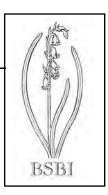
Plant Crib



ELODEA / LAGAROSIPHION / EGERIA DENSA / HYDRILLA

Assuming most botanists know *Elodea*, the following jizz characters may help pick up the other taxa in the field, even under water. Lagarosiphon is readily picked out as having much chunkier shoot apices (c. 2 × normal *Elodea* size); the spirally arranged leaves are best seen away from the short apex where they are too densely crowded. It is now common in many ponds in southern Britain and is surprisingly frequently confused with *Elodea*, though they are easily distinguished. Very robust (c. $3 \times$ normal *Elodea* size) plants with leaves in whorls of 4-5 may be the rare introduction Egeria densa. Slender, bluishgreen, semi-translucent plants should be checked to see if they are the very rare Hydrilla verticillata. Details of their distributions are given in Simpson (1984) and *Aquatic Plants*.

The taxa are keyed out below. *Elodea canadensis* and *E. nuttallii* are both phenotypically plastic (Simpson 1988); difficult material should be sent to a referee. Nodal scales are small ± membranous scales in the axils of the leaves.

- Leaves spirally arranged along stem, often densely crowded at shoot apices, leaves usually strongly Lagarosiphon major (Ridl.) Moss
- Leaves in whorls of 3-5, the whorls crowded or lax, leaves recurved or not

2 Leaves mostly in whorls of 3(-5) (common) (**Elodea**) 3

2 Leaves mostly in whorls of 4-5 (very rare)

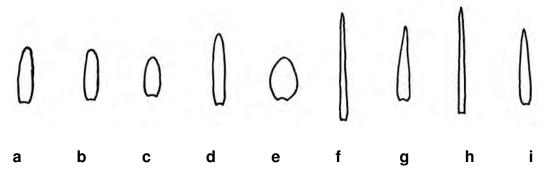
- Leaves linear-oblong, oblong-lanceolate, oblong, oblong-ovate or ovate, rarely linear-lanceolate; leaf apices broadly acute or obtuse, rarely narrowly acute, (0.7-)0.8-2.3 mm wide c.~0.5 mm below the apex (Figs. a-e) Elodea~canadensisMichx.
- 3 Leav es linear or linear-lanceolate; leaf apices narrowly acute or acuminate, 0.2-0.7(-0.8) mm wide c. 0.5 mm below the apex (Figs.f-i)
- At least some leaves strongly recurved; leaf lamina often strongly twisted; leaf margin teeth 60-90 (-100) µm long; adventitious root-tips (in living material) white or grey green; sepals of female flowers 1.6-2.5 mm long Elodea nuttallii (Planch.) H. St. John
- Leaves never strongly recurved; leaf lamina rarely strongly twisted; leaf margin teeth (80-)110-140 µm long; adventitious root-tips (in living material) red; sepals of female flowers 3.1-4.3 mm long (very rare) Elodea callitrichoides (Rich.) Casp. (*E. ernstiae* H. St. John)
- Nodal scales fringed; plant slender

Hydrilla verticillata (L. f.) Royle

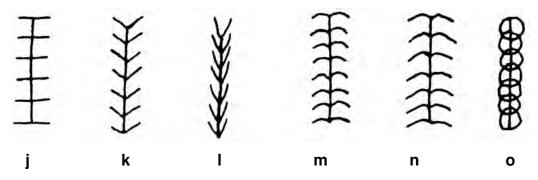
Nodal scales entire; plant robust

Egeria densa Planch.

Plant Crib



Outlines of leaves of *Elodea* species (a-e) *E. canadensis*, (f-g) *E. nuttallii*, (h-i) *E. callitrichoides*.



Leaf posture types. (j) spreading, (k) patent, (l) erecto-patent, (m) arcurate-deflexed, (n) slightly deflexed c 24 mm from the leaf base, (o) strongly recurved, with leaf bases often touching or overlapping the stem.

E. canadensis j, k, l, m E. nuttallii j, k, l, m, n, o E. callitrichoides j, k, l, m, n

References Simpson, D. A. (1984). Watsonia 15: 1-9.

Simpson, D. A. (1986). *Watsonia* **16**: 1-14. Simpson, D. A. (1988). *Watsonia* **17**: 121-132.