

A breeding record of the Silvery-cheeked Hornbill *Bycanistes brevis* in central Kenya

The Silvery-cheeked Hornbill *Bycanistes brevis* has a range extending from Eritrea to South Africa (Lewis & Pomeroy 1998) and is considered a species of Least Concern (BirdLife International 2017). It is a locally common bird inhabiting highland forests, woodlands and gardens of central and coastal Tanzania and eastern Kenya (Stevenson & Fanshawe 2002). Although conspicuous in nature, there is only one documented breeding record of the species in Kenya, from Molo town in Nakuru County in October 1978 (Lewis & Pomeroy 1998) and this record is not considered very accurate (Lewis 1994). Given the lack of subsequent nesting records for this species in Kenya, we share some observations of a male Silvery-cheeked Hornbill recently observed delivering food to an active nest in east-central Kenya.

Field Observations

MW first reported the nest site on 12 October 2017 at 1970m on Nyeri Hill (0°24' S, 36°54' E) while birding near Mathari Hospital. He observed a male hornbill collecting foodstuffs, which led him to the nesting site. The nest was approximately 3.5m above the ground in a cavity of a 20-m tall *Albizia* sp. less than 15m from a moderately busy tarmacked road in a lightly wooded agricultural area. The cavity entrance was approximately 20cm in diameter and was positioned where a limb had once branched from the trunk. The feeding slit extended the vertical length of the fully mud-plastered hole, measuring approximately 4 to 6cm at its widest point. The male was photographed passing food through the feeding slit to his walled-in mate. On 12 November 2017 at 15:30, DG, SC and BM made an additional observation of the nest site. During this observation, a male hornbill appeared at the nest within 5min and began regurgitating small, round food items and placing his bill into the nest opening. This behaviour continued every 10 to 20s over the following 2 to 3min before the bird flew off over the farmland. The male made no vocalizations while perched on top of the nesting cavity. Because of the background noise in the vicinity, the observers couldn't be sure whether the nest contained young or only a female, and the male was not seen again.

MW made a subsequent visit on 22 November 2017 and the male was observed bringing food back to the nest and passing it through the mud slit. MW also reported hearing young inside the cavity begging for food. MW last visited the site on 13 February 2018. The walled entrance to the cavity was missing and the nest was empty.



Figure 1. Male Silvery-cheeked Hornbill *Bycanistes brevis* regurgitating food above the nesting cavity, Nyeri Hill, 12 November 2017 (photo: D. Guarnieri).

Discussion

In a study of Silvery-cheeked Hornbills from the East Usambara Mountains in Tanzania, females usually entered the nest and laid eggs in October and emerged between 107 and 120 days later with fledged young (Moreau &

Moreau 1941). Based on the dates of our observations in Nyeri, we believe the female was walled in and laid eggs in late September or early October. During the forty-day incubation period for the eggs (Moreau & Moreau 1941), the male was probably feeding the female in October and later the offspring in November. We would estimate the female exiting the cavity with fledged young in late January or early February 2018. This also fits well with the timing of the Molo breeding record with the birds nesting in October and departing before March.

Lewis (1994) puts forward a number of theories to explain the lack of breeding records in Kenya for this species: 1) the birds are extremely secretive in their breeding habits, 2) they breed in little known areas of Kenya, 3) they migrate out of the country to breed or, 4) the birds breed in Kenya, but no one reports this behaviour. Our observations suggest that Silvery-cheeked Hornbills are not necessarily secretive nesters. Despite their size, suitably large trees can be found within forested and lightly wooded areas across its range in central Kenya, so lack of suitable nesting sites would not explain the overall paucity of records, historical as well as recent. Given the number of active observers over this range, we think it is reasonable to conclude that breeding is a relatively rare occurrence in Kenya.

Exactly why this is the case remains unclear. The only reported successful nesting sites are from the wettest parts of the Central highlands, Molo and Nyeri, which is consistent with a possible climatic explanation for the lack of records. If successful breeding requires consistently wet conditions over a period of at least three months, from the time that nest-building material becomes available until the young are fully fledged, even these reported sites in Central Kenya must be somewhat marginal. A comparison of rainfall records for a larger data set that includes further confirmed nesting sites in both Tanzania and Kenya would be a useful next step towards shedding light on this curious phenomenon.

References

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