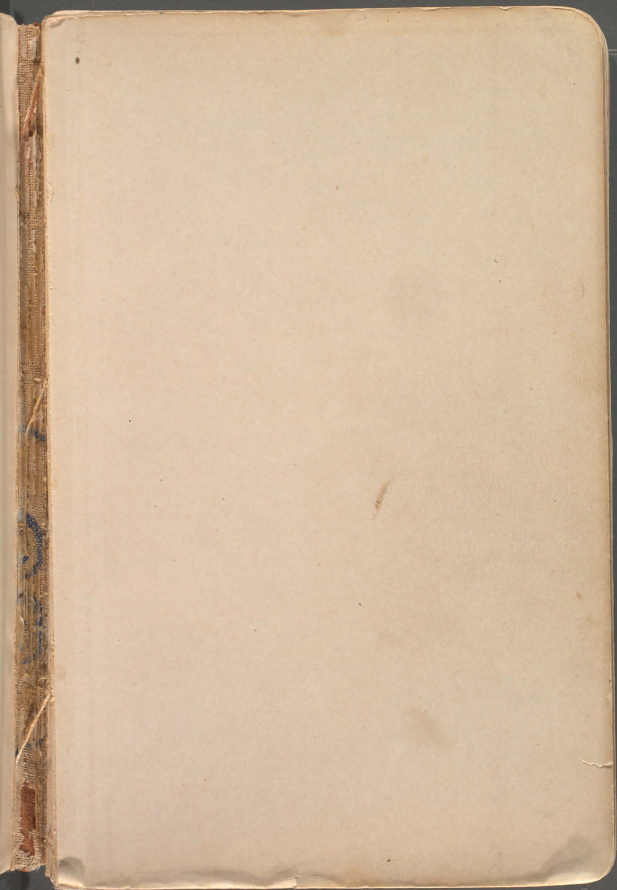


4522 -- 4877

BIRDS



Paradije
Feb 19. 1913

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Faradje
Feb. 19. 1913

p761.

4522. Harrier (*C. aeruginosus*) ♂. t. n. e.
Irides light chrome-yellow. Crop and
stomach contained remains of 5 or
6 eggs of small birds, ^(containing embryos) and hair and
bones of a mouse ⁴⁴. These eggs were
blue (unspotted), almost certainly
of weavers like No. 4478, but there
were also whitish egg-shells with
dark spots.

4523. Kingfisher (*C. rudis*) in alcohol.
Feb. 20.

4524. Long-tailed ^{Hedydipna plicata} Sunbird. ♂. t. e.

4525. Mate of 4524. ♀. o. e.

This pair of sunbirds was secured
between Asibara and Piäga, on the
road from Faradje to Dúngu. Along
this portion of the route they are
rather common. The female was
carrying a little vegetable down in
her beak, but the nest could not
be found.

A few miles further on, however,
a nest of this species was hanging
from a bare branch of a small
thorny acacia, a dozen feet above
the ground, only a couple of yards

Paradise

Feb. 20. 1913

from the path. It was of course a small oval porch (10 cm from top to bottom), with lateral opening, composed mainly of fine strips of vegetable matter, bound together with silk (of caterpillars), and lined with plant down, a quantity of caterpillar-excrement, and 2 cocoons ornamenting its exterior surface. This nest was empty as yet, but its owners were in the vicinity, the male drooping his wings and raising his tail.

I cannot remember ever to have heard the voice of this species.

4526. White-rumped Swift (Cypselus)

♂. testes much enlarged. affinis

4527. Same as above. ♂. testes slightly enlarged. C. affinis

4528. Same as above. ♀. o. e.

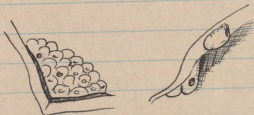
4529. C. affinis ... in alcohol.

This afternoon I went to visit the rocky hill one sees from the road near Piaggia. (or Piagga) (close to R. Ganqu)

Paradise

Feb. 20. 1913.

There proved to be several hills,
or rather great rocks, of no great
height (perhaps ²⁰⁰180 ft) but with
some of the typical rock-birds
and also and other hill-plants.



Besides 3 rock-goatsuckers and
the same number of rock-thrushes
we saw one of the rufous rock-
falcons, like no. 3582 ^{Cerchoneis alex.} and heard
the little orange-crowned barbet
(no. 4558.) "coh-ok"-ing in the
neighborhood.

One end of the main rock
overhangs its base considerably,
furnishing a safe shelter where
a number of these swifts had
built their nests. Beneath an
almost horizontal surface of the

Paradise

Feb. 20. 1913

rock, sheltered a little — it is true — on two sides, but in plain view from below, they had glued a whole slab of nests, which appeared to be rather old, for its edges were beginning to warp away from the rock. Lower down, in a more or less vertical crack, a few newer-looking nests had also been built. From my former experience, at Dungle and Vanherckhovenville, I believe the nests are usually placed in slits or cavities (^{no - the other swifts were} Micropus streptotis gpc)

During the afternoon a few of the swifts could be seen flying about the spot, sometimes venturing into their nests; but at sundown 25 or 30 of them collected, and circled about preparatory to going to roost. Singly or two at a time they would swoop in, and disappear immediately inside. Tho practically silent during

Paradise

Feb. 20. 1913.

the day, they could now be heard to utter "churr"-ing notes, but not loud. Some came to roost in the newer, lower nests, but a greater number entered the old upper colony. At times one would find his chosen place already occupied; then with a short note of defiance it dropped from the nests and flew off, to return later.

These nests, a few of which we afterwards knocked down with a long stick, were very firmly attached, and were constructed of bits of grass, ^{plant-down} and feathers (especially of green pigeons and the swifts themselves) held together with saliva. The building in a sort of hammock-shape, these swifts seem to take advantage of protecting rocks or the walls of adjoining nests so as to close the nest almost entirely, often only a small hole remaining

Faradje
Feb. 20. 1913.

open. Of such a tough nature are they that the shot of the auxiliary seemed scarcely to penetrate, and even a couple of loads of buckshot failed to dislodge a single portion of the upper group of nests. Added to the toughness of the birds themselves, this fact made it rather difficult to secure specimens by shooting into the nests.

The condition of the genital organs would indicate that the breeding season was in progress, but in those nests torn down there was no sign of eggs or young.

(Or smaller white-rumped ones)
These swifts are occasionally seen far from hills (as at Faradje, Aug. 20. '12. Nazem, Feb. 23. '13) and I believe often go far from the hills to feed, but usually fly so high as to be unnoticed.

Faradje
Feb. 21.

4530

Feb. 21.

4531

Paradji (Piäga)

Feb. 20. 1913

Thamnolaea sp.

4530. Rock Thrush. ♀. o.e. Stomach contents
insect-remains. From the hill at

Piäga.

Feb. 21. (Piäga - Gangara) *Sangeria* or *Bodjo*

4531. Spotted Papyrus-Bird. ♂. t. e.

Bradypterus calophis.

Note the two curious sacs, one
under each wing, containing
yellowish waxy matter. They
were broken at the ends as tho
the bird itself had pecked them
open. This disease seems not
to have affected its spirits, as
it was shot in the early morn-
ing while "singing" energetically.
The chirps of which the performance
is composed have a resonance
that is almost metallic.

We had set out from the
rest-house about 2 am. and
were crossing a country intersected
with numerous papyrus swamps.
Just before the first gleam of
day appeared in the east three
birds began to call with vigor,
continuing till 6.30 or 7 o'clock.
The large papyrus birds ^(*Coleonychia*) began
considerably later.

Dungu (Bangara - Libadu)

Feb. 22, 1913

4532. Kingfisher (Alcedo [†]) guentheri ♂. t. n. e. [im.]

Iris dark brown, bill black, feet orange-red with black claws.

Stomach contents: a small fish.

Found on the wooded bank of the Dungu R. just below "Bangara na Bodjo." I have never seen it anywhere further east, nor during 5 days spent on the Uele from Dungu to Niangara did I notice a single example. So far as I know it is a forest bird.

4533. Cuckoo. ♀. o. n. e. Iris very light brown, rim of eyelids and corners of mouth yellow; maxilla black, with a little light-greenish at sides, basally; mandible dull light-greenish, with blackish tip, feet bright yellow.

4534. Hawk (Bubo [†]) mini ? ♂. t. n. e. Iris cadmium-yellow, cere and corners of mouth chrome-yellow, bill-black, with a little whitish at base of mandible, feet light cadmium yellow, claws black.

Dungu.

Feb. 22. 1913.

Certainly not common, I have seen 1 or 2 others - I believe - during dry season.

The stomach of this example contained many grasshoppers and 2 caterpillars; the very weak feet would lead one to expect insectivorous habits.

4535. Roller (Coracias) ♂. t. n. e. algeriensis.

Stomach contents: remains of grasshoppers. Call a hoarse rasping "k-h-k-k-k-k-k-k."

Feb. 23. (Libadu-naguru)

4536. Harrier. ♂. t. n. e. Iris chrome-yellow.

Circus macrourus

Stomach contents: feathers of a small bird.

4537. Rail (Sarothra pulchra) ♂. testes slightly enlarged. Shot in a strip of damp woods, where it was walking on the ground close to a small brook.

4538. ^{Ptychocheilus turdinus} Brown-backed thrush-like bird (Timeliidae)

5.3050.

♂. testes slightly enlarged. Iris rather light brown, bill light grayish-blue, shading to blackish on base of maxilla; feet & claws very pale flesh color. Stomach

Dungu

Feb. 23. 1913.

contents: insects.

4539. Same as preceding. ♀. ovary slightly enlarged. Iris rather light brown. Stomach contents: a grasshopper and remains of other insects.

4540. Same as preceding. ♀ im. Iris very dark brownish-gray, bill mainly brownish-black, but dull yellowish green along edges of both mandibles and on base of lower; feet very pale flesh-color.

As already noted, these birds inhabit damp woods, at Mondjan, Vanherckhovenville, the whole region of Dungu, etc. At break of day their loud, disconnected whistles, "whiu-yu" or "hiu-yu", delivered in 2 or 3 different keeps are characteristic of such places. They live in pairs or small parties in the undergrowth, only the male giving these loud notes, but at a short distance low clucking notes may also be heard. It is only in the very early morning that they are very noisy, tho they not infrequently call towards

Dungu
Feb. 23.

4541-
ma

Feb. 24 (C)
4542-
Cere

4543.

Feb. 23.
4544.

Feb. 22.
4545.

Dungu

Feb. 23. 1913.

sundown; but during the day they are practically silent.

4541. Swift. ♀. ovary slightly enlarged.

Micropteryx apus.

First example seen this year; but ^{as usual} in March (at Niangara) they became common.

Feb. 24 (Nageru-Dungu)

4542. Kestrel. ♂. t. n.e. Stomach contents.

Certhia t. tinnunculus.

remains of grasshoppers.

Tricholaima pulchellum

4543. Barbet. ♂. testes slightly enlarged.

Stomach contents: berries. Was sitting on a leafless tree near a wooded water-course. The feathers of the breast, somewhat expanded, showed their long hair-like tips. From time to time the bird uttered a single low "coo".

Feb. 23

4544. ^{Warbler} Warbler. ♀ imm.

Feb. 22. (Bangara)

4545. Kite (Milvus) ♀ juv.

This single downy nestling occupied a rather flat nest of dry sticks about 2½ ft wide, placed on the branches of a tree on the bank of the Dungu, about 20 ft. above the water. The lining of the nest, the containing a few dry leaves and other vegetable

Dingy

Feb. 22. 1913.

matter, consisted mainly of the dry excrement of hyenas, some composed of matted fur, some in hard limy lumps. There were also some excrement of waterbuck and hard lumps of dark gray clay. 2 small pellets were also noticed, that had evidently been ejected by the young bird, for it threw up a couple more during the three days I kept it alive. Needless to say both nest and nestling had a most disgusting odor. The young bite made a squeaky chirping sound.

A second nest, ^{found the same day,} *similarly placed in a tree leaning out over the water, was covered above with matted hair (from mammal faeces), a little soft vegetable material, bits of dry clay, and dry excrement of hyena, elephant and wart-hog, as well as that of some small carnivore, perhaps a serval. On this nest also lay a single white feathery tip of the grass known as

Dungu

Feb. 22, 1913.

(*Imperata cylindrica*)

"suli", which could not have come there by accident. The contents of this nest were 2 bluish-white eggs, (52 x 41 mm.) rather soiled, one with only a few scattered brown spots, the other spotted with brown on the smaller end. 4545a

In both cases an old bird was on the nest, but flew off at the approach of our canoe, and displayed but little anxiety afterwards, one even sitting quietly on a tree across the river.

4545b On Feb. 16, 1913. I collected a set of 2 eggs of the kite, along the Dungu below Faradje. They measured 53 x 43 mm. and 50 x 41, the larger egg being rather sparsely spotted and scrawled with dark brown, the smaller one with rather light rufous, the ground-color of both being bluish-white. It is worth noting that the inner surface of the egg-shell is light greenish-blue. This nest was placed in a tree leaning out over the river, at a height of 20 ft

measuring 2 ft. 3 in across, and composed of dry sticks, none larger than my little finger. Above it was rather flat, and lined in the middle with rootlets, other soft vegetable material and fur of mammals (mice?), mixed with powdered clay, a few dry lumps of light gray clay, one 2 inches in diameter, laying on top of the nest. The old bird deserted her eggs readily, sitting peacefully on a dead tree in the distance.

It is interesting that as long ago as Dec 6. 1912 I had seen this nest, practically finished, with the owner sitting beside it, tho from the appearance of all the hite's nests examined it is clear that they build anew each season.

On Feb. 20th, near Faradje, a hite was observed sitting on a nest placed at a height of 40 or 50 feet in a large tree in a wooded swamp.

4545 c.

On Mar. 2. 1913. another set of

2 eggs was taken from a nest in a tree on the bank of the Vele, below Dungen. The nest, of size and shape already described, was lined with hair from excrement of carnivores, pieces of hyena droppings, and half a dozen lumps of clay, $1\frac{1}{2}$ - 2 inches thru. The eggs measured 52×41 mm., and 49×41 mm., ~~the~~ and were dull bluish white, with scattered spots of brown, darker in the larger egg, lighter in the smaller.

Compared to the number of hites present in the dry season, the number of nests is extremely small. However the ^{proportion} of immature birds is very great; and these two facts suggest that these hites may breed somewhere else at another season. Certainly they are more or less migratory, for the abundant from November till late May, hites are almost entirely absent during the rainy season, and when seen during June to ^{early} August, are usually in

At Montague in 1929, almost steadily in the latter part of May at Onondaga. Little are occasionally seen in Aug, Sept, etc., but not the more common in dry season - probably even less so.

flocks, numbering sometimes 100,

It seems strange that Woomam,
at Mt. Ruwenzori, in March &
August, saw them flying northward

Several Europeans have assured me that in the open country of the Kasai & Maniema, S. of the equator, these lites are abundant in the dry season, especially when the grass is being burned; the De Cock, at Nianguwe did not notice any seasonal variation in their numbers, nor ever finds them very numerous.

They were seen occasionally at Stanleysville, Oct. & Nov. 1914, but none at Bona in Jan. '15.

Dungen

Feb. 27

4546. Small Hawk. ♂. testes slightly enlarged
Aster sphenurus

Aster sphaeroides

Stomach contents: remains of a small

~~_____~~ ? bird.

Feb. 28

4547. Gray Cuckoo. ♂. testes slightly enlarged

Stomach contents: caterpillars.

4548. Gray Cuckoo. ♀ ovary much enlarged.

Stomach contents: many hairy caterpillars

Nos. 4547 & 8 were shot in the rubber trees near the post, but not together. The male gave the usual "coo-coo", which we heard frequently along the road from Paradjé. The female uttered a ringing "kip-ip. p.p.p.p.p!" that I had never heard before.

flocks, numbering sometimes 100, and flying in a more or less definite direction, usually southward. At the post of Medje, where they were never very numerous, their numbers varied less at different seasons.

The ordinary call is a ^{protracted} whining whistle somewhat trilled (lasting 1 or 2 seconds), but at times, especially when disputing the ownership of a coveted tit-bit, they produce shorter and less pleasant sounds.

Dungu

Feb. 27.

4546. Small Hawk. ♂. testes slightly enlarged
Aster sphenurus
Stomach contents: remains of a small ~~bird~~ ?bird.

Feb. 28

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Stomach contents: caterpillars.

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Dungu
Mar. 1.

4549

An apple
flocks of 2
on July 8
noted. A
seen red
60 to 80 ft
the ground
much like
flying
cuckoo
another
over the
and the

4553.

not identified
as *Belgian*
will. shot
of 1901

Mar. 2
4554

Dungu

Mar. 1. 1913.

4549. Eagle (Haliaeetus^{voifer}) ♀ ovary slightly

An apparent southward migration of flocks of Milvus aegyptius in the Nile in July & August has already been noted. At Awakuli, in 1914, we observed it again. On Aug 18, a flock of 60 to 80 hites passed over (80 yds or so above the ground) circling round & round, very much like the stork Abdimia, then flying 400 or 500 yards due southward, circling again, and then continuing southward. At 9 A.M. on Aug 21, another flock of 30 was circling high over the station in the same fashion and then flew off to the south (over) ^{had already left near.}

4553. Small Crested Lark, in alcohol.

Mt. Ataranta
on Belgian
wall - deep
of 1908.

From the large hill on the right bank of the Nile below Dungu ^{("Paranta" - See B. Alexandr.} When flushed this little lark often gives its call-note, a weak "chit-chit". I had not heard it till today, when it was in the air, above the ground, gave a "chit" several times. Streak-breasted swallows, larks were the only hill-birds noticed.

Mar. 2.

4554. Kingfisher (Ceryle^{maxima}) ♀. o. v. e.

Dungu

Mar. 1. 1913.

4549. Eagle (Haliaeetus ^{vocifer}) ♀ ovary slightly enlarged. Crop and stomach contained fish.

4550. Jacana ♀ ovary slightly enlarged.
Actophilium africanus.

Was walking on some moss-covered rocks in the Uele. In coming from Dungu to Niangara this was the only specimen noticed.

4551. Heron (Butorides) ♂. testes slightly enlarged.
atricapillus

4552. Kingfisher (Ceryle ^{maxima}) ♀ imm.
Had already left nest.

4553. Small Crested Lark, in alcohol.

mt. Ataranta
on Belgien
wall - shot
of 1908.

From the large hill on the right bank of the Uele below Dungu. ("Paramba") See B. Alexander. When flushed this little lark often gives its call-note, a weak hoarse "chit-chit".

I had never heard a song till today, when one hovering in the air, a few yards from the ground, gave a whistled "twice-twice" several times. Besides a few streak-breasted swallows, 4 of these larks were the only hill-birds noticed.

Mar. 2.

4554. Kingfisher (Ceryle ^{maxima}) ♀. o. v. e.

780
Dungu.
mar. 2. 1913.

4555 Dark Brown Buzzard. ♀. o. n. e.
Buteo rufiventris
Iris dull buff; bill black with bluish
base; cere yellow above, greenish at
sides, corners of mouth yellow; feet
dull chrome yellow, claws yellow.
Stomach contents: pieces of a grass-
hopper.

Found in open brush near Ule.
Certainly not common, tho I believe
I have seen it once at Faradje (Feb. 1913.)

4556. Scopus. ♀. ovary slightly enlarged.
A common bird along the ^{valley below} Dungu,
at least as far as the rapids near
Palamasi's village. Often seen in
pairs, and frequents rocks in the
river during daytime. Silent.

An old nest, as well as live
individuals, were seen near
Bangura's, but only a single
example was ever observed at Faradje,
Oct. 1912.

mar. 1. Alcedo n. lugens

4557. Gray Flycatcher. ♂ t. e. Iris dark brown,
bill black, feet blackish with gray soles.

Dungu

Mar. 3. 1913.

Hylobucco chrysocornis

4558. Small Orange-crowned Barbet. ♂. t. e.

Stomach contents: beetle-remains.

This barbet has been heard at ^{Paga}Alba, Vanherckhoven^{Paga}ville, and about Dungu. The inhabiting dry brush where the trees are fairly dense and high, it seems also fond of the neighborhood of rocky hills. The voice varies greatly, they may call "cok, cok, cok, cok....." or "cok-ok, cok-ok, cok-ok, ..." or "cok-k-k, cok-k-k, cok-k-k,", but the species may always be distinguished by the fact that there is no pause for breath after 4 or more notes, the sounds continue at regular intervals. (See however No 4845.) No 4558 gave the first-mentioned, simple call, but another individual in the neighborhood was giving the 3rd style.

Hyphantornis aurantius (Vieill.)

4559. Weaver. ♂. testes much enlarged.

Stomach contents: fruit.

4560. *Hyphantornis aurantius*. Same as preceding. ♀. o. e. Stomach contents: a caterpillar.

At Faradje, in the dry season, there is a yellow weaver, ^(No. 478)foresting along

Dungu

Mar. 3, 1913.

the river. At Bangara na Bodjo, the we descended the Dungu by canoe for 4 miles or so, I did not notice a single nest (nor bird). Coming down the Nile from Dungu no weavers were noticed nesting till we had passed Palamasio's, but today we saw this species nesting on reeds and drooping branches of bushes on islands. The nests are more carelessly built than those of the species at Faradje; they contain eggs at present. In 2 or 3 places considerable flocks were observed, and on one little island a few pairs of black weavers (*Melanopteryx*) were nesting in company with them. (This oridge weaver was seen occasionally at Niangara - April - June 1913.)

Mar. 4.
4561.

Eagle (*Haliaeetus*) ^{*noctifer*} ♀, ovary slightly enlarged
Stomach contents: fish

These eagles are common along the Nile between Dungu and Niangara, sitting on trees bordering the river, or circling high above, often in pairs, giving their peculiar

At Oadokidi - where it is common along the river, great numbers nested in Aug '13 in a small tree in a bushy place in the reeds, but their breeding season seemed to end about Sept. 30th. The commencement of the following season, however, they had begun again building nests of twigs and fallen twigs sticking up out of the water.

Niangara
Mar 4

Mar. 5.
4563.

4564

Niagara
Mar 4. 1913.

call. In several places the boatmen pointed out their nests, situated generally in high trees near the river-bank, and more or less concealed by foliage. No immature examples were noticed; nor have I ever seen one of these eagles catch a fish.

(*Gypohierax* is rather common along this stretch of the Nile, especially where there are many oil-palms.

One was heard to utter a low, hoarse note. 2 Ospreys were observed as well.)

4562 a. *Alcedo lugens* ♀. o. e.

4562. Kingfisher (*Ceryle ~~maxima~~*) ♀. ovary slightly enlarged. Stomach contents: fish-bones.

Common on the Nile between Dungen

and Niagara, often seen in pairs.

Mar. 5. Nile R. above Niagara

4563. Crocodile Bird. ♂. testes slightly enlarged.

Pluvianus aegyptius.

Stomach contents: remains of insects, and small stones.

4564 Crocodile Bird. ♀. ovary somewhat enlarged. Stomach contents: insect remains and small seeds like *Elaeagnus* ("maki").

This pair of birds, the only ones of

Niagara

Mar. 5. 1913.

their kind seen in coming from Dungen
were on a small sandy islet. One
uttered a low hoarse "chack" several
times.

4565. Crow. ^{Corvus albus} ♀. ovary much enlarged.
Stomach contents: fibres of palm nuts.
One of a pair walking on the river-
bank.

Mar. 8.

4566. Screech Owl. ♀ [Immature]. Iris
Tyto alba affinis
brownish-black, rims of eyelids
blackish, tinged with dark-red, bill
pale grayish-pink; scales on toes
dusky greenish-brown, claws blackish.

Mar. 9.

4567. Screech Owl. ♀ [Immature].
Tyto alba affinis.
Nos. 4566 & 7 roosted in a tree
(not far from the post) whose trunk
and a main limb were hollow,
there being several openings.
Insides were a great number
of pellets, and a piece of egg-shell.
Probably these birds were reared
there.

4568. Gray Owl (Bubo). ♀. ovary slightly
enlarged. ^{cinnereus}

Niagara
Mar. 11

4569.

Mar. 15.
4570.

Niangara
Mar. 11. 1913.

4569. Rock-Thrush (*Monticola*) ♂. t. n. e.
Stomach contents: pieces of a
rather large millipede and remains
of insects.

At sundown, three days ago,
I was much surprised to see one of
these thrushes not far from the
post; but before I could get my gun,
it had disappeared. However one
appeared in the post today at
about noon. Hitherto I had
observed the species only ^{on the hills} at Aba in
Dec. 1911.

Mar. 15.

4570.

Corvus albus
Crow. ♂. t. n. e. Stomach contents:
slight remains of the outer pulp
from palm-nuts. Iris ^{dark-} brown,
bill & feet black.

One of a pair frequently seen
about the post. The "caw" is
hoarse, and not very loud.

At Stanleyville this crow was
common, a number coming to
roost every night in a large
tree in the station. After leaving
there we saw it only once at
Pawa; and here at Niangara.

Niagara
Mar. 16. 1913.

4571. Large light-blue Pigeon. ♂. testes
slightly enlarged. Irides crimson;
orbits dark carmine, bill light blue,
slightly darker at base; feet light blue.
Crop & Stomach contents: green fruits,
swallowed entire, with their stems,
nearly an inch long.

4572. Mate of preceding. ♀. o. e. Crop &
stomach contained green fruits.
Colors of eyes, bill & feet same as in ♂.

A forest-bird, not heard beyond
Libadu on road Dzungu - Faradje.

4573. Sunbird. ^{Anthracoceros collaris hypostictus} ♀ imm.

4574. Warbler. ♂. testes slightly enlarged.

4575. ^{Burmesia reichenowii} Warbler. ♀. o. n. e. Irides dull-red,
bill black; feet brownish-pink.

Mar. 22.

4576. Plantain-Eater (*Muscophaga*). ♀. o. e.
Stomach contents: fruit (about as
large as olives, with large stones).

4577. Duck (*Pteronetta*). ♀. o. n. e. Bill
black with pale grayish-pink marks
above and below; iris dark-brown,
feet dusky-brown tinged with green.

Coming from Dzungu we saw only
a single example, which uttered a
hoarse "kha - kha - kha - kha!";

Niagara
Mar.

Mar.
457

457

Mar.
458

many taken were from
lower portion of intestine.
Some seen fed in
stomach

niagara
mar. 22. 1913.

but here at Niagara it is not
uncommon.

mar. 23.
4578. Clapper Lark ♂. t. e. Stomach
contained remains of insects, including
heads of termites, and small bits of
quartz.

4579. ^{*Scolecophila apicalis*} Brown Warbler with long, broad tail.
♂. t. e. Stomach contents: a grasshopper
and remains of other smaller insects.

Found with one other of its kind
in a grassy expanse now dry but
marshy during rainy season.

This individual flew up in a sort
of spiral, and called, as already
described.

(note - mar. 30. 4 or 5 seen in similar situation;
it may therefore be called common here.)

mar. 24.
4580. Large Bustard ♂. t. n. e. Stomach
^{Otto's denhami.}
contents: large grasshoppers, a few beetles,
and some small hard bean-like seeds.

Weighted 14 lbs. Seems to be rather
common here, at least during the
dry months. The small bustard is
probably more common, and is
resident.

Here about the post of Niagara
is a peculiar sort of plain, with

many ticks, worms, from
lower portion of intestine,
have been preserved in
alcohol.

Niangara
mar. 24. 1913.

rather high grass (in rainy season)
but often practically tree-less - save
along watercourses, where there is
a dense strip of forest. Even the
bushes are few and small, so
that a remarkably free, open view
would be enjoyed were it not for
the enormous number of large
rounded termite hills, covered
with tall grass.

mar. 27

4581. Plantain-eater (*Musophaga*). ♂.
Testis slightly enlarged. Stomach contents:
fruit.

4582. Duck (*Pteronetta*). ♂. t. n. e. Color

to Dr. N. of eyes and feet same as in no. 4577,
Cyanoptera allifrons

but the light grayish-pink
band crossing the maxilla shaded
to yellow at each end, and the
spots beneath the nostrils were less
distinct, and yellow in color.

mar. 28.

4583. Swift. ♂. testes slightly enlarged. Crop
Microtus apus
and stomach filled with winged termites.

4584. Swift. ♂. t. n. e. Crop and stomach
Microtus apus
filled with winged termites.

4585. Large black & white Hornbill. ♂. t. n. e.
Buccones subcylindricus
Stomach contents: fruit. This species

Niagara
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which we saw first at Mordjan,
was rather common near Sangurá's.
It was never noticed near the post of
Taradje.

Mar. 30.

4586. Hemipode. ♂. t. e. Stomach contents:
seeds of eleusine, small stones, and a
head of a termite.

4587. Quail (*C. delegorguii*) ♂. testes slightly
enlarged. Stomach contents: remains
of insects, including grasshoppers and
a mantis. Crop contained seeds and
small termites. Iris rather light
brown; bill black; feet buff.

4588. Quail. ♂. testes slightly enlarged.
Stomach contents: remains of insects,
including grasshoppers, and a few
hard seeds.

4589. Quail. ♀. ovary slightly enlarged.
Crop and stomach contained seeds of
eleusine. Iris rather light brown. bill
dull brown, dusky towards tip; feet
buff.

4590. Quail. ♀. ovary slightly enlarged. Crop and
stomach contents: seeds of eleusine.

4591. Quail. ♀. ovary slightly enlarged. Crop
contained small termites.

Many immo-
found between, abn-
muscles, especially
on neck, preserved
in alcohol

790
Niagara
Mar. 30. 1913.

4592. Quail. ♀. ovary slightly enlarged.
Crop contained 2 beetles and a grass-
hopper; stomach insect-remains,
a few seeds, and bits of stone.

Apr. 2.

4593. Honey-Buzzard. ♀. ovaries slightly
Perisoreus affinis.
enlarged. Iris chrome-yellow, cere
dusky-greenish; bill black with
base of mandible gray; feet light
cadmium-yellow. Stomach
contents, some rather large
paper-wasps, adults & larvae, as
well as bits of the nest.

Apr. 3

4594. Night-heron. ♂. testis slightly
Nycticorax lucorum
enlarged. Stomach contents, remains
of small insects (winged ants?)

One of a pair, flying down the river at dusk. ^(A young bird, fully grown, was brought to us alive at Saratoga. It was colored as all the quills had been pulled out, I did not preserve it.) Jan. 1913.

Apr. 6.

4595. Quail. ♂. testis slightly enlarged.

Stomach contents: grit, seeds, and
insect remains.

4596. Quail. ♂. testis slightly enlarged.

Crop contained 39 large termites (that
had just shed their wings), 2 "soldiers"
of a small species of termite, and
an ant.

4597. Quail. ♂. testis slightly enlarged.

Mar.
Apr.

4598

4599

4600

4601

515

Niagara.
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Stomach contained small bits of quartz, seeds, and insect-remains. Crop contained large termites. These were termites that had flown the night before, had shed their wings, and were probably found hiding on the ground. Great numbers of termite wings were seen lying at the bases of some small dead trees, as well as beside a rather small steep termite hill.

4598. Quail. ♀. ovary slightly enlarged. Crop contained seeds of eleusine.

4599. Hemipode ♂. t. e. Stomach contents: insect-remains and seeds.

4600. Hemipode ♀. ovary somewhat enlarged. Iris buffy-yellow; bill light-blue, with tip and culmen blackish, feet dull flesh-color. Stomach contents: seeds and remains of small insects.

4601. Hemipode ♂. t. e. Iris light-gray.
Trinix nana
bordered on inner and outer edges by dark brown; bill dusky-brownish, with base of mandible, corners of mouth, and the neighboring part of maxilla light, dirty grayish; feet light pinkish buff. Stomach contents:

niangara.
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seeds and remains of small insects.

4602. Hemipode. ♀. o.e. Iris light-gray;
Burns nana
bill grayish-brown, with corners of
mouth and base of mandible pinkish-
gray, feet light buff. Stomach contents,
seeds and insect remains.

All the quails and hemipodes
secured on Mar. 30 and today were
shot at one place, $\frac{3}{4}$ of an hour SE
of the station. Up to this time I had
never seen a hemipode, and few
quails, but at this spot they are
decidedly common: on March 30
we saw about 15 quail and 8 hemipodes,
and this morning 12 quail and 6 hemipodes.
All were flushed in or about some
fields where the natives ~~plant~~
cassine and other crops during
the rainy season, but which are
now dry and rather bare, with
some millet-stubble, short grass,
and weeds of various kinds, offering
but scanty cover, so that when
put up the birds usually seek
refuge in the denser green grass
of the neighboring untilled portions.

Niagara.

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the most of this grass is not yet knee-high. The whole vicinity—it is worth remarking—is unusually open, with practically no trees, and few bushes. Both quails and hemipodes may also be made to fly up from the grass: the former often go as far as 100 yards before settling down, the latter seldom beyond 50 yards. In general habits they are practically alike, often arising singly or in pairs, but never more than 3 together. They usually sit closely the first time, and are ^{more} difficult to flush a second time, the hemipodes especially so, often running off some distance in the grass, but occasionally getting up from the very spot they were seen to alight. The flight is very swift and well sustained, hemipodes showing powers as great as quails, tho the wings of the latter produce a somewhat louder whirring noise. Tho a female quail once uttered a

Niagara
Apr. 6. 1913.

sort of peep, complete silence is the usual rule. The food of quails and hemipodes is alike, consisting of seeds and insects.

4603. Small Falcon with rufous crown and
ⁿ Erythronus v. vespertinus.
bluish-gray wings and tail. ♀ ovary

slightly enlarged. Iris dark brown, rim of eyelids yellow; bill horn blue with light greenish base, cere dull yellow; feet cadmium yellow, claws light gray. Stomach contents: remains of insects. Was perched on a low tree in an open field. Seldom if ever seen since 1909, at Awakubi.

4604. ^{s. 4006} Goatsucker. ^{sim.} Stomach filled with large winged termites.

Sitting in a small bare spot amid grass in a marshy spot (now dry).

Apr. 8.
4605. Small Black- & white Hornbill. ♂.
Bycanistes sharpei duboisi
testes slightly enlarged. Iris dark brown, orbits black, claws and large scale on feet greenish black, soft skin blue gray. Stomach contents: fruit.

4606. Small Black- & white Hornbill. ♂. t.m.e.
Stomach contents: fruit.

4607. Small Black- & white Hornbill. ♀.
o.n.e. Iris dark brown, orbits and skin near base of beak light greenish gray.

Niangara.

Apr. 8, 1913.

Stomach contents: fruit.

The general color of the bills of these hornbills is whitish, shading to dull light yellowish at the base; but the males have large areas of blackish on the mandible and on the ^{lower portion of the} sides of the maxilla.

I believe this is a rather common species here, probably more so than that like No. 4585. The flight is practically silent.

No. 4604. On April 20, 1913, a set of 2 eggs of this species of s. 4006. nightjar was collected near the same place. They *Caprimulgus natalensis chadensis* lay on a small spot of bare earth completely enclosed and shaded by grass about knee-high, on dry, open ground near the edge of a grassy marsh. The ground-color was white, with many faint spots of brownish, so clouded over that the whole egg, at first glance, looked simply dirty-white. The female was incubating, and only flew up, ^{silently} when almost stepped on.

The same day a male was flushed in a weed-grown field, and on May 6 another, in a grassy marsh. The species is therefore not rare here.

1 ♂ flushed from a bog near Paua, July 13, 1913.

Niagara.
Apr. 8. 1913.

Stomach contents: fruit.

The general color of the bills of these hornbills is whitish, shading to dull light-yellowish at the base; but the males have large areas of blackish on the mandible and on the ^{lower portion of the} sides of the maxilla.

I believe this is a rather common species here, probably more so than that like No. 4585. The flight is practically silent.

4608. White-crested Plantain-eater. ♂.
Turacus leucolothus.
t. n. e. Stomach contents: fruit.

When we were at Ohondo's, in 1910, I noticed the difference between the calls of the two species of *Turacus*, though we had not yet secured the white-crested sort. There is no doubt that it is common here.

Apr. 11. *Lagonosticta rufopicta*.
4609. ♂ Small Red- & Gray Weaver. ♂. t. n. e. Crop
5.2902. and stomach contained seeds of eleusine.

Captured by a native boy; is certainly not abundant here; never noticed at Faradje.

4610. *Hyphantornis oculatus*
Yellow Weaver with black throat. ♂. testes
slightly enlarged. Stomach contents: insect
remains.

Niagara

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4611. Hemipode [♂] in alcohol.

4612 " ♀. o. e. Stomach contents: insect remains

Mate of no. 4612. They were flushed from grass near cultivated fields. ^{Only 1 other hemipode seen today.}

4613. Quail (*C. delegorguei*) ♂. testes slightly enlarged. Crop and stomach contents: eleusine.

4614 Quail ♀. ovary slightly enlarged. Iris brown; bill dark-gray, with base of maxilla brown; feet yellowish buff. Crop contained 21 grasshoppers (many of them young) and 6 winged ants; stomach also filled with insect remains. This large, light-colored quail was secured in the same place as all the others shot recently. It was alone, and uttered low rasping notes as it flew off.

About 2 dozen of these quails (*C. delegorguei*) seen today, at the place described under no. 4602. Once 9 or 10 flew up from the same spot. In flight they give low sounds, midway between rasping and peeping, but so weak ^{scarcely} as to be noticed above the whirr of their wings.

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Dryobates leucocephalus

4615 [✓] White-headed Barbet. ♀ juv. Stomach
contained remains of beetles.

4616. Kingfisher (*Tspidina*) in alcohol.

4617. Small Bustard. ♂. t. n. e. Stomach
Liriodendron
contents: many beetles, a cricket, 2
soldier-termites, and a small centipede.
Iris light-brown on inner edge, shading
to pale yellowish buff on outer rim.

4618. Large Bustard. ♂ juv. Iris light-brown,
Otis denhami
very light on outer edge; maxilla
darker greenish-brown with pale-gray
tip, mandible light bluish-gray;
feet light greenish-gray. Stomach
contents: remains of insects & vegetable
matter. Brought by natives. Two of
the larger and 2 of the smaller bustards
were seen this morning; one of the
former flying with beak slightly
opened. According to Alimasi (mulai) the
large bustard utters short gruff
sounds (Mangbetu name "nagba"),
and the smaller species of sort of
whistle, slightly prolonged, preceded
and followed by hoarse notes.

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Lamprocolinus splendidus

4619. Large Resplendent Starling, ♀. ovary

somewhat enlarged.

Apr. 16.

4620.

Agelaius collaris schistii

Shrike. ♀ juv. Iris dusky; bill bluish-gray, darkest on culmen; feet light bluish-gray.

Apr. 17.

4621.

Duck (*Pteronetta*). ♀. o. n. e.

Apr. 18.

4622.

Cyanoptera albigens. ♂. t. n. e.

4623.

" "

♀. ovary slightly enlarged

4624.

" "

♀. o. n. e.

4625.

" "

♀. Skeleton.

No 4625 had a white frontal spot, almost as large as that of no. 4622, in no 4624 it was less well-developed, and in no. 4621 & 4623 entirely lacking. In no. 4622 (♂) there was a rounded "labyrinth" of only moderate size, at the left side of the eye. These ducks perch in trees, two of the present examples having been shot from such a position. The stomachs of all contained coarse sand and small brownish particles (unidentified) of food.

4626.

Little Grebe. ♂. testes slightly enlarged. Iris dark-brown, lores blackish; bill blackish, with whitish tip and mottled a little with buff at sides; soft skin at corners of mouth

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and base of mandible very light green;
feet greenish black on outer side, lighter
green inside. Stomach contents: insect
remains.

Apr. 20

4626 Barred brownish Coucal. ♂. t. n. e.

Centropus grillie

a Iris dark brown, light on outer edge,
bill pinkish-white below, pale brownish
at sides, dusky-brown on culmen, feet
dark lead-gray. Oesophagus contained
an ant, stomach beetles.

(note scattered black feathers on under parts of this example)

4627. Same as preceding. ♂. t. n. e. Stomach

Centropus grillie

contents: remains of grasshoppers and
beetles.

These two coucals were shot at the
edge of an open grassy marsh, where
they hid in patches of tall grass,
flying out only when approached
within a few yards.

4628. Clapper-Lark. ♂ juv. Iris dark-brown

Mirafra arundinacea

maxilla rather light bright-brown, with
dusky-brown tip, mandible dusky-brown
with a little light-brown at base, corners
of mouth dull-orange; feet pale buff.

Stomach contents: remains of a cricket and
other insects. A common bird here at

800
Niagara

Apr. 20. 1913.

Niagara, but not seen ^{or heard} at Dunkwa ^{or} Whiteaba
Paradise, its range seeming to stop abruptly
between Denge & Naberet).

4629. Quail. ♂. testes slightly enlarged. Crop
contained 30 winged ants, 1 grasshopper,
1 small beetle, and 1 tiny bug.

4630. Screech Owl. ♀. ovary slightly enlarged.

Nyct. alba affinis

Stomach contents: remains of grasshoppers.

Differs from Nos. 4566 & 7 by whiter color
of breast, but at the left side of the throat
there is a single buffy feather with gray
base.

Apr. 23.

4631. Rail, *Sarothra pulchra* (Coruthrura) ♂. testes slightly enlarged.

Stomach contents: a small snail and
remains of insects.

4632. *Caprimulgus permixtus* Woodpecker. ♂. t. n. e. Stomach filled
with small ants.

Apr. 24.

4633. Grebe. ♂. testes slightly enlarged. Colors

s. 4626. *Podiceps nigricollis capensis*

of eyes & feet same as in No. 4626, but
bill a little paler in color. Captured by
a native in a swamp where there was
very little open water. Sat generally
on the whole metatarsus, but could
stand up, and even run rapidly along
the ground, beating its wings, so that

Niagara
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it would probably have taken flight had not a string been tied to one foot.

4634. Crow. ♂. t. n. e. Stomach contents: peiced
of a large chrysalis. ^{Corvus albus} 1

4635. Mate of Preceding. ♀. ovary slightly enlarged.
Stomach contents: bones of a frog (or toad),
and fibers from palm-nuts. 2,

This pair of crows was seen yesterday, the first ones noticed here since Mar. 15.

apr. 25.
4636. Small Black & White Hornbill. ♂. testes
5. 4605. ^{Bycanistes} ~~sharpii~~ ^{duroisi} ~~duroisi~~
slightly enlarged. Stomach contained fruit,
oesophagus a large beetle.

4637. Warbler. ♂. ^{Catantops lateralis} testes slightly enlarged.
Stomach contents: large winged termites

4638. Small Gray Hawk. ♂. t. n. e. Stomach
^{Accipiter} ~~sp. n.~~ ^{sp. n.} and crop contained a few large winged
termites and remains of a weaver-bird.

Iris orange red. Caught in a trap baited
with winged termites. 4

Apr. 26.
4639. Rufous-backed Shrike - in alcohol [♂.]

4640. Lesser Fish-eater ^{Scotophilus bowersi} ♂. o. n. e. [Skeleton].
(Skin preserved flat) cere &
Irides dark brown, both mandibles dull
light yellowish-green, dusky along cutting-
edges, feet dull brownish-yellow, with
gray claws, shading to dusky toward tips.
Brought to us alive a week ago; but all

Niagara.
Apr. 26. 1913.

the remiges & rectrices had been pulled out to adorn some native's hat. Several times it called at night, either a half dozen short "hui's" in rapid succession, or a protracted quavering hoot.

4641. Blue Falcon. ♀ juv. (Sex not absolutely Dissodactes ardosiacus, certain, for there were of course two gonads, but their flatness would indicate ovaries.) Iris dark brown, orbits & cere pale greenish, beak dark bluish-gray; feet greenish-yellow with dark-gray claws. Stomach contents: mammal-hair, a grasshopper and a large beetle.

Apr. 27.

4642. Blue Falcon. ♂. t. n. e. Crop contained Dissodactes ardosiacus, a large termite (wings already shed) stomach remains of a frog. Iris dark brown; orbits, cere and corners of mouth cadmium-yellow; beak horn-blue, with a little greenish at sides, shading to black at tip; feet bright chrome-yellow.

Evidently parent of No. 4641. Both were shot by Nelson to S. of the station. Seen once along Velle Spring Run, and Niagara.

4643. Short-tailed Warbler. ♂. testis somewhat enlarged.

4644. ^{Batis bella nyangae} Flycatcher. ♂. left testis enlarged, right one very small. Iris bright chrome-yellow, bill & feet black.

Niagara
Apr. 27

4645

4646
April 29
4647

4648

4649

Apr. 30
4650

4651

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Apr. 17. 1913.

- Artichonius minutus*
4645. ^{*Artichonius minutus*} Rufous-backed Shrike. ♀. ovary slightly enlarged. ^{a common bird here - in grassy marshy spots.}
4646. ^{*Camaroptera griseovirens*} Green-b. gray Warbler. ♀. o. n. e. d
April 29.
4647. ^{*Phlaenopterus* *g. breiffelli*} Spur-winged Goose. ♀ [immature] d
o. n. e. Iris dark-brown; tips of both mandibles blue gray, rest of bill and most of naked skin of head dark purplish-red, lower part of lores bluish-gray, carpal spur pinkish-white, feet pale pinkish, with some dusky brownish, especially on webs and about tarsal joint. Stomach contained coarse sand, mixed with fibrous green vegetable material.
4648. ^{*Chela apudra uganica*} Olive-backed Shrike-like (Timeliid?) ♂ testes much enlarged. Iris chrome-yellow; maxilla gray, shading to dusky on culmen; mandible light blue, feet light-bluish. Stomach contents: remains of beetles.
4649. ^{*Phlaenopterus* sp.} Thrush. ♀. ovary somewhat enlarged. d
Iris bright-brown; bill yellow, naked skin behind eye dusky brownish; feet pale-buff. Stomach contents: pieces of a millipede. d
Apr. 30.
4650. ^{*verticalis*} Thrush (*Cossypha*) ♂. testes somewhat enlarged. d
4651. ^{*Anthreptes collaris hypodileus*} Small yellow-bellied Sunbird. ♂ left testis

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Apr. 30. 1913.

enlarged, right one small. Stomach contents:
pieces of 2 large Termites.

4652. Weaver. ♀. o. n. e. Bill dark-blue; iris

Pyrenestes ostrinus

Dark red-brown, thickened portions of
eyelids pale blue, feet brownish-green.

May 2.

4653. Light gray Cuckoo. ♀. ovary slightly

Cuculus gularis

enlarged. Stomach contents: caterpillars

(one heard calling on May 4.)

May 4.

4654. Duck (Pteronetta) ♂ (has unusual
Cyanoptera albifrons
amount of white on forehead.)

4655. Duck (Pteronetta). ♂ (many white
feathers on front of neck.)

May 3.

4656. Jacana. ♂. testes slightly enlarged.

May 4.

Actophilus africanus

4657. Brown-backed thrush-like bird (Timaliidae)

S. 4538.

Phoenicurus turdinus

♂. t. n. e. Stomach contents: insect-remains

4658. Same as preceding. ♂. imm. Stomach
contents: remains of insects and bones
of a tiny frog.

4659. Green Sunbird. ♂. t. e. Stomach contained

Cyanonitta obscura

a tiny green spider. Sat motionless in

($\frac{2}{3}$ of a second)

a tree, giving at regular intervals,
for a considerable time, a short
slightly-metallic "kip."

4660. Red-faced Barbet. ♂. testes somewhat

Pyrrhuloxia ludlowi

enlarged. Iris light-brown, becoming
whitish on outer rim; bill black, feet
very dark greenish-brown. Stomach

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May 4, 1913.

contents: fruit

4661. ^{*Polioptila caerulea*} Tiny yellow- & black Barbet ♀. ovary slightly enlarged. Stomach contents: several hard fruit-stones, and remains of small insect. Common in wooded places, so far I have only heard the slower type of notes.

4662. ^{*red-brown*} Black Weaver with red breast ♀ in

No. 4654. These ducks (*Pteronetta*) are often very noisy at dawn and dusk, as they fly along over stream or a dried woods near water, repeating their loud hoarse notes ("kha!" or "h-ha!") over and over again. They regularly perch on trees.

4664. Small green-backed Cuckoo. ♀. o. e;

^{*Chrysoceryx olivaceus*}
an egg in oviduct (broken) was pale greenish-blue, with scattered blotches of light rufous, especially towards larger end. Stomach contents:

8 hemipterous insects and a stone of a fruit — the same as that eaten by the little barbet No 4661, killed in the same tree.

4665. Shrike (*Prionops*) ^{conspicuously} ♂. t. n. e. Stomach contents: insect-remains.

4666. Same as preceding ♀. o. n. e. Stomach contents: insect-remains.

4667. Same as preceding ♂. t. n. e. Stomach contents: insect-remains.

Māngara.

May 4. 1913.

contents: fruit.

Myiobus leucolaimus

4661. ^{*Myiobus leucolaimus*} Ring yellow & black Barbet. ♀. ovary slightly enlarged. Stomach contents: several hard fruit-stones, and remains of small insects. Common in wooded places, so far I have only heard the slower type of notes.

4662. ^{*malimbicus nitens*} Black Weaver with red breast. ♀. imm. Iris brownish-red, feet very dark bluish, bill light-blue. Stomach contents: remains of insects.

4663. Flycatcher ♂ imm. *Diaphorophya caerulea*

4664. Small green-backed Cuckoo. ♀. o. e.; ^{*Chrysoceryx fleassi*} an egg in oviduct (broken) was pale greenish-blue, with scattered blotches of light rufoous, especially towards larger end.) Stomach contents: 8 hemipterous insects and a stone of a fruit — the same as that eaten by the little barbet no 4661, killed in the same tree.

4665. Shrike (*Prionops*) ^{*concinna*} ♂. t. n. e. Stomach contents: insect-remains.

4666. Same as preceding ♀. o. n. e. Stomach contents: insect-remains.

4667. Same as preceding ♂. t. n. e. Stomach contents: insect-remains.

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Members of a flock of 8 or 9 in a wood.
The Azande name for this bird, translated
literally, is "leopard-bird", for they
are said to mob the leopard. I have
heard it called the same in Bangala
by Logo at Mordjan.

May 5.

Cyanometra verticalis viridipendens

4668. Green-headed Sunbird, ♂^{imm.} testes

somewhat enlarged. Stomach contents:
small spiders. The ordinary call of this
species is a plaintive, slightly protracted
"che-w-wee", sometimes a little hoarse,
or sometimes a harsher "che....!" when
disturbed.

May 6.

4669. Harrier ♂ [immature, molting into ad. pl.]

testes very small. Stomach contents:
remains of large grasshoppers.

4670. Falcon ^{African} (Hobby A). ♂. t. n. e. Iris dark-brown,
Falco ^{cuvieri} ~~cuvieri~~
iris and cere chrome-yellow, beak bluish,
shading to black at tip and light yellowish
green at base, feet cadmium yellow, claws
black.

4671. Large Bustard ♀ ovary slightly enlarged
Otis ^{dehloni} ~~dehloni~~
Stomach contents: remains of many beetles
and grasshoppers, a millipede, and a
piece of sweet potato.

4672. Young of preceding. ♂ juv. Stomach
Otis ^{dehloni} ~~dehloni~~
contents: remains of many beetles, some

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grasshoppers and a mantis, as well as 8 caterpillars (hairless). Nos. 4671 & 2 were feeding together in a sweet-potato field. The mother had eaten no caterpillars perhaps she had pointed them out to her young, as a cock will sometimes show food to a hen, or a hen to her chicks. The Azande name of the large bustard "Ba-zere-bodi", translated literally, means "Big-bushbuck-bird", for its voice is said to resemble the hoarse bark of the bushbuck. No. 4672, when wounded, uttered a loud hoarse note.

4673. Small Bustard. ♀. ovary slightly enlarged
Liotis melanogaster
Stomach contents: remains of beetles & grasshoppers, 1 ant, 1 bug, and 1 hairy caterpillar. Angus, our hunter, imitates this bird's voice by a slightly prolonged whistle, followed, after a short pause, by a loud "pōp!"

- The present example, wounded, gave a short hoarse note.
4674. Short-tailed Warbler. ♀. ovary slightly enlarged
Irides light-brown, rim of eyelids slightly pinkish; bill brownish-gray, light below; feet pinkish buff. Stomach contents: insects.

4675. Clapper-lark. ♀. ovary somewhat enlarged.
Mirafra caudicincta
Stomach contents: insect remains, including heads of termites.

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4676. ^{Murphy's} Clapper-lark. ♀. o. e. Stomach contents:
remains of insects, including heads of 5
small termites.
4677. Hemipode. ♂. t. e.
4678. Brown-checked Woodpecker. ♀. o. n. e.
4679. ^{Aristicola leucobris} Warbler. ♂. testes slightly enlarged.
4680. ^{Cyan. Bartolotti} Thrush (Corypha) with blue on wing coverts
and with white superciliary lines. ♂.
Testes enlarged. Iris dark-brown, bill
black, feet grayish-brown. Stomach
contents: insects. The voice of this
species seems richer than that of
the form represented by No. 4650.
- May 7.
4681. ^{Aristicola notakeensis malayalis} Stout-billed Warbler. ♂. Testes some-
what enlarged. Stomach contents: a
caterpillar, a grasshopper, & other
insects. Iris rather light-brown,
maxilla blackish, mandible light
bluish with black base. feet pinkish-
buff, claws gray.
4682. Same as preceding. ♀. ^{im.} o. n. e. Iris
rather light-brown, bill dusky-brown
above, shading to pale grayish-pink on
mandible, feet pinkish-buff, claws
grayish-brown. Stomach contents: 1

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remains of beetles, a grasshopper, and a spider. Note the great difference of size between sexes, and the few light-edged feathers still remaining on back and head of both examples. In the dry season they seem practically all to assume a light, streaked plumage, (the perhaps the adults are always dark?).

4683. ^{*Lanius ludovicianus*} Shrike. ♂ imm. Iris dark brown, bill dusky, feet light blue.

May 8.
4684. Dark Cuckoo. ♂. t. n. e. Stomach contents: remains of insects & 2 caterpillars.

4685. ^{*Geothlypis trichas*} Thrush. t. e. Iris brown, naked skin behind eye dusky brown, bill yellow, feet dull yellowish.

4686. Green-backed Cuckoo. ♂. testes slightly enlarged. ^{*Chrysoceryx capensis*} Stomach contents: hairy caterpillars.

4687. Wood-shrike (?) ♀. ovary much enlarged. ^{*Vireo albellus*} Iris dark brown, bill blackish, feet light blue.

4688. ^{*Myiarchus cinerascens*} Warbler. ♂. testes slightly enlarged. Stomach contents: remain of insects and a small millipede.

May 9. ^{*Phylloscopus colaptes*}

4689. Bullfinch. ♂ imm. Stomach contents: insect remains. Never observed near Paradise.

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4690. ^{*Delichon urbica*} Martin. ♀. o. n. e. Brought by natives, probably died a natural death, or at least grew so weak as to be caught in the hand, as sometimes happens with bank-swallowers here. A martin was observed on May 6, '13.

4691. Warbler. ^{*Citroloides lateralis*} ♂. testes somewhat enlarged. Stomach contents; large winged termites.

4692. Small Gray hornbills. ♂. t. n. e. ~~*Horizocorus l. granti*~~
Beneath the angle of the jaw is a triangular patch of naked purplish-red skin, which, hanging in a slight fold posteriorly, looks almost like a wattle. Stomach contents: large winged termites and beetles.

Like many of the birds secured lately, it was caught in a trap baited with live winged termites. These termites are caught when they fly at night, kept alive, and fastened by their wings the following morning near a trap. Their struggles attract many birds; indeed a few are sometimes attached a yard or two above the trap so as to be seen from afar. The trap used consists of a noose,

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jerked taught by a rod or stout
switch stuck in the ground and
bent over.

4693. Forest Partridge, ^{*F. squamatus*} ♂. o. n. e. Stomach
contained fruit (wild figs?) and crop
small.
pieces of tubers (sweet potatoes?). Was
heard in a strip of forest at Mordjan
between Faradje & Aba.

May 10. 4694. Black Shrike. ♂. t. n. e. Stomach
^{*Laniarius leucorhynchus*}
contents: several rather large wasps.
Shot in ^{side} one of the houses in the post,
where it was flying about under
the roof, alighting on the cross-beams.
Usually it is a rather shy bird,
haunting thickets or undergrowth
near water. The song is a series
of low mellow whistles, all in one
key.

4695. Warbler, ^{*Sitta carolinensis*} ♂. testes slightly enlarged.

4696. ^{*Myiophobus montezumae*} Weaver. ♂. t. n. e. Stom. cont. insect remains.

4697. Long-tailed Hornbill. ♂. t. n. e.
^{*Caprimulgus a. cassini*}
Stomach contents: a palm-nut and
pieces of beetles. Naked skin beneath
angle of jaw pale pink. I have been
told by natives, both here and in
the Sturi, that this hornbill accompanies

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monkeys. Perhaps it is only because both are attracted to certain trees by the fruit.

May 11.

4698. Green-backed Cuckoo. ♂. testes slightly enlarged. *Chrysococcyx caprius*
Stomach contents: caterpillars

4699. Black Shrike. ♂. t. n. e. Stomach
Laniarius leucorhynchus
contained a large green caterpillar and remains of beetles.

4700. ^{*Diaphorochyia jamaicensis*} Small blue-wattled Flycatcher ♂. t. e.

4701. ~~Gray-backed Weaver.~~ *Nigrita canicapilla* ♂. t. e.

4702. *Nigrita canicapilla* ♀. ovary somewhat enlarged

4703. Brownish Timaliid. ♂. t. e. Stom. cont. ^{Land other insects} winged termites
Turdinus cinniventris

4704. ♀. *cinniventris* ♀. ovary slightly enlarged

4705. Flycatcher. ♂. testes slightly enlarged. ^{*Botio bella nigrifrons*}

4706. Young of preceding. ♂ juv. Iris brownish-gray, bill black, feet dusky (corners of mouth light yellow.)

May 12.

4707. ^{s. 4633.} Brike. ♀. ovary somewhat enlarged.

Bill black, with a little light gray at very tip, corners of mouth light-green, feet greenish-black on outer sides, dark green on inner.

May 14.

4708. Sunbird. ♂. t. n. e. *Cinnyris bouvieri*

4709. " ♂. t. n. e.; ^{*Cinnyris bouvieri*} skull not quite completely ossified.

Nos. 4708 & 9 were shot in rubber trees at the post, where the species is common. The stomachs of both contained coagulated

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rubber, more or less mixed with remains of small insects. ^{The notes of the species are very low, only audible at a few yards distance — consisting of sounds that may be represented by the words "cheep" and "chip."}

May 15.

4710. Sunbird ♀. o. n. e. Probably of same species

as nos. 4708-9. *Cinnyris cupreus*

Cinnyris splendidus

4711. Large Sunbird. ♂ immature.

4712. ~~*Lagonoticta rufopicta*~~
s. 4609. Small Red-v. gray Weaver. ♂. testes slightly

enlarged. Crop contained small seeds.

4713. ~~*Lagonoticta rufopicta*~~
Same as preceding. ♂. testes slightly enlarged.

4714. *L. rufopicta* ♀. o. n. e. Crop contained ^{small} seeds.

4715. *L. rufopicta* ♀. o. n. e.

members of a flock of 15 or 20, feeding on the ground. They are silent, and when flushed from ground often perch in trees.

May 16.

4716. Long-tailed Hornbill. ♂. t. n. e. Iris

Tropicorax a. cassini

pale whitish-yellow, with dark brown inner rim, orbit black, naked skin beneath angle of jaw flesh-color, feet light blue, claws black. Stomach contents: 2 palm-nuts and pieces of a large beetle.

4717. Widow-bird (*Vidua*) ^{*peruya*} ♂. testes somewhat enlarged; skull not completely ossified. Crop contained seeds of eleusine.

4718. Warbler. ♂. testes slightly enlarged. This species has a habit of raising its tail vertically, somewhat like a wren; at such times this appendage looks very long.

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4719. Large Blue Pigeon. ♂. testes slightly enlarged. Crop & stomach contained
Iris scarlet.

4720. Roller ♂. t. n. e. Common. Seen
^{Eurytornis} ~~after~~
often at Okondo during Dec 1910; it is
therefore a permanent resident (unlike
at Paradye)

4721. ^{Small} Green Cuckoo ♂. testes slightly enlarged.
The "Nalolo" or small forest Circaetus
is the subject of a song much in
favor with the Bangba and Medje
but all that is said of it is about
as follows "The Nalolo is a very fine
bird".

In Okondo's village we once saw
dance which celebrated the "nakid"
a lizard (Agama). At regular intervals
the dancers would move their head
neck back and forth in imitation of
the nodding of the head by the lizard.
The head of this lizard, by the way, is
considered by natives of the region to be
a potent medicine (aphrodisiac)

4722. ^{Troglodytes indicatus} A greenish thrush-like bird with
white outer tail feathers. ♂. testes
slightly enlarged. Iris creamy. White
bill blackish, feet dark gray. Stomach
filled with small berries.

An arboreal bird, frequenting
second-growth or open forest, often
singing continually, a loud, re

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4719. Large Blue Pigeon. ♂. testis slightly enlarged. Crop & stomach contained fruit. Iris scarlet.

4720. Roller. ♂. t. n. e. Common. Seen ^{*Euryptomus afer*} often at Ohondoo during Dec 1910; it is therefore a permanent resident (unlike at Paradije)

4721. ^{Small} Green Cuckoo. ♂. testis slightly enlarged. ^{*Chrysococcyx klapali*}
The negroes here of course name many of the birds according to the sounds they make, besides noting the likeness of certain birds' notes to words. (My friend) who was with me to-day said of this cuckoo, "This is the bird that calls our name, 'med-je', 'med-je'." The Azande have a song in which the words imitate the two distinct calls of the common wood-owl. "^{Bu-lee} etc"

4722. ^{*Geopelia indicata*} A greenish-brown thrush-like bird with white outer tail feathers. ♂. testis slightly enlarged. Iris creamy-white. bill blackish, feet dark gray. Stomach filled with small berries.

An arboreal bird, frequenting second-growth or open forest, often singing continually, a loud, rather

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music. Singing only about
1½ or 2 seconds, repeated at short
intervals. The song has just a bit of
the same quality as that of the Veery.
They often go in pairs, the female
often answering after each spell of
song with a call-note of somewhat
the same tone as her mate's song.

A song of the Medje compares the
insectivorous Otter (Potamogale) with
their chief, and has somewhat this
meaning: "The Potamogale steals
fish from our traps at night, but
why should our chief sleep with our
wives? He is not a Nenjongorongwe
(Potamogale)." It is worth remarking
that the Potamogale, as well as the
common watersnake, entering the
fish traps of wickerwork, is often
unable to get out again, and is drowned.
Probably it is thus that the natives
usually get them.

food in the dense undergrowth of a
patch of forest.

4726. Large warbler. Starling. ♀ juv.

Iris dark. Back, corners of
mouth. (Sexing is
exact. Young female
to be by a native.

Drycog

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musical warble, lasting only about
 $1\frac{1}{2}$ or 2 seconds, but repeated at short
intervals. Its voice has just a bit of
the same quality as that of the Veery.
They often go in pairs, the female
often answering after each spell of
song with a call-note of somewhat
the same tone as her mate's song.

Catantopha notkensis notkensis

4723. Warbler. ♀. o. e. Iris light-brown,
bill dusky-brown above, whitish below,
feet pale pinkish-buff. Stomach contents
a small caterpillar and insects.

Macrosphenus concolor

4724. Long-billed Warbler, green-gray & yellow.
♂. testes somewhat enlarged. Stomach contents
remains of a caterpillar, a spider, & insects.

4725. Same as preceding. ♀. ovary slightly enlarged.
Stomach contents: leaf-hoppers & other insects.
Nos 4724 & 5 were searching for their
food in the dense undergrowth of a
patch of forest.

4726. Large Wedge-tailed Starling. ♀ juv.
Iris dark-brown, bill black, corners of
mouth yellowish, feet black. (Sexing is
exact, tho I expected a young female
to be duller.) Brought by a native.
Oryzognathus bartholomaei

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4727. Spur-winged Goose. ♀. ovary slightly
~~Pteronetta~~ ^{reiffelli} enlarged. Bill dark purplish-red,
with light bluish tip; naked skin of
forehead dark purplish-red, that
of lores light-blue; iris dark-brown;
feet dirty flesh-color with some
dusky-brown on webs, and nails dusky-
brown; carpal spur pinkish-white.
Crop contained a number of rather
large fruits, of a starchy structure,
perhaps from an aquatic plant, and
probably found floating in the water.

Was sitting with half a dozen ducks
(Pteronetta) on the surface of a small
stagnant pond surrounded by
woods.

4728. Hornbill (L. fasciatus ~~melanochloros~~) ♂ t.n.e.
Skin beneath angle of jaw black,
somewhat mottled with orange.
Stomach contents: remains of insects,
4 small palm-nuts, and stones from
other fruit.

May 20.

4729. Long-tailed Hornbill. ♀ o.n.e. Iris
^{Tropicorax a. cassini} whitish-yellow, with inner rim dark-
brown, orbit dusky, skin beneath
angle of jaw flesh-color, feet bluish,

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Stomach contents: palm-nuts & insect remains

4730. Same as preceding. ♀ juv. Stomach contents: fibers from palm-nuts, and remains of beetles.

Nos 4729-30 were found together, and are evidently mother and young. The rectrices of the old female are all, save one, being renewed at once. On several different occasions I have been told by natives that ~~the~~ female hornbills, while in the nest, shed all their wing- and tail- quills. At Faradje, in early 1911, during the nesting-season of Lophoceros nasutus, a native brought us a female of that species with all the remiges and rectrices lacking, but as the tips of the wings were wounded, I thought it had been kept some time in captivity, and the quills pulled out, perhaps, by the native, so I preserved only the skull.

May 21.

4731. Sunbird ♂ immature. Stomach contents: Cremyia capensis remains of tiny insects and some rubber.

4732. Palm Swift. ♂. t. e. Stomach filled with Tachynotus foveus winged ants. Caught at night, by a boy,

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at its nest, built of feathers of chickens and smaller birds, glued to blades of grass in the thatch at the edge of the roof of a veranda, and containing 2 pure white eggs, glued fast in the nest. These eggs contained large embryos, and were not blown. The grass on which the nest was placed sloped at an angle of about 45° .

4733. Blue Falcon. *B. t. n. e.* Stomach
Diosdectes ardosiaceus.
contained remains of an orthopteron
insect, perhaps a large cricket.
These falcons seem to like ~~the~~
trees near water.

- May 22.
4734. Gray Owl (*Bubo*). *B. t. n. e.* Stomach
cinerascens.
contents: remains of insects (including
a large beetle. Two of these owls were
found spending the day in the
shelter of some trees on low ground.
This seems to be the usual sort
of situation, they are then not
very shy, and one may walk
under the tree before they fly.

- May 23.
4735. Sunbird. *B. t. n. e.* Stomach
Cinneryia cinerea.
contents: a small caterpillar. Brought
by a native with one of its young, whose

No. 4735 In front of the house at Paradjie there was a bed of *Canna-lilies*, which was often visited by sunbirds, especially the ^{small} ~~of this species~~ bronzy species. Looking at one, with the field glass, I was surprised to see that it did not put its beak into the open end of the flower at all, but into a small hole ~~pierced~~ ^{pierced} at one side of the base. For a second or so the bill would be held in the hole, as tho the bird might be sucking, then it would fly to another flower, and proceed in the same way. Rarely would these sunbirds hover in the air before the flower. Examination showed that about half the flowers, or indeed all those regularly visited by the birds, showed similar tiny punctures, and a little watching proved that this was the ordinary method of feeding at these flowers.

In the brush about Paradjie, ~~Dungu~~ ^{Dungu}, there is a very common bush (or small tree, covered, in the dry season,

(fam. Bignoniaceae, genus Markhamia.

with pink- & white Catalpa-like flowers, forming later spirally twisted pods. Examining these bushes in Feb 1913, I found that many of the flowers were also pierced at the side, probably by sunbirds, which often visit them.

Dec. '13 at Avaluhi in September I noticed that canna-lilies visited only by the small red-breasted sunbird had their bases pierced in the same fashion; while the large, showy red flowers, ^{Spathodea campanulata}, borne by large trees about borders of the forest are treated in the same way, if I may judge from the small holes to be noticed near the base in most of the flowers that have fallen to the ground.

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4735 (cont'd)

a very common sunbird here, the
commonest note is a hoarse
"chit-chit", not at all

tail was only half-grown ~~long~~.

May 16.

4736

Skeleton of large Bustard. ♀. o. n. e.
Ot's denhami (Tail preserved)
Plumage worn and soiled. Said to have

been accompanied by one young.

May 25.

4737

Smaller Black & White Hornbill. ♀.

B. duboisi

enlarged. Stomach contents:

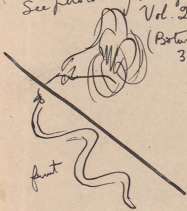
Marchamia

(Fam. Bignoniaceae)

See photos by Lang.

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the condition of the ovary.
should say she had finished
mating, yet the middle
feathers are being
a gradual molt is
in the wings.

spite of its sex, uttered the
notes of the species,
sounds like "kha" or
reiterated, sometimes with

decreasing volume. These calls are
usually shorter, less mournful,
and not so loud as those of *Ceratop-*
gymna, or even as those of the larger
Bycanistes like No. 4744. The flight
is almost ^{if not} always silent, birds being
seen singly or in pairs or trios.

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4735 (cont'd)

a very common sunbird here, the commonest note is a hoarse "chit-chit" not at all

tail was only half-grown loud.

May 16.

4736

Skeleton of large Bustard ♀. o. n. e.

Otis denhami

(Tail preserved)

Plumage worn and soiled, Said to have

been accompanied by one young.

May 25.

4737

Smaller Black-v. White Hornbill ♀.

Bycanistes s. duboisi

ovary slightly enlarged. Stomach contents:

fruit. From the condition of the ovary & oviduct, I should say she had finished breeding recently, yet the middle and outer tail feathers are being renewed, and a gradual molt is taking place in the wings.

This bird, in spite of its sex, uttered the characteristic notes of the species, loud harsh sounds like "kha" or "how", often reiterated, sometimes with decreasing volume. These calls are usually shorter, less mournful, and not so loud as those of *Ceratogymna*, or even as those of the larger *Bycanistes* like No. 4744. The flight is almost ^{if not} always silent, birds being seen singly or in pairs or trios.

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4738. Brown Finch. ♂. testes slightly enlarged.

Polioptila gularis elongata
Crop contained 4 small caterpillars.

First example noticed here at Niangara.

4739. White-eye. ♂. testes much enlarged.

Stomach contents: pieces of small figs,
from a tree in a village, of the sort that
supplies "bark-cloth".

4740. *Hyphantornis ochrocephalus*
Yellow Weaver with black throat-patch. ♂.
testes slightly enlarged. Stomach contents:
insect-remains.

4741. *Hyphantornis ochrocephalus*
Young of preceding. ♂ juv. Iris brownish
gray, bill dirty-greenish, corners of
mouth pale-yellow, feet light grayish like
I have noticed ^{lately} 2 nests of this species,
easily recognisable from the wide
spout, hung from branches of
thorny acacias.

May 26.

4742. Small Brown Hornbill. ♀. o. n. e.
Aphroceros c. camurus
Stomach filled with insect-remains
(Coleoptera & Hemiptera). Iris light-
yellow, orbit dull brown, feet
dusky brown, light greenish on
soles.

4743. *Bycanistes subcylindricus*
s. 4585. ♂. Large black & white Hornbill (Skeleton)
♀. ovary slightly enlarged. (skin preserved)

4744. *B. subcylindricus*
Young of preceding. ♂ juv. Iris rather
o.

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light-gray, changing to blackish on inner edge
rim of eyelids greenish-yellow, orbits gray,
bill greenish-gray, shading to blackish at
tip and to whitish at top, feet bluish-gray,
yellowish on soles, claws black.

Nos 4743 & 4 were brought ^{alive} by a native,
who had taken them from a hollow high
up in a large tree. The opening was mostly
closed, with mud (or something like it);
and there was only a single young bird.
Nearly all the remiges and rectrices of
the mother had been pulled out, and
split down the middle and tied in a
bunch ^(of 60 of these half-feathers) to adorn the captor's hat.

According to the native, most or all
of these feathers had been freshly
renewed, and were still surrounded
with a sheath at the base. I could
still make sure that this was true
of at least 6 of the rectrices, and also
some of the remiges.

However, she was far from "wasted
and enfeebled"; in spite of 2 days confinement
in a basket, there was considerable fat
inside the skin of the abdomen, as well
as a good layer beneath the muscular

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abdominal wall - and fat is scarce in hornbills. She bit vigorously.

The young bird did not hold its tail vertically, as we noticed with the young of *Ceratogymna*, tho no doubt it could; it seems in fact that hornbills have the base of the tail longer and more flexible than most birds.

May 27.

4745. Smaller Black- & white Hornbill. ♂ juv.
Bycanistes s. duboni
Iris light-gray exteriorly, blackish on inner edge, orbit dark-gray; bill light-greenish, feet bluish-gray, claws black.

Brought alive by a native; who had found its nest, a hollow in a tall tree, by watching the male come with food. As he climbed the tree the female heard him and flew out, leaving her single nestling. That the female had molted during her confinement was shown by the presence of more than 20 of her larger flight-feathers in the nest. The young bird did not hold its tail erect, hopped awkwardly on the ground, and flew with great effort a couple of yards.

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4746. Thrush (^{verticalis} *Cosmophya*) ♀. ovary somewhat enlarged; breast bared for incubation.

Stomach contents: insect remains.

4747. *Lagonosticta rhodopareia*. Small Reddish Weaver. ♂. testes slightly enlarged. Crop & stomach contained small seeds.

4748. *Lagonosticta rhodopareia*. Same as preceding. ♀. ovary slightly enlarged. skull not quite completely ossified.

May 28.

4749. Sparrow ♀ (*Albino*). ^{*Passer griseus*} s. n. e.; skull not quite completely ossified. Iris rather dark-brown, bill dark-gray, feet greenish-gray. Stomach contents: small seeds and insects.

4750. *Citricola rufa*. Tiny brown Warbler. ♂. t. e. During the whole of the rainy season, as already noted, members of this species sing their weak "wet-feet wet-feet wet-feet..." from the tops of bushes and trees, or fly high in the air, sometimes in a sort of spiral, not infrequently shooting down from a height of 100 feet with a loud swish. Once I saw one dart vertically downward from a height of 60 or 70 feet and turn up again in a perfect U.

According to a native fable, heard-

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here, one of these little birds in a downward dash frightened an elephant by ~~this~~ noise so that he ran off; a more ridiculous version tells that the elephant simply raised his trunk, but the tiny "titi", ^(mangbeta name) shot into the open nostril, an accident that resulted in the death of the elephant.

4751. Stout-billed Warbler. ♂. testes somewhat ^{*Acticola notahensis malgacii*} enlarged. Abundant hereabouts.

4752. Green-backed Cuckoo, ♀. o. n. e.

^{May 26.} 4753. ^{*Chrysococcyx capensis*} *Siphocierax*. ♂ immature (brown plumage) ^{*angolensis*}
Bill blackish; cere dusky above, pale dull yellowish at sides, this latter color extending over lores and orbits; feet dirty-yellow, claws black. Stomach filled with fibrous pulp of palm-nuts.

During all our stay in the region of Faradje and Aba, I never saw a single individual of this species, tho along the Kibali R., just above Dungu, several were noticed in June 1911, and from Palamasia to Niangara, along the Nèle in Mar. 1913 they were common. One adult, sitting in a tree, was heard to utter a low hoarse note, but usually

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they preserve perfect silence. I have never seen or heard that they come like vultures or marabuts to the carcass of an animal.

May 29.

4754.

(photo)

coeruleus
Kite (Elanus) ♂. [immature] testes
slightly enlarged, Iris orange.
Stomach contents:
mouse-hair. Cast up a small
pellet of hair, just like an owl's.

When sailing on high, this bird resembles somewhat, in its ^{relative} size and proportions of its wings, the Bateleur Eagle, the usually they are raised at more of an angle. When dropping ^{it} upon ~~their~~ prey, instead of coming down in a headlong rush like a falcon or a swoop like a milvius, ^{it is} they are apt to descend from a considerable height, with wings raised high over the back, and claws ^{pointing} forward.

4755.

(photo)

Small Black Hornbill. ♂. t. m. e. Stomach
Lophoceros fasciatus
contents: fruit and a few pieces of an
insect. The flight of this species is noiseless.
Its voice is rather shrill, short sounds
intermediate between a whistle & a yelp,
often repeated rapidly.

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4756. Pigeon (*Turtur*^{*inditorques*}*usena*). ♂. t. e. Crop contained small green seeds. Rather common here, for its notes may be heard frequently from the high trees in strips of woods near water.

4757. Large Blue Pigeon. ♂. testes somewhat enlarged. ^{*Columba*} ^{*micineta*} Crop contained fruit. Rather common, in same situations as preceding. Neither of these pigeons ever noticed at Paradise, tho this latter has been heard at Libadi.

4758. Large Blue Pigeon. ♂. testes somewhat enlarged. Crop contained fruit.

4759. Kingfisher. ♀. o. n. e. Stomach contents: ^{*Halcyon*} ^{*malimbicus*} ^{*prenticei*} remains of insects and a spider.

This is the large Halcyon frequenting woods here, calling mostly in the early morning. This individual gave the characteristic notes.

4760. Small white-rumped Swift (*Chaetura*). ^{*salvini ogowensis*}
♀. ovary somewhat enlarged. Bill black, feet dusky purplish.
Stomach contents: winged ants. One of a pair flying about near some swampy woods, the first seen since Mar 4, 1913, when a small flock was noticed along the Nile. Swifts of these genus are forest-loving birds, and so none were ever

Niagara
June 1, 1913.

seen at Paradje (unlike some of the other swifts here, this one has one toe pointing directly backwards, & the other 3 forward)

4761. Blue-gray Warbler. ♂. t. n. e. Iris dark brown &

American Museum 157097 of Natural History.

Columba unicincta

Niagara June 1, 1913.

Lang Chaplin

base of mandible light-blue, yellowish soles. Stomach

contents: insect remains. *Parisoma plumbeum*

Cisticola notalensis malgassicus

4762. Stout-billed Warbler. ♀. ovary slightly

enlarged. Stomach contents: small insects, including a beetle and a bug.

4763. Same as preceding. ♀. ovary slightly enlarged.

Nos. 4762 & 3 are females of same species as 4751.

June 3.

4764. Sunbird. ♂. testes much enlarged. Stomach

Cinnyris splendens

contents: a few pieces of small insects,

and a ball of rubber ^{fully} ~~hardly~~ 1 cm. in

diameter (practically filling the stomach)

Sitta intermedia?

4765. Yellow Weaver with black face. ♂. t. n. e.

skull not completely ossified. Iris light-

brown, speckled with dusky, bill

black, feet dull pinkish-brown.

Stomach contents: insect-remains.

Skulking in a dense patch of manioc

bushes, where I was attracted by its

notes, resembling the nasal sounds

of the similar species common at

Paradje, but harsher and more

continuous. Heretofore I had seen

but a single example. (See no. 4773.)

Niagara
June 1, 1913.

seen at Faradje (unlike some of the other swifts here, this one has one toe pointing directly backward, & the other 3 forward)

4761. Blue-gray Warbler. ♂. t. n. e. Iris dark-brown & bill dusky, with base of mandible light-blue, feet blue, with yellowish soles. Stomach

contents: insect remains. *Parusoma plumbeum*

Cisticola notaleensis maltracii

4762. Stout-billed Warbler. ♀. ovary slightly enlarged. Stomach contents: small insects, including a beetle and a bug.

4763. Same as preceding ♀. ovary slightly enlarged

June 3. Nov. 4762 & 3 are females of same species as 4751.

4764. Sunbird. ♂. testes much enlarged. Stomach contents: a few pieces of small insects, and a ball of rubber ^{fully} nearly 1 cm. in diameter (practically filling the stomach)

4765. ^{*Sitta* *intermedia*?} Yellow Weaver with black face. ♂. t. e. skull not completely ossified. Iris light-brown, speckled with dusky, bill black, feet dull pinkish-brown. Stomach contents: insect-remains.

Skulking in a dense patch of manioc bushes, where I was attracted by its notes, resembling the nasal sounds of the similar species common at Faradje, but harsher and more continuous. Heretofore I had seen but a single example. (See no. 4773.)

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Niangara
June 4. 1913.

4766. Sunbird, ^{*Cinnyris cupreus*} ♀ im. Stomach contents: remains of a few small insects, and a ball of rubber 9 x 7 mm.

4767. Sunbird. ♂ im, ^{*Cinnyris bouvieri*} Stomach contents: remains of many small insects, but no rubber.

4768. Sunbird. ♀ im. Stomach contents: small insects (no rubber.)
^{s. 4764. *Cinnyris splendens*}

June 5

4769. Sunbird. ♀, ovary somewhat enlarged, but skull not completely ossified.
^{*Cinnyris cupreus*}

4770. Sunbird. ♀ ^{*Cinnyris chloropygus*} immature.

4771. Sunbird, ♀ ^{*Cinnyris bouvieri*} o.m.e. Stomach contents: a few tiny beetles.

no 4769 seems to be the female of the common bronzy species, no 4770 of the small red-breasted one, and no 4771 that of the species represented by nos 4708-9.

June 6.

4772. Small slaty-backed Bittern (~~Ardetta~~). ♀.
Ardeiralla sturmii.

o.m.e. Iris orange-red; eyelids, lores and mandible light yellowish-green, maxilla dusky-brown, feet light green, yellow behind metatarsi & beneath toes. Stomach contents: a water-bug (*Nepa*), a small frog, and a tiny fish. Said to have been shot in a spot covered with short grass (probably marshy).

Niagara
June 6, 1913

Sitagra intermedia?
4773. Weaver. ♀. ovary slightly enlarged. Iris
5.4765 dark brown, maxilla dusky, mandible
pale greenish-yellow with dusky tip.
feet light pinkish-brown. Stomach
contents: insect remains.

Found in the same spot as no. 4765,
was accompanied by a male. I noticed
that in two manic brushes, not
5 feet from the ground, building had
apparently commenced, tho this
does not prove that breeding would
take place at once.

4774. Sunbird. ♂. t.e. Stomach contained
5.4768 *Cinnyris splendens*
a small ball of rubber, several tiny
black bees, and other small insects.

4775. Sunbird. ♂ immature. Stomach
5.4774. *Cinnyris splendens*
contents: remains of a tiny spider
and insects, with a little rubber.

The very characteristic voice of
this sunbird consists of loud,
semi-musical "cheeping" notes,
usually uttered in series of 7 or 8,
and repeated at intervals. These
recall the large red-breasted sunbird,
(*Chalcophaps indica*)
of Faradje, but are considerably
louder, and may be heard plainly.

Niagara
June 6. 1913.

at 150 or 200 yards distance. Shorter, less pleasant calls are of course also given.

All the sunbirds collected recently were shot among the rubber trees (Manihot) at the post; these trees being now heavily leaved, and in full bloom. Although sunbirds may occasionally be seen hovering beside the bark in search of food, it is the clusters of drooping flowers that attract them most; 5 different species ^{of sunbirds} having been ^{in the rubber trees within a quarter of an hour.} observed, while, according to their usual custom, they are most numerous during the middle of the day.

To get at the blossoms they either perch below and reach upward with the bill, cling upside-down from the flower-stems, or perching above, lean far over. Some of the flowers are pierced at the side. Just how they swallow the rubber I cannot say, but when the rosette-shaped pistil is pricked in the middle the

Niagara
June 6. 1913.

milky ^{latex} sap appears at once, and many other parts of the flower, when broken, act likewise. The amount of the rubber in the stomachs of sunbirds feeding in the rubber trees is very variable; often there is none at all; often there is a large ball of clear rubber, which sometimes fills it entirely, without affecting the bird's health; at other times the rubber is mixed with insect remains. That the rubber is digested there can be no doubt, but it would be of interest to know whether this proceeds slowly or rapidly.

note especially!

June 7.
4776. Smaller Black-v. White Hornbill. ♂. t.m.e.
Bycanistes s. duboisi
Stomach contents: about 30 very large winged ants and some berries.

June 8.
4777. ~~Paludipasser uclousis~~
Small Red-v Blackish Weaver. ♂. testes slightly enlarged. Crop filled with tiny seeds. One of half a dozen flushed from dense, short grass in an abandoned plantation.

4778. ^{*Andropogon sp.*} Green thrush-like bird. ♂. testes somewhat enlarged; skull not completely ossified. Iris dark brownish-gray, bill dusky-brown a little lighter below, corners of mouth

Niagara
June 8. 1913.

yellow, feet dull light brownish. Stomach contents: fruit.

4779. Sunbird. ♀. ovary somewhat enlarged. Iris dark brown, bill black, feet black with yellowish. gray soles. Perhaps the female of the species ^(Cyanomitra cyanoaenea) represented by nos. 945 & 613, tho no males have been observed here.

4780. Sunbird. ♀ im. Stomach filled with small insects.

4781. Sunbird. ♂ juv. Corners of mouth deep orange. Probably the young of the green forest-sunbird.

Nos 4779-80-81 were secured in a wood, at some clusters of brilliant red flowers. The first two had their foreheads covered with reddish pollen.

4782. Screech Owl. ♂. t. n. e. Stomach contained Syto alba affinis. fur & bones of a mouse. Sitting during the day in a clump of bushes on an open grassy rise.

June 10.
4783. Kingfisher. ♀. ovary slightly enlarged. Stomach contents: many large winged termites.

4784. Small Black- & White Weaver. ♂. Testis slightly enlarged. Stomach contents: tiny seeds. The species is seen frequently here, in small flocks.

Niagara
June 10. 1913.

4785. ^{*Myiargos montini*} Weaver. ♂. t. n. e.
Cisticola amittorques (?)
4786. ♂ Warbler. ♂. Testes somewhat enlarged. Common here, especially on the north side of the river, where there is brush like that of Faradje.
4787. ^{*Burnesia richensowi*} Blue-gray Warbler with white throat. ♀. Ovary slightly enlarged; skull not quite completely ossified. Stomach contents: insect remains. Iris brownish-red.
4788. ^{*Crotophaga pallidus subalaris*} Brown Flycatcher. ♂. t. n. e. skull not quite completely ossified.
- June 11.
4789. Sunbird ♂ [im] but skull completely ossified. t. n. e. Stomach filled with a sticky mixture of rubber and bits of insects.
Cinnyris splendidus
4790. Sunbird. ♀. o. n. e. Stomach contents: remains of small insects mixed with rubber.
Cinnyris splendidus
4791. Sunbird. ♀. o. n. e. Stomach filled with remains of small insects.
Cinnyris borealis
- June 10.
4792. Skeleton of Hawk (*Asturimula*) ♂. t. n. e. Stomach contents: a mantis and ^{*M. monogrammica*} 2 large winged termites.
4793. Skeleton of Hawk (*Asturimula*) ♀, ovaries slightly enlarged. Mate of No 4792.
- June 11.
4794. ^{*Euphonia typicus*} Polyboroides. ♂. t. n. e. Iris blackish; orbits chrome-yellow, cere whitish; bill black; feet light cadmium-yellow.

Niagara
June 11, 1913.

claws black. Stomach contained a broken egg of a small bird.

4795. *Polyporoides*. ♀. O. N. E. Mate of No. 4794.

~~*Symphogony*~~ *typicus*.

Its blackish, orbits, cere, beak & feet as in ♂.

The cere is soft, as in the Bateleur eagle, and when the bird was hung up by the feet the orbits became deep orange, and the cere dull purplish-red. The feet do not seem to change color. The tarsal joint is very weak, and may be bent backward.

No. 4795 had in its stomach ^(incl. skull) pieces, of an adult [♀] weaver (*Ploceus*), probably caught in the nest.
or *Hyphantornis*

At Faradje, last September I shot a brownish [imm.] example as it came and alighted by some nests of *Hyphantornis* in a tree overhanging the river, but it was carried off by the rapid current, and could not be recovered. These hawks were often observed in trees along the Dungen, especially — it seemed to me — during the latter part of the rainy season (Aug.-Nov.), when the grass is very high and dense.

Niagara

June 11, 1913.

They have rather peculiar habits, proceeding with a slow, sailing, or leisurely flapping flight, hopping about the branches of leafy trees, or clinging to the side of some rotten stub, as tho in search of insects. Their small head sometimes gives them a vulturelike appearance, and the feathers of the nape form a sort of ruff. Restless, even when not pursued, they often travel continually from one tree to another in a definite direction, tho I have also seen them return, after being molested, to the same group of trees along a river. Two are the most I have ever noticed together, usually they

(Note - Jan. 28, 1914) ^{at Gayapolis} [^] *Polyboroides* is not an uncommon bird, coming from time to time to the trees where large yellow weavers breed in numbers, to eat their young.

The voice - I have heard it now several times - is shrill ("péeé, or phonetically péeé...") and weak, yet audible, if one pays attention, up to 200 yards at least.

One of these hawks was seen clinging at a knot-hole in the limb of a tall tree, beating its wings; in such places they seek no doubt young birds or other prey, and this habit is responsible for its name in the language of the Amadi, "notwawungue", the beater of holes.

Here I have never seen *Polyboroides* nursed by drongos; but I believe it is simply because the proper species of drongo is not found here.

Niagara
June 11, 1913.

They have rather peculiar habits, proceeding with a slow, sailing, or leisurely flapping flight, hopping about the branches of leafy trees, or clinging to the side of some rotten stub, as tho in search of insects. Their small head sometimes gives them a vulturine appearance, and the feathers of the nape form a sort of ruff. Restless, even when not pursued, they often travel continually from one tree to another in a definite direction, tho I have also seen them return, after being molested, to the same group of trees along a river. Two are the most I have ever noticed together, usually they go singly; nor have I ever heard the voice. They are present thruout the year.

nos. 4794-5 were killed as they came to a nest in a high tree. There were no eggs or young, only some old bones and palm-nuts. The oviduct of the female looked as tho she had finished breeding.

Niangara

June 15. 1913.

4796. Weaver. ♀. o. n. e. Pyramites ostrinus
4797. Kingfisher ♀. o. n. e. (Halcyon malimbicus)
^{5.4783}
4798. Red. v. black Weaver. ♂. t. e. Stomach contents:
Spermopsiza ruficapilla
 small seeds.
4799. Same as preceding. ♀. ovary somewhat enlarged.
 nos 4798-9 were trapped by natives - the first 3 have even seed here
4800. ♂. t. n. e. A brown-backed forest-bird (Simulididae?)
Alitta c. woodsmani
4801. Small Greenish Woodpecker. ♂. testes slightly
² Campylaea niwoca
 enlarged, left one bent as drawn under No. 1349.
4802. Buff-checked Warbler. ♀. ovary somewhat enlarged.
Citrida c. eurythops
4803. ♀. o. n. e. Rather common here, in woods,
^{pl.} Phylloscopus scandens orientalis
 where it skulls in the undergrowth,
 usually in small parties, uttering
 occasionally short hoarse notes (chüt),
 and from time to time series of louder
 harsher, or slightly nasal noises.
- may 4.
 4804. In alcohol - a greenish bullbul-like bird.
- June
 4805. A green. v. yellow bird (Simulididae?) with compressed
 beak - in alcohol.
4806. Small Wood-Hoopoe - in alcohol (Scaptelus)
- June 8.
 4807. Cuckoo (C. smaragdinus) [♂] in alcohol. The
 yellow feathers on the ventral surface fade
 when exposed to the sun, and also lose
 their color, ^{almost} entirely after 3 days in alcohol -
 coloring the alcohol yellow.
- June 15.
 4808. Large Sunbird [♀] in alcohol.

June 22. 1913.

Niangara

4809. Gray Heron. ♀. o. n. e. Stomach contents: Ardea melanocoryphala bones of a frog. The occurring regularly up to the end of April, this species is not usually observed from then till early November. This example is plainly immature, a fact that may have something to do with its presence here now.

One immature Holospila leucocoryphala brought me in July but was not preserved.

- June 23. 4810. White-rumped Swift (Cypselus ^{c. strembeli}). ♀. o. n. e. Iris dark brown, bill black, feet dusky-brown. Stomach filled with remains of small insects, probably winged ants. One of a pair flying about in Okondo's village.
4811. Rufous ^{Pomatorhinus ruficeps} winged Shrike. ♀. ovary slightly enlarged. Iris dark bluish. Stomach contents: insect-remains.

4812. ^{Ploceus luteifrons (Verr.)} Gray Weaver-bird. ♀. o. e. Irides yellow, bill black, feet pale buff. Crop contained remains of small insects. Sitting in a tree in open brush near Kongoli's. First example seen.

- June 24. 4813. ^{Hylia prasina} Greenish Warbler. ♀. ovary somewhat enlarged.
4814. Grayish Sunbird with steel blue forehead and throat. ♂. t. e. Intestine contained ^{Cyanometra cyanolaeus} small fruit stones. Came to a tree, where

840

Rungu

June 24, 1913.

other birds were eating small berries. Its song is shrill and but slightly musical, not at all like the other birds.

4815. *Som.*

How
com

l. ♂. t. e. Stomach

5 grasshoppers.

June 25.

4816. *M.*

My
a sm

at it flew down
the river.

June 26.

4817.

Crested Guinea Fowl. ♀. ovary slightly
Guttera pallasi *smithi*
enlarged. Crop contained many round
starchy fruits, small fruits, 2 millipedes,
4 small snails, 1 small spider, 2 bugs,
3 large termites, 1 large ant.

4818.

Hirundo nigrita

Blue Swallow with white throat-patch.

♀ imm. One of half a dozen flying about in
the post. Not noticed at Niangara, where,
however, the rufous-crowned species, with
slender tail feathers was seen frequently
at the post.

June 27.

4819.

Crested Guinea Fowl. ♂. t. e. Stomach
Guttera pallasi *smithi*
crop contained small pieces of manioc.

Iris dark-brown, maxilla dull light-
greenish, mandible light-blue, orbits
fleshy dusky bluish, throat and fore-neck
vermilion, rest of head and neck blue,

522

840
Rungu
June 24, 1913.

other birds were eating small berries. Its song is shrill and but slightly musical, not at all loud.

4815. Small Gray Hornbill. ♂. t. e. Stomach
Horizoceros h. granti
contents: 8 large winged ants, 5 grasshoppers,
1 beetle. Skin beneath angle of jaw pink. ^{mounted for Congo forest group}

June 25.

4816. Night Heron. ♂. t. n. e. Stomach contained
Nycticorax nycticorax
a small fish. Shot at it flew down
the river at dusk.

June 26.

4817. Crested Guinea Fowl. ♀. ovary slightly
Guttera pallasi seth-smithii
enlarged. Crop contained many round
starchy fruits, small fruits, 2 millipedes,
4 small snails, 1 small spider, 2 bugs,
3 large termites, 1 large ant.

4818. ^{Hirundo nigrita} Blue Swallow with white throat patch.

♀ im. One of half a dozen flying about in
the post. Not noticed at Niangara, where,
however, the rufous-crowned species, with
slender tail feathers was seen frequently
at the post.

June 27.

4819. Crested Guinea Fowl. ♂. t. n. e. Stomach
Guttera pallasi seth-smithii
crop contained small pieces of manioc.

Iris dark-brown, maxilla dull light-
greenish, mandible light-blue, orbits
& lores dusky bluish, throat and fore-neck
522 vermilion, rest of head and neck blue,

Rungu

June 27. 1913.

feet dusky ~~gray~~, darkest on toes, becoming bluish about tarsal joint.

4820. Same as preceding. ♂. t. n. e. Crop
~~S. p. seth-smithi~~
contained small pieces of manioc.

4821. Same as preceding. ♀. e. n. e. Colors
~~S. p. seth-smithi~~

Congo Esp. American Museum of Natural History.
58348
Lophoceros granti
Rungu. June 24. 1913.
Lange Chapin

ad as in ♂. feet a little

In this guinea fowl both sexes have the trachea looped into the hollow of the clavicles. There is the same hanging fold of skin on the back of the neck as in the Guttera collected at Nkayu and Samangui, but instead of disappearing almost entirely after death, in the present case it persists even after skinning.

Nos. 4819-21 were secured ^{this morning} at the same place as No. 4817 was shot late yesterday afternoon, on the border between some swampy woods and a neglected plantation of bananas and manioc. There was a flock of 8 or 10, that rose from the ground with a great noise of wings, scattered, and perched high in trees. Later the voice was heard, resembling the longer notes of the common *Nunida*, but

Rungu

June 27, 1913.

feet dusky ~~gray~~, darkest on toes, becoming bluish about tarsal joint.

4820. Same as preceding. ♂ t. n. e. Crop
S. p. s. smithi
contained small pieces of manioc.

4821. Same as preceding. ♀ e. n. e. Colors
S. p. s. smithi
of bill, eyes and head as in ♂. feet a little browner.

In this guinea-fowl both sexes have the trachea looped into the hollow of the clavicles. There is the same hanging fold of skin on the back of the neck as in the *Gallinula* collected at Nkayu and Gamangui, but instead of disappearing almost entirely after death, in the present case it persists even after skinning.

Nos. 4819-21 were secured ^{this morning} at the same place as No 4817 was shot late yesterday afternoon, on the border between some swampy woods and a neglected plantation of bananas and manioc. There was a flock of 8 or 10, that rose from the ground with a great noise of wings, scattered, and perched high in trees. Later the voice was heard, resembling the longer notes of the common *Numida*, but

Runge

June 27, 1913.

dryer and not so loud. I am told that they are usually very difficult to flush, unless one has a dog - as we did. 482

This is probably the species of blue-spotted guinea-fowl found near Bafuka, Runge and Niangara, in woods.

^{*Bucconodon duchaillui*}
4822. Red-crowned Barbet. ♂. testes slightly enlarged. This is a forest species, whose voice we began to hear near Kongoli's. Its characteristic note, heard from the woods, is a soft, low, rolling sound, a sort of whir or purr ("b-r-r-r-r-r-r") lasting $1\frac{1}{2}$ or 2 seconds. Here at Runge it is common.

^{*Dierurus atripennis*}
4823. Rufous bird with broad bill. ♀. ovary slightly enlarged. Stomach contents: pieces of a millipede and small insects.

4823. Drongo (forest species) ♂. t. n. e. ^{*stictorhina*} ^{*calypina*}

^{*Dryocopus senegalensis*}
4824. Shrike. ♀. ovary slightly enlarged. Iris orange-red. Stomach contained a spider.

^{*Eurostocheus cyanopterus*}
4825. Small thrush with rufous tail. ♂. testes somewhat enlarged. Stomach contents: a grasshopper. This species was heard but once at Niangara.

^{*Campylorhynchus superciliosus*}
4826. Warbler. ♀ im. A bird of the scrubby second growth that springs up in old

Rungu

June 27. 1913.

clearings in woods. Heard at Niangara.

4827. ^{macrorhynchus flavicans} A green-yellow & gray warbler-like bird, with slender bill. ♂. t. e. A bird of the undergrowth, uttering a prolonged series of gradually descending whistles, about a dozen in number, heard commonly in the morning. The present example was shot while giving these notes.

4828. Same as preceding. ♀. ovary slightly enlarged; skull not quite completely ossified.

June 28. ^{Phyllastrephes indicatus}

4829. A greenish thrush-like bird. ♂. testes slightly enlarged. Stomach filled with berries.

- June 29. ^{Hirundo nigrita} 4830. Blue Swallow. ♂ im.

4831. ^{Hirundo gordonii} Brown-rumped Swallow. ♀. o. e. an egg in oviduct.

June 30.

4832. Large Black & white Hornbill. ♂. t. e. Iris dark brown, orbit yellowish white, rim of eyelids blackish. Stomach contents: a kernel of a fruit.

The smaller black & white species was seen several times near Rungu.

4833. ^{mentalis} Shrike (Sigmodes) ♀. o. n. e. Bill dark red, orange-red at tip; iris dark brown

Reungu

June 30. 1913.

with outer edge chrome-yellow, sclerotic membrane yellow with orange inner rim, rim of eyelids whitish (but orange inside where this cannot ^{ordinarily} be seen); feet bright orange-red, claws brownish.

Stomach contents: remains of a young green grasshopper and other insects.

4834. Same as preceding. ♀ imm. Bill black, iris grayish-green, becoming dark brown on inner edge, rim of sclerotic membrane dark brown, rim of eyelids blackish, feet orange-red, claws brownish. Stomach contents: a rather large green caterpillar and insect remains.

This bird's name in the language of the Mangbetu, translated literally, is "leopard-bird". See note under No. 4667.

July 1. *Phainopepla nitens*

4835. Yellow & black climbing Weaver. ♀. ovary slightly enlarged. Stomach contents: remains of insects and a caterpillar. Fell dead with a spider in its beak.

July 2.

4836. Warbler, *Vireo lateralis* ♀. ovary slightly enlarged. Stomach contents: insect remains.

4837. *Vireo lateralis* Young of preceding ♀. imm. Stomach contents: a beetle and pieces of other insects.

Found together, in company with a male.

Runge

July 2, 1913.

4838. Cuckoo. ♂. testes slightly enlarged. Iris *Circococcyx* ~~muchowii~~
dark brown, rim of eyelids and corners
of mouth lemon yellow; maxilla black,
mandible dull light greenish; feet chrome
Stomach contents: remains of caterpillars.
yellow. A forest bird, easily recognised
by its voice; never heard at Niangara,
but, ^{again} at Iairo on July 3.

Nala *Campephaga quiscalina* *martini*

4839. Cuckoo-Shrike. ♂. Testes much enlarged.
Stomach contained remains of a green
orthopterous insect & a small caterpillar
Tongue and interior of throat orange-red
Runge
4840. Mate of preceding. ♀. o.e. Iris very
dark brown, bill black, feet blackish
with yellowish soles, Tongue and
interior of throat orange. Stomach
contents: remains of small caterpillars.

4841. ^{crested} A gray hawk with weak feet. ♂. testes
Bazyl cuculoides.
somewhat enlarged. Iris cadmium yellow,
with dark brown inner rim; bill blackish
cere dusky, corners of mouth pale gray;
feet cadmium-yellow with black claws.
Stomach contained a rather small
grasshopper. One of a pair, found in
the forest.

Diarrhues coracinus

4842. Drongo (with widely forked tail), ♂. t.e.
Iris orange-red; bill & feet black. Stomach

Nala

July 3. 1913.

contents: remains of insects. This is a very pugnacious species, frequenting the more open spots in the border regions of the forest. Nearly every Polyboroides I have seen ^{from} near Medje to Rungu was being mobbed by 2 or more of these drongos, and the present individual gave a hot chase to a small streaked breasted Halcyon. The voice is loud,

Nala July 3. harsh and scolding.

4843. White-rumped Swift (*Cypselus*) ^{*caffer streubeli*} ♂. testes somewhat enlarged. Stomach filled with remains of winged ants.

One of a pair breeding in an ^{abandoned} swallows' nest, constructed of pellets of red clay, in the angle between the wall and ceiling of the open middle room of a house in the abandoned port of Nala.



Diameter of entrance
3.5 cm

His mate had already laid her 2 pure white

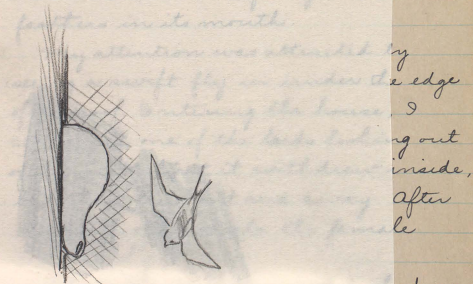
eggs on a thick soft bed, composed of the white down from seed-pods of the rubber trees, and many feathers, from white chickens, fruit-pigeons, and weavers, as well as a few from the

Nala

July 3. 1913.

swifts themselves, a small bit of rag,
and a pinch of green moss. Below
were some pieces of dry grass, probably

4843
was
material
had been collected by the swifts, as it
was all glued together. Moreover
small feathers had been glued to the
inner walls right out to the edge of
the entrance, and the present
occupant, shot as it came back to
the nest, had a half dozen small
feathers in its mouth.



fresh that I am not sure its original
builders ever utilized it. Were they
dispossessed by the swifts? At any
rate their identity was easily

Nala

July 3, 1913.

swifts themselves, a small bit of rag, and a pinch of green moss. Below were some pieces of dry grass, probably brought by the swallows, but it was clear that most of the other material had been collected by the swifts, as it was all glued together. Moreover small feathers had been glued to the inner walls right out to the edge of the entrance, and the present example, shot as it came back to the nest, had a half-dozen small feathers in its mouth.

My attention was attracted by seeing a swift fly in under the edge of the roof. Entering the house, I could see one of the birds looking out of the nest, first it withdrew inside, but then flew out and away. After the death of her mate the female became shy.

The exterior of the nest looked so fresh that I am not sure its original builders ever utilized it. Were they dispossessed by the swifts? At any rate their identity was easily

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established, for a pair of the brown-rumped swallows ^{H. s. goodsoni} (with black cheeks) were building a new nest, in precisely the same situation, in another house close by.

I have often wondered: where do the swifts get their feathers? I have never seen a palm-swift or any other pass close enough to the ground to pick anything up, and can only imagine that they catch them floating in the air. And why do they so often get feathers of fruit-pigeons?

Psaltisprogne nitens centralis

4844. Small black Swallow. ♂. Testes somewhat enlarged. The species with black under wing-coverts & tail very slightly forked. Not seen north of Kongoli's.

Phylloscopus erythronotus

4845. Red-rumped Barbet. ♂. t. e. Shot as it sat in a high tree, giving its easily recognized notes, a slow succession of "cok"-s, following each other at intervals of $\frac{2}{3}$ or $\frac{3}{4}$ of a second, without any periodic break, as in the two smaller species also heard here, continuing indefinitely, sometimes for several

Nala

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minutes. The notes are loud enough to be heard 400 yards. They resemble much the simpler call of the orange-crowned *Barbatula* (No. 4558), the probably louder.

In coming from Niangara we first heard this ^{red-rumped} barbet a little south of Ohondo's village, and from there on it was heard regularly. The species seems not to be very numerous, and usually calls only from the higher trees, exhibiting an unusual shyness, and often flying away when one stands too long below attempting to catch sight of it.

4846. ^{*Trochiloides aeneus*} Small yellow-^{*trochiloides*}-black Barbet. ♂ testes much enlarged. Stomach contents: fruit. Shot while calling. As I have long suspected, it is this species, with yellow lines on the head that gives its notes in very rapid succession, and often 8 to 10 between the periodic breaks. At Niangara only the slow-calling species was heard, the present form being common from Kongoli southward.

850
Sairo

July 3, 1913.

- 4847 ^{*Melanopteryx maxwelli* (Alex.)} Lesser Black Weaver. ♀. ovary somewhat enlarged. Stomach contents: a green caterpillar and many tiny red berries.
- 4848 ^{*Melanopteryx maxwelli* (Alex.)} Same as preceding. ♀. ovary somewhat enlarged. Stomach contained many small berries.

In the ^{open} center of a native village stood a single tall tree, with a long, straight, bare trunk, ~~the~~ branches of its leafy crown bearing at least 200 nests of weaver-birds. This is far from meaning that there were 200 pairs of weavers, but they were anyhow very numerous, flying continually back and forth, stripping the leaves of the palms about the edge of the village, or plucking other leaves to make their nests rain-proof. Perhaps

in a nest of *Melanopteryx*. at Avaluhi, in Aug. 1913. It was the sole occupant.

4852

850
Sairo

July 3, 1913.

- 4847 ^{*Melanopteryx maxwelli* (Alex.)} Lesser Black Weaver. ♀. ovary somewhat enlarged. Stomach contents: a green caterpillar and many tiny red berries.
- 4848 ^{*Melanopteryx maxwelli* (Alex.)} Same as preceding. ♀. ovary somewhat enlarged. Stomach contained many small berries.

In the ^{open} center of a native village stood a single tall tree, with a long, straight, bare trunk, ~~the~~ branches of its leafy crown bearing at least 200 nests of weaver-birds. This is far from meaning that there were 200 pairs of weavers, but they were anyhow very numerous, flying continually back and forth, stripping the leaves of the palms about the edge of the village, or plucking other leaves to make their nests rain-proof. Perhaps half belonged to this species, the others being *Melanopteryx nigerrimus* and *Hyphantornis cucullatus* ^{*abyssinicus*?}, the latter least numerous. The difference in size between the two black species is difficult at times to appreciate, but one can see from afar the difference

Sairo
July

Sairo
July
484

485

486

No 485

Sod
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Iairo

July 3. 1915

in the color of the iris, that of the smaller form being nearly white.

The notes of all three weavers are much alike

Iairo.

July 4.

4849. Large white-rumped Swift (*Chaetura*) ♂ t. s. ^{*u. sharpei*}
Iris dark brown, bill black; feet bluish gray,
light above, becoming dusky on toes.
Stomach filled with winged ants.

4850. Mate of preceding. ♀ ovary somewhat
enlarged. Stomach filled with winged
ants. These 2 swifts were flying
about in the deserted station of Iairo.
On July 2nd a pair was ^{noticed} ~~flying~~ in
Okondo's village, ^{flying} ~~and flew~~ about one
end of his great hall as tho they might
be nesting under the peak of the roof.
The voice of this species I have never heard.

4851. Gray Parrot. ♀ ovary slightly enlarged.
Prittacus ethiopicus.

Crop & stomach contained soft white seeds.

A pair was once seen to fly over
Okondo's village, and one was heard at
Rungu, but they are not common
beyond the edge of the dense forest.

4852. Green-backed Cuckoo. ♂. testes somewhat
← see note ^{*Chrysococcyx caprius*} enlarged. Stomach contents: remains of caterpillars

July 5. 1913

4854. Gray Cuckoo with yellow bill: ♀. o.e.
Centurus o. intermedius
 Stomach contents: 2 green grasshoppers
 and 4 caterpillars.

4855. Long-tailed Barbet. ♂. t. n. e. Iris rather dark red; bill & naked face light cadmium yellow, feet dark greenish-gray, with soft skin on outer side of metatarsus light green, and soles yellowish.

A rather common bird from Rungu to Paua, judged by the frequency with which one hears its voice, a slow succession of notes like "cook", repeated indefinitely at intervals of about 2 seconds. It does not choose a conspicuous perch for this performance, and indeed is often difficult to see, in spite of its size.

July 6. *Dendropicos pœcillus* *caemus*
4856. Woodpecker. ♀. o.e.
lanigius lühderi

4857. ^{smaller than 4856} Shrike, with black back, and light rufous crown, throat & breast. ♂. testis slightly enlarged. Iris dark-red; bill black; feet light-blue. Stomach contents: remains of a beetle, a caterpillar, a "pill-bug", & a tiny snail.

448. B.B. Aug.
1923 typed copy
4000 ft. alt.
under canopy
T. g. *gossypifolia*,
standing, only one
found

* To the northward of the foot of Pawa is a chain of hills running roughly east & west, which one crosses in going to Iairo, but which seemed to me — when we passed in 1910 — to offer little of interest in ornithology, the hill we climbed (that of Chief Bakakenai) being covered with matete and other high grass, scrub, and showing almost no bare rock. Now, on the return journey, I heard some things about Namambula, the highest of these hills, situated on the right bank of the River Nava & NW of Pawa, that made me think it worth while to take a slightly longer route from Iairo to Pawa, by way of the village of ^(just after leaving Iairo we got the first view of the hills) Domba, a chief of the Medje. At this village then we spent the night, and early the next morning started for the hill, which looked very large, stood fairly barren, with rocks at its summit. Crossing a deep, forested hollow, we came to the lower slopes of the hill, which are ~~covered~~ ^{forested} all round. A little way up, there was a village and plantations, a ~~fairly good~~ ^{small} ~~plantation~~ ^{plantation} of matete, and then more forest, but less than half way up the trees stood almost entirely, giving place to an ill defined zone of elephant grass, this being ^{some} superseded by a low growth of grass ferns, etc., not reaching (at this season) higher than one's knees. The ground became stonier, and perhaps this was the reason for the change in the vegetation. There seemed to be a straight, well-defined path up the hill, but it was steep, and once we stopped for a little breath. At the very top, as we ~~could~~ ^{could} seen from the village there was a ridge of hematite rock (showing some ~~distinction~~ ^{distinction} for the compass), running in the same direction as the line of hills, and dropping off sharply, ^{on the} ~~only~~ ^{on the} a few yards high, on the ~~northern side~~ ^{northern side}. These rocks ~~were~~ ^{were} completely overgrown with ~~lichen~~ ^{lichen} so as to appear at a little distance light gray.

A considerable number of natives had accompanied us, out of curiosity, I suppose, and I now found there was some superstition connected with the place.

Most of the rocks showed ^{no special} peculiarity whatever, but toward the eastern end was one large flat topped block, a little lower than the others, whose upper surface exhibited a number of rounded hollows, in each of which a hard crust of rain water had collected, ~~which~~ ^{while} one small flat spot was so smooth as to seem to have been polished. The natives looked at this with so much interest that I asked what it was. They replied that this was made by the "people of the hill", who were supposed to be "napi" or spirits, and not to be seen. At another spot then, they showed me a small horizontal fissure that seemed to be much worn below, this being a place they said where these creatures went in.

Could it be that these hollows were the effect of lightning? I hardly think so, inasmuch as they were on only one rock, ~~where~~ ^{where} many of the others, but I remember having seen granite hills spots whose light surface, as well as thin pieces of stone lying about, showed that something had torn off a sheet of the rock, and I often wondered if this was not due to electricity. Of course hematite might be expected to act quite differently from granite.

There were practically no typical hill plants, again the birds being not so far as birds and mammals were concerned, I was greatly disappointed. There were absolutely no signs of hyenas, nor were any other mammals observed. Although I had seen a number of streak-breasted swallows flying toward the hill yesterday, none were in evidence now, nor were any of these nests to be found in the few suitable shelters offered by the rocks. I thought once I saw a white-rumped Cyphelus, but probably was deceived, for afterwards a single palm swift came flying around. All the birds seen on the hill were those of the surrounding territory. On the very tip were some of the very tiny *Cisticol*as, as well as a couple of the stout-billed species of the same genus, and a red warbler (*Calamocichla*) could be heard calling in the matete farther down. A few weavers (*Pyrrhuloxia*) in dull plumage would also fly up from the grass. ~~where they seem to moult considerably later than at~~ ^{where they seem to moult considerably later than at} ~~Paradji, hardly any being very red even by July 15.~~

We went up in a fog, and at first could see nothing below, but gradually it cleared off, and disclosed a pretty view of the whole country round about, much improved by the abundance of palms, and varied by the contrast of the light yellowish-green areas of grass surrounded by the dark green forest. These patches of grass were all on the northern and eastern sides, in other directions the forest being uninterrupted. Indeed this hill ^{is} exactly on the border of the unbroken forest. The ~~water of the~~ ^{water of the} Nava could not be seen thru its wooded border.

The relative height of the hill I should estimate at between 200 & 250 yards. ~~Relative to the water there was no sign of the hill. Some say they see another~~ ^{Relative to the water there was no sign of the hill. Some say they see another} ~~hill in the distance (evidence) common all about his village.~~

Indicate road through River, crossed the same
chain of hills in our course long line of
mountains.

Pawa

July 6, 1913.

4858. ^{*Colanociella sp.*} Large Warblers ♂. testes slightly enlarged. Stomach contents: a caterpillar (hairless) and remains of small insects. A rather common inhabitant here of dense tracts of elephant-grass (*mateti*); probably ^{*baka* in Barotsa of N.E.} the same species as the "papyrus-bird" of Faradje, with which it agrees in habits and notes. These characteristic notes were heard once from a patch of *mateti* close to the station at Faradje, and also in ~~a~~ similar vegetation on the side of a hill near Vanherckhovenville. About Niangara where there is little or no papyrus or elephant grass, it was never noticed. The other 2 birds typical of papyrus-swamps at Faradje have not been heard hereabouts. According to Commandant Siffer there is a large papyrus-swamp near the border between the Uele & the Ituri, NE of Pawa. Very likely they would be found there.

4859. ^{*Myanopteryx maxwelli (A. G. S.)*} Lesser Black Weaver. ♂. testes much enlarged. Stomach contents: 2 hard seeds and some soft green vegetable matter. (over)

Pawa

July 6, 1913.

4859

(continued)

This bird was one of a colony breeding in a large tree close to a native village. Besides the present species there was also *Hyphantornis cucullatus*, *Melanopteryx nigerrimus*, and a few of the orange species like No. 4559.

July 7.

4860

Chlorophoneus fuscaei

Black-gray & white Shrike with white supercilious line. ♀. o.m.e. Stomach contents: caterpillars.

4861.

4857.

Laniarius lilidensis

Shrike. ♂. t. e. A common bird, very typical of this region, first heard a little S. of Missai, very numerous from Pawa to Balonde. It is very wary, haunting dense bushes or thickets, and might easily escape observation, were it not for its voice. The note of the male, often repeated at intervals of a couple of seconds, is a hoarse "whaw" or "k-law" lasting about 1 second, and having often a slightly metallic tone that might lead one to attribute it to a barbet. The female - for they usually go in pairs - frequently answers with a curious "k!-k!-k!-k!...."; and the male, if approached, may emit a protracted, disagreeable guttural sound. The skin of the neck

Pawa

July 7, 1913.

is thickened, yellow^(inside) and distensible in the male, but normal in the female. Probably this is in direct relation with the voice.

July 8. *Sarothra rufa bonapartei*

4862. Small Red-headed Rail, with black body streaked with white. ♂. testes much enlarged. Iris dark-brown; upper portion of maxilla dusky, rest of bill light blue; feet dark grayish-brown. Stomach contents: tiny seeds, mixed with remains of insects.

July 9. *Sarothra rufa bonapartei*

4863. Same as preceding. ♂. testes much enlarged. Stomach contents: tiny seeds.

Sarothra rufa bonapartei

4864. Same as preceding. ♂. testes much enlarged.

No 4862 was shot, & 4863 & 4 were caught with the hand by natives, in a floating bog, 2 hours march N.E. of Pawa.

July 10. *Apaloderma nana brachyrrhinum*

4865. Frog. ♂. testes slightly enlarged. Iris reddish-brown, naked skin above eye pale bluish-green, 2 naked patches beneath eye light yellowish-green, skin of throat light-blue; base of bill deep cadmean-yellow, tip light greenish-gray; feet pinkish-brown. Stomach contents: remains of caterpillars.

Pawa

July 10. 1913.

Ploceus superciliosus (Shell.)
4866 ^A Weaver. ♂. testes small; but skull completely ossified.

^{*Calamocitta*}
4867 ^{s. 4858} ^A Large Warbler. ♂. testes somewhat enlarged. Iris rather light reddish-brown. maxilla dusky-brown, mandible buff. corners of mouth yellow; feet greenish-gray with yellowish soles. Stomach contents: insect-remains. Common in the elephant grass from Pawa to Balondo.
4868. ^{*Cisticola natalensis malgache*} Stout-billed Warbler. ♂. testes slightly enlarged. Stomach contents: remains of orthopteron insects & small beetles.

July 12.

4869. Dark Slaty Rail. ♀. ovary somewhat enlarged. Stomach contents: small seeds, insect remains, and a few bits of stone.

4870. Young of preceding. ♂ juv. Iris dark greenish-gray with inner rim dusky-brown, bill black with whitish tip and a pink area above & behind each nostril. feet dark-brown tinged with reddish. Note the small gray claw on the bastard wing, also present, tho less conspicuous, in adult.

No 4869, with three young like No. 4870, was caught by natives in the hand, in dense grass nearly waist.

Pawa

July 12, 1913.

high, in a bog.

July 11.

4871. Crested Cuckoo. ♀. o. n. e. Iris very dark-brown; bill black; feet light-blue with black claws, and yellowish gray soles. Stomach contained remains of a dozen caterpillars

July 12.

4872. Least Bittern. ♂. t. e. Stomach *Ixobrychus exilis* contained bones of a tiny frog and

4868. A tick clinging to the head of this warbler (*C. n. alensis kapiistna* Lykes). was identified by J. Bequaert as *Ixodes daveyi* Nuttall. — Sept. 1929.

in the afternoon. The following morning another ♂ was seen.

4875. *Sayornis saya bonapartei* ♂. ♀. ovary somewhat enlarged. Iris dark-brown; bill dusky above, bluish below. Both ♂ & ♀ of this species have ossified tendons in legs, near tarsal joint.

4876. *S. r. bonapartei* Same as preceding. ♀. ovary somewhat enlarged. Stomach contents: remains of small insects, mixed with seeds.

July 13.

4877. *S. r. bonapartei* Same as preceding. ♂. testes much enlarged. Stomach contents: small seeds and insect remains. (over)

Pawa

July 12, 1913.

high, in a bog.

July 11.

4871. Crested Cuckoo. ♀. o. m. e. Iris very dark-brown; bill black; feet light-blue with black claws, and yellowish gray soles. Stomach contained remains of a dozen caterpillars.

July 12.

4872. Least Bittern. ♂. t. e. Stomach *Ixobrychus paysoni* contained bones of a tiny frog and pieces of a mole-cricket.

4873. Least Bittern. ♂. t. e. Stomach *Ixobrychus paysoni* contained bones of a ^{small} fish; oesophagus a brown minnow and a tiny catfish.

4874. Least Bittern. ♀. ovary much enlarged *Ixobrychus paysoni*. All three of these bitterns were flushed from the dense growth of grass and sedge in a floating bog, late in the afternoon. The following morning another ♂ was seen.

4875.

Sayornis saya bonapartei
34862. Rail. ♀. ovary somewhat enlarged. Iris dark-brown; bill dusky above, bluish below. Both ♂ & ♀ of this species have ossified tendons in legs, near tarsal joint.

4876.

S. r. bonapartei
Same as preceding. ♀. ovary somewhat enlarged. Stomach contents: remains

July 13.

of small insects, mixed with seeds.

4877.

S. r. bonapartei
Same as preceding. ♂. testes much enlarged. Stomach contents: small seeds and insect remains. (over)

July 13. 1913.

In answer to my inquiries about the mournful sound so often heard here at night, and attributed by the Mangbetu & Bangba to a bird called "Ni-bè-bu", the Mabudu asserted unanimously that it was produced by a small bird (*Spizella*) as it walked along a little path it has cleared in the brush. It was difficult to secure, they added, except in the bogs N.E. & E of Pawa, where the well-known native salt is made. On July 8 Kuma was therefore sent with a native, and returned the following day with three of these small rails, said to be the bird in question. They were heard to call in the marsh, and then were surrounded by natives, 2 being caught in the hand and 1 shot as it sat on some matted grass. The note during the daytime was said to be different, and as the same rail or one very similar exists at Paradise, where the Nebelu was not heard during all our stay, I doubted if this was the real author, and so went myself to the marshes on the afternoon of July 12, spending the night in a neighboring

Pawa

July 13, 1913.

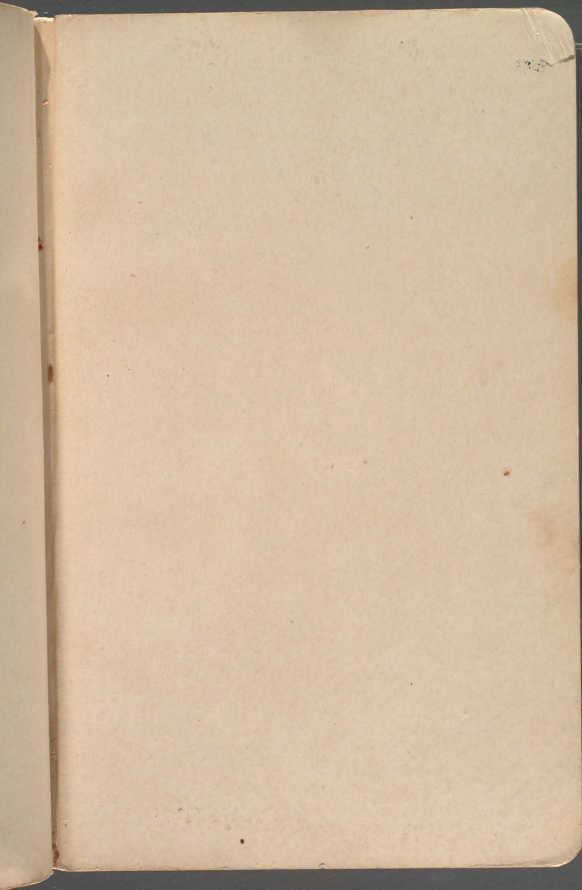
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village.

These interesting quaking bogs, known to the Europeans of the region as "marais moruants" or "digadig" (possibly "tikatika" - ^{for swamp} Kingwana) are common along the affluents of the R. Gada, but as far as I know rare elsewhere. They have the appearance of perfectly level, open, prolonged meadows, from 200 to 600 yards wide, and follow the course of some stream of water, usually not conspicuous, or even hidden in the forest which borders both sides of the bog. Thus while crossing on one of the narrow ^{native} causeways, one can often see half a mile or more upward and downward, until the view is closed in by a curve in the valley, for there are only a very few small trees or stunted raphia-palms ^{any} growing in the middle of the bog, and the herbage, composed mainly of sedges and fine grasses is only knee-high, or a little longer and denser where it has not been cut for the manufacture of salt. In many spots there is a great deal of moss looking & growing exactly like the Sphagnum at home.

The surface of the quagmire, composed of the matted roots of this vegetation, floating on the underlying body of thin mud or water, is often so solid as to move but little beneath one's weight, but at times it rolls in waves when walked upon, or the water rises to one's calves; and all spots of open mud

6429



Inches

1

2

3

4

5

6

7

8

