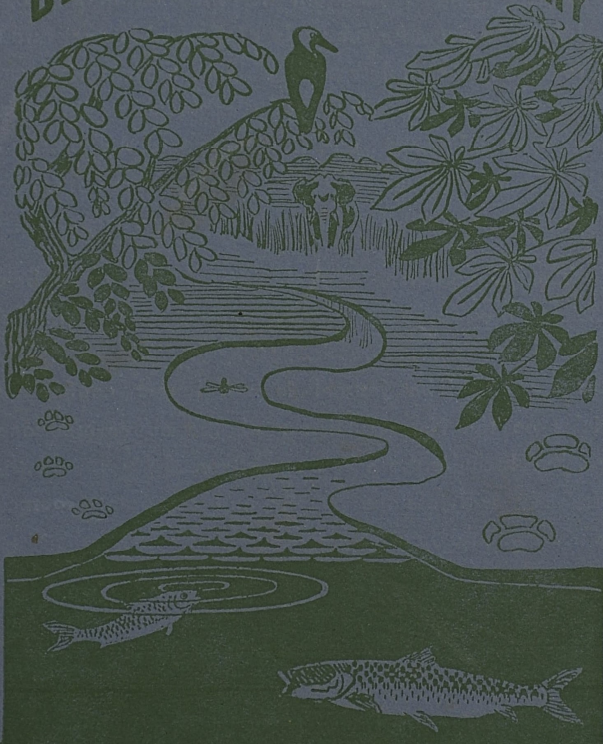


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THE JOURNAL OF THE  
BENGAL NATURAL HISTORY  
SOCIETY



VOL. XVIII . . . . No. 3.

*Issued January 1944.*

Edited by C. M. INGLIS, F.Z.S., B.E.M.B.O.U.

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## BENGAL NATURAL HISTORY SOCIETY.

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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.

The 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.

Application for membership should be made to:—

THE CURATOR,  
*Natural History Museum,  
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The Duars Paradise Flycatcher	... ..	Vol. XVIII No. 2 October 1943
The Bengal Green Pigeon	... ..	Vol. XVIII No. 3 January 1944

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- Vol. I, Nos. 3 and 4
- Vol. II, Nos. 1 and 4
- Vol. III
- Vol. IV, Nos. 2, 3 and 4
- Vol. V, No. 4

## CORRIGENDA

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VOL. XVIII, No. 2.

PAGE	LINE	
*Loose slip 3	(from top)	read "Museum" instead of "Meuseum."
48	11 (from bottom)	read comma after "compound" instead of full-stop.
50	16 (from bottom)	read " <i>franklinii</i> " instead of " <i>franktini</i> ".
60	2 (from bottom)	read "rushing" instead of "crushing".
61	16 (from top)	read "1,500" instead of "15,00".
63	13 (from top)	read "Kiang" instead of "Kian".
64	19 (from bottom)	read "lodged" instead of "loged".
	16 (from bottom)	read "the" instead of "ths".
68	4 (from top)	read "name" instead of "uame".
71	15 (from top)	read "semi-opaque" instead of "semiopaque".
*43	8 (from bottom)	read "Oates" instead of "Oats".
53	5 (from top)	read "Gairi" instead of "Gaii".

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*CROCOPUS PHOENICOPTERUS PHOENICOPTERUS* (Lath.,)

The Bengal Green Pigeon.

1/2 Nat. size.

**JOURNAL**  
OF THE  
**BENGAL NATURAL HISTORY SOCIETY.**

Vol. XVIII.—No. 3.

The Green Pigeon of the Genus *Crocopus* in Bengal.

By

C. M. INGLIS, F.Z.S., B.E.M., B.O.U.

With notes, and articles, by various authors.

*(With a coloured plate and a diagram.)*

Green Pigeon belong to the Order *Columbae* (Pigeons and Doves) whose stronghold is in the Indo-Malayan Region. They are poorly represented elsewhere especially so in the New World. In India, Burma and Ceylon there are 60 species; while in Malaya and its neighbouring Islands there are 74.

There is only one Family in the Order according to Stuart Baker's classification, the *Columbidae*. According to some other writers it is divided into 3 Families *Treronidae* (Green and Imperial Pigeons) *Columbidae* (Rock and Wood Pigeons and Doves) and *Claravisidae* (Ground and Emerald Doves and Nicobar Pigeon). These are subdivided into 7 Sub-families, whereas Stuart Baker only admits 6.

We follow Stuart Baker's classification, which is the best known out here, in which the Green Pigeons are not assigned a separate Family but placed in a Sub-family the *Treronimae*. In the other classification they are also placed in this Sub-family. Within Indian limits this Sub-family has 5 Genera containing 16 Species and Sub-Species, of these 7 are found in Bengal. They are :—

1. The Bengal Green Pigeon (*Crocopus Phoenicopterus Phoenicopterus*) (Lath),

2. The Burmese Green Pigeon (*Crocopus phoenicopterus viridifrons*) (Blyth).
3. The Ashy-headed Green Pigeon (*Dendrophassa pompadora phayrei*) (Blyth).
4. The Indian orange-breasted Green Pigeon (*Dendrophassa bicincta bicincta*) (Jerdon).
5. The Thick-billed Green Pigeon (*Treron curvirostra nipalensis*) (Hodgson).
6. The Himalayan Pin-tailed Green Pigeon (*Sphenocercus apicandus apicandus*) (Blyth).
7. The Himalayan Wedge-tailed, or Kokla, Green Pigeon (*Sphenocercus sphenurus sphenurus*) (Vigors).

These notes only deal with the first two, belonging to the genus *Crocopus*. There is another member of this genus, the Southern Green Pigeon (*Crocopus phoenicopterus chlorigaster* (Blyth). The range of this race is given by Stuart Baker as "Ceylon and the whole of Southern India South of the Bengal race. It extends West to Rajputana and Central Punjab. North East it is found in Northern Orissa and the United Provinces and to South Bihar. In Lucknow, United Provinces, this is the most common form but many birds are somewhat intermediate between the Southern and Bengal races." We have found some specimens, in North Bihar, approaching the Southern form.

The 3 species of the genus *Crocopus* can be distinguished with the help of the following Key.

- A. Yellow breast and ashy grey abdomen.
  - a. Yellow basal band on tail not contrasting greatly with upper tail-coverts  
= Bengal Green Pigeon.
  - b. Yellow basal band on tail contrasting greatly with the greyish upper tail-coverts  
= Burmese Green Pigeon.
- B. Whole lower plumage yellow  
= Southern Green Pigeon.

In the coloured plate the yellow on the tail is a little too pronounced it should mingle more with the colour of the upper tail coverts.

1. **The Bengal Green Pigeon.** *Crocopus phoenicopterus phoenicopterus* (Latham).

This is the race figured in our coloured plate.

*Field identification* :—A very stoutly built Green Pigeon, green in colour and yellow and ashy-grey below, with yellow feet; arboreal in habits and rather slow in their movements on trees but fast on the wing. Usually found in small parties or flocks and feed on either large trees or low bushes such as the Ber (*Zizyphus jujaba*) when in fruit. They utter a melodious whistle.

*Description* :—The coloured plate will suffice as description and the key gives the difference between the races. The colours of the soft parts vary very little. The sexes are alike.

Length about 13; wing 7.5; tail 4.5 and tarsus 1 inches.

*Young birds* have no lilac on the wing.

*Distribution* :—Stuart Baker gives the distribution of this species as "The base of the Himalayas from Oudh to Eastern Assam as far West as the Jumna. South it occurs rarely in Central India and Northern Orissa; whilst it is extremely common in Bengal and Bihar. In Southern Assam—i.e. Cachar, Sylhet, the Naga Hills and North Cachar Hills—we still get this race, but individuals show an approach to the next, *viridifrons*, and occasionally, a bird is nearer to that form than to true *phoenicopterus*. The same writer says it occurs in the Darjeeling District as high as 4000 ft. but neither Stevens, Shaw nor ourselves have ever found this to be so. In the Darbhanga District, North Bihar some specimens approach the Southern Green Pigeon in colouration.

(To be continued.)

## Duck Shooting at Rarhia, Champarun Dist., N. Bihar.

By

F. A. C. Munns.

*(With a map)*

Where the yearly big duck shoots are held in Champarun, Rarhia duck shoots vary very much according to seasons. If a small rainfall and the rice crop is good all over the *Chauars* and there is no open water anywhere, the shooting isn't good. Duck like an open expanse of water to play about in, also to return to after being fired at, so a heavy rainfall year is the best year for a duck shoot on Rarhia.

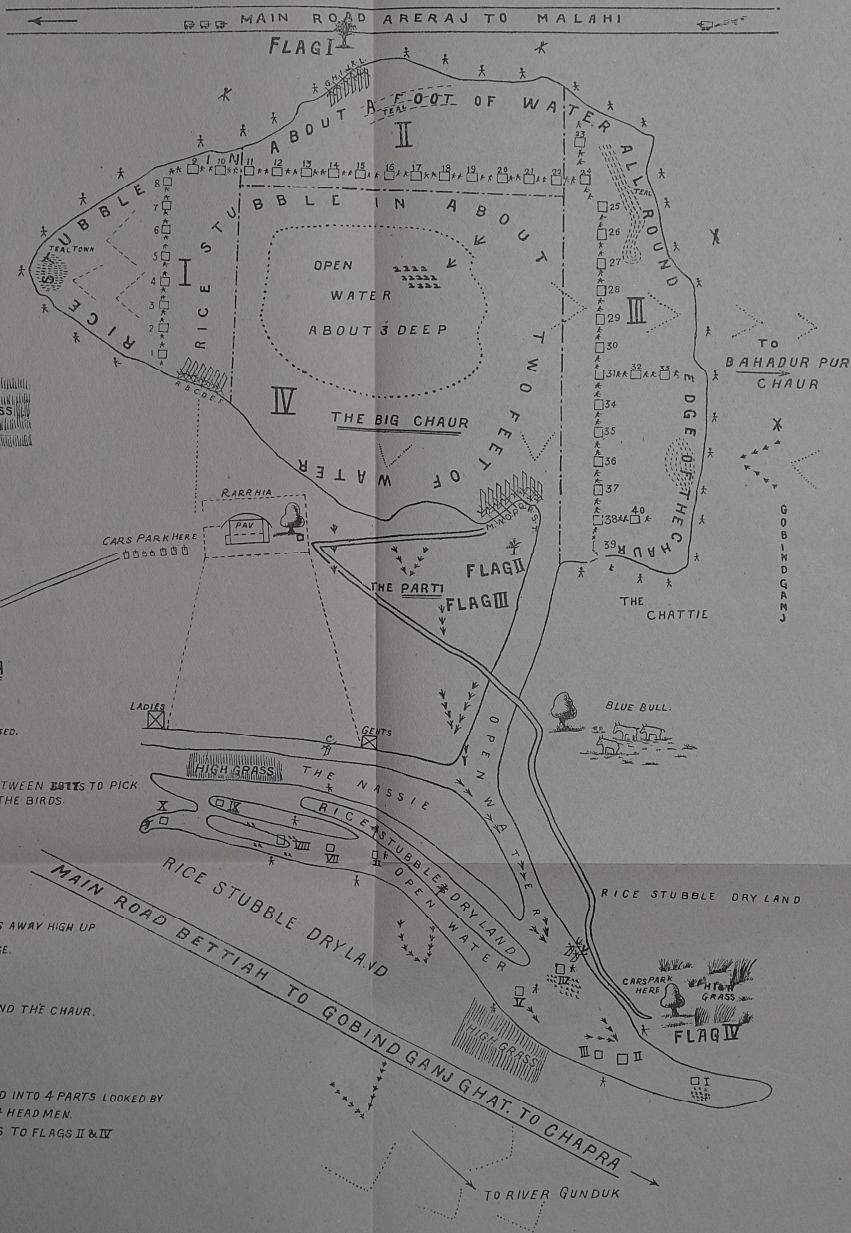
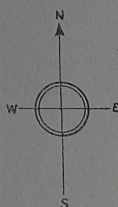
Rarhia is a small *Chauar* about  $\frac{1}{2}$  mile broad by a mile long, bordered on the south side by a large piece of *Parti* (grass land) over which the Duck flight to what is called the "*Nassie*" a thin stretch of water in the shape of a V with a broad end to it (see plan attached). In this *Nassie* the lucky guns, who draw these butts, get, generally, the best shooting as the birds generally fly lower than on the big *Chauar*. Before the earthquake there was another place called the *Chattie*, also South, to the East where the Guns also got good shooting, but the silting up of the same by the earthquake has now washed this out. The earthquake has also considerably filled up the big *chauar* which of course has not improved it for shooting.

In November or early December or as soon as the rice is all cut, I go out in a boat to flag the places for the butts, to watch the line the Duck flight and to see, and report, to the guns of Champarun on the prospects of the shoots to be held during the year. The first shoot is generally the first or second Sunday in January and the others are held every fortnight or three weeks later during February and March, finishing up with a few shoots in April.

The *chauar* is generally quite dry by May.

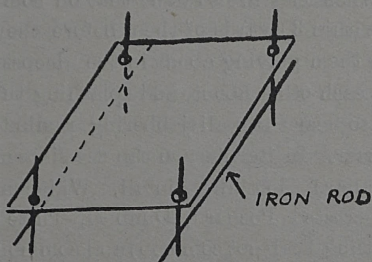
The flagging of the butts generally takes the whole afternoon, especially when the *Chattie* was in existence, when I have had to put up 60 to 70 butts. Nowadays I generally have 40 to 50 butts.

# RARHIA SHOOT

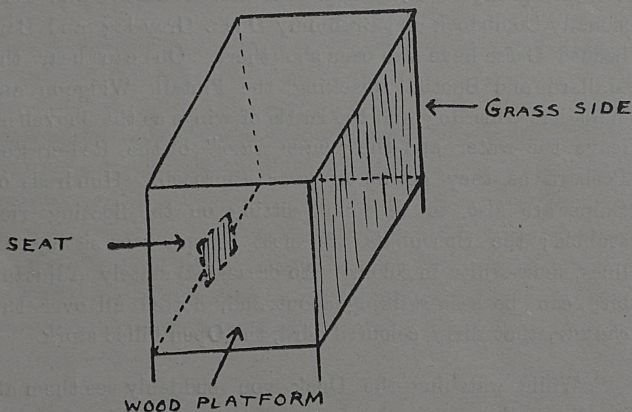


- OPEN WATER.
- GRASS LAND.
- BUTTS TO BE USED.
- BATH ROOMS.
- BEATERS BETWEEN BUTTS TO PICK UP THE BIRDS.
- BOATS.
- CARS.
- WELL.
- TREE.
- DUCK GOWING AWAY HIGH UP
- DUCK IN RANGE.
- MAIN ROADS
- BEATERS ROUND THE CHAUR.
- MATES.
- PAVILION.
- CHAUR DIVIDED INTO 4 PARTS LOOKED BY 4 HEAD MEN
- ROUGH ROADS TO FLAGS II & IV
- GRASS LAND

These butts consist of a wooden platform 5' x 5' on 4 posts, with holes every 4", standing on iron rods which can be raised or lowered, in ratio to the water as it rises from rain or decreases from drying up; each has a seat inside for



the gun to rest on, or lay out his cartridges and other paraphernalia as he desires; surrounded by four grass, or "Patterh" (diara seed), and split bamboo sides 4' high—each bearing a number.



My men take about 10 days to put them all up. Each butt being 80 yards apart.

I like to get the butts up a month, or three weeks, before the first shoot, so that the duck may get used to them. Butts having been all put up on the Sunday before the shoot, I go round in a boat to inspect them and see if they are in the right place to catch the duck fighting, sometimes they have to be moved further in or further out. The duck when the shooting begins, make for the edges of the *charuar* and, therefore, come lower as they come over to settle; therefore the butts are put about 200 yards in, to give the duck plenty of settling space, and round the *charuar* instead of in the centre,

where the birds fly high and a gun would get very few birds within range. A nice open expanse of water in the centre, with rice stubble all round the *chawar* are the ideal conditions for a good shoot on Rarhia. It is a grand sight to see the duck, before the shoot, when they are so tame that on some days they let you get within 30 yards of them before they take wing, and to watch them playing about in the deepest water diving and chasing each other about, and splashing the water up in the air, and to hear them all jabbering reminds one of a large Indian Bazaar. In Rarhia you can see sixteen kinds of duck; the Mallard, Spotbill, Pintail, Widgeon, Gadwall, Shoveller, Red-crested Pochard, Dunbird, Tufted Pochard, White-eye, Whistling Teal (not common) and common Teal, Garganey Teal, Cotton Teal (not common) and occasionally Combduck and Brahminy Duck. Grey-lag and Bar-headed Geese have also been shot there. One can hear the Mallard and Spotbill quacking, the Pintail, Widgeon and Whistlers whistling and the rustle of wings as the Shovellers leave the water and the "*kurr kurr*" of the Red-crested Pochard as they get up on your approach. Hundreds of Snipe are also to be found sitting on the floating rice stubble; the Spoonbills are most conspicuous sitting in lines, snow-white in colour. An occasional stately Adjutant bird can be seen stalking about and, dotted all over the *chawar*, that dirty coloured bird, the Open billed stork.

While watching the Duck you suddenly see them all rise like a clap of thunder and, at first, wonder what has put them up, when suddenly you sight a huge Pallas Eagle, or Bar-tailed Eagle fly down into their midst to generally capture one, or else a Peregrine Falcon, followed by his mate, darts like an arrow, low over the *chawar*, the first to put the bird up and the second to catch it before it has time to get up any pace. They hunt in pairs.

The best time to really see the Duck is just before sunset; when the boatman hits the boat with his oar to make them rise, there appears to be nothing else but Duck, and to see them in their different V's fighting across the red sky is really a grand sight for any one, especially the Shikari.

We have now got our butts up and numbered 40 on the large *chauar* and 10 in the *nassie*—50 all told—and know the Duck are there alright. The next thing is to arrange the boats, one for every two guns, to take them to their butt. Five for the Western and North-western butts, six for the Northern butts, eight for the Eastern and North Eastern ones and four for the *nassie*—twenty-three boats in all. Then the beaters, two for each gun and forty to sit around the *chauar*, to keep the birds moving, and ten for the *nassie*—say forty guns, a hundred and thirty beaters.

Those to go with the guns have orders to stand in the water between the butts, one on each side of his gun's butt (but on no account near the butt), and when these guns shoot a duck they rush out to retrieve it.

The other ten men, under four mates or peons, surround the *chauar* at intervals of some 20 yards with orders to allow the birds to settle, and then quickly walk into the water towards the birds and put them up over the guns. They have instructions on no account to clap their hands, or make a noise.

One more, last but not least, order is to arrange guns on all the neighbouring *chauars*, and on the river (the latter about 2 miles off), to fire off cartridges to keep the duck from settling or staying all day on such places, never returning to the *chauar*.

I generally have to supply cartridges to such people and trust to luck that they will use them to frighten the birds back and not keep the ammunition for a more favourable occasion.

Invitations are sent out to 50 or 60 people to join the shoot on Sunday, January 8th, 1943. The Invitation is as follows:—

“Rarhia—Duck shoot 8-1-43. Good prospects. Each gun expected to bring his own lunch, to be eaten in his butt. His wife, or any other person, may accompany him (butts being quite large enough to hold two people and quite water-tight from below, not from above!). Guns expected to arrive 10-30 a.m., first shot to be fired by me before 12

noon, boats (one to two guns), beaters (two to each gun), also beaters to put up the birds, tea 3-30 p.m. to sun-set, with cakes kindly supplied by the wives of some of the guns—drinks—smokes (Cigars and Cigarettes) and an equal share of the duck shot: all for Rs. 5/-. Ladies and children free and most welcome. Birds supplied with luck! Bring your own gun and cartridges!!”

On this occasion 40 guns turned up, 16 ladies and 3 children. While I arrange the 200 or so beaters, they stand and talk, have cups of tea and study the map of the *chaur* and *nassie*.

As soon as I have finished sending out the beaters (mallahs) to their respective places, we draw for butts and much excitement it is for the keener guns of the party, all eager to draw the *nassie*. This pleasure is debarred for me as I have to stay on the big *chaur* to work the bandobust, to see the beaters carry out orders, and the guns too sometimes!! The butts having been drawn I give a little lecture to the guns on what *not* to do, and where to go to reach the butts they have drawn. The guns numbers 1 to 12 walk to the six boats ready for them, A to F some 100 yards from the pavilion, and are rowed out to their butts, which are on the western side of the *chaur*. Guns, who have drawn 13 to 14 take their cars and drive round to the north side of the *chaur*, (about  $1\frac{1}{2}$  miles) parking their cars on the main Areraj to Motihari Road at Flag 1, and get to their butts in boats G to L. Guns, who have drawn 25 to 45, drive their cars about  $\frac{1}{2}$  mile to the Eastern side of the *chaur* to Flag 2, walk to boats M to T, and are rowed to their respective butts. Boats all have orders to return to the Southern Bank and are used by men told off to move about the middle of the *chaur* to keep the duck on the move.

This is quite easy when there is open water in the middle of the *chaur*; but not so easy when it is all floating rice stubble from the floating paddy crop, when it is very hard work for two men to punt a boat about.

(To be continued),

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Some Thrilling Encounters with some of the  
Big Game of Burma.

BY

W. S. THOM.

I dare say a good many sportsmen have had some fairly exciting shikar experiences with big game during the many glorious years they have spent hunting large, dangerous animals such as tiger, elephant, gaur and leopard. These adventures may in the case of some of us perhaps, have been less exciting than in the case of others, but all of them I have no doubt bring back again very happy memories of the various thrilling adventures we went through in bye gone days, adventures, which most of us used to relate all over again to our friends when they asked us to do so, or whilst we were seated round our camp fires in the jungle. As I may perhaps, have had a larger share of some of these adventurous thrills than most sportsmen, so far as Burma at any rate is concerned, and came through them all more or less scatheless, I trust I may be pardoned for blowing my own trumpet somewhat when relating here, in detail, accounts of some of the tense moments spent by me on these occasions with such animals as wounded elephant, tiger, and gaur, which I consider to be the three most dangerous animals to follow when they are wounded.

Most of the material published in this serial article on elephant, gaur and tiger appeared in the Bombay Natural History Society Journal some years ago.

*Elephant*

Elephants in Burma, especially solitary bulls, have to be carefully tracked and followed up sometimes for miles before the sportsman can come up with them and administer the "coup de grace." An old bull elephant that has been shot at, and wounded, frequently by Burman hunters armed with inferior weapons, usually becomes a dangerous rogue and a devil incarnate, and invariably enters dense patches of jungle during the heat of the day or lies in wait for people, and, unless the wind is in ones favour, and one can hear the

animals ears flapping occasionally, it is not so easy to get close up to it, for it, generally, either makes off or charges on scenting, or seeing, any one. As a matter of fact the sportsman, in order to be sure of his shot, should not be more than ten or fifteen paces from an elephant that he is about to shoot. If the tusks of an animal, that the sportsman is after are worth having and he wants to make sure of bagging them then the heart shot should be taken, low down behind the shoulder. According to Sanderson, however, the author of the work, "Thirteen years amongst the wild beasts of India," the brain shot is the poetry, and the body shot the prose of elephant shooting. An elephant has no large arteries in its head and therefore does not bleed there very much from a shot, so if the hunter misses the brain with his first shot, even though the bullet may pass very near it, the animal may go down stunned, temporarily perhaps, but it will get up again and go clean away as if it had not been hit at all, when a lot of following and tracking up will then have to be done before it can be come up with again. If on the other hand the sportsman shoots the animal through both lungs it will not travel very far and can then easily be followed up and finished off. If shot through the heart, which lies like a small rugby football, between the animal's shoulders, low down, the shot will be fatal and the animal will collapse almost at once.

On one occasion a tusker elephant that I had wounded with a head shot chased me and naarily caught me as I sprinted away from him, doing a fast hundred yards and carrying, in my right hand, a double 8· bore rifle, by Tolly, that took a charge of ten drachms of black powder. The animal came so close to me in fact, in spite of the sprint, that I put up, that a branch of a tree which it had hit with its trunk and head, as it moved rapidly forward to seize hold of me, knocked my topee flying off my head. I managed, however, to get out of its reach in time by turning sharply at right angles and going off in another direction. It never does to run away in a straight line from an elephant that is chasing one even though one may be a first class hundred yards runner, for an elephant will catch up the fastest

runner in the world after the first hundred yards. The only thing to do is to twist and turn in all directions until the animal loses sight of one and provided also one's scent is not being blown towards the elephant. The sight, and hearing, powers of an elephant are poor compared with its power of scent which is very good. There is no doubt that this elephant was a dangerous animal, a nasty rogue that was always ready to follow up any one at once as quietly and as quickly as possible. It never even used to divulge its whereabouts by flapping its ears, or its approach, by trumpeting or breaking any branches. On this occasion after picking up my hat I continued to follow this animal's tracks which led into a fairly dense deserted plantain plantation, interspersed with a number of bamboo clumps, and thickets, also a large number of very large trees. When my trackers, and I, had entered the plantation for a distance of about 100 yards or so we heard the sounds of an elephant flapping its ears. This, if it was the same animal, appeared strange to us, although most elephants do flap their ears occasionally when they are standing still, or feeding, this animal had never been known to give away its whereabouts in this fashion before. Perhaps its wounds had necessitated the flapping of its ears to keep away the flies. The sounds did not appear to be more than two hundred yards or so from the spot where my trackers, and I were standing alongside the trunk of a large tree. Suddenly, without any previous warning, we heard a number of branches being broken, in rapid succession, followed by the regular thumping sounds of an elephant's feet on the ground coming towards us in full charge. My men immediately began to help me to ascend the trunk of the tree which stood close by us and which, fortunately for me, had a few small branches extending low down up its trunk. I had not climbed the tree more than about ten feet when the elephant appeared, suddenly, standing parallel to us and exactly below me, after covering the ground at a great pace along an elephant path way which was situated some two or three paces, or so at most, below the trunk of the tree I had ascended. In fact we had entered the plantation by an elephant path way that

lay parallel to the one the elephant had charged along to try and find us, after getting our wind. There is no doubt that it got our wind when it was in the plantation and that it had only stopped dead exactly below us and parallel to the tree I had ascended, when it had lost our wind at that point. Had the animal taken the same elephant path way or track, along which we had entered the plantation which passed the foot of the tree which my men had helped me to ascend, some, if not all three of us would, in all likelihood, have been killed by the animal. As a matter of fact it was quite near enough to be unpleasant, for the elephant had missed us by a very little indeed. In spite of my having been in a very unsteady position, when seated on a fork of the tree I had climbed when the elephant charged, I was still able to let the elephant have a right and left from the 8' bore firing downwards at it, holding my rifle in an almost perpendicular position, and aiming, as well as I could under the circumstances, for what I took to be the junction of its neck with its body. On receiving the two bullets the animal sank to the ground at once on to its knees, and then got up again and shot away to one side, away from the tree I was up, and then began sliding down a small slope for some distance below me, uttering a succession of ear piercing screams as it disappeared into the jungle. This animal I have no doubt got the fright of its life for it never attempted to stop or return to go for us as I fully expected it would do. My two men had, ofcourse, disappeared by then like lamp lighters into the undergrowth. As the elephant did not show any signs of returning however, they soon joined me again when I descended from the tree I had been up. I must say that I felt at one time when seated on the fork of the tree, that the recoil from my two shots from the 8' bore, in spite of the rubber recoil pad on the butt of my rifle, might, perhaps, dislodge me from my perch, as I had not a very firm foothold when I fired the two shots, in quick succession.

I decided to follow this elephant up on the following day, as I noticed, when it stood below the tree I was up, it had a very good pair of tusks and, in any case it had been wounded, and I wanted to finish it off, as it was also a

dangerous animal. Finally, to be as brief as possible, I would say that, after a long chase of several hours on the following day, I came up with the elephant standing stock still in a large patch of dense bamboo jungle. Fortunately some rain had fallen during the night with the result that my trackers, and I, were able to travel through the jungle quite noiselessly. I did not want to make any mistake about the wind on this occasion and we tested it carefully several times long before we came near the animal. I succeeded, eventually, in getting up to within ten yards of the elephant and took the brain shot with my right barrel, the bullet getting it through the hollow on the left half front below the left eye. On receiving the shot the tusker lurched forward and collapsed onto both knees but as it seemed to be trying to regain its feet again I finished it off with a second shot through the brain which made its collapse on to its right side. The tusks weighed 65 lbs the pair and were well worth having.

I had another nasty experience with a tusker elephant that I had wounded and followed up into a dense cane brake, which was interspersed with a certain amount of dwarf bamboo jungle and undergrowth. Most sportsmen will understand what it means to follow up a wounded elephant into a jungle composed of dense cane, bamboo, and undergrowth. The animal waited there in grim silence for me to come without even advertising its whereabouts by a flap of its ears. Cautiously, oh ever so cautiously, did I push my way into that cane brake, and only those who are accustomed to the jungles of Burma will know what is meant by a cane brake and how difficult it is to move about in one, some times, without being hung up or even seeing clearly fifteen yards ahead. To cut a long story short I almost walked into the animal as I rounded a bamboo clump and, without a note of warning except for the emission of a suppressed spurt of air which it shot out of its trunk, the animal raced straight in my direction. I made half a dozen flying leaps to avoid it but came an awful sprawler tripping over a cane and spread-eagled right in its path. Fortunately

for me the jungle was very dense overhead or else the elephant would have spotted me lying helpless beneath it. As it came tearing along through the undergrowth one of its ponderous forefeet found my right thigh and pinched half of it into the mud without breaking a bone fortunately or doing any damage except to cause me to utter a slight groan of pain on account of the bruise which turned my right thigh into all the colours of the rainbow. I followed up the elephant within an hour and came up with it again after it had covered about three miles of very hilly country. This time it was head on to me in fairly open jungle. On catching sight of me it uttered a shrill trumpet and swung round as if to make off, but not before I got it with a lucky shoulder shot through the heart. This animal's tusks weighed 95 pounds the pair and I noticed that one of the forefeet, the right one, was much smaller than the left one.

I once followed up a very large "*muckna*" elephant, or tuskless male, that had been doing a lot of damage to the rice crops of the villagers that resided in several villages that were situated in the Momeik State of the Ruby Mines District, Upper Burma. The villagers asked me to shoot this animal, as a matter of fact, as it had done an immense amount of damage to their crops for a long time, and the people had been suffering a good deal of loss in consequence. This "*muckna*" that used to damage the people's crops, was never accompanied by any other elephants when it entered the rice fields of the villagers.

It was certainly the largest elephant I had ever seen, judging from the size of the impressions of its forefeet which were if, I remember rightly, about 24 inches in diameter from the centre of its heel to the centre of its toes. *Mucknas* or "*haings*", as they are called in Burma, are generally feared by other elephants in a herd owing, I suppose, to their size, strength, and fighting qualities. Their trunks also, if I remember rightly, are more massive than those of other animals. There is no mistaking the tracks of a huge *muckna* when they are come upon in the jungle as their forefeet are more circular than those of a large tusker elephant which are more elongated, whilst the

toe nail impressions of the forefeet of an elephant with good tusks always show up more distinctly than those of a *muckna*. I do not agree that a "*muckna*" elephant is any more dangerous to follow up and shoot in the jungle than an ordinary tusker elephant unless it is a solitary animal that has been shot at many times by persons armed with inferior weapons, when it becomes a rogue and chases and kills people. In fact I am rather inclined to think that "*mucknas*" are more docile than are ordinary elephants with good tusks for the simple reason that they are seldom shot at either by European or Burman hunters, whilst elephants possessing good tusks are shot at frequently, and not always killed, and are therefore more likely to become rogues. Any elephant, be it a *muckna* or a tusker, if it has been shot at on numerous occasions by men armed with inferior firearms that are not powerful enough to kill an animal like an elephant is bound to become a rogue which will generally attack, and kill, any human being it may meet.

However let me describe how I came off in an encounter I had with the largest "*Muckna*" elephant that I have ever come across. This *muckna* used to enter the fields of the villagers at about eight o'clock at night and disappear, with a full stomach, very early in the morning so I had to take on its tracks at a very early hour in the morning in order to come up with it before the sun got too hot. I started off, accordingly, one morning at about 5 a. m. accompanied by two of my trackers and caught the animal up at 8 a. m. in a large dense patch of bamboo jungle which was also full of dry watercourses, boulders, and large fallen trees. Most of the timber had been felled by the forest department, and by the villagers, some months before. As we had to pass through an intricate maze of fallen trees, undergrowth, and bamboos lying across one another in every direction, over the beds of the various ravines and water courses, which we had to cross, it was necessary for myself, and my men, to make a careful examination of all this intricate-looking cover before we come up with the elephant I had come out to shoot. Finally, after testing the wind carefully, we decided to travel along a watercourse which was full of boulders

but with little or no water in it. After ascertaining that the wind was in our favour, so far as we could make out, we suddenly heard some gurgling and rumbling sounds which seemed to come from ahead of us somewhere at a distance of about 150 yards or so and also the sounds of some bamboos being broken. The former noises, according to my men, had been made by the animal's stomach and that the other noises that we had heard, were made by the elephant feeding on bamboo jungle. I had only one weapon with me on this occasion, namely a very hard hitting double hammerless 8 bore rifle, taking a charge of 10 drachms of black powder. There were several deep, dry watercourses at this point which seemed to cross one another and run about in all directions, whilst a number of the trunks of some large trees that had been felled, not to speak of numerous bamboos, lay across the route we had to take across most of the watercourses as well. It was, as a matter of fact, a very unpleasant strip of country that we had to negotiate. Some of the trunks of the large trees that had been felled also lay everywhere across the watercourses at heights varying from six to ten feet. I must say I did not like the look of the surrounding jungle here at all, especially the fallen trees, bamboos, the nullahs and the undergrowth. I can assure you that I was not very keen about meeting the "*muckna*" in this kind of cover, if possible, especially if it made up its mind to charge us. We had not gone more, I suppose, than one hundred and fifty yards over this abominable country when our ears were suddenly assailed by a lot of trumpetng, shrill screams, and the sound of breaking branches, and, before we knew what happened the "*muckna*" burst into view above us on the banks of the watercourse, the bed of which we were then standing in. The rapidity with which the animal appeared above us, with its trunk stretched out in front of it at full length, striding over bamboos, and fallen trees, as if they were ordinary school hurdles, was by no means pleasant. My two companions, who fled and disappeared with great rapidity to a safe place, shouted out to me, before they went, that I was to make a bee line for a kind of cave or

depression which showed up in the side of the bank of the watercourse and which was, also, on the same level as the bed of the water course and situated only a few feet from the point where the animal would, in all likelihood, enter the watercourse. I, accordingly, did what I was told to do, clutching the heavy 8' bore rifle in my right hand as I raced to the cave, being thankful also that each of my two side coat pockets held two 8' bore cartridges, as I always, as a matter of fact, when following dangerous game, made a point of carrying a sufficient number of cartridges in my coat pockets as one can never trust a cartridge bag carrier to stand fast on an occasion like this. Fortunately for me I saw, as I raced for the cave, that the trunk of a very large tree that had been felled, lay over the cave's entrance to within a yard of the top of its roof, and that the elephant would have to take this in its stride as he passed over me to enter the water course. All these things passed through my mind like lightning as I reached the cave. The elephant had seen us all in the bed of the stream, and it, certainly, saw me dash forward towards the cave which, of course, brought me much closer to the animal than I desired to be. All this, of course, takes much longer to tell, than the time it took to take place, for the animal dashed over the bank, sooner than I expected, taking the fallen tree in its stride and passing over within a foot or two of my head as it went over. I just had sufficient time to let it have a right and left barrel into it's stomach, as it went over me, in an attempt to get the lungs or the heart. The *muckna*, on receiving the two bullets, uttered two ear piercing screams as it landed in the watercourse but, fortunately for me, it did not stop, or turn round, to attack me at the cave which did not extend inwards more than four feet deep if that. How the *muckna* managed to circumvent the large fallen tree trunk, as well as its branches, without being held up before it reached the bed of the watercourse in one stride, astonished me. No ordinary elephant could have done it. It is difficult to say whether the animal was only trying to escape from us at the time it appeared after winding us or

whether it was really charging when it crossed over my head and entered the water course.

After my men turned up we noticed, after taking on the tracks of *muckna*, that there was a good deal of blood on the ground, and bushes, it had passed over. It took us another hour and a half before we came up with the animal which appeared to be slowing down, judging by the length of its strides, and my men seemed to think that it was in a bad way and would, probably, not last very long. Finally I saw it standing between two large bamboo clumps at a distance of about 100 yards, flapping its ears. The beast on winding us spun round as if standing on a pivot, and then came straight down upon us, its massive trunk which was hanging at full length, being jerked up and down with its head as the animal covered the ground quickly, but quietly, towards us. We all sprinted and took up different positions on the ground behind the trunks of suitable trees and as the *muckna* passed my tree, at a distance of about five paces to my left, I let it have a right and left from the 8-bore, both shots taking effect on its left temple. These two shots slowed it up considerably, for it began to show signs of becoming very unsteady. Two more shots in the same place or rather a little farther back brought the animal down to the ground with a crash, one of the shots having found the brain. I rushed up to within two yards of it to give it another shot if it was required but found that it was not necessary as it remained perfectly still where it lay. I felt sorry for what I had done as it was such a magnificent animal. I think if I remember rightly that its height was 10 feet 6 inches.

(To be continued).

Collecting Lepidoptera in India

By

D. G. SEVASTOPULO, F. R. E. S.

In a previous paper (1939, Journ. Darj. Nat. Hist. Soc., xiv, 24—32) I dealt with the collecting, rearing and preserving of the early stages of Lepidoptera in India; the present paper deals with the collecting of the imago or perfect insect. I have divided the subject into sections and included a description of the apparatus required under each. A subsequent paper will deal with the preserving.

1—Daylight Collecting. The apparatus required consists of a net, a killing bottle, tins, forceps and paper envelopes. Much of what I write is not included in, or is at variance with, what most books advise, but my suggestions are made on the basis of some nineteen years collecting experience in India, and, during that period, many methods have been tried and discarded.

The best type of NET is that known to the trade as a Kite Net. It consists of a brass Y, the arms of which should be brazed and not soldered, and with a tail long enough to be gripped and used as a handle. The frame of the net consists of four pieces of cane, each about eighteen inches long, two straight and two curved. The two straight pieces each have one end wrapped with brass and fit into the arms of the Y, and the other end with a brass socket into which one end of the curved piece fits. One of the curved pieces has both ends brass bound and the other has one end brass bound and the other with a socket. When the four canes are fitted together and into the Y, the whole forms a triangle with the top curved instead of straight. The net itself should be made of fine mosquito netting or Brussels net, Leno is not strong enough, and the best colour is black or dull green. The mouth should be made of strong tape and doubled over to form a channel into which the frame can be slid. The bag should be at least the length of the arm, preferably a little longer, and the seams should be sewn with the bottom of the bag rounded,

not straight with corners. To assemble the net, one curved piece of the frame is fitted into each straight piece, the two long pieces thus formed are inserted into the doubled mouth of the bag, the free ends of the straight pieces are then fitted into the arms of the Y and lastly the free ends of the curved pieces are fitted into each other. This type of net is too heavy to be used with a long stick, but a short one can be cut to fit the tail of the Y if required. Nets with wire frames and the many types of folding nets are never, in my experience, strong enough unless the opening is too small to be of real use.

The KILLING BOTTLE consists of a strong, wide-mouthed, glass jar fitted with a well-fitting, close-grained, cork bung; glass stoppers are not satisfactory as they never fit perfectly and are apt to work loose and jump out when the bottle is in use in the field. It is a good plan to soak the cork in melted paraffin wax. The bottle is charged with cyanide of potassium mixed with plaster of paris and it is better to have this done by a chemist. The plaster of paris should be mixed with as little water as possible and poured over the cyanide at the bottom of the bottle, and care must be taken not to dirty the sides. If the bottle 'sweats' it means that the plaster was too wet and a little dry plaster of paris should be strewn over the surface to absorb the excess liquid. In the field the bottle is best carried in a well padded, leather case, wide and deep enough to contain the whole bottle and not leave half of it outside, this case should be fitted with two straps, one to go round the waist as a belt and the other to go over the shoulder. This leaves both hands free and the bottle is well protected from knocks and falls.

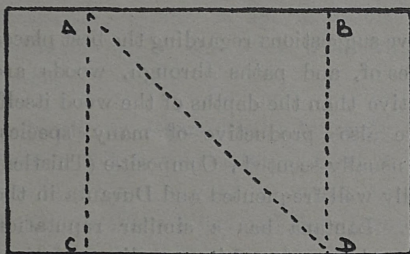
Cyanide of potassium is a deadly poison and the charged bottle should be kept well out of children's reach.

In Europe crushed laurel leaves are often used instead of cyanide but, so far as I know, laurel does not grow in India. Other killing agents are concentrated ammonia and chloroform, but both evaporate so quickly in India that they are of little use. Cyanide has one disadvantage, it

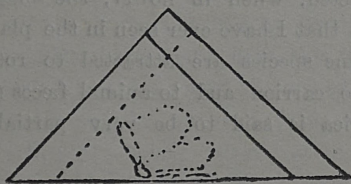
causes a pronounced rigor so that it is quite impossible to set insects soon after killing with it; this rigor wears off, however, and a few hours after killing insects are in perfect condition for setting. In India this disadvantage is a minor one as the majority of insects are 'papered'.

The FORCEPS should be of the curved type, made of stainless steel such as are sold by all entomological dealers. They are best carried stuck into the killing bottle case, or, if the collector is wearing shorts and stockings, stuck inside the stocking.

The ENVELOPES are made by folding rectangular pieces of paper as shewn below. The paper is first folded



Method of folding.



Finished envelope.

along the diagonal AD and the projecting flaps are then folded along the lines AC and BD. The projecting corners are best cut off. The envelopes should be made of exact sizes, each size being double that of the one smaller. I have found the following a useful range of size for the unfolded rectangles— $5\frac{1}{2} \times 4$ ,  $4 \times 2\frac{3}{4}$ ,  $2\frac{3}{4} \times 2$ ,  $2 \times 1\frac{3}{8}$ . The

paper used should be slightly glazed, unglazed paper absorbs moisture, but should not be too glossy as otherwise the insects are inclined to slip about inside the envelope and rub themselves. If printed paper is used there should be sufficient blank space to write the name of the insect and the date and locality where it was caught. I have recently used envelopes made of celophane and have found them satisfactory in the three smaller sizes, although more

difficult to fold than paper, the largest size is too flimsy. A sufficient stock of envelopes should be folded before setting out.

The TINS should include two flat cigarette tins, one packed with empty envelopes and the other to receive the full ones. In addition to these two tins, the collector should carry as many small tins as possible to hold any larvæ or pupæ or other insects that are to be brought home alive. A few match-boxes are very useful. The boxes may either be carried loose in the pocket or in a haversack but some system should be adopted to keep empty and full boxes separate.

A needle and cotton should be carried to repair tears in the net.

It is difficult to give suggestions regarding the best places to collect, but the edges of, and paths through, woods are usually more productive than the depths of the wood itself. Open grass lands are also productive of many species. Attractive flowers are usually scented. Compositæ (Thistles, Daisies, etc.) are usually well frequented and *Duranta* in the plains is very popular. *Lantana* has a similar reputation but personally I have always found it most disappointing. A patch of *Clerodendron infortunatum* I found on the outskirts of Calcutta attracted, when in flower, the biggest assemblage of butterflies that I have ever seen in the plains. In addition to flowers some species are attracted to rotten fruit, to damp mud, to carrion and to animal fæces (the genus *Charaxes* in Africa is said to be very partial to leopard dung).

Sunny days are the most productive for Butterflies, but a dull day does not necessarily mean idleness as many species can be found resting on grass-heads or flowers or under leaves. Moths can be found at rest on tree trunks or rocks and both Moths and Butterflies can be dislodged from their hiding places by beating bushes and low down branches with a stick, some of them will try to escape by flight whilst others will drop down and either crawl under dead leaves or attempt to escape detection by lying absolutely still. A

few species of butterflies do not fly till dusk and many more are shade lovers and have to be looked for accordingly.

It is difficult to give advise on the actual strokes to be made with the net, some people use it in one way and others in another. It is, however, usually surer to net an insect on a leaf or high flower with a sideways or upward stroke and then to close the net with a turn of the wrist, rather than to strike downward from above and run the risk of the insect escaping through the net being hung up by twigs or herbage or by creeping into the undergrowth. Fast flying insects are better caught with a following stroke and a quick turn of the wrist to close the mouth of the net, an intercepting stroke is apt to result in a badly battered specimen due to the force with which it meets the end of the net.

I will now assume that a butterfly has been caught and describe the next procedure. First of all it must be decided that the insect caught is worth keeping, on no account should insects be killed and then thrown away, a bad specimen of a common insect, unless it is an aberration, should never be killed, naturally a bad specimen of a rare species is better than no specimen at all. If the butterfly is large enough it is best killed by pinching the thorax sharply between the finger and thumb, this must be done carefully as otherwise the thorax may be crushed, legs may be detached, or scales may be removed from the base of the wings. Butterflies frequently revive after this treatment and the insect should then be placed by means of the forceps in a suitable sized envelope, and the envelope and insect should then be put in the killing bottle for an hour or so. The butterfly should be put in the envelope with the wings closed and the antennæ and the edge of the forewing should be in the fold, as shewn in the figure above. After the butterfly has been in the killing bottle for an hour or so, it can be taken out and it and its envelope put in the flat tin brought for that purpose. Small butterflies, that cannot be pinched without damage, and all the daylight flying species of moths

are best coaxed into a matchbox and the box dropped into the killing bottle until the occupant is stupefied ; it is then put into an envelope and returned to the killing bottle in the same way as a pinched insect. A few of the larger butterflies, the red-bodied Swallowtails and the *Danaidæ*, cannot be killed by pinching and they have to be stupefied in the killing bottle before being put in their envelopes.

The envelopes are sometimes referred to as 'papers' and the process of putting a butterfly in the envelope as 'papering.'

Some of the high flying species of the *Nymphalidæ* are caught by putting out baits of rotten meat, but only males are obtained in this way. One collector in Malay used over ripe bananas as bait and thereby obtained several species that he had not obtained by any other means.

2—Night Collecting. The apparatus required for un-systematic night collecting is the same as for day collecting, with the addition of a good torch fitted on to the belt, to be used to help box or bottle captures. This method, often known as 'dusking', consists of roaming likely spots at dusk with a net but it is not usually very productive. Most night collecting makes use of the attraction of light to many species of moths, and baiting is also extensively used in Europe.

Light may be used in three ways. A room or verandah, preferably white painted, with a suitable outlook is left with the windows open and the light burning, and the attracted insects are put straight into the killing bottle (it is not possible, incidentally, to kill *Heterocera* by pinching). This is a very productive method, particularly in the hills, although I have found Shillong an exception to this rule. A sheet and lamp can be taken into open country and worked there, the many types of kerosene-burning, mantle-fitted lamps are very suitable for this. One sheet should be pegged out below the lamp and another hung up as a reflector. Or again a motor car's headlights can be shone directly onto a suspended sheet. Many moths will settle on the sheet and

can be boxed or bottled without trouble, others refuse to settle and have to be netted. Boxing the moths and taking them home to kill leads, in my experience, to large numbers of specimens being rubbed and spoiled, it is much better to use two or more killing bottles, one rather larger than the others, and to stupefy the moths in the smaller bottles, 'paper' them, and then transfer them to the large bottle.

There are also a number of different types of light traps but I have never had very good results from mine although some collectors are very enthusiastic. These are made in two parts, a lamp chamber in which the light, either electric or oil-burning, is housed and the trap itself, the two being separated by a sheet of glass. Mirrors are often used to intensify the light. The trap itself is usually a large glass-pannelled box with the side opposite the lamp chamber fitted as a one way entrance, that is to say with four panes of glass pointing inwards and leaving a narrow slit between them. Scraps of paper and dead leaves are usually placed inside the trap to provide a refuge for the captives, but in spite of this a large number usually rub themselves badly.

In localities that possess them, good catches can often be made off street lamps.

Another very productive method of collecting in Europe is 'sugaring'. I have not tried this personally in India but it is said to be a failure in the plains, possibly it would be more successful in the hills. The sugar mixture is made by boiling brown sugar and beer together and the mixture has a little rum or essence of pear added to it just before use. The sugar is painted on tree trunks, walls or rocks, or spread on rags suspended from strings, and a beat usually yields more after it has been used for a few nights. Moths taken at sugar should be kept alive for a few hours before killing in order to give the sugar time to digest, otherwise it may seep through the pinned specimen.

Perspiration is a potent source of attraction and I have read of good bags of moths being made on sweat-soaked clothes hung up in the jungle.

The attraction of a virgin female for the males of its species is used in Europe for collecting and is termed 'assembling'. In India I have not found this method a success. The female moth is put in a net-covered box and left exposed, the males being netted as they arrive.

A trap can be constructed to hold the 'assembling' female and it can also be used for sugar. It consists of a long, cylindrical tin divided about two thirds down from the top by a piece of wire gauze. The top end of the tin is fitted with a wire gauze funnel, which acts as a no-exit entrance. If the trap is to be used with a female moth, she is put in the lower compartment, if with sugar, that is put in instead, and the whole business is hung up outside.

All nightwork depends largely on weather, moonlight reduces catches tremendously, cold winds are unfavourable but a warm drizzle is usually very productive.

Every specimen should be accompanied by full data, the date and place of capture (the latter full enough to be understood by any body, it is useless giving the name of some small village that does not appear on any map), collector's name and any other details of interest. Specimens without data are almost useless from a scientific point of view.

*(To be continued).*

## The Nesting of the Malabar Trogon.

*Harpactes faciatus malabaricus* (Gould.)

The following interesting note on the breeding of this handsome bird was sent to me some years ago by my old friend Mr. C. Primrose, from the Rajagiri Estate Limited, Pathanapuram P. O., Travancore, S. India.

"I am sending you a clutch of two eggs of the Malabar Trogon to swell the number of your collection. They were taken by myself on the 25th April. The nest, a hollow carved by the birds in a very rotten stump three feet in height, was a large hollow of about five inches in depth. The eggs, which were slightly incubated, were on a few chips that had fallen into the hollow. This hollow excavated in the stump, which was six inches in diameter, was just below the top, about one inch of wood being above the top of the hole. I watched the nest for three days after first spotting it, in the hopes that the full clutch had not been laid. I saw both the male and female fly off the nest, so incubation is shared by both sexes. The bird allows a fairly close approach before leaving the nest, and then flies onto the nearest convenient branch, sometimes only a matter of five yards distance. This pair seemed to have no intention of deserting the nest as I inserted my hand in the hole on the first day, with the male looking on from a distance of about twenty feet. Next day the female flew off on my approach, and I disturbed both sexes from the nest on subsequent visits. The stump in which the eggs were laid was in the Rubber area, the Rubber trees being thirty feet, or more, in height and near the edge of the Rubber clearing the jungle which was a dense mass of *Eta*, a species of bamboo common at this elevation and vicinity. The bird is common round here and is usually to be seen if looked for, where a flock of the smaller birds are congregated."

Editor.

Note on occurrence of Avocets in 24-Parganas district, Bengal.

It is perhaps worth putting on record that Mr. W. A. S. Lewis and I saw a flock of about eight avocets while duck shooting not far from the boundary of 24 Parganas and Khulna districts last February. These birds are, in my experience, very uncommon in Bengal; the only other instance when I can remember seeing them was many years ago on the banks of the Jamuna River in Mymensingh district. Mr. Lewis whose bird photographs are well known to the readers of the Bengal Natural History Society's journal—told me that he had never seen them wild in India before; he agreed with me that there could be no doubt of their identity.

L. R. FAWCUS.

Calcutta,

3rd September 1943.

We know of no Bengal records but it has occurred as far East as Assam, we know of one record. In N. Bihar we have seen them on a good many occasions.

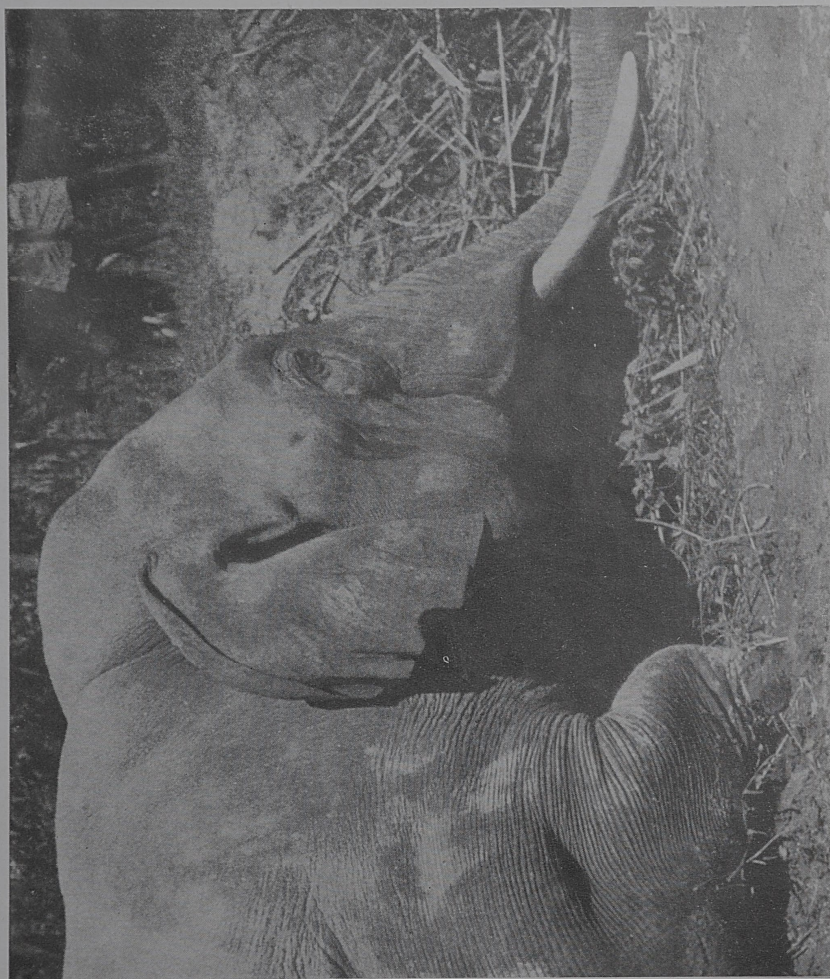
*Editor.]*

Shooting of a Wild Elephant in 'Musth' in the Duars.

I enclose herewith two enlargements of the head of an elephant, which Tyndale very kindly did, and he has suggested that you might like them to reproduce them in the Bengal Natural History Journal. The history of the elephant is as follows.

He was shot by myself in May this year and as you will see from the photo he was in full *Musth* at the time, and was very truculent and doing a lot of damage in my lines, so he had to be destroyed.

He first made an appearance in my lines on a Saturday night. On that occasion he went through my bungalow compound, and from there to my Mali's house where he pulled the side off the house, he then went to the next house which was the dhobi's, and a brick one. He tried



A Wild "Musth" Tusker.

*Copyright*  
H. E. Tyndale.

to push in the side of that with his tusk, but got fed up, and cleared off and roamed round the pilkhana and the lines; eventually he cleared off in the early morning. On Sunday night he came again, and I got word he was about, so went out, but as it was very dark I could hear him but not see him and as soon as I put a light on him he bolted into a betel nut bari near our factory. I fired my .12 bore and he moved off so I thought he had gone off for good, and I went home to bed. He did no damage that night, but I was wakened up at 4 a.m. and told he was still about, so went out and when I got there he was going off towards the jungle, so to scare him along I fired my .12 bore again, but he did not seem to bother about it. One Tuesday he came again but only roamed about the lines and pilkhana, but on Wednesday he started giving trouble and knocking down houses, and the coolies in the lines he was visiting would not stay in them at night, but were all sleeping in the withering lofts, so something had to be done about it as it would not have been very long before he started killing people. On Thursday night I waited for him and he came about 10-30 P.M. and started roaming about and knocking down houses, and he also drove his tusk through the tin roof of one house. At 3 A.M. I was able to get a decent shot at him which killed him. He was very truculent most of the time, and undoubtedly would have done a lot more damage if he had not been destroyed. He had no fear of habitation or of human beings at all.

G. R. ENTWISTLE.

Dalsingpara T. E. and P. O.,

Duars.

23rd. Nov. 1942.

Obituary

**Hugh Whistler.**

The death of Hugh Whistler on 7th July, 1943 at the early age of 53, is a great loss to the study of birds in India. In 1909 he was appointed to the Indian Police and all his service was in the Punjab Province.

From childhood Whistler had been interested in Natural History, and his spare time in India was devoted to collecting and observing birds. Most of his service was in the Kula district, and more than one trip to Kashmir. In about 1925 he was asked to write a popular book on Indian birds, and some years later his well-known "Popular Handbook" appeared, which has now run through several editions. In addition to Whistler's systematic studies of Indian birds and his knowledge of them in the field, he had also a very pleasing style which ensured the success of the book from the beginning. After his retirement in 1926, Whistler continued his studies of Indian Birds, and in 1932 began a series of papers on the birds of the Eastern Ghats survey of the Bombay Society.

This was not merely a report on the specimens collected but rather a critical revision of the birds of the Peninsular. This series of papers, more than any other, brought Whistler's name to the fore in India, he henceforth became the authority on Indian birds. He examined other collections made for the Bombay Society and, at the same time, carried out an evergrowing correspondence with ornithologists throughout India.

Another important paper was that on the "Birds of Afghanistan" which he wrote for the British Museum, and shortly before his death he completed a long report on Ceylon birds for the Colombo Museum.

Unfortunately he did not live to see these papers published.

British Museum (Nat. Hist.)  
London.

4th November 1943.

N. B. K.

### A Further Appreciation.

I knew Hugh Whistler most of his career as a Punjab Policeman, and we had been good friends up to the time of his lamented death. We never met until I went home in 1929, when I stayed with him and his wife and little daughter on two occasions, for a week or ten days each. Those days spent with them at their home at Battle, are amongst the happiest I have known. On several occasions we rambled in the woods on his father-in-law's fine estate, where I was able to re-learn all about the birds of the British countryside. He had then just started a museum of his own, the drawers of which contained many beautiful made skins of Indian birds, skinned by himself.

I now hear that a lovely museum has been built since I was there, and it is good news to know that his wife, the Hon. Mrs. Whistler intends keeping it up. Hugh Whistler was a most generous man, and my private collection of birds' skins has been enriched by many of his beautifully prepared skins. He was always willing to help one in any way, no trouble being too great, and many were the skins I sent to him to compare with others at the British Museum and returned to me with their identification.

The honour of my being elected a British Empire Member of the British Ornithologists Union, was due to Whistler's proposal, being the first member elected from India.

Besides those articles mentioned in the obituary by "N. B. K.", he wrote separate ones on each of the districts of the Punjab in which he was stationed. He also contributed to our journal on several occasions. One of these was a most useful paper, on the skinning and preservation of birds' skins, illustrated by my friend C. Primrose. As mentioned by "N. B. K." the "Popular Handbook of Indian Birds" was a great success, now a 4th edition has been urgently called for and will be published I hope, at a not too distant date.

Whistler's other interests, besides ornithology, were antiquarian and archaeological, but unfortunately, due to the war, he was unable, owing to civic duties to pursue them as much as he would have liked. His home life was a very happy one, he was devoted to his wife and children, and whilst I was staying with them he made me feel as one of the family, helping to pick raspberries, and do anything else there was to be done. By his death I have lost a good friend. He leaves behind a wife and two children, a girl and a boy, to all of whom goes my deepest sympathy.

C. M. I.

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The honor of my being elected a British League Member of the British Ornithologists Union was due to Whistler's proposal, the first member elected from India.

Besides those articles mentioned in the library by Mr. B. K. the book appears once on each of the pages of the journal in which it was mentioned. It also appears in our journal on several occasions. The most useful paper on the skinning and preservation of birds being illustrated by my friend G. P. Pringle. As mentioned by W. B. K. the popular Handbook of Indian Birds was a great success, now a 4th edition has been published for me and will be published I hope at a not too distant date.

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