RESEARCH BRIEF 12/2020

Security Institute for Governance and Leadership in Africa

SIGLA @ Stellenbosch

Author: MG (ret) J. Jooste (Dept of Environmental Affairs)   **Series Editor**: Prof F. Vreÿ (SIGLA)

Green security in South Africa: Governance through soft and hard security measures

Background

The UN's Sustainable Development Goal 15 (SDG15) frames the impact of humanity on species extinction and the need to counter this threat to preserve species diversity. The UN-focus is mirrored in Goal 7 of the African Union's AGENDA 2063 providing for outcomes on the environment and climatic matters. Regional arrangements in support of AGENDA 2063 are critical and in this vein, SADC's Regional Biodiversity Strategy guides SADC member states on environmental and biodiversity protection. Africa is the last continent where one can view certain animal species in their natural habitat, but one severely threatened by criminal intrusions. Expression of SDG 15, AGENDA 2063 and SADC's strategy inform how South African authorities implement programmes to prevent species extinction. Protection of South Africa's rhino population serves as a leading example of national efforts to support international and regional aspirations with the Kruger National Park (KNP) housing the flagship anti-rhino poaching programme.

Discussion

Wildlife crime is the fourth largest internationally organized crime in the world and one fuelling the escalation of poaching in Africa. Increased slaughtering of rhinos in South Africa added a new dimension to this scourge over the past decade and more specifically in the KNP, home to about 30% of the world's population of this unique two-ton animal of pre-historic origin. The rhino campaign is now in its tenth year and has seen the loss of about 9000 rhinos in SA, almost half of them in the KNP.

Whilst strategic solutions to address this problem continue, law enforcement in protected areas has taken on a whole new dimension. In KNP and elsewhere, this manifested in an expensive and protracted para-military approach to contain the situation. These steps were taken to fulfil the mandate to "protect" and derive from the National Environmental Management Act 107 of 1998 (as amended) and a number of specific Environmental Management Acts in particular the National Environmental Management Protected Areas Act. These Acts give effect to the Constitution, which requires protection of the environment for the benefit of present and future generations through reasonable legislative and other measures. The constitution thus directs SANParks to do full spectrum law enforcement to offset the lack of capacity in other law enforcement agencies who arguably should lead combatting illegal trade in wild fauna and flora.

The escalating demand in consumer countries ensures a lucrative black market trade that increases pressure on resources to combat this strand of organized crime. Simultaneously, it emerged that other facets of the national strategy such as biological management, community projects, responsive legal actions, and demand reduction, will only have a direct impact over the medium to long term.

The initial response at the turn of the decade was incremental, mostly reactive and short term focused. This included a focus on better training and equipment for an increased field ranger force. Although the poaching

escalated from about 2008, it remained unclear what would happen over the next few years and the subsequent long pathway to today's more integrated South African approach to combat wildlife crime and corruption.

During 2012 rhino poaching peaked and caused political and organizational concerns at all levels of government and in SANParks circles. Subsequently, rhino poaching was declared a priority crime and SANParks took a bold decision towards the end of 2012 to opt for a para-military approach. This was not a popular decision with all stakeholders as the shift included the employment of ex-military staff. From 2013 to 2015 with the acceptance of a formal Environmental Asset Protection (EAP) strategy within the context of Environmental Asset Management (EAM), community projects and biological management of the rhino population received due attention. This strategy later significantly influenced national plans and strategies and became the basis for the Concept of Operations that was subsequently developed alongside a three-year capability plan. The ranger corps was transformed into an Anti-Poaching Unit and expanded into Ranger Services with one hundred and fifty more rangers, including an Air Wing, a Canine Unit, Special Rangers and an Environmental Crime Investigation (ECI) unit. Concurrently infrastructure was developed in the KNP to accommodate and support the Ranger Services with ranger wellness becoming a primary focus, as did integrity management in the staff component.

After ten years of implementing various strategies and campaigning against relentless rhino poaching by local poachers and organised by crime syndicates, South Africa could lower rhino losses by about 25%. This is a moderate win, but it allowed time for other interventions such as biological management. This is by no means a victory as law enforcement agencies from all relevant state departments, with support from the private sector, have been drawn into an inevitable war of attrition. Command and control were formalized in a Mission Area Joint Operation Centre (MAJOC) to plan and control ongoing operations alongside other participants i.e. SA National Defence Force (SANDF) and SA Police Services (SAPS). Progress with enforcement is unfortunately offset by threat displacement to other areas in South Africa and neighbouring countries whenever poaching is stifled in any one area.

The threat remained severe and persistent requiring larger numbers of rangers to arrest and ultimately stop the growing poaching wave. Limited resources thus had to be deployed more intelligently to facilitate early warning, detection, and tracking. Technology became one pathway to optimize existing ground intelligence. A technology road map developed with the support of the Council for Industrial and Scientific Research (CSIR) guided the acquisition of technologies to enhance surveillance, early warning, detection and tracking (SEDT) within a layered approach. The technology turn culminated in the unique CSIR-developed C-MORE system to give expression to the SEDT approach.[1] The philosophy behind this remains that "*technology makes things possible, only people make it happen".* As this pioneering work was undertaken, the force multiplying effect of appropriate technology emerged more clearly, even though about 20% of new projects failed to produce anticipated results.

Summary

South Africa's rhino protection programme resonates with international and regional conventions on species protection, but its physical execution rests on local knowledge, interdepartmental cooperation and home-grown technological systems to optimize the role of available human resources. The KNP resides at the core of this programme and is as a testing ground for the pioneering thought that underpins the para-military approach, the development of additional response capabilities and bringing in technological systems to contain the threat and direct the overall programme. While the verdict is out whether the rhino protection programme is ultimately successful, the South African approach enjoys recognition as an inventive African initiative, national will to protect a vulnerable species, tolerance for extraordinary measures and experimenting with expensive technologies to protect the rhino for current and future generations.

Major General (ret) Johan Jooste is the Project Manager: Environmental Law Enforcement and Security, Department of Environmental Affairs, South Africa.
E-mail: jjooste@environment.gov.za

---

[1] The specific technologies and capabilities are not available in the public domain at the moment.