet Broom to be of hybrid origin between *G. stenopetala* x *Genista canariensis* L.; the genus name honors the Plantagenet kings and queens of England; the specific epithet means narrow petals.

***Spartium junceum*** L.

#### **Spanish Broom**

- *Spartium junceum*, also known as Genet, Weaver's Broom, Retama, Retama De Olor, Retama Macho, or Retacchu, is included here primarily due to concerns for its invasive potential which has been fairly extensive in West Coast regions of the USA and Canada; hence, its use in our regional landscapes should be approached with caution; *Spartium junceum* is a restricted species in some states; the genus name derives from the Greek word spartion for a grass used for weaving; the specific epithet refers to the rush-like (genus *Juncus*) stems.
- *Spartium junceum* is a closely related taxon to *C. scoparius*, but with sparse simple leaves, slightly larger flowers, and much more invasive tendencies; *Spartium junceum* tends to invade disturbed sites and it was once planted extensively for bank stabilization in Western North America; despite its adverse ecological potential, this species is still at times planted for its wide site adaptability and very showy yellow spring flowers; the mature size is similar to that of *S. scoparia*; adaptation to Texas landscapes is not fully known, but it is reported to be hardy in milder climates from USDA hardiness zones 7 (6) to 11.

***Ulex europaeus*** L.

#### **Gorse**

- *Ulex europaeus* is a relative of *C. scoparia* that differs most noticeably from it via the spiny nature of the plant; young leaves are three-parted, while the spines predominate on older plants; these small to medium shrubs are sometimes used in bank covers where hardy; the genus name is the ancient Latin name for this species; the specific epithet honors its native European origins.
- This European species has become a weed in some regions of the USA, but is not extensively planted in our portion of the country; it is variously listed as useful in USDA zones 6 to 8, but this is dependent upon acclimation conditions for colder zones and the severity of summers in warmer regions.

**References:** Denver Water, 1996; Dirr, 1998; Flint, 1997; Odenwald and Turner, 1996; Thomas, 1992; Wyman, 1969; Young et al., 1999.

