

## A NEW SPECIES OF TREE FROG (GENUS *POLYPEDATES*) FROM GREAT NICOBAR, INDIA (ANURA: RHACOPHORIDAE)

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(with one plate and three text-figures)

**ABSTRACT.**- A new species of tree frog of the genus *Polypedates* is described on the basis of 11 examples collected from Great Nicobar Island, India. The new species is diagnosed by the following characteristics: large body size (female SVL  $\leq$  65.2 mm; male SVL  $\leq$  43.3 mm), head broader than long, and lacking a bony crest; concave lores; eye diameter less than the eye-nostril distance; tympanum diameter less than 3/4 eye diameter; toes 2/3 webbed; toe IV with one phalange free; absence of outer metatarsal tubercle; tibio-tarsal articulation reaches the nostrils; no tubercles on the undersurface of the arm and dorsum typically with a dark hour-glass marking.

**KEY WORDS.**- Anura; Rhacophoridae, *Polypedates insularis*; new species; Great Nicobar; India.

### INTRODUCTION

The genus *Polypedates* Tschudi, 1838, was revived from the synonymy of *Rhacophorus* by Liem (1970), upon discovering a suite of anatomical and osteological characters that separate the two genera of Old World tree frogs. *Polypedates* contains species distributed over Sri Lanka and India, east to southern China and Japan and south to Indo-China and Indo-Malaya, including the Greater Sundas and the Philippines (Frost, 1985; Inger, 1966). Dubois (1986) doubted the validity of the genus, failing to discover consistent differences in phenetic characters, and tentatively assigned all Old World tree frogs back to the genus *Rhacophorus*, pending future systematic revision.

A series of 11 tree frogs collected from Great Nicobar Island, India, serves as the basis of the description of a new species of the genus. Features that agree with the definition of the genus *Polypedates* in Liem (1970) in the material include absence of dermal ornamentation; fingers webbed at the base; short parieto-squamosal arch; presence of vomerine teeth; large digital disks; usually with a dark hour-glass marking on dorsum and a dark transverse bar across the forehead. The species belongs to the *Rhacophorus leucomystax* group of Dubois (1986).

### MATERIAL & METHODS

The 10 types obtained in 1994 were killed with chloroform, fixed in four per cent formalin and subsequently transferred to 70 per cent ethanol. The following measurements were taken with dial vernier caliper (to the nearest 0.1 mm): snout-vent length, SVL (from the tip of the snout to the vent); tibia length, TBL (tibia length, the distance between the surface of knee to the surface of heel, with both tibia and tarsus flexed); body width, BW (the greatest width of the trunk); head length, HL (the distance between the angle of the jaws and the snout-tip); head width, HW (measured at the angle of the jaws); eye diameter, ED (the diameter of the orbit); tympanum diameter, TYD (the greatest diameter of the tympanum); upper eyelid width, UE (the greatest width of the upper eyelid); interorbital width, IO (the least distance between the upper eyelids); eye to snout-tip distance, E-S (the distance between the anterior-most point of the eyes to the tip of the snout); eye to nostril distance, E-N (the distance between the anterior-most point of the eyes and the nostrils); fore limb length, FL (the length of the outstretched fore limb, from axilla to the tip of its longest finger); hind limb length, HIL (the length of the outstretched hind limbs, from vent to the tip of its longest toe); and F3D (width of disk on finger III).

Colour descriptions are made from Fujichrome