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NATURAL HISTORY NOTE

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Attempted predation of a chameleon *Chamaeleo gracilis* by Blanding's tree snake *Toxicodryas blandingii*

JAMES KATONGOLE[1], MATHIAS BEHANGANA[2,3,4] & LUCA LUISELLI[4,5,6*]

[1]Budongo Ecolodge, PO Box 33024, Kampala, Uganda
[2]Nature Uganda, PO Box 27034, Kampala, Uganda
[3]NICE-Planet Uganda Ltd, PO Box 11942, Kampala, Uganda
[4]Institute for Development, Ecology, Conservation and Cooperation, via G. Tomasi di Lampedusa 33 - 00144 Rome, Italy
[5]Department of Applied and Environmental Biology, Rivers State University of Science and Technology, PMB 5080, Port Harcourt, Nigeria
[6]Département de Zoologie et Biologie Animale, Faculté des Sciences, Université de Lomé, BP 1515, Lomé, Togo

[*]Corresponding author e-mails: l.luiselli@ideccngo.org; lucamaria.luiselli@uniroma3.it

Blanding's tree snake *Toxicodryas blandingii* is a nocturnal, rear-fanged, venomous and largely arboreal snake that has been recorded 20 m above the forest floor (e.g. Pitman, 1974). Its prey may include frogs, chameleons and other arboreal lizards, rodents and bats (e.g. Cansdale, 1961; Menzies, 1966; Wickler & Uhrig, 1969; Luiselli et al., 1998) but interestingly a quantitative study in southern Nigeria has shown that it undergoes an ontogenetic dietary change (Luiselli et al., 1998) with juveniles feeding only on lizards (Scincidae, Agamidae, Chamaeleonidae) of appropriate size, subadult stages adopting a wider diet, and adults eating mainly birds and mammals. Here we report a case of attempted predation by a juvenile Blanding's tree snake of a chameleon *Chamaeleo gracilis*. It should be noted that in this case we are using the traditional classification of the *T. blandingii* complex, although a recent article suggests that *T. blandingii* occurs only west of the confluence of the Congo and Ubangi rivers (Greenbaum et al., 2021), while our observation was made to the east.

On 24 October 2023 at 21:03 h in the Kaniyo Pabidi, Budongo forest, Uganda (0°.20018' N, 31°.71941' E) researchers observed a young Blanding's tree snake (determined by the juvenile colouration pattern) that was holding and biting a slender chameleon *C. gracilis* above the rear legs. Meanwhile, the chameleon was also fighting hard, opening its mouth wide and using its legs to turn. At an advantaged angle, the chameleon was able to detach itself from the snake's jaws and grasp the nape of the snake's neck in its own jaws for more than five minutes (Fig. 1) before releasing the snake, which then moved off deep into the bushes. The chameleon had a dark patch on its flank where it had been grasped by the snake suggesting that this may be the site of envenomation, assuming the chameleon had been envenomed. The next morning, we revisited the battleground, the snake was not visible but the chameleon was found dead with ants already feeding on its body (Fig. 2).

Our sighting confirms that lizards are food for juvenile Blanding's tree snakes. It also shows that once the snake had abandoned its prey it did not return to swallow it, despite having envenomed it (unlike terrestrial vipers that would be expected to seek out their envenomed prey). We speculate that the failure to return could have been due either to the trauma suffered by the snake or, perhaps more likely, the interruption of a behavioural sequence where venomous, rear fanged, arboreal snakes would normally hold their prey in their mouths, wait for the prey to die, and then swallow it.

Figure 1. A *Chamaeleo gracilis* biting a juvenile *Toxicodryas blandingii* that had attempted to prey upon it, red arrow indicates a dark patch where the snake had been holding the chameleon in its jaws

Figure 2. The dead *Chamaeleo gracilis* observed a few hours after the attempted predation event

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