South Africa's rhino success story gets sad new poaching chapter

By Mike Knight

The recovery of the South African rhino populations is often cited as one of Africa's most successful species conservation stories.

From a paltry 20 - 50 Southern White rhinos in 1885, the last remaining breeding population in iMfolozi grew under protection. By the end of 2010, there were an estimated 495 populations in Africa, with numbers reaching a considerable 18,800 in South Africa (93.2% of Africa's White rhinos, see Fig. 1) with an additional 2,365 (all but four are from the Zululand stock) in

eight other African countries, and approximately 750 more in captivity.

The country's Black rhino populations were at a low of around 115 animals in the early 1930s and also recovered, albeit at a slower rate, to an estimated 1,915 by 2010 (see Fig. 2). South Africa conserved only 0.1% of Africa's Black rhino in the 1930s but by the end of 2010, the country conserved 39.2% of Africa's entire Black rhino population. The slower increase of Black rhino numbers can be attributed to the animals' different biological characteristics: they are browsers with specific habitat requirements and different social biology.

However, this success story is now threatened by a resurgence of illegal killing. From 2008 to mid-2011, a total of 776 rhinos were illegally killed in South Africa. I will discuss how this arose and what needs to be done to counter this wanton destruction of unique natural assets.

But, first, what led to the incredible recovery of the rhino populations in South Africa? The revival of both species started thanks to the activities of a few conservationists who were determined to save small remnant populations in Zululand. The initial recovery took place in the formal state-protected areas. New populations were set up in



many parks with Kruger National Park's reintroduced population subsequently growing to become Africa's largest rhino population. When the Zululand White rhino population reached about 1,800 animals in the late 1960s, there was a change in conservation policy. The development of immobilisation and translocation techniques saw the donation of a few animals to the private sector to spread the conservation burden and provide incentives to private landowners. This policy then led to the sale of animals to applicant farmers at heavily subsided prices as low as R800 (\$114 at current exchange rates) per animal. It was only in 1986, when the then Natal Parks Board started its wildlife auctions, that the true market value of White rhino was realized. Prices of about R10,000 (about \$1,400) per animal were fetched at the early auctions. Current prices average \$32,000 per animal. With other state conservation agencies also auctioning White rhino from 2001, a total of 2,500 White rhinos have been sold into the private sector since 1986.

Changes in legislation in the late 1960s granting ownership of wildlife Private landowners were buying into White rhino conservation because of increased financial returns from hunting (principally trophy hunting) and ecotourism, while the desire for Black rhinos was driven by returns from ecotourism and the prestige of owning an exclusive species. With rhinos requiring large areas, the expansion of rhino onto private land has helped contribute to the expansion of wildlife numbers outside Parks and has had wider benefits for biodiversity conservation.

to private landowners, as well as livestock reduction campaigns, led to a radical change in the perceived value of wildlife in the private sector and saw the industry shift in this direction. By 2008, there were an estimated 400 private rhino owners with about 4,000 White rhinos on 22,274 km² of farmland (roughly equivalent to another Kruger National Park in size) that had been set aside for rhino conservation alone. By 2010, the number of White rhinos on private land was estimated to have increased to about 4,500, or 24%

of South Africa's 18,800 White rhinos. With Black rhinos made available to the private sector much later, this sectors' importance in the conservation of this species has grown, with 45 landowners carrying 446 Black rhinos, or 23% of the country's 1,916 animals.

The sale of 1,118 White rhinos from state conservation organisations from 2005 to 2010 generated about \$29 million for the cash-strapped conservation authorities, while the 460 animals



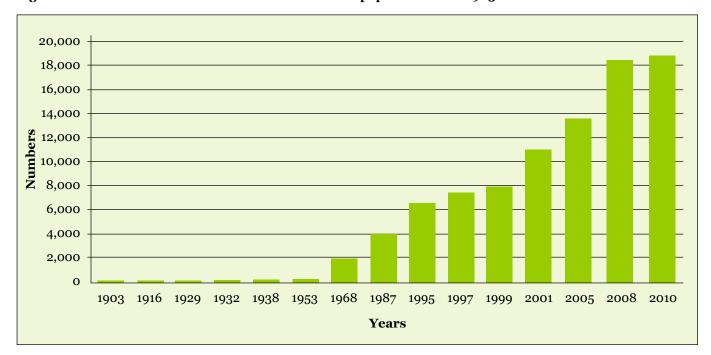


Figure 1. The increase in the South African White rhino population since 1903



Trainee rangers from different South African conservation organization improve their shooting skills.

sold by the private sector generated a further \$13 million in revenue from this species alone. Between 1972 and 2004, an average of 36 White rhino were hunted per year, at an average price of \$32,000 per animal in the later period. After 2004, South Africa experienced marked changes in the hunting industry. Between 2005 and 2008, the

number hunted doubled to 86 animals per year, increasing to over 100 per year until 2009.

After 2004, there was a radical shift with fewer hunters coming from traditional big game hunting countries such as the USA and European nations. More and more hunters were now coming from non-traditional

hunting countries from Southeast Asia, especially Vietnam. By 2009, the non-traditional segment made up 90% of rhino hunters, compared to 15% in 2005. Traditional hunters were driven from the market by prices that were now three times those charged before 2005. This, in turn, fuelled demand for more live sales of rhinos at higher prices. What had been a successful market-regulated demand for bona fide trophy hunters, had become an illegal (or pseudo-hunting) method of acquiring rhino horn. The alarm bells were going off in the wildlife sector. To curb this illegal use of legal hunting legislation to obtain rhino horn, the state instituted a string of measures, including a moratorium on the internal trade in horn, restricted hunts of one White rhino per hunter and a focused investigative capacity. This had an immediate positive response in reducing the number of pseudo-hunting incidents.

With access to horn becoming more difficult via the pseudo-hunting route, the theft of rhino horn from museums and reserve strong rooms began to increase, not just in Africa but also in Europe, as did the active poaching of rhinos. From 2000 to 2007, rhino poaching in South Africa averaged 15 animals per year (see Fig. 3). In 2008,

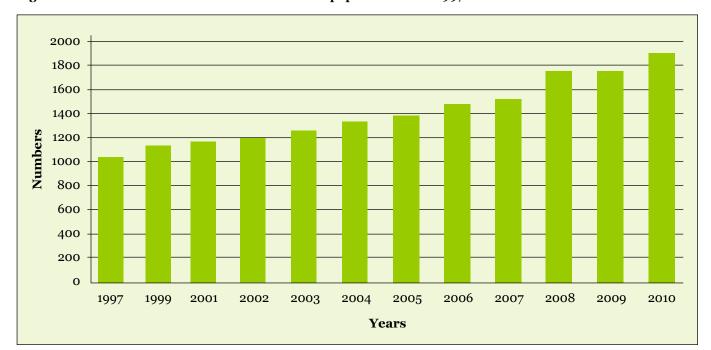
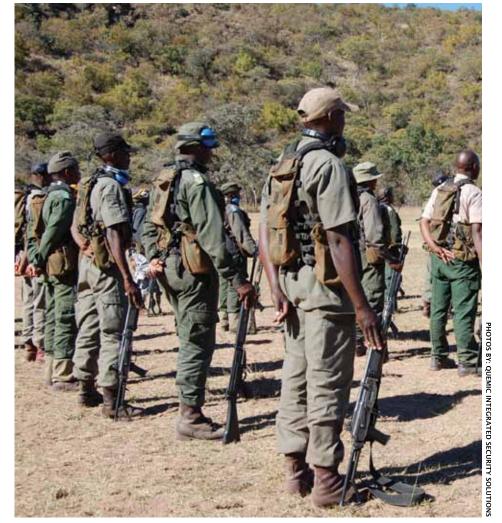


Figure 2. The rise in the South African Black rhino population since 1997



Discipline remains an essential component of any ranger corps.

this rapidly increased to 83, thereafter doubling every year to 333 in 2010.

While current poaching levels in South Africa (<2%) are sustainable, a continued rapid escalation would not be, especially if the annual loss exceeds 1,370 rhino per year. South Africa would then be on a negative growth trajectory. Although Kruger National Park has taken the brunt of the rhino losses, the private sector and other state reserves have lost in proportion to their population sizes, which shows that poachers are striking across the board. Not only has this poaching been carried out with high-powered rifles, it has also involved the sophisticated use of helicopters and tranquilisers to catch the animals and remove the horns.

The state and private sector have responded strongly to this threat through numerous initiatives. A national wildlife crime unit was established involving all law enforcement, conservation, prosecuting and revenue collection authorities to facilitate national and international responses, investigations and prosecutions. The private sector has rallied to raise funds to equip, train and

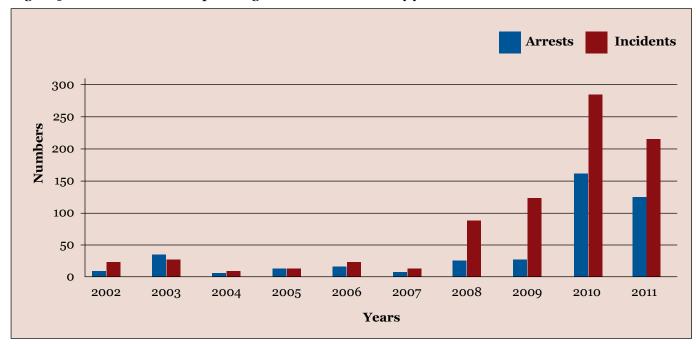


Figure 3. The number of rhino poaching incidents and arrests by year since 2002.

N.B. The figures for 2011 are only until July 2011.

support the conservation authorities. In addition, from April 2011, the military has been deployed in Kruger National Park to help address poaching in the park. DNA analyses of horn are also now being routinely and effectively used in the fight against crime. These collective efforts appear to have had positive results as the rate of poaching over the last two quarters appears to have dropped slightly from 1.21 rhino per day (Sept-Dec 2010) to 1.11 per day (Jan-3 Aug 2011). It is still too early to confirm if this trend has continued. The number of arrests has also increased (see Fig. 3) with heavier sentences being given, as reflected in the recent 12-year jail sentence handed down to a convicted Vietnamese horn trafficker.

With little understanding of what is really driving the current increased demand for horn in the Far East (where most of the southern African horns are destined), the threat facing our rhino populations is not expected to abate in the short term. With rhino horn offering no evidence-based medicinal properties, one is dealing with a market based entirely upon ancient beliefs. (See Traditional Chinese Medicine in this section). This therefore calls for greater cooperation by the authorities

Total number of rhinos killed illegally from 2008 to mid 2011 in South Africa.

in countries such as Vietnam, China and Thailand to help us address this matter collectively, through improved law enforcement of the illegal market and communication about the horns' lack of medicinal value.

With poachers gaining all the benefit from poaching and the state and private sector bearing all the costs, alternative approaches to reducing market prices, demand and ultimately poaching need be investigated. In this regard, the possibility of legally trading horn is being contemplated in certain quarters. But, importantly, this cannot be done in isolation of the users and without a relatively good understanding of the possible scenarios if trade was to be opened or legalised.

In summary, South Africa with its progressive wildlife laws has

encouraged a thriving wildlife industry that has seen wildlife expand across the region. It has witnessed the miraculous recovery of the iconic White and Black rhino populations. But recent ineffective implementation of regulations has opened the door to dynamic criminal syndicates, allowing them to exploit this unique African resource. Not only should we vigorously and aggressively protect our free-living populations but we should also investigate other means of making sure that rhinos remain a cornerstone of our conservation efforts.

DR MH KNIGHT is the chairman of the SADC Rhino Management Group (RMG). He trained as a wildlife ecologist, and has spent most of his career within South African National Parks. He started as a scientific officer based in the southern Kalahari, then regional ecologist for numerous parks, to head of Research for inland parks, to his current position as General Manager for Park Planning & Development. His experience is in large mammal ecology, park planning & conservation planning in Southern & East Africa. He has been involved in rhino conservation for the last 17 years. He has been the Chairman of the SADC Rhino Management Group (RMG) for the last six years, and from 2011, the Chairman of the IUCN SSC African Rhino Specialist Group.