

Flora of North America

Bontia (Scrophulariaceae) Scott Zona 24 April 2012

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1. BONTIA Linnaeus, Sp. Pl. 2: 638 [as 938]. 1753; Gen. Pl. ed. 5, 285. 1754 [For Jacobus Bontius, 1592--1631, Dutch physician and botanist in Java]

Scott Zona

Shrubs or trees, (all parts bearing spherical resin cavities). Stems ascending, glabrous. Leaves persistent, alternate, leathery; petiole present; blade margins entire (except in seedlings, which are distally serrate). Inflorescences axillary, 2-flowered or flowers solitary; bracts absent. Pedicels present; bracteoles absent. Flowers bisexual; sepals 5, calyx radially symmetric, funnel-shaped, lobes broadly ovate; petals 5, corolla buff or coppery brown to greenish tan (violet longitudinal crest of hairs on inside of abaxial lip), strongly bilaterally symmetric, bilabiate, tubular, abaxial lobes 3, (strongly recurved and bearing a conspicuous longitudinal crest of hairs), adaxial lobes 2; stamens 4, adnate to corolla, didynamous, filaments sparsely pubescent, staminode 0; ovary 2-locular, placentation axile; stigma minutely 2-fid. Capsules drupelike, radially symmetric, ovoid. Seeds 1--4, brown, L-shaped and terete, not winged. x = 18.

Species 1: Florida, West Indies, South America.

Bontia is unispecific and the only genus of Myoporeae (the former Myoporaceae) native to the Americas. Preliminary phylogenetic analysis suggests that it was derived from within the Australian genus *Eremophila* R. Brown and achieved its current distribution via long-distance dispersal (S. A. Kelchner et al. 2001).

1. Bontia daphnoides Linnaeus, Sp. Pl. 2: 638 [as 938]. 1753 * White alling F

Shrubs or trees, 1--5 m. Bark tan, smooth in young shoots, furrowed in older shoots. Leaves spirally arranged, concolorous, 65-- 130×13 --19 mm; petiole 2--7 mm; blade narrowly elliptic, midvein conspicuous, apex acute. Flowers: calyx lobes 3×3 mm, margins ciliate, apex acuminate; corolla 15--20 mm; stamens exserted, assurgent against adaxial lip of corolla, anthers dehiscence introrse; style elongate. Capsules greenish yellow at maturity, indehiscent, 12-- 15×10 --12 mm, pedicel and style persistent, exocarp glossy, glabrous, mesocarp corky, endocarp woody. 2n = 36.

Flowering Nov--Jun. Coastal thickets, littoral or mangrove forests; 0--10 m; Fla.; West Indies; South America

Bontia daphnoides was first discovered in Florida in the early 1990s (S. Zona 1998). Field studies are needed to determine whether flowers are pollinated by bees (as postulated by Zona), hummingbirds (R. J. Chinnock 2007), both, or neither. The fruits float and are adapted to dispersal by water. The species has potential as an ornamental shrub, especially because it tolerates alkaline soil, salt, and drought. Bontia daphnoides is used medicinally throughout much of the Caribbean (E. S. Ayensu 1981b).