

'Tel olu' – is it really an 'Olu' ?

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The genus *Nymphaea* L. includes two species in Sri Lanka, *N. nouchali* Burm. f. and *N. pubescens* Willd. and are commonly known by the vernacular names, 'Manel' and 'Et-olu' or 'Olu' respectively. Apart from these two commonly known *Nymphaea* species, another group exists by the vernacular name 'Tel-olu' which has not been recorded in literature. The field experiences also proclaimed the occurrence of several morphological variants with very distinct character combinations that is not listed under the presently recognized species descriptions. Therefore, a phenetic analyses of morphological and anatomical data was undertaken to evaluate the existence of any other species of *Nymphaea* in Sri Lanka.

Live plant materials of *Nymphaea* species including 'Tel-olu' were collected from all possible areas from different populations. Characters and character states were coded into a data matrix using Excel computer package. Multivariate methods of analysis, Cluster Analysis and Principal Component Analysis were carried out using the statistical packages MINITAB 13.2 and PC-ORD version 4. All the resulting dendrograms initially identified two clusters, one corresponding to 'Olu' and the other including 'Manel' and 'Tel-olu'. This later cluster further divided into two groups, where the 'Tel-olu' group clearly separated from 'Manel'. Several distinct features could be identified to separate 'Tel-olu' from 'Manel'. These characters include the leaf size, color of leaf abaxial and adaxial surface, the thickness of leaves, petiole color, and shape of petals and sepals. The flower color distribution between the groups were interesting where the white–light blue flowers always occurred in 'Tel-olu' whereas the violet (purple) color always occurred in 'Manel'.

Based on the present study, *Nymphaea* species that is commonly known by the vernacular name 'Tel-olu' is not an 'Olu' species but a 'Manel'. Further the 'Tel-olu' showed several distinct morphological features separating from 'Manel'. Therefore, the study confirms the presence of an additional *Nymphaea* species in Sri Lanka, which needs further studies in confirming the identity.

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