

506.54

THE
JOURNAL



OF THE

BOMBAY NATURAL HISTORY SOCIETY.

EDITED BY

SIR REGINALD SPENCE, KT., F.Z.S., S. H. PRATER, C.M.Z.S.,
AND C. McCANN, F.L.S.

VOL. XXXVI, No. 2.

Date of Publication, 15th April 1933.

Price to Non-Members *Rs. 15-0-0.*
or £ 1-3-0.

For terms of membership, see inside front cover.

Honorary Secretary's Address :
BOMBAY NATURAL HISTORY SOCIETY,
6, Apollo Street, Bombay.

LONDON AGENTS :
DULAU & Co., Ltd.,
32, Old Bond Street, W. 1.

PRINTED AT THE DIOCESAN PRESS, MADRAS.

CONTENTS OF VOLUME XXXVI, No. 2.

	PAGE
THE GAME BIRDS OF THE INDIAN EMPIRE. By E. C. Stuart Baker, C.I.E., F.Z.S., F.L.S., M.B.O.U., H.F.A.O.U. Part XIX. (<i>With a coloured plate.</i>)	293
REVISION OF THE FLORA OF THE BOMBAY PRESIDENCY. By Rev. E. Blatter, S.J., Ph.D., F.L.S. Part XX. (<i>With 2 plates.</i>)	307
SOME EXPERIENCES AMONGST ELEPHANT AND THE OTHER BIG GAME OF BURMA FROM 1887-1931. By W. S. Thom.	321
THE VERNAY SCIENTIFIC SURVEY OF THE EASTERN GHATS (Ornithological Section). Part IV. By H. Whistler, M.B.O.U., assisted by N. B. Kinnear, M.B.O.U.	334
SOME BEAUTIFUL INDIAN TREES. Part XI. By Rev. E. Blatter, S.J., Ph.D., F.L.S., and W. S. Millard, F.Z.S. (<i>With 1 coloured and 1 black and white plate and 2 diagrams.</i>)	353
THE HYDERĀBĀD STATE ORNITHOLOGICAL SURVEY. Part I. By Sālim Ali, with Notes by Hugh Whistler. (<i>With a map and 2 plates.</i>) ...	356
"NON-POISONOUS SNAKES." By S. H. Prater, M.L.C., C.M.Z.S., J.P.	391
NOTES ON THE COLOURATION AND HABITS OF THE WHITE-BROWED GIBBON OR HOOLOCK (<i>Hylobates hoolock</i> Harl.). By C. McCann, F.L.S. (<i>With 2 plates.</i>)	395
THE GAME BIRDS AND ANIMALS OF THE MANIPUR STATE WITH NOTES ON THEIR NUMBERS, MIGRATION AND HABITS. Part I. By J. C. Higgins, I.C.S.	406
THE CIVET-CATS OF ASIA. By R. I. Pocock, F.R.S. (<i>With 4 text-figures.</i>)	423
THE BUTTERFLIES OF BANGALORE AND NEIGHBOURHOOD. By J. A. Yates.	450
ADDITIONS TO THE DRAGONFLY (<i>Odonate</i>) FAUNA OF INDIA WITH DESCRIPTIONS OF NEW SPECIES. By Lt.-Col. F. C. Fraser, I.M.S., F.E.S. (<i>With 4 text-figures.</i>)	460
THE SOCIAL LIFE OF SNAKES. By S. H. Prater, M.L.C., C.M.Z.S., J.P. ...	469
NEW PLANTS FROM WAZIRISTAN. By Rev. E. Blatter, S.J., Ph.D., F.L.S.	477
REVIEWS—	
1. <i>Les Oiseaux De L'Indochine Francaise.</i>	485
2. <i>The Nidification of Birds of the Indian Empire.</i>	485
MISCELLANEOUS NOTES—	
I.—How does a Tiger make a 'Kill'? By R. K. M. Battye.	488
II.—Panthers of the North-West Frontier. By R. I. Pocock, F.R.S.	489
III.—Jackal attacking Goat. By R. M. Simmons.	490
IV.—Wild Dogs. By R. C. Morris, F.Z.S., F.R.G.S.	491
V.—'White' Bison. By R. C. Morris, F.Z.S., F.R.G.S.	492
VI.—Age of Bison. By R. C. Morris, F.Z.S., F.R.G.S.	493
VII.—Elephants—Age to which they live in captivity. By R. D. Richmond, C.I.E., I.F.S.	494

	PAGE
VIII.—Elephants eating earth. By R. C. Morris, F.Z.S., F.R.G.S. ...	496
IX.—Habits of the Muntjac (<i>M. malabaricus</i>). By R. C. Morris, F.Z.S., F.R.G.S.	497
X.—The Migration of the Paradise Flycatcher (<i>Tchitrea paradisi</i>). By H. Whistler, F.Z.S., M.B.O.U.	498
XI.—Further Notes on the Nesting of <i>Lanius nigriceps</i> Frank. with observations on juvenile plumage. By S. C. Law, M.A., Ph.D., F.Z.S., M.B.O.U. (With 1 plate.)	499
XII.—The Status of <i>Geocichla citrina citrina</i> Lath. (in the District of 24-Parganas, with a note on Nestling Colouration). By S. C. Law, M.A., Ph.D., F.Z.S., M.B.O.U.	501
XIII.—Extended Distribution of the Wynaad Laughing Thrush (<i>Garulax delesserti</i> , Jerdon) to North Kanara. By V. S. LaPersonne.	503
XIV.—The Occurrence of the Common Ruby Throat (<i>Calliope calliope</i> , Pallas) in the Godavery Delta. By V. S. LaPersonne.	504
XV.—Nesting of the White-eye (<i>Zosterops palpebrosa</i> , Semm.). By Lt.-Col. E. E. Doyle, I.M.S.	504
XVI.—Note on the Indo-Burmese Pied Hornbill (<i>Hydrocissa malabaricus leucogastra</i>). By E. P. Gee. (With a plate.) ...	505
XVII.—The Migration of Wild Fowl—The Society's Bird Ringing Scheme. By Editors.	507
XVIII.—Early Arrival of Snipe in the Andamans. By J. Miles Stapylton, I.C.S.	507
XIX.—The Common Central Asian Kingfisher (<i>Alcedo atthis pallasii</i> , Reichenb.) in Nepal. By V. S. LaPersonne.	508
XX.—The Occurrence of the Lesser Kestrel (<i>Cerchneis naumanni</i> , Fleisch.) in Burma. By C. B. Ticehurst.	508
XXI.—Some Observations on the Nesting of a pair of Ceylon Shikra Hawks (<i>Astur badius badius</i> , Gmelin.) By W. W. A. Phillips, F.Z.S., M.B.O.U.	509
XXII.—Nesting of the Grey Partridge (<i>Francoelinus Pondicerianus</i> , Gmel.) By Lt.-Col. D. B. Edwards.	512
XXIII.—The Occurrence of the Green Pit Viper (<i>Trimeresurus gramineus</i> , Shaw) at Nagpur. By E. A. D'Abreu, F.Z.S.	512
XXIV.—Intestinal Parasites of the Python. By R. C. Morris, F.Z.S., F.R.G.S.	513
XXV.—The Occurrence of the Common Chamaeleon (<i>Chamaeleon calcaratus</i>) in Gujarat. By Hari Narayan G. Acharya, F.Z.S. ...	513
XXVI.—A Note on the Occurrence of <i>Rana hexadactyla</i> , Lesson in Bengal. By J. L. Bhaduri.	514
XXVII.—Fresh Water Eels. By S. A. Strip.	516
XXVIII.—Notes on an Acridiid Grasshopper (<i>Gesonia punctifrons</i> , St.) ovipositing into stem of 'Colocasia' Plant. By T. V. Ramakrishna Ayyar and N. Krishna Menon. (With a plate.) ...	517
XXIX.—Phosphorescence in a Bombay Myriapoda. By A. N. Gulati, M.Sc.	519



A large tusker photographed in the Thayetmyo Yomah.



Elephants watering.

SOME EXPERIENCES AMONGST ELEPHANT AND
THE OTHER BIG GAME OF BURMA FROM
1887 to 1931.

BY

W. S. THOM.

A book on big game shooting in Burma entitled '*Wild Sports of Burma and Assam*' written by me in collaboration with Colonel F. Pollock, late Staff Corps, was published by Messrs. Hurst & Blackett, Ltd., London, in 1900, priced at 16 shillings. Colonel Pollock sold the work outright to Messrs. Hurst & Blackett. I do not remember how much Pollock received from that Firm, but I received no portion of the sum paid to Pollock over the transaction.

Messrs. Hurst & Blackett, on hearing from me that I was considerably out of pocket over the matter, were good enough to send me three complimentary copies of the work. Pollock, if he has not been gathered to his Fathers by now, must be well over 100 years of age. I tried without success to get in touch with him after he sold the book to Messrs. Hurst & Blackett and have never heard anything more of him since. That Pollock was a great *shikari* in his day and a remarkable man in many ways, and that he did an immense amount of big game shooting in the sixties, cannot be denied. I was asked on several occasions subsequently, when *Wild Sports of Burma and Assam* went out of print, as it cannot be obtained now easily, to bring out a new book of my own. That would have been a difficult business and would have cost more money than I could afford.

Big game shooting now-a-days is, I am afraid, very much decried. People look askance upon any one who may happen to have shot a few more animals than other people and refer to them as butchers. The filming and photography of wild animals in their natural state is now all to the fore. In my day, however, one could not go in for that sort of thing unless one had a big banking account, as cameras for that kind of work 25 and 30 years ago cost a mint of money. Cameras have, however, now been perfected to such a pitch, that this kind of hobby can be indulged in more easily, whilst they are not quite so expensive.

THE PRESERVATION OF BIG GAME.

In the hey-day and first flush of my shikar days sportsmen did not think so much of game preservation as they do now.

There were no game preserves or game licences when I came to Burma in 1886, and many sportsmen did not worry so much regarding the numbers of animals shot by them provided the animals could be considered warrantable trophies, and nearly every sportsman tried to beat his neighbour so far as the size of the head or the length and weight of a pair of tusks were concerned, whilst he had also to consider the question of recouping himself for the

bitter?

expenses incurred and the cost of his weapons and ammunition etc. Now-a-days all that sort of thing is gone. A man who slaughters game for the sheer love of shooting and bagging animals is no longer tolerated. There is no doubt of course that we all to some extent inherit in our breasts the savage instincts of our forefathers. A great deal has been written and is still being written and done on the subject of big game preservation everywhere; but so far as I can see little or nothing can be done to stay the final destruction of all big game not only in this Province but in India and in Africa. The spread of civilization, the motor car, the modern high powered rifle, new roads, the woodman's axe, the Arms Act and Rules, electric contrivances for night shooting, poaching by people of the country and the fact that the Forest Department is understaffed, are all factors which are now slowly but surely tending to bring about the steady diminution of game. It is of course admitted that the necessities of civilization must come first in the scheme of things and the preservation of fauna must take second place.

The European hunter makes little impression on wild life. He is usually a keen sportsman or else he would not hunt in the feverish localities he visits in search of big game. The native hunter is in quite a different category. The difficulties of bush and climate do not thwart him. But why go on; one could write pages on this subject. The fact that such animals as the Malayan Tapir (*Tapirus indicus*) which, so far as this Province is concerned, is only found in Tavoy and Mergui, and the Rhinoceros, two species, (*Rhinoceros sondaicus* and *Rhinoceros sumatrensis*) are now entirely preserved, may retard for some years the process of extermination so far as they are concerned. I think I shall not be wrong in stating that the only Tapir and Rhinoceros of Burma that we shall see finally will be animals that have been preserved in Zoos or in Museums. This in my opinion is the order in which animals in Burma are likely to disappear as the years roll on; (1) Tapir (*Tapirus indicus*), (2) Rhinoceros (*Rhinoceros sondaicus* and *Rhinoceros sumatrensis*), (3) Thamin (*Cervus eldi*), (4) Hog Deer (*Cervus porcinus*), (5) Tsine, i.e. the Banting (*Bibos sondaicus*), (6) Bison or Gaur (*Bibos gaurus*), and (7) Elephant (*Elephas maximus*). The *Felidae*, i.e., tigers and leopards, which one might include as big game, will also disappear when large areas of land become thickly populated, causing a subsequent decrease and thinning out of forests and undergrowth owing to the great demand for fuel, and as cultivation spread with consequent diminution of all the remaining deer tribe such as Sambar (*Cervus unicolor*), Hog Deer (*Cervus porcinus*), Barking Deer (*Cervulus muntiacus*) and Mouse Deer (*Tragulid javanicus*). Serow or the Burmese Goat-Antelope (*Nemorhaedus sumatrensis*) and Goral (*Cemas goral*), which are generally found in precipitous rocky localities, will probably be the last to disappear, as they are not easily got at except with low-trajectory, small-bore rifles, which the majority of the people of this country fortunately do not possess. I would be inclined to protect Serow altogether, as in some places they can be easily beaten out of cover and shot with

ordinary 12-bore shot guns with cartridges loaded with buck shot. All the bird life of the country is being rapidly thinned out. Some birds are shot and some snared by the people for food, whether they be egrets, Imperial pigeons, hornbills, Sarus cranes, paddy birds or beef-steak birds.

Crows, parrots, vultures, owls, sparrows, hawks, and perhaps doves and green pigeon will probably outlast the rest, with snipe, teal, duck, woodcock and geese coming next. Peafowl, pheasants, jungle fowl, partridges and quail will last till no cover for them exists. When I first came to Burma in 1886 I have seen the horizon in some districts white with egrets, herons, ibises and other waders and water birds. There are very few places indeed now where this can be seen. Snipe and all water birds are being snared wholesale all over Burma. I have not mentioned pigs. No one bothers much about wild pig. They multiply rapidly and are good eating. Besides, they do much harm to the crops of the people; as do parrots and monkeys. It really does not matter what becomes of them.

With regard to Big Game, in the year 1902 I saw on the Pidaung Plain, Myitkyina, one morning all within view at the same time within 300 yards of where I was seated on an elephant, a herd of about 100 Hog Deer, 40 Bison and the same number of Tsine. It was a glorious sight. The Pidaung Plain is now a sanctuary and is being carefully guarded by the Forest Department but no one I fancy will ever see the same sight again regardless of preservation as the Kachins as well as the Gurkhas do a lot of poaching still at odd times, and when Burma gets its new constitution will things get better or worse? We are all bound down now-a-days, and rightly so, by strict Game laws, and are compelled to shoot only one or two of each species of game.

THE ELEPHANT.

Much has already been written on the elephant by experienced sportsmen, who have shot in Africa, in India and Burma, as to how and where to shoot elephants and the kind of rifle to use, but in case some of my readers have not studied the books of such famous elephant hunters as F. C. Selous, Newman, Sutherland, Stigand, Bell, Burton, Sanderson, Chapman, Kirby, Rainsford, Court-Treatt and a host of others, I shall discuss the matter here again as clearly and as briefly as possible. I am entirely in agreement with Major C. Court-Treatt, author of *Out of the Beaten Track*, when he says, 'assuming that the purpose of all sport is the attainment of adventure and the exercise of skill, I dare to maintain that elephant hunting can legitimately be regarded as the greatest of all sports; and, since only the elephant hunter is qualified to dispute it, my assertion is not likely to meet with any great volume of dissent. Adventure there is in plenty and hard work too; and the hunter needs to be highly skilled in the habits and anatomy of the animal before he can be enrolled into the spiritual membership of elephant hunters'.

I fancy I have encountered in my wanderings in the jungles of Burma during the last 45 years more big game than has fallen to

the lot of most sportsmen. I trust also I may be pardoned for remarking that my knowledge of the elephant, its habits, and its haunts, and how to track it, where to fire at it, and the kind of weapon to use, is perhaps as good as that of any other European sportsman in the East. The best time of the year for tracking elephants is during the rains, when the ground is soft and their tracks are more easily followed, especially when they are feeding in bamboo jungle. As a rule the animals possessing the best tusks are solitary, but a monster with very fine tusks is sometimes found leading a herd or on the outskirts of a herd. I found it much easier to follow up the tracks of a solitary tusker elephant than to stalk into a herd with the object of picking out an animal with the best tusks. As often as not, a slant of one's wind or scent is obtained by some member of the herd, usually a female, or a young tusker, when a warning is given, and the whole herd either slips quickly and quietly away, or stampedes without giving the hunter a chance for a shot. Woe betide the sportsman if the stampede is in his direction, as sometimes happens, if he cannot get behind a decent sized tree or bamboo clump in time. The danger of a stampede is that he is liable to be confronted by some infuriated cow elephant with a calf or some bull possessing small tusks or some cantankerous 'muckna' or tuskless male. On these occasions he may have to shoot in self-defence, when the usual report will have to be made to the Forest Department, which will probably fine him, and if a tusker, annex the tusks. The easiest way out of the difficulty where a herd of elephants in a panic stampedes towards you, is to stand perfectly still behind a tree, or bamboo clump, as their sight is far from good, and take the risk of their passing you without having seen you; or, if they do happen to see you, there is always the chance that they will hurry on all the more quickly to avoid you. On the other hand, I have known of herds of elephants to charge deliberately in a body towards the sportsman on scenting him, without having been disturbed in any other way, but they were generally herds that had been harassed a great deal by being frequently fired on by persons armed with inferior weapons. The danger is then very great, and unless the sportsman's nerves are in good order and he has also had long experience with elephants, he should contrive to get out of their way as quickly as possible either by climbing a tree or by making a clean bolt for it. There is no mistaking the sounds emitted by a herd of elephants that means business as it comes charging, shrieking and trumpeting along. A succession of angry screams and trumpetings will be emitted first, which will convey the warning and the sounds of thumping feet and the breaking of branches will then follow. The sportsman's Burman hunters, if they have not already made themselves scarce by ascending the nearest trees, as they are sometimes inclined to do, should be able to warn him of the danger and advise him what to do and which direction to take. Elephant shooting is easy enough if you have good eye-sight, are fleet of foot, and know how to shoot straight, and above all are using a good rifle. The latter is about as important as all the rest put together. In the good old days

I made a point of never following the tracks of a solitary tusker elephant unless these measured 18 or 20 inches from toe to heel. I refer only to impressions of the forefeet. There is no mistaking the elongated tracks of an old tusker elephant. The cracks and wrinkles on all four soles of the feet and the large toe nail indentations on the soft ground are also usually clearly defined. The length and thickness of an elephant's tusks may be indicated by the cavities he digs in the soft earth of stream banks as he moves along or by the marks left by his tusks on the ground where he has passed the night. A solitary tusker usually sleeps on his side flat on the ground like a horse with all four legs stretched out straight. I remember once coming across a solitary bull elephant asleep on the ground which was making use of an ant heap as a pillow. The dung of an old elephant is also generally of a coarse texture and fibrous looking. Tuskless male elephants, called by the Burmans 'haings' or 'hines' and by Indians 'mucknas' are generally big fellows with powerful trunks. A big 'muckna' is usually feared by the members of any herd to which he may belong and he is a very dangerous animal when he becomes a rogue and turns solitary. As a rule there is no mistaking the tracks of a 'muckna' or 'haing' for they are generally more circular and less elongated than the forefoot impressions of a tusker. No sportsman ever shoots or is permitted to shoot a female elephant in India or Burma unless compelled to do so in self-defence, simply because, unlike the African species, they carry no tusks.

E. G. Boulenger rightly says that an animal's sense of smell is usually, although by no means invariably, gauged by the development of its nose. Elephants have a very keen sense of smell. The power of an elephant's trunk is enormous and with it the animal can lift a ton with ease. Though immensely strong, such a trunk has its own peculiar dangers and its care is a matter of constant vigilance and anxiety to its owner. If threatened by a tiger it is curled up over the forehead. Still more dreaded is the poisonous snake. The common mouse, whose holing instinct may lead him to take refuge in one or other of the large nostrils, is likewise a danger. When charging, an elephant, on being wounded, comes tearing along at a great pace, faster indeed than most people would give it credit for being able to travel, and when the animal has really got into his stride he can overtake the fastest runner in the world after the first hundred yards or so, but he trusts to his keen sense of smell more than anything else to overtake his enemy—man. To escape from a charging elephant, it is not safe for a hunter to run in a straight line for any distance, for he has a better chance of eluding the animal by going off at right angles, especially if he is running up wind, that is to say, if his scent is being carried towards the approaching elephant. The screams of an infuriated, wounded, charging elephant are terrifying, and awe-inspiring in the extreme, and woe betide the hunter, if he trips and falls or is overtaken, for he would be pounded into pulp and every bone in his body would be broken. An elephant usually seizes a human being with his trunk and dashes him against the ground or against his own knees, and then flings

him away into the air or strikes him a terrible blow with his trunk. Sometimes he kicks his victim with his forefeet, or, after seizing him with his trunk, throws him to the ground and kneels upon him, if he does not drive his tusks through his body. In nearly every case a fatal injury is inflicted.

An elephant cannot take all four feet off the ground in a jump, like a horse, to negotiate say an eleven or twelve foot ditch. A man escaping from a charging elephant can therefore jump over an eleven or twelve foot wide ditch or nullah, and be quite safe on the other side, for it would not be possible for any elephant to negotiate it in its stride. In other words, an elephant cannot cross a deep ditch that is beyond the compass of its stride. It would, of course, be possible for the elephant following a man under these conditions to go down into the nullah and up the other bank, but that would give the hunter time to escape. The hunter should also see, in the event of his getting behind the trunk of a tree or bamboo clump to escape from a charging elephant, that it is large and thick enough to withstand the impact of an elephant's charge, for an elephant is able to knock down any ordinary sized tree and will go through a fair sized clump of bamboos like paper.

The secret of success in elephant shooting is to get as close as possible to the animal and make sure of the first shot, if possible, into the brain. When a clear view of the brain is not possible, a shot behind the shoulder to reach heart or lungs should be taken. If both lungs are perforated by a heavy bullet propelled by a big charge of cordite, say 100 grains from a .577 cordite rifle, the animal usually will not survive, but he will have to be followed for several miles in the case of the lung shot before he is rendered helpless by internal haemorrhage. Sanderson, the author of the work *Thirteen Years Amongst the Wild Beasts of India*, says—'the head shot is the poetry and the body shot the prose of elephant shooting'. An elephant's brain can be found by (1) shooting a little above the bump from in front; (2) and (3) by shots fired in the temple hollows on either side of the head from left or right half front; (4) by a direct shot at right angles from the side into either ear hole; or (5) by a shot from a little behind the ear when the ear is thrown forward. Then there is (6) the heart shot. The heart, shaped like a small rugby football, lies low down between the shoulders. This shot should be taken from a little behind, when the animal moves a foreleg forward, at the height of the elbow-joint of the leg. Some sportsmen, in order to make absolutely certain of bagging an elephant with really fine tusks, rely entirely on the lung and heart shots, for, in a head shot, unless the brain is reached by the bullet, the animal will not die, as there are no big arteries in an elephant's head and he will usually go clean away if he does not turn and charge. An elephant, when followed and approached after a shot or two through both lungs, if he is disabled, will be found generally standing stock-still with blood pouring out of his trunk, which will generally be up in the air and then he can be easily finished off. It is only when an elephant dies, or is at the point of death, that he lies

down, and, as often as not, when shot through the brain, he collapses on to his knees and remains in that position without toppling over. If an elephant should enter a stream and drink water after he has received, say a couple of shots through the lungs, he will become more quickly disabled. I have known solitary tuskers with only one tusk, when shot through the brain, to topple over on to the ground on the tusk side. Burman hunters emphatically state that elephants with two tusks, when shot through the brain, will fall to the ground on the side which carries the heavier tusk.

Elephants have been known to plug up with mud the bullet wounds received in their bodies in order to keep them from becoming fly-blown. It is also well known that elephants indulge in mud baths and plaster themselves all over with mud in order to protect their sensitive skins against the attacks of gad flies and even mosquitoes towards the beginning of the rainy season, i.e., April, May, and June. At this season all large dangerous game become more irritable from the stings of insect pests. The brain of an Asiatic elephant is more easily reached by the bump shot from in front, than is the case with the African species. It is not generally known that the back of the Indian elephant (or Burmese elephant) is convex, whereas in the African species it is concave. The Indian or Asiatic elephant again possesses only one lip or finger-like process at the end of its trunk, whereas the African species has two. The trunk of the Indian or Asiatic elephant is also less strongly ridged than that of the African. The Indian elephant's face, too, is plumper and altogether milder in expression and lacks the lean aggressive appearance of that of his African brother. The African elephant is taller by a foot, weighs more and carries heavier ivory. It is also interesting to note that the Asiatic elephant has four or five toe nails on each hind foot in contrast to the three toe nails possessed by his African twin.

RIFLES FOR ELEPHANT SHOOTING.

When I first started big game shooting in Burma I used a double barrelled 8 bore hammerless ejector paradox gun burning a maximum charge of 10 drachms of black powder. I found a weapon of this sort very effective indeed. Now-a-days no one ever thinks of using heavy weapons of this description because of the weight and the smoke from the black powder, which was often blown back into one's face, thus temporarily shutting off a good view of the animal fired at. Nevertheless, I did very good execution with it and was loath to exchange it for the more up-to-date and modern cordite rifles. A good 'big un' is of course much better than a good 'little un', and I must say I very seldom found the 8 bore fail me, as the heavy conical bullet usually delivered such a shock to the nervous system of an animal such as elephant, bison, or tsine, when tearing its way through the flesh, muscles, tendons and bones, as to cause temporary paralysis. I have on several occasions fired, raking shots, with the 8 bore from behind through the small of the ribs at a solitary bull bison

standing 20 hands at the shoulder, which has caused the animal to lurch forward a few yards and then collapse. Even if a fatal shot had not been fired, say through the heart, brain or neck, the animal which had received the raking shot through the small of the ribs was usually rendered *hors de combat* for the time being. I was then invariably able to walk up and administer the *coup de grace* from a distance of only a few paces. There were occasions also when even the 8 bore failed me; but show me the sportsman who has not had similar disappointments with any and every kind of weapon. Sutherland, the famous elephant hunter of Africa, who accounted for over 500 elephants in his day, sometimes failed to stop charging elephants using a double barrelled .577 cordite rifle burning 100 grains of cordite—a weapon I have used occasionally myself in recent years, but with not the same success as I obtained with the good old 8 bore. In Burma, where the jungles are dense, a knock down blow has often to be delivered at a distance of only a few yards. When one is young and in good training neither the weight of the rifle nor the recoil is felt. One certainly feels the recoil of a big rifle more when one fires for practice at a mark on a tree, but when one pulls trigger on an animal you hardly notice it at all in the excitement of the moment.

It is amusing to listen to some of the youngsters who, having been out only a year or two in the country, have gone out after large and dangerous game, such as bison and elephant, armed with small-bore rifles such as a .303, or .380 magazine Ross rifle, or a .256 bore Manlicher. Some of them have even been successful at their first attempts, but they had not to follow up a wounded animal subsequently. This was an experience they were fortunate enough to escape. Ignorance is bliss, etc. Some of the best-known big game shots of Africa have, it is true, used small-bore rifles, such as .303, .318 or even .256 bore, on elephant successfully, but the majority of these men have been seasoned veterans at the game and, besides being excellent shots, knew where to plant their bullets with deadly accuracy, and, last but not least, they invariably had a gun bearer carrying a second weapon which was usually a heavy high velocity rifle, such as a double .450 or .500 bore cordite rifle as a stopper in case of a charge. If I were asked by some would-be sportsman what sort of rifle I would recommend him to get for shooting big game in Burma my reply would be 'What kind of animal do you want to shoot, and what can you afford to pay?' Another factor to consider is the height, strength and activity of the would-be sportsman. If he is a strong man and can carry a heavy rifle and intends shooting dangerous game such as elephant, bison, tsine, i.e., wild cattle, and tiger, and has moreover a good bank surplus, I would then immediately suggest his getting a double-barrelled hammerless cordite ejector rifle of any of the following calibres, viz., .500, .470 or .450. These burn 70 or 80 grains of cordite. The best double bore rifles are made in England by any of the following firms, who are makers of repute, viz., Westley Richards, Holland and Holland, Gibbs of Bristol, Jefferey Greener, Cogswell and Harrison. As a second weapon, he could purchase a magazine magnum

.375 bore cordite rifle or a magazine .333 or .318, any one of which is powerful enough for all thin-skinned non-dangerous game and which would be useful also for finishing off a wounded beast. For beats when tiger, leopard, bear and Sambar may be driven out by village beaters, a double 12 bore magnum 'Explora' cordite rifle by Westley Richards cannot be beaten. High-velocity small bore rifles should not be used in a beat. If I am asked to join a party of sportsmen in a beat and find that one of them intends using a small bore rifle, I contrive to place between him and myself the biggest tree trunk I can find in the locality, before the beat starts. A bullet from a small bore high velocity rifle has a nasty way of ricocheting all over the place even if it does succeed in striking the animal, as it invariably passes clean through it. An ordinary double 12 bore shot gun, chambered for 3 inch cartridges, loaded with solid spherical or lethal ball, L.G. or S.S.G. slugs would be another useful weapon for despatching an animal at close quarters. A poor man will find there are many useful magazine rifles on the market which can be picked up even secondhand, for two or three hundred rupees or less, such as a .404, .423, .318 and .375. It is much easier, however, to align the sights of a double barrelled rifle than those of a single barrel magazine rifle.

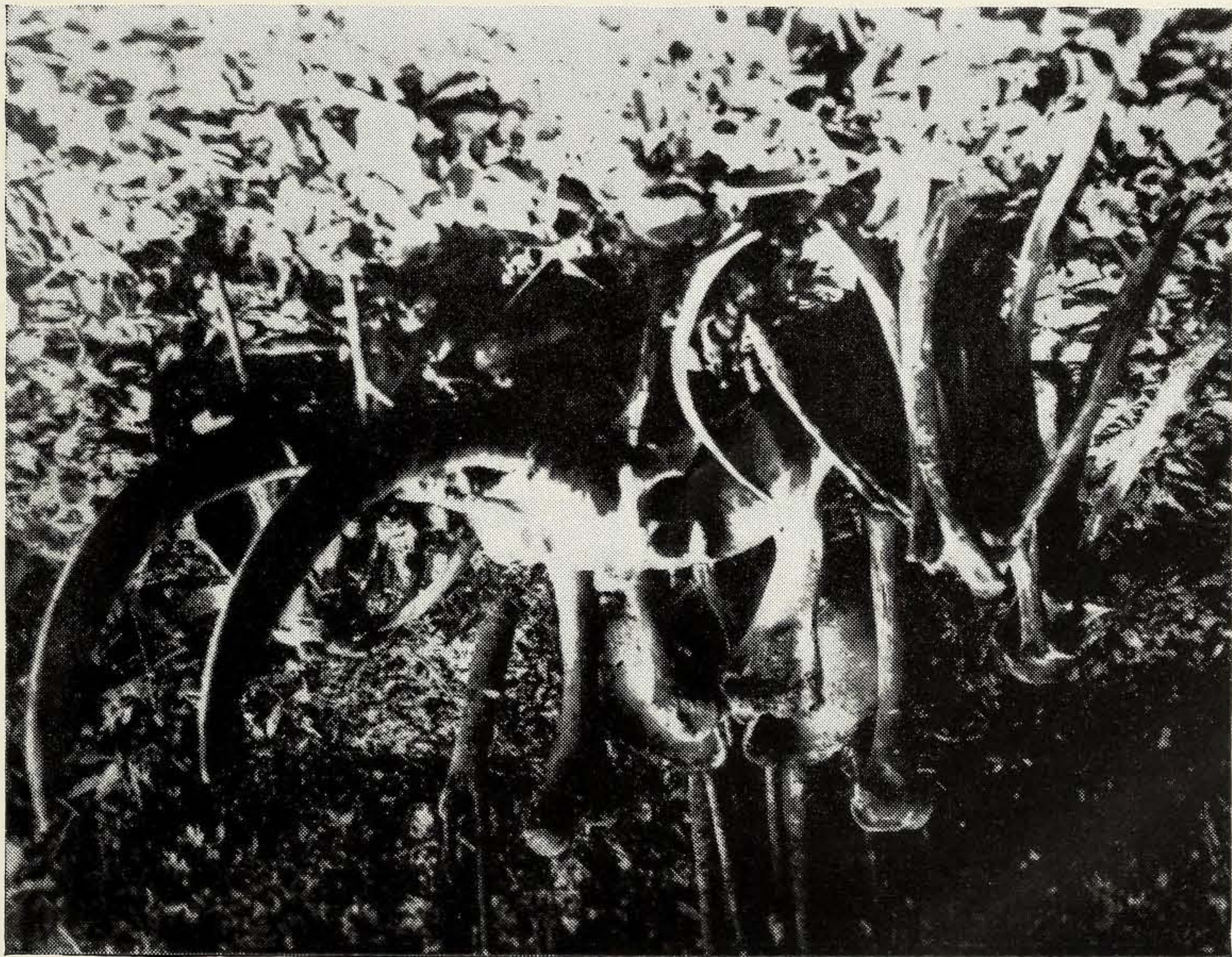
DEAD TUSKER ELEPHANTS FOUND IN THE JUNGLE.

A wealthy American who had done a great deal of shooting in Africa and in other parts of the world asked me whether I had ever found animals in the jungle at the point of death, or which had died from natural causes, or any animal cemeteries. My reply was that in the whole of my experience which extended over a matter of 45 years I had never done so, and I suppose I would almost be quite safe in saying that it would be possible to count on the fingers of one's hand the European sportsmen who have done so, although they may have roamed through all the forests of the world for years. I have come across the remains of serow, a species of goat-antelope, barking deer and sambar, that have been killed by leopards or tigers, but never any animal that was at the point of death or had just died from natural causes. What becomes of all the animals that die from old age or disease is a conundrum that has been asked many times.

In the *Rangoon Gazette*, some years ago, I wrote an exhaustive article on the subject of 'Where do elephants die, and animal cemeteries'. It would take too long for me to go into this subject again here as fully as I did then. It must not be imagined that because an elephant is such a huge beast the carcase or skeleton will remain visible above ground for years, like the vulture- or crow-picked skeleton of a camel, mule or horse, that may have perished in an arid desert where the rainfall is practically nil and where the absence of jungle and undergrowth, not to speak of animal and insect life, preclude its disappearing for a very long period. It is a very different matter in tropical countries like India and Burma, where all organic matter tends to decay rapidly and where the jungle is usually alive with insect and animal life. The

carcase of any dead animal very soon disappears owing to torrential rains, swollen streams, white-ants and a host of other insects, dry rot, damp rot, and the heat of jungle fires, the ceaseless gnawing of the remains by a multitude of large and small animals. It should not be forgotten also that the skull and bones of an elephant are full of oil and will burn rapidly in a jungle fire. Is it to be wondered at then that the remains of even such large animals as elephant, bison, rhinoceros and tsine are seldom encountered?

Some years ago, under rather peculiar circumstances, I found the remains of two wild tusker elephants both of which had met their deaths in fights with other tuskers. In the first case, I was fishing for mahseer in the Lemro river of Arakan in the unadministered territory of the Arakan Hills Tracts, Burma. Noticing a stale odour emanating from a neighbouring thicket some 300 yards or so away, I asked one of the two Chin boatmen who were with me to go and see what had died, as he might perhaps find that a sambar or a bison had been killed by a tiger, in which case there would surely be the head and horns. The boatman, however, declined to go, saying he was afraid of meeting a leopard or a tiger, so putting my rod down and picking up a magazine .355 Manlicher Schoenaur rifle that I always carried on these occasions in case of meeting barking deer and pig, I walked off towards the thicket, nosing up the smell as I moved along, the wind being right. After travelling about 600 yards or so I found the remains of a tusker elephant in an open glade with thick jungle all round. A tusk was still sticking in its socket in the skull whilst the other tusk was lying on the ground beside it. The ribs and bones of the animal were lying scattered about in the vicinity in all directions, and the tree trunks close by were marked with the claw marks of tigers and leopards that had cleaned their claws there after regaling themselves night after night on the flesh. The skull and all the bones were bare of flesh of course, for the animal had been dead at least six or eight months. The photograph of the remains, shown in Plate II, was taken after I had put together all the remains, done a little jungle clearing to let in the light, and inserted the second tusk into the empty socket of the skull. It seemed marvellous to me that the tusks of the dead animal had not been taken by some of the wild Chin tribesmen, but I learned that they were afraid to go into clearing where the remains of the dead animal lay as a really bad type of 'Nat' or spirit of the woods resided there. I tried to picture to myself how the animal had come by its end and was told finally on my return to camp that evening that the Chins from a neighbouring village had heard two elephants trumpeting and roaring, in the jungle about a mile or so above the spot where I had found the remains and that the animal to whom the remains belonged had probably been vanquished in the fight by being gored to death by the other tusker and then mortally wounded had come into the thicket to die, as it was a quiet locality and near water. In the second case, I was out after bison (gaur) and rhinoceros along the banks of a certain stream in Arakan when



Elephant remains near the Lemro River, Arakan.



A carcass of an elephant killed in a fight. The broken tusk of his antagonist which was embedded in his skull is shown in the photo.

my attention was attracted by a strong odour of decaying meat, more pronounced than in the case of the last dead animal found by me. It took me about ten minutes to reach the spot from whence the stench emanated and, when I turned a bend in the stream, I was thunderstruck at seeing a magnificent dead tusker elephant in a kneeling position in the gravel bed of the river, with its head up clear of the ground, and a magnificent pair of tusks protruding straight out of its mouth. A number of jungle fowl, cocks principally, some eight or ten birds in all, were running about backwards and forwards over the body eating the maggots that crawled about on it. The smell was pretty overpowering, but being accustomed to that sort of thing from a long sojourn in the jungle, my stomach did not fail me. I went up and examined the animal thoroughly and noticed that it must have been killed by another tusker in a fight, as there were several deep stab wounds on either side of its neck and body, which had evidently been inflicted by the tusks of another elephant. Unfortunately my camera was in camp some miles off and it was not till my men had extracted the tusks of the dead animal, which weighed 84 lbs. the pair, that it turned up and I was able to get two or three photographs of the dead elephant. It was while I was superintending the extraction of the tusks that I found, purely by accident, the remains of another broken off tusk, 27 inches in length, weighing 18 lbs., deeply embedded in the skull of the carcase and sticking out from under the palate. The broken off tusk had passed through the skull into the brain. Judging from the faint black circle round the tusk near the spot where it had snapped off short, it was apparent that it had broken off at the lips of the animal which won the fight. It was a unique discovery for I do not suppose such a find has ever been recorded before. All the bushes and gravel in the vicinity, I then noticed, had been trampled upon, torn and scattered about in all directions. A portion of the hind quarters of the dead elephant had been eaten by a bear whose feet impressions showed up clearly on the soft wet sand by the side of the stream. Quite recently, I heard the story of the fight which had taken place between the two animals, and recorded it in detail. It seems that a Chin from a neighbouring village some four or five miles away had come down with his wife to the stream to fish, and had caught sight of the elephant which was subsequently killed, drinking at the stream at about 5 p.m. He and his wife on seeing this immediately ascended a tree for safety, being in a mortal funk, as the elephants in that locality were given to chasing and killing people. Some five or ten minutes after this another tusker elephant with shorter and straighter tusks came out of the jungle some sixty yards or so to the rear of the animal which was drinking. The latter immediately spun round and with lowered head faced his opponent, who, uttering a shrill trumpet, rushed forward in full charge, the two meeting head on with a terrific crash. Both animals then engaged each other with their trunks holding up their heads, and manœuvring for position. The younger animal then disengaged himself and backed for a distance of about twenty yards. The

elephant that was vanquished subsequently then also started to wheel round as if to clear out, for he was at least fifty years older than his opponent, when the other elephant put on a spurt and, rushing forward, delivered a succession of deadly stabs into both sides of the neck of the older animal. Just at this time, some five or six female elephants accompanied by one or two calves appeared on the scene from the jungle, but kept at a respectable distance, squeaking occasionally as if in fear. The older elephant, whose tusks were blunter and more curved and in consequence not at all suitable for stabbing purposes was placed at a considerable disadvantage. The younger tusker, whose tusks must have weighed about 50 or 60 lbs. the pair, but were straighter and more pointed, as can be seen from the photograph of the gouge and tusks of the dead animal with the broken-off tusk called 'Manswe' by the Burmans, lying in front, simply made circles round his less active and older opponent.

It then appears that the younger animal in a final charge from in front met its opponent head-on and embedded, up to the lip, its right tusk in the skull of the older animal. When they parted company it was seen that the younger animal was minus his right tusk. The old tusker then standing stock-still for a few seconds suddenly threw up its trunk in the air and gradually subsided on to its knees, in the same position as a tame elephant, when about to take up his mahout on its back. What would I not have given to have been there with a cine camera to witness this battle of the giants? I have been told by the Burmans that so long as the broken off tusk, the 'Manswe', remains in my possession no harm can ever befall me, and that I shall always have the best of luck. I have had numerous requests from Burmans and Shans to sell them the 'Manswe' outright, if I will not give them a chip of it, but, as I have always pointed out to those making the requests, that, according to their own beliefs, it would be wrong of me to do so as it would bring me bad luck. So there it lies, still intact, in the hall of my house beside the tusks of the victim whose spirit doubtless roams the Elysian fields or the forests of Valhalla.

The literal translation of 'Manswe' in Burmese is, I suppose, 'Man' which means temper and 'swe' which means the tusk, or in other words 'The tusk that in a temper did the damage'.

The photograph of the dead tusker which looks as if it is about to topple over a 'kud' or precipice is true in actual fact. I had wounded this animal behind the shoulder and followed him up for five miles. He went into a dense cane brake in the Thayetmyo Yoma mountains between Thayetmyo and Arakkan and waited there in grim silence for me, to come up with him, without even advertising his whereabouts by a flap of his ear.

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 without being hung up or even seeing clearly fifteen yards ahead. To cut a long story short, I almost walked into him as I rounded a bamboo clump, and without a

note of warning, except for the emission of a suppressed spurt of air which he shot out of his trunk, he raced straight in my direction. I made half a dozen flying leaps to avoid him but came an awful sprawler, tripping over a cane and spread-eagling right in his path. Fortunately for me the jungle was very dense overhead or else he would have spotted me lying helpless beneath him. As he came tearing along through the undergrowth one of his ponderous forefeet found my right thigh and pinched half of it into the mud without breaking a bone 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 a rainbow. I followed him up within an hour and came up with him again after he had covered about three miles of very hilly country. This time, he was head on to me in fairly open jungle. On catching sight of me he uttered a shrill trumpet and swung round as if to make off, but not before I got him with a lucky shoulder shot through the heart. He went about thirty yards before collapsing, and all but went over a steep 'kud', remaining balanced on the top. I was only able to photograph him from above. His tusks weighed 95 lbs. the pair and I noticed that one of his forefeet, the right one, was much smaller than the left.

The photograph of the large wild tusker which was taken in the Thayetmyo Yoma hills is perhaps one of the finest photographs, ever taken of a wild tusker. He was coming out of high elephant grass and, as there was a deep ten-foot wide nullah, in between, a few yards only separated us. The lens used was a 17½ inch Ross' Telecentric, a perfect picture being obtained. It may be asked why I did not shoot this fine specimen. My reply is that I had shot quite a number already and would much rather have the photograph I obtained. I had a heavy rifle with me at the time which was being carried by a very faithful staunch old hunter of mine Maung Tha Yauk by name, who never once let me down on all the numerous occasions on which he accompanied me into the wilds, and who has not long since gone to *Nirvana*. May we meet again in the Elysian fields of that mysterious land about which we talk such a lot but know nothing, to relate there all over again the details of the many hairbreadth escapes and encounters we shared together. Will I ever see his equal again? To Tha Yauk, one of the finest hunters, trackers and characters it has ever been my good fortune to know, I owe much of whatever success I have attained in the pursuit of Big Game.