

Critical African Studies

ISSN: 2168-1392 (Print) 2040-7211 (Online) Journal homepage: https://www.tandfonline.com/loi/rcaf20

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To cite this article: Katie McKeown (2016) Rehoming rhinos in southern Africa: animal indigeneity and wildlife translocations in the 1960s and 1970s, Critical African Studies, 8:2, 196-215, DOI: 10.1080/21681392.2016.1207192

To link to this article: https://doi.org/10.1080/21681392.2016.1207192



Published online: 26 Oct 2016.



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Rehoming rhinos in southern Africa: animal indigeneity and wildlife translocations in the 1960s and 1970s Rapatriement des rhinocéros en Afrique australe: Indigénéité animale et translocations de la faune sauvage dans les années 1960 et 1970

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(Received 14 January 2015; accepted 15 June 2016)

In this article, I examine rhino translocations in the 1960s and early 1970s in order to analyze how conservation practices have been influenced by ideas of animal indigeneity and how animals have responded to these initiatives. I investigate successful and unsuccessful Operation Rhino reintroductions to protected areas in South Africa and Mozambique as a way of understanding notions of what belonged in these territories and the role animals played in shaping them. Rhinos were not passive subjects of these 'recolonizations' but rather unpredictable participants that often responded to their 'native' territories in unexpected or undesired ways. This article also considers how translocation initiatives led to a shift in thinking about animals as members of a species to perceiving them as individual actors. Furthermore, it explores the relationship between wildlife (as both species representatives and as individuals), the humans striving to protect them, and the places to which they have been transported. In considering the ways that animals are managed in and relocated to new protected areas, this article also calls into question the categorical division between wildness and domesticity.

Keywords: Operation Rhino; wildlife conservation; animal history; indigeneity; belonging; reintroduction

Dans cet article, j'examine les translocations de rhinocéros dans les années 1960 et au début des années 1970 afin d'analyser comment les pratiques de conservation ont été influencées par les notions d'indigénéité animale et comment les animaux ont répondu à ces initiatives. J'étudie les échecs et les succès des Opérations Rhino de réintroductions dans des zones protégées d'Afrique du Sud et du Mozambique afin de comprendre les conceptions de ce qui appartenait à ces territoires et le rôle joué par les animaux dans leur façonnement. Plutôt que des sujets passifs de ces «recolonisation», les rhinocéros étaient des participants plutôt imprévisibles qui ont souvent répondu à leurs territoires «natifs» de manières inattendues ou fâcheuses. Cet article examine également comment les efforts de translocation ont donné lieu à une transformation de la manière de penser les animaux en tant que membres d'une espèce vers leurs perceptions comme acteurs individuels. En outre, il explore la relation entre les animaux sauvages (en tant que représentants d'espèce ainsi qu'individus), les humains cherchant à les protéger, et les lieux où ils ont été transportés. Par son examen des façons dont les animaux sont déplacés vers, et gérés dans, de nouvelles zones protégées, cet article remet également en question la distinction entre le sauvage et le domestique.

Mots-clefs: Opération Rhino; conservation de la faune sauvage; histoire animale; indigénéité; appartenance; réintroduction

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On 15 December 1961, the first rhino successfully reintroduced to South Africa's Ndumo Game Reserve walked out of his pen, grazed briefly, and then threw himself over the boundary of his enclosure, charged to the reserve's fence line, and walked along side it before heading back towards the rest camp and settling into his new home (NPB files, Rangers' Reports). Mpandhlana ('the bald one' in Zulu), a 4000-pound bull, had been transported from the Umfolozi Reserve, 100 miles south of Ndumo, as part of Operation Rhino, an initiative aimed at relocating white rhinos in order to save the species from extinction (Player 1972). By the 1920s, big game hunting and tsetse fly eradication campaigns had severely diminished the number of white rhinoceros (Ceratotherium simum) in southern Africa, with the only viable population left in the vicinity of the Umfolozi Reserve in South Africa's Natal province (Rookmaaker 2000). Under the management of the Natal Parks Board, the white rhino population in this reserve grew from around 200 early in the twentieth century to 437 by 1953, a number that was becoming increasingly difficult to maintain due to habitat degradation and a growing human population on the reserve's periphery (Player 1972, 9). Rather than selectively culling the animals, Umfolozi's conservators boosted the population and distribution of the species by translocating more than 1100 rhinos to historic rangelands in Africa and zoos around the world between 1961 and 1972 (249). Celebrated as one of the continent's great conservation success stories, Operation Rhino provided the 'founder stock' of all surviving Southern White Rhinoceros (C. simum simum), now totalling over 20,000 and representing 80% of the global rhino population (Emslie 2008, 89; Emslie and Knight 2014).

This translocation project demonstrates how the relocation of animals to historic rangelands has employed notions of indigeneity to physically put species in place. However, individual animals have not always adapted in predictable or desired ways to the places deemed their indigenous home. In this article, I use rangers' reports, ecological studies, wildlife publications, and archived correspondence from the Natal Parks Board to uncover 'traces' of animals as historical actors in this translocation process (Benson 2011). I also use these sources to track discussions and discourses of indigenous belonging amongst wildlife conservation practitioners and enthusiasts. It was not only animals that moved across the boundaries of protected areas and political territories during this period; ideas and expertise also travelled across these porous borders both within and between South Africa and Mozambique. The reintroduction of rhinos in South Africa's Ndumo Game Reserve and Mozambique's Gorongosa National Park and Maputo Elephant Reserve in the 1960s and 1970s reveals indigeneity to be a two-way process, both imposed by conservationists and embodied by the rhinos that were resettled in their native territories.

Indigeneity, belonging, and wildness

The dispossession and displacement of indigenous people have been critical themes in the writing of conservation histories in Africa and elsewhere (Anderson and Grove 1987; Spence 1999; Rangarajan 2001). Scholars have shown how the 'myth of wild Africa' led to material depopulations of territory, reproducing an imagined division between humans and natural environments (Adams and McShane 1996; Neumann 2002; see also Cronon 1995). The production of 'wilderness' in the creation of protected areas is seen to be part of a larger process of Western imperialism and the exercise of power over territory and resources, including wildlife (Beinart and Hughes 2007). Scholars have demonstrated how post-colonial conservation has continued to exclude indigenous people from protected areas (Brockington and Igoe 2006). Where colonial powers once drove exclusionary resource management agendas, these are now largely driven by foreign capital, market forces, profit incentives, and celebrities (Brockington, Duffy, and Igoe 2008; Brockington 2009; Büscher, Dressler, and Fletcher 2014). Even the development of transfrontier conservation areas, which have been touted by governments and NGOs as inclusive landscapes that reconnect animal and human communities across borders, have actually re-invigorated wilderness ideologies, perpetuated inequality, facilitated the expansion of capital, and revived the exclusionary practices of previous conservation models (Ramutsindela 2007; Lunstrum 2010). In producing spatial divisions between people and 'nature', conservators of protected areas have laid clear boundaries between what belongs in these places and what does not.

However, the practiced politics of belonging in 'wild Africa' is not confined to the curtailing of human activity and habitation. As humans have moved around the globe, they have intentionally and accidentally transported plants and animals to new habitats, changing the global landscape and facilitating new relationships with the natural environment (Grove 1995; Crosby 2004). This movement has enabled the production of conceptions of 'indigeneity', as well as competing categories of 'non-native', 'alien', and sometimes 'invasive', as applied to humans and non-human species (Griffiths and Robin 1998). While scientists have been making land management decisions on the basis of biotic nativeness since the eighteenth century (Chew and Hamilton 2011), scholars in the humanities and social sciences have only recently begun to pay attention to the connection between ideas about race, nationality, and cultural identity and perceptions of native or invasive plant and animal species (Draper 2003; Coates 2006; Wylie 2008). In South Africa, scholars have paid particular attention to the production of these categories with regard to the country's flora, demonstrating long-standing concerns about the threats alien species pose to native ones, as well as the ways that non-native species have been domesticated (Beinart and Middleton 2004; Pooley 2010; Beinart and Wotshela 2011; Carruthers et al. 2011).

Africa's fauna have also been imbued with notions of indigeneity, particularly in practices of wildlife conservation, that have conceptually and physically grounded animals in particular territories. As colonial authorities in the first half of the twentieth century began to recognize the dire consequences of sport hunting and tsetse fly eradication campaigns on species populations, protected areas were demarcated to safeguard threatened species native to those places (Beinart and Coates 1995, 77). In the second half of the twentieth century, indigeneity became a particularly significant concept as species were relocated to areas where they were previously extinct in order to establish new breeding populations. Operation Rhino represents a period in wildlife conservation when the movement of wildlife into and between protected areas was becoming standard practice (see for example Harthoorn 1970; Penzhorn 1971; Young 1973). William Adams identifies the 1960s as 'the heyday of costly and flamboyant capture-release programmes for individual species' and rhinos as 'the classic group subjected to the indignity of salvation in this way ...' (2004, 133). In her work on the militarization of contemporary rhino protection initiatives, Lunstrum (2014) has demonstrated how the grounding of these animals in place extends to the state's claim on this species as an icon of both natural and national heritage. Rhinos are seen as part of 'a national community nurtured and protected within the territorial bounds of a national park, again a symbolically charged spectacular space designed to protect not just wildlife, but this as the nation's heritage' (Lunstrum 2014, 826). Rhinos' simultaneous belonging within territory and to the nation demonstrates a dual imposition of 'nativeness' on this species.

In the second half of the twentieth century, a growing concern for protecting 'native' species and habitats from those classified as 'alien' became an organizing precept for conservation (Chew 2011, 369). Charles Warren offers the following definitions for these terms, which illuminate their use in conservation circles: '[N]ative species are those which have autocolonized an area since a selected time in the past ... and alien species are those which have been introduced by humans, intentionally or otherwise' (2007, 428). In 1995, the International Union for Conservation of Nature (IUCN), a global membership body aimed at conserving biodiversity, defined reintroduction as 'an attempt to establish a species in an area which was once part of its historical range, but from which it has been extirpated or become extinct' (Emslie, Amin, and Kock 2009, 8). In the organization's most recent guidelines, published in 2013, the phrase 'historic range' was changed

to 'indigenous range' (IUCN/SSC 2013, 2), implying a primordial claim to a place that is deeper than simply where it has lived in the past. Although scholars have begun to unravel the presumptions on which this dichotomy of native and alien are based (Chew and Hamilton 2011; Rotherham and Lambert 2011), conceptions of belonging remain embedded in practices of wildlife translocations, with preference given to species reintroductions over 'assisted colonizations', in which humans help move species to areas where there is no record they ever existed (Ricciardi and Simberloff 2009).

As part of the 'animal turn' in the humanities and social sciences, animal geographers have been particularly attentive to the role animals play in making and shaping places and imbuing them with meaning (Philo and Wilbert 2000; Lorimer 2012; Buller 2013). This work has been highly influenced by Bruno Latour's actor network theory, which considers actors, places, and agency to be constantly in process, or 'in-the-making', where humans and non-humans act in perpetual relation to one another (Johnston 2008). This, in turn, inspired the concept of hybridity, which broadens our understanding of who or what can be a social actor, disrupting perceived binaries between the human and the non-human, decoupling the 'subject/object binary', and allowing for multiple types of subjectivities, not only human ones (Lulka 2009). These 'more-than-human geographies' explore how place-making processes are enacted by multiple species across an imaginary divide between nature and society (Whatmore 2002; Braun 2005; Bolla and Hovorka 2012). The actions of translocated members of wildlife species present an opportunity to explore how belonging is not only ascribed to wildlife but is also inscribed by non-human animals on particular places.

Furthermore, the process of translocation, moving an animal from one place to another, reveals an inherent tension in the management of wildlife. Whatmore and Thorne argue that the enduring coincidence between the species and spaces of wildlife as the antipodes of human society means that, to ask what is wild is, simultaneously, a question of its whereabouts' (1998, 435). The category of 'wildlife' not only implies assumptions about where these creatures exist but also where they should exist, or in other words, where they belong. However, belonging to a place also indicates some form of domestication, by which I mean the process of becoming at home there, either through the imposition of real or imagined boundaries or through autonomous acclimatization, or settling in. The concept of domestication contrasts with our perception of wildness, usually identified with something or somewhere uncontrolled, unconfined, or devoid of human influence. What is perhaps more complicated in thinking about wildlife belonging in 'the wild' is that these 'wild' species are now largely relegated to protected areas that are created, managed, and regulated by humans. Shirley Brooks contends that 'the animal experience – not unlike that of marginalized groups of human beings – is one of having geographies imposed upon them' (2006, 12). Considering the various ways humans put wildlife in place, both figuratively and physically, makes us attuned to power dynamics embedded in the ways wildlife are perceived to belong in particular places. Looking at how belonging is not only ascribed to wildlife but also inscribed by wildlife on territory presents an opportunity to rethink wildness, not as an imposed category but rather as a condition of unpredictability, where individual animals either transgress the boundaries of protected areas, native territories, and the characteristics of their species, or settle into them.

Despite the possibilities of writing *wild* animal histories, there are also limitations. The sources I use in this article were all produced by humans, many written by or under the leadership of Ian Player, the instigator and director of Operation Rhino. Thus, although I have directed attention to animal actions and behaviours in this article, these are mediated through human perceptions and experiences. Furthermore, although he was a key figure in the work of the Natal Parks Board during this period, Player had a contentious relationship with the organization and in many ways departed from its interests and agendas (Draper 1998). Thus, his influence and

authority in the materials I have used further represent the selective nature of writing this type (or any type) of history. Nonetheless, I contend that it is still possible to read these sources across the socio-nature divide. As Etienne Benson reminds us, 'Human writing in a world where human life is so intricately intertwined with non-human life will inevitably reveal traces of the other' (2011, 6). Thus, I garner 'traces' of animals in the archive in order to explore how humans and nonhumans have co-produced notions of indigeneity and belonging in their movement across territorial boundaries.

The origins of Operation Rhino and early relocations in Natal

According to Ian Player, the rangeland of the southern white rhinoceros once spanned throughout southern Africa 'from the Orange and Umfolozi rivers in the south, to the Zambesi and Cunene rivers in the north' (1967, 137). By the late nineteenth century, white rhino populations had been severely depleted by big game hunting, and in 1895, the British gave the species special protection under colonial law, declaring them royal game and setting aside Umfolozi, one of their last strongholds, as a protected area (Brooks 2006, 9). Despite continued formal protection in the early twentieth century under South African provincial control, campaigns aimed at eradicating the tsetse fly in the Natal province left the species under constant threat, instigating calls by American Herbert Lang to experiment with relocations to other reserves or even into captivity (Lang 1924). It was not until the early 1960s that these proposed measures were realized, not because the species was threatened, but because its protection had been too successful, and Umfolozi's conservators needed to reduce the number of rhinos in the reserve. At that time, state-owned lands surrounding Umfolozi, which had been supporting the surplus white rhino population, were to be allocated to the Bantu Trust, which would facilitate human occupation. Furthermore, limiting the rhinos to the reserve's boundaries would lead to risks of overpopulation, such as habitat destruction or disease, as had already been witnessed in the population of black rhinoceros (Diceros bicornis) in the nearby Hluhluwe reserve (NPB files, Further Notes on Operation Rhino). Rather than cull the excess animals, Ian Player initiated the translocation of these species, changing these animals' trajectory to one of 'an expanding population recolonizing parts at least of its once wide range' (Player 1967, 138).

David Marais's cartoon (Figure 1), which I found taped inside an Operation Rhino folder archived amongst other Natal Parks Board files, was directed more towards apartheid policies than conservation politics, but it provides a useful illustration of the ways notions of belonging have been mobilized in the translocation of species. In 1959, Prime Minister Hendrik Verwoerd announced his 'New Vision' for South Africa, which promulgated the Native Policy, dating back to 1905, through total racial segregation and separate geographical, political, and economic development. By relegating black South African citizenship to ethnic 'homelands', or 'Bantustans', Verwoerd intended to denationalize this majority population from the South African state as a means of maintaining minority rule (Tatz 1962). Marais used Operation Rhino to mock the Prime Minister's Bantustan policy, which was being implemented through forced removals. Three days before the cartoon was published, the first white rhinos were introduced to Kruger National Park (NPB files, Operation Rhino). Using the imagery of a relocated rhino (aptly a 'white' one), Marais capitalized on themes of race and relocation to satirize the Bantustan policy, suggesting it was intimately bound with false notions of where particular races, symbolized here as species, belong. One can also contemplate whether the inverse association is appropriate. Is there utility in thinking about Operation Rhino as a process of removal as well as relocation? Furthermore, were the affected rhinos passive conduits of the recolonization story Player identifies or active participants in the reclamation of territory?



Figure 1. David Marais, cartoon. Caption reads, 'But they can't turn the Kruger Park into a White Rhinostan! That's discrimination!' Cape Town: *The Cape Times*, 16 October 1961. Taped in file Operation Rhino, E/8/5/2. F/3a. Ezemvelo KZN Wildlife Archive, Pietermaritzburg. Reproduced with permission of *The Cape Times*.

In December 1960, Ian Player asked Toni Harthoorn, a veterinarian based in East Africa who had relocated animals threatened by the flooding of the Kariba Dam (Beinart 2001, 211), to assist with the development of immobilization and capture techniques for the movement of Umfolozi's white rhinos. In his report on Harthoorn's visit to Umfolozi in December 1960, Player described how they experimented with different combinations of tranquilizers and narcotics and two types of guns with which to dart the animals with loaded syringes, as well as different immobilization dosages and varied methods of pursuing the animals and time lapses on administering the antidote (NPB files, Operation Rhino). Continued experiments over the next three years led to the development of M99, an immobilization drug which would become critical to Operation Rhino's success (Player 1967, 139). Player's Operation Rhino team also experimented with techniques for acclimatizing rhinos after capture, either for captivity in zoos or for release into new reserves, testing different periods of time these animals spent in pens within Umfolozi and in their new settings, as well as means of getting the rhinos to eat whilst in captivity (Player 1967, 141–143). The earliest arrivals in Ndumo, for example, were first habituated in small bomas (enclosures), then in larger paddocks, before their release into the reserve, but this phased acclimatization was eventually deemed unnecessary and animals were released directly from their transport crates into the reserve (Player 1967, 146). Player noted that 'each rhino has marked individuality' in how it responded to 'taming after capture' (1967, 142), revealing that this process of experimenting with rhino immobilization and habituation not only complicated the boundary between wildness and domestication but also between the collective traits of a species and the individuality of its members.

While the main aim of Operation Rhino was to save the species by restocking its former rangelands, many of the initiative's rhinos were exported to zoos around the world, revealing a clearer tension in this mission to save 'wild' animals. In addition to absorbing some of the costs of this large relocation programme, transporting some of Umfolozi's white rhinos to zoos was purported as a means of safeguarding individual members of the species that might establish breeding units to restock their former habitats (NPB files, Operation Rhino). In an interview regarding Operation Rhino, Harthoorn stated

Even if the remaining animals in Africa should be destroyed ... it would be very nice indeed to have these animals safe in zoos and parks overseas, and I think that there is NO cruelty involved in this, because a rhinoceros seems to settle down in captivity much quicker than almost any other animal. They almost seem to enjoy being in captivity; all they want is a little bit of room and good food and they seem perfectly happy. (NPB files, further notes on Operation Rhino)

Harthoorn's reflections on white rhino behaviour contradict Player's observations of rhinos' distinct responses to captivity in the early stages of Operation Rhino experimentation. Furthermore, not all rhinos that were confined, even temporarily, as part of the translocation process conveyed enjoyment with their condition or happiness when the simple demands described above were met. Examining the outcomes of individual rhino translocations presents an opportunity to consider the limitations of species categories, particularly when species representatives act unpredictably.

Ndumo, a relatively small reserve located on Natal's border with Mozambique, was the second game reserve in Natal to receive rhino after Mkhuze, located south of Nudmo. Two months after Mpandhlana's dramatic release in Ndumo, he was joined by Masinyane (Zulu for 'the one who hurries'), a 4000-pound female that arrived in oestrus. According to ranger Tony Pooley's report for February 1962, Masinyane squeezed between the cables of her enclosure and ran off with Mpandhlana within a few days of her arrival. The two rhinos were spotted 'walking around together, talking in the peculiar way that they do, and apparently both very happy' (NPB files, Rangers' Reports). Another record of early rhino transfers indicates that the two rhinos mated on 14 February and were 'still together' months later (NPB files, Notes on Rhino Sent to Ndumu Game Reserve). The following year, Masinyane gave birth to Ndumo's first calf (Player 1967, 145).

Not all of the migrant rhinos fared as well. Of the 18 white rhino translocated to Ndumo over the next two years, 14 survived. One died on route to the reserve from exhaust fumes blowing into his crate. Another became paralyzed from injuries sustained during transport and died soon after arrival. One rhino drowned in the reserve, and another was killed by humans outside of the reserve's boundaries (NPB files, Notes on Rhino Sent to Ndumu Game Reserve). In January 1965, a rhino calf born in the reserve was killed by a crocodile. According to Ian Player, this was the only account on record of crocodile predation (Player 1967, 146). Before Mpandhlana's successful relocation, a female named Mbizana had been released into Ndumo but soon disappeared from the reserve, and rangers presumed her dead (NPB files, Notes on Rhino Sent to Ndumu Game Reserve). However, the senior warden of Umfolozi reported to the head of the Natal Parks Board in January 1963 that a female rhino from Ndumo had been spotted 100 kilometres south in Mhkuze Game Reserve (NPB files, White Rhino & Black Rhino); Mbizana's fate may not have been so dire after all.

Ndumo also received black rhinos from Umfolozi's vicinity, as increasing pressures in the reserve led some rhinos to venture outside its boundaries and into conflict with humans. The warden of Hluhluwe Game Reserve, almost adjoining Umfolozi, reported on the immobilization of a black rhino located on inhabited land outside the reserve and selected for translocation in 1962. His record offers a striking example of how individual animals acted in unpredictable ways.

This animal has probably spent the whole of its life outside of the Game Reserve but owing to the rapid increase in the local bantu population during the past four years, complaints were continually being received by the bantu about damage to crops.

During the last eight years the animal had frequently been driven back into the Reserve by means of blasting it with a shot gun loaded with bird shot. Despite this treatment it would, invariably, be found back in the Bantu Reserve the following day. Latterly the animal had taken to feeding on pumpkins and this was borne out by the number of pumpkin pips that were found in its faeces after being immobilized.

The animal was found to be covered in old wounds caused from fights ... It was found to be blind in the left eye, the eye having been at some stage lacerated in some unknown manner, possibly by shot gun pellets. Both hind legs, just above the feet, bore scars consistent with those that one would expect to find in an animal that had been snared with cable.

It is interesting that despite all the hazards of living in the Bantu Reserve the animal still chose this area in preference to the Game Reserve, where a more abundant supply of browse is available. I have no doubt that the main reason was that the population density of black rhino in that particular part of the Reserve is so high, and that the aggressiveness of younger animals made him seek out the Bantu Reserve for protection. (NPB files, White Rhino & Black Rhino)

Like Mbizana, who migrated out of Ndumo soon after her release, this rhino determined its own home and risked injury to reside in the unlikely 'protection' of human occupied lands. It was euthanized in its boma soon after immobilization and never made it to the safety of another reserve.

There were still several hundred people living inside Ndumo when rhinos were being imported to the reserve in the early 1960s. Because these species had been absent for so long, Ndumo's human inhabitants were unfamiliar with them. Some took advantage of the white rhino's docile nature by monitoring their grazing habits and cutting down a nearby fence line to encourage them to venture out of the reserve's boundary to be more easily killed, dehorned, and eaten (NPB files, Rangers' Reports). However, more people were fearful of these animals and vacated the reserve in the years following their reintroduction (Pooley 1992). Ranger Tony Pooley called the rhinos the 'unpaid policemen of Ndumu' and noted a drastic reduction in animal snares upon their arrival (Pooley 1992 and NPB files, Rangers' Reports). By 1967, all homesteads inside the reserve were abandoned, providing space to reintroduce other species to Ndumo (Pooley 1992, 214). This depopulation was an unintended consequence of rhino reintroductions but one that was viewed positively by Ndumo's conservators.

In their monthly reports to the Natal Parks Board headquarters, Ndumo's rangers often recorded concern that rhinos would cross into Portuguese territory, and sometimes they did (NPB files, Rangers' Reports). The reserve was unfenced on its northern border, where the Usuthu River acted as a natural boundary with Mozambique. During the winter months, people and animals easily traversed this river into adjoining territories. In September 1965, Ranger Pooley reported on a rhino that followed the Usuthu River upstream all the way to Swaziland. In trying to get the animal back into the reserve, he wrote

We tried every method, from firing shots, throwing stones, settling dogs onto it and eventually in desperation set fire to the reeds on the river bank, hoping that the smoke would panic the animal into running back into the river, downstream. To our amazement the animal was completely unworried

by smoke or flames, and at one stage, charged at a fiercely burning banana tree, smashed it over with its horn and rubbed the fire out.

The following morning, the rangers found the rhino had ventured back downstream and was outside the reserve fence trying to get back in (NPB files, Rangers' Reports). In 1968, a recent arrival to Ndumo travelled back and forth across the river 'causing some unrest among the local inhabitants' (NPB files, Rangers' Reports). After surviving these excursions into Mozambique, the rhino was shot by Ndumo's rangers back in South African territory after charging several members of a local community and tossing a child into a bush. The rhino's home country proved more perilous than the places it visited across the border.

Eight years after arriving in Ndumo, Mphandlana was still referred to by name in rangers' reports, maintaining a presence in the archive as an individual and not just another member of his species. In March 1970, this rhino, 'the biggest white rhino bull in this reserve', was found bogged in an area of thick, black clay. In his monthly report, Ranger Schütte described in great detail the rescue mission to free him. With several people assisting, this operation took an evening and the following morning, but Mpandhlana was eventually on firmer ground. 'He stood for about half an hour in one spot not quite believing he was out, and then walked off towards Nyamithi to drink and back into Mahemane [bush]. He has since been seen together with other rhino' (NPB files, Rangers' Reports). Unlike Mpandhlana, very few rhinos were specifically named in these reports after their initial arrival in the reserve. However, this should not imply that other rhinos were not perceived as individuals. One of the most interesting aspects of the Ndumo rangers' reports are the behavioural observations recorded in them, which would provide fertile material for future analysis. These observations rest on viewing these translocated rhinos and their offspring not only as a members of a collective species but also as individuals who variably broke out of their enclosures, tested the reserve's boundaries, and came to graze next to the game ranger's house.

Reading these recordings of the behaviour of rhino by Ndumo's rangers allowed me to investigate what geographer Buller (2015) refers to as 'animal presences' in the history of this reserve. This archive illuminated aspects of rhinos' experiences, preferences, deviances, and mortality that are inaccessible in straightforward population statistics. Quoting Nik Taylor, Buller argues for methodologies that transcend the

collective and abstract categorizations of the non-human (such as orderings by species, function or location, common to both natural and social science approaches to the animal) to focus rather upon animals as 'embodied individuals living their lives entangled with humans and their own wider environment'. (2015, 3)

Ndumo's rangers' reports reflect this entanglement of the reserve's human and non-human residents, presenting the reserve's new rhinos as dynamic and often unpredictable agents in the recolonization of territory.

Operation Portuguese Rhino

By 1964, news of Operation Rhino had spread locally and internationally, and a team from Mozambique travelled south to Natal to learn about wildlife capture and translocation. Consisting of two veterinarians and game ranger José Lobão Tello, this team submitted a detailed report to Mozambique's Department of Veterinary Services, which held responsibility for wildlife conservation in the Portuguese colony. Their report outlined the process of immobilizing rhino, zebra, and buffalo in the vicinity of the Umfolozi Reserve, illustrating these encounters with a series of photographs (de Sousa Dias and da Silva e Costa 1964) (Figures 2–4).



Figure 2. Operation White Rhino, Alexandre Herculano Garcia de Sousa Dias and Amadeu Candido da Silva e Costa, Captura de Animais Selvagens: Relatório de uma viagem de estudo a algums reservas de caça do Natal (Africa do Sul) [Wildlife Capture: Report on a study trip to some Natal game reserves (South Africa)], 1964. 'Fauna' files (unpublished documents), Relatorios. Veterinary Faculty Library, University of Eduardo Mondlane (UEM). Reproduced with permission of the UEM Veterinary Faculty.

Three years after this study visit, Fernando Paisana, Director of Veterinary Services in Mozambique, and Alexandre de Sousa Dias, head of the department's Fauna Division and co-author of the report on the study visit to Natal, spearheaded the introduction of white rhinos into Mozambique (Tello 1972, 106). The initiation of 'Operation Portuguese Rhino', as these translocations were branded by some Natal Parks Board staff, took place through diplomatic channels, by way of a formal request from the Portuguese Consulate in Pretoria and between the provinces' respective conservation agencies (NPB files, Applications for Rhino). In April 1967, Ian Player and Natal Parks Board technical officer David Wearne travelled to Mozambique's capital, Lourenço Marques, to discuss the 30 rhino requested by the Portuguese Consulate for reintroduction to Gorongosa National Park and the Maputo Elephant Reserve. In his report on the visit, Player noted, '[S] hould it ever become necessary to move any more surplus rhino, we will have no difficulty in getting rid of them to the Portuguese' (NPB files, Applications for Rhino).

Although the Mozambican authorities were eager to relocate rhinos to both protected areas in 1967, only the Maputo Elephant Reserve received rhinos from the Natal Parks Board that year. The reserve had been created in 1932 for the protection of elephants (Legislative Diploma No.



Figure 3. Operation White Rhino, Alexandre Herculano Garcia de Sousa Dias and Amadeu Candido da Silva e Costa, Captura de Animais Selvagens: Relatório de uma viagem de estudo a algums reservas de caça do Natal (Africa do Sul) [Wildlife Capture: Report on a study trip to some Natal game reserves (South Africa)], 1964. 'Fauna' files (unpublished documents), Relatorios. Veterinary Faculty Library, University of Eduardo Mondlane (UEM). Reproduced with permission of the UEM Veterinary Faculty.



Figure 4. Operation White Rhino, Alexandre Herculano Garcia de Sousa Dias and Amadeu Candido da Silva e Costa, Captura de Animais Selvagens: Relatório de uma viagem de estudo a algums reservas de caça do Natal (Africa do Sul) [Wildlife Capture: Report on a study trip to some Natal game reserves (South Africa)], 1964. 'Fauna' files (unpublished documents), Relatorios. Veterinary Faculty Library, University of Eduardo Mondlane (UEM). Reproduced with permission of the UEM Veterinary Faculty.

343, 23 April 1932), and although it had no official name, this was how it was commonly recognized. Over two periods of translocation, first between May and December 1967 and then between November 1969 and March 1970, 59 white rhinos were captured and relocated across Natal's northern border and into southern Mozambique's elephant reserve (Tello 1973, 43). In his book *The White Rhino Saga*, published in 1972, Ian Player relayed the following regarding these reintroductions. Of all the areas we reintroduced rhino to, the greatest thrill was seeing a group of white rhino grazing on the undulating grass dunes of Maputa [sic] Elephant Reserve. Beyond them was the dark blue of the Indian Ocean and I could hear the breakers pounding on the reefs. It was over the long golden beaches that survivors from wrecks walked to Lourenco Marques. I imagined they would have seen the white rhino in similar surroundings. We had brought back life to this paradise that had slept for so long. (239)

Although the reserve's elephant population had been long recognized as an integral part of this landscape, Player saw the reserve as lifeless before rhino returned to it, linking the revitalization of this reserve to the process of species reintroduction.

While these translocations were successful in returning a lost species to this part of Mozambique, not all of the animals survived, and several migrated back out of the reserve. Of the 59 animals relocated to the Maputo Elephant Reserve between 1967 and 1970, 21 had perished by 1973. Seven had gotten bogged in the reserve's swamps, five had suffered fatal reactions to tranquilizers or transport, three were killed by local people, two were found dead soon after being released from their bomas, one was killed in its boma by another rhino, and three drowned (Tello 1973, 43). Two of the rhinos that drowned had been frightened by elephants that broke down their boma fences. Unaccustomed to sharing territory with these pachyderms, the rhinos ran all the way into the Maputo River to escape them (Tello 1973, 44). Of the surviving 38 animals, many moved out of the reserve through parts of the fence that had been pulled down by elephants, cattle, or people. This usually occurred in the days following their release when they were disoriented and looking for an area to settle (Tello 1973, 44). Some were reported to have travelled all the way back to Natal. In September 1970, Ranger G. W. Schütte investigated sightings of a rhino east of Ndumo Game Reserve. He relayed the following in his monthly report to the Natal Parks Board:

I went out and found this Rhino bull staying with a herd of cattle in that area of open country Ilalapalm at Pelindaba. Apparently he had been with the cattle for three days. The local natives seemed very worried about this animal as they didn't know what it was. Since then it has moved into the bush country ... A further white rhino is living along the International fence east of the reserve. Both these rhino probably came from the Maputo reserve. (NPB files, Rangers' Reports)

Another rhino travelled south along the coast to Ponta do Ouro near the South African border. According to Ian Player, this rhino charged the local lighthouse; he called it 'a rhino Don Quixote' (1972, 239). As with the rhinos relocated to Ndumo Game Reserve, those transferred to the Maputo Special Reserve did not always settle peacefully into their new surroundings. This historic rangeland boasted unfamiliar species and environments that quickly halted the habituation of some of its new residents. While the species was indigenous to this area, individual rhinos were not.

Those that survived and thrived within the Maputo Elephant Reserve's boundaries became an important tourist attraction for this protected area. Two years after the first translocation of these animals into the reserve, it was officially designated the Maputo Special Reserve, to be more inclusive of its diverse residents (Legislative Diploma No. 2903 and Ordinance No. 22 314, 9 August 1969). Mozambique's weekly magazine *Tempo* touted the thrill of a photographic safari with these new inhabitants (Lopes 1970), and travel agencies in Lourenço Marques began advertising day trips to the 'elephants, hippos, and rhino's paradise' (Figure 5). The white rhino population continued to grow in this reserve after Mozambique became independent in 1975. In an interview, former ranger Baldeu Chande estimated that by 1983 the Maputo Special Reserve's white rhino population had grown to 84.



Figure 5. Advertisement. Albatroz, Maputo Game Sanctuary, Daily Excursions. 'Fauna' files (unpublished documents), Relatorios. Veterinary Faculty Library, UEM. Reproduced with permission of the UEM Veterinary Faculty.

Media reports of relocations of Natal's rhinos to Mozambique evoked strong opinions from some South Africans regarding the ethics of rhino relocation and the standards to which this process should be held. One wrote to the Director of the Natal Parks Board in August 1967 after hearing a false report that only one rhino had been transported to Mozambique.

Dear Sir,

We were very distressed to hear, on the radio, that there is a solitary white rhino, which was given to [Portuguese East Africa]. He has had several fights with others, and now he's to live alone, down by the sea, near a lighthouse.

It must be misery for the poor creature. I don't think <u>one</u> should ever be sent away by itself. Can nothing be done, now, to get this rhino back, or to send another down, and take some very definite steps to see that they are properly settled?

I shouldn't think the Portuguese care a [rap]. It was a pity that this animal should have been sent alone, as a gift. I would be very grateful to hear the sequel to this news. (NPB files, Applications for Rhino)

In prodding for this animal to be 'properly settled', this concerned citizen assumed a certain level of intervention was needed to ensure the rhino's well-being. Furthermore, he connected this quality of care to national standards, implying that the Portuguese would not share South African interests in the rhino's welfare. As a gift to the Portuguese, this rhino was not seen as repatriated to its former rangeland but as displaced from where it belonged.

In 1969, two years after the first rhino translocations into the Maputo Special Reserve, it was reported in the southern African wildlife magazine *African Wildlife* that rhinos would finally be moved into Gorongosa National Park in central Mozambique ("White Rhinos for Mozambique" 1969). Dr Havenga, a physician from Bloemfontein, wrote to the editor of the magazine expressing his concern that the white rhino may have never occurred as far north as the Gorongosa region, which he characterized as 'bush forest', more tropical and with wetter savannahs than the more temperate 'bushveld' found further south. He mentioned two other species, the giraffe and tsessebe, common in the bushveld but not bush forest that he feared might also be introduced to Gorongosa. He wrote, 'The introduction of alien species to this wonderful 'Nature Park' can only tend to change it into a large Zoo' (Havenga 1970).

In response to Dr Havenga's letter about Gorongosa's rhino relocations, W.F.H. Ansell of Northern Rhodesia's game department and Rudolph Bigalke, former director of the National Zoological Gardens of South Africa, wrote their own letters to African Wildlife's editor citing a rhino photographed in 1935 as evidence that white rhino did exist in the vicinity of Gorongosa National Park, though neither could confirm that it was ever resident inside the park's presentday boundaries ("Distribution of White Rhino" 1970). The rhino they cited was perhaps the last photographed before Mozambique's white rhino went extinct during the 1940s and for the first time in the twentieth century (Sidney 1965, 61). This bull had been shot between Gauveia and Macossa at the foothills of the Gorongosa Mountains. South African ecologist and former Ndumo game ranger Ken Tinley was working in Gorongosa on establishing the ecological boundaries of the park when Mozambique's Department of Veterinary Services was planning the rhino relocations. He determined that the Macossa area had similar terrain to Umfolozi, the white rhino's 'last stronghold', and that the species had occurred throughout central Mozambique prior to its extinction from the area (Tinley 1977, 136). In his letter, Ansell noted that although Havenga was incorrect regarding the past distribution of white rhino in Gorongosa, he was 'of course quite right to deplore the introduction of exotic wild animals into national parks, which should provide for the perpetuation of the indigenous fauna and flora' (1970, 259).

There are conflicting reports on the number of rhino that were finally reintroduced to Gorongosa in 1970 (Figure 6), as well as their outcomes on arrival, though there is consensus that none survived very long. Reports vary as to whether the national park received 6 or 12 animals in the early part of the year (Vincent 1970, 73; Tinley 1977, 136). Gorongosa has never been fenced, so it is possible that they may have simply walked out of the park's boundaries, leaving the park's rangers unaware of their whereabouts. Like some migrants to Ndumo and the Maputo Special Reserve, the rhinos might have drowned in the park's waterways. While I could find no official record noting the outcomes of these animals, Paul Dutton, an ecologist whose career, like Ken Tinley's, included time with both the Natal Parks Board and Mozambique's Veterinary Services, is certain that at least some of the white rhinos brought to Gorongosa were eaten by lions (Paul Dutton, personal communication). At the time, Gorongosa's lions were the park's principal



Figure 6. '1st Operation Rhino for Gorongosa National Park'. Dated 7 April 1970. From the archive of Armando Ròsinha, former warden of Gorongosa National Park. Courtesy Dr Samuel Bila, Veterinary Faculty, UEM.

attraction; particularly famed were a pride that had claimed an abandoned house, presenting a picture of domestication to Gorongosa's visitors. According to Dutton, the lions may have taken advantage of the docile nature of the imported white rhinos and their relative inexperience with large predators, as the lion population in Umfolozi at the time only numbered in the tens (Anderson 1981, 111).

The black rhino had survived the big game hunts that had exterminated white rhino from central Mozambique in the first half of the twentieth century, and herds were still probably located in the vicinity of Gorongosa in the 1960s when white rhino were reintroduced. However, the population was sparse, and some rangers believed they were already extinct from the park's boundaries (Ròsinha 1970, 168). In 1969, Ken Tinley's report on the ecological limits of the park was presented to the government with a bulletin from the Department of Veterinary Services illuminating that one of the proposed boundary alterations in Tinley's report was intended to include an area 'where rhinoceros are said to have been seen, a species we certainly wish to include in the park's faunistic heritage' (Ròsinha 1989, 229).

All of Mozambique's rhinos were killed during the armed conflict that followed the country's independence from Portugal in 1975. Whether or not there were black or white rhino in the vicinity of Gorongosa that survived in the early 1970s, none were ever seen again. And although the Maputo Special Reserve population had doubled by the early 1980s, all were casualties of the armed conflict or opportunists looking to take advantage of lawlessness in these areas. Paul Dutton saw the last one shot from a helicopter in the mid-1980s while he was taking school children on a tour of the reserve (personal communication). Where Mozambique had once been seen as an ideal destination for Natal's surplus rhino, from the 1980s it became a dangerous place for errant animals crossing the border.

Conclusion: making new Rhinostans?

In response to a misleading article suggesting that the Natal Parks Board was giving rhinos away for free in the 1960s, the Natal Parks Board received several requests for these animals, including one from a nine-year-old boy living in Brookfield, Wisconsin (NPB files, Applications for Rhino). After describing how well he would both look after his rhino and furnish it with a 'good name', this young rhino enthusiast concluded his letter by stating, 'I hope I am not too late to get and keep a rhino'. In imparting the news that rhinos were not actually being distributed so freely, the Natal Parks Board public relations officer sent the boy 'a copy of a booklet though [sic] which will give you some idea of the type of country in which these animals live'. Although this response reveals a certain practicality with which the Natal Parks Board was designating new homes for its surplus rhinos, it also demonstrates that a clear preference existed for keeping rhinos in environments that resembled their native habitats, even though some of the zoo enclosures to which rhinos were relocated may not have differed significantly from what this young American was hoping to create. While Ndumo, Gorongosa, and the Maputo Special Reserve had an easier time getting rhinos, even for the conservators of these protected areas, keeping them was no easy feat. Some wandered outside their boundaries, others succumbed to unfamiliar aspects of these environments, and others to illegal poaching.

Although South Africa's white rhino population has increased dramatically since the 1960s, new threats to both black and white rhinos have led to new calls to rehome rhino populations. Demand for rhino horn to treat a host of ailments in Asia has fuelled a growing illegal trade. This is supported on the ground in South Africa by the country's relatively large supply of rhino coupled with endemic poverty and a lack of job opportunities (Milliken and Shaw 2012). In 2014, a record 1215 rhino were killed illegally (DEA 2015). One of the most recent schemes to address this problem is the relocation of rhino to safer locations as insurance against extinction. A project led by andBeyond and Great Plains Conservation, luxury safari tourism operators, is already underway to translocate 100 rhinos from South Africa to Botswana, a country which has had fewer poaching incidents than South Africa. According to the Rhinos Without Borders website, a quarter of the animals have already been translocated. Similarly, The Australian Rhino Project, founded by a former real estate agent who emigrated from South Africa in the 1980s, is planning to 'airlift' six rhinos to Australia. These rhinos will act as a genetic seed bank from which rhino would eventually be returned to their continent of origin; the project's website states, 'The clear understanding being that the rhinos or their progeny will be introduced into Africa - not necessarily South Africa - once the situation stabilises'. Interestingly, the rhinos will remain the property of the South African government (Sydney Morning Herald, 14 February 2016). Like Operation Rhino, these initiatives are intended to protect and expand the species. However, where Umfolozi's rhino population in the 1960s was too large for its habitat, the issue now is that existing rhino habitats in South Africa cannot keep their populations stable due to global market demands.

Over the course of Operation Rhino, Mozambique was seen as an ideal destination for surplus animals. In addition to Player's assertion that surplus rhinos could easily be sent across Natal's northern border, Lobão Tello, a key figure in Mozambican conservation, noted that the Maputo Special Reserve was not only invaluable for the species that existed within it, including the recently reintroduced white rhinos, but that it could 'be used for the reintroductions of those plant or animal species in danger of extinction in other areas' (1972, 102). Where Mozambique was once considered a possible sanctuary for wildlife, and rhinos in particular, it is now considered dangerous territory and a hotbed for poaching and the illegal wildlife trade. In 2013, reports that the last rhino in Mozambique had been killed caused international uproar (IFAW, 26 April 2013). With the destruction wrought by the country's armed conflict, it was suggested in 1990 that Mozambique

had the 'dubious distinction' of overseeing the extirpation of the same species twice in one century (Skinner and Smithers 1990, 568). The most recent extirpation would be the third. However, it is worth noting that the latest victims did not originate in Mozambique but were moved from South Africa's Kruger National Park into Mozambique's Limpopo National Park in 2006 as part of the development of the Great Limpopo Transfrontier Park, spanning both countries. Even if they had been 'Mozambican', they still would have been descendants of the same Umfolozi stock as those in neighbouring Kruger, complicating notions of belonging related to their provenance. In an effort to expand responsibility for the protection of rhinos, and natural heritage, across national borders, South Africa and Mozambique recently signed a Memorandum of Understanding on biodiversity conservation and management (*Sunday Independent*, 4 May 2014).

Despite their persistence in conservation practice, the utility of categories of indigeneity is being challenged from both the hard and social sciences (Chew and Hamilton 2011). Conservationists are beginning to emphasize a species' functions in an ecosystem over its origins when making decisions about whether and where it should be reintroduced (Davis et al. 2007). Simultaneously, notions of 'belonging' seem to be side-lined the closer to extinction a species becomes, when the creation of seedbanks or strongholds becomes more pressing than rangeland integrity. Zoologist Philip Seddon argues that 'we are moving ... away from the almost sole reliance on the rigid and often flawed dictates of historical species distribution records, toward the inclusion, where appropriate, of more aggressive and risky intervention that will be required to respond to ... anthropogenic impacts' (2010, 796). Efforts to relocate rhinos to places as far from their historic range as Australia reflect this increased palatability of 'assisted colonizations'.

Translocations play a major role in wildlife conservation and are employed for a variety of reasons, including improving genetic diversity, restoring populations, transporting animals to private land owners, and for relocating species when protected areas are failing to provide them with adequate protection. As demonstrated in this article's exploration of some of the outcomes of Operation Rhino migrations, wildlife translocations have not always seen animals successfully supplanted in new locales. Exploring the outcomes of translocations allows for an investigation into how animals have adapted to historic rangelands or rejected them. Adams has pointed out the 'irony in the whole idea of capturing wild species in order to save them' (Adams 2004, 137). This echoes the larger irony in managing *wild* life in protected areas. Categorical boundaries between wildness and domesticity become increasingly convoluted when investigating the ways that wild animals have either made themselves at home in these new (old) territories or have not. This exploration of wildlife translocations demonstrates the process of place-making in protected areas to entail a constant tension between political pressures, human ideas about non-human nativeness, and the behaviour of animals that assert their preferences regarding where they belong.

The rhinos relocated by Operation Rhino often responded to their new environments in unpredictable ways, sometimes contingent on the time, place, and circumstances of their migration. Whether auto- or assisted colonizers of territory, animals have not just been passive objects of wildlife conservation projects; they have occupied, traversed, transgressed, escaped, and settled into the protected areas they have been deemed to belong to. Although the image of African rhinos grazing in the Australian outback in an open-range zoo may upset some of our sensibilities about where these species belong, the translocated animals may have no trouble making themselves at home.

Acknowledgements

Many thanks to my doctoral committee members for their comments on the dissertation chapter from which this article was developed. Thanks are also due to participants at the 2014 World Congress of Environmental History who intently listened and responded to an earlier version of this paper and to the two anonymous reviewers who provided constructive feedback.

Disclosure statement

No potential conflict of interest was reported by the author.

Funding

This work was supported by a Graduate Fellowship for International Study from the Institute for International Education and a Mellon Fellowship from the University of Minnesota's Interdisciplinary Center for the Study of Global Change.

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