



New Locality Records for the Indian Egg-eating Snake (*Elachistodon westermanni*) and the Stout Sandsnake (Psammophis longifrons) in Karnataka, India

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The Indian Egg-eating Snake (Elachistodon wester*manni*) occurs in Bangladesh, Nepal, and the Indian states of Bihar, West Bengal, Uttarakhand, Maharashtra, Gujarat, Punjab, Madhya Pradesh, Rajasthan, Telangana, and Karnataka (Reinhardt 1863; Blanford 1875; Wall 1913; Fleming and Fleming 1974; Sharma 2003, 2014; Captain et al. 2005; Vyas 2013; Visvanathan 2015; Khandal et al. 2016; Bilaskar et al. 2018). The only record from the state of Karnataka is a single road-killed specimen found in Gonur Village, Chitradurga District (Bilaskar et al. 2018). The Stout Sandsnake (Psammophis longifrons) has been recorded from the Indian states of Gujarat, Maharashtra, Madhya Pradesh, Telangana, Andhra Pradesh, and Karnataka (Smith 1943; Ingle 2009; Vyas and Patel 2013; Premkumar and Sharma 2017; Visvanathan et al. 2017; Hussain et al. 2020). Like E. westermanni, P. longifrons is represented by only a single published record in Karnataka; a road-killed specimen from Shikaripur, Shivamogga District (Premkumar and Sharma 2017).

While conducting field surveys in Tumkur District, Karnataka, we found one specimen each of Elachistodon westermanni, and Psammophis longifrons on the same stretch of road outside the Chinkara Wildlife Sanctuary near Bukkapatna, Karnataka, India (13°37'11"N, 76°41'4"E). The landscape of that region is dominated by natural desert thorn forests and grasslands with interspersed crop fields, mainly coconut and areca nut plantations. Our E. westermanni record lies approximately 80 km (aerial distance) south of the Bilaskar et al. (2018) record, and our P. longifrons record is 165 km (aerial distance) southeast of the Premkumar and Sharma (2017) record. These new records represent the southernmost known localities for both species (Fig. 1).

The Indian Egg-eating Snake (Fig. 2), approximately 70 cm in total length, was found alive on a tar road at 2320 h on 2 August 2019 by SG and Akshay Herale, who moved it off the road, photographed, and released it. Because the species is protected under Schedule 1 of the Wildlife Protection Act (1972), we did not take measurements or scale counts. The Stout Sandsnake (Fig. 3) (SVL = 458 mm) was found dead on the same road by YK and SG at 1440 h on 4 September 2020. Much of the tail had been destroyed so we were unable to determine total length or subcaudal scale count. Photographic vouchers were deposited in the Illinois Natural History Survey (INHS) Digital Image Collection: E. westermanni (INHS 2021b) and P. longifrons (INHS 2021c). The

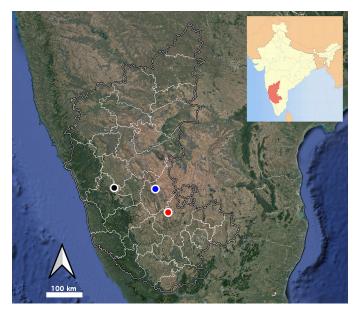


Fig. 1. Map of the districts in Karnataka, India, showing locations of the previous state record of the Indian Egg-eating Snake (Elachistodon westermanni) at Gonur, Chitradurga District (Bilaskar et al. 2018) (blue dot); the previous state record of the Stout Sandsnake (Psammophis longifrons) at Shikaripur, Shivamogga District (Premkumar and Sharma 2017) (black dot); and both new records from this study at Bukkapatna, Tumkur District (red dot).



Fig. 2. An Indian Egg-eating Snake (*Elachistodon westermanni*) (left) found alive and a Stout Sandsnake (*Psammophis longifrons*) (right) found dead on a road in Bukkapatna, Tumkur District, Karnataka, India. Photographs by Sachin Gowda (left) and Yatin Kalki (right).

identities of these snakes were confirmed from photographs by Zeeshan A. Mirza.

Although infrequently encountered, both Elachistodon westermanni and Psammophis longifrons appear to have more extensive distributions than previously thought. Most locality records for these species have surfaced in the last decade after more than a century with few reports. We suspect that the known ranges of these two species will continue to expand in coming years with additional locality reports. The Indian Egg-eating Snake was considered nearly extinct, but now is known from more than 100 published and unpublished records (Mohan et al. 2018) and the protected status of the species can be utilized to help conserve and protect its habitat. Road crossing was the greatest source of mortality for E. westermanni (Dandge and Tiple 2016) and many roads that pass through its habitat in Karnataka are being widened (pers. obs.). Although neither of these species appear to be as rare as previously thought, we must ensure that their populations remain stable in the long run by implementing effective conservation measures.

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Literature Cited

- Bilaskar, M., S. Babu, H.N. Kumara, and H. Parengal. 2018. First record of the Indian Egg–eater, *Elachistodon westermanni* Reinhardt, 1863, from Karnataka, India. *Herpetozoa* 31: 108–110.
- Blanford, W.T. 1875. Note on Elachistodon westermanni, Platyceps semifasciatus, and Ablepharus pusillus and Blepharosteres agilis. Journal of the Asiatic Society of Bengal 44: 207–209.
- Captain, A., F. Tillack, A. Gumprecht, and P. Dandge. 2005. First record of *Elachistodon westermanni* Reinhardt, 1863 (Serpentes, Colubridae, Colubrinae) from Maharashtra State, India. *Russian Journal of Herpetology* 12:

121-123. https://doi.org/10.30906/1026-2296-2005-12-2-156-158.

- Dandge, P.H. and A.D. Tiple. 2016. Notes on natural history, new distribution records and threats of Indian Egg Eater Snake *Elachistodon westermanni* Reinhardt, 1863 (Serpentes: Colubridae): Implications for conservation. *Russian Journal of Herpetology* 23: 55–62. DOI: 1026-2296/2016/2301-0055.
- Fleming, R.L., Jr. and R.L. Fleming, Sr. 1974. Some snakes from Nepal. Journal of the Bombay Natural History Society 70: 426–437.
- Hussain, S., B.L. Narayana, G.C. Kumar, L. Srinivas, and B. Mahesh. 2020. Additional locality record and note on breeding of Stout Sand Snake *Psammophis longifrons* Boulenger, 1890 (Reptilia, Squamata) from the Eastern Ghats, Andhra Pradesh, India. *Herpetology Notes* 13: 769–772.
- Ingle, M. 2009. First locality record of stout sand snake *Psammophis longifrons* Boulenger, 1890 from Ujjain District, Madhya Pradesh. *Cobra* 3: 12–13.
- Khandal, D., Y.K. Sahu, and V. Sharma. 2016. New record of *Elachistodon wester-manni* Reinhardt, 1863 (Serpentes, Colubridae) for Rajasthan State, India. *Russian Journal of Herpetology* 23: 249–252. DOI: 1026-2296/2016/2304-0249.
- Mohan, A.V., A.C. Visvanathan, and K. Vasudevan. 2018. Phylogeny and conservation status of the Indian egg–eater snake *Elachistodon westermanni* Reinhardt, 1863 (Serpentes, Colubridae). *Amphibia–Reptilia* 2018: 1–8. DOI: 10.1163/15685381-17000201
- Premkumar, S. and V. Sharma. 2017. Geographic distribution. Psammophis longifrons (Stocky Sand Racer). Herpetological Review 48: 131.
- Reinhardt, J. 1863. Om en ny Slaegt af Slangefamilien Rhincodontidae [On a new genus of the snake family Rhincodontidae]. *Oversigt over det Kongelige Danske videnskabernes selskabs forhandlinger* 1863: 198–210.
- Sharma, R.C. 2003. *Handbook of Indian Snakes*. Zoological Survey of India, Kolkata, India.
- Sharma, V. 2014. On the distribution of *Elachistodon westermanni* Reinhardt, 1863 (Serpentes, Colubridae). *Russian Journal of Herpetology* 21: 161–165. DOI: 1026-2296/2014/2103-0161.
- Smith, M.A. 1943. The Fauna of British India, Including the Whole of the Indo-Chinese Sub-region. Reptilia and Amphibia, Vol. 3: Serpentes. Taylor and Francis, London, United Kingdom.
- Visvanathan, A. 2015. Natural history notes on *Elachistodon westermanni* Reinhardt 1863. *Hamadryad* 37: 132–136.
- Visvanathan, A.C., S. Anne, and A.K. Kolli. 2017. New locality records of the stout sand snake *Psammophis longifrons* Boulenger, 1890 (Reptilia: Squamata: Lamprophiidae) in Telangana, India. *Journal of Threatened Taxa* 9: 10968– 10970. https://doi.org/10.11609/jott.3449.9.11.10968-10970.
- Vyas, R. 2013. Notes and comments on the distribution of a snake: Indian Egg Eater (*Elachistodon westermanni*). *Russain Journal of Herpetology* 20: 39–42. https://doi.org/10.30906/1026-2296-2013-20-1-39-42.
- Vyas, R. and H. Patel. 2013. Notes on distribution and natural history of *Psammophis longifrons* Boulenger 1896 (Serpentes: Psammophiidae: Psammophiinae) in Gujarat, India. *Russian Journal of Herpetology* 20: 217– 222. DOI: 1026-2296/2013/2003-0217.
- Wall, F. 1913. A rare snake Elachistodon westermanni from the Jalpaiguri District. Journal of the Bombay Natural History Society 22: 400–401.