NOTES

Documented occurrence of *Taphozous mauritianus* (E. Geoffroy, 1818) in Mayotte (Comoros Archipelago)

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The genus Taphozous (Emballonuridae) is widely distributed in Africa as well as in southwestern Indian Ocean islands and composed of 14 species (Simmons, 2005). In the southwestern Indian Ocean region, specifically in Madagascar, Mauritius, the Seychelles, and La Réunion, only one species, T. mauritianus has been recorded (Cheke & Dahl, 1981; Peterson et al., 1995; Hutson, 2004; O'Brien, 2011). On Madagascar and Mauritius, this species was recorded roosting on vertical surfaces (rocks, trees, and walls) during the day (Cheke & Dahl, 1981; Goodman & Ramasindrazana, 2013). Surprisingly, there are no records of captured individuals of this species from the Comoros Archipelago. The only documented occurrence of this species in this island group is from Mayotte, the southern most island in this archipelago, and based on cranial remains found in regurgitated barn owl, Tyto alba, pellets (Louette et al., 2004). A recent review of the bat fauna of the Comoros Archipelago, including Mayotte, did not reveal any additional information on the species (Goodman et al., 2010).

From 24 November to 13 December 2014, we undertook fieldwork on Mayotte to compile information on the local bat fauna and to collect samples (anal and buccal swabs, blood droplets, and urine) for epidemiological surveys. On the evening

of 30 November, at around 5:00 p.m., we observed an individual of *T. mauritianus* roosting head-down, about 10 m from the ground, on the trunk of a palm tree at Mamoudzou (12°47'10.38"S, 45°13'22.32"E) (Figure 1). A 6 m mist net was installed on the roof of a nearby building and two individuals of *T. mauritianus* were captured at dawn around 05:30 a.m. (Figures 2 A and B). The forearm length (FA) and body mass (WT) of these two individuals, which were subsequently released, were recorded (Table 1). Additionally, wing punches were also collected for molecular studies. Further investigation on Mayotte over the course of our visit revealed that *T. mauritianus* hunts close to



Figure 1. Individual of *Taphozous mauritianus* in a palm tree (photograph by Beza Ramasindrazana, 2014).

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Figure 2. Photograph of an individual of *Taphozous mauritianus* captured in a mist net in a) ventral and b) dorsal views (photograph by Beza Ramasindrazana, 2014).

Table 1. Morphological characteristics of the twoindividuals of *Taphozous mauritianus* captured inMayotte.

Individual	Sex	Mammae condition	FA (mm)	WT (g)
Individual 1	Female	Nulliparous	61.0	15.1
Individual 2	Female	Parous	62.0	25.3

white lamplight around stadiums. This was observed at four different stadiums: Tsoundzou (12°48'30.4"S, 45°12'9.8"E), Sohoa (12°49'4.0"S, 45°6'26.2"E), Mamoudzou (12°47'9.5"S, 45°13'35.7"E), and Cavani (12°47'3.7"S, 45°13'18.6"E), where two to five individuals were observed in free flight. Additional studies are required to understand the phylogenetic relationship between African and Malagasy Region populations of this species, the holotype of which comes from Mauritius, as well as aspects of its ecology, echolocation calls, and habitat use.

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References

- Cheke, A. S. & Dahl, J. F. 1981. The status of bats on western Indian Ocean islands with special reference to *Pteropus. Mammalia*, 45: 205-238.
- Goodman, S. M. & Ramasindrazana, B. 2013. Bats or the order Chiroptera. In Atlas of selected land vertebrates of Madagascar, S. M. Goodman & M. J. Raherilalao, eds., pp. 169-209. Association Vahatra, Antananarivo.
- Goodman, S. M., Weyeneth, N., Ibrahim, Y., Saïd, I. & Ruedi, M. 2010. A review of the bat fauna of the Comoro Archipelago. *Acta Chiropterologica*, 12: 117-141.
- Hutson, A. M. 2004. The bats of Aldabra Atoll, Seychelles. *Phelsuma*, 12: 126-132.
- Louette, M., Meirte, D. & Jocqué, R. 2004. La faune terrestre de l'archipel des Comores. Musée Royal de l'Afrique Centrale, Tervuren.
- **O'Brien, J. 2011.** Bats of the western Indian Ocean islands. *Animals,* 1: 259-290.
- Peterson, R. L., Eger, J. L. & Mitchell, L. 1995. *Chiroptères. Faune de Madagascar.* Muséum national d'Histoire naturelle, Paris.
- Simmons, N. B. 2005. Order Chiroptera. In Mammal species of the World: A taxonomic and geographic reference, D.
 E. Wilson & D. M. Reeder, eds. 3rd edition, pp. 312-529. Johns Hopkins University Press, Baltimore.