



## Why is *Pseudosphromenus cupanus* (Teleostei: Osphronemidae) reported from Bangladesh, Indonesia, Malaysia, Myanmar, and Pakistan?

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### Abstract

The native distribution of the small labyrinth fish species *Pseudosphromenus cupanus* includes southern India and Sri Lanka. According to literature it has a range including also Pakistan, Bangladesh, Myanmar, Malaysia, and Indonesia (Sumatra) but there are no voucher specimens or reliable observations from those areas. The distribution record of *P. cupanus* was inflated partly by including *P. dayi* as a synonym. *Pseudosphronemus dayi* is native to the Western Ghats in India, but the origin of the aquarium importation in 1907 was reported as both Cochin (=Kochi) and Malacca (=Malaysia), the latter locality obviously in error. The basis for the Sumatra record is an obviously mislabeled sample of *P. dayi* from Pulau Weh close to Sumatra. The basis for reporting the species from Pakistan, Myanmar or Bangladesh could not be located. Misidentified museum specimens from Myanmar and Pakistan identified as *P. cupanus* were never published on. *Pseudosphromenus cupanus* has been considered recently to be extinct in Bangladesh, but in fact it never occurred there.

**Key words:** Asia, Freshwater, Geographical distribution, Threat status

### Introduction

*Pseudosphromenus cupanus* (Cuvier, 1831) is a small species, about 60 mm long in total length, of the labyrinth-fish family Osphronemidae (Fig. 1a). It is characterised by its elongate body, relatively long but low dorsal and anal fins, and the caudal fin ending in a point. It is nearly uniform in colour or with a faint dark band along the side, and with a black spot at the base of the caudal fin. The only other species in the genus *Pseudosphromenus* Bleeker, 1879, is *P. dayi* (Engmann, 1909) which has the same shape and similar dorsal and anal fins, but the caudal fin is longer (Figs 1b–c). Especially in the male, the caudal fin is markedly lanceolate, and the middle rays may be prolonged beyond the fin membrane (Fig. 1c). *Pseudosphromenus dayi* is also slightly more colourful than *P. cupanus*, and presents two dark stripes along the side.

Both species are easy to keep and rear in aquaria, and have been in the aquarium hobby since the early 20<sup>th</sup> Century. *Pseudosphromenus cupanus* was imported as an aquarium fish to Germany in 1903 (Rachow, 1936b), followed by *P. dayi* in 1907 (Scholze & Pötzschke, 1930) or 1908 (Rachow, 1936a). The latter was then recognized as being the same as a form of *P. cupanus*, distinguished but not named by Day (1865:135, 1877:371) (Poenicke, 1908a; Köhler, 1908), and was long treated as a variety or subspecies of *P. cupanus* (Köhler, 1908; Engmann, 1909; Rachow, 1936a), only occasionally considered a separate species (e.g., Stansch, 1911; Vierke, 1988). Kottelat (1994) reviewed the nomenclature of *P. dayi*, and established its species rank. Although authorship of *P. dayi* is usually attributed to Köhler (1908), the name was made available by Engmann (1909) as explained by Kottelat (1994).

Both species were first described in the genus *Polyacanthus* Cuvier, a synonym of *Trichogaster* Schneider, but contained in *Macropodus* La Cepède from Regan's (1909) revision of the Asian anabantoid fishes until Vierke (1975) resurrected *Pseudosphromenus*. *Pseudosphromenus dayi* occurs in Kerala, India (Cherian *et al.*, 2001; Dahanukar & Rema, Devi 2013; Kottelat, 1994), whereas *P. cupanus* is found both in Sri Lanka (Pethiyagoda,