Preliminary Observations on the Banded Mountain Loach Schistura notostigma

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Loaches are freshwater fishes which favour flowing water. Many are popular aquarium fish. Schistura notostigma is an endemic hill stream loach which belongs to the family Balitoridae. Its biology and breeding are poorly known. The present study was conducted from July 2007 to April 2008 in a stream situated at the Dunumadalawa (Wakarawatte) forest reserve in Kandy. The Dunumadalawa forest reserve is approximately 5 km² (480 hectares) of secondary forest, having once been a site of coffee, tea and cocoa plantations. It is characterized by high canopy mixed forest dominated by several species including Albizzia (Albizia chinensis) and Jak (Artocarpus heterophyllus) remaining from the estate days. Schistura notostigma is the only fish species living in the stream. Sampling was carried out in several sites and physico-chemical parameters of the water were determined. Sporadic observations were also made in a stream at Hunnasgiriya. The habitat has a mean pH of 7.2, electrical conductivity of 54 µs and temperature of 22°C.

Schistura notostigma is a bottom living species with an almost uniform body depth and light brown colour. The intensity of colour varies with the ambient light. There are 13 or 14 dark brown vertical bands along the sides of the body. There is a black band at the base of the caudal fin and a blackish spot at the base of the dorsal fin origin. The colour pattern of the juveniles is different from the adults. It has three pairs of barbels. Mouth is semicircular. Lips are fleshy and the lower lip is furrowed. The lateral line is incomplete. A total of 85 fish were sampled and specimens ranging from 1.7 cm to 6.2 cm in total length were observed. Males and females could not be differentiated. The banded mountain loach prefers clear, fast flowing water, in shady areas with high dissolved oxygen, with a substrate of rock, pebble or sand. It is well adapted to its bottom dwelling habitat with subcylindrical body and wide ventrally directed pectoral and pelvic fins. The mouth is important for browsing among pebbles. No significant threat was identified in the study area since it is a forest reserve. Presently, this is not an endangered fish species in the country. An albino Schistura notostigma was discovered in the stream at Hunnasgiriya. It has a completely white coloured body and the eyes are red in colour. The total length is 4.3 cm. This can be considered as a very rare case. Albino fish are highly susceptible to predation in their habitat. Results of this preliminary study reveal that there is plenty of scope for more in depth research on this endemic loach species.

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