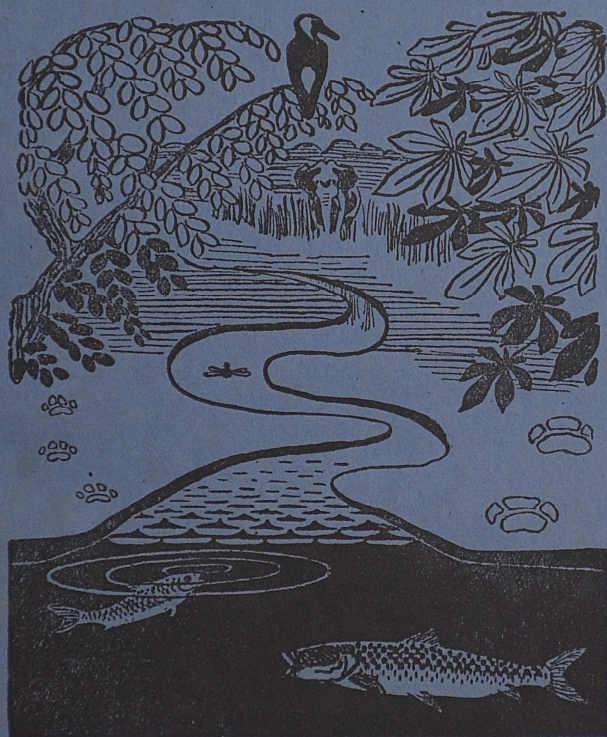


VOL. XXIV.

JULY, 1949

NO. 1

JOURNAL OF THE BENGAL NATURAL HISTORY SOCIETY.



Edited by C. R. ROY, M.A., B.L.

PRICE TO MEMBERS :
Rs. 2-8-0

PRICE TO NON-MEMBERS
Rs. 4-0-0

60

BENGAL NATURAL HISTORY SOCIETY.

Estd. 1923.

Chairman—Dy. Commissioner, Darjeeling.

Vice-Chairman—Divisional Forest Officer.

Committee Members for 1949-50.

SIR UDAY CHAND MAHATAB, K.O.I.E., <i>Maharajadhiraj of Burdwan.</i>	DR. S. C. LAW, M.A., PH.D. DR. S. K. MAJUMDER, M.SC., PH.D. (Munich)
MR. J. R. JOHNSON.	MR. B. GHOSH.
„ P. P. PRODHAN.	„ M. SAIN.
„ W. H. MATTHEWS.	

Financial Advisory Committee :—

MR. N. C. GOENKA, MR. A. V. PULLAN, MR. A. D. SARMA.

Secretary—MR. C. R. ROY, M.A., B.L.

The Society under the name Darjeeling Natural History Society was started about the end of 1923, the objects being to maintain the Museum in a proper condition, to promote the study of Natural History and to get together, as complete as possible, collections of Natural History specimens from a limited area, including "the Civil Districts of Jalpaiguri and Darjeeling and the State of Sikkim", as well as what could be procured from the neighbouring countries of Tibet, Bhutan and Nepal.

Government and Municipal grants not being sufficient for our purpose, it was proposed to enrol members so as to increase our funds, and a Quarterly Journal has been started. The Journal is no longer confined to articles on the Natural History of the above mentioned area, but includes those from anywhere. It is hoped that everybody will join the Society and co-operate to make the Museum and Journal a success.

The annual subscription is only Rs. 10; Life Membership Rs. 150; those who have been members for over 20 years can become Life Members on a payment of Rs. 75.

Members get copies of Journal free and other privileges. All facilities are also given to members to study the museum collection and expert advices are given to them regarding collection preservation, and identification of specimens.

Application for membership should be made to :—

THE CURATOR,
Natural History Museum,
Darjeeling.

CONTENTS OF VOLUME XXII

No. 1.

	PAGES.
The North Indian Lorikeet by C. M. Inglis	1
The Starlings and Mynas of Bengal with special reference to North Bengal by C. M. Inglis, F.Z.S., B.E.M.B.O.U.	3
On a List of Birds of Darjeeling and Neighbourhood by W. H. Matthews & V. S. Edwards (Continued from Vol. XXI p116)	6
Shikar Tales by C. I. Shorley (Continued from Vol. XX. No 4 page 133)	13
The Snakes of Northern Bengal & Sikkim by G. E. Shaw, E. O. Shebbeare & P. E. Bakker (Continued from Vol. XXI page 65)	17
The Lepidoptera of a Trip to Phalut, Oct-Nov. 1927, by D. G. Sevastopulo, F.R.E.S.	25

No. 2.

The Piculets and Wryneck of North Bengal by C. M. Inglis, F.Z.S., B.E.M.B.O.U. (with coloured plate.)	31
Birds at our bird bath at Baghownie, North Behar by C. M. Inglis, F.Z.S., B.E.M.B.O.U. (Continued from Vol. XXI page 136.)	35
Short Bird Notes from S. E. Sikkim by P. I. R. Maclaren	46
An Elephant Safari in Kenya by Anonymous	56
The Snakes of Northern Bengal and Sikkim by G. E. Shaw, E. O. Shebbeare and P. E. Bakker (Continued from Vol. XXII page 29).	62

No. 3.

Three species of Flowerpeckers found in North Bengal by C. M. Inglis, F.Z.S., B.E.M.B.O.U. (With coloured plate)	71
On A List of Birds of Darjeeling and Neighbourhood by W. H. Matthews & V. S. Edwards (Continued from Vol. XXI)	77
The Great One-horned Rhinoceros. From Notes by E. O. Shebbeare and A. N. Roy with photograph by H. E. Tyndale	88
Some observations on the Territories of Black-backed Indian Robins by J. C. Culshaw	92
The Hawk Moths of Darjeeling and Sikkim by Col. E. B. Scott, F.R.E.S. (Continued from Vol. XIX page 71)	95
The Cicadas of North Bengal and Sikkim by Lt. Col. F. C. Fraser, I.M.S., M.D., F.R.E.S. (Continued from Vol. XVIII page 72.)	100

No. 4.

Game Birds of Sikkim including Darjeeling District and the Jalpaigury District, Bengal, by C. M. Inglis, F.Z.S., B.E.M.B.O.U. (Continued from Vol. IX page 92.)	105
Notes from Darjeeling and Sikkim December 1945 by P. I. R. Maclaren	112
Shyness in Birds and Animals by M. E. Wolfe Murray	121
Some Exciting Experience with Tiger in Burma by W. S. Thom (Continued from Vol. XXI page 122.)	123
The Hawk Moths of Darjeeling and Sikkim by Col. F. B. Scott, F.R.E.S. (Continued from Vol. XXI p 100.)	130

CONTENTS OF VOLUME XXIV No. 1.

	PAGES
1. The Bush-Chats by C. R. ROY, M.A., B.L., F.I.A.I....	1
2. Notes on Mammals, Sikkim & Southern Tibet by P. I. R. Maclaren	6
3. Bird Recordings at Ghoom & Tumsung, Dar- jeeling by Capt. R. H. Baillei	8
4. Breeding of Saras Crane (<i>Antigone a. antigone</i>) by R. K. Lahiri.	20
5. The Wild Boar by (Anonymous)	21
6. My Robins by John Edge	29
7. List of Butterflies caught in the Darjeeling District by E. W. Maude (Continued from Vol. XXIII. No. 4 p 122	31

ADDENDUM

VOL. XXIII. No. 3.

In the article "Short Bird Notes from the Chumbi Valley, South Tibet, the following lines be added after the first paragraph :—

"Those seen between Kalimpong and the Jelap La and the Nathu La and Kalimpong has been described in the Journal of the Bengal N. H. Society. Vol. XXII. No. 2. p 46 while those of the Tibetan plain were recorded in the Journal of the Bombay N. H. Society Vol. ... 47. No. 2 p. 301."

CORRIGENDA.

VOL. XXIII. No. 4.

PAGE	LINE
95	20 read "about" instead of "about of"
95	21 read "it is" instead of "is"
95	22 read "the knowledge about this animal" instead of "its knowledge"
95	24 read "Bajra" instead of "Barja"
97	11 read 'at their ends' instead of "at the end of them"
97	31 read "protruding" instead of "portruding"
110	3 read "tired" instead of "tire"
110	27 insert " , " after "I had"
113	30 delete "(our editor)"



RHODOPHILA MELANOLEUCA Jerdon
The Black and White, or Jerdon's, Bush Chat.
About $\frac{1}{2}$ Nat. Size.

JOURNAL
OF THE
BENGAL NATURAL HISTORY SOCIETY.

VOL XXIV. JULY 1949. No. 1.

THE BUSH-CHATS.

BY

C. R. ROY, M.A., B.L., F.I.A.L.

Coloured Plate by C. M. Inglis, F.Z.S., B.E.M.B.O.U.

(Continued from page 43 Vol. XXIII Part. 2.)

In my previous article I have described all the Bush-Chats belonging to the species *Saxicola torquata* and *Hogson's Bush-Chat*. Now I shall describe other species of Bush-Chats. Before dealing with the species *Saxicola caprata*, I shall deal here first with Bush-Chats of another genus *Oreicola* as the species *S. caprata* may be dealt separately under the category of the Stone-Chats.

THE BLACK & WHITE OR JERDON'S BUSH-CHAT.

Rhodophila melanoleuca or *Oreicola jerdoni*.

Ref. F. B. I. 2nd Ed. No. 501, *Oreicola jerdoni* *Blyth Ibis*, 1867, p. 14; Blanf. & Oates, ii, p. 66.

Vernacular names. *Dao-tisha-gashim* (Cachari.)

The Black and white Bush-Chat belongs to the genus *Oreicola* and this genus differs from *Saxicola* in having longer tail and much more graduated tail. The genus *Oreicola* has two species viz. (i) *Oreicola jerdoni* and (ii) *Oreicola ferrea*, the latter has again been divided into two sub-species viz. (i) *Oreicola ferrea ferrea* and (ii) *Oreicola ferrea haringtoni*.

Description. Length 6 inches. **Male.** The upper plumage including wings and tail glossy blue-black ; lower plumage white ; under wing coverts black, sometimes tipped with white.

Female. Upper plumage brown, tinged with rufous on the lower back and rump ; chin and throat white ; upper tail coverts rufous ; wings brown edged with the colour of the back ; rest of the lower plumage light fulvous, darkest on the breast and flanks.

Young Male is like the female.

Bill & legs black ; iris dark brown.

Distribution. This Bush-Chats are found in the Sub-Himalayan Terai and adjoining plains from Eastern Behar and East Bengal through Assam and a great part of the Chin and Kachin Hills and lower hills of central Burma to Prome. In the district of Jalpaiguri they are generally found during winter. Mr. Inglis observed a male on the 31st December 1931 and a female on the 8th February 1932 in Haldibari, Jalpaiguri district. It is probably rare visitor to the Darjeeling District.

Habits. Jerdon's Bush-Chat is just like the other chats of the genus *Saxicola* perhaps not lively on the wings while it is very active on its legs when they hunt for food. This Bush-Chat is seen in grass-land and reeds often near water and has according to Stuart Baker, the habits of, sometimes, hunting amongst the bottoms of the reeds and grass for insects more like a Babbler than a Chat. The male utters a low "chit-churr chit-churr" note accompanying with a flirt of its extended tail.

Stuart Baker found the Chat breeding in great numbers in the vast plains of sun grass or thatching grass on the bank of the Brahmaputra in the Lakhimpur district. The nest is a stout little cup made of root and fibrous materials, lined with fine grass. They lay eggs, three or four in number from early April to the end of May. It is not known whether this Bush-Chat is migratory or not.

THE WESTERN DARK-GREY BUSH-CHAT.

Oreicola ferrea ferrea.

Ref. F. B. I. 2nd Ed. No. 502 ; *Saxicola ferrea*, Gray, Cat B & M Nepal pp. 71, 153 ; *Oreicola ferrea* Blanford & Oates ii, p66.

Vernacular name. Sarrak-chak-pho (Lepcha)

Description. Length 6 inches. **Male** in winter. Upper plumage dark-ashy grey with broad black arrow shaped centres in autumn the feathers have rusty fringe ; a narrow supercilium from the forehead to the nape white ; lores, cheeks, ear-coverts and sides of the neck black ; wings brownish black edged with grey and with a white patch on the inner coverts ; tail black margined with white, the outer webs of the outermost pair being entirely white. Lower plumage white, ashy on the breast and flanks. Chin, throat and generally a line behind the back side of the neck white. In the summer the male loses the grey edges to the feathers of the upper plumage, these parts becoming nearly black, the underparts become pure white.

Female. The upper plumage rufous-ashy with dark centres to the feathers ; pale-grey eyebrow and rest of the sides of the head reddish brown, darkest in the front of and under the eye ; chin and throat dirty white ; rest of the plumage pale rufous-ashy, darkest on the breast and brightest and more rufous on the posterior abdomen, vent and tail-coverts. Tail brown, broadly edged with chestnut, the outermost feathers paler.

Bill and legs brown ; iris dark brown.

The Young bird is rufous brown above the feathers of the head and nape with fulvous central streak, those of the neck with pale centres and blackish edges. On the underparts, the lower throat, breast and the flanks are edged with dark brown or blackish. The male can be distinguished from the female as the wing and tail of the former are black while those of the latter are brown and in both the sexes feathers are edged with chestnut.

Distribution. This Chat is found from the Western Himalayas to Eastern Assam, North and South of the

Brahmaputra. It is a common winter visitor to Darjeeling district. It is found in grass-land, open bush and scrub jungle and it is frequently seen sitting on the top of the tea bush often diving down on the ground to pick up an insect. It is by no means a shy bird and does not shun the habitations of man being a common bird of hill stations. In Kashmir they disappear in winter. Its song has been rendered as *titheratu-chak-lue-titatat*.

It breeds throughout the Himalayan range to a height between 4,000 ft. to 9,000 ft. or more. The nest is fairly made cup of grass, roots, fur or hair. They may be placed in hole amongst the stone and boulders or in a natural hollow in a bank or even on ground in open grass-land in slight depression. They breed from April to July and have two broods. The eggs number four to five. In non-breeding season it sometimes collect in a considerable numbers but it is not gregarious in the true sense of the term.

THE EASTERN DARK-GREY BUSH-CHAT.

Oreicola ferrea haringtoni.

Ref. F. B. I. 2nd. Ed. No. 503 ; *Oreicola ferrea haringtoni*
Hartert vog Pal. Fauna. p 711 (1910)

Vernacular name not recorded.

Description. Length about 6 inches. This Bush-Chat is a little smaller than the previous one and it differs from the Western Dark-Grey Bush Chat in being whiter below at all seasons of the year, in the summer the breast and abdomen are almost white.

Distribution & Habits. Hills of China, Yunnan, Kachin and Chin Hills. Habits are similar to those of the preceding race but the Eastern form seems to be found more often in scrub and thin bush cover than is the Western. The eggs are brighter and deeper blue, markings are absent in many eggs.

STOLICZKA'S BUSH-CHAT.

Saxicola macrorhyncha.

Ref. F. B. I. 2nd. Ed. No. 499., *Pranticola macrorhyncha*
Stoliczka J. A. S. B. xli pt ii, p238; Blanf & Oates ii p 63.

This Bush-Chat is one of the species of the genus *Saxicola* which has been mentioned before.

Description. Length about 5 inches like the India Bush-Chat. Upper plumage sandy-buff, broadly streaked with dark brown; upper tail coverts pale rufous; middle pair of tail feathers dark brown, narrowly margined with fulvous white; the next pair with the basal third of the outer, and three quarters of the inner web white, remainder black, the outermost almost entirely white; wing coverts blackish with broad sandy margins, the last of each series next the body almost white; a broad white patch of white on the wing coverts next the back; wing coverts and quills black, edged with rufous sandy, the entire primary coverts chiefly white on the outer webs, dark brown edged with sandy elsewhere; lores and a broad supercilium pale buff; chin, throat pure white; remainder of the lower plumage very pale buff, somewhat deeper on the breast; under wing-coverts white mottled with black; axiliaries white with black bases.

Bill and legs black, iris brown.

The sexes are alike in the winter but differ in summer when the margins of the feathers above are worn off and the bird appears to be sooty black; the supercilium becomes white and the lower surface creamy buff. In the Female there is no white wing patch and no white on the tail.

Distribution. It is a desert bird and a resident species in the Punjab, Rajputana, Northern Guzrat, Cutch and Sind.

Murry records this very local desert-loving Bush-Chat from the Bolan and Chaman and mentions also specimens from Dubrai and Kandahar. Swinhoe also records it from Dubrai, April 24, and Kandahar April 19, 1881 and his specimens are in the British Museum.

Habits. According to Whistler, its favourite haunts are the wide plains of hard, sandy soil, fertile when ploughed and irrigated but normally of the consistency and appearance of a made-up tennis court, they are bare of grass for the most part but are studded with small desert plants of 'Uek' and 'Karil' (wild Caper) and diversified with small sand-dunes and broken ground. Hume states that this species was extremely abundant in the thin stunted scrub jungle that here and there studs the sandy, semi desert, waterless tract which occur all round Jodhpore. In habits this Chat resembles the other members of the genus perching on the top of bushes or stems, at times fairly tame, at others surprisingly wild.

NOTES ON MAMMALS, SIKKIM AND SOUTHERN TIBET,

May 1946

P. I. R. MACLAREN.

These short notes deal with the mammals encountered on a primarily ornithological trip to the Hram and Kala Tsos on the Lhasa trade-route in May 1946. The outward journey was from Kalimpong over the Jelep La to Yatung in Tibet, and thence through Phari to the lakes. On the return the subsidiary trade-route over the Nathu La was used, and the journey continued through Gangtok to Kalimpong.

1. *Macaca assamensis pelops* Hodg. Nepal Macaque.
Several parties seen in Sikkim between 6,000' and 2,500'.
2. *Harpiocephalus harpyia*. Hairy-winged Bat.
A female was picked up with a broken wing near the bridge over the Takchom Chu, 2,500', Sikkim, and identified from the collection of the Zoological Survey of India.
3. *Aelurus fulgens*. Cat-bear.
One crossed the path just in front of me near Sandakphu at about 10,000' in December.

4. *Vulpes ferrilatus*. Small Tibetan Fox.
A single fox was watched closely trotting along the hillside at about 15,000' near Kamarab, south of Phari. Marmots whistled loudly as it passed their holes.
It is a very small, short-legged fox, golden in colour. Its face is very much broader than that of the Indian Fox.
5. *Tomeutes lokroides*. Hairy-bellied Indian Squirrel.
Common from 2,500' to 5,000' in Sikkim. I did not observe any other species of squirrel.
6. *Marmota himalayanus* Hodg. Marmot.
One was found on the plain at Dotag, beside the river, at about 13,500', and was followed for several hundred yards up into the clutter of rocks bounding the plain. Its fur was wet and apparently it had just crossed the river. Apart from this one animal, no others were seen until the return journey, and then only on the plain edge near Kamarab, south of Phari. They were not in evidence in this area on 7 May.
7. *Lepus oiostolus*. Woolly Hare.
Quite frequent from the Tang La to Kala, generally being found by day on the stonier hillsides.
A form was seen in the centre of the Tang Pun Sum plain, and tracks up to 17,000' west of Dochen.
8. *Ochotona curzoniae* Hodg. Hodgson's Mouse-Hare.
Abundant after reaching the "plateau" near Kamarab up to Kala, inhabiting most of the sandier spaces in large colonies. Those on the dried salt-flats of the Kala Tso seemed to be rather paler, but elsewhere colour was variable. Though the first part of May was fine and mild, considerably greater activity was noted in the colonies in the latter half of this month, despite frequent rain and sleet.
9. *Ochotona sikimaria* Hodg. Himalayan Mouse-Hare.
Frequent in rocky ground in the more open forest of Sikkim and Tibet from 8,000' to 12,000'.

10. *Equus kiang*. Kiang.

Four on the plain due north of Tuna, between Tuna and Guru on 16 May, and the next day ten on the Tang pun Sum plain, six miles S. W. of Tuna.

11. *Gazella picticaudata*. Tibetan Gazelle.

Three males two miles S. E. of Tuna on 8 and 9 May, four males on the plain between Tuna and Guru on 9 May, and four females or immatures six miles S. W. of Tuna on 17 May.

BIRD RECORDINGS AT GHOOM & TUMSUNG,
DARJEELING

By

CAPT. R. H. BAILLIE

The following are the recordings of birds at Ghoom and Tumsung, Darjeeling district during June 1945.

Altitudes. These are all estimates as I had no map of the area. I have used the following fixed points which I was told correct *i.e.* the T. E. Bungalows and Mim as being 4,600' and 5500' respectively.

I enclose a Stumer Appendix and would be grateful for any help in identifying these birds. They were, unfortunately, all seen under bad weather conditions when rain or mist or both prevailed.

Period—June 1945

2/6th Tumsung, 7/9th Ghoom, 10/24th Tumsung, 25/28th Ghoom.

1. (7). The Himalayan Jungle Crow.

Common Ghoom. None seen Tumsung but 4 birds seen at Mim on 21st.

2. (11). The Common House Crow.
Ghoom. Three birds pitched in Tumsong compound for about 1/2 minutes on 18th believed to be this species but looked more like Burnese House Crows.
3. (22). The Sikkim Yellow-billed Magpie.
One pair seen near Ghoom on 9th.
4. (24). The Green Magpie.
Common at Tumsong—all seen under 5000'.
5. (32). The Eastern Himalayan Tree-pie.
Common Tumsong.
6. (46). The Himalayan Nutcracker.
Senchal 7th. One bird seen on old golf course on way to Tiger Hill and the same (?) bird seen on return near same place some 2 hours later. Appeared to be very tame and allowed close approach despite open grass. Possibly a young bird as the neck and mantle did not appear to be spotted like the specimens in the Darjeeling Museum but the rest of the plumage the same as D.M. birds.
7. (59). The Green-backed Tit.
Common.
8. (77a). The Sikkim Red-headed Tit.
Parties seen on 21st and 22nd. Both over 5000'.
9. (95). The Black-fronted Suthora.
Seen on Auckland Road on 8th and identified from a painting by C. M. I.
10. (108). The White-tailed Nuthatch.
Single birds seen on two or three occasions in Tumsong area at about 5000'.
11. (111). The Cinnamon-bellied Nuthatch.
Single bird at Tumsong on 11th.
12. (120). The Rufous-necked Laughing Thrush.
8 birds seen at Tumsong on 24th.

13. (128). The Western Himalayan White-crested Laughing Thrush.
Parties seen on two occasions near the Little Rungeet.
14. (137). The Eastern White-throated Laughing Thrush.
A pair seen on 22nd at about 6000'.
15. (150). The Sikkim Red-headed Laughing Thrush.
Common at Ghoom.
16. (156). The Nepal Crimson-winged Laughing Thrush.
Single birds seen on 11th at 5000'.
17. (164). The Blue-winged Laughing Thrush.
Single birds seen on 2 occasions at Tumsong.
18. (177a). The Sikkim Striated Laughing Thrush.
Fairly common from 4500' upwards.
19. (214). The Nepal Rufous-necked Scimitar-Babbler.
A pair seen on 2nd at Tumsong.
20. (220). The Sikkim Rusty-cheeked Scimitar Babbler,
Frequently heard Tumsong but only identified by sight on one occasion.
21. (243). The Assam Spotted Babbler.
Parties seen at same place on different occasions, 4500'.
22. (277). The Assam Red-headed Babbler.
Tumsong 4000'. Identified once only but probably common.
23. (286). The Nepal White-eyed Quaker Babbler.
Seen twice Tumsong. Probably common.
24. (304). The Nepal White-browed Fulvetta.
Senchal 27th. A party of birds, believed to be those, seen in the "bamboo grass" during mist and rain. They kept low down and did not climb more than half way up the stems. They kept up a low chirruping note and eventually

flew low across the road singly in fairly rapid succession. They had very dark brown well feathered heads with a heavy white eye-brow stripe, white chin and grey underparts as far as I could see. The wings appeared to be dull rufous with slaty primaries. Rump—seen in flight—dull greenish rufous. Identification open to doubt.

25. (311). The Black-headed Sibia.
Tumsong. Not uncommon.
26. (339). The Stripe-throated Yuhina.
Aukland Road 8th Identified from Darjeeling
Museum specimen.
27. (342). The Slaty-headed Yuhina.
Single bird Senchal 27th.
28. (345). The Yellow-naped Ixulus.
Common 5,000' upwards.
29. (351). The Red-billed Leiothrix.
Common 4,000' upwards.
30. (354). The Red-winged Shrike-Babbler.
Single bird seen twice same place 4000'.
31. (376). The Silver-eared Mesia.
Common 4,000' upwards.
32. (377). The Red-tailed Minla.
A small party seen on 10th at about 6,000'.
33. (386). The Himalayan Black Bulbul.
Very common.
34. (391). The Himalayan Brown-eared Bulbul.
A pair Ghoom Rock 28th.
35. (394). The Rufous-bellied Bulbul.
Fairly common 4,500' upwards.
36. (397). The Striated Green Bulbul.
One pair seen at same place on two different
occasions 5,000'.

37. (403) The Bengal Red-vented Bulbul.
Tumsong common.
38. (405) The White-checked Bulbul.
Tumsong common.
39. (487). The Rusty-bellied Shortwing. (I knew there was a misprint!) A pair seen at about 6,600' near the Lepchajugga/Marybong Rd. on 22nd. Field note tallied exactly with F.B.I. save that I thought I saw a white mark at the base of the outer tail feathers of the male on one occasion. There is no mention of such a feature in the F.B.I. The short wren-like tail was constantly flirted vertically. Both birds uttered a constant 'tseep-tseep' to one another and kept in low growth. The female was not well viewed.
40. (502). The Western Dark-grey Bushchat.
Very common in Tumsong area.
41. (518). The Eastern Spotted Forktail.
Tumsong. Single bird seen on two occasions.
42. (519). The slaty-backed Forktail.
Tumsong. Fairly common.
43. (535). The Plumbeous Redstart.
A female on Little Rungeet and one adult male 4,600'.
44. (554). The White-tailed Blue Robin.
A female seen by back entry to Senchal Bungalow on 9th almost certainly the species but it was disturbed by a passing rider. A small dark Robin-like bird with dark central tail feathers with white "panes"
45. (558). The Magpie Robin.
Tumsong compound only.
46. (570.) The White Collared Blackbird.
Senchal 9th about two and a half pairs. 27th 1 male and 2 females. These birds were certainly breeding.

47. (571). The Grey winged Blackbird.
3 birds Tumsong 4,700'. A pair Ghoom/Senchal
walk 27th.
48. (587). The Northern Orange-headed Ground Thrush.
A very tame pair seen near Tumsong Bungalow
on 4th/6th.
49. (605). The Chestnut-bellied Rock Thrush.
Not uncommon Senchal area : also seen on
Ghoom/Rock road.
50. (606). The Blue-headed Rock Thrush.
Tumsong fairly common.
51. (614). The Himalayan Whistling Thrush.
Common.
52. (635). The Ferruginous Flycatcher.
Not uncommon over 6,000' in Tumsong area and
a nest of 4 eggs found on 20th. Single bird seen
Senchal/Ghoom road 27.
53. (636). The Himalayan Orange-gorgeted Flycatcher.
Not uncommon in the Ghoom/Senchal area and
obviously breeding there. Also seen near
Senchal Lake.
54. (649). The Indian Little Pied Flycatcher.
Single bird 18th at 5,000'.
55. (665). The Verditer Flycatcher.
Very common.
56. (669). The Sikkim White-Gorgeted Flycatcher.
Single bird seen Tumsong area at 6,000' in bad
light on 20th but think identification correct.
57. (679). The Ceylon Grey-headed Flycatcher.
Fairly common from 4,600' up but very local.
58. (684). The Nepal Beautiful Niltava.
Some pairs and odd males seen in Tumsong area
and once on Auckland Road but as I was never
able to spot the blue neck slash I was never sure
if I was seeing this bird or 652.

59. (685) The Small Niltava.
Not uncommon Tumsong.
60. (699) The Yellow-bellied Flycatcher.
Common Ghoom/Senchal.
61. (703). The White-throated Flycatcher.
Tumsong. Very local at 5,000'.
62. (712). The Indian Black-headed Shrike.
Common up to 5,000'.
63. (725). The Brown-backed Pied Shrike.
Common but rather local 4,000'/5000'.
64. (733). The Indian Scarlet Minivet.
Tumsong fairly common.
65. (739). The Assam Short-billed Minivet.
Tumsong common.
66. (753). The Dark Grey Cuckoo-Shrike.
Tumsong common.
67. (763). The Ashy Swallow-Shrike.
Tumsong fairly common.
68. (767). The Himalayan Black Drongo.
Tumsong not uncommon.
69. (774) The Himalayan Grey Drongo.
Tumsong very common.
70. (780). The Northern Bronzed Drongo.
Tumsong not common.
71. (782). The Hair-crested Drongo.
Common up to 4,600'.
72. (814). The Burmese Tailorbird.
Common.
73. (888). The Allied Flycatcher-Warbler.
Not uncommon.
74. (891). The Eastern Grey-headed Flycatcher-Warbler.
Tumsong common.

75. (923). The Nepal Brown Hill-Warbler.
Common up to 5,000'.
76. (928). The Sikkim Black-throated Hill-Warbler.
Tumsong only 2 seen.
77. (961). The Maroon Oriole.
Tumsong common up to 5,000'.
78. (996). The Common Myna.
Common.
79. (1031). The Indian Spotted Munia.
Fairly common.
80. (1089). The Himalayan Green Finch.
Not seen below 5,500'. Common above in open
country.
81. (1102). The Malay Tree-Sparrow.
Very common in all housing areas.
82. (1153). The Eastern Swallow.
Very common.
83. (1161). Hodgson's Striated Swallow.
Common.
84. (1248). The Northern White eye.
Common.
85. (1262). The Indian Yellow-backed Sunbird.
Single bird seen in bad light at Tumsong.
86. (1272). The Nepal Black-breasted Sunbird.
Fairly common between 4,500/5000'.
87. (1274). The Nepal Yellow-backed Sunbird.
2/3 males around Ghoom Rock area 28th.
88. (1335). The Long-tailed Broadbill.
Common up to 4,600'.
89. (1344). The Assam Black-naped Woodpecker.
Fairly common 4,600'.
90. (1346). The Eastern Himalayan Small Yellow-naped Wood-
pecker.
Common up to 5,000'.

91. (1353). The Large Yellow-naped Woodpecker.
One party seen near Little Rungeet.
92. (1368). The Fulvous-breasted Pied Woodpecker.
Common Tumsong.
93. (1376). The Darjeeling Pigmy Woodpecker.
One pair identified only at Tumsong.
94. (1427). The Himalayan Great Barbet.
Very common Tumsong.
95. (1444). The Indian Golden-throated Barbet.
Got into a flock of Barbets at about 6,000' on
22nd which were presumably this species but
identification by no means satisfactory. Fore-
crown *black*, crown rich bright red, throat patch
dirty golden yellow, face patch grey. Upper
surface of wings and back together with under-
parts bright green. Length about 9". Their
calls were mostly 'Koyo' interspersed with
'Kotoy' and Kotoyoh stress being laid on the
second syllable in each case. It is unfortunate
that I did not make closer notes but I was on
the look-out for this bird, which I had never
seen before, and took it for granted.
96. (1452). The Asiatic Cuckoo.
Tumsong common.
97. (1454). The Himalayan Cuckoo.
Tumsong fairly common over 4,800'.
98. (1455). The Small Cuckoo.
Common 4,500' upwards.
99. (1456). The Indian Cuckoo.
Tumsong very common.
100. (1457). The Large Hawk-Cuckoo.
Fairly common 5,000' upwards.
101. (1462). The Indian Plaintive Cuckoo.
Tumsong very common.

102. (1470). The Indian Drongo-Cuckoo.
Tumsong very common.
103. (1551). The Indian White-breasted Kingfisher.
Single bird seen Little Rungeet.
104. (1598). The Nepal House Swift.
Very common.
105. (1671). The Burmese Collared Scops Owl.
Heard at Tumsong very occasionally.
106. (1690). The Burmese Barred Owlet.
Heard at Tumsong fairly frequently.
107. (1706). The King Vulture.
Not common at Tumsong.
108. (1713). The White-backed Vulture.
Ghoom.
109. (1716). The Lammergeyer.
7th. A single adult flew past the Pines Hotel. In
afternoon watched an immature bird doing
wonderful flying stunts beyond Tiger Hill.
110. (1760). Hodgson's Hawk Eagle.
10th. Watched 3 birds overhead at great height
over the road to Tumsong.
111. (1764). The Short-toed Eagle.
Single bird, believed to be this, seen flying from
Tumsong towards Mim.
112. (1765). The Northern Crested Serpent Eagle.
Tumsong fairly common.
113. (1784). The Brahminy Kite.
A single bird around Tumsong for whole period.
114. (1803). The Indian Shikra.
Seen on 3 or 4 occasions at Tumsong.
115. (1841). The Wedge-tailed Green Pigeon.
Tumsong fairly common up to 4700'.

116. (1870). The Rufous Turtle Dove.
Single birds seen Tumsong 4000' 4th. Tiger Hill 7th and Senchal 27th. Not 72?
117. (1873). The Indian Spotted Dove.
Tumsong fairly common.
118. (1884). The Indian Bar-tailed Cuckoo-Dove.
Tumsong fairly common.
119. (1920). The Black-breasted Kalij Pheasant,
Tumsong fairly common from Little Rungeet up to 6000'.

Appendix.

1. (878, 880)? Senchal 27th. A single bird on the grass close to the roots of the 'Bamboo grass' into which it went. Length about 5". Upper parts and head slaty-olive. Eyebrow buff. Brown streak through eye. Yellowish tinge on breast.
2. (870)? Ghoom Rock 28th. A small Willow Warbler green above, white eyebrow. Underparts 'off' white. Single yellow wing-bar. In addition there appeared to be 2 short yellow bars or marks nearer to the wing tip *i. e.* the inner primaries tipped yellow. Some white in outer tail feathers I think.
3. (302)? A small tit like bird of about 5". First seen on the Mim Road at a little under 6000'. Fleeting view. Next seen at Senchal 27th, Ghoom/Rock motor road and at the Rock 28th. Orangey-chestnut forehead to nape, Crown well feathered or, possibly, semi erectile. Foreward part of face grey with black markings, rear of face white. White on throat. Breast and under parts to and including vent yellow. Upper plumage steel grey. Winglet had black markings like those on face and also had a red flash in it. White ring round eye? Central tail feathers rather rufous, outer yellow. These

birds seemed fairly confiding and also fairly common but clear views were always obtained in mist. Semi skulkers owing to their antics and industry in insect hunting but seen in low undergrowth and also in tree-tops.

4. A small dark (spinach) green bird of 4" at Ghoom Rock 28th. It had a flatish thick crest rather like that of an *Ixulus*. Underparts greyish. Very narrow pale (green?) wing bar. Worked like a Tit on the leaves and allowed me to make the closest approach (very misty at time). With it was another little green bird with a smooth round head like that of Tickell's Flowerpecker. Whether these birds were male and female or unrelated I could not determine but they behaved in the same gymnastical manner and kept close together.

5. Pipit. Birds common Ghoom/Senchal area and I am sure that they were not Tree Pipits. Suggest Upland Pipits or, possibly, Blyth's. Outer tail feathers white. Breast very heavily streaked with black. Would perch in trees, on telegraph wires but seemed to prefer open grassland. Kept flying up to about 30' and fluttering down after the style of a Bushlark.

BREEDING OF SARAS CRANE (ANTIGONE A. ANTIGONE)
IN CAPTIVITY.

By

R. K. LAHIRI, M. SC., G. V. S. C.

Superintendent, Zoological Gardens. Alipore.

A pair of Saras Cranes in our Calcutta Zoo occupies an enclosure measuring about 187' x 195' along with some Nilgai (*Boselaphus tragocamelus*) and there in a shallow pool in it lives a Gharial (*Gavialis Gangeticus*). This association of animals varying so widely in habit and character is no doubt very strange and unusual. Nevertheless they have been living there for many years in perfect peace and harmony.

In this surrounding, the pair of Saras was observed to build a nest, breed, hatch out a young and rear it during July-August 1949.

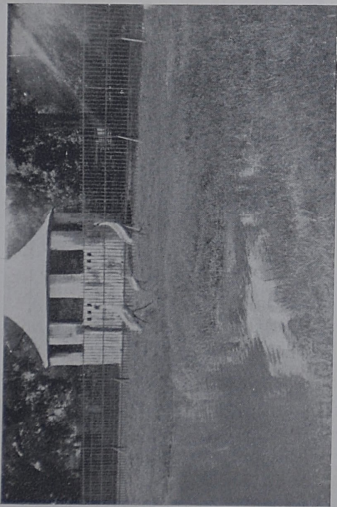
Nest. A shallow nest measuring approximately 2'-10" in diameter was built at a distance of 2'-2" from the water's edge. The nesting materials were twigs of peepul (*Ficus religiosa* Linn), Banyan (*Ficus bengalensis* Linn), leaves of Date (*Phoenix sylvestris* Roxb.) pieces of bone and other unusual materials that were handy inside the enclosure. The nest, very simple and hardly 3.5" inches in depth, contained only one egg. Both Cock and Hen birds shared equally in nest building.

Incubation Period.—The bird started sitting on the egg since 14.7.49 and successfully hatched out a chick on the 10.8.49 recording an incubation period of 28 days. There appears to be no recorded evidence of the period of incubation of the Saras Crane.

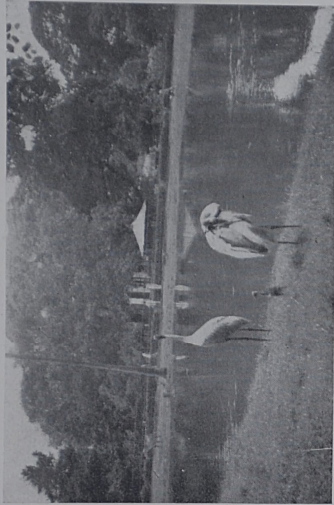
Blaauw in his Monograph of the Cranes observes, "I find no exact information about the time of incubation of this Crane, but think it probable 30 days will be about the duration of it".

The parents continued to keep constant watch over the chick and nursed it very carefully.

The Gharial who knew his old friends in the enclosure was apparently surprised at the sight of the new-comer. He did not



1



2



3



4

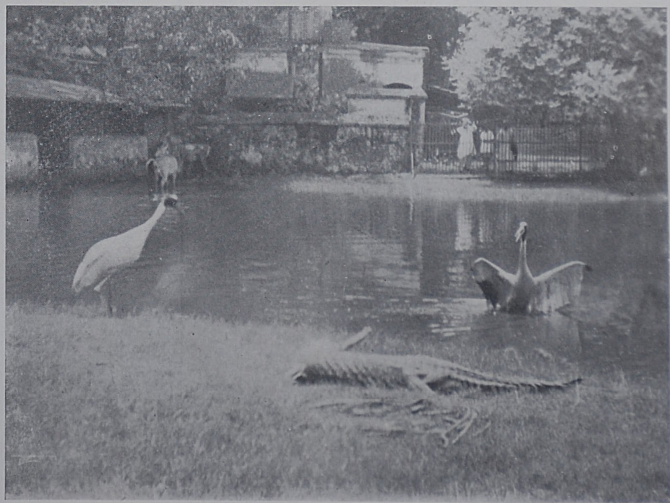
1-2, 3. A pair of Saras crane with their chick in the Calcutta Zoo.

4 The Gharial returning after being chased back by the parents—chick looking at the retreating reptile from a distance.



5

Leading the chick to water and teaching how to swim.



6

One of the parent birds drives away the reptile who was looking for the newly hatched chick in the nest.

seem to like the chick's unfamiliar presence inside the enclosure and felt excited. On several occasions when the chick moved into water along with its parents, the Gharial was observed to chase it as far as the edge of the water. Curiously enough, in each and every attempt of the Gharial to get at the chick he was repulsed and driven back by the parent birds in the usual Saras manner by flapping their wings and brave and loud trumpeting.

Food Habits.—Evidently there was enough of available natural food in the site for the chick has been growing unusually fast and keeping healthy and buoyant. Earthworm apparently forms the principal item of its food.

At first either of the parents was observed to dig out earthworm and collect aquatic as well as other kinds of insect food (Grass hopper etc.) for the young and hold them at the level of the chick's beak, when the latter would take it rather lustily. No grain food was given by the parents to the chick at this stage.

The chick having now grown up, the parents would no longer follow the same process of feeding. They no doubt sought out the food as before but instead of holding the same in their beak in front of the young would dangle and drop it on the ground before the chick until it realizes that it is something to be picked up by itself. Thus the Saras Crane teaches its young the way of self-feeding.

It is interesting to watch week old Saras going freely into the water and swimming back to land unaided and unattended.

THE WILD BOAR. (Sus Scrofa)

Hindustani :— Gunglee Soour

Gurkhali :— Bhanyal

Manipuri ;— Lum Ok.

The Wild Boar's pluck and courage have been sung in poetry and prose, of this there can be no doubt. When wounded, he never utters a sound and dies fighting to the last breath.

From ancient times, Boar hunting has been a favourite sport, which has been depicted in old pictures and tapestries. The Boar in ancient times was hunted on horseback, or on foot, trained hounds being employed in the chase. In the Black Forest in Germany, a wounded Boar is supposed to have shown the place where one of the most famous mineral and curative springs exist, and are used to-day with beneficial results. In India the Boar is looked upon in the same light as the fox for sporting purposes and to shoot one is considered a terrible crime. This is all right in country that is suitable for hog hunting; but in places where ground does not allow of this, I think it justifiable to shoot boars. People have no idea what vast damage boars can do to standing and root crops, and in some parts of India, agriculture would be impossible if these animals were not killed. I, myself, have seen a field of potatoes destroyed in one night by a herd, and they are very destructive to sugar cane crops.

The Boar is omnivorous, eating almost everything under the sun—worms, snails, spiders, scorpions, grubs and even poisonous snakes. I kept four Wild Boar, and often saw them make a meal of cobras and other poisonous snakes, the head being devoured as well. In the forests, berries, acorns, and various fruit falling from trees, afford them plenty of food, and in the hill forests, on account of plenty of food, the Boar attains a huge size. One can always tell where wild Boar are by seeing their rootings in the soil. In the Sylhet district, the boars do such a lot of damage, that the fields for many miles have to be protected by a wooden fence. Sometimes, the villagers turn out in hundreds, driving the Boars into nets and shooting or spearing them.

A big solitary Boar is indeed ‘Monarch of the Jungles’. He fears nothing, and the tiger hesitates to come to grips with him, although, sometimes this does happen when the fight invariably ends in favour of the Boar. I have seen places where a fight between a tiger and Boar had taken place, and there was every evidence that the tiger got the worst of it!

It is strange that the Boar should eat carrion sometimes. One thing he is very fond of, and this is the grass inside the stomach of an animal that has been killed by a tiger or panther.

The tiger and panther generally pull the stomach and its contents out whole and do not eat it. This titbit is the Boar's Haggis!! On two occasions on following up the kill of a tiger, I have come on Wild Boar at their meal, one was barely a yard away from me, and I luckily shot him. Wherever there is a solitary Boar, one will see certain trees with the bark and wood worn away, where the animal has been sharpening his tusks.

Wild Boar, when young, and up to a certain age, make very interesting pets, and will follow one like a dog. But later on they get savage and destructive, and have to be destroyed. The sow makes a regular hut for her litter, oval in shape, and an inlet and outlet. If one sees one of comparatively fresh grass, one may be sure that the young are inside. Once I came upon a hut whilst mounted on an elephant. The sow was asleep outside, and bolted on seeing us. From inside the hut, we pulled out five youngsters, pretty little striped animals marked very like the common Indian palm squirrel with brown and pale yellow stripes. The youngsters were distributed to various people, but all came to an unhappy end.

Sometimes an old solitary Boar will take possession of one of these abandoned huts to shelter him from sun and heavy rain. There may be five or eight young ones in a litter.

In the Sylhet district, the natives "Chamars" camp out once a year, taking with them, all the domesticated sows. These are crossed by Wild Boar to improve the breed. Some of the tame sows are enormously fat, so that the teats touch the ground, and are apt to be injured. In order to prevent this, a "Jou jou" bandage is bound tightly round the body to keep them up!!

The Wild Boar is widely distributed through India. In Manipur there were thousands of them, and in the Sylhet district, they were nearly as numerous. I think that in Assam, especially in the hills, the Boar attains his maximum size. There are certain hill boars that never descend into the plains, and I have seen them at an elevation of 6000 feet, and higher. In the plains a 35" or 37" beast is considered a big one. But the hill Boar measures 40" at the shoulder.

Once, when after sambhur, high up in the hills, I surprised a Boar in his wallow. He got out and looked very savage, contemplating a charge. I luckily bowled him over dead. He was an immense animal, measuring 6'8" from end of tail to tip of snout. His tusks were 9½" long, but very massive. He must have weighed between five and six hundred pounds, as it took 17 good men to get him back to Camp. When I shot him I had to leave him as there were only three of us. I was afraid that the carcass would be eaten by a tiger or panther, but my tracker came to the rescue. He took off his dirty sheet and placing it on the body said "Now, Sahib, nothing will come near the corpse" and he was right!! The size of this Boar was reported in the "Asian", a sporting paper. The Editor said that mine equalled the record, but tusks were small as 11" and even 13½" were recorded. Personally, I think that 11" is about the maximum length, as I have measured necklaces made out of Boar's tusks worn by the Nagas and never found them above 11". Tusks longer than this owe their length to the fact that the upper tusk has been worn away or broken so that, there is no friction to keep down the growth of the latter. It is a well known fact that, if a rat loses his upper incisors that the lower ones will grow indefinitely and ultimately penetrate the skull. Such a case is recorded by Frank Buckland. The tusks make rather pretty ornaments. But in the Tropical heat are apt to crack, unless smeared over with paraffin solid or wax. The Nagas or wild tribes use them as necklaces and to adorn their wicker helmets—two tusks joined together forming a crescent in front.

In Assam, two kinds of Wild Boar are seen, the ordinary one, and the Pigmy Hog, which is very like the American Peccary. The latter, I have seen in the Dorrang district and I shot one in the Nowgong forests near Lanka.

The Pigmy Hog is very savage, and a herd have been known to tree a man like the Peccary and to keep him there until help came. Wild Boar may be found in any kind of country. I have put them up in very tall grass. As a rule they prefer jungle in the vicinity of "Bheels" (Sheets of water) and swamps. If crop raiders, they generally lie up in sugar cane

plantations hard by. On the banks and "Churs" of large rivers, they are found in the low juniper like scrub, called "Jow" in Hindustani.

There is no use my describing the Wild Boar, as his appearance is well known. Boar are good swimmers. It is a mistake to think, that they cut their throats with their fore feet in the act. I have seen wild boar swim across the Brahmaputra as well as a hog deer. Comparing the Indian Boar with the European, I think that 1. The European never attains the shoulder height of the Indian. 2. The tusks are smaller and thinner. 3. Coat in European larger and thicker. 4. The hind limbs in European, slender. 5. Head and neck, more massive in the European. I measured several skins of Boar shot in the Thuringean forests and found the largest to be six feet.

Boar are very afraid of jungle fires and, in a conflagration, Boar are the first animals to flee. Very often, if a tiger is about, there will be a trek to more wholesome parts! It is well known that the tiger prefers pork to anything else. My wife and I once saw such a trek in this herd there must have been 30 or 40 animals of all sizes. We were told that there was a tiger in the vicinity. They all passed almost in single file not very far from our elephant.

One-third of a Boar's tusk projects outside the lower jaw bone, and two-thirds inside the bone, this is just opposite to the tusk of an elephant—two-thirds projecting outside and one-third inside. The tusk consists of enamel and dentine, the layer of enamel being fairly thick. They are subject to caries like other teeth, and if this exists it does not improve the temper of the beast.

A Boar is a dangerous animal, sometimes he will charge at sight, or if one suddenly comes on him. My first tracker had a narrow escape from a Boar. He went after Jungle fowl armed with a single barrel muzzle loader. He met a wild Boar, and foolishly fired at it. The beast charged and luckily for Singbia, there was a horizontal branch of a tree above him. He jumped up and tried to swing himself on to it. The brute just missed him, passing underneath. This was repeated several times,

when the Boar got sick of it. Then Singbia returned to Camp, looking very pale about the gills. The Boar can inflict frightful and mortal injuries. In the course of my duties as a Medical Officer, I have seen many Boar wounds. One man had a rip 8" long behind his knee and the artery was exposed and could be seen pulsating at the bottom of the wound. He recovered. It was fortunate that the main artery was not lacerated. One day in Sylhet a man was brought into hospital with his back cut to ribbons by a Boar, and through one of the deep wounds, the lung, or part of it, protruded, at each inspiration it swelled up like a child's India rubber ball. It appears that he was sitting down for the purposes of nature not far from his village, when a Boar attacked him. He wisely lay on his stomach and let the animal do its worst. This is always the thing to do if attacked.

In Sylhet a tragedy occurred on a tea garden. The coolies had wounded a Boar and came and told M- the Manager. He said "He would go the next day". The wounded Boar had got into some thick jungle on the sides of a river channel. The coolies said "They would drive the Boar up to M-." But he insisted on tracking him up. As he came opposite to the place where the Boar was, it charged and the shot failed to stop it. It ripped poor M- in the abdomen, nearly disemboweling him. M-, although grievously wounded, fired another shot and killed the Boar. M- then also died, their bodies lying a short distance from each other! A wounded Boar is just as dangerous as a tiger—his onslaught is terrific and he shows no mercy !!

Wild Pig are very subject to rinderpest. One year in Manipur they died in hundreds—one of the officers thought a dead Boar was a Manipuri deer and had a shot at it !!!

It was in Manipur where I had my first experiences with Boar hunting. Round the Logtak Lake there was jungle and the shores of the lake afforded plenty of food for boars. The roots of a small rush and the Singara nut, being the chief food. Although the Boar feeds generally at night in the secluded spots, they could be seen feeding two hours after sunrise and two hours before sunset. I got nine Boar in one morning.

There was nothing wasted, as all the bodies were sent into Head Quarters, where the men of my Regiment, Gurkhas, were glad to get some pork!

My first Boar nearly cost me my life! I had wounded one, and was following him up through the long grass, my tracker being in front with my 12 Bore rifle over his shoulder—All of a sudden there was a bang, the trigger of the rifle which my tracker was carrying had caught in some jungle and the gun went off! The bullet must have missed me by inches! From this, I learnt a lesson, *i. e.* never to allow a native to carry a loaded gun before or behind me, whether tracking or not!

One morning, I had shot several Boar on the margin of the lake, and was proceeding rather carelessly along a grassy Nullah, when on turning a corner, I came face to face with a huge Boar, not five paces away! The beast stood his ground. I could see the evil look in his eyes. His bristles stood up on his neck, and he made a gnashing sound with his tusks. I dropped into a kneeling position and shot him dead. A few seconds would have made all the difference!

Another evening, I was returning to Camp, when we saw a large animal going slowly across a grassy sward about 80 yards away. My tracker said "It was a young buffalo". But I knew it was a huge Boar. I fired and broke the animal's back. In the excitement, I forgot to reload, and taking a shot within a few yards, there was only an ominous click!! Now, the wounded Boar, with his hind limbs paralysed, came for me. I had no time to load, so drawing my heavy Kukri (Gurkha knife) I struck him on the head and killed him. He was a huge Boar—39" at the shoulder and 8" tusks.

In Manipur we used to burn miles upon miles of reed and grass jungle. It is no exaggeration to say that, at one time, 80 or 90 wild pig used to break out. These dense jungles were generally surrounded by swampy plains covered with short green grass. We used to select the largest ones, chasing them and shooting them on foot—very exciting game! My pack of dogs usually accompanied me, and helped in the fray. One day we heard a terrific row going on in a partly burnt patch. On going up there

were my five dogs tackling a small Boar, holding on to parts where the Boar could not wound them. As I thought that some of them might be injured, I called them off, and shot the Boar.

In these Boar hunts, we used to get other game. There were Black Partridge in hundreds and very many hog deer. These afforded very pretty shooting when we went over the burnt areas. But we emerged from them looking like chimney sweeps!

In Sylhet, I had some experience with Wild Boar. One day the Assistant Magistrate, my wife and myself, were on elephants after small game. All of a sudden, from the edge of a Nullah, a big Boar dashed out, and he got four charges of shot in his rump. This seems to have angered him. About 200 yards away, there were three men cutting grass. The Boar went straight for them and they were up in trees like a shot, perching on the top like Paddy Birds! I saw the Boar put his fore feet against one of the trees, to try and get at his victim, and it was a good thing for him that Boars cannot climb trees!!! When the Boar broke I noticed that he went rather lame. In the meantime, I got my rifle from my man on the 3rd. elephant, and followed up at 150 yards. I had a shot and broke his back. The plucky brute got his haunches against a tree and faced the elephant. I finished him with a shot. He had a big scar on one knee, and, on cutting into this, I found embedded a spherical bullet, which had probably been fired from a native musket. The animal was a very old one with scarcely any bristles, and the upper and lower tusks yellow and broken.

This article would not be complete without reference to Pig-sticking, or to give it a nicer name "Hog-Hunting". I was lucky to be transferred to Rajshaki, where on the banks of the Ganges, there was grand Hog-hunting country.

Celebrated Hog-Hunters, like Crawford and Taylor, the genial and hospitable Manager of the Midnapur Zamindary have hunted in this country. I believe Taylor had 247 first spears to his credit. He had a remarkable accident. One day he speared a Boar, which came at him from the side of a Nullah. In the attempt he snapped his Biceps muscle almost in two! Poor

Taylor he was crippled during the War, but was still his cheery self! We have had many pleasant days at his home, and his hospitality was unbounded. Our Assistant Magistrate H-. was a great Hog-hunter. There was a big Boar in the vicinity of Nator in the Rajshaki district. H-. determined to get it, and sallied forth alone! In his attempt he lost all his spears, so nothing daunted, he went to the nearest village, and killed the Boar with the Chowkidar's spear!!! One day, when we were Hog hunting, I came upon an Assistant Magistrate O. D. on his horse, and minus his spear! I asked him "What was up?" He said "Inside those low bushes is a Boar with my spear in him, and I haven't got another". I dismounted, got my spear and proceeded to investigate. I saw the Boar with both his hunches transfixed with a spear, this being horizontal and caught up in the bushes. The Boar could not move backwards or forwards. I attacked him from the rear and drove my spear through and finished him.

What fearful country our nags went over! We never saw the deep nullahs that we had negotiated when our blood was up and in the chase! But, going over the ground slowly, one saw the many pitfalls that we had escaped!

Hog-hunting is delightful sport, as there is an element of danger attached to it. I wish I had had more opportunities in my younger days of hunting the mighty Boar from horseback!

MY ROBINS.

By

JOHN EDGE.

It was not until I had got my Swimming Pool three quarters full that I discovered a Dhyal had built her nest in the overflow pipe, which was let into the side about nine inches from the top. The question then was, what to do; leave the Bath three-quarters full and paddle in it, or move the nest? As the weather was getting hot, and the Robins appeared to be a particularly understanding pair, I decided on the latter course.

On the edge of the Bath and directly above the outlet, I put a piece of piping, and built a brick structure round it, so that the surface was flush with that of the bath, although of course as it was not plastered it looked totally different. I then moved the nest into the new hole. It was a somewhat kutchra affair of grass and rootlets, but no lining, and contained four greenish-blue eggs speckled and blotched with brown. After the move I blocked the outlet and awaited developments. The male, as usual, was the first on the scene and although I did not actually see him discover the new 'house', when I returned an hour or two after the move he was inside the pipe busily straightning up the nest, and did not seem at all amused at the careless manner in which I had moved it. However he soon got things to his liking, and the usual routine of sitting on the eggs continued. Salim Ali states that the female alone incubates, but when disturbed I found that the male emerged from the hole as frequently as the female, although whether he had been sitting on the eggs, or merely keeping watch when she was away, I do not know.

Eventually the young hatched out, and both parents were fully occupied with their feeding. My midday swim caused a slight interlude, when the female kept out of sight, and the male would sit on a post with his mouth full of insects, and a baleful look in his eye. He would usually wait for me to finish before going to the nest, but once I was on the bank he would go straight there. A habit of which I did not approve, was that after feeding the young he would scavenge out the nest, and invariably deposit the droppings of his young in the Pool when flying over it. I did not see the female do this, but she was much more retiring than the male, and may have done so when no one was about. Sunday was a bad day for the parents, for many people came to swim in the mornings, and stayed in the pool for a long time. Both birds would keep out of the way at first, but eventually the welfare of their young would overcome their fear, and the male, even with people in the pool, would fly down to the nest. The female would wait until everyone was safely on the bank before she would appear.

As the young grew up (only two hatched out), I began to scheme how I could prevent them from plunging to a watery

grave when they emerged from their pipe. I eventually decided to move the whole edifice in which they were housed, back about a foot, and put up a barrier between the mouth of the pipe and the edge of the pool. The Robins did not object to the removal of the house, but when I put up the barrier there was continuous scolding, which was a sure indication that they were about to forsake the nest. I therefore hastily drew the barrier to one side, and much to my relief the birds returned and all was well. During the next two days I gradually pushed the barrier back to its original position, and the parents raised no objection. On the third day the birds had flown. I saw one on a post and one in a tree and they seemed to be quite confident and happy; I have not seen them since.

LIST OF BUTTERFLIES CAUGHT IN THE
DARJEELING DISTRICT

Between 1,700 and 4,000 ft.

By

E. D. MAUDE

(Continued from Vol. XXIII. No. 4. p. 122.)

Nymphalidae.

74. *Cirrochroa aoris aoris*. Db.—The Large Yeoman. V. C. Male and female, Apr.
75. *Cethosia biblis tisamena*. Fruh.—The Red Lacewing. F.C. Male and female, Apr.
76. *Cethosia cyane*. Drury.—The Leopard Lacewing. F.C. Male and female, June.
77. *Ergolis merione assama*. Evans.—The Common Castor. C. June.
78. *Acraea vesta vesta*. F.—The Yellow Coster. V. C. March.

Libytheidae

1. *Libythea myrrha sanguinalis*. Fruh.—The Club Beak. C. May.

Riodinidae.

1. *Zemeros flegyas indicus*, Fruh.—The Punchinello, V. C. Apr.
2. *Dodona ovida ovida*. M.—The Mixed Punch. N. R. Male, Feb.

Lycaenidae.

1. *Pciritia hewitsoni hewitsoni*. M.—The Common Gem, N.R. Male, March.
2. *Gerydus boisduvali assamensis*. Doh.—The Common Brownie, N.C. Apr.
3. *Taraka hamada mendesia*. Fruh.—The Forest Pierrot. N. R. Apr.
4. *Castalius elna noliteia*. Fruh.—The Elbowed Pierrot. N. R. March.
5. *Azanus ubaldus*. Cr.—The Bright Babul Blue. C. Oct.
6. *Niphanda cymbia*, DeN.—The Pointed Pierrot, R. March.
7. *Neopithecopis zalhora*. But.—The Quaker, C. Oct.
8. *Everes argiades hellotea*. Men.—The Tailed Cupid, N. R. Apr.
9. *Lycaenopsis transpecta*. M.—The White Banded Hedge Blue. N. R. Apr.
10. *Lycaenopsis albocerulea*.—M. The Albocerulean, R. Nov.
11. *Lycaenopsis argiolus silkima*.—M. The Hill Hedge Blue. C. Apr.
12. *Zizeria maha maha*. Koll.—The Pale Grass Blue. V. C. March.
13. *Cosmolyce bosticus*, L.—The Peablue, R. Oct.
14. *Lampides celeno celeno*. Cr.—The Common Cerulean. C. March.
15. *Lampides kankena pseudelpis*. But.—The Glistening Cerulean. N. R. March.
16. *Lampides alecto eurysacus*. Fruh.—The Metallic Cerulean C. Sept.

17. *Nacaduba vajuva vajuva*. Fruh.—The Violet Four Line Blue. N. R. March.
18. *Nacaduba nora nora*. Fd.—The Common Lineblue. C. Apr.
19. *Heliophorus eplicles indicus*. Fruh.—The Purple Sapphire. C. March.
20. *Heliophorus brahma brahma*. M.—The Golden Sapphire. C. March.
21. *Heliophorus androcles moorei*. Hew.—The Azure Sapphire. R. March.
22. *Thecla syla assamica*. Tyt.—The Silver Hairstreak. R. Apr.
23. *Curetis bulis bulis*. Db. & Hew.—The Bright Sunbeam. R. March.
24. *Curetis acuta dentata*. M.—The Angled Sunbeam C. Apr.
25. *Iraota timoleon timoleon*. Stoll. The Silverstreak Blue. N. R. Apr.
26. *Arhopala centaurus pirrthous*. M.—The Centaur Oakblue. N. R. March.
27. *Arhopala areste areste*. Hew.—The Tailless Plushblue. R. Apr.
28. *Arhopala eumolphus eumolphus*. Cr.—The Green Oakblue. N. R. Nov.
29. *Arhopala bazalus*. Hew.—The Powdered Oakblue. N. R. Sept.
30. *Arhopala chinensis*. Fd.—The Chinese Plushblue. N. R. Sept.
31. *Arhopala amantes amantes*. Hew.—The Large Oakblue. N. R. Apr.
32. *Surendra quercetorum quercetorum*. M.—The Common Acacia Blue. N. R. Male and female. Nov.

33. *Surenbra todara distorta*. DeN.—The Silver Streaked Acacia Blue. R. Apr.
34. *Spindasis lohita himalayanus*. M.—The long-banded Silverline. C. May.
35. *Spindasis syama peguanus*. M.—The Club Silverline. C. Apr.
36. *Tajuria jangala ravata*. M.—The Chocolate Royal. C. May.
37. *Tajuria maculata*. Hew.—The Spotted Royal. N. R. Apr.
38. *Cheritra freja freja*. F.—The Common Imperial. N. R. Apr.
39. *Ticherra acte*. M.—The Blue Imperial. N. R. May.
40. *Horaga onyx onyx*. M. The Common Onyx. N. R. Apr.
41. *Catapoecilma elegans major*. Fruh.—The Common Tinsel. N. R. March.
42. *Catapoecilma delicatum*. DeN.—The Dark Tinsel. R. Female, Apr.
43. *Hypolycaena erylus himavantus*. Fruh.—The Common Tit. C. Sept.
44. *Zeltus etolus*. F.—The Fluffy Tit. N. R. Apr.
45. *Rapala buxaria*. DeN.—The Shot Flash. R. Mar.
46. *Rapala nissa rectivitta*. M.—The Common Flash. C. March.

(To be continued.)

Printed by J. N. GHOSH,
The Star Printing Works, 30, Shibnagarin Das Lane, Calcutta,
and Published by
C. R. ROY, Natural History Museum,
DARJEELING.