GUIDE TO THE GENERA OF LIANAS AND CLIMBING PLANTS IN THE NEOTROPICS

SCHLEGELIACEAE

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Schlegelia dariensis Sandw., photo by P. Acevedo

A Neotropical family with 4 genera and 37 species of root-climbing lianas, epiphytic shrubs, or exceptionally free standing shrubs or trees. Lianas are represented by the genus *Schlegelia* with about 23 species found in moist to wet forests of low to middle elevations.

Diagnostics: Root-climbing lianas; leaves simple, opposite, coriaceous, with entire and commonly revolute margins, the lamina commonly abaxially foveate toward the base; exstipulate; calyx cupshaped, truncate; corolla gamopetalous, < 2 cm long, often lavender. May be confused with members of Plantaginaceae but the presence of large, elliptic to oval leaves set it apart from members of that family.

General Characters

1. STEMS. Woody, cylindrical, lenticellate; cross sections Moderate secondary growth, furrowed, turning cylindrical with age, 3-15 m in length and 0.5-1.5 cm in diam.; cross

- section with regular vascular anatomy, xylem with numerous narrow rays, with confluent bands of paratracheal parenchyma.
- 2. EXUDATES. Watery or not visible.
- 3. CLIMBING MECHANISMS. All species of *Schlegelia* are **root-climbers**, with short lateral branches.
- 4. LEAVES. Opposite, simple, coriaceous, with pinnate venation and entire, revolute margins, in some species the lamina abaxially foveate near the secondary vein axils; petioles short, stout, eglandular; stipules absent.
- 5. INFLORESCENCE. Axillary cymes, sometimes in short to elongated frondo-bracteate racemes with flowers solitary or in small clusters at the nodes of inflorescence.
- 6. PEDICELS. Short to nearly absent.
- 7. FLOWERS. Bisexual, zygomorphic, commonly < 2 cm long, slightly geniculate at the base; calyx cupular, truncate; corolla gamopetalous, tubular-funnel-shaped, 5-lobed; stamens 2, inserted or exserted; staminodia 2; ovary superior, syncarpous, bi-carpellate, bi-locular, with multiseriate ovules on a central placenta.
- 8. FRUIT. A globose berry, ca. 1 cm tall; seeds numerous embedded in a pulp.



Figure 1. Root-climbing branch of *Schlegelia sp.* Photo by P. Acevedo.

GENERIC DESCRIPTION

SCHLEGELIA Miquel, Bot. Zeitung 2: 785. 1844.



Schlegelia dariensis., photo by P. Acevedo



Stem cross section of *Schlegelia violacea* Griseb., photo by P. Acevedo

Lianas or shrubs, climbing by adventitious roots. Stems cylindrical, interpetiolar zone not glandular, reaching 5-15 m in length, often lenticellate; cross section with regular anatomy, xylem with paratracheal confluent bands of parenchyma and numerous, narrow rays. Leaves opposite, simple, coriaceous, with entire revolute margins. Inflorescences of axillary cymes, sometimes in short to elongated frondobracteate racemes with flowers solitary or in small clusters at the nodes of inflorescence. Calyx simple, crateriform, truncate or irregularly lobed; corolla white, pink, purple, or reddish, zygomorphic, tubular-campanulate or tubular, more or less glabrous outside, the lobes lepidote inside; stamens 2,, inserted or exserted, staminodia 2; ovary globose, style short with 2 short stigmatic branches. Berries with a thin pericarp and with a persistent calyx on the basal

portion; seeds numerous, small, without wings, surrounded by a pulp.

Distinctive features: Root-climbing lianas with opposite exstipulate leaves, short axillary cymes and globose leathery berries with persistent cupular calyx at the base. Vegetatively may be confused with *Aegiphila* in the Lamiaceae but this genus commonly has chartaceous leaves (not coriaceous or rigid coriaceous) and is a scrambler (not a root-climber).

Distribution: A genus of 23 species naturally distributed from southern Mexico to Peru, northern Brazil, Southeastern Brazil, and the West Indies; moist wet and cloud forests; 0-1,800 m.

RELEVANT LITERATURE

Acevedo-Rodríguez, P. 2005. Vines and climbing plants of Puerto Rico and the Virgin Islands. Contrib. United States National Herbarium 51: 1-483.