Biodiversity Journal, 2018, 9 (1): 61-64

New records of priapium fish, Neostethus lankesteri Regan, 1916 (Atheriniformes Phallostethidae), from the mangrove area of Andaman coast and lower Gulf of Thailand

Sitthi Kulabtong^{*}, Pawin Thongdam & Patipat Toprom

Save wildlife Thailand, Wangnoi District, Ayuttaya Province 13170, Thailand *Corresponding author, email: kulabtong2011@hotmail.com

	A priapium fish, <i>Neostethus lankesteri</i> Regan, 1916, (Atheriniformes Phallostethidae) is newly recorded from the mangrove area of Andaman coast and lower Gulf of Thailand. Description and distribution data of a priapium fish is provided here.
KEY WORDS	Neostethus lankesteri; Phallostethidae; Andaman coast; Gulf of Thailand.
Received 17.01.2018; accepted 25.02.2018; printed 30.03.2018	

INTRODUCTION

The priapium fish genus *Neostethus* Regan, 1916, is distributed in Southeast Asia only (Myers, 1928; Parenti, 1984). First record of *Neostethus* in Thailand was reported by Myers (1937: sub *N. siamensis*), where Siam refers to the old name of Thailand, from the estuary of Chantaburi River, Southeast Basin, Thailand, this species was considered a junior synonym of *N. lankesteri* Regan, 1916 (Parenti, 1989). Currently, in Thailand, *N. lankesteri* Regan, 1916, is known only from the estuary of Chantaburi River, Southeast Basin, estuary of Petburi Basin, estuary of Maeklong and Chao Phraya Basin (Kunlapapuk et al., 2012; Suksri et al., 2015).

In a survey project in lower Gulf of Thailand and Andaman coast, Thailand, during July–November 2017, the author found several specimens of *N. lankesteri* in the mangrove area of Khanom River, Khuan Thong Subdistrict, Khanom District, Nakhon Si Thammarat, lower Gulf of Thailand and the mangrove area of Thalang District, Phuket Province, Andaman coast, Thailand, which is a new record of *N. lankesteri* in this region. ACRONYMS. Standard length: SL; head length: HL.

RESULTS

Systematics

Ordo ATHERINIFORMES Rosen, 1966 Familia PHALLOSTETHIDAE Regan, 1913 Genus *Neostethus* Regan, 1916

Neostethus lankesteri Regan, 1916

EXAMINED MATERIAL. Three specimens, mangrove area of Mark Pok Anusorn, Mai Khao Subdistrict, Thalang District, Phuket Province, Andaman coast, Thailand, VII.2017, legit Sitthi Kulabtong; eleven specimens, mangrove area of Khanom River, Bangku Village, Khuan Thong Subdistrict, Khanom District, Nakhon Si Thammarat, lower Gulf of Thailand, XI.2017, legit Sitthi Kulabtong (Fig. 1).

Sitthi Kulabtong et alii



Figure 1. Neostethus lankesteri, 35 mm SL (male) from mangrove area of Khanom River, lower Gulf of Thailand.



Figure 2. Mangrove area of Khanom River (4 kilometers from Khanom Estuary), Khanom District, Nakhon Si Thammarat, lower Gulf of Thailand.



Figure 3. Mangrove area of Thalang District (1 kilometer from the sea), Phuket Province, Andaman coast, Thailand.

DESCRIPTION. Neostethus lankesteri is compressed, body depth is 15.4-18.7 %SL. Body width is 7.2-11.1 %SL. Scales in lateral series are medium to large, lateral series scales include 23-27 scales, predorsal scales are 10-12. Head length is 27.6-33.3 % SL. The eyes are large, eye diameter is 23.5– 31.8 %HL (6.5-9.9 %SL). Post orbital length is 52.9–56.1 %HL (14.6–18.7 %SL), snout length is short, with 14.7-17.1 %HL (4.1-5.7 %SL) and interorbital width is 44.5–48.7 %HL (8.7–10.1 %SL). Predorsal fin length is 69.1–73.4 %SL, prepectoral fin length is 31.4–32.5 % SL, prepelvic fin length is 44.3-48.2 %SL and preanal fin length is 58.5-63.7 %SL. Caudal peduncle depth is 10.6–13.1 %SL. Pectoral fin is short, not reaching beyond anus, the pectoral fin length is 12.6-16.3 % SL and 8-9 branched fin rays. Pelvic fin is short, not reaching beyond anus, the pelvic fin length is 7.4–8.9 % SL with 7 branched rays. Anal fin base is longer than dorsal fin base, the anal fin base length is 12.8–17.1 % SL, dorsal fin with 2 unbranched rays and 7 branched rays and anal fin with 3 unbranched rays and 5 branched rays. The dorsal fin base length is 11.2-16.7 %SL.

BIOLOGY AND DISTRIBUTION. In this study all specimens of *N. lankesteri* were found in the mangrove area of Khanom River (4 kilometers from Khanom Estuary, salinity more than 20 ppt; depth about 1 m or more, mud on the bottom), Bangku Village, Khuan Thong Subdistrict, Khanom District, Nakhon Si Thammarat, lower Gulf of Thailand (Fig. 2) and the mangrove area of Mark Pok Anusorn (1 kilometer from the sea, salinity more than 20 ppt; depth about 1 m or more, sandy mud on the bottom), Mai Khao Subdistrict, Thalang District, Phuket Province, Andaman coast, Thailand. In Thailand, this species is known only from the estuary of Chantaburi River, Southeast Basin, estuary of Petburi Basin, estuary of Maeklong and Chao Phraya Basin. It is a new record for the lower Gulf of Thailand and Andaman coast, Thailand (Fig. 3).

ACKNOWLEDGEMENTS

We wish to thank the anonymous reviewers for their invaluable editorial advice. A very special thanks to the Save wildlife volunteer Thailand Team for collecting some specimens employed in this study, and to the Bird Conservation Society of Thailand and PTT Public Company Limited for providing help during the field survey and financial support. Finally, we are grateful to all the partners for their support.

REFERENCES

Kunlapapuk S., Kulabtong S. & Nonpayom C., 2012. Two new records of freshwater fishes (Cypriniformes, Balitoridae and Atheriniformes, Phallostethidae) from Thailand. Biodiversity Journal, 3: 119–122.

- Myers G.S., 1928. The systematic position of the phallostethid fishes, with diagnosis of a new genus from Siam. American Museum Novitates, 295: 1–12.
- Myers G.S., 1937. Notes on phallostethid fishes. Proceedings of the United States National Museum, 84: 137–143.
- Parenti L.R., 1984. On the relationships of phallostethid fishes (Atherinomorpha), with notes on the anatomy of *Phallostethus dunckeri* Regan, 1913. American

Museum Novitates, 2779: 1–12.

- Parenti L.R., 1989. A phylogenetic revision of the phallostethid fishes (Atherinomorpha, Phallostethidae).
 Proceedings of the California Academy of Sciences, 46: 243–277.
- Suksri S., Kulabtong S., Wittayanupakorn S., Nonpayom C. & Thonghul S., 2015. Three new records of freshwater fishes (Cypriniformes, Cyprinidae, Atheriniformes Phallostethidae and Perciformes Osphronemidae) from Thailand. Biodiversity Journal, 6: 593–596.