

## Three new species of *Gastromyzon* (Teleostei: Balitoridae) from the Temburong River basin, Brunei Darussalam, Borneo

H. H. TAN<sup>1</sup> & Z. H. SULAIMAN<sup>2</sup>

<sup>1</sup> Department of Biological Sciences, National University of Singapore, Kent Ridge, Singapore 117600.  
Email: dbsth@nus.edu.sg

<sup>2</sup> Department of Biology, University of Brunei Darussalam, Brunei Darussalam, Borneo

### Abstract

Three new species of *Gastromyzon* from Brunei Darussalam, on the island of Borneo, are described from recent collections and from older museum specimens. *Gastromyzon cranbrooki*, new species, is superficially similar to *G. borneensis*, but differs in having a distinct secondary rostrum; body brown with 9–10 grey bars, head dorsum dark brown with thin grey reticulate pattern; and 56–60 scales on lateral line. *Gastromyzon aeroides*, new species, is similar to *G. punctulatus*, but differs in having the body uniform brown, dorsum uniform brown; head dorsum with very fine cream reticulate pattern (similar to a cream head with brown spots and blotches); dorsal, caudal and anal fins blue in life; and 47–65 scales in lateral line. *Gastromyzon venustus*, new species, is similar to *G. pariclavis*, but differs in having both the body and head dorsum plain brown; dorsal, caudal and anal fins red in life; and 58–63 scales in lateral line.

**Key words:** *Gastromyzon cranbrooki*, *Gastromyzon aeroides*, *Gastromyzon venustus*, biodiversity, Borneo

### Introduction

The genus *Gastromyzon*, a unique group of fishes endemic to the island of Borneo, exhibits extreme morphological adaptations for life in torrential waters. The included species, which are obligate bottom dwellers, are poor swimmers that have lost the ability to hover or swim in mid-water. As a consequence, the genus has evolved new modes of locomotion, which involve creeping and crawling along the bottom. Balitorid locomotion had been studied by Wickler (1971) using aquarium stocks of *G. ctenocephalus* (misidentified as *G. borneensis*). He found that the horizontally oriented pectoral fins, fused pelvic fins, and depressed head and body collectively form a suction cup that enables