

# **Biodiversity Observations**

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### WATER THICK-KNEES DETERRING A WATER MONITOR

Elsa Bussière and Matthew Wijers

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# WATER THICK-KNEES DETERRING A WATER MONITOR

Elsa Bussière<sup>1</sup>\* and Matthew Wijers<sup>2</sup>

<sup>1</sup>Animal Demography Unit, Department of Zoology, University of Cape Town, Rondebosch, 7701, South Africa <sup>2</sup>Department of Conservation Ecology, University of Stellenbosch, 7602, South Africa

\*Corresponding author: elsabussiere@gmail.com

On 18 May 2015, around 18:00, four terrestrial waders with short, stout bill, cryptic plumage and long, yellow legs were observed near the ablution blocks of the Nyamepi campsite, at Mana Pools National Park in northern Zimbabwe (S15°43.190' E29°21.844'). The characteristic grey wing panel visible at rest and in flight, as well as the close proximity of a water body, allowed us to identify the birds as Water Thick-knees *Burhinus vermiculatus*. The Zambezi River is flowing a few meters away of the spot where the observations were made.

On 19 May 2015, an infra-red camera trap (automated digital camera that gets triggered as soon as an animal is detected by the infra-red sensor) was tied to a tree, thirty centimetres above the ground. The tree was at the interface between land and water, close to the braai area of campsite no 1. One meter away from the camera trap, an animal path going through the grass on the sloppy ground and continuing through the weed on the riverbank was visible. The camera was set to take thirty second-long videos; it operated day and night for 72 hours.

Chacma Baboon Papio ursinus and Vervet Monkey Chlorocebus



**Fig 1** – A Water Thick-knee on the Zambezi shoreline, Zimbabwe. Photographed on a different occasion.

*pygerythrus* troops triggered the camera on several occasions when investigating the braai area. A Spotted Hyena Crocuta crocuta was recorded as well during the night of 20 May 2015, at 22:58.

On 21 May 2015, between 08:22 and 08:26, three videos were recorded. They showed Water Thick-knees using an open-winged display to deter a Water Monitor *Varanus niloticus*. The footage can be seen here <u>link to the video</u>

Video no 1: Three Water thick-knees are visible but only one uses the open-winged display, the water monitor is out of frame. The fourth thick-knee appears at the very end of the video clip.



Video no 2: The four Thick-knees show the open-winged display, but the Water Monitor is still not visible.

Video no 3: The Thick-knees are surrounding the water monitor. During the first seconds one can only see the tail of the reptile. It will re-appear again 26 s into the video clip.

By using the open-winged display, the Thick-knees are probably trying to keep the water monitor close to the water and away from their inland territory. Water Monitors often feed on bird eggs and are here perceived as a predator by the Water Thick-knees, even though this observation was done outside the breeding season. Egg laying has been recorded in Zimbabwe from August-January with a September-October peak (Irwin 1981).

The open-winged display is a technique used by birds to deter predators. The spread wings make the bird look bigger and the aposematic colouration on the inside feathers is a warning signal (Carnaby 2010).

The Water Monitor does not appear to be too bothered by the waders; however it seems that it will not venture further inland due to the bird behaviour.

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the most spectacular places that Zimbabwe has to offer.

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