



## A new melanistic species of monitor lizard (Reptilia: Squamata: Varanidae) from Sanana Island, Indonesia

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### Abstract

A new species of monitor lizard endemic to Sanana Island in the northwestern Moluccas is described from a preserved specimen and field observations. This is the only melanistic member of the *Varanus indicus* species group, and the only taxon in the subgenus *Euprepiosaurus* with prominent orange-red markings. Allied to *Varanus melinus* of nearby Mangole and Taliabu islands in body proportions and scutellation, the new species is convergent with melanistic populations of the *Varanus salvator* complex from the Sula Platform, Sulawesi and Togian Islands. On Sanana the new species reaches highest densities in coastal sago palm swamps, a habitat type that is underutilized by other species in the *V. indicus* group elsewhere in the Moluccas.

**Key words:** Squamata, Sauria, Varanidae, *Euprepiosaurus*, *Varanus indicus* group, taxonomy, Sula Islands

### Introduction

During a visit to Sanana Island (Sula archipelago, Maluku Utara) in March-April 2009 Weijola observed and photographed several individuals of a distinctive member of the *Varanus indicus* species group that could not be allocated to any known taxon. A specimen was subsequently located in the collections of the Naturalis Museum in Leiden. Weijola and Sweet returned to Sanana between 16 November and 6 December 2009 to make additional observations on morphological variation, distribution and ecology.

Two species of *Varanus*, both members of the subgenus *Euprepiosaurus*, are reported to occur in the Sula archipelago: *Varanus melinus* Böhme & Ziegler and *V. indicus* (Daudin). The Leiden specimen was not cited by de Rooij (1915) or Kopstein (1926, 1927). It was rediscovered and examined by Brandenburg (1983) who listed it as *V. indicus*, and this allocation was accepted by all subsequent authors (e.g., Böhme *et al.* 1994, Böhme & Ziegler 1997, Ziegler *et al.* 2007b, Fig. 2). There appear to be no other records ascribed to *V. indicus* from the Sula Islands.

### Material and Methods

In addition to the ethanol-preserved holotype we present information on 38 animals observed in the wild on Sanana Island from 28 March to 5 April and 16 November to 6 December 2009. For comparative purposes most meristic characters follow Brandenburg (1983) and subsequent papers on the *V. indicus* group (e.g., Ziegler *et al.* 2007a; Koch *et al.* 2009). The symbols employed by these authors are indicated in parentheses. Measurements were taken to the nearest 0.5 mm (head) or 1 mm with a steel tape

**Measurements:** Snout to vent length (SVL); tail length (F); total length (TL); body length from gular fold to cloaca (E); head-neck length from tip of snout to gular fold (D); head length from snout to anterior dorsal margin of tympanic recess (A); head width at maximum span of postorbital arch (B); head depth at midpoint