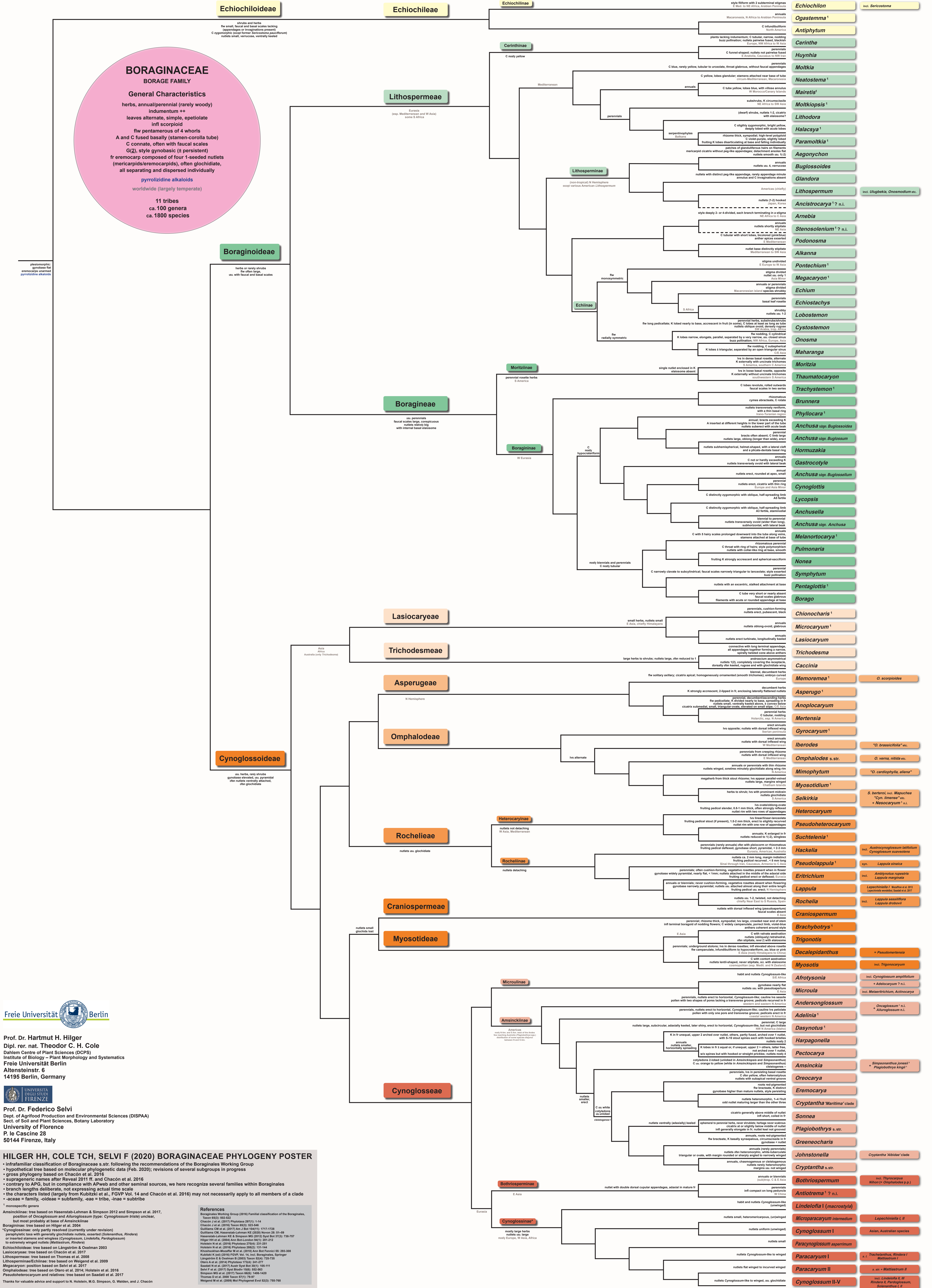


BORAGINACEAE PHYLOGENY POSTER



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- infrataminal classification of Boraginaceae s. str. following the recommendations of the Boraginaceae Working Group
- hypothetical tree based on molecular phylogenetic data (Feb. 2020); revisions of several subgroups in progress
- gross phylogeny based on Chacón et al. 2016
- suprageneric names after Reveal 2011 ff. and Chacón et al. 2016
- contrary to APG, but in compliance with APWeb and other seminal sources, we here recognize several families within Boraginales
- the characters listed (largely from Kubitzki et al., FGVP Vol. 14 and Chacón et al. 2016) may not necessarily apply to all members of a clade
- -aceae = family, -oideae = subfamily, -aeae = tribe, -inae = subtribe

¹ monospecific genera

Amsinckinae: tree based on Hasenstab-Lehman & Simpson 2012 and Simpson et al. 2017, position of *Oncoglossum* and *Alluoglossum* (type: *Cynoglossum triste*) unclear, but most probably at base of Amsinckinae

Boragininae: tree based on Hilger et al. 2004

Cynoglossinae: only partly resolved (currently under revision)

Paraphyletic taxa with generally glochidiate nutlets, exserted (*Solananthus*, *Rindera*) or inserted stamens and wings (*Cynoglossum*, *Lindlofia*, *Paracynoglossum*) to extremely winged nutlets (*Mertensium*, *Rindera*)

Echiochiloideae: tree based on Långström & Oxelman 2003

Lasiocaryae: tree based on Chacón et al. 2017

Lithospermeae: tree based on Thomas et al. 2008

Lithosperminae/Echlinae: tree based on Weigand et al. 2009

Megacaryon: position based on Selvi et al. 2017

Omphalodeae: tree based on Otero et al. 2014; Holstein et al. 2016

Pseudoheterocaryum and relatives: tree based on Sadleir et al. 2017

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