

**INVESTIGATING LOCAL PARTICIPATION IN TOURISM AND THE  
PROTECTION OF BLACK RHINOS IN NORTH-WESTERN NAMIBIA: A CASE  
STUDY OF //HUAB CONSERVANCY**

**by**

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## **DECLARATION**

I, Andrew Russell Malherbe (35067284), hereby declare that: *Investigating local participation in tourism and the protection of black rhinos in north-western Namibia: A case study of //Huab conservancy*, is my own work and that all the sources that I have used or quoted have been indicated and acknowledged by means of complete references.

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Signature

(Mr AR Malherbe)

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Date

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My supervisor, Doctor Mavhungu Musitha deserves heartfelt appreciation and thanks for keeping me going with words of encouragement and sound advice during what has been a long and often difficult journey. Thank you, Doc Musitha!

To the men and women at Save the Rhino Trust; You are the glue that keeps rhino conservation together in a challenging landscape and it is an honour to be a part of the team.

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To my mother, father, and sister; your support means the world to me and although we live far apart, you are always in my thoughts.

## **DEDICATION**

To the people of north-western Namibia and specifically the residents of //Huab conservancy - living and farming alongside wildlife - without your commitment, the amazing story of rhinoceros roaming free on communal land would only exist in our imaginations. A quote from one resident of //Huab says it all:

*'These are animals from the land, they must stay here because our children must also see them in the future'* -//Huab Conservancy member

Finally, to Kai, James and Sonjē. I am because you are. I dedicate my work to you,  
always.

## **ABBREVIATIONS**

**AfRSG:** African Rhino Specialist Group

**AGM:** Annual General Meeting

**CAMPFIRE:** Communal Areas Management Programme for Indigenous Resources

**CBNRM:** Community Based Natural Resource Management

**CBT:** Community Based Tourism

**HID:** Human Induced Disturbance

**IRDNC:** Integrated Rural Development and Nature Conservation

**IUCN:** International Union for the Conservation of Nature

**JV:** Joint Venture

**MEFT:** Ministry of Environment, Forestry and Tourism

**NACSO:** Namibian Association for CBNRM Support Organisations

**NNF:** Namibia Nature Foundation

**SDG:** Sustainable Development Goals

**SRI:** Save the Rhino International

**SRT:** Save the Rhino Trust

**WCED:** World Commission on Environment and Development

**UN:** United Nations

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## **ABSTRACT**

*Globally, poaching has been identified as one of the most urgent threats facing rhino conservation. In the communal lands of north-western Namibia, the loss of the unique desert-adapted black rhino population would have significant economic and environmental consequences. Rhino tracking tourism has provided steadily increasing financial and conservation returns to Namibian communal conservancy residents for over a decade. However, little is known about local perceptions of rhinos and rhino-based tourism. This study aims to contribute to a growing school of thought that promotes the role of local people in wildlife conservation and sustainable development in rural areas.*

*Using a mixed-method approach for data gathering, a total of 48 conservancy members were interviewed at their homesteads in //Huab conservancy, north-western Namibia. Thematic analysis was employed to establish recurring themes in qualitative answers. Findings show that cash payments to conservancies may not be the best method of distributing benefits from tourism. In addition, low levels of basic knowledge about the tourism enterprise and the conservancy in general highlight governance challenges. Despite this, the study found that rhinos are favourably perceived by the residents of the conservancy and that tourism is seen by conservancy members as a positive driver for rural development in the area and has the potential to reduce poaching.*

*The study concludes that the transfer of ownership over wildlife to rural people can be an effective mechanism to drive positive environmental and social outcomes, in line with United Nations Sustainable Development Goals. It is important to note, however, that challenges such as poor governance persist. Adaptive management and flexibility should therefore feature prominently in the implementation of community-based natural resource management initiatives.*

## **KEY TERMS**

community-based natural resource management, conservancies, good governance, participation, sustainable development

## ISISHWANKATHETO

*Kwihi labathi liphela, ukuzingela ngokungekho mthethweni kubonwa njengesona soyikiso sikhulu sijongene nolondolozo lwemikhombe. Kumhlaba wabantu okumNtla Ntshona weNamibia, ukutshatyalaliswa kwemikhombe emnyama edalelwe intlango isaya kuba neziqhamo ezibi kwezoqoqosho nakwindalo esingqongileyo. Kweli shumi leminyaka lidluleyo ukhenketho lokulandela imikhombe luze nengeniso ethe chu kuqoqosho nakwindalo esingqongileyo kwaye kuyabanceda abantu abahlala kwimimandla yolondolozo lwendalo kawonkewonke yaseNamibia. Noxa kunjalo, luncinci ulwazi olukhoyo malunga nezimvo zabantu bendawo ngemikhombe nangokhenketho olusekelwe kwimikhombe. Esi sifundo sjolise ekuncediseni umdla okhulayo ekukhuthazeni indima edlalwa ngabantu bendawo kulondolozo lobomi basendle nophuhliso oluzinzileyo kwimimandla yasemaphandleni.*

*Kuqokelelwe iinkcukacha zolwazi ngokusebenzisa iindlela zophando ezixubeneyo, kwadliwana iindlebe namalungu angama-48 omphakathi weendawo zolondolozo kumakhaya awo, kwindawo eyaziwa ngokuba yi //Huab, kumNtla Ntshona weNamibia. Kwenziwa uhlalutyo ngokwemixholo ekuveliseni imixholo ethe gqolo kwiimpendulo ezidaleka ngokuzathuza. Kwafunyaniswa ukuba ukuhlawula imali kwimimandla yolondolozo ayingebi yeyona ndlela ilungileyo yokunceda ephuma kwezokhenketho. Ngaphezulu, kukho umngeni kwezolawulo odalwa ngumgangatho wolwazi osezantsi ngorhwebo lokhenketho nangolondolozo ngokubanzi. Ngaphandle koku, esi sifundo sifumanise ukuba imikhombe iyathandwa ngabantu bendawo, kwaye amalungu eendawo zolondolozo alubona ukhenketho njengendlela eyiyo yokuqhubela phambili uphuhliso lwamaphandle, kwaye lunakho ukunciphisa ukuzingela ngokungekho mthethweni.*

*Olu phando lugqibe kwelokuba ukuba abantu basemaphandleni bangenziwa abanini bendalo yasendle oku kunganezipumo ezihle kulondolozo lwendalo nakwezentlalo jikelele, kwaye oko kungafezekisa iinjongo zophuhliso oluzinzileyo phantsi kwenkqubo yeUnited Nations Sustainable Development Goals. Noxa kunjalo ke, kubalulekile ukuqaphela ukuba isathe gqolo imingeni efana nolawulo olubuthathaka. Ngoko ke kufuneka kuqiniswe ulawulo*

*olulungiselelwe noluhambelana neemeko zeendawo xa kusungulwa amalinge okulawula indalo nasekelwe kubantu bendawo.*

## **ISIGAMA ESIPHAMBILI**

Ulawulo lwendalo olusekelwe kubantu bendawo, imimandla yolondolozo lwendalo, ulawulo olululo, ukuthatha inxaxheba, uphuhliso oluzinzileyo

## **OPSOMMING**

*Wildstropery is regoor die wêreld geïdentifiseer as een van die ergste bedreigings waarmee renosterbewaring te kampe het. Die verlies aan die uniek woestynaangepaste swartrenosterbevolking gaan aansienlike ekonomiese gevolge sowel as omgewingsgevolge op die kommunale gronde van noordwestelike Namibië hê. Toerisme wat spesifiek op die opsporing van renosters toegespits is, het vir langer as 'n dekade in toenemende mate 'n finansiële opbrengs sowel as opbrengste vir bewaring aan die inwoners van die Namibiese bewaringskommune gelewer. Min is egter bekend oor plaaslike persepsies oor renosters en toerisme wat spesifiek op renosters gebaseer is. Hierdie studie het ten doel om 'n bydrae te lewer tot 'n groeiende denkriktig wat die rol van plaaslike mense in wildbewaring en volhoubare ontwikkeling in landelike gebiede bevorder.*

*'n Gemengdemetode-benadering van data-insameling is gebruik om onderhoude met 48 bewaringslede by hul huise in die //Huab-bewaringsgebied in noordwestelike Namibië te voer. Tematiese ontleding is ingespan om vas te stel watter temas herhaaldelik in kwalitatiewe antwoorde voorkom. Die bevindinge dui daarop dat kontantuitbetalings aan bewaringsgebiede dalk nie die beste manier is om die voordele te versprei wat uit toerisme verkry word nie. Bykomend hiertoe word bestuursuitdagings deur die lae vlakke van basiese kennis oor die toerismebedryf en bewaring oor die algemeen, beklemtoon. Afgesien hiervan, het die studie bevind dat die inwoners van die bewaringsgebied renosters in 'n gunstige lig sien. Bewaringsgebiedlede ervaar toerisme as 'n positiewe drywer van landelike ontwikkeling in die gebied, en ook dat dit die potensiaal het om stropery te verminder.*

*Die studie kom tot die gevolgtrekking dat die oordrag van eienaarskap van wild aan landelike mense 'n doeltreffende meganisme kan wees om positiewe omgewings- en sosiale uitkomste ooreenkomsdig die Verenigde Nasies Volhoubare Ontwikkelingsdoelwitte te dryf. Dit is egter belangrik om kennis te neem dat uitdagings soos swak bestuur steeds voortgaan. Adaptiewe bestuur en inskiklikheid moet daarom prominent in die implementering van gemeenskapgebaseerde natuurlike hulpbron bestuursinisiatiwe vertoon.*

## **SLEUTELWOORDE**

Gemeenskapsgebaseerde natuurlike hulpbronbestuur, bewaringsgebiede, goeie bestuur, deelname, volhoubare ontwikkeling

# **CHAPTER 1: INTRODUCTION AND BACKGROUND TO THE STUDY**

## **1.1 INTRODUCTION**

Since 2012, the rate of rhino poaching in national parks, commercial farms and communal conservancies in Namibia has increased exponentially, leading conservation NGOs and government departments to declare a ‘poaching crisis’ (Ministry of Environment, Forestry and Tourism 2015). In the Kunene Region of north-west Namibia, unchecked poaching of black rhino could cause the loss of millions of dollars in important tourism revenue to local and national actors (Naro et al. 2020). Added to this loss would be a significant reduction in the number of tourism related jobs and household income for residents in what is one of the poorest regions in Namibia (Namibian Association of Community Based Natural Resource Management Support Organisations 2018). Finally, the loss of north-west Namibia’s unique ‘Desert-adapted’ black rhino population would be a devastating blow to conservation in sub-Saharan Africa (Emslie et al. 2018).

The topic of this dissertation was developed to understand more about how rhino-based tourism might influence resident’s attitudes towards black rhinoceros in a community conservancy in north-west Namibia. A broader understanding of local perceptions could help inform future rhino-based tourism enterprises, securing both a future for rhinos and tangible benefits for the local communities that protect them. More broadly, improved understanding of local perceptions on tourism and rhinoceros could improve community-centered approaches to addressing wildlife crime, reducing poaching, and helping to diversify livelihoods. This study intends to contribute to a growing body of literature which advocates for more direct local community involvement in the prevention of wildlife crime in a development and conservation space. Ultimately, this approach could further the promotion of sustainable development in rural settings.

This chapter opens the study by providing a general background, followed by the problem statement and research objectives, situating this study in a national and international context. The chapter ends with a short discussion on ethical considerations.

## 1.2 BACKGROUND

In 1980 it was estimated that there were just under 15,000 black rhinos remaining in 20 African states. By 1992 this number had dropped to around 2,500 (Emslie 2020). These alarming declines can be attributed to black market demand which led to an increase in poaching in African and Asian rhino range states (Cooney et al. 2016).

Poaching of black rhinoceros is considered an international threat because it represents significant biodiversity loss. The loss of rhino would also impact other species as rhinos are known as a ‘keystone species’, integral for providing critical services such as maintaining a balance in the landscape through their browsing and grazing (World-Wide Fund for Nature 2021). Because of their high value for tourism, rhinos are also known as an ‘umbrella species’, securing conservation protection for the many species which share the landscape with them (Knight 2012).

In addition to the threat of biodiversity loss, the socio-economic impact - characterised by a reduced income from tourism and related businesses - would be significant (Biggs et al. 2013). Although recent reports showing a slight increase in the black rhino population offer cautious optimism (International Union for the Conservation of Nature 2020), the cost of protecting these animals from poachers has risen exponentially and the threat of poaching is ever present throughout areas where rhinos are found (Knight 2012; Mamba et al. 2020).

Situating this study within an international context, the United Nations (UN) has recognized the importance of engaging with local communities in the fight against wildlife crime. Sustainable Development Goal 15c directly refers to the need to increase the capacity of local communities to pursue sustainable livelihood opportunities as a mechanism to reduce illegal wildlife trafficking and poaching (UN 2015).

Linking this to conservation and sustainable development efforts in Namibia is the national Community Based Natural Resources Management (CBNRM) programme. The programme attempts to combine local empowerment, sustainable utilization of resources and access to benefits into a community-centered development paradigm embodied by communal conservancies and community forests (Jones et al. 2015; NACSO 2018). The Namibian programme has been in existence for more than 20 years and covers 165,182 km<sup>2</sup> of prime or potential wildlife habitat, making up more than 19% of Namibia's landmass (Namibia Nature Foundation 2017). Namibia now boasts more than 80 entities comprising more than 250,000 members, legally recognized, and registered as communal conservancies and community forests (NACSO 2018).

Although not without criticisms (Berkes 2004; Büscher, et al. 2012; Sullivan 2011), there have been impressive achievements in terms of wildlife recoveries in communal areas which can be directly linked to the inception of the Namibian CBNRM programme (Jones et al. 2015). However, as with any development-related activity, there is constant evolution and growth within the programme. This brings new challenges and opportunities.

Rhino poaching has recently been identified as one of the biggest challenges to the programme. Indeed, poaching has been identified as a major threat to rhinos worldwide (t'Sas-Rolfes 2011). Several communal conservancies in the north-west of Namibia have had black rhino reintroduced through an innovative 'rhino custodianship' programme, initiated by the Ministry of Environment, Forestry and Tourism (MEFT 2017). After the reintroduction, some conservancies set up rhino-based tourism activities through joint venture (JV) partnerships with private sector operators (Muntifering 2016).

This study will look at a particular case in Kunene, north-western Namibia where a rhino tourism activity has recently (2016) started to provide a regular income for a conservancy. The researcher was interested in understanding how the rhino tourism enterprise might influence conservancy member's attitudes towards rhinos and how the tourism activity itself might be improved or modified to better contribute to Sustainable Development Goal 15c

which seeks to reduce wildlife crime through helping local communities to diversify livelihoods.

### **1.3 PROBLEM STATEMENT**

In Southern Africa, poaching has been noted as one of the biggest threats to conservation of iconic species such as elephant, rhinoceros and lion (World-Wide Fund for Nature 2018). In north-west Namibia, after a long period without any black rhino poaching, a significant increase in poaching cases was reported from 2012 onwards, with a spike in cases occurring in 2014 and 2015. This increase occurred despite the Namibian government passing laws which have increased penalties for poaching and illegal wildlife trafficking (MEFT 2015).

The consequences of continued poaching are interlinked. Iconic species such as rhino and elephant provide much-needed alternative income for rural people in north-west Namibia and if there are no rhinos, less tourists visit the area which in turn reduces income to local people. This reduction in household income generated through activities such as employment at tourism lodges, tourism guiding and income from community/lodge joint venture partnerships could devastate already vulnerable households. At a national level, a decrease in tourism numbers and length of stay and spend to the region would have a knock-on effect to the economy, reducing an important source of government revenue.

Finally, if continued poaching leads to the eventual extinction of rhinoceros, the effect on sustainable development is irreversible. Sustainable development is defined as the use of resources in the present in such a manner that needs of future generations are not compromised (World Commission on Environment and Development 1987). Therefore, an unarguable and immeasurably negative consequence of extinction is that future generations will not be able to enjoy viewing rhino in their natural habitat.

With the above in mind, this study will serve to contribute to a growing body of literature which seeks to learn more about how tourism can be sustainably married to rural development and conservation and how local people can equitably benefit from these initiatives. Practical application of these concepts could help to eventually secure wildlife habitat, sustained local

employment and continued pride in the cultural heritage that iconic species such as black rhino impart on Africans living with wildlife.

## **1.4 RESEARCH AIM AND OBJECTIVES**

This section has been divided below into the general aim and specific objectives that the study set out to achieve.

### **1.4.1 General Aim**

The general aim of the study is to explore the dynamic at play between a private sector rhino-tourism business and the communal conservancy membership where it operates.

### **1.4.2 Specific Research Objectives**

According to Kumar (2011), study objectives are the goals which the researcher hopes to achieve at the end of the research process.

The specific objectives of this study are twofold.

Objective 1: To determine how rhino-tourism has impacted perceptions of conservancy members toward rhino conservation.

Objective 2: To understand the impact of tourism as a rural development tool.

## **1.5 SIGNIFICANCE OF THE STUDY**

Namibia is at the forefront of proposing a non-militaristic, community-centred approach to anti-poaching (Morias et al. 2015; Naro et al. 2020). This study could add weight to the argument for a more inclusive, social, and environmentally just approach to conservation; providing some insight to difficult questions related to benefit distribution at communal conservancies and the prevention of wildlife crime in rural areas. In addition, the research is in line with United Nations Sustainable Development Goal 15c which advocates for increased local community involvement in the conservation of natural resources (UN 2015).

In north-western Namibia, communities - through their recognised communal conservancies - have over the past ten years begun to set up rhino-focused tourism activities with an escalation of these activities taking place from 2014 onwards (Muntifering 2016). The dynamic between communal conservancies, private sector tour operators, conservancy members and rhino conservation is relatively new and unexplored. This was investigated through this case study which attempted to understand more about attitudes towards localised black rhino conservation and how the existing tourism partnership might be modified to further enhance rural development. This study constitutes a potential contribution towards sustainable development in that it seeks to understand more about how to ensure lasting benefits for local communities, the rhinos that live in these areas and private sector tourism operators.

## **1.6 DATA COLLECTION**

Data collection is defined as the process of capturing information on a phenomenon of interest (Kabir 2016; 202). Data collection took place during two separate field trips in September and October 2020. Data was collected from each participant individually during an open-ended, semi-structured interview, administered by the researcher and his trained assistant.

## **1.7 DATA ANALYSIS**

Creswell (2007) defines data analysis as the process of sifting through collected data to find patterns and linking patterns with the study's objectives. Thematic data analysis was used to identify and interpret patterns in the qualitative responses (Attride-Stirling 2001). This type of analysis is considered useful to reflexively analyse qualitative data and link emerging themes to the research question (Nowell et al. 2017). Quantitative data was analysed using an Excel spreadsheet and is presented in the form of graphs and tables through descriptive analysis. During data analysis responses were categorised according to major themes recurrent in the study such as knowledge of the tourism enterprise, perceptions on black rhinos and benefits received from the conservancy.

## **1.8 ETHICAL CONSIDERATIONS**

According to Walliman (2011; 171) ethics in social research is fundamentally concerned with causing no harm to other people, particularly participants in a study. In addition, conduct should be honest and wherever possible, beneficial (Babbie 2014). This study has attempted to achieve these guiding principles through actions outlined below.

### **1.8.1 Before and During the Study**

The questionnaire (Annexure 2) was approved by the University of South Africa (UNISA) ethics committee after which the Ministry of Environment, Tourism and Forestry (MEFT) was informed of the intention to conduct a survey in the conservancy. Finally, permission was obtained from //Huab conservancy management committee before field research commenced.

During the study participants were informed of the nature of the study and given the opportunity to decline to take part. The team made sure to observe social distancing guidelines necessitated by the Coronavirus Pandemic.

### **1.8.2 After the Study**

The researcher hopes that the study can be of practical value in assisting conservancy management and private sector tour operators to implement more inclusive and sustainable tourism activities.

## **1.9 CHAPTER LAYOUT**

This first chapter provided a broad introduction, summarising the main components of the study. The chapter provided the background to the study which led to the problem statement and the development of the study objectives. The importance of the study was discussed, emphasising the link between conservation and sustainable development in rural areas. Data

collection and analysis was discussed, and the chapter concluded with a section concerning how the study ensured that a high level of ethical integrity was established and maintained.

Chapter 2 comprises the main literature review discussion. Academic journal articles, books and other literature relating to wildlife crime and the efficacy of tourism as a rural development tool were consulted. Rhino poaching globally and then locally is discussed. An overview of the role that local communities can play in reducing wildlife crime is summarised. The Namibian rhino tourism story is discussed showing how rhino tourism has evolved with the help of enabling government policy. The literature review highlights the need for more targeted research to be conducted in this specific field, specifically around community perceptions on how tourism might be modified in order to become more equitable and impactful.

Chapter 3 provides a historical and theoretical background to Community Based Natural Resource Management (CBNRM). The genesis of the CBNRM programme as an integrated nature conservation and rural development mechanism is discussed within the southern African context, citing examples from Namibia's neighbouring countries. The Namibian CBNRM programme is discussed in more detail, noting current challenges and proposed responses.

Chapter 4 centres on the research design and methodology used to plan and conduct the research. The chapter begins with an overview of the concepts of research methodology and design and justifies the researcher's choice to use a mixed method approach to data collection. The chapter addresses the key concepts of reliability and validity and details the data gathering process as well as the study area. The chapter ends with a discussion on how the researcher dealt with ethical questions and how the research will be disseminated for practical use in the study area.

Chapter 5 focuses on the analysis and presentation of data obtained during the study. Data is presented in a thematic format using descriptive techniques. Some direct quotations from participants are included to cross tabulate findings and show a more nuanced representation of the participant's perceptions and attitudes.

Chapter 6 concludes the study by providing a summary of key findings presented in chapter 5. In this final chapter, unexpected findings are highlighted and suggestions for future research are discussed. Finally, the research findings are used to guide the conclusion and the development of recommendations.

## **1.10 DEFINITION OF KEY CONCEPTS**

The following key concepts are used regularly throughout this study and have been defined below for ease of reference:

- **Community Based Natural Resource Management** (CBNRM) is defined by Brunckhorst (2010; 16) as an engagement of citizens in a collective manner to work towards sustainable conservation and natural resource management through various tenure regimes
- **Conservancies** in the Namibian context are defined as common property resource management institutions which are legal entities recognised by the Namibian government where residents have user rights over certain hunttable game and tourism (Jones et al. 2015; 19)
- **Good Governance** in the context of CBNRM is defined as a social process attempting to achieve the agreed upon goals of the community in question through participatory, efficient, responsive, and equitable means (UNESCAP 2006; 3)
- **Participation** in the context of CBNRM is defined as the active involvement of all members of the community in having decision-making abilities over issues which affect them (Mulale et al. 2013; 98)
- **Sustainable Development** is defined as ensuring that utilisation of resources in the present does not affect the needs of those in the future (Brundtland 1987; 16)

## **1.11 CONCLUSION**

This chapter provided an introduction and orientation to the study. The increase in poaching in Namibia was discussed and the negative effects of the potential loss of iconic species to

both the national and local economy was highlighted. The community-centred approach to wildlife conservation and sustainable development in Namibia was touched upon and noted as the context in which the study took place.

The increasingly common school of thought which positions communities as being part of the solution to wildlife crime was noted as one of the main drivers for the researcher to conduct the study. The overall objective of the study was further broken down into the two primary research objectives. Methods and study design were presented and explained along with a note on ethical considerations. The chapter ended with a summary of each of the chapters found in this dissertation. The next chapter comprises a discussion on the illegal wildlife trade and sustainable development.

## **CHAPTER 2: SUSTAINABLE DEVELOPMENT AND THE ILLEGAL WILDLIFE TRADE**

### **2.1 INTRODUCTION**

A literature review is conducted to define key concepts used in the study, to establish gaps in literature which can be addressed by a new study and to understand how academic experts might agree or disagree on concepts relevant to the study (Denney & Tewksbury 2012). This chapter provides a summary of relevant literature which highlights current discourse on topics related to this study.

Wildlife conservation and its link to sustainable development are discussed first to provide a global perspective to the challenges surrounding this practice, highlighting international case-studies as successful examples linking these two themes. The chapter then outlines the status of rhinoceros populations globally in the context of an increase in poaching. Different responses to poaching are discussed, comparing a green militarised response to a more inclusive, community focused response. Community based tourism is defined and discussed with an emphasis on local participation as being fundamental to the success of this approach. The unique Namibian story of rhino-tourism in north-west Namibia is reviewed, noting that this is a relatively new phenomenon which warrants further investigation. The chapter ends with a critical evaluation of community based tourism.

Selected case studies which are considered successful in terms of species conservation and rural development are discussed in this chapter. These studies suggest that the involvement of local people in conservation and increased opportunities to benefit through tourism and business have helped to achieve a level of success in reducing the illegal wildlife trade and improve the livelihoods of local people (see table i below). During this case study participants were asked to shed light on how they believed rhino tourism in //Huab conservancy might be improved to contribute to their livelihoods. Key findings in this study which are related to this objective concur with what previous studies have found - including a desire by community

members to learn more about tourism and to have improved access to direct benefits and employment (Kavita & Saarinen 2015; Stamm 2017; Suich 2010).

## 2.2 WILDLIFE CONSERVATION AND SUSTAINABLE LIVELIHOODS

Sustainable Development Goal 15c states that it is important to: '*Enhance global support for efforts to combat poaching and trafficking of protected species, including by increasing the capacity of local communities to pursue sustainable livelihood opportunities*' (UN 2015).

According to the statement above, the United Nations has recognised the importance of engaging local communities in efforts to reduce the illegal use of wildlife. How might this be achieved? One way is through ensuring local communities benefit from their natural resources either through increased user rights, participation in management and/or access to cash through the establishment of community-based tourism enterprises (Jones 2010). Despite criticisms relating to implementation of CBNRM (see Chapter 3; 3.4.3), the approach has been recognised as a potential mechanism to further the objectives of SDG15c (Child 2019) and is of relevance here as this study is situated within the context of CBNRM in Namibia.

## 2.3 INTERNATIONAL CASE STUDIES

This section highlights international examples of the CBRNM approach. While we should be mindful of touting CBNRM as a one size fits all approach to complex questions and social interactions around user rights, benefits and conservation, the case studies noted in table i below illustrate that the approach has the potential to generate positive outcomes for people and the environment across ecosystems and cultural barriers. Across all three case studies, the common thread highlighted is community participation.

**Table i:** *International examples of CBNRM case studies*

| Country | Species | Method | Outcome | Commonality |
|---------|---------|--------|---------|-------------|
|         |         |        |         |             |

|   |                                      |   |   |  |
|---|--------------------------------------|---|---|--|
| <b>Nepal<br/>(Bhatta<br/>rai et al.<br/>2017).</b>                | Greater one-<br>horned<br>rhinoceros | Community<br>participation through<br>creation of ‘buffer-<br>zone’ groups which<br>are recognised user-<br>groups actively<br>involved in and<br>benefitting from<br>conservation in<br>Chitwan National<br>Park | 2011, 2013<br>and 2015<br>with no<br>recorded<br>rhinoceros<br>poaching   | Community participation in<br>management decisions has<br>led to a reduction in poaching<br>in the adjacent National Park  |
| <b>Columbia<br/>(Delgado<br/>&amp; Sierra<br/>Diaz<br/>2015).</b> | American<br>crocodile                | Community<br>involvement through<br>sustainable<br>utilisation of<br>resource – allowing<br>benefits to accrue to<br>local residents<br>through harvesting of<br>animals  | Community<br>management<br>has led to an<br>increase in the<br>population of<br>200% in a<br>specific area<br><br>Sustainable<br>utilisation has<br>led to policy<br>change and<br>development<br>of an industry<br>based on the<br>American<br>crocodile | Policy allowing community<br>participation through<br>improved user rights has<br>catalysed a new industry on<br>sustainable utilisation,<br>creating jobs and increasing<br>the population of the species |

|  |                         |   |  |  |
|--|-------------------------|---|--|--|
| <b>Madagascar<br/>(Randriam<br/>anampisoa<br/>&amp; Adams<br/>2015).</b> | Ploughshare<br>tortoise | Wildlife monitoring<br>system established<br>where local<br>residents are paid<br>incentives for<br>collecting data and<br>producing verified<br>sightings of<br>Ploughshare tortoise | 165<br>community<br>rangers<br>employed to<br>conduct patrols<br>and capture<br>data | Community participation in<br>species monitoring has<br>created employment |
|--|-------------------------|---|--|--|

These case studies (table i) show us that local communities and community participation are important in the global conservation effort and that this approach has the potential to achieve both impressive biodiversity conservation and rural development gains. The achievements outlined in these examples relate directly to this study which aims to understand more about local perceptions of rhinoceros and the impact of tourism as a sustainable development and conservation tool. The chapter now moves to discuss the poaching of rhinoceros first globally and then locally in the context of the north-west of Namibia where this study took place.

## 2.4 RHINO POACHING, THE CURRENT SITUATION?

In modern times, poaching has been defined as the illegal, lethal removal of wild animals from any specific area. Rhino poaching is the illegal hunting of rhinos, usually for the purpose of removing their horns (Gyimah 2016). For African rhino species, difficult access to the hinterland of Africa combined with undeveloped modes of shipping and transport conspired to keep rhino populations in Africa at reasonably robust levels for much of the pre-colonial period (Hann 2016). However, from the 19<sup>th</sup> century onwards, with the advent of high-powered rifles, improved transportation, and access to overseas markets, both black and white rhino populations in Africa started to plummet (Adams 2004).

Identifying the effect of the decline and a possible future with little or no wildlife in Africa, colonial powers recognised that the situation was unsustainable and began to institute corrective measures (Adams 2004). Wildlife conservation started to receive international attention and although their establishment was primarily aimed at securing hunting grounds for elite members of colonial powers, the first national parks were created in Africa (Fabricus 2004).

Fast-forward to 1977 and the Convention for Trade in Endangered Species (CITES) passed a ban on trade in rhino horn on the international market. The ban meant that any horn that would be traded henceforth between borders would be illegal, thus stimulating a black-market demand for the product (Biggs et al. 2013).

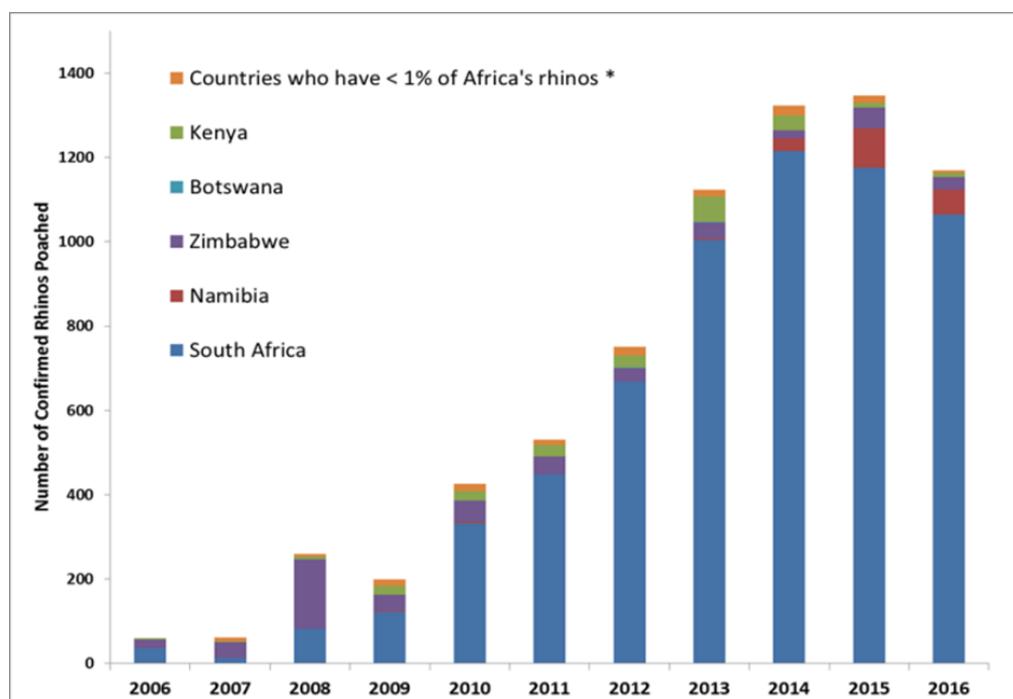
Rhino horn has several cultural and medicinal uses. In Yemen it is carved into traditional dagger handles, a practice which dates back centuries and is considered an important part of Yemini culture (Traffic 1997). Rhino horn is also a popular ‘heat-clearing’ drug in traditional eastern medicine and has more recently gained popularity as a status symbol in Vietnam and other Asian countries (Duffy et al. 2015; Rademeyer 2012). Adding further strength to the concept of rhino horn as a status symbol Gao et al. (2016) have suggested that – in the Chinese market in particular – rhino horn is not used primarily for medicinal purposes but rather as a collectable item. Horn is thus seen as an investment which increases in value as rhinos become less and less common. This shift away from the western-centric view of rhino horn use for medicinal purposes should allow conservationists to adapt demand reduction campaigns which are continuously implemented in east Asia (Gao et al. 2016)

The Javan rhino and the greater one-horned rhino in Nepal, India and Indonesia have undoubtedly been hardest hit by poaching and habitat loss (Emslie et al 2018). The Sumatran rhino remains critically endangered with an estimated total of between 40 – 78 animals remaining in 2018 (Emslie et al 2018). Encouragingly, in Nepal only two animals were reported as poached between 2011 – 2018 indicating a positive recovery for the greater one-horned rhino. Strong political will and the involvement of local communities are thought to

be drivers of this recovery as indicated in table i which outlines international examples of CBNRM success.

In Africa, home to the vast majority of rhinos, poaching rates across all range states have steadily increased since 2010. The African rhino Specialist Group (AfRSG) along with TRAFFIC and CITES has collected comprehensive data on rhino poaching cases across all African range states since 2005. Figure i below is extracted from a report to the International Union for the Conservation of Nature Species Survival Commission which was delivered at the 18 session of the Conference of the Parties (CoP 18). The table shows a marked increase in poaching levels from 2010 onwards with 2014 and 2015 recording the highest numbers overall.

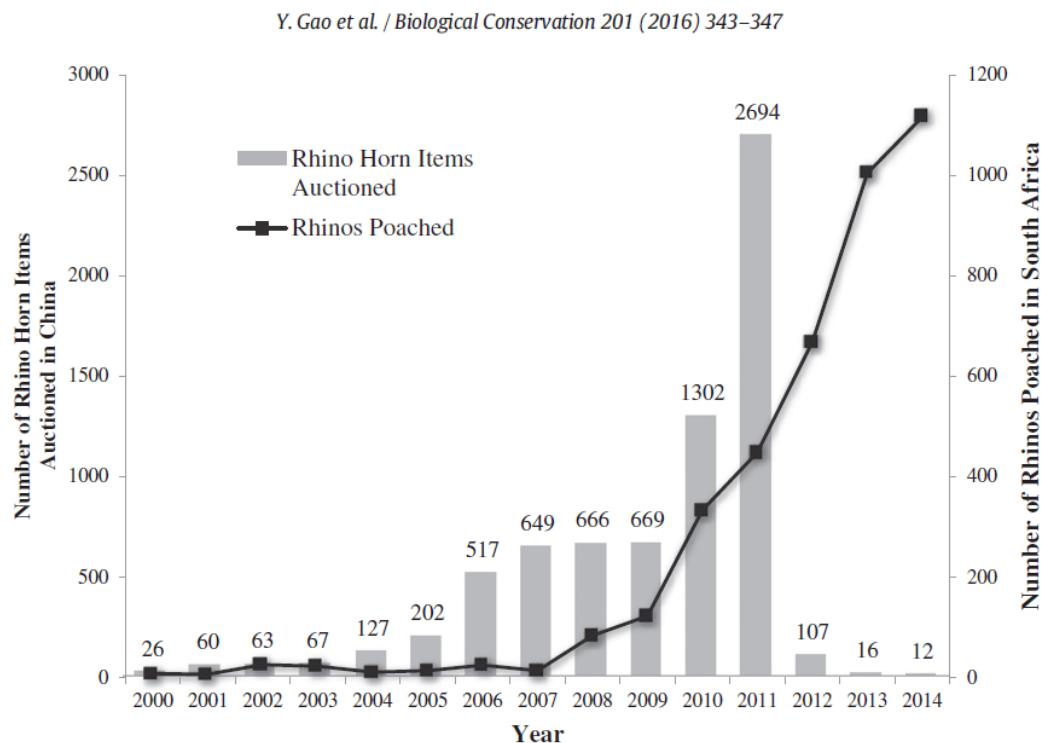
**Figure i:** Poaching rates in southern African rangeland states from 2006-2016 adapted from IUCN SSC, African and Asian Rhino Specialist Groups and TRAFFIC publication entitled: *African and Asian Rhinoceros Status, Conservation and Trade to CITES 2017*



The high number of poaching incidents in South Africa are due to the Kruger National Park boasting the highest abundance of southern white rhino on the planet (Ferreira et al. 2015). Poaching in South Africa's Kruger Park reached crisis proportions during the first half of the last decade and a direct correlation has been shown between the number of rhino horn items

auctioned in China and the number of poaching cases in South Africa (Gao et al. 2016). Figure ii below depicts this direct correlation.

**Figure ii:** The Number of rhino horn items auctioned in China and rhinos poached in South Africa, from 2000-2014. Gao et al. (2016)



In 2012 the Chinese government unilaterally banned the auction of rhino horn items and official records show that the sale of these items dropped to almost zero in 2014. Black market auctions still exist though and as shown in figure i the poaching of African rhinos increased exponentially from 2012 onwards, peaking in 2015 at 1,349 animals lost in that year. This represented a loss of close to 4 animals a day and shows clearly that demand for rhino horn remained high during these years despite corrective measures being taken by the Chinese government to restrict the auction of rhino horn products.

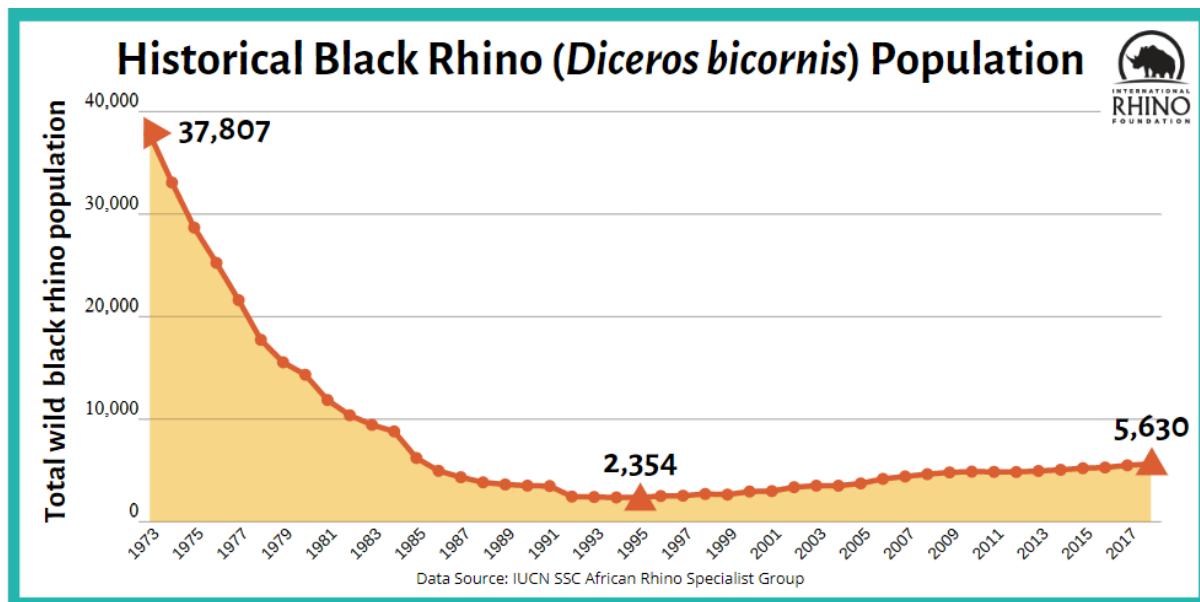
The focus species of this study is the southwestern black rhinoceros (*Diceros Bicornis Bicornis*) as this is the species that occurs in //Huab conservancy. The review now turns to

black rhino population trends globally and then moves on to discuss poaching and conservation strategies in the region where //Huab conservancy is situated.

#### **2.4.1 Black Rhino (*Diceros Bicornis*) Population Trends**

In 1960 it was estimated that there were as many as 100,000 black rhinos left in Africa. By 1980 it was estimated that there were just under 15,000 remaining in 20 African states and by 1992 this number had dropped to around 2,500 (Knight 2012). Some authors attribute these catastrophic declines to the CITES ban on trade which created a rise in black market demand which in turn led to an increase in poaching in African range states (Biggs et al 2013). Figure iii below depicts long-term black rhino population trends. The ban on international trade was instituted by CITES in 1977 when the black rhino population was estimated to be just over 20,000 individuals in the wild – including national parks – and by 1995 the population had reached an all-time low of just 2,354 individuals. This represents a loss of 35,453 animals in a twenty-year period, a rate of 1,773 animals a year. The population has since 2015 started to rebound. This rebound is due to several factors which have all worked in combination and are catalysed by political will on the part of African rangeland states in particular Namibia which is considered the stronghold of black rhino in southern Africa (Emslie 2020).

**Figure iii:** Trends in black rhino populations in Africa 1973-2017. International Rhino Foundation 2020. Source IUCN AfRSG



#### 2.4.2 Rhino Poaching in North-West Namibia

Between the 1970s and early 1980s, a large proportion of black rhino existing in the north-west of the country were poached for their horn. Loutit (1996) estimated that by 1982 there were as few as 10 individuals remaining in the north-west. Local conservationists decided to act, and two conservation NGOs were established to prevent the complete extermination of not only black rhino but also of other high value species such as lion and elephant. From the mid-1980s, Save the Rhino Trust (SRT) and Integrated Rural Development and Nature Conservation (IRDNC) worked with local communities to help stop poaching (Loutit 1996; Owen-Smith 2010).

The involvement of surrounding communities was fundamental to improving understanding on local drivers of poaching in the area. Understanding these drivers eventually led to the development of what is known today as the Namibian Community Based Natural Resource Management (CBNRM) programme (Jones & Murphree 2004). The more recent increase in poaching in South Africa - from around 2009 - eventually reached Namibia in 2012 and peaked in 2015, when close to 100 animals were reportedly poached, with most carcasses

being found in Etosha National Park (MEFT 2020). Poaching numbers have decreased since 2015 but rhino poaching syndicates are still in operation throughout Namibia, mainly targeting commercial farms and national parks (MEFT 2020).

#### **2.4.3 Illegal Wildlife Trade – the Lucrative Driver Behind Poaching**

Similar to any other commodity, consumer demand dictates poaching rates. The Illegal Wildlife Trade (IWT) is a multi-billion-dollar industry composed of intricate multinational linkages between highly sophisticated criminal syndicates. These syndicates are often involved in other criminal activities besides IWT and have also been implicated in illegal arms deals, drug and human trafficking and even terrorism (INL 2018). Scholars and international aid agencies agree that IWT is a global concern and is growing in intensity (Cooney et al. 2016; Duffy et al. 2015). The illegal wildlife trade presents such a huge threat to conservation that millions of dollars are being sent to hot-spot areas by aid organisations to help mainly low-income countries deal with the onslaught. For example, in 2016 the United States Agency for International Development, one of many international development agencies working on wildlife crime issues, committed US\$25 million (R380, 000, 000) over 5 years to Namibia, Botswana, Angola, Zimbabwe and Zambia for the purposes of combatting wildlife crime in southern Africa (USAID 2021).

#### **2.5 REACTIONS TO ILLEGAL WILDLIFE TRADE – GREEN MILITARISATION AND COMMUNITY BASED APPROACHES**

The standard approach for conservation organisations and government departments to counter the illegal wildlife trade (IWT) has been with military-type interventions (Humphreys & Smith 2014; Schmitz et al. 2017). ‘Green militarisation’ has been defined as practices which use military and paramilitary methods as conservation tools. This includes the use of technologies and personnel (Marijnen 2017, 85). As a result of this approach, academics are trying to understand the effects of green militarisation on people living close to the resource in question. For example, social research has been conducted in rural communities that have

been exposed to increased levels of green militarised-type approaches to counter poaching (Kraska 2007; Naro et al. 2020).

Some findings indicate that an increase in military-type presence brings detrimental social costs because the approach alienates local people from the resource in question, further exacerbating the problem of poaching and resource degradation (Lunstrum 2014; Muntifering et al. 2018). Green militarisation is of relevance here as a community-centered approach to dealing with IWT is often seen as an opposing response to an increase in military type tactics (Marijnen 2017). Advocates for these approaches have acknowledged community-based tourism as a more sustainable, social and environmentally-just alternative to a harder, militarised approach (Naidoo et al. 2011). The Namibian approach has been centered on the importance of local communities in rural areas. The CBNRM programme (discussed in chapter 3) has been highlighted as a more sustainable and environmentally just mechanism to reducing wildlife crime and environmental degradation (Child 2019). This ‘softer approach’ is often seen to be in direct opposition to a harder, more militarized approach to reducing wildlife crime (Duffy et al. 2015).

Focusing on reducing rhino poaching, tourism has been viewed as a mechanism which has the potential to benefit and empower local communities and generate much-needed revenue for rhino protection (Muntifering 2016). Whilst some studies (Annecke & Masubelele 2016; Morias et al. 2015; Saayman & Saayman 2016) have advocated for more involvement of communities in rhino-based tourism, there is a knowledge gap relating to the impact of a community linked rhino-tourism enterprise on community members’ perceptions toward rhino conservation. Consequently, there is a need to understand more about how a community centred approach characterised by the fundamentals of CBNRM could be more impactful to communal area residents.

The discussion now turns to tourism as an approach to improve livelihoods and achieve conservation gains through and the use of CBNRM as a mechanism to achieve this.

## **2.6 TOURISM, SUSTAINABLE DEVELOPMENT AND CONSERVATION**

Tourism is defined as the activities of people travelling to and staying in places outside their usual environment for a period (United Nations World Tourism Organisation 2021). Tourism is noted as the third-largest sector in international trade and international arrivals are expected to reach 1.8 billion people globally by 2030 (World Trade Organisation joint release 2018). It follows that there exists a plethora of literature on tourism and tourism as a poverty reduction tool for developing countries is a widely studied subject (Buckley 2012; Medina-Munoz et al. 2016). For the purposes of this chapter, the foundations of sustainable development and then community-based tourism broadly, are discussed. The focus is narrowed to the Namibian context, finally zooming in on black rhino tourism in the Kunene region highlighting its effects on income generation and conservation.

### **2.6.1 Theory of Sustainable Development**

This study is situated within the theoretical paradigm of sustainable development. Sustainable development is defined as ensuring that utilisation of resources in the present does not affect the needs of those in the future (Brundtland 1989). Linked to sustainable development is the rise of Community Based Tourism as an alternative form of tourism which focuses not only on the experience of the tourist but also on the effects of tourism on the local community and the environment.

According to the UN Sustainable Development 2030 targets 8.9 and 12b, tourism that creates decent jobs, promotes local culture and products and is sustainable in nature should be prioritised globally (United Nations 2016). This study attempts to understand how benefits from a tourism enterprise which is based on the presence and conservation of an iconic and endangered species can contribute to this triple bottom line of sustainability - ensuring that sustained positive outcomes are enjoyed by the surrounding community, the economy, and the environment (Tercek & Adams 2016).

## **2.6.2 Defining Community Based Tourism**

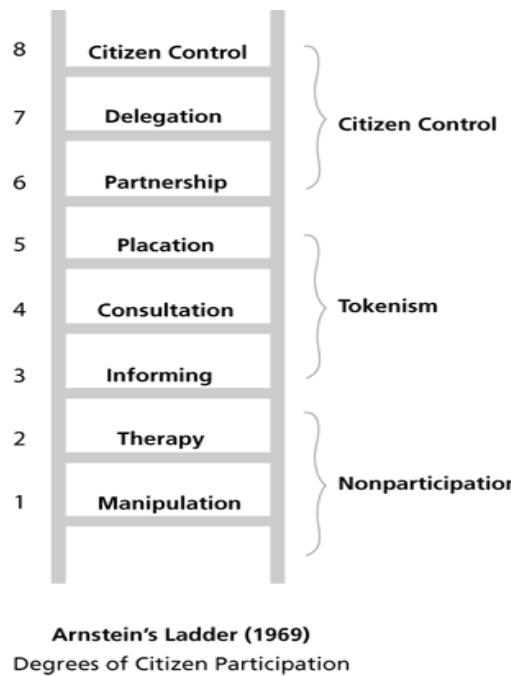
Community-based tourism has been defined as a development mechanism which ensures that the social, environmental and economic needs of local communities are met through engagement with tourism (Goodwin & Santilli 2009). The approach emphasises local participation with regard to the planning of the tourism initiative, as well as receiving the benefits thereof (Blackstock 2005).

Community based tourism projects (CBTs) have gained popularity in tandem with the move towards the ‘new conservation’ of CBNRM (Goodwin & Santilli 2009; Jones 1999) and have consequently become an attractive option for promoting biodiversity conservation. CBTs are founded on theories of local participation first engendered by Arnstein (1969) and, more specifically, related to governance of communal land by Ostrom (1990).

## **2.6.3 Local Participation**

Arnstein (1969) defines citizen participation as the process whereby power is redistributed to those ‘have-not’ citizens to include them in decision-making processes relating to socio-economic choices. Arnstein further disaggregates participation into a conceptual ‘ladder’ with 8 rungs. This is shown in figure iv below:

**Figure iv:** Arnstein's Ladder of Citizen Participation, taken from the Journal of the American Planning Association, 1969



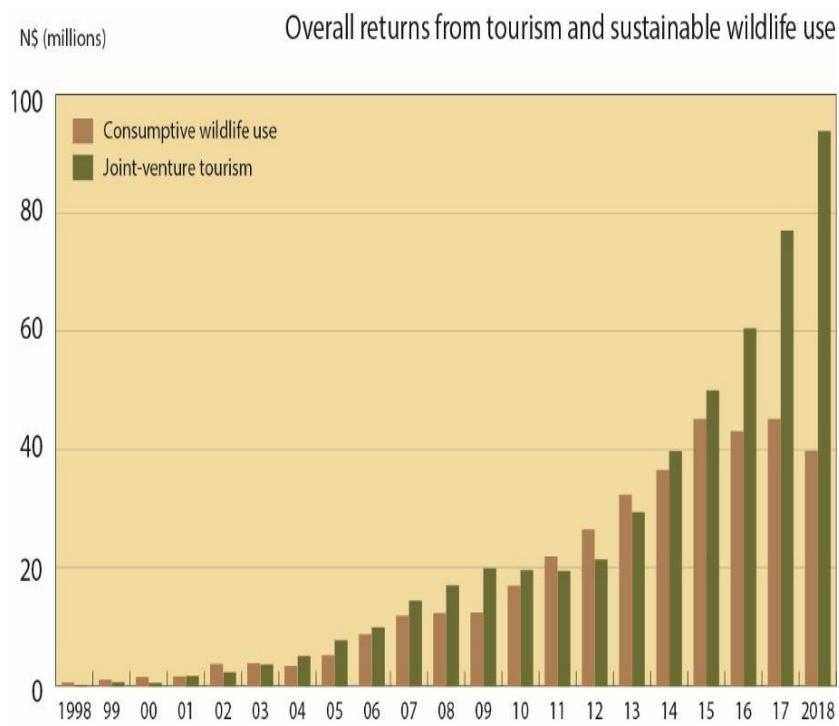
In her seminal paper Arnstein (1969) unpacks the notion of citizen participation, showing that ‘participation’, whilst sought after by many aid organisations, is multi-layered (Arnstein 1969). Community based tourism is centred around local participation and has been an important driver for poverty alleviation in rural areas (Murphree 2009; Naidoo et al. 2016). CBT is also often linked to biodiversity conservation by virtue of the strong emphasis on sustainability and participatory planning (Lapeyre 2010; Suich 2010).

#### 2.6.4 Community Based Tourism in Namibia

Namibia’s CBNRM programme has been lauded as one of the most successful conservation and rural development stories ever told (NACSO 2018). In the 1980s, dwindling wildlife populations in the north-west of the country prompted the first efforts to engage local communities in the protection of their own wildlife, focusing on tourism as a potential vehicle to generate returns to local communities (Owen-Smith 2010).

As shown in figure v below, the large returns generated by what is termed as joint venture (JV) tourism had – from 2014 onwards - started to generate a higher income than sustainable wildlife utilisation. In 2018 JV tourism alone generated over N\$90 000 000.

**Figure v:** Total returns for communal conservancies in 2018. Taken from NACSO State of Community Conservation Report, 2018 (N\$1.00=R1.00)



The Namibian CBNRM programme is seen as an excellent example of a successful national CBNRM programme both in southern Africa and globally. For this reason, much research has sought to further understand the impact of these returns to rural area residents (Lapeyre 2010; Naidoo et al. 2016). Jones (1999) links the perceived success of the Namibian tourism model to enabling policy and legislation which allows 100% of benefits negotiated with a private sector tour or lodge operator to go directly to the conservancy bank account.

## 2.7 RHINO TOURISM, THE NAMIBIAN STORY

It is estimated that one-third of the extant critically endangered black rhinoceros (*Diceros bicornis*) reside in Namibia (Emslie 2020). In addition to this, most of the southwestern subspecies *Diceros bicornis bicornis* (known locally as the desert-adapted black rhino) persist

in the arid north-west of the country (Muntifering et al. 2018). Namibia is thus considered one of the last remaining strongholds for the black rhino. The population is labelled as a key 1 by the African Rhino Specialist Group (AfRSG), categorising this group of black rhinos as globally significant in terms of contribution to the species gene pool and recognition for its breeding potential and size (IUCN 2020).

Furthermore, the desert-adapted black rhino in north-west Namibia is considered one of the most important black rhino populations on earth because it is the largest population to persist outside formally protected areas (Beytell 2010). These attributes, combined with enabling national legislation, have added to favourable conditions for tourism in communal conservancies in the north-west and have created a foundation for a vibrant tourism product (Naidoo et al. 2016).

### **2.7.1 The Rhino Custodianship Programme**

The Rhino Custodianship Programme was established by the Ministry of Environment Forestry and Tourism to spearhead the relocation of black rhino out of national parks and into communal areas (!Uri-≠Khob 2004). The initiative was conceived and implemented partly because of the apparent success of the Namibian CBNRM programme as well as a call from local communities to have the opportunity to engage in and benefit from rhino conservation and tourism activities (Loutit 1996; !Uri-≠Khob 2004).

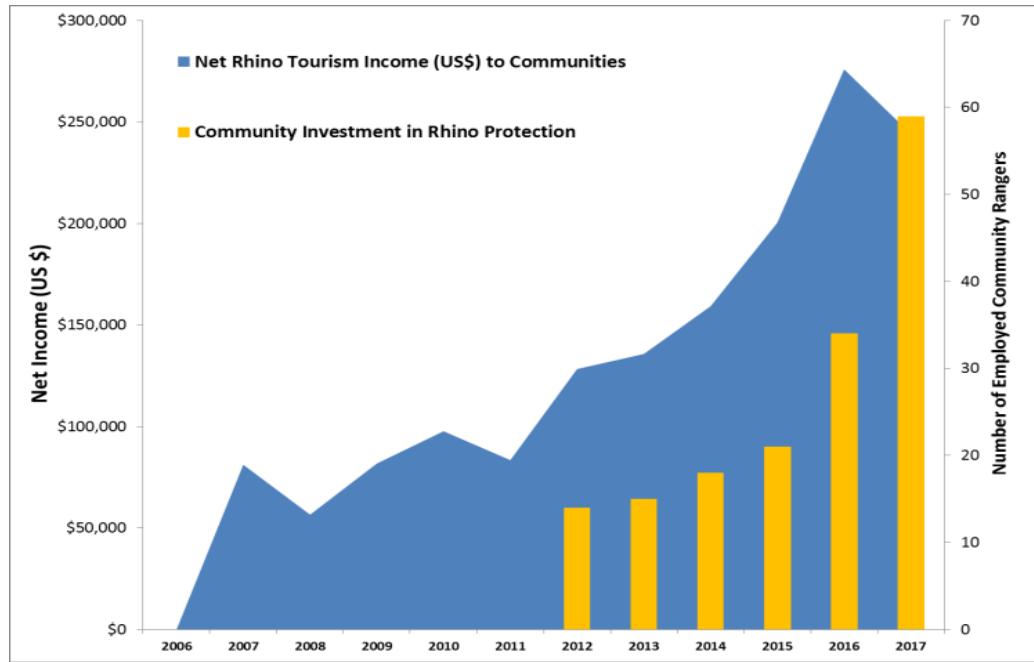
The biological argument for the custodianship programme is to increase rhino rangeland area and diversify the genetic pool of black rhino to secure a steady population increase particularly of the sub-species *Diceros bicornis bicornis* (Beytell 2010). The Namibian Black Rhino Custodianship Programme is internationally recognised as an innovative approach to rhino conservation where black rhino are moved from state protected national parks into communal lands, showing the commitment and political will by the Namibian government to achieve conservation and CBNRM goals outlined in the *Namibian Black Rhino Strategy* document (MEFT 2017). The target area for this study, //Huab Conservancy is a formal member of the black rhino custodianship programme.

## **2.7.2 Black Rhino Tourism: Methods and Benefits**

Black rhinoceros are known for being extremely sensitive to human disturbance (Muntifering 2016). Studies have shown that tourism-induced disturbance may have extreme negative impacts for individual animals that are disturbed through vehicle traffic and the constant presence of humans (Beytell 2010; Loutit 1996). As a result of human induced disturbance (HID) and its potentially disastrous effects on the key 1 population in the north-west, scientists have conducted research on associated levels of HID in relation to rhino behaviour (Beytell 2010) to sustainably link community-based tourism initiatives and rhino tracking without producing negative effects on rhino. These studies have catalysed the development of a viewing protocol or framework which outlines maximum and minimum viewing distance as well as suitable timing for viewing rhino (Muntifering et al. 2018).

Figure vi below shows that income to community conservancies from rhino tourism in the north-west has increased significantly since the first formal tracking activities were offered over 30 years ago. Combined, the total income accruing to 5 conservancies since 2012 is over US\$1,000,000, averaging around US\$200,000 per annum (Muntifering et al. 2020). Tourism has also helped rhino monitoring for conservation purposes to improve. The upsurge in tourism has in turn increased the number of recorded and confirmed sightings across the landscape (!Uri-≠Khob, personal communication 2021).

**Figure vi:** Returns generated to conservancies from rhino tourism 2006-2017 (Muntifering 2020)



The chapter now turns to a critical evaluation of community based tourism highlighting the continued challenges facing this approach. These are mainly centred on the lack of genuine local empowerment and the difficulties in ensuring an equitable process for benefit distribution.

## 2.8 CRITICAL EVALUATION OF COMMUNITY BASED TOURISM

Despite these measurable positive outcomes (figure vi above), criticisms exist not only of the Namibian CBNRM programme in general but also of the tourism joint venture (JV) component of the programme. Studies have shown that the role of non-government organisations during both negotiation and implementation phases of tourism JVs, has exacerbated unequal social relations both within conservancies and between conservancies and private sector partners (Büscher, et al. 2012; Stamm 2017). For example, close to a decade ago, Snyman (2012; 411) argued for a greater emphasis from private sector partners on the empowerment of local people which will eventually lead to local people becoming managers

and eventually owners of the business. According to Snyman (2012) meaningful empowerment of this nature through skills development and training would lead to improved livelihoods, reduction of poverty at a household level and would improve attitudes towards wildlife. A more recent study conducted in the Zambezi region of Namibia (Kavelage et al 2020) shows continued low levels of local ownership and concludes that conservancies have the potential to benefit more from tourism initiatives. Therefore, one of the fundamental criticisms of CBNRM - the level of true empowerment through increased capacity of local people in tourism JVs – can still be considered as a stumbling block for the CBNRM programme in Namibia.

Indeed, this situation is pervasive globally where private sector and community-based organisations are in partnership (Torres et al. 2011). Some initial work in Namibia has been done to understand more about why this situation persists (Lubilo 2018) but there has yet to be a thorough synthesis of all Namibian tourism JV lodges in this regard.

Moving to a broader critique of community-based tourism, studies have attempted to understand the actual effects on poverty alleviation, meaningful engagement with local communities as well as positive outcomes for biodiversity conservation (Silva & Mosimane 2012). While these studies show that CBT has the potential to positively impact livelihoods comparative studies should be conducted in areas where CBT has not taken place. In addition (Suich 2010; 52) argues for the need to consider community level decision making and benefit distribution processes when measuring success. These studies point to the need for more research to properly understand the links between CBT initiatives and their ability to meaningfully impact poor people's lives whilst ensuring environmental sustainability and profits for business (Galvin et al. 2018; Medina-Muñoz et al. 2016; Torres et al. 2011).

To outline the elements needed for success of CBT, Dodds, Alisha and Kelly (2018) provide a synthesis on key factors which might achieve a meaningful change in the lives of rural people. Two of the key elements mentioned in the synthesis are participatory planning and community empowerment; elements that members of //Huab conservancy noted as missing during this study in their current tourism partnership. Dodds et al. (2018; 19) also note that

more robust economic studies are necessary to establish whether CBT is positively improving livelihoods.

For the community-based approach to achieve meaningful change in the lives of rural people, consideration should be given to planning and empowerment. Oftentimes the community-based approach is viewed as a panacea to rural development and as the answer to reducing wildlife crime. In Namibia, when measured in the form of income (figure vi above) and an increase in wildlife numbers we may assume that this approach is indeed impactful. However, income to communities and an increase in wildlife numbers does not necessarily translate into equitable benefit distribution nor an increase in participation in tourism planning and empowerment. This leaves some community members - often the poorest of the poor – out of the equation as benefits tend to flow to local elites. Governance in Namibia's communal conservancies is discussed in more detail in chapter 3.

## **2.9 CONCLUSION**

This chapter began by highlighting the fact that the trade in illegal wildlife products has reached the global agenda. The importance of engaging communities in the processes of tackling illegal wildlife trade is a United Nations Sustainable Development Goal (SDG 15c).

The focus moved from international case studies to rhino population trends in Africa. The ‘new conservation’ of community-based conservation initiatives was then discussed, highlighting the difference in community approaches and green militarisation.

The concept of community-based tourism (CBT) was defined as a complimentary spin-off of community-based natural resource management within the sustainable development paradigm. The increase in returns to conservancies over the years through tourism and trophy hunting was presented, noting that tourism has recently surpassed hunting as the main income generator at conservancies in Namibia.

The review noted that criticisms of the community-based tourism approach which were first highlighted more than a decade ago, continue to persist. The review established gaps in literature which led to the operationalization of the research questions: namely to understand

more about how a tourism enterprise has impacted conservancy members' attitudes towards rhino as well as how a rhino tourism enterprise can be more impactful as a tool for sustainable development. The next chapter contextualises CBNRM and provides more in-depth discussion on some of the challenges associated with the model.

## **CHAPTER 3: THE CONTEXTUALISATION OF COMMUNITY BASED NATURAL RESOURCE MANAGEMENT: HISTORY AND CHALLENGES**

### **3.1 INTRODUCTION**

Chapter 3 positions this study within the rural development paradigm of Community Based Natural Resource Management (CBNRM). Providing this context is important as the study takes place inside a Namibian communal conservancy which has the objective of using CBNRM as a vehicle to achieve rural sustainable development through the conservation of natural resources.

The chapter begins with a general introduction to the southern African country of Namibia, where this study took place. Following this is a broad definition and historical overview of CBNRM, noting the fundamental principles and theoretical origins of the approach. Included in the discussion is a comparison with community approaches in neighbouring countries, showing how important political will is to enable meaningful progress in CBNRM. The chapter closes with an in-depth discussion on CBNRM in Namibia, noting achievements and challenges to the model in the country.

### **3.2 A BRIEF BACKGROUND OF NAMIBIA**

Namibia boasts a rich prehistory, as is evidenced by a plethora of archaeological finds which indicate human settlement in the Namib desert from as early as 2,750 BC (Kinahan 2016). The territory was occupied as a colony by the German Empire from 1884 until 1915 when, because of World War I, South Africa began administration of what was then known as South-West Africa (Weigend 1985). Namibia became independent from South Africa in 1990 and is considered a young democracy. The country is large (823,988km<sup>2</sup>) and with a small population of just over 2,5 million people, Namibia is one of the least densely populated countries on the planet (Namibia Statistics Agency 2014).

Although rapid urbanisation is taking place, the population is mainly rural and is concentrated in the north-central part of the country (NSA 2014). Rainfall patterns vary considerably from less than 25mm/year in the extreme west to 650mm/year in the humid north-east. Namibia is bordered by Angola to the north, South Africa to the south and Botswana and Zambia to the east.

Rural Namibians rely primarily on livestock farming and subsistence agriculture. After the advent of the CBNRM programme, the Namibian government was able to add a livelihood diversification option to the rural areas, effectively providing another avenue to reduce poverty and attempting to achieve a sustainable development pathway in communal areas (Owen-Smith 2010).

### **3.3 COMMUNITY BASED NATURAL RESOURCE MANAGEMENT**

Community Based Natural Resource Management (CBNRM) is grounded in the transfer of ownership, including rights to benefit over land and resources, to rural communities inhabiting that land and using those resources (Jones 1999; Ostrom 1990;). From the end of the 1980s to the beginning of the 21<sup>st</sup> century there was increasing recognition that a ‘new conservation’ was needed to successfully ensure the long-term sustainability of ecosystems outside formally protected areas such as national parks (Fabricus 2004; Hulme & Murphree 1999). This ‘new’ way of thinking about conservation was characterised by a strong people-centred approach, based on seminal hypotheses by, among others, Nobel Laureate Elinor Ostrom who pioneered initial thinking around common property management.

Ostrom theorised that if people had enough control of their own resources to institute management rules, the group managing the resource could avoid the environmental and eventual social degradation (Ostrom 1990; Saunders 2014) associated with the overuse of a common resource by individuals for their own gain. This is known as the ‘tragedy of the commons’ (Hardin 1968; Ostrom 1990; Ostrom & Cox 2010).

Building onto foundations laid by academics such as Ostrom, the move towards a more socially inclusive type of conservation has been on the international sustainable development

agenda since the turn of the century (Adams 2004). These ideas eventually coalesced into the United Nations Sustainable Development Goal 15c which advocates for the improved capacity and involvement of local people in wildlife conservation (UN 2015).

The idea of a people-centred approach linked to conservation and rural development has therefore been acknowledged as an important mechanism to achieve a level of sustainable development in rural areas and possibly to reduce wildlife crime (IUCN 2015). CBNRM has been hailed by many as an engaging and inclusive form of rural development which facilitates empowerment of local people through sustainable management of natural resources (Naidoo et al. 2016; Owen-Smith 2010). It is important to understand the key theoretical foundations of CBNRM as it is the rural development paradigm in which this study is situated both conceptually and spatially.

The discussion now turns to southern African examples of CBNRM comparing the history, achievements and current challenges in those countries to the Namibian model.

### **3.3.1 Community Based Natural Resource Management in Africa – Challenges and Lessons**

Perhaps the earliest example of a large scale CBNRM programme in southern Africa was Zimbabwe's Communal Areas Management Programme for Indigenous Resources (CAMPFIRE). CAMPFIRE was set up towards the end of the 1980s to practically apply the ideas around common property management espoused by Ostrom and others (Beytell 2010; Jones 1999). Although the CAMPFIRE programme is no longer as widespread or successful as it was during the 1990s and early 2000s, the model has been used to inspire the development of other CBNRM programmes in southern Africa (Campbell & Shackleton 2001; Nelson & Agrawal 2008).

The CAMPFIRE project improved natural resource management capacity in participating communities, helped to increase wildlife numbers and produced economic benefits for rural residents in over 30 district councils; covering an area of over 36, 000 km<sup>2</sup> (Child & Barnes 2010; Leader-Williams & Hutton 2005). The CAMPFIRE project has not, however, managed

to sustain itself into the 21<sup>st</sup> century. This is mainly because there was never any legal recognition of the rights of rural communities to benefit directly from income-generating opportunities (Dzingirai 2003). Access to equitable benefits based on a strong national policy is a fundamental aspect of CBNRM and with district councils and later the central government of Zimbabwe both taking a share of income meant for the communities, the programme has stumbled and never quite recovered (Leader-Williams & Hutton 2005).

Namibia's north-eastern neighbour Zambia began implementing CBNRM projects in the late 1980's. The country is rich in wildlife and forest resources and despite the Zambian government approving policy which enables CBNRM to flourish, actual devolution of rights over wildlife and tourism has not materialised (Davis et al. 2020). Community Resource Boards (CRBs) have been established across the country, these institutions function essentially the same as communal conservancies in Namibia but have been hamstrung by the lack of devolved rights to wildlife and forests and weak local institutions – characterised by poor governance - which have led to mismanagement (Nelson et al. 2020).

An example of this semi-devolution of rights is in respect of trophy hunting contracts in Zambia. A quota is issued to a CRB who then negotiates with a professional hunter. The hunter can hunt on the quota but the payment for the hunt is channelled through the Department of National Parks and Wildlife who then pays the respective CRB after taking a percentage. For two years between 2018 and 2019 Zambian CRBs had not been paid their trophy hunting fees. The situation has caused huge animosity and conflict between the CRBs and central government leading to the CRBs suspending all trophy hunting in communal areas ([Africa Geographic](#) 2019).

Several reforms, particularly in the forestry sector, have given rise to hope in Zambia during the last several years. The 2015 Forest Act allows new opportunities for communities to benefit from sustainable forest management and carbon credit initiatives (Davis et al 2020); . According to Nelson et al. (2020) these reforms give communal area residents in Zambia more agency than they have had ever before to manage and benefit from their forest resources.

In neighbouring Botswana, the situation is also somewhat different. According to Cassidy (2020) the slow but steady erosion of rights over natural resources began in 2001 when the Botswanan government issued a directive which required money earned through joint-venture tourism to be paid directly to government coffers and issued to communities only upon receipt and approval of a valid project proposal. Community Trust's – as the community based organisations are termed in Botswana – were only able to receive tourism revenue if they convinced the relevant official that the intended project would be a good use of funding (Cassidy 2020). Community Trust's rights were further eroded when tourism lease hold rights were transferred to the Land Bank, a state-controlled enterprise. This resulted in a dramatic drop in revenue to Community Trusts. The Botswanan government stated that the removal of these benefits was a result of bad management and misuse of funding on the part of the Community Trusts. Some authors disagree with this, stating instead that increased revenue to the Trusts had made the government wary of a shifting balance of power in the rural areas where the Trusts operated. For example, Hoon, (2014) notes that local government politicians began to view the Trust chairpersons as rivals in some areas, particularly during the run-up to local elections.

These examples illustrate that CBNRM is inextricably linked to national government policy of the country in question. It could be argued that enabling policy which outlines and implements real devolution of user-rights to local communities is the cornerstone of a flourishing CBNRM programme. As described by Nelson et al. (2020) political will is often the driver of policy change and the future of CBNRM will depend largely on political processes and negotiation.

In a synthesis of eastern and southern African CBNRM Nelson et al. (2020) have described Namibia and Kenya as regional leaders, highlighting enabling legislation in those countries as the key driver to ensuring conservation and rural development gains. The discussion now turns to provide context to the Namibian Programme.

### **3.3.2 The Namibian Community Based Natural Resource Management Programme**

The development of the new Namibian constitution in the early 1990s provided key individuals in the Directorate of Environmental Affairs (now named Ministry of Environment, Forestry and Tourism) with an opportunity to advocate for a policy and legislation shift. This shift in policy made provision for the transfer of rights to communal farmers over hunttable game and tourism, effectively providing rural farmers with the same user-rights as free-hold farmers (Jones 1999).

The resulting amendment to the Nature Conservation Ordinance of 1975 stated that rural communities had the right to form recognised common-management structures known as conservancies which devolved rights over hunttable game as well as tourism (Dressler et al. 2010). The Namibian government's foresight during the process of legislative reform effectively gave birth to the national CBNRM programme (Sullivan 2011).

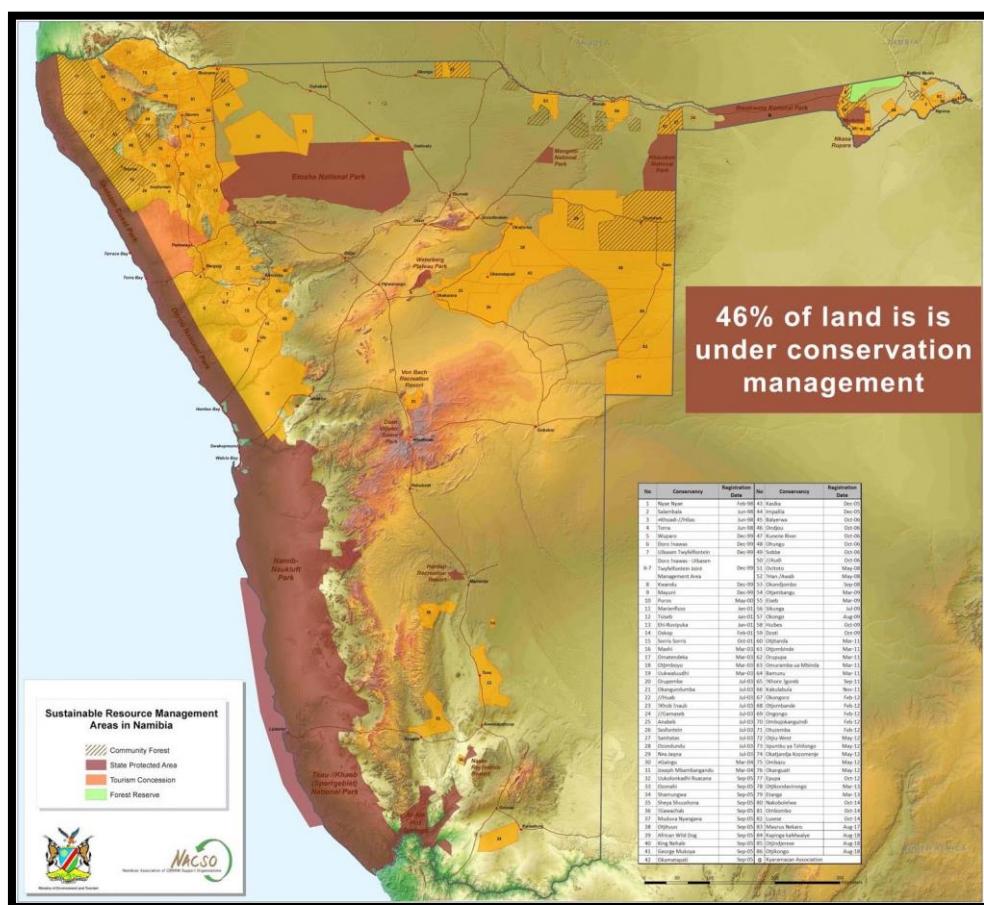
The new policy framework for CBNRM in Namibia entitled 'The Establishment of Conservancies in Namibia and the Promotion of Community Based Tourism' (MEFT 1975, 1996) meant that as long as local communities followed the registration procedure to have their land parcel recognised as a communal conservancy and continued to adhere to regulations set out by the Ministry of Environment Forestry and Tourism, these communities would be able to enter into consumptive and non-consumptive resource use agreements with external parties.

The devolution of user rights and management of natural resources to rural communities is a core component of CBNRM and the new legislation made provision for conservancies to legally enter into tourism agreements with private sector tourism or hunting operators or to establish their own enterprises (Mosimane & Silva 2015; Powell et al. 2017). The key legislative component which sets Namibia apart from the other African nations discussed in section 3.3.1 above is that these conservancies would be entitled to receive 100% of the benefits accruing from those agreements, without national or local level government interference (Lapeyre 2010; Naidoo et al. 2011).

The CBNRM programme in Namibia has since ballooned into an internationally acclaimed ‘conservation success story’ (NACSO 2020). The programme returns millions of US\$ to local communities through tourism and trophy hunting agreements (see figure v). In addition to the financial returns to local communities, the programme boasts a well-documented wildlife recovery through inclusion of over 80 formally registered community conservation areas into a national conservation network which - including national parks - spans more than 40% of the landmass of the country (Namibia Nature Foundation 2017).

Figure vii below illustrates community conservancies, community forests, tourism concessions and national parks currently gazetted in Namibia (NACSO; MEFT 2021).

**Figure vii:** Map listing community conservancies, community forests, tourism concessions and national parks in Namibia (MEFT; NACSO taken from [communityconservation.com](http://communityconservation.com) 2021)



### **3.4 GOVERNANCE IN COMMUNITY BASED NATURAL RESOURCE MANAGEMENT**

Fabricus & Collins (2007) argue that CBNRM programmes often fail due to a lack of good governance. Good governance has been defined in chapter 1 section 1.1.4. Good governance plays a large part in the equitable distribution of benefits and effective information dissemination (Kavita & Saarinen 2015; Mosimane & Silva 2015). A central argument is that good governance can translate into meaningful engagement, transparency and participation which in turn translates to improved attitudes towards conservation (Jones 2004).

The idea of local participation is firmly rooted within Arnstein's (1969) seminal theory of citizen control, tokenism and non-participation. ‘Arnstein (1969, 217, 224) posits that full citizen control is realised when local people can govern the programme and are able to restrict the level of outside interference. Arnstein’s ladder is more fully detailed under local participation in Chapter 2.

#### **3.3.3 Governance in Namibia’s Communal Conservancies**

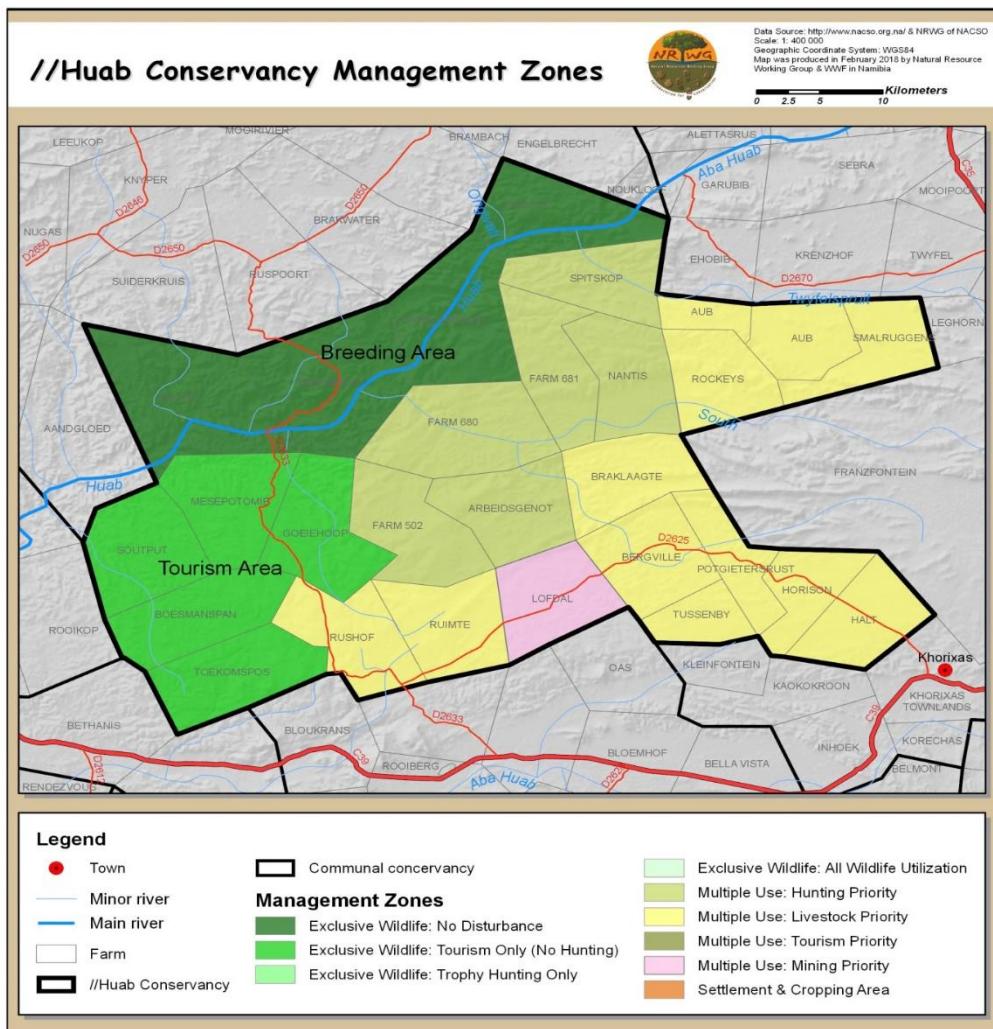
Communal conservancies in Namibia are governed according to an approved constitution. Compliance actions need to be completed for the government to continue to recognise the conservancy as a legal body. These are:

- Conducting of the Annual General Meeting (AGM) in accordance with procedures outlined in the constitution
- Conducting elections for management committees in accordance with procedures outlined in the constitution
- Conducting benefit distribution in accordance with procedures outlined in the constitution
- Implementing the Game Management and Utilisation Plan (GMUP) in accordance with activities outlined in the plan

To remain compliant and retain government recognition, each conservancy should show proof (minutes of meetings and financial statements) that the activities above have been completed. Failure to do so can result in a conservancy losing its legal rights and being de-gazetted (MEFT 1975, 1996).

As long as conservancies remain compliant, they are recognised by the Namibian government and thus have user rights over certain game species and tourism activities (MEFT 1975, 1996). High value and protected species such as lion, elephant and rhino remain the property of the state under the protection of the Ministry of Environment, Forestry and Tourism (Leader-Williams & Hutton 2005). Conservancies have delineated boundaries and have, as part of the government requirements before being recognised, divided the geographic area of the conservancy into zones. Each zone has certain rules relating to land use (see figure viii below) and, although not legally enforceable, the zonation map of the conservancy is used as a guiding tool when decisions around where to set up tourism activities or where to place a hunting camp are being made (Jones 1999).

**Figure viii: //Huab zonation map 2018**



### 3.3.4 The Conservancy Management Committee

The conservancy is managed by an elected representative body made up of the conservancy members elected at a duly convened meeting. This group of individuals is usually divided into the portfolios of chairperson, secretary and treasurer and are mandated to implement the decisions made by conservancy members at the highest decision-making platform, the Annual General Meeting (AGM).

The management committee generally sits for a period of 3-5 years after which another election takes place where new members are elected to serve their term. The management

committee is supported by the conservancy staff who are salaried individuals (where the conservancy can afford to pay a salary) and are employed on a permanent basis. The management committee is expected to function as a board of trustees might function in a private sector company. A fundamental guiding principle is that the management committee are not paid for their work but are volunteers who are from the community they serve, offering their time to assist the conservancy to achieve its rural development and conservation objectives.

### **3.3.5 Challenges in Governance in Namibian Community Based Natural Resource Management**

Good governance in the context of community-based natural resource management is defined as a social process which attempts to achieve the agreed upon goals of the community in question through participatory, efficient, responsive, and equitable means (United Nations Economic and Social Commission for Asia and the Pacific 2006, 3) and has been noted by the previous Secretary General of the United Nations, Mr Kofi Annan, as possibly the most important factor in eradicating poverty and promoting development (UNESCAP 2006, 1). Community Based Natural Resource Management attempts to achieve these lofty ideals and is, on paper, an almost perfect mix of meaningful engagement, empowerment, benefit sharing and conservation (Jones et al. 2015).

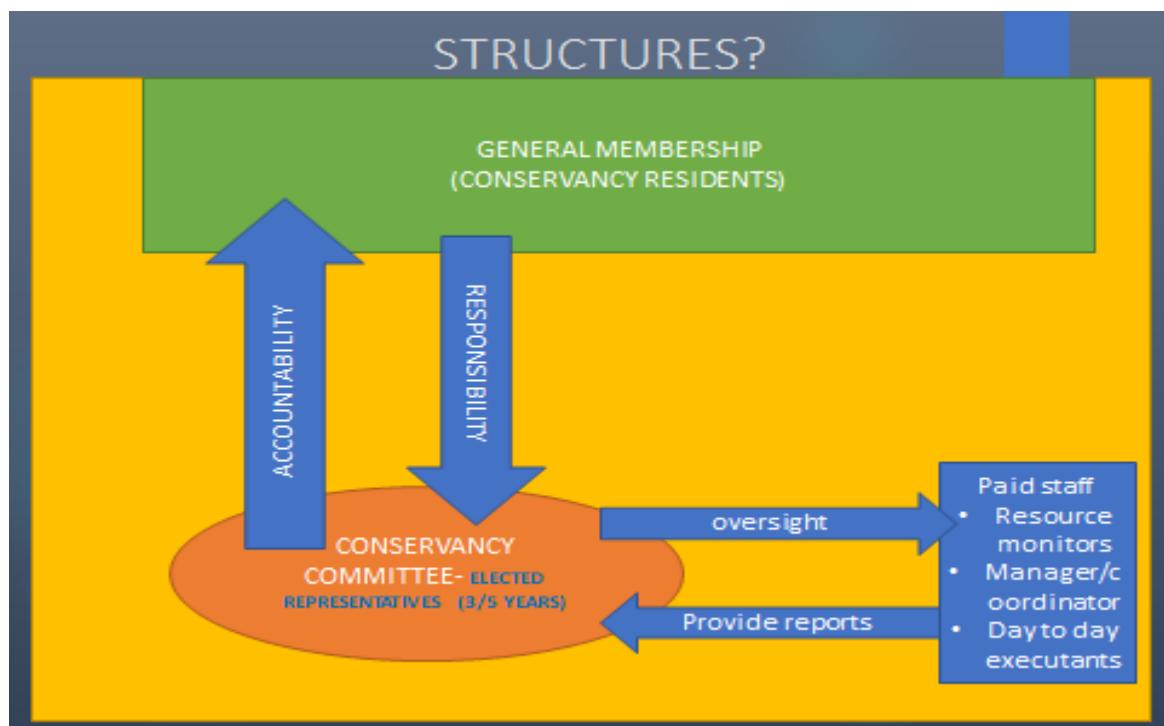
However, reality and theory do not always partner as well as we would like, especially where social dynamics are concerned. Criticisms on CBNRM in Namibia (Lapeyre 2010) centre on the idea of CBNRM not being ‘community-based’ at all but rather ‘committee-based’. What this means is that critics believe that too much power rests with these elected committees who are often accused of elite capture, mismanagement, and corruption.

Drawing on these criticisms, Mosimane and Silva (2015) found that benefit distribution in two Namibian communal conservancies was underdeveloped, and that governance should be strengthened at conservancy management level. Saunders (2014) offers a more general critique of CBNRM wherein it is proposed that deficiencies in governance are fundamentally based on the incorrect assumption that the ‘C’ in CBNRM represents a homogenous

community. Added to this, Fabricus & Collins (2007) note that fundamental assumptions of communities as homogeneous entities are pervasive in CBNRM initiatives and have resulted in the failure of a number of these programmes. Saunders uses examples from across southern Africa to illustrate that management of community-based organisations is often found to be in the hands of the more educated members of a population and that these individuals do not necessarily always have the best interest of the entire population as their chief motivation, resulting in an unequitable power dynamic (Saunders 2014; Nelson & Agrawal 2008).

Figure ix below illustrates an organogram of a conservancy structure. The bottleneck often comes at the conservancy committee level where the individuals who are elected from within conservancy membership, have direct access to conservancy funding and are responsible for ensuring equitable distribution of benefits to members.

**Figure ix: Conservancy governance flow chart, taken from Malherbe & Andreas presentation at community conservation forum, Halifax Canada 2018**



Although no conservancy has ever been de-gazetted in Namibia, the government - through the Ministry of Environment, Forestry and Tourism (MEFT) - has been working to address the

perceived corruption and mismanagement which has made national headlines (Namibian 2017).

### **3.3.6 Relevance to this Study**

What does elite capture, mismanagement and corruption at conservancies have to do with this study? Ensuring that benefits trickle down to members and that the overall governance of the conservancy is conducted in a transparent and accountable manner is the responsibility of the conservancy management committee. It is assumed here that the trickle down of benefits derived from tourism directly linked to the conservation of black rhino will affect conservancy members' perception of these animals.

In a systematic, large-scale review of CBNRM outcomes in sub-Saharan Africa, Galvin et al. (2018) show that a more robust framework for monitoring the achievements of CBNRM might assist in overcoming some of these challenges - with a particular emphasis on improving human wellbeing. The authors suggest that this could be achieved through establishing governance structures which take into consideration the role of social dynamics of a particular population, emphasising that there is no one-size-fits-all structure (Galvin et al. 2018; 12).

The conclusion that improved governance will have a positive effect on social and ecological outcomes is logical but comes with a cautionary note that improved governance means something different in each geographical area which is characterised by its own social, political, and ecological circumstances. These fundamental differences mean that for Community Based Natural Resource Management to achieve its objectives, constant reflection and adaptative management is required (Child 2019). This is especially relevant in the Namibian context where role players from non-governmental organisations (NGOs), Government, academics and the conservancies themselves, have recognised that governance systems need an overhaul to function sustainably (NACSO 2018).

### **3.4 CRITICAL EVALUATION OF COMMUNITY BASED NATURAL RESOURCE MANAGEMENT**

Despite positive outcomes associated with an increase in wildlife numbers and financial returns to communities in Namibia and elsewhere, CBNRM should not be viewed as a panacea to rural development issues and the concept is not one size fits all (Hulme & Murphree 1999; Saunders 2014). Donors, development practitioners, communities and governments should recognise the need to work together to overcome the myriad challenges faced by community-based organisations (Suich 2010; Silva & Mosimane 2012).

These challenges range from weak internal governance to misuse of funds and lack of transparency. It could be argued that these challenges have their genesis in the notion of a homogenous community as conceptualised by development practitioners who may have the best intentions. Added to the challenges around governance and implementation, the illegal wildlife trade has more recently been noted as one of the major hurdles facing CBNRM initiatives in the region (Biggs et al. 2016).

It has been shown above that Namibia has a one of the most favourable policy environments in southern Africa which is key to realising CBNRM objectives. However, an enabling policy does not necessarily translate into a successful programme. Adaptive management, good governance and equitable benefit sharing need to be considered. These issues require constant attention as they are constantly evolving according to external pressures such as an increase in poaching.

To address these issues at grassroots level, the need for continued meaningful engagement both within and with community conservancies is clear. A study which helps practitioners to understand more about local perceptions on wildlife and tourism might serve to assist decision makers to improve management practices. An improved understanding of these key issues could contribute to building sustainability of CBNRM, which is by now an internationally recognised form of rural development.

### **3.5 CONCLUSION**

This study is situated conceptually and spatially in the CBNRM model. This chapter presented an overview of CBNRM; firstly, discussing the central theoretical foundations and providing some context to CBNRM in other southern African countries. Favourable political will and enabling policy were noted as key drivers to successful CBNRM initiatives. Despite enjoying arguably, the most enabling policy environment on the continent, Namibia still exhibits significant challenges related to governance. These were highlighted with possible root causes discussed. It is hoped that findings from this study can be used to support ideas relating to inclusive benefit distribution methods and transparent governance at communal conservancies in Namibia. The following chapter presents the research methods used during the study.

## **CHAPTER 4: RESEARCH METHODOLOGY AND DESIGN**

### **4.1 INTRODUCTION**

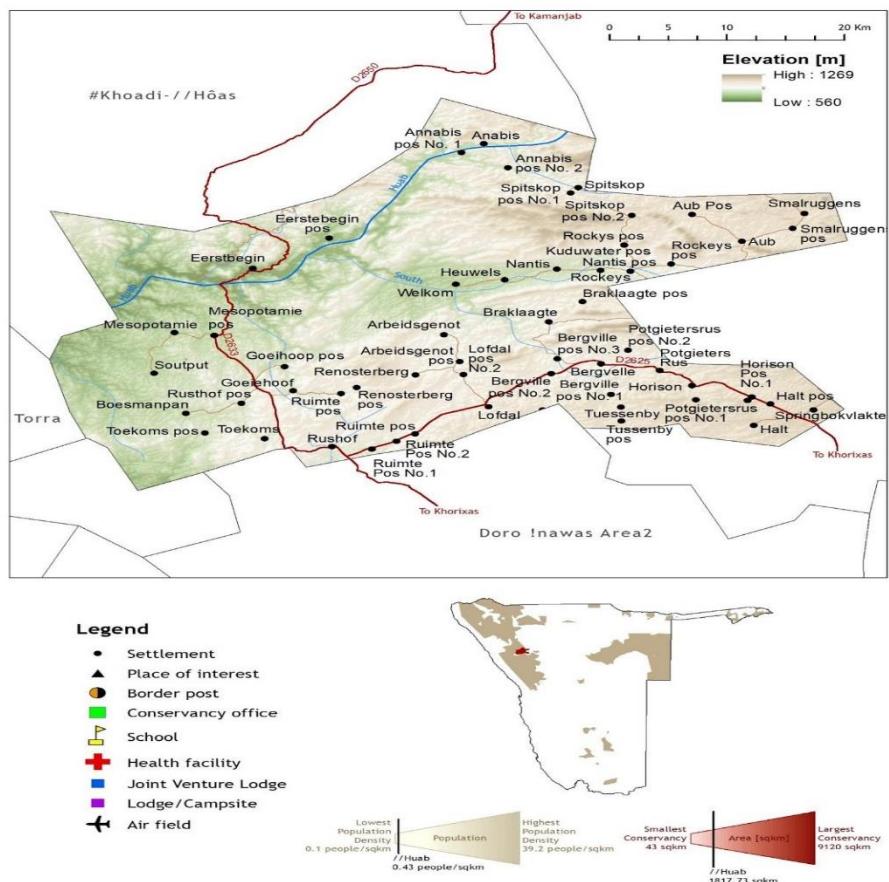
The previous chapters discussed the literature related to the research question and positioned this study within current academic discourse. The following chapter discusses the research methods and design used during this study. The chapter begins with a description of the study area and moves on to outline and justify the methods used to gather data. The chapter concludes with a section on the important component of ethical considerations and outlines how these were employed throughout this study.

### **4.2 STUDY AREA**

This study was conducted in the Kunene region, situated in north-western Namibia. The conservancy where surveys were administered is named //Huab conservancy. //Huab conservancy was formally recognised as a community-based organisation in July 2003. The conservancy covers an area of around 1,800km<sup>2</sup> (NACSO 2018) and is named after the ephemeral river //Huab which is a prevalent feature in the northern part of the conservancy area. //Huab conservancy is bordered by three communal conservancies to the north, south and west. These are Torra, Doro !nawas an #Khoadi-//Hôas conservancies. To the east //Huab is bordered by the municipality of Khorixas – one of the largest towns in the Kunene region – and commercial farmland.

The conservancy is made up of 5 geographical areas. Main homesteads and villages were visited by the survey team, which was made up of a local translator and the researcher himself. Figure x below is a map of the conservancy depicting the main villages and homesteads and the conservancy's position in relation to neighbouring conservancies. The conservancy area is also highlighted in red on the map of Namibia which is shown under the conservancy map.

**Figure x:** //Huab communal conservancy map, main picture shows main villages, underneath is the conservancy's location within Namibia (NACSO 2018)



For most of its history //Huab conservancy only received income from a trophy hunting quota which was sold to various operators since 2003. Traditionally, the conservancy has struggled to cover the costs of its natural resource management obligations and has not provided tangible benefits to its members (NACSO 2021). Major wildlife resources present in the conservancy are elephant, mountain zebra, oryx and springbok. //Huab conservancy signed the rhino custodianship agreement (see chapter 2, 2.7.1) with the Ministry of Forestry, Environment and Tourism in 2008. At the time of writing, //Huab conservancy employed a manager and four community game guards. The elected management committee consists of five men and three women with the Chairperson being female (NACSO 2021)

The conservancy was chosen as a target site because in 2016 it partnered with a private sector tourism operator and is currently benefitting from rhino-based tourism (see chapter 2, 2.7).

Ultimate Safaris is a majority Namibian owned safari company which currently maintains 5 properties. Two of these properties are in the southern tourism hotspot area of Sossus Vlei, one is situated in Windhoek and two are situated in the communal lands of north-west Namibia. One of these sites is //Huab Under Canvass.

//Huab Under Canvas is a seasonal joint-venture operation started inside //Huab conservancy with the express aim of offering black rhino tracking on foot to guests. The black rhinos in //Huab conservancy are the main attraction for guests spending time at the camp. The tracking is based largely on the rhino tracking viewing protocols outlined in chapter 2, section 2.7.2.

Table ii below shows a breakdown of cash received by the conservancy between 2016 and 2018. In addition to cash payments for site rental and a cash payment per guest per night Ultimate Safaris funds salaries for Rhino Rangers. These rangers are members of the local community and are lead trackers during the rhino activities.

**Table ii:** Direct cash payments from Ultimate Safaris to //Huab conservancy. Financial data was obtained from Ultimate Safaris via email

| Item  | 2016          | 2017          | 2018           |
|---|---------------|---------------|----------------|
| Monthly rental (N\$2,000/month for 2016 & 2017 increasing to N\$2033 in 2018)                       | NAD 24,000.00 | NAD 24,000.00 | NAD 24,400.00  |
| Nightly rate per guest (N\$100/guest/night in 2016 & 2017 increasing to N\$200/guest/night in 2018) | NAD 11,700.00 | NAD 72,600.00 | NAD 174,200.00 |

|   |               |                |                |
|---|---------------|----------------|----------------|
| Payment per guest for rhino activity (N\$300/guest for 2016 & 2017, increasing to N\$500/guest in 2018) | NAD 15,600.00 | NAD 92,100.00  | NAD 185,000.00 |
| Rhino Ranger salaries: 2 Rangers salaries for 2016 & 2017 increasing to 5 rangers in 2018               | NAD 15,840.00 | NAD 17,424.00  | NAD 48,000.00  |
| TOTALS  | NAD 67,140.00 | NAD 206,124.00 | NAD 431,600.00 |

A significant increase in conservancy revenue is shown in table ii above. Between 2016 and 2018 a 540% increase in cash and other benefits going to the conservancy is recorded. In addition to cash payments for rental and guest activities the conservancy is also able to employ extra Rhino Rangers who take guests tracking during the rhino activity.

Cash payments and employment generated from the camp is directly linked to the presence of black rhino in the conservancy. Situated within the conservancy model of community participation - through the use of local rangers during tracking - and cash payments to the conservancy from private sector, these factors combine to set the scene for a useful addition to social research aimed at understanding more about the role of tourism as a rural development tool.

### **4.3 RESEARCH METHODOLOGY**

Research methodology can be broadly described as the employment of methods to act as the foundation which guides the study (Creswell 2007). Pandey and Pandey posit that the method

of research can be categorised into historical, philosophical, survey research, experimental and case study research (Pandey & Pandey 2015).

This study employs the case study methodology which is noted as research that deals in specific events or cases, explores a contemporary phenomenon (Yin 2014; 13) and can be made up of qualitative or quantitative data collection techniques (Pandey & Pandey 2015). The choice of the case study methodology and the use of qualitative and quantitative methods is further discussed in the research design section below.

#### **4.4 RESEARCH DESIGN**

Research design is defined as the plan of how the research will be conducted and outlines details on how the chosen methodology will link various components of the study together to formulate a valid and comprehensive answer to the research question (Akhtar 2016; Babbie 2014).

According to Pandey and Pandey a good research design uses established scientific techniques to ‘minimise bias and maximise the reliability of the data collected’ (Pandey & Pandey 2015; 21). This study employs two main designs - namely qualitative and quantitative questions - to answer the research question (Creswell 2007). Below, a separate definition is given for qualitative and quantitative survey design. The section finishes with a justification on the researcher’s choice of the mixed method design.

##### **4.4.1 Quantitative Research**

Quantitative research is primarily concerned with quantities, using data obtained through structured forms of collection methods such as online polls, online surveys and sometimes from face-to-face interviews (Mouton 1996). Quantitative research is based on positivism and empiricism, what is colloquially known as ‘traditional’ scientific enquiry (Akhtar 2016). This is the type of research usually used to establish hard truths or facts about a certain phenomenon or population.

#### **4.4.2 Qualitative Research**

Qualitative research is concerned with the ‘why’ rather than the quantitative ‘what or how many’ (Blanche et al. 2009; Cohen et al. 2000). For example, whilst quantitative data helps researchers to understand *how many* people voted for a certain political party, qualitative data will help us to understand *why* they voted for that party (Mouton 2006). Major characteristics of the qualitative approach to scientific enquiry centre on the importance of the human dimension of feelings and emotions as motivators for action and can take the form of open-ended questions (Yin 2014). These questions are often asked to hear what Creswell (2007; 40) notes as ‘silenced voices’ belonging to people who are not ordinarily heard.

#### **4.4.3 Mixed Methods Approach**

The researcher decided on the use of a mixed methods approach to collecting data comprising the use of both open and closed-ended questions. This method entails the use of both qualitative and quantitative data gathering (Akhtar 2016; Creswell 2007). The mixed methods approach was chosen as it can help to bolster the quality of the data as using the approaches simultaneously allows the researcher to ask a more qualitative question which can justify the quantitative answer (Creswell & Plano Clark 2011). Mixed methods are often employed in case studies, driven by the need to uncover richer data on a specific social situation (Yin 2014).

#### **4.4.4 Case Study**

Case studies are used to uncover possible contradictions in existing theories (Creswell & Plano-Clark 2011). Babbie (2014; 318) describes case studies as in-depth investigations of social phenomena in a specific unit of analysis. To unpack issues in this very specific geographical area and target population a case study research method was deemed most suitable.

The literature review highlighted current contradictions between different approaches to combatting wildlife crime in Africa. The call for an increase in military-type presence in areas at high risk of poaching versus the call for more meaningful community participation are often

seen as contradictory approaches to solving the same problem (Duffy 2014; Lunstrum 2014). A small but steadily increasing body of literature suggests that more community engagement and access to benefits from resources could help to change local perceptions and create a more tolerant view of wildlife (Muntifering et al. 2020; Saayman & Saayman 2016; Snyman 2012).

This study attempts to understand more about how local people might be viewed as the solution to the wildlife crime problem and not necessarily the cause of it. The study unpacks possible contradictions using a case study approach, allowing for the voices of conservancy members to be heard and viewing the research through a pragmatic theoretical paradigm. The theoretical paradigm underlining this study is discussed in the section below.

#### **4.4.5 Theoretical Paradigm**

A theoretical paradigm is described as the use of a general theoretical approach during the research design phase, the collection of data and the analysis of data (Walliman 2011, 175). According to established social research methodological experts, our individual world views may have a strong influence in the design of a research approach and the selection of a theoretical paradigm within which our research is situated (Creswell & Plano-Clark 2011; Guba & Lincoln 2005). Postpositivist, constructivist, pragmatist and participatory world views are noted as being the most common influencers of social research design (Tashakkori & Teddlie 2003).

This study uses pragmatism as its theoretical lens. Pragmatism allows the researcher to understand more about their own motivations and the way those motivations might influence the research design itself (Guba & Lincoln 2005; Morgan 2014). Rather than attempting to find absolute truths, pragmatism recognises that the ontology of ‘knowing the truth’ is very difficult if not impossible to measure through social research. This lends itself to the research results being case specific rather than generalisable (Tashakkori & Teddlie 2003). This aspect of pragmatism is well suited to the case study methodology employed in this study. In addition, pragmatism is also associated with testing hypotheses - looking at what works and

what does not work; and usually fits in well with the use of a mixed methods approach, combining qualitative and quantitative data collection instruments (Morgan 2014).

Finally, the use of pragmatism and the emphasis on the researcher's own motivations is important to acknowledge in the process of conducting this study because the framing of the research question was influenced by the researcher's own circumstances and interests as a community development practitioner and conservationist working in the landscape where the study is situated. This point is further discussed in the limitations section in chapter 6 section 6.5 in the final chapter.

#### **4.4.6 Validity**

Validity refers to a measurement instrument that measures what it is intended to measure (Pandey & Pandey 2015; 21). Cohen et al. (2000) emphasise that richness of data can address issues of validity in qualitative studies.

To ensure valid measurement, variables need to be established (Babbie 2014). Mouton broadly describes *independent* variables as the cause and *dependent* variables as the effect (Mouton 1996). What the research question is attempting to answer is how rhino tourism, the independent variable, might affect conservancy members' attitudes towards conservation and sustainable development inside the conservancy area.

The study addressed issues of validity through first establishing dependent and independent variables which were intended for measurement and then ensuring that these variables are based on the research question. The researcher designed the survey instrument to ensure that the questionnaire incorporated relevant questions to measure these variables. Finally, validity was realised by conducting a pre-test of the interview questionnaire on 2 conservancy members. This was done to ensure that the instrument was an accurate measurement tool for the collection of data valid to the research question.

#### **4.4.7 Reliability**

Reliability is defined as consistency of results of a measurement (Pandey & Pandey 2015; 22). A study is considered reliable if the same respondent supplies the same answer to the same question even if asked at a later date (Walliman 2011). During the data collection phase of the study, reliability was realised by administering the same questionnaire to all respondents. In terms of a case study, the level of reliability expected is necessarily quite low (Yin 2014). This is because a case study is focused on a specific area of interest with a specific sample population.

The results of this case-study would therefore not necessarily be the same if conducted in a different conservancy in Namibia or even a different community-based organisation in a different country. What is possible though, is to understand more about general attitudes of conservancy members in relation to rhino conservation at this conservancy and to look at possibly replicating similar studies across more conservancies in Namibia so as be able to generate a generalisable comparison.

#### **4.4.8 Triangulation**

Triangulation is defined as the mixing of primarily qualitative and quantitative research methods to improve on the credibility of the data (Hussein 2009; 2). Triangulation is therefore used in research to develop a more richly layered interpretation of data (Macdonald & Headlam 2008). This study employed triangulation of responses using the mixed method approach, making use of both qualitative and quantitative data collection approaches to increase the richness of the data.

Added to this, the study used research conducted by !Uri-≠Khob (2004) to compare responses over time to similar questions posed during the current study. !Uri-≠Khob (2004) conducted his study on conservancy members' attitudes to the possible reintroduction of black rhino to //Huab conservancy. The results of the current study were compared to results of !Uri-≠Khob's study thereby achieving a deeper level of triangulation.

## **4.5 DATA COLLECTION**

Kabir (2016; 202) defines data collection as the process of capturing information on phenomena of interest. It is important that the collection of data is done systematically and with a high degree of relevance to the research question (Kabir 2016). Data for this study was collected in the form of one-on-one interviews and was captured during 48 interview sessions which took place over two separate field trips, taking place between September and October 2020.

### **4.5.1 Pre-Testing of the Research Schedule**

A research schedule was developed during early 2020 but, due to the Coronavirus pandemic and associated national lock down, the pre-testing did not take place until September 2020. Pre-testing of a questionnaire is conducted to address issues of validity (Drost 2011). A pre-test also attempts to establish whether the intended participants are likely to be able to respond to the questions.

Firstly, the research schedule (annexure 2) was shared with the relevant government line Ministry responsible for providing support to communal conservancies. The Ministry of Environment, Tourism and Forestry (MEFT) CBNRM warden for the region was contacted and the purpose of the research was explained to her. Relevant permissions from MEFT were granted and the survey was then sent, via email, to the conservancy chairperson for comment. The initial draft of the survey was then pre-tested in September 2020 by the conservancy manager and the conservancy chairperson.

The researcher travelled to the conservancy area and conducted the pre-test to understand whether there were any potential problems with the type of questions proposed or with the methodology employed. After the pre-test was conducted, 3 questions were removed from the schedule. The questions were removed based on recommendations from the pre-test. Two of the questions were considered too complicated to understand and the third question related to a current contentious issue in the conservancy around mining as a competitive land-use to rhino conservation and tourism. Following the pre-test, the conservancy chairperson informed

the conservancy management committee that the research was going to take place and the researcher was granted permission to conduct the survey work.

## **4.6 FIELD WORK**

A total of 48 respondents were interviewed during face-to-face sessions. The researcher conducted most surveys himself with help from a research assistant to translate where necessary. The research assistant is an employee of Save the Rhino Trust and is currently project coordinator for the community outreach programme entitled, the Rhino Pride Campaign. The research assistant has conducted field-based research on two separate occasions before this study. The data collected by the assistant during a recent research survey is under review for publication in a well-known academic journal.

With the help of the research assistant, the respondents were asked whether they preferred to speak in the local language (Khoekhoegowab) or in English or Afrikaans. There was no set length for the session and conversation was encouraged.

Participant's responses were captured onto the questionnaire by the researcher or the research assistant. This method was adopted as some of the participants were unable to capture their own responses due to low levels of literacy. The questionnaires were numbered and sorted according to the respective name of the village where the data was captured. When approached, all respondents agreed to be interviewed with the researcher first establishing whether the person was a //Huab conservancy member before proceeding. Interviews were conducted at participant's homesteads in a relaxed atmosphere.

### **4.6.1 Informed Consent and adherence to Coronavirus regulations**

According to Babbie (2014), participants in social research should be given a clear explanation regarding the proposed research and should be given the right to refuse to take part in the research. Each participant was informed of the confidential and anonymous nature of their responses and permission to interview was requested before the session started. The

participants were also informed that a summary of the results of the survey would be available at the conservancy office once the study was finalised.

During the time of the data collection (September – November 2020), Namibia’s state of emergency was relaxed and restrictions on travel and gatherings of people reverted to pre-Covid19 status. Nevertheless, social distancing was maintained during interactions with participants and hand sanitizer was used regularly. Finally, all interviews were conducted outdoors or in very well-ventilated areas, helping to curb the potential spread of the Coronavirus.

## **4.7 DATA ANALYSIS**

Data analysis is the process of sifting through collected data to establish patterns and meaning which in turn are linked with the objectives of the study (Creswell 2007; 147) and is defined as the somewhat complicated process of categorising, comparing and synthesising data in order to provide answers to the research question (Babbie 2014). It follows that this process is integral to any social research as it informs the outcome of the study (Pandey & Pandey 2015). After primary data collection took place during September and October 2020 the analysis process began, with the bulk of the data having been electronically captured by mid-November 2020. Qualitative and quantitative data was analysed using descriptive and thematic analysis, respectively.

### **4.7.1 Structure of Questionnaire**

As discussed in section 4.4 the questionnaire comprised open and closed-ended questions. Initial questions established demographics of the participant including age bracket, gender and length of time as a conservancy member. The surveys then moved to Likert scale responses where respondents were able to choose between a suite of five answers from ‘strongly agree’ to ‘strongly disagree’ (Johns 2010; Likert 1932). Likert scales are helpful when measuring attitudes or perceptions and assessing levels of agreement or disagreement

with statements (Johns 2010; 1). Some Likert scale questions were followed by an open-ended question, aimed at eliciting a voluntary justification for the particular response. This open/closed combined approach is believed to be useful when attempting to understand the quantitative data obtained from the Likert scale questions (Johns 2010).

#### **4.7.2 Likert Scale Analysis**

Responses from the Likert Scale questions were analysed using descriptive analysis. Descriptive analysis is the process of using tables and graphs to create a description of data obtained during research (Creswell 2007; 167). All responses were inserted into a specifically developed Microsoft Excel spreadsheet. The researcher captured each response according to pre-determined class ages. From these data, tables and graphics have been developed and are presented in chapter 5.

#### **4.7.3 Thematic Analysis**

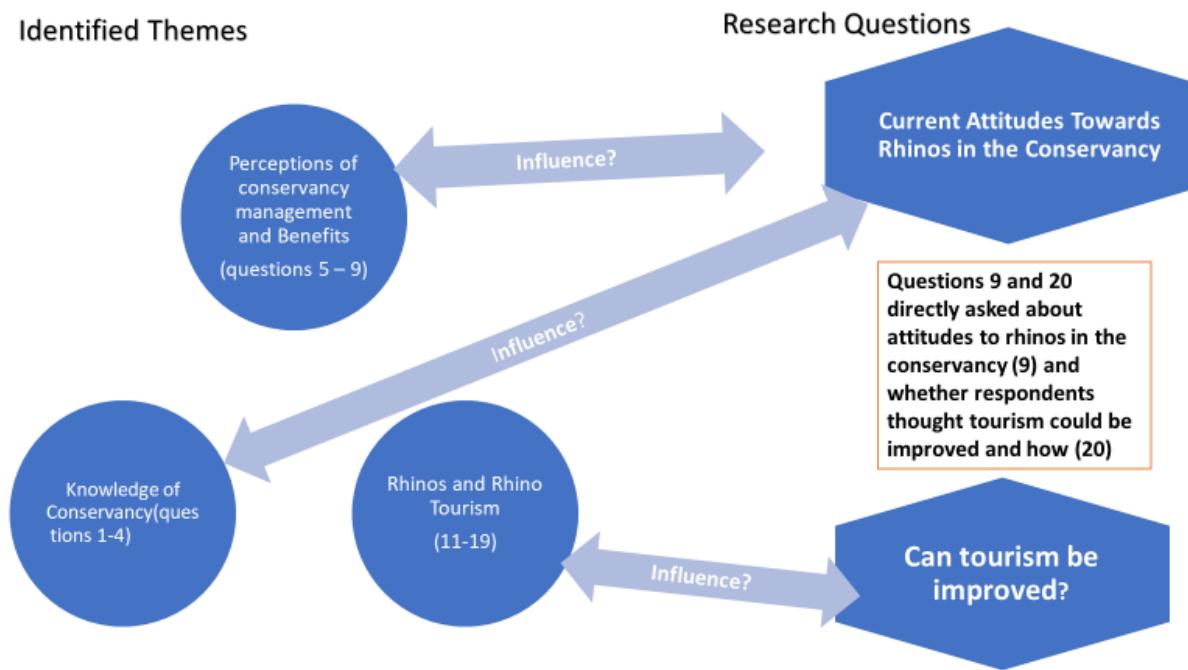
Thematic analysis is the process of reflexively and methodically working through raw data in order to obtain useful results (Attride-Stirling 2001). Extraction of data from the interviews used thematic analysis based on Nowell et al. (2017) thematic qualitative data analysis process. This process highlights reflexivity and aims to build trustworthiness of analysed data through improving reliability and validity of qualitative data representation. This approach is deemed by Nowell et al. (2017) as important to build a reliable and valid analysis of qualitative data. In academic literature qualitative data analysis is recognised possibly the most complex component of the study and that there is in fact no single ‘correct’ way to conduct the analysis (Creswell 2007; Nind et al. 2011).

Thematic data analysis ensured that all qualitative responses were categorised according to major themes recurrent in the study, deemed by the researcher to have a possible influence on the main research questions. After thorough analysis, responses were broken down into themes relating to the main research questions and a mind-map approach (Crabtree & Miller

1999) was used to compartmentalise the themes and their linkages to the main research question. The themes are inserted below as bullet points and the mind-map is reproduced in figure xi below:

- Knowledge of the conservancy including its main income stream and current tourism joint venture partnership;
- Perceptions of conservancy management and benefits;
- Attitudes towards rhinos and rhino tourism in the conservancy.

**Figure xi:** Mind-map of themes and relationships to research questions



#### 4.5.2 Data Sources

Babbie (2014; 120) states that the two main types of data sources are primary and secondary. Primary data sources are collected by the researcher during the study. Secondary data sources are academic journal articles, books, government gazettes, management plans and other

credible literature. During this study, the researcher collected primary data from willing participants using semi-structured interviews. Reference is made to some secondary data which has been already collected on attitudes towards rhino reintroduction to the target area (!Uri-≠Khob 2004). In addition to this, reference is made to numerous sources throughout the study such as academic journal articles, books and various other resources which were consulted.

#### **4.6 TARGET POPULATION**

The population of the study is that group from which the study will attempt to draw conclusions (Babbie 2014; 119). The survey was administered to people living within the conservancy and who are classified as members of the conservancy. Conservancy members form the target population of this study as they are eligible to receive benefits from the conservancy and to vote for conservancy management committees. A fundamental component of this study aims to understand more about the effect of tourism and benefits from tourism on members' perceptions around rhino conservation; hence the choice of //Huab conservancy members as the target population in this study. Although the total population residing in the conservancy was estimated at 930 (NACSO 2015) not all these people are members of the conservancy. The conservancy is governed by a constitution which stipulates conservancy membership criteria. At //Huab conservancy people are deemed eligible for membership if they are:

- Over 18 years of age
- Born within the conservancy or have lived in the conservancy for more than 5 years
- Married to a conservancy member
- Not a member of another conservancy

A membership register is supposed to be updated annually, and new members are added or removed if, for example, they have moved out of the conservancy area. When the researcher requested to see the membership register, the conservancy was unable to produce an up-to

date register. Official records from 2018 state there are 130 conservancy members at //Huab (NACSO 2018).

#### **4.6.1 Sampling**

Sampling is the selection of individuals in the target population to take part in the study and must be done in such a way as to ensure that every individual can take part in the study (Pandey & Pandey 2015). It is thought that by understanding the characteristics of a certain sample, the study will be able to infer certain generalisable traits about the rest of the population without having to complete the process of interviewing the entire target population one by one (Walliman 2011).

To ensure that every conservancy member had an opportunity to participate in the survey, the team visited as many different homesteads and villages as possible. Using this method, the researcher was able to adhere to what Pandey and Pandey (2015; 44) highlight as the ‘Essentials of an Ideal Sample’:

- Homogeneity (all participants were conservancy members)
- Adequacy (we reached >10% of the target population)
- Independence (all participants were free to be included in the sample) and
- Representativeness: the sample should represent the whole data adequately.

#### **4.6.2 Sample Size**

In order to determine a representative sample size from the target population the researcher estimated a margin of error of 11 combined with a confidence level of 95%. Using surveysystem.com the researcher was able to calculate that:

Population =130 X 11 margin of error X 95% confidence level = recommended sample size:  
50

Obtaining 50 respondents over the given timeframe seemed reasonable in terms of logistics and exceeds the 10% which Pandey and Pandey (2015) highlight as an adequate sample size.

Unfortunately, the research team managed to interview only 48 conservancy members, 2 short of the targeted 50.

#### **4.6.3 Type of Sampling for this Study**

Purposive sampling was used during this study. Purposive sampling is a type of nonprobability sampling which entails the deliberate selection of individuals in the sample population based on certain attributes (Etikan et al. 2016). In this case, the determining factor – or attribute – was whether the conservancy member was present at home when the team arrived to conduct interviews. This type of sampling was used because the sample frame – the conservancy membership register – was not up to date with names and farm numbers of all residents.

Purposive sampling was employed because of the uncertainty around whether members might be at their homestead during the study period, how many members might be at home at a given stage and the logistical challenges of travelling throughout the relatively large conservancy area. The conservancy is divided into 5 main areas named after the largest settlement in each area. During data collection the team visited each of these areas, stopping at the largest cluster of houses and enquiring whether conservancy members were available and willing to be interviewed. Using this strategy, the team was able to interview 48 participants during 2 separate field trips, 2 less than the planned 50.

The discussion below now turns to the important aspect of ethical considerations during social research.

#### **4.7 ETHICAL CONSIDERATIONS**

Social research requires working with human participants which necessitates fair and decent treatment of participants before, during and after the study (Walliman 2011). It is further noted that good research is collected based on trust between the participant and the researcher and it is therefore important to respect the rights and interests of the participants in any research endeavour (Babbie 2014).

As this study is focused on understanding attitudes and has a qualitative aspect, comprising one on one interviews, it was important to recognise the participant's point of view as being fundamental to the study and its success. The emphasis on the practical usefulness of the study results during the research process is central to qualitative interviews which attempt to understand attitudes towards a specific phenomenon (Nind et al. 2011). The following sections highlight each stage of the study, documenting relevant permissions obtained by the researcher and concluding with a note on the practical application of the research findings.

#### **4.7.1 Before the Study**

A comprehensive ethical clearance form was completed and approved by the university's ethics committee. Once ethical clearance was obtained, the Ministry of Environment, Tourism and Forestry were contacted. A copy of the questionnaire was sent to the CBNRM warden for the region and permission was granted to conduct the study. Following this, a letter was drafted and sent to the conservancy to inform them of the intention to conduct research in the conservancy area (annexure 1). The letter was accompanied by the questionnaire so that conservancy leadership were fully aware of the proposed questions. Confidentiality of data was discussed in the letter and a commitment was made by the researcher to share the completed research analysis with the conservancy. During pre-testing, the researcher presented the survey questionnaire to the conservancy chairperson and the conservancy manager, working through question by question to ensure that senior conservancy management was aware of the content of the intended research. No personal risk or harm was envisaged for any of the participants of the research and the only cause for potential temporary discomfort would be the time spent during the interview.

#### **4.7.2 During the Study**

Before commencing each interview –after confirming that the individual was a conservancy member - the researcher requested permission from the participant to conduct the interview. Each participant was informed that the session would take between 15 and 20 minutes of their time. All participants approached by the team agreed to be interviewed. During the

introduction of the study and the research team, participants were informed that the data gathered would remain anonymous and confidential. The team made sure to emphasise to each participant that neither their name nor identification (ID) number would appear on the survey questionnaire.

Participants were also informed of the purpose of the study (see annexure 2 for the survey schedule and introductory paragraph) and were told that if, at any time, they felt uncomfortable with the questions or with the process, they could request to immediately stop the interview or they could simply decline to answer questions which might make them feel uneasy. In this respect, the researcher did his best to keep participants at ease, emphasising the fact that participation was voluntary, and responses will remain anonymous and confidential.

The team comprised a research assistant who was able to translate and the researcher himself. The translator was used to explain to questions to participants where they indicated that translation is needed. If participants felt more comfortable speaking in the local language the translator was used for the duration of the interview.

#### **4.7.3 After the Study**

Findings will be presented to the conservancy management committee in the form of graphs and tables representing overall numbers and individual participant's narrative answers. It is hoped that the //Huab community conservancy management team will use the information presented to understand more about the perceptions of its members which in turn might help to guide conservancy management in the future. The external dissemination of the study will abide by any guidelines set out by the Ministry of Environment, Forestry and Tourism in Namibia. Finally, the services of a qualified copy editor were employed as per the University of South Africa requirements. The copy editor's declaration can be viewed as annexure 3.

## **4.8 CONCLUSION**

The study took place in //Huab conservancy, situated in the Kunene region of Namibia. A case study method was employed, and a mixed methods design was used to develop the questionnaire which comprised open and closed-ended questions. During the collection of data, conversation was encouraged with participants. Open-ended questions added a layer of richness to the data through providing a more nuanced understanding of participant's feelings and attitudes.

Data collection took place at 5 different locations in the conservancy during 2 separate field excursions between September and October 2020. One-on-one interviews were conducted to collect interview data from 48 respondents, 2 short of the intended sample of 50 participants. The interview team comprised 2 individuals with the researcher conducting most of the interviews himself, with the help of a translator when required. The next chapter discusses the research findings.

## **CHAPTER 5: PRESENTATION AND DISCUSSION OF THE RESEARCH FINDINGS**

### **5.1 INTRODUCTION**

This chapter will present and discuss the findings of this study. The presentation of results begins with a breakdown of demographics and income of the participants. The data is then divided into themes and presented in tabular and graphic format with explanations to discuss the findings under each section.

### **5.2 PRESENTATION OF DATA**

Demographic data is presented in tabular format first, followed by the thematic analysis of the data. Quantitative data extracted from the Likert scale responses will be presented in tabular format, followed by analysis of the open-ended responses with some responses inserted into figures according to themes identified during thematic analysis.

#### **5.2.1 Demographic Data**

Table iii shows that the age class with the highest response rate was >50. This can be explained by the fact that most homesteads visited were inhabited by elderly people. This is the case because most of the farms are remote and many younger people attempt to find employment in the larger towns of Namibia, returning to their farms during weekends or holidays.

*Table iii: Age distribution of participants*

|                | <b>Male</b> | <b>Female</b> | <b>% of Total</b> |
|----------------|-------------|---------------|-------------------|
| <b>18-25</b>   | 6           | 1             | 15,22             |
| <b>25-35</b>   | 5           | 6             | 21,74             |
| <b>35-50</b>   | 7           | 5             | 23,91             |
| <b>Over 50</b> | 8           | 10            | 39,13             |

|                |               |               |         |
|----------------|---------------|---------------|---------|
|                | 26            | 22            |         |
| <b>% Total</b> | <b>54,17%</b> | <b>45,83%</b> | 100,00% |

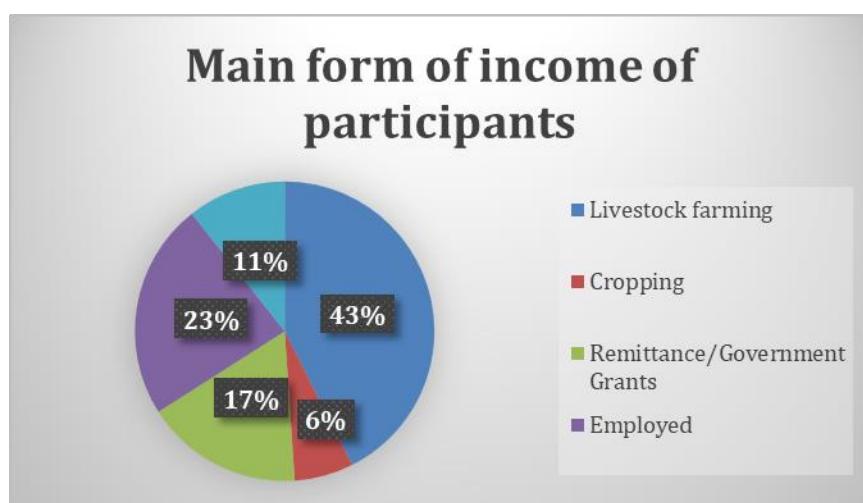
### 5.2.2 Main Form of Income of Participants

Figure xii below shows the percentage spread of main forms of income to participants. As expected, most of responses indicated livestock farming as the main form of income. The communal area of //Huab consists mainly of small stock farmers who raise goats, sheep and cattle in the semi-arid landscape.

Cropping (6%) is quite low as many farms are frequented by elephants. If not properly protected, vegetable crops are likely to become elephant food. Most farmers do raise some subsistence crops, such as spinach but these crops are not sold for an income.

The majority (75%) of respondents did not consider themselves formally employed. The percentage of people noting livestock and cropping as primary forms of income is close to half of the respondents (49%). This helps us to understand that natural resources such as healthy rangeland and a good water supply are of paramount importance to the people that reside in //Huab conservancy.

**Figure xii: Main sources of income to participants**



### **5.2.3 Knowledge of the Conservancy**

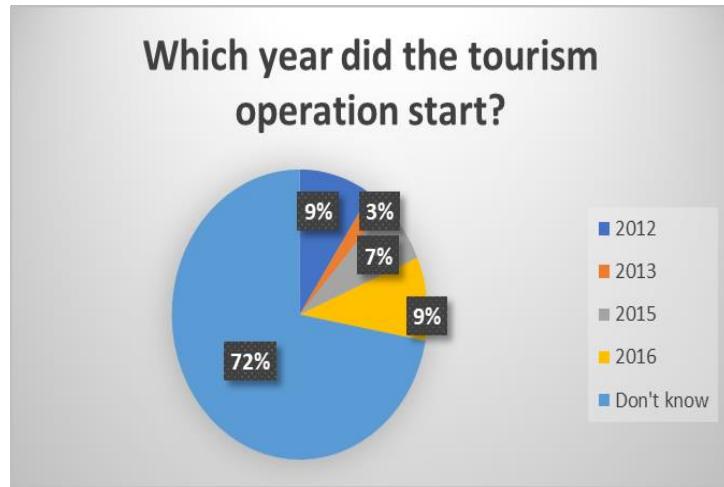
Following the demographic questions, the survey aimed to obtain data relating the participants' knowledge of their conservancy. Although not a specific research objective, the researcher believes this is relevant as the study seeks to understand how perceptions might be impacted by the advent of tourism in the conservancy area. It follows that it is important to understand more about the level of knowledge participants have of the current tourism enterprise and of the conservancy itself.

As highlighted in Chapter 3, the conservancy management system is built on notions of transparency. To ensure transparency, all details of a joint venture contract should be shared with members of the conservancy during conservancy membership meetings (Kavita & Saarinen 2015).

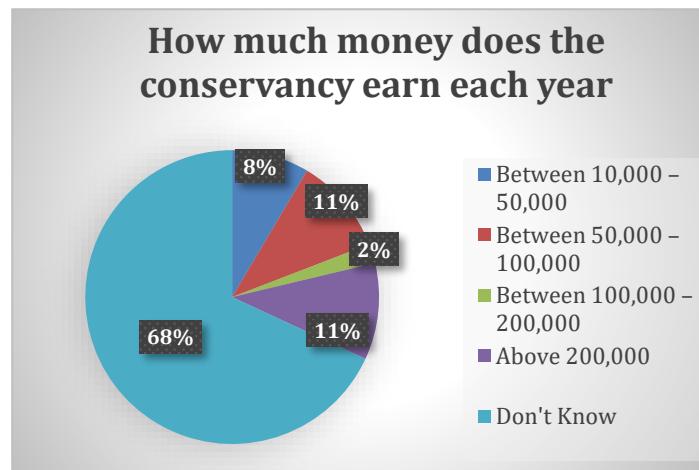
The foundation of transparency builds onto notions of community participation and good governance in CBNRM (Mosimane & Silva 2015) and the assumption of the researcher here is that the more aware people are of the details of a local conservancy/private sector partnership, the more satisfied they might be that the partnership is beneficial. This in turn may have an influence on members' attitudes regarding the impact of rhino tourism as a rural development tool, one of the main research objectives of this study.

The data represented in the figures xiii-xv below are responses to questions 1, 2 and 3 on the questionnaire. These data show a distinct paucity of information related to the basic details of the only tourism enterprise currently active in //Huab conservancy. Relating these results to Arnstein's ladder of participation, (chapter 2, section 2.6.3), we realise that conservancy members in //Huab are at best at the level of 'Tokenism' and at worst at the level of non-participation (Arnstein 1969).

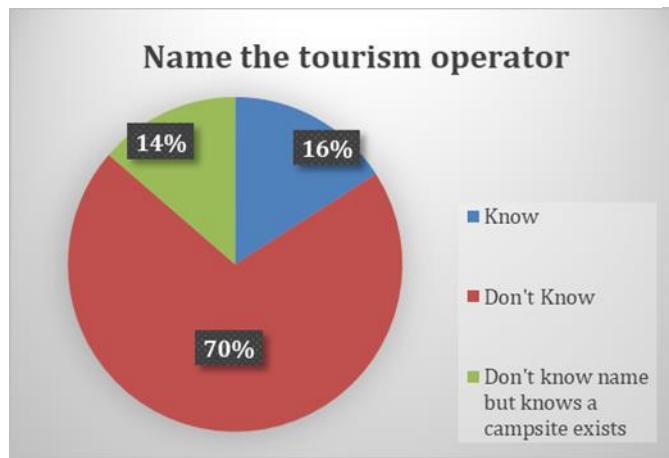
**Figure xiii:** When did the tourism operation start?



**Figure xiv:** Participant's knowledge of conservancy income



**Figure xv: Name of the tourism operator**



These findings are not particular to this research and agree with other academic publications. Conducting research on Namibian communal conservancies and their relationship to private sector tourism partners, Stamm (2017) found similarly low levels of knowledge around such basic information as conservancy members being unaware of the name of the tourism company operating in their communal conservancy area. These findings also agree with other text cited in the literature review, which highlight unequal relations between power and knowledge in the context of rural tourism enterprises as a recurrent and pervasive theme (Lubilo 2018; Kalvelage et al. 2020).

Given that information of this nature should be freely available to conservancy members and reported on at each AGM, the lack of basic knowledge such as the business name of the tourism partner speaks to the need for a more efficient information sharing mechanism for disseminating information from the conservancy office to its members. This finding has been triangulated with qualitative responses presented later in this chapter.

#### **5.2.4 Benefits and Perceptions of Conservancy Management**

Several questions on benefits and the perceived efficacy of conservancy management were inserted into the survey schedule (questions 5-9). These Likert scale questions were meant to help the researcher understand more about the level of tangible benefits flowing to conservancy members living in the conservancy area.

Good governance and benefits are thought to affect the success or the failure of CBNRM programmes and to have a concomitant influence on local perceptions towards wildlife (Fabricus & Collins 2007). Therefore, questions around the management of natural resources and the flow of information to conservancy members were included in the questionnaire to understand more about whether distribution of benefits or efficacy of conservancy management might affect attitudes towards black rhinoceros in the conservancy area.

An analysis of table iv below - representing percentages of responses to question 5 on benefits since the rhino tourism enterprise opened its doors in 2016- shows that the majority of respondents at //Huab do not feel as though their benefits from the conservancy have increased over the years since the contract with the joint venture partner was signed. Sixty four percent 64% (n=28) of respondents disagreed or strongly disagreed with the statement that benefits have increased since the conservancy signed the contract.

**Table iv:** *Question on increase in benefits since signature of contract with private sector operator*

| <b>Please rate the following statement: Since the contract was signed, there has been an increase in benefits to you as a conservancy member, coming from the conservancy</b> |             |            |             |                      |
|---|-------------|------------|-------------|----------------------|
| 1. Strongly Agree   | 2. Agree    | 3. Neutral | 4. Disagree | 5. Strongly Disagree |
| <b>6.5%</b>   | <b>6.5%</b> | <b>23%</b> | <b>41%</b>  | <b>23%</b>           |

When asked whether members feel as though the conservancy annual general meeting (AGM) provides sufficient information on conservancy expenditure to members during the meeting 50% (n=24) of the respondents either strongly disagreed or disagreed whilst 34% (n=17) of respondents agreed or strongly agreed. Responses to question 9 were deemed most appropriate to discuss here and are presented in tabular format in table v below.

**Table v:** Question on financial information disseminated during AGM

| <b>Please rate the following statement: Our conservancy annual general meetings tell us enough about how conservancy money is spent</b> |             |               |               |                      |                                 |
|---|-------------|---------------|---------------|----------------------|---------------------------------|
| 1. Strongly Agree; .;   | 2. Agree .; | 3. Neutral .; | 4. Disagree . | 5. Strongly Disagree | N/A – has not attended meetings |
| <b>11%</b>  | <b>23%</b>  | <b>7%</b>     | <b>30%</b>    | <b>20%</b>           | <b>9%</b>                       |

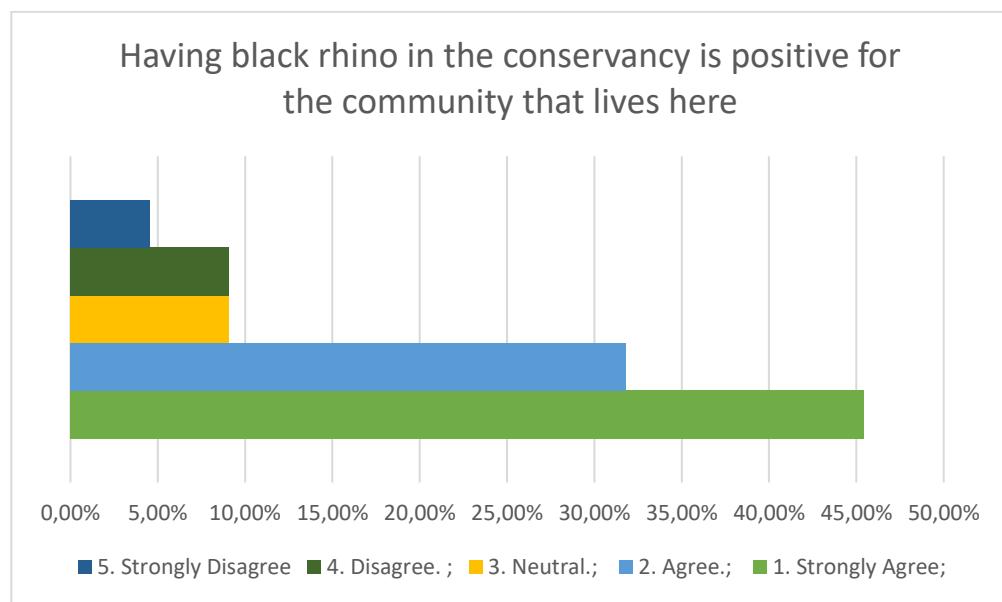
From this data it is evident that some conservancy members feel disempowered during the presentation of the financial statements, causing some frustration. This may even cause a negative impact on perceptions towards the conservancy concept itself. These findings concur with studies which show that financial governance at community level often lacks transparency, potentially leading to the failure of CBNRM initiatives (Bollig 2016; Fabricus & Collins 2007). As one participant put it:

*'We can see there is money coming in but there is no difference that I can see to the area'.*

### **5.2.5 Attitudes towards Rhinoceros and Rhino Tourism in the Conservancy**

Moving on from benefits and conservancy governance the questionnaire attempted to understand more about perceptions towards rhinoceros in the conservancy as well as members' feelings about the tourism enterprise. Figure xiv below shows the percentage of responses to this question.

**Figure xvi:** *Perceptions on black rhinoceros in the conservancy*



Almost half (45%) of the respondents strongly agreed and 32% (n=48) agreed that having black rhino in the conservancy is positive for the community. Four respondents disagreed and 2 strongly disagreed with the statement whilst 4 chose to remain neutral on their response.

These findings correspond with! Uri-≠Khob's (2004; 56) study on attitudes towards black rhinoceros in the same conservancy area where most respondents were keen to see black rhinoceros reintroduced.

A justification follow-up question was asked to each respondent. The answers have been coded and are presented in the table vi below for the negative responses and table vii for the positive responses:

**Table vi:** *Coded qualitative responses on rhino in conservancy*

| Theme  | Age class |       |       |
|--|-----------|-------|-------|
|  | 18-25     | 25-35 | 35-50 |
| Perceived danger related to a rhino charge                 | 1         | 2     | 1     |
| Limiting grazing for local livestock                       |           |       | 1     |
| Benefits are being captured at conservancy committee level |           |       | 1     |

Although the number of respondents who do not feel positive about having black rhino in their conservancy area is relatively small (~14% of total sample) the notion of danger, particularly for goat herders, was also identified in! Uri-≠Khob's (2004) initial analysis of a community wherein some respondents indicated a fear of encountering a rhino on foot. Furthermore, Uri-≠Khob (2004) recommended training for community members on rhino behaviour before reintroductions took place. A similar request was noted by two respondents during the recent survey in //Huab conservancy. As one female respondent noted:

*'We are afraid of them (rhinos) but if herders are trained then we will have knowledge about rhinos'.*

All negative responses were recorded in the villages adjacent to the area zoned for rhino tourism in the conservancy, indicating that people living closer to the resource in question perceive a real threat to their safety when moving through the area as opposed to members living further away.

A little more than 50% (n=26) of the total participants (n=48) chose to justify their positive answer with a short narrative. The positive responses were thematically categorised into broad themes and are displayed in table vii below. Two-thirds (62%) of participants who chose to justify their answer noted benefits from tourism as the primary driver of positive attitudes towards rhinos in the conservancy area, suggesting that tourism does, in fact, have a positive effect on attitudes towards rhinos.

**Table vii:** Coded positive responses on rhino at //Huab

| Theme                      | Age class |          |          |           | Total     |
|----------------------------|-----------|----------|----------|-----------|-----------|
|                            | 18-25     | 25-35    | 35-50    | >50       |           |
| Cultural (children/future) | 1         | 1        | 7        | 9         |           |
| Benefits from tourism      | 3         | 1        | 5        | 7         | 16        |
| Jobs                       | 1         |          |          |           | 1         |
| <b>Total</b>               | <b>4</b>  | <b>2</b> | <b>6</b> | <b>14</b> | <b>26</b> |

The cultural theme, although not as strong as the benefits from tourism theme, was nevertheless significant in that 9 participants (35%) indicated that the presence of rhino is positive because of their intrinsic value in the cultural heritage of the community. The notion of cultural importance of wildlife is a theme which was not initially considered in the research question but one which was established during the research. The cultural value placed on wildlife by local communities has been explored in academic literature relating to wildlife protection (Benjamin-Fink 2019; Cooney et al. 2016; IUCN 2015) with initial understanding being broadened to consider the role that community pride in wildlife can play in the reduction of wildlife crime. The above survey results point to the fact that tangible benefits from tourism may not be the only way to ensure long term sustainability of the survival of rhinoceros in //Huab conservancy.

These unexpected results are worth discussion as Cote & Turgeon (2005) state that in some cases unexpected results lend credibility to research, even if these results do not necessarily relate to the research question. Statements from participants related to the notion of pride and cultural significance are quoted below:

*Translated from Afrikaans: These are animals from the land, they must stay here because our children must also see them in the future'*

*'It's good for nature and good for the community to see the animals'*

*'Older people in the conservancy should get to see the rhinos too, they are important as our children can see them in their natural habitat'*

### **5.2.6 Rhino Tourism as a Rural Development Tool**

Figure xvii below represents the perspectives of respondents around rhino tourism as a rural development tool. The majority (n=44) of respondents indicated that they believe rhino tourism is a positive rural development tool, with 48% of respondents indicating strong agreement with the statement. This shows that most respondents do see value in the tourism aspect of rhinos and are aware of the potential for tourism to act as a useful tool to assist the

local community. When asked to elaborate on their answers, respondents indicated benefits from tourism as the main reason for their positive answer.

**Figure xvii: Perceptions of rhino tourism as a rural development tool**

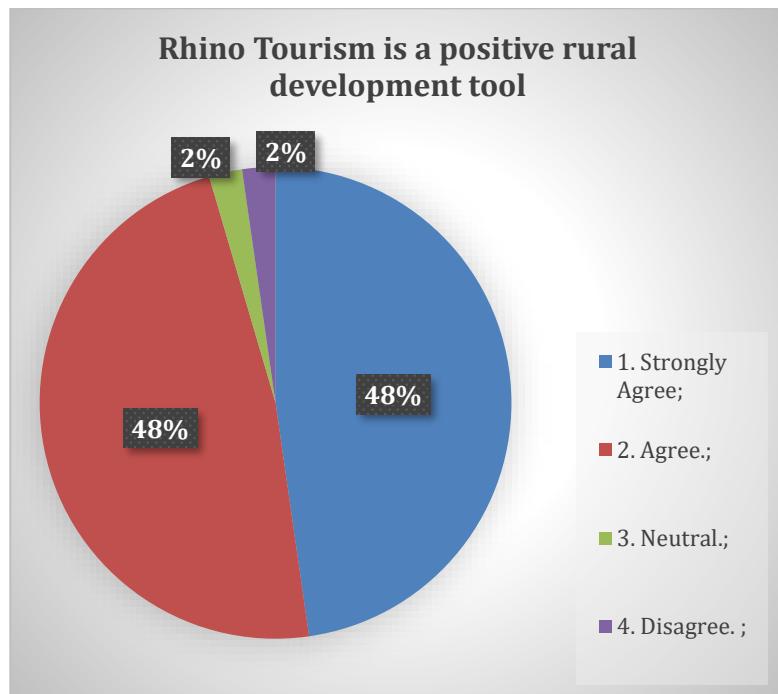
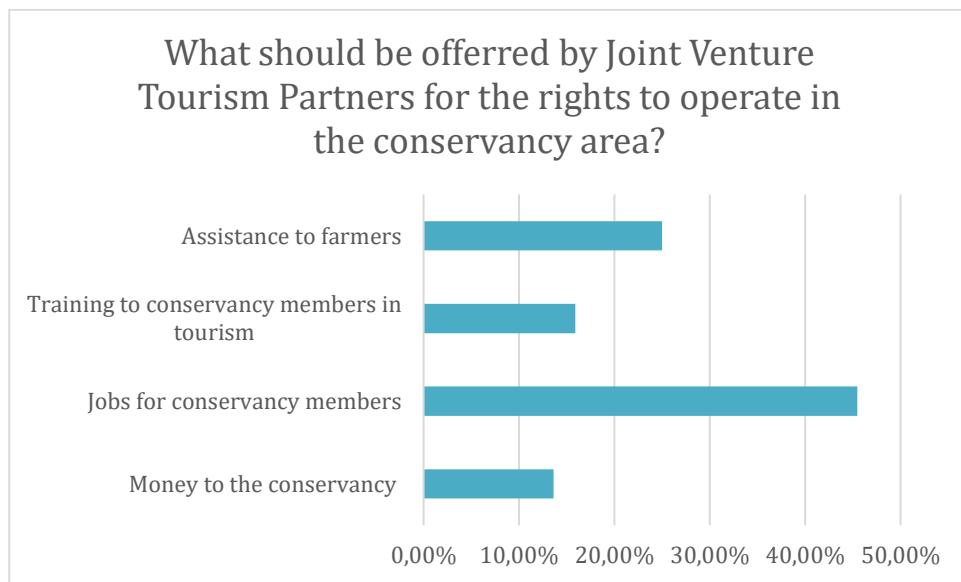


Figure xviii below shows jobs as the most important benefit which could be offered by potential tourism partners to the local community/conservancy for the rights to operate a tourism business in the area. This question was included in the survey to assist understanding about how local conservancy members believe tourism enterprises may be more impactful. Most lodges in Namibia operating in communal areas offer cash payments to the respective conservancy. Payments are usually based on a percentage of lodge income or a flat rental of the leasehold on which the lodge is situated (Snyman 2012). This is the current situation at //Huab conservancy where the operator, Ultimate Safaris, is paying cash directly into the conservancy's bank account.

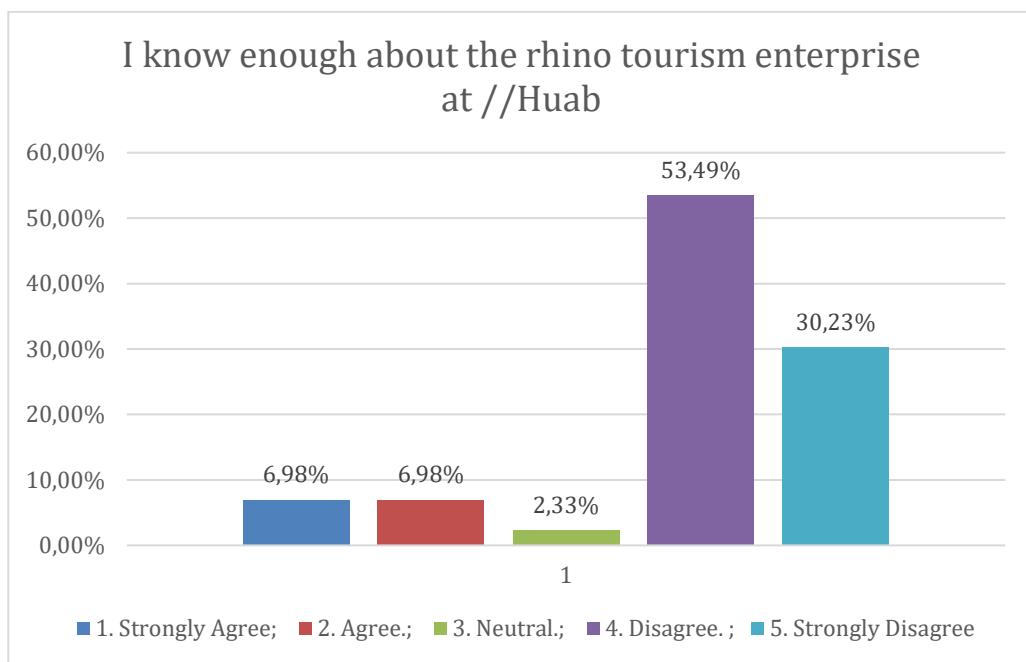
**Figure xviii: What should be offered to communities by tourism partners?**



Interestingly, when individual members were asked what they would like to see as benefits from tourism, the overwhelming response to this question was for more tangible and direct benefits to the members, such as assistance to farmers (25%), training for conservancy members in tourism (16%) and jobs for conservancy members (45%). Cash payments to the conservancy was mentioned by only a minority of respondents (14%). These findings show that participants believe that tourism is a positive rural development tool in terms of job creation but that many participants feel that benefits should possibly be distributed in a more direct manner. The findings also agree with the notion of the importance of tourism-related employment in rural areas in southern Africa and the positive effect on biodiversity conservation (Mamba et al. 2020; Muntifering et al. 2020; Naro et al. 2020).

Most of respondents either disagree (53%) or strongly disagree (30%) with the statement concerning knowledge about the rhino tourism enterprise in their conservancy area. The question was asked to understand more about the level of knowledge relating to the enterprise and to triangulate responses with the initial questions on the general knowledge relating to the enterprise, asked at the outset of the questionnaire. Figure xix displays the results of this question below.

**Figure xix: Knowledge of the tourism enterprise in the conservancy**



Considering that ideas centred on participatory democracy and transparency in financial management are one of the foundational concepts of CBNRM (Jones et al. 2015; Morais et al. 2015) the need to democratise information relating to the conservancy/private sector business partnership at //Huab is important to ensure meaningful participation.

The level of knowledge pertaining to the enterprise is triangulated with data presented in the beginning of this chapter, illustrating an extremely low level of basic knowledge which is indicative of a possible element to focus on when considering how to improve the tourism enterprise at //Huab.

Statements from participants serve to illustrate the paucity of information related to the enterprise:

**Table viii: Qualitative statements on information related to the enterprise**

|  |
|--|
| <i>X002 I want to know more about the money and how we can improve our lives</i>   |
| <i>X007 I want to know more about the money coming to the conservancy</i>  |
| <i>XI08 we all want to know more, general information about the number of jobs and how we can develop our young people</i> |

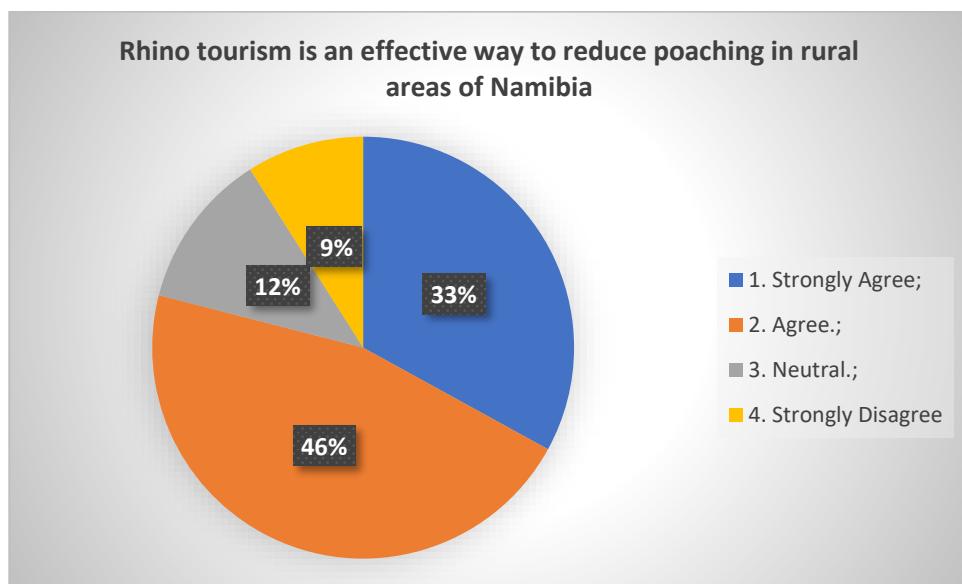
*YG02 I want to know more, to have an opportunity to get a job*

*YG06 I want to know more about getting a job there*

### 5.2.7 Rhino Tourism and Poaching

Rhino tourism and the possible effect on poaching forms a key component of this study. The following section presents data related to this component. Figure xx below shows that 33% (n=16) and 46% (n=22) of participants in this study strongly agreed or agreed that rhino tourism is an effective way to reduce poaching in the rural areas of Namibia.

**Figure xx:** Does rhino tourism reduce poaching?



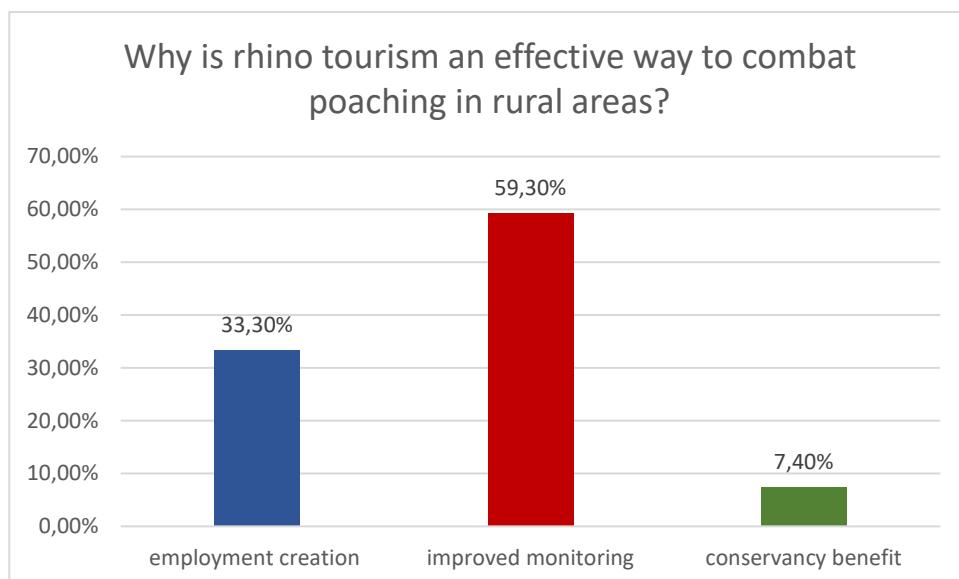
The high number of positive responses (79%) illustrate that in general, the conservancy members at //Huab believe that rhino tourism is an effective method to reduce poaching. Although this finding is firmly rooted in the Namibian context, the data does provide some strength to the argument which recognises and advocates for the empowerment of local communities through non-militaristic measures to combat illegal wildlife trade (Biggs et al. 2016; Cooney et al. 2016).

To add a layer of richness to the data, participants were asked to elaborate on their answers to the poaching question presented in figure xx. Qualitative responses to this question were

assigned to categories. The highest number of qualitative responses are linked to the category related to improved rhino monitoring which is made possible through the presence of tour groups who view rhino on a regular basis. Participants (n=16) felt that rhino tours which entail tracking of individual animals on foot, serve as a deterrent to would be poachers because there is constant movement of people and rhino trackers in the area.

The second most frequent response (n=9) emphasised the importance of employment which is linked to the rhino tracking activity and is seen as an alternative livelihood strategy for an area which is considered one of the poorest in Namibia (NACSO 2018). Interestingly, conservancy benefits were noted by only 2 respondents as the reason why rhino tourism can be considered an effective anti-poaching mechanism. This finding further strengthens the emerging finding that cash payments to the conservancy may not be the best mechanism for the delivery of benefits to the local community.

**Figure xxi:** Why does rhino tourism reduce poaching in rural areas?

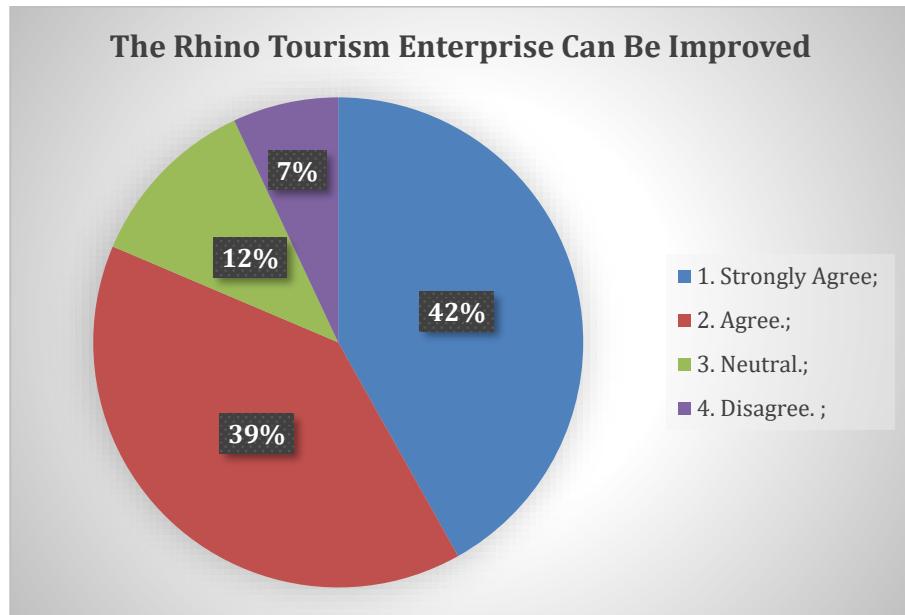


### 5.2.8 How can Rhino Tourism be more Impactful

The final question in the survey was centred on the possible improvement of the existing enterprise. Figure xxii below shows that participants felt that the enterprise could be

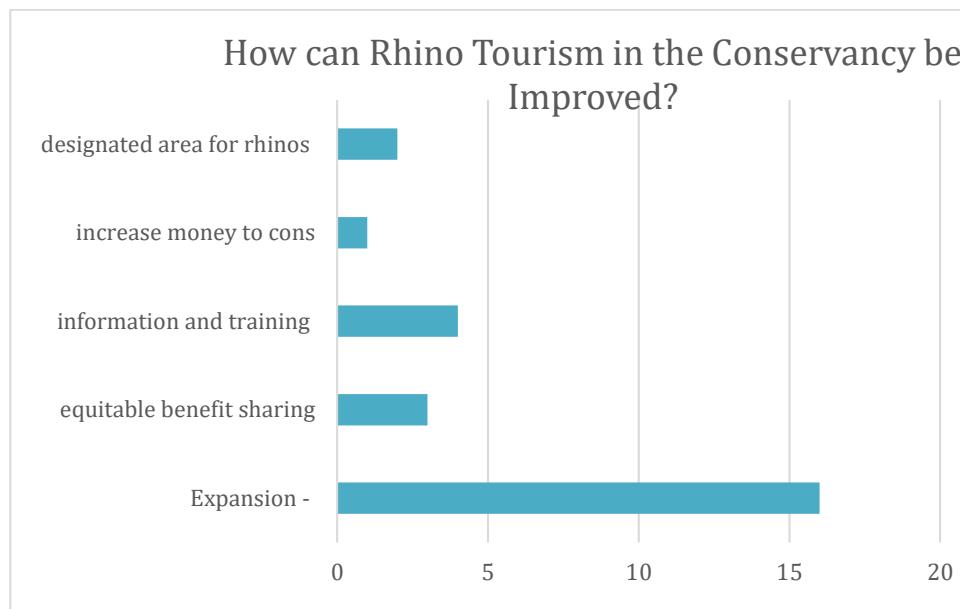
improved, with 42% (n=20) and 39% (n=19) indicating either strong or very strong agreement to the statement.

**Figure xxii:** Do you feel the rhino tourism enterprise can be improved?



When asked to elaborate on how the tourism might be improved, participants indicated that the tourism should be expanded. The qualitative justification responses were analysed and assigned themes. Figure xxiv below shows out of the total number of justification responses (n=26), participants felt that the enterprise should be expanded to include more jobs or that more rhino tourism activities should be opened in the conservancy.

**Figure xxiii: How can rhino tourism in the conservancy be improved?**



One respondent stated:

*'They (MEFT) need to bring more rhinos so we can open more lodges'*

The second highest response recorded was a request to improve information flow to the conservancy members and to set up training programmes on tourism for local youth. This finding triangulates with the responses noted about the lack of general knowledge on the tourism enterprise. One participant lamented this lack of information:

*'Upcoming youth does not know about the conservancy; it can be improved by sharing information and training'.*

### **5.3 SUMMARY**

This chapter presented and analysed the research findings. Thematic analysis was employed to communicate the research findings. A combination of qualitative and quantitative data was presented and analysed in relation to the main research objectives. Quantitative data was

presented in graphic format whilst qualitative data was presented in tabular and graphic format and some direct quotations from participants were used to triangulate findings.

This chapter showed that conservancy members have relatively little knowledge about the tourism operation and the benefits coming to the conservancy as payments by the joint venture partner, Ultimate Safaris. Conservancy members also receive little to no benefits from the conservancy and alluded to governance challenges as a possible reason for this. Challenges in governance have been highlighted in chapter 3 as a pervasive issue which faces CBNRM.

Despite the lack of benefits, conservancy members who were interviewed feel positive about rhinos. There is strong tendency to view employment from tourism as a positive driver to reduce poaching. The conservation value of tourism – providing a consistent monitoring presence was felt to be the important in the reduction of poaching. To improve the activity, participants felt that the tourism should be expanded to include more jobs and that more information should be shared with conservancy members. The notion of pride and cultural identity felt for rhinos was an unexpected finding which contributes to ideas on non-militaristic and community-centred approaches to combatting wildlife crime.

The following chapter will discuss the study and place it within wider academic discourse and make recommendations for future study and practical applications.

## **CHAPTER 6 KEY FINDINGS, RECOMMENDATIONS AND CONCLUSIONS**

### **6.1 INTRODUCTION**

This chapter concludes the study by providing a summary of key findings and recommendations. To begin, the key findings linked to the main objectives are discussed. Unexpected results found during analysis of the data are noted and potential research opportunities are suggested. The conclusion discusses the main research findings and provides recommendations which may help to improve community engagement and biodiversity gains linked to rhino tourism in rural areas of southern Africa.

### **6.2 KEY FINDINGS**

Two objectives form the basis of this study. Interviews were conducted to understand more about how rhino tourism has affected conservancy member's perceptions on rhino conservation. The second objective aimed to understand more about the impact of rhino tourism as a rural development tool. Key findings are presented below in accordance with the two objectives.

#### **6.2.1 Objective One: How has rhino tourism affected conservancy member's perceptions on rhino conservation**

The study found that attitudes towards rhinoceros in the conservancy are mainly positive, with a small number of participants indicating that they felt unsafe because of the rhinos moving freely in the farming areas. Positive attitudes towards rhinos were attributed to the perceived benefits - such as employment - that rhino tourism catalysed in the area. From this we can deduce that rhino tourism has had a positive effect on the perceptions of //Huab conservancy members towards rhinos.

Ownership by rural communities over wildlife was noted in the literature review as a key driver to conservation and rural development success in Namibia. At //Huab, it seems that

this theory holds true. Interestingly, positive attitudes towards rhinos persist despite most participants noting that they had not received any increase in tangible benefits since the rhino tourism enterprise started to operate.

### **6.2.2 Objective Two: What is the impact of tourism as a rural development tool**

This study found that conservancy members at //Huab value the contribution that tourism makes to the conservancy and are aware of the potential for tourism to act as a useful tool to assist the local community. Participants noted that the availability of tourism jobs for local people helps to reduce poaching because of improved economic opportunities in the conservancy. Increased conservation presence in the area, catalysed by tourism and embodied by increased rhino monitoring effort, is also thought to be an effective mechanism to reduce poaching.

In order to make tourism more impactful as a rural development tool, conservancy members at //Huab suggested that benefits from tourism could be distributed in the following manner:

- Direct support to farmers,
- Training in tourism for conservancy members and
- An increase in employment opportunities.

Findings suggest that conservancy members at //Huab would prefer to see direct support from the tourism operator. This direct support would potentially remove the conservancy from the equation and is illustrative of a low level of confidence in the integrity of the conservancy and its ability to distribute benefits equitably. This finding concurs with literature on CBNRM which notes that the oftentimes unequal balance of power within a community-based organisation can be attributed to inadequate or badly planned governance structures and a lack of adequate communication mechanisms.

This study showed that conservancy members would appreciate more regular information related to the tourism operation. Indeed, the paucity of knowledge around the most fundamental of questions related to the tourism operation was surprising, given that - according to its guiding principles of transparency and participation - the conservancy

should be regularly disseminating such information. A meaningful and interactive information sharing platform would improve members' sense of participation in the development trajectory of their conservancy.

The results of the study show us that local community members perceive a real value in rhino tourism as a rural development tool and they believe the tourism itself has the potential to reduce wildlife crime. There is a need, however, to ensure that tourism is properly planned and implemented with an emphasis on environmental and social equity.

### **6.3 UNINTENDED FINDINGS**

The study found that there has been almost no increase in benefits to conservancy members since the tourism operation started. Despite this, attitudes towards rhinos are, for the most part, positive. This is unexpected in that most early CBNRM literature emphasises the link between improved attitudes towards wildlife and tangible benefits. The study shows that this is not necessarily the case at //Huab conservancy, and this could be due to the role of cultural importance of rhinos which was expressed by some participants. This finding links with emerging literature suggesting that positive attitudes towards iconic species could be a result of cultural association and not necessarily the exclusive result of a perceived increase in tangible benefits through tourism or trophy hunting activities.

### **6.4 FURTHER RESEARCH AREAS**

A more thorough understanding of cultural pride as a driver of positive attitudes towards wildlife in rural areas could add real value to the debate around the militarisation of conservation - which is often seen in opposition to the community-centred approach. Future research might compare different community ownership models between two countries, noting the effect of ownership on pride and the consequent effect on attitudes towards wildlife conservation. Results could have wide-ranging implications for CBNRM and the design of rural conservation and sustainable development programmes in southern Africa and elsewhere.

## **6.5 LIMITATIONS**

Babbie (2014, 484) notes the importance of discussing the limitations of any study and defines limitations as any qualifying aspect which might have influenced the outcome of the study. The following section provides an important note on the limitations of this study.

The researcher is an employee of Save the Rhino Trust, a conservation NGO working in the landscape focused on rhino protection. The Trust has been active in Kunene region for close to 40 years and has been instrumental in establishing and promoting sustainable rhino tourism on communal conservancies. Although follow-up qualitative questions helped to triangulate Likert scale responses somewhat, it is important to note this limitation of the study as the researcher's affiliation to a local rhino conservation NGO could very well have biased some responses.

Finally, the language barrier during interviews made the explanation of some concepts difficult, given the low literacy and educational levels of some of the respondents, notably those over 50 years. The researcher attempted to overcome this challenge through the use of a local research assistant. Nonetheless, it was apparent that some nuance was lost in the gathering of the qualitative responses.

## **6.6 RECOMMENDATIONS**

Three major recommendations can be made based on the findings from this case study. To the researcher's knowledge, few studies have attempted to gain an understanding of how local people view a high value tourism activity of this nature, making these recommendations potentially useful as guidelines for new tourism/community contracts to improve relations between communal conservancies and members.

### **6.6.1 Enabling Policy Reform**

Findings clearly show that the conservancy members at //Huab value the contribution rhinos make to their livelihoods and this has influenced how they view the rhinos in their conservancy. These contributions are not only monetary and in the form of employment but also have a sense of cultural significance attached to them. Although it is not possible to generalise the study findings too widely, given the case-study context, the study does show that perceptions on rhino conservation in different areas could be improved through increased access to benefits and ownership. To stem the tide of poaching and habitat loss associated with environmental degradation one recommendation is to find mechanisms to improve political buy-in for CBNRM policies in other countries around the world. As the literature review showed, countries with an enabling policy arena are more likely to demonstrate sustained positive results in community conservation initiatives. Creating a policy environment which is conducive to empowering communities is certainly a positive step on the road to helping rural communities improve livelihoods while at the same time preventing biodiversity loss.

### **6.6.2 Alternative Benefit Distribution Methods**

According to the main findings of this study, employment opportunities and direct assistance to farmers comprise the two most important tangible benefits for //Huab conservancy members. These findings show us that the current direct cash payments to conservancies might not be the best mechanism to improve the impact of tourism for conservancy members, especially considering the governance challenges experienced in community-based organisations. One recommendation would be for future tourism partnerships to develop alternative distribution methods where possible.

An alternative to direct conservancy payments could include capacity building of local people in tourism and associated enterprises. The addition of capacity building as a contractual requirement built into the joint venture agreement would illustrate firm commitment to local development which is aligned to the needs of residents in the

conservancy. This is likely to engender good will between conservancy members and the tour operator, potentially improving relations. This addition would also help to diversify livelihood options and would facilitate a greater level of genuine local engagement and empowerment in tourism activities. Another recommendation would be for tourism operators to actively engage local farmers directly, assisting with agriculture-related support such as solar powered borehole pumps. This would need careful consideration and full consultation of all role players, including the conservancy. These recommendations fall largely line with literature which advocates for increased levels of empowerment of local people in tourism businesses which are operating on communal lands.

### **6.6.3 Effective Engagement with Conservancy Members**

Community Based Natural Resource Management initiatives often fail to achieve their objectives because of factors related to governance and social dynamics. At //Huab conservancy, the current situation is consistent with literature outlining criticisms of CBNRM which highlight weak governance as a fundamental flaw in the CBNRM concept. The desire expressed by members to know more about the conservancy and the tourism operation shows that there is a need to build trust between conservancy leadership and its members. This should help to bolster good governance. A practical recommendation would be for conservancy management to focus more on the provision of regular updates on finances and natural resource management. This would assist in achieving a greater level of participation and transparency, ultimately informing the adaptive management approaches which have been highlighted as a hallmark of good governance.

One practical way to achieve this would be to decentralise the large annual general meeting into smaller village level meetings, providing a localised platform for members to interact with conservancy leadership. This would assist the conservancy in dealing with issues related to social heterogeneity which cannot necessarily be tackled at the larger annual general meetings. These meetings should form part of a more consistent and inclusive membership engagement strategy at conservancies which would ultimately serve to improve governance and help conservancies to achieve their broad objectives.

## **6.7 CONCLUSION**

The research problem was formulated against a backdrop of increased poaching in Namibia. The study was framed within the broader concept of sustainable development in rural areas, linking to the conservation of arguably the most iconic of African wildlife, the rhinoceros. This study aimed to understand more about how local people perceived rhino-based tourism as a rural development tool and how they believe the rhino tourism taking place in their conservancy might be improved to become more impactful.

The main findings of the study showed that rhinos are perceived favourably by the residents of //Huab conservancy and that tourism is seen as a positive driver for rural development in the area. Tourism is also viewed by local people as having the potential to reduce poaching in rural areas. Recommendations for improving the tourism operation for the local community have been proposed. These include a more equitable benefit distribution structure and an improved information sharing method, both linked to the need to improve governance at the conservancy level. If implemented, these recommendations would likely contribute to ensuring a longer term, sustainable and more inclusive status quo at the conservancy and could possibly be replicated in other community-based natural resource management scenarios.

Theories pertaining to the importance of pride in wildlife as a driver of pro-conservation attitudes amongst rural people are emerging as complimentary to the more traditional CBNRM foundation which views tangible benefits as the primary link to a pro-conservation attitude amongst rural people. This case study unexpectedly found that notions of pride and cultural identity related to rhinos are almost certainly a positive driver of attitudes and should be considered as an opportunity for further research. Such research could contribute significantly to the international debate on communities, conservation, and sustainable development.

When measured according to the United Nations Sustainable Development Goal (SDG) 15c which advocates for improved capacity of local communities to manage and conserve biodiversity, the case study at //Huab shows that empowerment through the provision of

employment, information dissemination and equitable benefit distribution should be prioritised to achieve real advancement towards SDG15c.

This study concludes that the transfer of ownership over wildlife to rural people can be an effective mechanism in driving positive environmental and social outcomes but that challenges in this model - such as poor governance and lack of meaningful participation-persist, and improvements can be made. Despite these limitations, governments and decision makers might do well to consider this alternative approach when attempting to tackle wildlife crime and rural development challenges in their respective countries.

## 7. REFERENCES

- !Uri-≠Khob, S. (2004). "Attitudes and Perceptions of Local Communities Towards the Reintroduction of Black Rhino (*Diceros bicornis bicornis*) into their Historical Range in Northwest Kunene Region, Namibia." Master's Thesis. University of Kent, U.K.
- !Uri-≠Khob, S. (2021). Personal communication with the author.
- Adams, W. (2004): *Against Extinction, The Story of Conservation*. Earthscan. ISBN 1-84407-055-7 hardback. Routledge
- Africa Geographic (2019): Trophy hunting in Zambia to be suspended due to non-payment of hunting fees to communities. Team Africa Geographic in News Deck Series. Available online: <https://africageographic.com/stories/trophy-hunting-zambia-suspended-non-payment-hunting-fees-communities/>
- Akhtar, I. (2016): Chapter: Research Design, and emerging confluences. In N. Denzin & Y. Lincoln (Eds.), *Handbook of qualitative research* (3rd ed., 191-215). Thousand Oaks, CA: SAGE.
- Annecke, W & Masubelele, M. (2016): A Review of the Impact of Militarisation: The Case of Rhino Poaching in Kruger National Park, *South Africa in Conservation and Society* (14), 195-204.
- Arnstein, S. (1969): 'A Ladder of Citizen Participation', *Journal of the American Planning Association*, (35), 4, 216 – 224.
- Attride-Stirling, J. (2001): Thematic networks: an Analytical Tool for Qualitative Research. *Qualitative Research* (1) 3, 385-405.
- Babbie, E. (2014): *The Basics of Social Research*, Sixth Edition, International Edition. Copyright Wadsworth, Cengage Learning.
- Benjamin-Fink, N. (2019): An Assessment of the Human-Wildlife Conflict across Africa. 10.5772/intechopen.82793. In book: *Wildlife Population Monitoring [Working Title]*.
- Berkes, F. (2004): Rethinking Community Based Conservation. *Conservation Biology*, (18) 3, 621-630.

Beytell, PC. (2010): Reciprocal Impacts of Black Rhino and Community Based Ecotourism in North-West Namibia. Msc Thesis University of Stellenbosch.

Bhattarai, B., Wright, W., Poudel, B. (2017): Shifting paradigms for Nepal's protected areas: history, challenges and relationships. *Journal of Mountain Science* 14. DOI: 10.1007/s11629-016-3980-9.

Biggs, D., Courchamp, F., Possingham, H. (2013): Legal Trade of Africa's Rhino Horns. Article in *Science*, Science Vol. 339, No. 6123. DOI: 10.1126/science.1229998.

Biggs, D.; Cooney, R.; Roe, D.; Dublin, H.; Allan, J.; Channender, D & Skinner, D. (2016): Conservation Biology, (31), 1, 5–12. *Conservation Biology* published by Wiley Periodicals, Inc. on behalf of Society for Conservation Biology. DOI: 10.1111/cobi.12796.

Blackstock, K. (2005): A critical look at community-based tourism. *Community Development Journal*, (40), 1, 39–49.

Blanche, M., Durrheim, K., & Painter, D. (2009): *Research in Practice: Applied Methods for the Social Sciences* (2nd ed.). Cape Town: University of Cape Town press.

Boudreaux, K. & Nelson, F. (2011): Community Conservation in Namibia; Empowering the Poor with Property Rights. *Economic Affairs Institute of Economic Affairs*. Published by Blackwell Publishing, Oxford.

Bollig, M. (2016): Towards an Arid Eden? Boundary-Making, Governance and Benefit-Sharing and the Political Ecology of the New Commons of Kunene Region, Northern Namibia. *International Journal of the Commons*, 10(2), pp. 771-799.

Brunckhorst, D. (2010): Using Context in Novel Community Based Natural Resource Management: Landscapes of Property, Policy and Place. *Environmental Conservation*, 37 (1): 16-22.

Buckley, R. (2012): Sustainable tourism: Research and reality. *Annals of Tourism Research*, 39(2), 528–546. <https://doi.org/10.1016/j.annals.2012.02.003>.

Büscher, B., Sullivan, S., Neves K., Igoe, J. & Brockington, D. (2012): Towards a Synthesized Critique of Neoliberal Biodiversity Conservation. *Capitalism Nature Socialism*, 23:2, 4-30.

- Campbell, B. & Shackleton, S. (2001): The organisation structure for community based natural resources management in Southern Africa. *African Studies Quarterly*, 5(3), pp. 73-86.
- Cassidy, Lin. (2020). Power dynamics and new directions in the recent evolution of CBNRM in Botswana. *Conservation Science and Practice*. 3. 10.1111/csp2.205.
- Child, B. & Barnes, G. (2010): The conceptual evolution and practice of community-based natural resource management in southern Africa: past, present and future. *Environmental Conservation* 37 (3): 283-295.
- Child, B. (2019): *Sustainable Governance of Wildlife and Community-based Natural Resource Management: From Economic Principles to Practical Governance* (Book). Routledge ISBN 0415793270.
- Cohen, L., Manion, L., & Morrison, K. (2000): *Research Methods in Education* (5th Edition). London: Routledge Falmer.
- Cooney, R.; Roe, D.; Dublin, H.; Phelps, J.; Wilkie, D.; Keane, A.; Travers, H.; Skinner, D.; Challender, D.; Allan, J.; Biggs, D. (2016): From Poachers to Protectors: Engaging Local Communities in Solutions to Illegal Wildlife Trade. *Conservation Letters*. 10.1111/conl.12294.
- Cote, L. & Turgeon, J. (2005): Appraising qualitative research articles in medicine and medical education. *Medical Teacher*, (27), 1.
- Crabtree, B. & Miller, W. (Eds.) (1999): *Doing Qualitative Research* (2nd edition). London: Sage, ISBN 0-7619-1497-8.
- Creswell, J. & Plano Clark, V. (2011): Best Practices for Mixed Methods Research in the Health Sciences. *Commissioned by the Office of Behavioural and Social Sciences Research (OBSSR)*.
- Creswell, J. (2007): *Qualitative Inquiry and Research Design, Choosing Among Five Approaches*. Second Edition. University of Nebraska, Lincoln. Sage Publications.
- Davis, A-L., Blomley, T., Homer, G., Sommerville, M., & Nelson, F.(2020). *Community-based Natural Resource Management in Zambia: A review of institutional reforms and lessons from the field*. Washington, DC: Maliasili, the USAID Integrated Land and Resource Governance Task Order under the Strengthening Tenure and Resource Rights II (STARR

II)IDIQ, and The Nature Conservancy. Available online: [https://www.land-links.org/wp-content/uploads/2020/06/Zambia-CBNRM-Review-Report\\_Final-1.pdf](https://www.land-links.org/wp-content/uploads/2020/06/Zambia-CBNRM-Review-Report_Final-1.pdf)

Delgado, G., Sierra Diaz, D. (2015): ASOCAIMAN Project in Columbia. *Conservation, Crime and Communities. Case Studies of efforts to engage local communities in tackling illegal wildlife trade.* Background Paper published by the International Institute for Environment and Development, London.

Denney, A., & Tewksbury, R. (2012): *How to Write a Literature Review, Journal of Criminal Justice Education*, DOI:10.1080/10511253.2012.730617.

Dodds, R., Ali, A. and Galaski, K. (2018): Mobilising Knowledge: Determining key elements for success and pitfalls in developing Community Based -Tourism. *Current Issues in Tourism*, 21 (13), 1547-1568.

Dressler, W., Büscher,, B.. Schoon, M.. Brockington D.. Hayes T., Kull C., McCarthy J. & Shrestha K. (2010): From Hope to Crisis and Back Again? A Critical History of the Global CBNRM Narrative. *Environmental Conservation* 37 (1): 5–15 © Foundation for Environmental Conservation.

Drost, E. (2011): Validity and Reliability in Social Science Research. *Education Research and Perspectives*, (38), No.1.

Duffy, R. (2014): Waging a war to Save Biodiversity; The Rise of Militarised Conservation. *White Rose Research Online*. White Rose University Consortium.

Duffy, R. Freya, J., Büscher, B. & Brockington, D. (2015): Toward a new understanding of the links between poverty and illegal wildlife hunting. *Conservation Biology*. 30. n/a-n/a. 10.1111/cobi.12622

Dzingirai, V. (2003): The New Scramble for the African Countryside. *Development and Change*, volume 34 issue 2, pp 243-264.*Economic Perspectives* 14(3):137–158.

Emslie, R. (2020). Diceros bicornis. The IUCN Red List of Threatened Species 2020: e.T6557A152728945. <https://dx.doi.org/10.2305/IUCN.UK.2020-1.RLTS.T6557A152728945.en>.

Emslie, R., Miliken, T., Tlukdar, B., Burgess, G., Adcock, K., Balfour, D., Knight, M. (2018): African and Asian Rhinoceroses – Status, Conservation and Trade. A Report from the IUCN Species Survival Commission (ICC SSC) African and Asian Rhino Specialist Groups and TRAFFIC to the CITES Secretariat pursuant to Resolution Conf. 9.14 (Rev. CoP17). CoP18 Doc 83.1 Annex 2.

Etikan, I., Sulaiman, AM., Rukayya, SA. (2016): Comparison of Convenience Sampling and Purposive Sampling. *American Journal of Theoretical and Applied Statistics*. Vol. 5, No. 1, 2016, pp. 1-4. doi: 10.11648/j.ajtas.20160501.11.

Fabricus, C. (2004): *Rights, Resources and Rural Development. Community Based Natural Resource Management in Southern Africa*. Various Authors. Copyright Christo Fabricus and Eddie Koch (eds).

Fabricus, C., & Collins, S, (2007): Community-based natural resource management, governing the commons. *Water Policy* (2007) 9 (S2): 83–97.

Ferreira, SM., Greaver, C., Knight GA., Knight, MH., Smit, IPJ., Pienaar, D., (2015): Disruption of Rhino Demography by Poachers May Lead to Population Declines in Kruger National Park, South Africa. *PLoS ONE* 10(6): e0127783. doi:10.1371/journal.pone.0127783

Galvin, K., Beeton, T, & Luizza, M. (2018): African community-based conservation: a systematic review of social and ecological outcomes. *Ecology and Society* 23(3):39. <https://doi.org/10.5751/ES-10217-230339>.

Gao, Y., Stoner, K., Lee, A., Clark, S. (2016): Rhino horn trade in China: An analysis of the art and antiques market. *Biological Conservation*. 201 (2016) 343-347.

Goodwin, H. & Santilli, R. (2009): Community-based tourism: a success? ICRT Occasional Paper 11 ICRT & GTZ.

Guba, E., & Lincoln, Y. (2005): Paradigmatic controversies, contradictions, and emerging confluences. In N. Denzin & Y. Lincoln (Eds.), *Handbook of qualitative research* (3rd ed., pp.191-215). Thousand Oaks, CA: SAGE.

Gyimah, I. (2016): Understanding the attitudes and perceptions of South African residents towards anti-rhino poaching initiatives: a study in Bloemfontein, free state province, South

Africa. MA Thesis Submitted to University of South Africa to Department of Development Studies.

Hanks, J. (2014): *Operation Lock and the War on Rhino Poaching*. Published by Penguin. B00XPQU89Y.

Hanns, M. (2016): Killing Nature to Save it? Ethics, Economics and Rhino Hunting in Namibia. [@Future\\_Pasts](http://www.futurepasts.net) Bath Spa University, School of Oriental & African Studies, University of Edinburgh with Namibian partners: The National Museum of Namibia, Gobabeb Research and Training Centre, Save the Rhino Trust, and Mamokobo Film and Research.

Hardin, G. (1968): The Tragedy of the Commons. DOI: 10.1126/science.162.3859.1243 Science 162 (3859), 1243-1248.

Hoon, P. (2014). Elephants are like our diamonds: Recentralizing community based natural resource management in Botswana, 1996–2012. *African Studies Quarterly*, 15(1), 55.

Hulme, D. & Murphree, M. (1999): Communities, Wildlife and the ‘New Conservation’ in Africa. *Journal of International Development*. (11), 277-285.

Humphreys, J. & Smith, M. (2014): The ‘rhinofication’ of South African security. *International Affairs* 90(4) (2014), 795-818.

Hussein, A. (2009): The use of Triangulation in Social Sciences Research: Can qualitative and quantitative methods be combined?. *Journal of Comparative Social Work*. 1. 1-12.

United States Department of State, Bureau of International Narcotics and Law Enforcement (INL) (2018): Eliminate, Neutralize, and Disrupt Wildlife Trafficking Act of 2016 PL 114-231, Sec. 201 2018 Report to Congress available from: <https://www.state.gov/remarks-and-releases-bureau-of-oceans-and-international-environmental-and-scientific-affairs/2018-end-wildlife-trafficking-report/>.

International Union for the Conservation of Nature SULi (2015): Beyond Enforcement: communities, governance incentives and sustainable use in combating wildlife crime. Symposium Report. IIED, London, UK.<http://pubs.iied.org/G03903.html> (visited Jan. 22, 2016).

International Union for Conservation of Nature Species Survival Commission African Rhino Specialist Group Report for 2019: Compiled by Knight, M. (Chair) and Okita, B.

International Union for Conservation of Nature annual report (2020): Conservation efforts bring cautious hope for African rhinos - IUCN Red List; Gland, Switzerland, 19 March 2020 (IUCN) <https://www.iucn.org/news/species/202003/conservation-efforts-bring-cautious-hope-african-rhinos-iucn-red-list>.

International Rhino Foundation (2021): Trends in rhino poaching. (website): <https://rhinos.org/about-rhinos/state-of-the-rhino/>

Johns, R. (2010): Likert Items and Scales, *Survey Question Bank*; Methods Fact Sheet 1 (March 2010).

Jones, B. (1999): *Rights, Revenue and Resources: The problems and potential of conservancies as community wildlife management institutions in Namibia*. Working Paper, Evaluating Eden. ISBN 9781904035213.

Jones, B. (2004). *Synthesis of the Current Status of CBNRM Policy and Legislation in Botswana, Malawi, Mozambique, Namibia, Zambia and Zimbabwe*. Harare: WWF Southern African Regional Programme Office.

Jones, B., & Murphree, M. (2004): Community-based natural resource management as a conservation mechanism: Lessons and directions. *Parks in Transition: Biodiversity, Rural Development, and the Bottom Line* (pp. 63-103). London: Earthscan.

Jones, B. (2010): The Evolution of Namibia's Communal Conservancies. Chapter in book: *Community Rights, Conservation and Contested Land, The politics of natural resource governance in Africa*. Edited by Nelson, F. London: Routledge. pp117-129

Jones, B. Diggle, R. & Thouless, C. (2015): From Exploitation to Ownership: Wildlife Based Tourism and Communal Conservancies in Namibia. Chapter in Book: Institutional Arrangements for Conservation, Development and Tourism in Eastern and Southern Africa. Van der Duim R, Lamers, M & van Wijk, J (Eds). London: Springer. pp17-37

Kabir, SMS (2016). *Basic Guidelines for Research: An Introductory Approach for All Disciplines*. Book Zone Publication, ISBN: 978-984-33-9565-8, Chittagong-4203.

Kalvelage, L. Diez, JR. Bollig, M (2020): How much remains? Local value capture from tourism in Zambezi, Namibia, *Tourism Geographies*, *Tourism Geographies* DOI: 10.1080/14616688.2020.1786154

Kavita, E. & Saarinen, J. (2015): Tourism and rural community development in Namibia: policy issues review. *Fennia* (193): 3, 1-10. ISSN 1798-5617.

Kinahan, J. (2016): Archaeological Evidence of Domestic Sheep in the Namib Desert During the First millennium AD. *Journal of African Archaeology*. (14). 10.3213/2191-5784-10280.

Knight, M. (2012): *African Rhino Specialist Group report*, Park Planning and Development, South African National Parks, Metropolitan University, Port Elizabeth, South Africa.

Kraska, P. (2007): Militarization and Policing—Its Relevance to 21st Century Police: *Policing*, 1–13 doi:10.1093/police/pam065, Oxford University Press.

Kumar, A. (2011): *Research and Writing Skills*. New York, NY: Lulu Press. (978-1-4466-0560-8).

Lapeyre, R. (2010): Community-based tourism as a sustainable solution to maximise impacts locally? The Tsiseb Conservancy case, Namibia. *Development Southern Africa*, (27):5, 757-772.

Leader-Williams, N. & Hutton, J. (2005): Does extractive use provide opportunities to offset conflicts between people and wildlife? Chapter 9 in *People and Wildlife, Conflict or Coexistence?* Woodroffe, R & Thirgood, S (eds).

Likert, R. (1932). A technique for the measurement of attitudes. *Archives of Psychology*, 22(140), 1–55.

Loutit, B. (1996): Rhino Protection in Communal Areas, Namibia. *In Pachyderm* (21).

Lubilo, R. (2018): Enactment of ‘Community’ in Community Based Natural Resources Management in Zambezi Region, Namibia. PHD Thesis at Wageningen University, NE.

Lunstrum, E. (2014): Green Militarisation: Anti-Poaching Efforts and the Contours of the Kruger National Park. *Annals of the Association of American Geographers*, 104(4) 2014, pp. 816–832.

Macdonald, S. & Headlam,, N. (2008): *Research Methods Handbook, Introductory guide to research methods for social research*. Centre for local economic strategies ISBN: 1870053656.

Mamba, H.; Randhir, T.; Fuller T. (2020): Management: Benefit, Empowerment and Conservation. *Biodiversity and Conservation* 18(10):2551–2562. *African Journal of Wildlife Research* 50: 1–7 ISSN 2410-8200 [Online only] — DOI: <https://doi.org/10.3957/056.050.0001>.

Marijnen, E. (2017): The ‘green militarisation’ of development aid: the European Commission and the Virunga National Park, DR Congo. *Third World Quarterly*. (38) 1-17. 10.1080/01436597.2017.1282815.

Medina-Muñoz, D., Medina-Munoz, R., Gutierrez-Perez, F. (2016): The impacts of tourism on poverty alleviation: an integrated research framework. *Journal of Sustainable Tourism*, (24):2, 270-289.

Ministry of Environment, Forestry and Tourism. (1975): Nature Conservation Ordinance 4 of 1975 <https://www.met.gov.na/downloads/>.

Ministry of Environment, Forestry and Tourism. (1996): Nature Conservation Amendment Act 5 of 1996 <https://www.met.gov.na/downloads/>.

Ministry of Environment, Forestry and Tourism. (2015): Earth Bound, Official Newsletter. Volume 2 – Issue 1/2015.

Ministry of Environment, Forestry and Tourism. (2017): Namibia Black Rhino (*Diceros Bicornis*) Management Strategy (DRAFT).

Ministry of Environment, Forestry and Tourism. (2020): Annual Progress Report 2019/2020 web link <https://www.met.gov.na/downloads/>.

Morias, D., Birendrak, C., Yuchen, M., Mosimane, A. (2015): Wildlife Conservation Through Tourism, Microentrepreneurship Among Namibian Communities. *Tourism Review International*, (19) 43-61.

Morgan, D. (2014): Pragmatism as a Paradigm for Social Research. *Qualitative Inquiry*. DOI: 10.1177/1077800413513733.

Mosimane, A. & Silva, J. (2015): Local Governance Institutions, CBNRM, and Benefit-sharing Systems in Namibian Conservancies. *Journal of Sustainable Development*; (8), 2; ISSN 1913-9063 E-ISSN 1913-9071.

Mouton, J. (1996): *Understanding Social Research* (book). Van Schaik Publishers □ ISBN-10: 0627021638.

Mouton, J. (2006): Understanding Social Sciences Research: Concepts, principles and good practice. Presentation given at the institute of South Africa.

Mulale, K., Matema, C., Funda, X., Slater-Jones, S., Njovu, D., Kangueehi, G., Hay, D. & Crookes, V. (2013): *Community-Based Natural Resource Management in Southern Africa, An Introduction*. Author House, ISBN: 978-1-4817-5763-8.

Muntifering, JR. (2016): A quantitative model to fine-tune tourism as a black Rhinoceros (*Diceros bicornis*) conservation tool in north-west Namibia (PhD Thesis) Stellenbosch, RSA: Stellenbosch University.

Muntifering, JR., Linklater, W., Naidoo, R., !Uri-≠Khob, S., Preez, P..Beytell, P., Jacob,S. & Knight, A. (2018): Sustainable close encounters: integrating tourist and animal behaviour to improve rhinoceros viewing protocols. *Animal Conservation* ISSN 1367-9430.

Muntifering JR, Clark S, Linklater WL, Hebach E, Cloete J, !Uri-≠Khob S, Jacob S, Knight A. (2020): Lessons from a conservation and tourism cooperative: Namibian black rhinoceros case. *Annals of Tourism Research*, 82 (2020).

Murphree, M. (2009): The Strategic Pillars of Communal Natural Resource Management: Benefit, Empowerment and Conservation. *Biodiversity and Conservation* 18(10):2551–2562.

Naidoo, R., Weaver, L.C., de Longcamp, M. & du Plessis P,: (2011): Namibia's community-based natural resource management programme: an unrecognized payments for ecosystem services scheme. *Environmental Conservation* 38 (4): 445–453.

Naidoo, R. Weaver, L.C. Stuart-Hill, G., Diggle, R., Matongo, G., & Thouless, C. (2016): Complementary benefits from tourism and hunting to communal conservancies in Namibia. *Conservation Biology*, (30), 3, 628-638.

Namibia Association for Community Based Natural Resource Management Support Organisations (NACSO): State of Community Conservation in Namibia Annual Report (2018-2021): Web link: <http://www.nacso.org.na/resources/state-of-community-conservation>.

Namibia Nature Foundation (2017): Web link: Women in Conservation: CBRNM a rural sustainable development model. 14-20.

Namibia Statistics Agency, (2014): Web link: <https://nsa.org.na/page/data-portal/>.

Naro, E., Mahera, S., Muntifering, J., Eichenwalda, A., & Clark, S., (2020): Syndicate recruitment, perceptions, and problem solving in Namibian rhinoceros protection. *Biological Conservation Journal* (243)108481:

Ngutjinazo, O. (2019): Financial mismanagement rife at conservancies. The Namibian Newspaper, National News 2019-07-22 web link:  
<https://www.namibian.com.na/191022/archive-read/Financial-mismanagement-rife-at-conservancies>.

Nelson, F. & Agrawal, A. (2008): Patronage or Participation? Community-Based Natural Resource Management Reform in Sub-Saharan Africa. *Development and Change* (39) 4 :557–585.

Nelson F., Muyamwa-Mupeta P., Muyengwa S., Sulle E., Kaelo D. (2020): Progress or regression? Institutional evolutions of community-based conservation in eastern and southern Africa. *Conservation Science and Practice*. <https://doi.org/10.1111/csp2.30>

Nind, M., Bengry-Howell, A., Crow, G. & Wiles, R. (2011): Methodological Innovation and Research Ethics: Forces in tension or forces in harmony. *Qualitative Research*. (13). 10.1177/1468794112455042.

Nowell, L.; Norris, J.; White, D.; Moules., Nancy. (2017): Thematic Analysis: Striving to Meet the Trustworthiness Criteria. *International Journal of Qualitative Research* (16). 10.1177/1609406917733847.

Ostrom, E. (1990). *Governing the Commons. The Evolution of Institutions for Collective Action*. Cambridge University Press, New York.

Ostrom, E. & Cox, M. (2010). Moving Beyond Panaceas: A Multi-Tiered Diagnostic Approach for Social-Ecological Analysis. *Environmental Conservation* (37) 4:451–463.

Owen Smith, G. (2010): *An Arid Eden, A Personal Account of Conservation in the Kaokoveld*. Jonathan Ball Publishers, Cape Town, South Africa.

Pandey, P. & Pandey, M. (2015): *Research Methodology: Tools and Techniques*. ISBN 978-606-93502-7-0.

Powell, L., Uapindikirairje, K., & Kharuxab, R (2017): Livestock Farmers Engage in Ecotourism as a Result of Beliefs and Attitudes Toward Wildlife on Communal Lands in Namibia, *Human Dimensions of Wildlife*, DOI: 10.1080/10871209.2017.1295490.

Rademeyer, J. (2012): *Killing for Profit: Exposing the Illegal Rhino Horn Trade*. Published by Penguin Random House publishers, South Africa.

Randriamanampisoa, H. & Adams, S. (2015): The Ploughshare Tortoise Protection Project, Madagascar. Featured as a case-study in: Conservation, Crime and Communities. *Case Studies of efforts to engage local communities in tackling illegal wildlife trade*. Background Paper published by the International Institute for Environment and Development, London.

Saayman, M. & Saayman, A. (2016): Is the rhino worth saving? A sustainable tourism perspective, *Journal of Sustainable Tourism*, (25):2, 251-264, DOI: 10.1080/09669582.2016.1197229.

Saunders, F (2014): The promise of common pool resource theory and the reality of commons projects. *International Journal of the Commons*. (8), 2, 636–656.

Save the Rhino International (2021): Poaching Statistics taken from website: [www.savetherhino.org](http://www.savetherhino.org).

Schmitz, P., Gonçalves, D. & Jacobs, M. (2017): Mapping community vulnerability to poaching: A whole-of-society approach. *International Cartographic Conference*, Springer, Cham, 325-340.

Silva, J. & Mosimane A. (2012): Conservation-Based Rural Development in Namibia: A Mixed Methods Assessment of Economic Benefits, *Journal of Environment and Development* 22(1)25-50.

Snyman, S. (2012): Ecotourism joint ventures between the private sector and communities: An updated analysis of the Torra Conservancy and Damaraland Camp partnership, Namibia. *Tourism Management Perspectives*. (4)127-135.

Stamm, C. (2017): Dependency as Two-Way Traffic – Community Based Organisations and Non-Governmental Organisations in the Namibian CBNRM Programme. Thesis submitted in partial fulfilment of the requirements of the University of Lincoln for the degree of Doctor of Philosophy.

Suich, H. (2010): The livelihood impacts of the Namibian community based natural resource management programme:a meta-synthesis. *Environmental Conservation* (37), 1: 45–53 © Foundation for Environmental Conservation.

Sullivan, S. (2011): Conservation is sexy! What makes this so, and what does this make? An engagement with Celebrity and the Environment. *Conservation and Society* 9(4):334-345. *Sustainable Tourism*, (20):3, 395-416, DOI: 10.1080/09669582.2012.657202.

Creative Research Systems (2021): <https://www.google.com/search?client=firefox-b-d&q=survey+system.com> accessed November 2020 for sample calculator.

t'Sas-Rolfes, M. (2011): Rhino Economics. Presentation to the African Rhino Specialist Group meeting, Mokala National Park 2011.

Tashakkori, A. & Teddlie, C. (2003): *Handbook of Mixed Methods in Social & Behavioral Research*. Thousand Oaks: Sage.

Tercek, M. & Adams, J. (2016); *Nature's Fortune: How Business and Society Thrive by Investing in Nature* (Book). The Nature Conservancy.

Torres, R., Skillicorn, P., & Nelson, V. (2011): Community Corporate Joint Ventures: An Alternative Model for Pro-Poor Tourism Development, *Tourism Planning & Development*, (8):3, 297-316.

United Nations Economic and Social Commission for Asia and the Pacific (2006): What is good governance? Website link: <https://www.unescap.org/resources/what-good-governance>.

United Nations World Tourism Organisation (2021): Glossary of Tourism Terms. Web Link: <https://www.unwto.org/glossary-tourism-terms>.

United Nations (2015): Sustainable Development Goals, Department of Economic and Social Affairs Disability; web link:  
<https://www.un.org/development/desa/disabilities/envision2030.html>.

United States Agency for International Development (2021): Combatting Wildlife Trafficking. Web Page accessed February 2021: <https://www.usaid.gov/biodiversity/wildlife-trafficking>.

Walliman, N. (2011): *Research Methods, the basics* (book); Routledge ISBN 0-203-83607-3 Master e-book ISBN.

Weigend, G. (1985): German Settlement Patterns in Namibia. *Geographical Review*, (75), 2, 156–169. JSTOR, [www.jstor.org/stable/214466](http://www.jstor.org/stable/214466). Accessed 8 Feb. 2021.

World Tourism Organization, World Trade Organization, the World Travel & Tourism Council and the International Trade Centre joint communication "Tourism, Trade and the WTO (2018) web link: <https://www.unwto.org/global/press-release/2018-10-08/tourism-trade-and-wto-joint-communication-unwto-wto-itc-and-wtcc>.

Report of the World Commission on Environment and Development (1987): Our Common FutureBrundtland Commission, Oxford University Press.

World Wide Fund for Nature (2021): <https://www.worldwildlife.org/>.

Yin, R. (2014): *Case Study Research Design and Methods* (5th ed.). Thousand Oaks, CA: Sage.

## **ANNEXURES**

### **Annexure 1: Letter of Permission to Conduct Research in Conservancy**

To: The Chairperson, //Huab Conservancy

Date sent (via email): 13 March 2020

This letter is to request permission to conduct social research within the boundaries of your conservancy.

The research is aimed at understanding more about the rhino centred tourism operation, which is a joint venture between the conservancy and Ultimate Safaris, and how this might have an effect on conservancy members' perceptions of conservation.

The research will take the form of an open-ended questionnaire which aims to generate conversation about how conservancy members feel that the benefits coming out of the tourism enterprise are having an effect on their lives. I also aim to understand more about how their attitudes towards rhino might have changed since the tourism started in the area.

If permission is granted, research will be conducted in April or May 2020 according to a research schedule (attached here) and a set timetable. As the researcher is employed full-time at Save the Rhino Trust, research will need to take place over a number of weeks comprising a few contact sessions each month.

The aim is to interview 50 of your members. Announcements will be made a week before, alerting the residents of a particular conservancy zone to the arrival of the interview team. Interviews will be one on one with a translator present and will take place at a central place inside a conservancy zone.

If the conservancy wishes to send someone to accompany the researcher, the person shall be collected and dropped off.

This research is conducted as part of a UNISA MA Qualification requirement. The results of the research in the form of the final write up and also a summarised version will be made available to the conservancy once finalised.

The aim of the research is to be practically applicable to your conservancy management structure to assist the conservancy to understand more about member's perception on conservation and how tourism might be used as a tool to influence (negatively or positively) perceptions of wildlife within the conservancy boundaries.

Please note that this research has nothing to do with Save the Rhino Trust and is linked to my personal studies at the University of South Africa.

With this, I am requesting permission to conduct this research inside your conservancy boundaries with a focus on conservancy members attitudes towards wildlife and tourism.

Please do not hesitate to contact me should there be any further queries.

Andrew Malherbe,

+264 81 698 7631

## **Annexure 2: Questionnaire**

### **Survey Schedule, //Huab Conservancy Members on Rhino Tourism in the Conservancy Area**

Interviewer:.....

Conservancy Area:.....

Date of Discussions (MM/DD/YY).....

Good Day,

my name is ..... I am here conducting a survey on conservancy members' perceptions of rhino conservation and how the rhino tourism enterprise in your conservancy might have affected your attitude towards rhino in the area.

Your conservancy has been selected for this survey because of the rhino tourism enterprise joint-venture that the conservancy has.

You have been selected to take part in the survey because you are a conservancy member at //Huab and we are interested to understand more about your perceptions on rhino conservation and tourism in your conservancy area.

Participation in this survey is voluntary and all of your answers will remain confidential and anonymous unless you specify otherwise. We will present all of the information we have gathered in the form of anonymous responses so your name will not be linked with any information that you share with us today.

This research has been approved by the conservancy and is conducted in fulfilment of a Master of Arts Degree.

The session should take about 40 minutes of your time.

#### **1. Kindly provide the estimation of how much money does the Conservancy earn per year**

- Between 10,000 – 50,000
- Between 50,000 – 100,000

- Between 100,000 – 200,000
- Above 200,000

**2. Kindly provide the major source of income for //Huab Conservancy?**

- Hunting
- Tourism
- Wood Harvesting
- Don't know

**3. Name a tourism operator that works in the conservancy**

**4. Which year did the operator sign the contract with the conservancy?**

- 2012
- 2013
- 2015
- 2016

**5. Please rate the following statement: since the contract was signed, there has been an increase in benefits to you as a conservancy member, coming from the conservancy**

- 1. Strongly Agree
- 2. Agree
- 3. Neutral
- 4. Disagree
- 5. Strongly Disagree

**6. Please elaborate on the type of benefits from the conservancy you have received in the last 3 years**

- Employment at Conservancy Office
- Employment through tourism at the conservancy
- Infrastructure development (roads, clinic, school)
- Human Wildlife Conflict Mitigation
- other

**7. Of these benefits above, which one is most important to you and why?**

**8. Please rate the following statement: our conservancy is doing a good job managing natural resources**

1. Strongly Agree 2. Agree. 3. Neutral. 4. Disagree. 5. Strongly Disagree

**9. Please rate the following statement: our conservancy annual general meetings tell us enough about how conservancy money is spent**

1. Strongly Agree 2. Agree. 3. Neutral. 4. Disagree. 5. Strongly Disagree

**10. Please rate the following statement: having black rhino in our conservancy is good for the community that lives here?**

1. Strongly Agree 2. Agree. 3. Neutral. 4. Disagree. 5. Strongly Disagree

Please elaborate

**11. Please rate the following statement: Rhino Tourism is a positive rural development tool**

1. Strongly Agree 2. Agree 3. Neutral 4. Disagree 5. Strongly Disagree

Please elaborate

**12. Please rate the following statement: The Rhino Tourism Joint Venture at //Huab Conservancy is positive for you, the conservancy members**

1. Strongly Agree 2. Agree. 3. Neutral. 4. Disagree. 5. Strongly Disagree

Please elaborate

**13. Please rate the following statement: Rhinos are under threat from poachers at //Huab conservancy**

1. Strongly Agree 2. Agree. 3. Neutral. 4. Disagree. 5. Strongly Disagree

**14. Please rate the following statement: Rhino Tourism at //Huab is helping the conservancy to achieve its goal of linking wildlife conservation to rural development in our area**

1. Strongly Agree 2. Agree. 3. Neutral. 4. Disagree. 5. Strongly Disagree

**15. What do you think should be offered by joint venture tourism partners to conservancies for the rights to operate in the area?**

- Money to the conservancy
- Jobs for conservancy members
- Training to conservancy members in tourism
- Assistance to farmers
- Other

**16. Please rate the following statement: I know enough details about the rhino tourism enterprise at //Huab Conservancy**

1. Strongly Agree 2. Agree. 3. Neutral. 4. Disagree. 5. Strongly Disagree

**17. What is the Wildlife Credits Scheme?**

**18. If you have heard about the scheme, do you know how the scheme works?**

**19. Please rate the following statement: Rhino Tourism is an effective way to combat poaching of rhino in rural areas of Namibia**

1. Strongly Agree 2. Agree. 3. Neutral. 4. Disagree. 5. Strongly Disagree

Please provide reasons for your answer

**20. Please rate the following statement: The Rhino Tourism activity at //Huab can be improved**

1. Strongly Agree 2. Agree. 3. Neutral. 4. Disagree. 5. Strongly Disagree

If you answered 1 or 2 to the question above, please elaborate on how it could be improved

**BIOGRAPHY**

Kindly tick the box below

1. Male/Female

What is your Age?, Kindly answer the following questions by ticking an appropriate box

- 18-25
- 25-35
- 35-50
- Over 50

4. How long have you been a conservancy member at //Huab?

1-2 Years       3-5 Years       More than 5 Years

5. What is your highest educational qualification?

- Higher education
- Grade 12
- Grade 7-12
- Grade 1-7
- none

5. What is your main form of income?

Livestock farming Cropping      Remittance/Government Grants      Employed (please indicate the type of employment)

Thank you for your time, the results of this survey will be shared with the conservancy and you are welcome to go to the conservancy office and read through the summary of findings. This should be towards March 2021

### **Annexure 3: Declaration of Copy Edit**

19 February 2021

#### **DECLARATION OF PROFESSIONAL EDIT**

I, Tracy-Lee Malherbe, declare that I have proofread the Master's Dissertation

entitled:

**INVESTIGATING LOCAL PARTICIPATION IN TOURISM AND THE PROTECTION OF BLACK RHINOS IN NORTH-WESTERN NAMIBIA: A CASE STUDY OF //HUAB CONSERVANCY**

by

**ANDREW RUSSELL MALHERBE**

(UNISA Student Number 35067284)

I confirm that I am in possession of an NQF Level 5 Copy-editing qualification from the University of Cape Town.

My involvement was restricted to language editing: spelling, grammar, punctuation, vocabulary, sentence structure and style, proofreading, sentence structure and viability. I also checked for consistency, editing of headings and captions and any other suggestions I felt could help with the readability of the document. I did not change the context or meaning of any content. The structure and format of the document are at the discretion of the author and have not been altered by me in any way.

No responsibility is taken for any occurrences of plagiarism, which may not be obvious to the copy-editor.

The copyeditor is not accountable for any changes made to this document by the author or any other party subsequent to my edit.

Sincerely

A handwritten signature in black ink, enclosed in a thin black rectangular border. The signature appears to read "T. Malherbe".

T.Malherbe