Black rhinoceros *Diceros bicornis*

The black rhinoceros is now a seriously threatened species, having declined from about 65 000 in 1970 to just over 2 400 in 1995.

The snorting and puffing of a charging black rhinoceros is one of the classic sounds of the African bush, guaranteed to raise adrenalin levels of anyone on foot, especially if there are no climbable trees handy! But despite their fearsome reputation they are not all homicidal maniacs. In most cases charges are bluffs intended to scare away intruders. Nevertheless, the animal should always be treated with respect when encountered in the bush. Individual black rhinos are idiosyncratic, with their own characters, just like humans – some are placid and unaggressive, whereas others are more inclined to charge. The biggest danger is if one accidentally surprises an animal at close range in thick bush. While not possessing great eyesight, its senses of hearing and smell are acute. The black rhino is also much shyer than the white rhino. When not surprised, the black rhino can be very inquisitive, slowly moving towards the source of noises in which it is interested. Generally, if the wind changes direction and it smells humans it will move off. After being 'spooked' the black rhino tends to run further than the white rhino and prefers to take cover in thick bush.

During the day the animal keeps cool by lying up in the shade of thick bush, under big shady trees, in pans or on breezy ridge tops. The black rhino does most of its feeding at night, and comes into open areas more readily during this cooler period.

The species is also known as the hook-lipped rhino because of its mobile pointed upper lip, which it uses like an elephant's trunk to grab and pull food into its mouth. Unlike the white rhino, which is a grazer, the black rhino is a browser, eating trees, shrubs and herbaceous plants.

The decrease in black rhino numbers in the wild, from about 65 000 in 1970 to just over 2 400 in 1995, represents one of the fastest declines of any large mammal in recorded history. However, total numbers in Africa have remained relatively stable since 1992, with increases in South Africa and Namibia cancelling out declines in other countries.

Decreases early this century were largely a result of loss of habitat caused by the clearing of land for settlement and through hunting. However, in the past three decades poaching has been the main culprit. Contrary to popular belief the main use of rhino horn is not as an aphrodisiac, but rather as a traditional Eastern medicine (used for reducing fever), and for making carved dagger handles in Yemen. More recently it appears that rhino horn may be being stockpiled in some areas as a speculative investment.

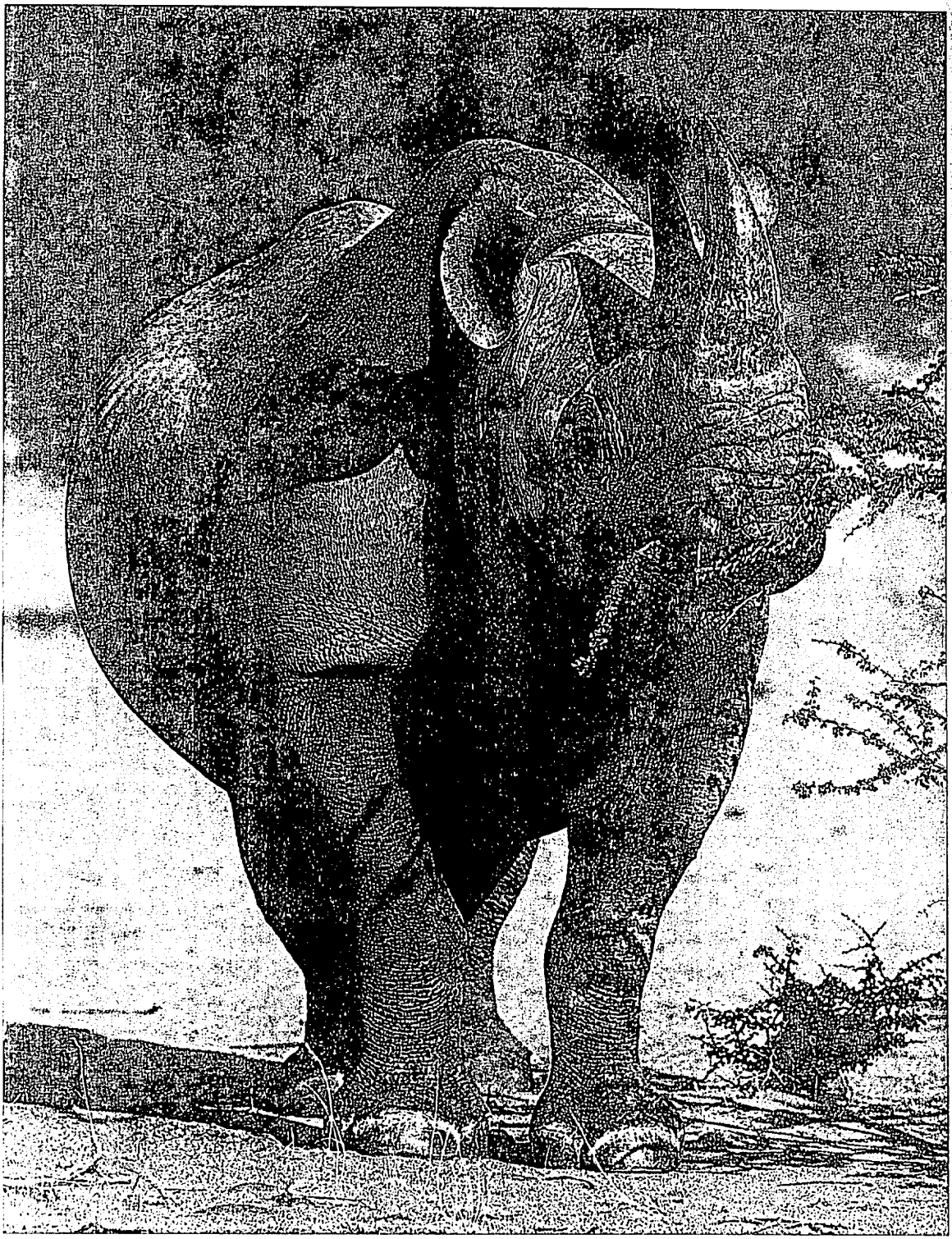
Today, most black rhinos occur in smaller, more intensively managed populations with better security, and have been all but wiped out in the vast, underprotected open areas they used to roam in large numbers. Many of these populations have been re-established on both state and private land: from only two in 1960, South Africa now has 18 black rhino populations on state land and seven on private land. In several countries the rhinos are being managed below carrying capacity to ensure optimum population growth rates. When densities build up, animals are translocated to other areas. This requires good monitoring, and many rhinos have had their ears notched to make it easier for conservationists and game scouts to recognize individuals.

In South Africa black rhinos can now be bought on auction if suitable habitat is provided and the property has a carrying capacity of at least 10 animals. By contrast, animals on private land in Kenya, Zimbabwe and to some extent Namibia and Swaziland remain the property of the state and are looked after and managed for the state on a custodianship basis.

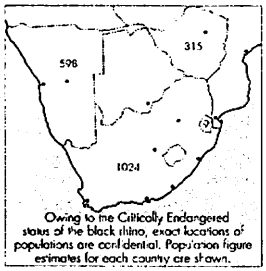
Black rhino conservation is not cheap, and there is a strong correlation between expenditure and success. It has been estimated that protecting and managing black rhino populations can cost as much as US$1 000–1 200 per square kilometre a year. Unfortunately, African conservation departments have for a number of years faced declining budgets in real terms, which poses a potential threat to the quality of conservation on state land in the long term unless alternative ways can be found to generate additional revenue.

Sadly, as long as the demand for horn remains high, all five species of rhinos worldwide (two African and three Asian species) remain under threat of extinction.

RICHARD H. EMSLIE



The black rhinoceros is a browser, using its prehensile upper lips to pluck leaves and twigs off the ends of branches of trees and bushes.



Source: IUCN SSC AfRSG (1996)

Owing to the Critically Endangered status of the black rhino, exact locations of populations are confidential. Population figure estimates for each country are shown.

DISTRIBUTION AND STATUS

Four recognized black rhino subspecies occur, totalling 2 410 animals at the last count in 1995. Most black rhino occur in South Africa, Namibia, Kenya and Zimbabwe.

D.b. minor: *Most numerous. Occurs from southern Tanzania down through Zimbabwe to northern and eastern South Africa where most of its numbers are. Only a few remain in Botswana, Mozambique and Zambia. Small numbers also re-introduced to Swaziland and Malawi.*

D.b. bicornis: *Namibia is home to 95% of this larger, more arid-adapted subspecies. Ranges from 'desert' country in Kunene province of Namibia, to some small re-established populations in southwestern South Africa.*

D.b. michaeli: *Stronghold in Kenya, with other important populations in Ngorongoro (Tanzania) and a translocated population in Addo Elephant NP, South Africa.*

D.b. longipes: *Only a few remain scattered through parts of Cameroon. Numbers continue to decrease.*

Listed as Threatened – Critically Endangered in the IUCN Red List; however, regionally its status varies from Critically Endangered to Conservation Dependent.

HABITAT

Exists in a wide range of habitats from desert to moist, dense vegetation. In the historical past was even recorded on the slopes of Table Mountain. Has a much wider historical distribution than the white rhino. Small thorn trees and tambuti thickets especially favoured. Riverine and drainage line habitats and nutrient-rich termitemound bush clumps provide important dry-season habitat. In southern Africa the higher densities are found in sweetveld and valley bushveld.

FIELD CHARACTERISTICS

Smaller than the white rhino; females weigh up to 800 kg and males up to 1 200 kg. Pointed upper lip clearly distinguishes it from wide-mouthed, 'square-lipped' white rhino. Has a much smaller head, usually held high compared to the white rhino's. Has a saddle on the back, whereas white rhino has an obvious fin-like bump two-thirds of the way along its back. The ears are more rounded and trumpet-like compared to the white rhino's elongated and 'rectangular' shaped ears. Colour of animal depends in part on the colour of the soil in which it has rolled. It can run at up to 55 km/h. Black rhino dung is sometimes deposited on white rhino dung middens. It is orangish in colour and contains fragments of leaves and sticks. In contrast to elephant dung the twigs in a black rhino's dung have a neat, pruned appearance.

SOUNDS

Best known for an explosive snort when charging. Among other sounds the calves also make an enchanting mewing noise which seems incongruous for such a big animal.

FOOD AND FEEDING METHODS

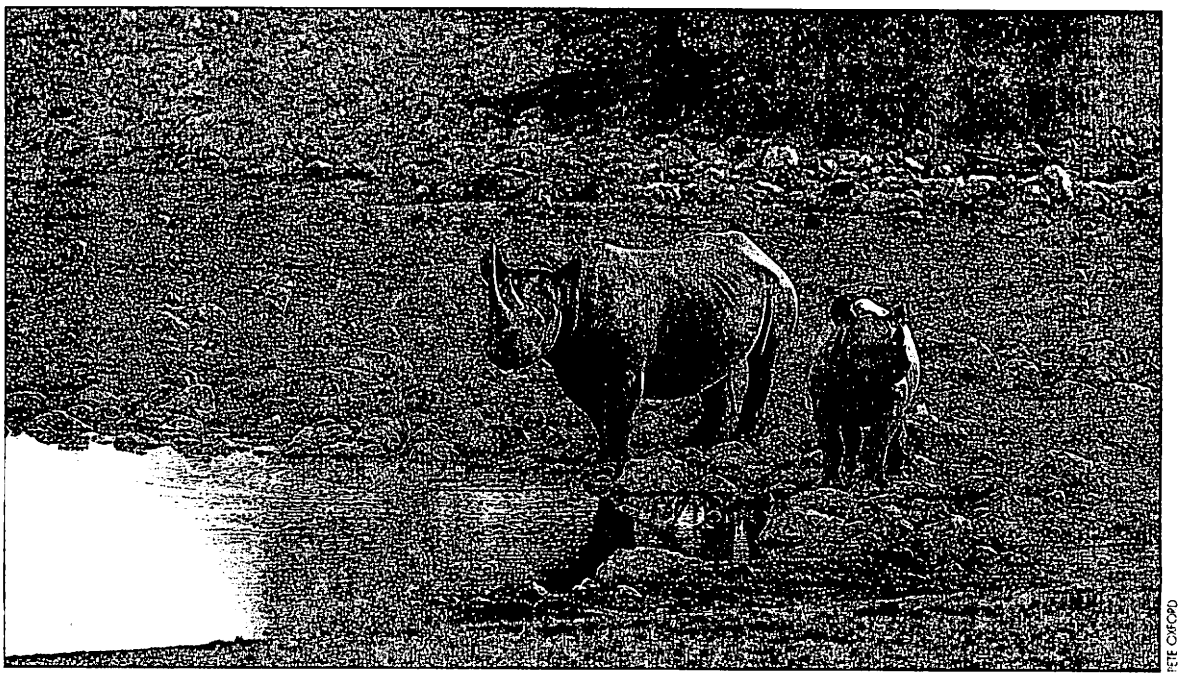
Browser; eats trees, bushes and herbs, but will eat grass when under nutritional stress. Hooked upper lip is used to grab hold of branches and pull them into the mouth; these are then sheared off using the molars and crunched up, thorns and all. Less destructive than elephants, which tend to shred ends of branches like a 'toothbrush'. Characteristic 'pruning' of woody vegetation has enabled ecologists to successfully study feeding patterns.

BREEDING BIOLOGY

Cows mate at any time of year. Mating can be quite violent, with males sometimes horning the females. Age at first calving usually about 6,5 years. Under optimal conditions can achieve an inter-calving interval of around 27 months.

SOCIAL SYSTEM

Males may set up territories whose sizes are largely determined by food and water availability; they may kill young bulls who stray into their territories. When densities reach or exceed carrying capacity, mortalities due to fighting generally increase. Usual group is a cow and calf or a cow and an older and younger calf. They tend to recognize animals living in the same area by smell. Cow/calf groups sometimes meet up for brief periods before splitting again. Bulls are usually solitary but will spend time with a female in oestrus.



PETE OXFORD

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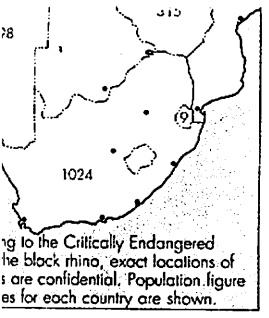

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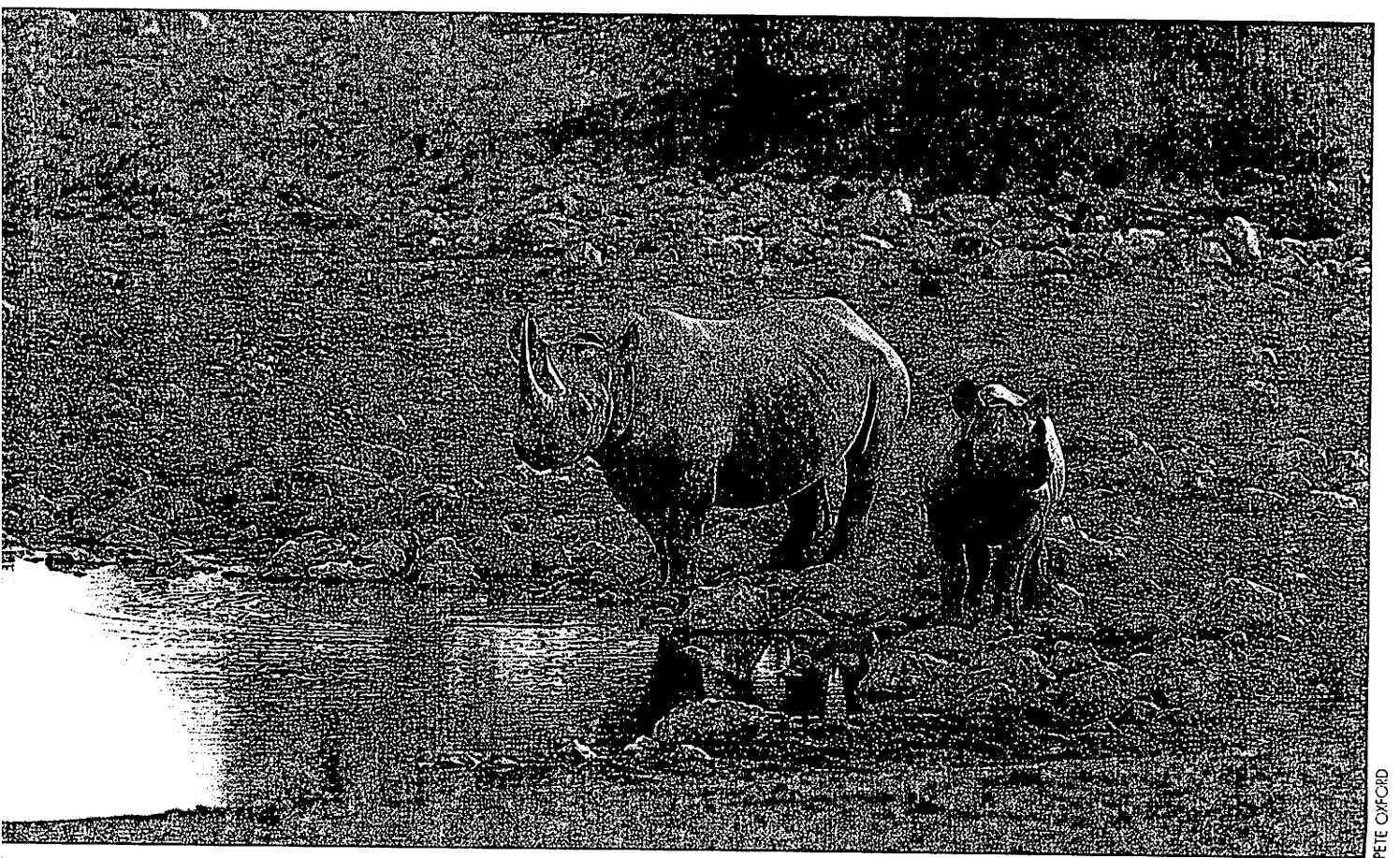

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