

of this nature unless financial and other inducement is offered. The villagers have no desire to kill the Rhino. The question is whether they can be sufficiently interested in their protection to move farther away and save them from disturbance.

There are areas of suitable forest for shifting cultivation in another reserved forest close to the Kahilu sanctuary, and as none of the villages inside the sanctuary possess permanent fields removal to these nearby areas should not cause great inconvenience. They would, however, at least, need financial help in moving their belongings and erecting new houses. Subject to these considerations the removal of the villages and closing of the area to all persons seems to be a practical proposition.

In the present small reserved portion of the sanctuary all villagers' rights will have to be cancelled but as the existing rights belong chiefly to those villages which it is proposed should be removed, cancellation will not be a matter of great difficulty, if the primary difficulty of removal can be overcome.

The final outcome of the above proposals would be the reservation of an area of about 40 square miles well suited as regards shade, fodder, and water, in which the Rhino would be wholly free from disturbance. The task of the keepers, who work at present in very discouraging circumstances, would, moreover, be more simple, more interesting and, it might be hoped, more fruitful.

SUMMARY OF GENERAL AND LOCAL LEGISLATION FOR THE REGULATION OF HUNTING IN FRENCH INDO-CHINA.

The fauna situation in French Indo-China is governed by an Act of the 7th April, 1927, amended by an Act of 27th June, 1934, and supplemented by local decrees made by virtue of the principal and amending Acts.

The most important provisions of the Acts are as follows :—

Regulated and Unregulated Territories.—Indo-China is divided into two zones distinguished as Hunting Territories and the Free Zone. Hunting Territories are those in which hunting normally takes place and the administrative organization makes possible the effective enforcement of the provisions of the Acts. The Free Zones comprise all territories other than the Hunting Territories, that is to say, in effect, those in which the Act cannot for the time being be applied.

The division of the country into the two categories of zones is to be made by order of the Governor-General in Council following proposals made by the heads of the local administration on the advice of the Inspector-General of Agriculture, Stock-breeding, and Forestry.

By an order of the 14th December, 1931, the Province of Tonkin, with certain minor exceptions; the greater part of the Province of Cochin-China; and the whole of the Province of Annam were declared Hunting Territories and thus brought within the operation of the Acts.

The Exercise of Hunting Rights.—No animal may be hunted except in the relevant open season and then only by persons entitled to carry fire-arms and furnished with a hunting permit, a hunting licence or a licence of destruction. An exception is made in favour of owners of private property as regards hunting (except during close seasons) on their own property, and, of course hunting permits and licences do not confer a right of hunting on private or on village, communal property.

The significance of the terms hunting permit (*permis de chasse*), hunting licence (*patente de chasse*) and licence of destruction (*licence de destruction*) appears in the following provisions :—

There are three forms of hunting permit, which we will describe as first-class (*le grand permis de chasse*), second-class (*le permis ordinaire*) and third-class (*le petit permis*). First-class permits are issued by the Heads of the local administration. The holder of a first-class permit is entitled

to hunt all animals not specifically protected, except in sanctuaries and temporary reserves. They may also kill a limited number of specimens of animals partly, but not absolutely protected, but for this privilege they have to pay a supplementary fee in respect of each animal killed according to a tariff which varies for different species. The number of protected animals that may be killed and the fees to be paid in respect of them is fixed in each province by decree of the local Government subject to the approval of the Governor-General.

The Tariff of a First-Class Permit.—By Order made in May, 1938, the price of a first-class permit was fixed at 120 piastres. It is available for one year only. It confers the right to kill any unprotected animals. As regards Elephant, Rhinoceros, Gaur, Wild Buffalo, and Banteng the numbers that may be killed and the additional fee per head are as follows :—

<i>Authorized Number.</i>	<i>Additional Fee.</i>
2 Elephants . . .	piastres 40 each
2 Rhinoceros . . .	40 "
2 Gaur . . .	40 "
4 Wild Buffalo . . .	20 "
4 Banteng . . .	20 "

(Subject to a 50 per cent reduction in favour of residents.)

The holder of a first-class permit may receive a supplementary permit allowing him to kill half as many again. The supplementary permit, the price of which is 40 piastres, is available for three months only. In addition the holder must pay double the additional fee for each animal killed by virtue of the supplementary permit—i.e. for an Elephant, Rhinoceros, or Gaur 80 piastres and for a Buffalo or Banteng 40 piastres.

The holder of a first-class permit must enter in a note-book which is attached to his permit the protected animals which he has killed or captured with the place and date of killing or capture.

Second-Class Permits are issued by the mayors of municipal centres. They confer on the holders the right to hunt, except in sanctuaries and reserves, animals of the Deer, Pig, and Bear families and "Small game" as subsequently defined. There

is no limit to the number of animals they may kill or capture.

The Third-Class Permit, also issued by mayors, entitles the holder to hunt only small game, that is to say, Hares, Rabbits, Chevrotains, Peacocks, Pheasants, Jungle Fowl, Partridge, Pigeon, Snipe, and all migratory birds and water fowl, except such species as are wholly or partly protected.

The Hunting Licence is issued to persons hunting for commercial purposes. It is issued by the head of the local administration. It may not on any account be granted to a civil servant or member of the military forces or to travellers through the country. It gives the right to kill, outside reserves and sanctuaries, animals of all kinds except those which are specially protected. A holder of one of these licences may be authorized to have in possession a reserve of arms according to the extent of his enterprise, paying for each weapon a supplementary tax annually. He may also employ native hunters to hunt* on his behalf provided that each of them holds a hunting permit authorizing him to hunt the particular game killed.

Special conditions attached to a hunting licence are fixed in each province by the head of the local administration by decree.

Licences of Destruction are issued by local heads of administration or their deputies to Frenchmen, French subjects, or foreign travellers. They give the right to shoot the larger carnivores, Tigers, Panthers, and Leopards, but nothing else. These licences are issued free of charge.

Miscellaneous Provisions Affecting Permits and Licences.—All permits and licences are available for one year only. First- and second-class permits and licences of destruction are available throughout Indo-China. Third-class permits and hunting licences are available only in the province of issue. All permits and licences are strictly personal and non-transferable. They must be accompanied by a statement of the civil status of the holder and marks of identification, including a photograph, unless, by reason of impracticability, especially as regards the photograph, the head of the

administration makes an exception. They must be shown whenever required to the agents of the local game wardens. If they are lost duplicates may be furnished.

The charge for first- and second-class permits and licences of destruction are to be uniform throughout Indo-China. The charge for other permits and licences may vary, being fixed by local order of the provincial administration.

Free permission to kill or capture animals for scientific purposes may be accorded by the Governor-General. In such cases the period for which the permit is available and the numbers of any species of protected animals that may be taken is limited by stipulations attached to the permit. Special personal permits may be given also to officials and others whose work involves isolation in remote parts of the country without regular means of communication to shoot animals for food.

Persons who may not receive Permits, etc.—There is a considerable list of classes of persons to whom no permit or licence of any sort may be granted. They are chiefly persons who have been guilty of offences. Perhaps the most interesting of these provisions is that which prescribes that a permit shall not be issued to a person who, having had a permit, has more than twice during the period of its validity invoked the necessity of self-defence as an excuse for killing a protected animal.

Natives may hunt by day with spears, lances, and bows and arrows without permits.

Residents, that is to say French nationals and Asiatics under French protection and domiciled in the country, pay half price only for permits and half of any other fees.

National Parks.—The Governor-General in Council may, on the advice of the Inspector-General of Agriculture, Stock-breeding, and Forests, and after consultation with the local administration, create national parks for the conservation of interesting animals. The regions selected are to be more or less wooded and will often be mountainous. Within the national park hunting and, it appears, access will be forbidden "in order that the fauna may continue to live in peace,

protected from all activities of colonizers, tourists, and hunters with hounds. No concession for the establishment of agricultural or industrial undertaking may be granted in the reserved area and no building or other artificial construction of any sort may be carried out there unless previously authorized by the local administration".

Temporary reserves may be instituted by local decree.

In a National Park and in a temporary reserve it is absolutely forbidden to hunt, capture, or kill any mammal or bird of any species by any means whatsoever. Within them every kind of traffic in game and trophies is absolutely forbidden.

The only exceptions to these rules are such as are necessary for the protection of cultivated grounds within the reserved area and the protection of the cattle of the natives.

Special Protection of Selected Species.—The Governor-General on the recommendation of the Heads of provincial administration and after consultation with the Inspector-General of Agriculture and Stock-breeding may, by order, determine what species of animals are to receive special protection and the degree of protection to be given to each.

Such orders are to specify three categories of protected animals:—

1. *Reserved Game*, the capture or destruction of which, at any time, is absolutely forbidden.
2. *Protected Game*, the capture or killing of which is restricted, especially in respect of close seasons and the sex and number of animals that may be killed.
3. *Free Game*, which enjoys neither of the foregoing methods of protection and can be hunted without restriction during the open season.

The relevant Order was made on the 14th December, 1931. The lists of reserved and protected game will be found on pages 39–40.

A similar procedure is prescribed for the prohibition or strict limitation of certain methods or instruments of hunting.

Hunting Seasons, etc.—The provincial administrations are authorized, by order, to be published at least fifteen days before they take effect, to determine :—

1. The open seasons for hunting ;
2. The periods during which the hunting of animals of stated species is suspended ;
3. Methods and instruments of hunting which are forbidden ; and
4. The occasions and circumstances in which drives (battues) of animals may be permitted.

Destructive Animals.—The provincial administration, by order, prescribes a list of destructive animals such as Tigers, Panthers, Leopards, etc., and other animals injurious to cattle and agriculture, the conditions under which their pursuit and destruction are permitted, and the circumstances in which drives for this purpose may be ordered.

Miscellaneous Provisions.—It is forbidden :—

1. To set a trap for any furred or feathered animal except such as are listed as destructive animals.
2. To hunt by night with lights (except when a drive of destructive animals has been authorized) or to hunt by means of the head-lights of motor cars. The penalty for the latter offence is confiscation of the car as an illegal hunting implement.
3. To barter, sell, or buy any game or spoil of game during the close season for the game in question.
4. To barter, sell, or buy any living game of fur or feather except under a permit for scientific purposes.
5. To barter, sell, or buy at any time any spoil of reserved or protected animals.

Control within Sanctuaries and Game Reserves.—For the protection of the inhabitants and of cattle and farm produce within the boundaries of sanctuaries and game reserves, village communities and individuals settled in these areas may kill or capture wild beasts and destructive animals within the limits of farmed land.

Trophies from large animals such as Elephant, Rhinoceros, Buffalo, etc., captured or killed by virtue of this permission become the property of the administration and must be handed over to it within five days. This applies also to the case of persons who, not having a hunting permit, kill animals in self defence.

Export.—The export of live birds, wild animals, and their spoils is regulated by order of the Governor-General. Within the country the possession, transfer, etc., of wild animals and their spoils is controlled by the local administrations.

INDO-CHINA.

Order of 14th December, 1931, regarding "Reserved Game" and "Protected Game".

1. *Reserved Game* (i.e. absolutely protected).

<i>Tonkin.</i>	<i>Annam.</i>	<i>Cochin-China.</i>
Peafowl. Egret. Elephant.	Female Elephant. Serow. Black-footed Langur. Gibbons.	Rhinoceros. Axis Deer. Eld's Deer or Thamin. Langur of all species. Gibbons of all species. Loris. Flying Monkey. Flying Squirrel. Pangolins. Marabout Storks. Egrets. Black-necked Storks. Black and Giant Ibis. Eastern Sarus Cranes. Rheinart or Argus Pheasants. Blue Pheasants. Peacock Pheasants. Great Ground Cuckoo. Pythons and all non-poisonous ophidians.

2. *Protected Game* (i.e. Game protected by close season and limitation of number that may be killed).

<i>Tonkin.</i>	<i>Annam.</i>	<i>Cochin-China.</i>
Jungle-fowl.	Silver Pheasant.	Small Game.
Common Pheasant.	Argus Pheasant.	Pheasants (all species).
Silver Pheasant.	Partridge.	Jungle Fowl.
Partridges of all species.	Pangolin.	Partridge.
All fur-bearing game—Deer,	Egret.	Quail.
Antelope, Pig, Hare.	Langurs.	Cranes.
(Above are protected by	Male Elephant.	Spoonbill.
close seasons defined by	Gaur.	Sambar Deer.
Order.)	Wild Cattle.	Axis Deer.
	Banteng.	Eld's Deer or Thamin.
	Buffalo.	Duck.
	Eld's Deer.	Heron.
	Axis Deer.	Tantalus.
	Muntjac.	Stork.
	Rusa Deer (<i>cervus</i>	Pelican.
	<i>aristotelis</i>).	Antelope.
	Swamp Deer.	(Above are protected
	(Above are protected	during their breeding
	by close seasons de-	seasons.)
	finied by Order.)	

N.B.—We have reproduced the lists as received. They may require some amendment. It will be seen for instance that in the Cochin-China lists the Thamin and Axis Deer appear as both absolutely and partly protected.

A CORNCRAKE INQUIRY.

An inquiry is being conducted under the direction of the British Trust for Ornithology about the present distribution of the Corncrake in the British Isles. I cannot remember when last I heard the harsh, monotonous, tedious call of this beautiful but unmelodious bird. Yet, the whole of my boyhood and many of my years of more or less discretion were passed in what I might then have been tempted to call a Corncrake-infested area, in the county of Wiltshire. My most vivid recollection is of tossing in bed on a hot June night breathing boyish, and some not too boyish curses against Corncrakes in general and one in particular that

would not let me sleep. It was always near enough to annoy, though often the direction of the sound changed. I observe that a notice issued by the British Trust for Ornithology for the guidance of observers warns them against being misled by the bird's ventriloquial powers. I do not know whether there is any substantial evidence that Corncrakes actually possess ventriloquial powers. It is an old belief, which as a boy, I rejected. I could see no reason why this particular bird should have such powers, or any practical use to which they could be turned. I knew that a Corncrake could run very fast and I guessed that my enemy ran hither and yon, making his beastly noise and I wished that he would run miles and miles away.

There was one pair, and this was the source of my sorrow, in a field very near to my home. They returned year after year and we could guess within a little where the nest was. But we were discouraged from looking for it. A Land-Rail in the bag was regarded as the finishing touch to the opening of the Partridge shooting: so the Corncrake was a favoured bird.

I think it must be at least thirty years since I last heard a Corncrake. During that time I have worked in London: but I had plenty of opportunity during a period of eleven years when I lived in Surrey and, during frequent visits to Wiltshire and other parts of the country, to hear the Corncrake had it been there to hear. Now I would give a good deal to hear it—but not for too long, especially at night!

In Wiltshire the disappearance of the bird was attributed without question to the introduction of the mechanical mower. The British Trust for Ornithology suggest two other possible causes—earlier mowing and the use of artificial manures. In the old days of mowing by scythe it was not unusual for the farmer to give instructions that the site of a Corncrake's nest, if known, as it often was, should be avoided. To do this was less simple when the mechanical mower was used and, to this extent, the machine may have been to blame. Otherwise there is no obvious reason why mechanical mowing should be any more destructive of the