TOWARDS A CONCEPTUAL FRAMEWORK FOR THE ANALYSIS OF GOVERNANCE ARRANGEMENTS AND LIVELIHOODS OF SMALL-SCALE FISHERIES IN NORTON, ZIMBABWE

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ABSTRACT

Governance arrangements and their impacts on the livelihoods of small-scale fisheries (SSF) in Zimbabwe are an understudied phenomenon. Government and local authorities are very active, vocal and visible in the management of other livelihood activities such as farming, and artisanal mining. However, very limited attention is paid to the fisheries sector. The SSF sector in Zimbabwe has been marred by mis-governance coupled with a poor, fragmented regulatory framework that has resulted in limiting access for several fishing communities. This situation consequently has threatened livelihoods. This study sought to investigate the nature of governance and power relations in SSF and their impact on fisherfolk's livelihoods. To do so, the research was structured and mediated by several research questions including: what are the current governance arrangements within the SSF sector in Norton? The study adopted a grounded theory approach to allow the participants (fisherfolk) to speak for themselves, narrating their perceptions. It employed qualitative methods for data collection such as primary (interviews and focus group discussions) and secondary (newspapers, government policy documents) to address the research questions. A total of 113 respondents who included individual fishers, and cooperatives took part in the study. The conceptual foundation of this study was informed by the interactive governance approach because it focuses on interpreting the governability of societal systems. Results have shown that SSF in Zimbabwe are instituted through an overlapping hierarchical centralised system by various government departments and ministries. This formal centralised system is often confusing and difficult to implement since it is poorly regulated, and fragmented. The weak centralised hierarchical arrangements resulted in the emergence of informal fishing which is dominant and visible in Norton SSF. Formal and informal fishing arrangements operate simultaneously in some instances and there is significant overlap and interaction between formal and informal fishing with informal fishing considered larger than formal fishing. These informal fishing arrangements are dominant and visible in the governance of SSF in Norton and also reflect reliance on and use of indigenous fishing rights amongst the fisherfolk. SSF in Norton have proven to be important as a source of livelihoods, yet the continued marginalisation of informal arrangements in decision making continues to undermine the potentially positive socio-economic benefits for some actors. Instead, informal arrangements have created quasi-judicial epochs of power that threaten the sustenance of the whole SSF in Norton. By giving a detailed account of the multi-layered governance structures (both formal and informal) through the development of a conceptual framework suitable for SSF in Norton, this study contributed to ongoing debates on fisheries governance under the three existing governance modes which are (hierarchical, co-governance, and self-governance). Realising the important role, played by informal fishing, the study calls for a co-management participatory process between the government and small-scale fishers in formulating a dedicated stand-alone policy for SSF in Zimbabwe.

Keywords and phrases: Small-Scale Fisheries; Hierarchical Governance; Informal Fishing Arrangements; Livelihoods; Co-management

OPSOMMING

Beheermaatreëls en die dienooreenkomstige invloed daarvan op die bestaan van kleinskaalse visvang-aangeleenthede (SSF) in Zimbabwe, is 'n ongekende en onbekende fenomeen. Die regering asook plaaslike owerhede in Zimbabwe poog oënskynlik om die bestaanspraktyke van algemene boerdery en selektiewe, vakmanskap-gerigte mynbou te ondersteun en te bestuur. Dit wil voorkom asof min tot geen navorsing oor die vissery-sektor van Zimbabwe onderneem is. Kleinskaalse visvang-aangeleenthede (SSF) in Zimbabwe word tans deur wanbeheer en gefragmenteerde regulasies geteister wat die toegang tot vissersgemeenskappe beperk. Die volgehoue probleem bedreig die tersaaklike bestaanspraktyke. Hierdie verhandeling is daarop uit om die eiesoortige beheer en gepaardgaande magsverhoudinge binne die kaders van kleinskaalse visvang-aangeleenthede (SSF) asook die invloed wat dit op vissermanne/-vroue se bestaanspraktyke vermoedelik mag hê, te ondersoek. Om die navorsing-voornemens van die verhandeling te verwerklik, word dit deur menigte navorsingsvrae bemiddel. Die volgende vraag word, onder andere, gevra: Wat is die huidige beheermaatreëls binne die kleinskaalse visserysektor van Norton? Verder, word 'n gegronde teoretiese benadering gevolg om deelnemers (vissers) se "stemme" en narratiewe tot die voorgrond te bring. Die voormelde navorsingvoornemens word deur middel van kwalitatiewe navorsingsmetodes onderneem wat op 'n verskeidenheid dataverkryging-metodes geskoei is: primêre bronne (onderhoude fokusgroepbesprekings) asook sekondêre bronne (koerantartikels, -berigte en staatskoerante) is gesamentlik gebruik om die navorsingsvrae te beantwoord en te bespreek. Daarom het die navorser, met deeglike oorweging, en ook gegewe die unieke kontekstuele faktore, 113 respondente vir die doeleindes van die studie geïdentifiseer, wat onder andere individuele vissers asook samewerkers is. Die konseptuele raamwerk van hierdie verhandeling is op 'n interaktiewe bestuursbenadering geskoei omdat daar op die interpretatiewe beheermaatreëls van sosiale stelsels gefokus word. Na die afloop van die studie, toon die data dat kleinskaalse visvang-aangeleenthede (SSF) in Zimbabwe deur 'n oorkoepelende, gestratifiseerde en gesentraliseerde beheerstelsel gekenmerk word. Die stelsel sluit dus enige vorm van verskillende regeringsdepartemente en ministeriële groeperings in. Daar is dikwels onenigheid en misverstande oor 'n formele gesentraliseerde stelsel omdat die implementering daarvan swak gereguleer en gefragmenteer is. Die swak gesentraliseerde en hiërargiese onderhandelinge het tot 'n totstandkoming van informele visserye gelei wat in Norton se kleinskaalse visvang-aangeleenthede (SSF) oorheersend sigbaar is. Regulasies vir visvang word in 'n beduidende, oorkoepelende en interaktiewe wyse binne beide formele en informele visserye aangetref. Daarbenewens, word meer informele as formele visvangaangeleenthede aangetref. Informele visvang regulasies word hoofsaaklik binne die kaders van

dominante en die sigbare beheer van kleinskaalse visvang-aangeleenthede in Norton aangetref. Informele regulasies oor visvang-aangeleenthede is oorheersend en sigbaar in die beheer en regeerskap van kleinskaalse visvang-aangeleenthede (SSF) in Norton en reflekteer ook 'n behoefte aan inheemse visvangregte rondom die visser-gemeenskappe. Aan die een kant, is kleinskaalse visvang-aangeleenthede (SSF) as 'n belangrike bestaanspraktyk beskou en reflekteer dit ook sodoende 'n belangrike bron van gemeenskappe se bestaanswyses in Norton. Aan die teen kant, beklemtoon die toenemende marginalisering en onderdrukking van informele regulasies binne die bestek van besluitneming, 'n voortdurende en volgehoue gevaar om die potensiaal van sosioekonomiese voordele van akteurs te vernietig. Informele regulasies het in plaas daarvan, 'n "kwasi-regsplegende epog" van magstrukture ontwikkel. Dit veroorsaak potensiële gevare vir die lewensonderhoud van die algehele kleinskaalse vissersgemeenskap (SSF) in Norton. 'n Gedetailleerde uiteensetting van meerlagige beheerstrukture (beide formeel en informeel) word deur die verhandeling aangebied om 'n gepaste konseptuele raamwerk vir kleinskaalse visvangaangeleenthede (SSF) in Norton te ontwikkel. Daarom is die verhandeling 'n bydrae tot huidige debatte van gereguleerde visvang-aangeleenthede wat die bestaande middele van beheer d.i. hiërargiese -, saamwerkende -, en selfbeheer, gebruik. Na afloop van die verhandeling, het die navorser besef dat informele visvang-aangeleenthede 'n saamwerkende – en deelnemende beheerstelsel tussen die regering en kleinskaalse visvang-aangeleenthede (SSF) bied, en sodanig die geleentheid skep om 'n eiesoortige beleid vir kleinskaalse visvang-aangeleenthede (SSF) in Zimbabwe te ontwikkel.

Sleutelwoorde: Kleinskaalse visvang-aangeleenthede; Gesentraliseerde beheer; Informele visvang-aangeleenthede; Leefstyle; Deelnemende bestuur

MUSUMO

Zvematongerwo nemagariro anoita vanhu vanorarama nekubata hove mumatunhu nemumamisha, zvinhu zvisinganyanyokosheswa muzvinyorwa. Hurumende inokoshesa zvekurima, nezvezvicherwa kudarika zvekubatwa kwehove. Zvinoita nechekuita nezvehove hazvinyanyotaurwa nezvazvo panotaurwa zvebudiriro munyika. Mitemo inoona nezvekubatwa nekuchengetedzwa kwehove dzemumatunhu yakawandisa zvinobva zvaita kuti mhuri dzinorarama nekubata nekutengesa hove dzivhiringidzike. Manyama amire nerongo aya anobva aita nezvehove vatambudzike. Chinangwa vanorarama chetsvakurudzo ndechekuongorora matongerwo, mabatirwo, nemakakatamwa anowanikwa muvabati vehove nezvazvinokonzeresa mumararamiro avo. Kuti chinangwa ichi chibudirire, pane mivhunzo yakati wandei yaivhunzwa inosanganisira ine zvekuita nezvematongerwo nemagariro evanhu vanobata hove. Tsvakurudzo ino yakashandisa muono wegrounded theory kuitira kuti vanorarama nezvehove vakwanise kutaura maonero avo nezvavanofunga maererano nezvehove. Tsvakurudzo yakabudirira kupfurikidza nemibvunzo yaibvunzwa vanhu vanorarama nezvehove nevanoshanda mumapazi ehurumende anoona nezvekubatwa nekuchengetedzwa kwehove. Muiti wetsvagurudzo iyi akashandisawo zvakare misangano nemapoka (cooperatives) anoita zvemibatanidzwa yekubata nekutengesa hove. Nyaya dzemumapepanhau nemabumbiro emutemo ehurumende anoita nezvehove dzakashandiswawo pakukwenenzvera tsvagurudzo ino. Kune vanhu zana negumi nevatatu vanosanganisira varedzi vehove, nevanoita mibatanidzwa pakubata nekutengeswa kwehove vakabatsira kuti tsvagurudzo ino ikwanise kufambira mberi. Hwaro hwetsvakurudzo ino hwakasimbaradzwa nemufungo unonzi interactive governance arrangement uyo unotsanangudza nokujekesa zvematongerwo evanhu mumatunhu ivo vachivawo nezwi mumatongerwo iwawo. Zvakabuda mutsvakurudzo zvakaratidza kuti mitemo inotonga nezvehove yakawandisa munyika ichibva kumapazi ehurumende akasiyana-siyana zvinobva zvaita kuti vanhu vavhiringidzike pakuziva kuti ndeupi mutemo wekutevedzera. Dai pane mutemo wakanyorwa netsanangudzo dzinonzwisisika zvaivaitira nyore. Pamusoro peizvozvo, mitemo yezvehove muZimbabwe yakarongwa kubva kumusoro ichidzika zasi. Hurumende ndiyo inopa mitemo kupfurikidza neZimParks nemamwe mapazi eherumende kusvika izosvikawo kuzasi kune vanoita nezvehove. Kudzikwa kwemitemo kwemhando iyi kunoita kuti vanhu vapedzisire vasisatevedzi mitemo yacho nekuti kazhinji mitemo yacho haitungamidze zvido zvevanhu pamberi. Mitemo yacho inenge ichida marezinesi ekuti vanhu vabvumidzwe kubata nekutengesa hove. Marezinesi acho anenge achidhura zvekuti vanhu havazokwanise kuabhadhara. Izvi zvinobva zvaita kuti vanhu vapedzisire vachibata hove dzacho zvisiri pamutemo. Vanoti mhuri dzavo hadzingafe nenzara dzakasvinura sematemba nekuda kwemitemo. Vanoti makare-kare

kusati kwava nemitemo yemhando iyi madzitateguru avo aivabvumidza kubata hove mhuri dzavo dzichiguta. Kubatwa kwehove zvisiri pamutemo kwatekeshera mudunhu reNorton kutopfuura vanobata zviripamutemo. Zvakare, kunyangwe vane matsamba ekubata hove vanowanikwawo vachiita zvekushandisa zvekuredza nekubata hove zvisiri pamutemo. Vanhu vazhinji muNorton vanoraramisa mhuri dzavo kupfurikidza nekubata nekutengesa hove. Tsvakurudzo ino inobatsira zvimwe zvinyorwa zvinoita nezvematongerwo nekubatwa kwehove. Kupfurikidza nekuona kukosha nemukurumbira uri kuita vanobata hove zvisiri pamutemo, tsvagurudzo ino inokurudzira mubatanidzwa wemasangano akasiyana-siyana anosanganisira varedzi vehove, vatengesi vehove, nehurumende pakugadzira mitemo ine chekuita nezvekubatwa nokutengeswa kwehove mu Zimbabwe.

Mashoko Anokosha: Vanorarama nezvehove; Hutongi hwemuturikidzanwa; Kubatwa kwehove zvisiri pamutemo; Mararamiro evanhu; Muonerapamwe pakutonga nokufambisa basa.

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ACRONYMS AND ABBREVIATIONS

AREX Agricultural Research and Extension

BMUs Beach Management Units

BSAC British South African Company

CAPS Central African Pharmaceutical

CBD Central Business District

CBNRM Community Based Natural Resource Management

CFP Common Fisheries Policy

CSO Civil Society Organisations

DCC District Coordinating Committee

DMCs Dam Management Committees

EC European Commission

EMA Environmental Management Agency

ESAP Economic Structural Adjustment Programme

EU European Union

FAO Food and Agriculture Organisation

FGD Focus Group Discussions

FTLRP Fast Track Land Reform Programme

GDP Gross Domestic Product

GI Governing interactions

GMB Grain Marketing Board

GS Governing System

IBDC Indigenous Business Development Centre

ICES International Council for the Exploration of the Sea

ICM Integrated Coastal Management

IG Interactive Governance

IGA Interactive Governance Approach

IGT Interactive Governance Theory

IKPA Indigenous Kapenta Producers Association

IMF International Monetary Fund

IQ Individual Quotas

ITQs Individual Transferable Quotas

IUU Illegal, Unregulated, and Underreported

KPA Kapenta Producers Association

LAA Land Apportionment Act

LPD Livestock Production Department

MDC Movement for Democratic Change

MP Member of Parliament

MPAs Marine Protected Areas

MSA Magnuson– Stevens Fishery Conservation and Management Act

MSP Maritime Spatial Planning

MWACSMED Ministry of Women's Affairs, Community, Small and Medium

Enterprises Development

NGOs Non-Governmental Organisations

NR Northern Rhodesia

NRZ National Railways of Zimbabwe

NSA Non-State Actors

RDA Rural District Act

RDC Rural District Council

SADC Southern African Development Community

SDG Sustainable Development Goals

SEDCO Small Enterprise Development Corporation

SFLP Sustainable Fisheries Livelihoods Programme

SG System to be Governed

SLA Sustainable Livelihoods Approach

SMEs Small and Medium Enterprises

SOFA Speak Out for Fish and Crocodiles

SR Southern Rhodesia

SSF Guidelines The Voluntary Guidelines for Securing Sustainable Small-Scale

Fisheries

SSF Small-Scale Fisheries

STARGO Strengthening Aquatic Resource Governance

SU Stellenbosch University

SWBs Small Water Bodies

TEK Traditional Ecological Knowledge

TURFs Territorial Use Rights in Fisheries

UN United Nations

UNCLOS United Nations Convention on the Law of the Sea

USA United States of America

USD United States Dollars

VIDCOs Village Development Committees

WADCOs Ward Development Committees

WFF World Forum of Fish Harvesters and Fish Workers

ZANU-PF Zimbabwe African Union - Patriotic Front

ZESN Zimbabwe Election Support Network

Zim-Asset Zimbabwe Agenda for Sustainable Socio-Economic Transformation

ZimParks Zimbabwe Parks and Wildlife Management Authority

ZIMSTAT Zimbabwe National Statistics Agency

ZINWA Zimbabwe National Water Authority

ZPWMA Zimbabwe Parks and Wildlife Management Authority

ZUPCO Zimbabwe United Passenger Company

CHAPTER 1: INTRODUCTION

1.1 INTRODUCTION

The importance and contribution of small-scale fisheries (SSF) to livelihoods is recognised in research and practice across the globe (Chuenpagdee 2018). As a result, there exists a plethora of literature on fisheries livelihoods and the fishing industry at large. Thus, "small-scale fisheries are both too big to ignore and too important to fail" (Chuenpagdee 2018: 313). However, mainstream social science research on fisheries focuses extensively on examining the livelihoods dimension of this sector and pays limited attention to how power dynamics and governance arrangements (both formal and informal) shape livelihood patterns in the small-scale fisheries sector. Some existing fisheries literature fails to pay attention to how capitalist relations of power and class shape fisheries systems despite efforts by other studies to show these relations (Bernstein 2010; Borras et al. 2013; Levien et al. 2018). Furthermore, literature on fisheries policy has also been included under the goals of economic growth and wealth creation despite its social importance for food security and employment (Campling et al. 2012; Sumaila & Le Billion 2019; Temesgen et al. 2019).

Governance arrangements and its impacts on livelihoods of SSF in Zimbabwe is an understudied aspect. Government and local authorities are very active, vocal and visible, and often intervene in the management of other livelihood activities such as farming, street vending, artisanal mining, as well as other informal activities. However, very limited attention is paid to the fisheries sector. Many scholars on small-scale fisheries in Zimbabwe focus on the impacts of climate change to SSF (Utete et al. 2018), fish farming as an alternative strategy for food security (Shava & Gunhidzirai 2017), livelihoods of small-scale fisheries in general (Mhlanga & Mhlanga 2013; Kupaza et al. 2015) and policy evolution (Nyikahadzoi & Raakjaer 2009; Nyikahadzoi et al. 2017). Therefore, a host of literature on small-scale fisheries in Zimbabwe concentrates on how communities get fish out of the water as food and commodities and little emphasis is placed on how governance and power relations impact on livelihoods. Thus, there is need to rethink the management of the (SSF) sector as well as developing new and viable stand-alone governance policy for SSF. This study attempts to fill this gap by investigating, documenting and analysing how governance and power relations in small-scale fisheries shape fisheries livelihoods and how in turn livelihood activities impact on governance.

Governance in this study does not equate to government but it is about the processes of making decisions, and often by actors other than the state. Kooiman et al. (2008) maintain that governance of natural resource systems involves interactive roles of civil society, market, and state. This entails that in the event that the state fails to govern properly, other actors such as the civil society and market would be involved in governance issues. Governments also interact with other actors such as companies, individuals, voluntary associations, Non-Governmental Organisations (NGOs), militant organisations, political parties and village councils in shaping societal futures (Pitcher et al. 2009; Jentoft & Bavinck 2014; Bavinck & Vivekanandan 2017; Sumaila & Le Billion 2019). This concept was borrowed from the interactive governance theory which postulates that private stakeholders often play a much more important informal role than countries locally and internationally (Kooiman et al. 2008; Bavinck et al. 2015; Gonzalez 2018). However, interactive governance often looks at formal arrangements, but informal arrangements also play a critical role in Southern Africa, especially at community level. This study used the interactive governance framework as a point of departure to develop a conceptual framework which is community-based and with local considerations of the Norton small-scale fishing community. Interactive governance framework provides an analytical lens to identify challenges and opportunities for enhancing governance (Jentoft & Chuenpagdee 2019), although it is developed for countries in the global North. This study embraced it as a reference point because it is extensively applied to capture fisheries and aquaculture.

1.2 RATIONALE

The fisheries sector contributes to development by improving the livelihoods of marginalised communities through poverty reduction and stimulating socio-economic growth (Isaacs 2012; Béné et al. 2015). The sector supports the livelihoods of more than 12 million people in Africa of which more than a quota are female and are often considered to be among the poorest and most marginalised group on the continent (Béné et al. 2010; De Graaf & Garibaldi 2014).

Poverty is one of the most serious problems facing Zimbabwe with a stumbling 50% of the country's population living with the reality or the threat of chronic poverty, and 30% living in abject poverty (Chisango 2017). Poverty in the country has continued to be a social and economic menace. According to Chan et al. (2019), although it is not the only dimension, fisheries have been used as a livelihood strategy to mitigate poverty. Fishing and related activities can contribute to livelihoods, nutrition, and poverty reduction. Fishing can contribute directly to food security or indirectly as a means of revenue generated from processing and trading activities, thus

ameliorating poverty (Food and Agriculture Organisation 2005). Kupaza et al. (2015) argue that SSF have contributed to poverty eradication, food security and incomes in Southern Africa.

However, as explained by Béné et al.(2015: 5), "poverty reduction is recognised as not being about aggregate production of fish in particular, but is focused on the distributional aspects of benefits, recognising differentiated access and entitlement to fish resources, even within households". It is now well agreed in various disciplines that people's livelihoods depend on access and utilisation of natural resources (Dobson 1999; Twyman & Slater 2005). Accordingly, probing access to natural resources has been used primarily to assess poverty-reduction strategies and to demonstrate how access is linked to sustainable livelihood practices and outcomes (Chambers & Conway 1992; Scoones 2009). However, at the centre of access to key resources such as fish resources by small-scale fisheries, has been the interplay amongst various stakeholders and the governance arrangements which have informed decisions and implications on access.

Norton as a study site comprises of two lakes, namely, Lake Chivero and Lake Manyame. Fisheries in both lakes are centrally hierarchical managed, controlled by a state-level governing body, the Parks and Wildlife Management Authority under the Parks and Wildlife Act (Muchadenyika 2015). As noted by Bavinck et al. (2013), with centrally hierarchical managed fisheries, the state determines the rules of access, appropriation, and allocation of resources. Fishers have little influence in defining the rules of management or being included in decision making. What complicates governance at these two fish sources (Lakes Manyame and Chivero), is the influence of party politics and the power of politicians that comes with it. In Zimbabwe, access and use of natural resources such as land and fisheries, is often used as a political tool (Alexander & Chitofiri 2010; Muchadenyika 2015), and as such has serious economic and livelihood implications. Apart from being used as a political tool, access to natural resources such as water and land has always been crucial in the history of Zimbabwe dating back to the colonial period. One of the main reasons for the liberation struggle was land repossession (Alexander & Chitofiri 2010). Emphasis should, therefore, be put on access and control over resources, interactions of production, policy, and decision- making power as they relate to local livelihoods. This study endeavours to analyse the multi-layered governance structures that regulate access to fish resources at lakes and the impact on livelihoods patterns in the Norton community.

1.3 PROBLEM STATEMENT

There is no invariably accepted definition of small-scale fisheries. Most countries use common features like gear type, engine power or boat size, for the purpose of regulations. This study however, utilised Food and Agriculture Organisation (2015: 9)'s description of small-scale fisheries as; "artisanal, low capital, low technology fishing practices undertaken by individual households... firmly rooted in local communities, values and traditions". The SSF sector in Zimbabwe has been marred by mis governance and the existence of a poor, fragmented regulation framework that has effected in limited access for several fishing communities, which consequently has threatened livelihoods (Mawere et al. 2014; Chisango 2017). More worryingly, SSF is not a formally recognised sector in Zimbabwe and has very limited governance arrangements in place. Management of fisheries in the dams/lakes such as Chivero and within the Parks jurisdiction is centralised (hierarchical) and controlled by the National Parks and Wildlife Management Authority (ZimParks). Access to fishery resources is also regulated by ZimParks (Chisango 2017; Nyikahadzoi et al. 2017). This centralised, non-participatory fisheries resource governance regime has had a stranglehold on fishing activities in lakes Manyame and Chivero consequently affecting livelihoods in the community of Norton (Mawere et al. 2014). Moreover, access to resources in Zimbabwe, including fisheries, has been used by the incumbent party to manipulate and politically control communities to gain political loyalty. In this terrain, local level political structures have come to be very informal but powerful networks of patronage through which fisheries resources are partitioned as stipends to political clients during election seasons (Alexander & Chitofiri 2010). As a result of these intervening power dynamics, the economic potential of such water bodies as Lake Chivero and Lake Manyame has not been fully utilised, thus denying the Norton community of possible economic and social benefits. The study seeks to unravel the problem of access to resources in the fisheries value chain at lakes and suggest a more holistic governance approach that will help inform on how policy can be used more effectively to improve livelihoods of small-scale fisherfolk communities in Norton and Zimbabwe.

1.4 RESEARCH QUESTIONS

This study sought to develop a conceptual framework for the analysis of governance arrangements (formal and informal) as well as its associated power dynamics and how these shaped small-scale fisher livelihoods in Zimbabwe by using the area/ site of Norton as a case study. This aim was achieved through the examination of the following key overarching research questions:

1. Who are the actors involved in small-scale fishing in Norton?

- 2. What are the current governance arrangements within the small-scale fisheries sector in Norton?
- 3. What are the existing formal or informal institutional arrangements (values, norms, rights, laws, etc.) that govern small-scale fisheries in Norton?
- 4. What are the contestations, agreements, and achievements in the small-scale fishing industry in Norton and its impact on livelihoods and governance of resources?
- 5. How can a conceptual framework for analysing governance in small-scale fisheries in Zimbabwe be developed?

1.5 SIGNIFICANCE OF THE STUDY

Fisheries governance and development have advanced from concentrating on biological approaches, to the conservation of resources, to a more people specific approach that recognises the importance of fisheries in livelihoods, poverty reduction and sites of expression of cultural values and identities for communities which survive on fisheries (Food and Agriculture Organisation 2017). This evolution is of particular importance in SSF, and Norton SSF is not an exception. Through interrogating the governance arrangements and the livelihoods challenges faced by the Norton fishing community, this study contributed to knowledge frameworks in both governance of SSF and the comprehensive discipline of fisheries governance.

The study also added to ongoing debates on fisheries governance under the three existing modes of governance which are hierarchical, self-governance and co-governance (Hara et al. 2015; Bednar & Henstra 2018). This contribution was done by developing a conceptual framework for understanding governance arrangements and their implications to livelihoods of SSF in Norton. Although the framework was designed for Norton small-scale fisheries, it might have broader applicability for small-scale fisheries with similar circumstances in Zimbabwe and globally. Interactive governance framework was used as a reference point to develop the framework since it is widely used in capture fisheries and aquaculture. However, the interactive governance framework was updated in this study because it was developed for countries in the global North and therefore not all features of it were applicable to the global South context.

The study also aligns with some of the United Nations' Sustainable Development Goals (SDG). The study has linkages with Goal 1, which focusses on ending poverty; Goal 2, which strives at ending hunger; Goal 10, which pursues on reducing inequalities, and most specifically goal 14, which reiterates on marine protected areas and how they need to be effectively managed and well

resourced (Food and Agriculture Organisation 2017). Regulations also need to be instituted to reduce marine pollution and overfishing. Therefore, Goal 14 is crucial in this instance because it talks about careful management of SSF.

This research is also crucial in contributing to SSF policy in Norton and Zimbabwe at large. The current fisheries policy in Zimbabwe is centralised (hierarchical), and non-participatory. This research however, advocates for a shift from this command and control approach to a participatory co-management system of governance. This policy (partnership-based governance) will be guided by SSF Guidelines of 2014, which emphasised the governing role of SSF and communities. The guidelines were drafted by Food and Agriculture Organisation (FAO) and was developed as a supplement to the 1995 FAO Code of Conduct for Responsible Fisheries (Singleton et al. 2017). The guidelines also encourage participation and consultation as one of their key principles (Food and Agriculture Organisation 2017; Chuenpagdee & Jentoft 2018). It is worth noting that cogovernance / co-management is the preferred governing mode of most SSF in that it introduces many of the principles of the SSF Guidelines, which expresses stakeholder participation and empowerment (Chuenpagdee & Jentoft 2018). However, despite using SSF guidelines as a blueprint for the recommended government policy suggested by this study, it should be emphasised that the system for the co-governance should not be 'one size fits all' (Food and Agriculture Organisation 2017; Chuenpagdee & Jentoft 2018). Instead, it needs to adjust and align to the Norton fishing community in particular and Zimbabwe in general.

Furthermore, the new theoretical perspectives in fisheries governance discourse such as interactive governance theory downplayed the role played by power dynamics in fisheries governance and management. As such this study intended to investigate, document, and analyse the little mentioning of power asymmetries in the study of SSF sector in Zimbabwe.

1.6 OUTLINE OF THE DISSERTATION

The study is organised into nine chapters. Chapter 1 has introduced the study and provided a background and context to governance of SSF and its impacts on the livelihoods of people in Norton, and Zimbabwe. It also outlines the statement of the problem, and describes the research questions, its significance, as well as the thesis outline. In Chapter 2 the study examines the literature available concerning governance issues in fisheries. It introduces the reader to understanding the global context of SSF and situating them to the global South context. It also

examines the different SSF governance approaches that have been adopted in most parts of the world.

Chapter 3 provides a detailed presentation and analyses of the main conceptual and theoretical underpinnings for analysing the interrelationships between and among governance and livelihoods of SSF. The chapter also presents the key concepts around which the study is built and how they are interpreted and used in the study. Chapter 4 historicise the governance of SSF from precolonial to post-colonial Zimbabwe highlighting the major changes and policies instituted by the government. It traces several policies introduced by the Zimbabwean government in its quest to transfer access rights from the privileged white minority group to the previously disadvantaged black people. In a bid to address the inequalities, the government intervened through socialist policies, black empowerment, redistribution through the market and the effects of the Economic Structural Adjustment Programme (ESAP), and radical transformation through Land reform. Implications of such policies on fisheries governance are also discussed.

The methods and methodology utilised for data collection and analysis, why the methods were chosen, their utility and shortcomings, and problems encountered were set out in Chapter 5. This is followed by a detailed description of study area and why the sites were selected. Chapter 6 profiles the different SSF Actors found in Norton, and details who they are, the activities they are involved in, how they fit in the fisheries system, their legal standing, the nature of their access to fisheries; and the implications these have on livelihoods and SSF governance. In Chapter 7, the study establishes the governance systems in place, and the challenges identified as impacting SSFs and resultant livelihoods. The chapter further interrogates the institutional arrangements in Norton's small-scale fisheries, the different conflicts arising from actor interactions, government relations with NGOs and international organisations, and the ultimate governance results thereof.

Chapter 8 serves to summarise the key issues that emerged in relation to the study's objectives and its guiding theoretical underpinnings. An updated conceptual framework for understanding governance is presented here, based on empirical research and the key concepts and theoretical ideas introduced in Chapter Three. The intention here is to expand on the key governance processes and mechanisms controlling fisheries access, as well as the livelihoods of locals. Finally, Chapter 9 as a concluding chapter summarises key aspects of the aforementioned chapters and the outcomes of the study. The next chapter reviews the available literature concerning governance issues in SSF.

CHAPTER 2: OVERVIEW OF SMALL-SCALE FISHERIES GOVERNANCE: PERSPECTIVES AND IMPLICATIONS ON LIVELIHOODS – LITERATURE REVIEW

2.1 INTRODUCTION

Governance issues in natural resources are inextricably linked to the broader livelihood issues in every society. In SSF, the challenge is to establish how power dynamics and governance arrangements (both formal and informal) shape livelihood patterns in the SSF sector. This chapter introduces the SSF and how they are viewed and defined in different hemispheres by scholars who subscribed to the global North notions of SSF on the one hand, and scholars who situate SSF from a decolonial Southern perspective on the other. The main argument of the chapter is to demonstrate that despite being regarded in other literature sources as lacking innovation, SSF in Africa and Southern Africa in particular, are innovative and are capable of managing resources using indigenous knowledge systems and cultural rights. Therefore, post-independence African countries should not side-line SSF representatives in governance related matters and policy formulations. The chapter also examines the different SSF governance approaches that have been adopted in different parts of the world. The aim is to draw the appropriate parameters for the study, set by existing evidence of what has been happening the world over. The chapter examines the literature available concerning governance issues in fisheries and is divided thematically according to the study's objectives, for a detailed exploration of governance arrangements as well as its associated power dynamics and how these shape small-scale fisher livelihoods.

2.2 SMALL-SCALE FISHERIES: DIFFERENT HISTORIES AND CONTEXTS

As already stated, there is no commonly accepted definition of SSF, though most countries use common features like gear type, engine power or boat size for the purpose of regulations (Jentoft 2014; Salmi 2015). According to the discourse on SSF the international gathering of small-scale fish workers and their supporters held in Rome 1984, articulated SSF in the following manner:

The small-scale fishery is labour and local-skill intensive; it is capital and fuel-saving (particularly with the option of multiple energy use). Its technology and mode of organisation and management are well mastered by local fishing communities and give rise to a decentralised settlement pattern. It does not promote large income disparities...The small-scale fishery, far from being a stagnant one, has amply demonstrated in the past that it is innovative and easily amenable to efficient

improvements. It is characterised by a high degree of flexibility (Chuenpagdee 2018: 310).

The interpretation of SSF provided by the quotation above values the importance and contribution of SSF in relation to political and socio-economic aspects. The description of SSF given above further highlights the crucial participation of the sector in governance issues, food security, and livelihoods in general. It is labour and local skill intensive which signifies the indigenous knowledge systems within small-scale fishers especially in the African countries. Therefore, SSF are dynamic, innovative and they can adopt to the specifics of tropical ecosystems. Their history of dynamism and innovation dates back to the pre-colonial period before they were subdued to colonial laws and policies which relegated these small-scale fishers to positions of non-entities and undermined their position in decision-making initiatives. SSF voices and concerns need to be integrated in policy making processes.

The same characteristics of the SSF quoted above were integrated into the adoption of the global Food and Agriculture Organisation (FAO) SSF guidelines. In these guidelines, SSF are described as "artisanal, characterised by low capital, low technology and fishing practices that are undertaken by individual households and not companies. They tend to be firmly rooted in local communities, values and traditions" (Food and Agriculture Organisation 2015: 9). Although FAO acknowledged the importance of local communities and traditions in understanding SSF of different countries and communities, many policies of African countries largely exclude these dynamic traditions and values when instituting policies for small-scale fishers. Some of the characteristics provided by FAO above were used as the guideline to define SSF for this study. This conceptualisation also followed Kumar's (2011) definition which subscribes to the notion that small-scale fishing includes own operators; fishers who use manually-operated fishing gear. In the same vein Food and Agriculture Organisation (2012: 6) also defines artisanal fishing and SSF as "fishing households, using relatively small amount of capital and energy, relatively small fishing vessels (if any), making short fishing trips, close to shore".

Thus, the most regular characteristics are households with a finite range of operation, low capital investment, and reliance on local resources. Besides, in relation to their distribution and numbers throughout the world, SSF demonstrate that they are not small. "Nearly 90% of the world's 120 million full-time or part-time fishers" are estimated to depend on SSF sector for their livelihoods (Kolding et al. 2014: 2; Chuenpagdee & Jentoft 2018; Belhabib et al. 2019). It is estimated to contribute to 70% of the total world catch which is used for domestic human consumption (Kolding et al. 2014). These figures, however, do not provide a true reflection of SSF as they are

largely excluded from official statistics. Therefore, they are most likely under-estimated. (Chuenpagdee 2018; Temesgen 2019). SSF are therefore an underrated, but important source of food security, employment, and income (Béné et al. 2010; Chuenpagdee & Jentoft 2018; Chan et al. 2019), particularly in the rural areas and developing world. This persuaded Jentoft & Chuenpagdee (2018) to maintain that with the global contribution of SSF to the cultural inheritance and livelihoods they are both too important to fail and too big to ignore.

The increase in population by 75 % and the number of global fishers by 178% between 1970 and 2005 demonstrate that SSF makes crucial contributions to food security and employment (Kolding et al. 2014). However, these developments are a cause for concern about destructive side effects as well as governance failures. These governance failures stemmed from weak centralised fisheries policies which failed to recognise the importance of SSF in terms of policy and decision making. These governance failures often lead to power dynamics and conflicts between government and fishers. But, "to a large extent these governance failures can be explained as the result of other developments in the coastal zone such as pollution" (Kolding et al. 2014: 3). In many countries such as China and other heavily industrialised countries, habitat destruction and pollution may have debilitating effects than fishing.

There are contestations on whether SSF are less systematic economically compared to large-scale fishing fleets. Scholars who are of the view that SSF are less efficient economically compared to large-scale fishing associate SSF with poverty traps, resource depletion, and unselective fishing methods (Kolding et al. 2014; Chuenpagdee & Jentoft 2018; Chuenpagdee 2018). SSF are continuously regarded as the least affluently managed on both socio-economic and ecological scores. However, some scholars like Béné et al. (2010), Kolding & van Zwieten (2011) highlight the comparative advantages of SSF from both a social and ecological standpoint. They argue that SSF yield more employment opportunities. The fact that SSF generally make use of passive gear is further considered energy efficient and reduces damage to the marine ecosystem (Kolding et al. 2014; Chuenpagdee 2018). Furthermore, SSF are considerably more affluent than large-scale fisheries as per fuel consumption, and landings¹ per tonne of fuel (Kolding et al. 2014; Sumaila & Le Billion 2019). More so, a crucial feature of SSF is its extraordinary adaptability and diversity to different resources, seasons, and environments. Their mannered potency and continuous

¹ Fish landings are defined as, "the catches of marine fish landed in foreign or domestics ports" (Organisation for Economic Cooperation and Development 2021: 11).

"dependency on adjacent fishing grounds is viewed as an incentive for proper management" (Kolding et al. 2014: 3).

Social scientists have come up with another dimension of SSF, which has an impetus on conservation. They stressed that the majority of SSF lead endangered lives and are open to misfortune (Béné & Friend 2011; Jentoft & Eide 2011; Allison et al. 2011). The origins of such exposures, however, are often found outside the discourse of fisheries, and are related to basic human needs such as health facilities, or need for political recognition (Kolding et al. 2014). Problems faced by small-scale fishers also stemmed from failed economies as a result of factors which included misgovernance. Most post-independence African governments have a tendency of having a 'blame colonialism' mentality for their misgovernance, kleptocracy, and corruption (Mamdani 2001; Nyikahadzoi et al. 2010). Politics and economy have a symbiotic relationship and as a result poor governance resulted in failed economies, which resultantly had a bearing on the livelihoods of the SSF. Poor performing economies for most global South countries have resulted in loss of jobs and loss of incomes for a large spectrum of poor communities which include SSF.

2.2.1 Legal pluralism

Fisheries academics have also habitually documented the numerous structures of self-governance in terms of Territorial Use Rights in Fisheries (TURFs), sea tenure or community management. Kolding et al. (2014: 5) prefer a perspective "of legal pluralism, which relates that the management efforts of SSF constitute informal legal frameworks that are often at conflict with modern fisheries law". Jentoft & Bavinck (2014) provide a scenario of legal pluralism in developing countries, often former colonies, where many fishing people live, where statutory law exists side by side with customary law. This process whereby distinct legal systems apply to a homogenous situation is referred to as legal pluralism. Many African countries were former French and British colonies, including Zimbabwe and Kenya, which were under British settler colony governments. The existence of legal pluralism often led to confusion and overlapping of laws and policies in some instances. This confusion had resulted in power dynamics and conflicts especially where traditional committees and leadership felt that their authority was undermined. Many global South countries have however, ignored the importance and contribution of statutory laws when drafting SSF policies.

The applicability of customary rights for governance of fisheries is challenged, with one cabal arguing that such law is inappropriate for reasons of restricted scientific validity, declining

authority and limited geographical scope, while the other emphasises its basis in local knowledge, legitimacy at the beach-level, and the adaptive character of fisher law (Jentoft & Bavinck 2014; Kolding et al. 2014). However, the importance of state law with regard to sustainability is always contested. Limited work has been done on the ramifications of conditions of legal pluralism for governance of fisheries, with some exceptions (Jentoft & Bavinck 2014). Relative studies on legal pluralism in West Africa and South Africa have been put forward by Jentoft & Bavinck (2014). The scholars have noted that these studies encapsulate and verify the reality of the various types while noting the existence of hybrid and shifting forms. Thus, while South Africa has a harsh history of legal conflict over coastal fishing, West African fisheries provide evidence of accommodation between state and fisher regulatory systems. However, with the acquiring of a new constitution in 1998, which recognises customary law in South Africa, the legal pattern also offers opportunities for straight forward partnership (Jentoft & Bavinck 2014).

The continuous side-lining of non-state legal actors in preference to joining hands with other business entities in as far as the governance of SSF is concerned has been criticised by various scholars (Jentoft & Bavinck 2014). These scholars argued that this has lessened governability as legislations and regulations have been introduced that do not fit well with prevailing ecological and social systems. In the same vein, Bavinck (2005) discusses the strained relationship between SSF and industrial fishers in global South in terms of incompatible sea tenure systems.

Moreover, in the area of research, SSF are continuously being overlooked at the expense of large-scale fisheries. Fishery science has transpired over the past century as a required response to increased industrialisation and fishing power. Indeed, only the large-scale fisheries were, and still are, important enough to afford specialised research and thorough monitoring measures (Kolding et al. 2014). Accordingly, fisheries research as an input to modern governance is mainly embedded in the paradigms and notions developed in large-scale fisheries from the global North countries, which are eventually applied to "SSF in so-called data-poor situations without considerations of their fundamental distinctions" (Pita et al. 2019: 155)

2.2.2 Small-scale fisheries under data-poor scenarios

Attempts have been made to reveal SSF under data-poor scenarios. This follows the 2015 conference on the International Council for the Exploration of the Sea (ICES). Key discussion issues of the conference were; (a) methodologies to improve socio-ecological knowledge under data-poor scenarios, and (b) issues around governance and management of SSF (Pita et al. 2019).

This information was meant to contribute to better understand the SSF harvest, its socio-economic contribution at the local and national levels, and its environmental and biological impacts.

Despite the efforts, several papers mainly concentrated on case-studies from the global North countries such as the United States of America (USA) and Canada, compared to the global South countries. For instance, the papers by Tallman et al. (2019) and Roux et al. (2018), emphasised on integrating fishers' traditional ecological knowledge (TEK) into fisheries management in remote data-limited locations (Canada's arctic), which remains challenging due to the absence of tools to combine scientific and TEK data. Furthermore, Chrysafi et al. (2017) use specialist opinions to improve knowledge about SSF stock status in the USA while Pita et al. (2018) merge different data sources (such as literature review, and interviews with fishers) to restore historical landings and analyse socio-ecological changes in data-poor shellfisheries in Galicia, Spain.

Little has been mentioned about governance and management of SSF in poor data limited locations, covering issues such as the involvement of fishers in the decision-making process and management of SSF. Government related issues also covers matters to do with the implications of conservation measures such as Marine Protected Areas (MPAs) on the small-scale fishing activity (Pita et al. 2019). Jimenez & Saavedra-Diaz (2019) evaluated the compliance and enforcement with formal (statutes) and informal rules by small-scale fishers in two coastal communities along the Pacific coasts of Colombia and the Caribbean. No reference was made to any African country at this conference. This shows that research in the global South is often marginalised or underrepresented in research and innovation. SSF in the global South are increasingly overlooked in research and their contribution in food security, incomes and livelihoods is undermined. Thus, researchers in global South countries need to be vigilant and have a larger role to play in revealing and researching the data for small-scale fisheries who are in remote data poor situations. The voices of these neglected small-scale fisher communities in remote data poor locations need to be heard and their concerns also need to be addressed. Therefore, the role of global South researchers is to understand the perceptions of the fisherfolk communities by conducting research. Results of the research need to be published and presented at international conferences for visibility. Researchers should also understand that small-scale fishers are not a homogenous group. Various factors such as geographical locations, governance and socio-economic situation affect or have implications on how these communities operate and exist in different contexts. As such, the applicability of some methodologies employed in the global North in understanding SSF might not be applicable to the global South.

Information on SSF and their catch is not easily available and this data constraint leads to SSF being often neglected (Chuenpagdee & Jentoft 2018; Chuenpagdee 2018; Pita et al. 2019). However, the recognition of SSF is heightening and the sector is increasingly a preference for FAO, which considers that among the different fisheries subsectors SSF and aquaculture require the most urgent action. The SSF guidelines inaugurated in 2015 and endorsed by FAO call for States to institute systems of collecting fisheries data, including economic, cultural, and social data which improves our understanding of SSF (Pita et al. 2019).

Collecting reliable SSF data is however challenging due to the large proportion of SSF vessels catching a large number of diverse species, using a multitude of gears, and often covering large inaccessible areas where monitoring and compliance are difficult to achieve (Chuenpagdee & Jentoft 2018; Pita et al. 2019).

2.2.3 Small-scale fisheries governance

According to Jentoft & Chuenpagdee (2018), SSF in the global North face similar challenges and marginalisation as their counterparts in the global South. However, they may be dissimilar in characteristics and operations. Furthermore, different governance arrangements may also determine the operations of these SSF in the different parts of the world. This can be attributed to the fact that many Southern African countries like Zimbabwe are still running centralised system of governance whilst global North countries in Europe and America have adopted the decentralised system of governance. On the same note, Chuenpagdee & Jentoft (2018) maintain that in most of the 34 case studies included in their volume in countries such as Colombia, and Netherlands, the centralised governance mode still dominates. Nevertheless, "several countries, including Canada, the USA and Cyprus, are making changes in both first and second-order governance² through preparing their institutions either for assuming a hybrid system (that is a mixture between co-governance and hierarchical) or for completely adopting the co-governance mode" (Chuenpagdee & Jentoft 2018: 104).

SSF proliferate in the riverine, marine, or lacustrine³ ecosystems of many developing and developed countries with different fishery traditions (Smith & Basurto 2019). They can be found

² "First order governance takes place wherever people and their organisations interact to solve problems and create new opportunities. Second order governance focuses on the institutional arrangements within which first-order governing takes place" (Kooiman et al. 2005: 20).

³ Lacustrine refers to any pond or lake (Smith & Basurto 2019).

in the Amazonian floodplain of Brazil, the inshore sea of Atlantic Canada, the rivers of China, and the lakes of the eastern African countries, to name a few (Chuenpagdee 2018; Smith & Basurto 2019). Every SSF which exists today has evolved in space and time from socio-economic, ecological and cultural contexts, that are marked by diversity, rather than homogeneity. According to Chuenpagdee & Jentoft (2018), initially, fisheries in both the developing and developed countries were small-scale, highly labour intensive and survived on the indigenous knowledge systems of the fisherfolk.

Fisheries development did not merely involve a change of artefacts, "(from the canoe to the trawler), market expansion (local consumption to export orientation) and physical processes (curing and drying to freezing)" (Chuenpagdee 2018: 307). Instead, it resulted in a process of transformation and incorporation, which brought changes in the economic, social, and cultural structures of small-scale fishing communities (Salmi 2015; Chuenpagdee 2018). Ownership control was relinquished, in some cases, from the local level to large companies. For instance, Lake Harvest transnational company was authorised by the Zimbabwean government to run one of the largest tilapia aquaculture projects at Lake Kariba. This, of course, thwarted the efforts of the local SSF communities who had customary access rights. The communities became more politically and economically marginalised, with limited contribution in governance of resources (Nyikahadzoi & Raakjaer 2009; Nyikahadzoi et al. 2017). Lack of access to fish resources by these communities further resulted in loss of employment, incomes, and compromised livelihoods in general.

Small-scale fishing is not immune to tension, external conflicts, and inequality. Other governability concerns have also been raised about SSF. For instance, because of the open-access nature of their activities and their large number, they are often associated with the "Tragedy of the Commons" paradigm by Hardin (1968) which argued that, "resources held in common will inevitably be overused. Numerous studies have also shown that not all common property regimes caused resource degradation" (Haller & Merten 2008: 699). Further, devastating practices of fishing such as use of cyanide and bomb blasting continue in some SSF despite the effort to eradicate them (Chuenpadgee & Jentoft 2018; Pita et al. 2019).

Many SSF also fall into the classification of "illegal, unregulated, and underreported (IUU) fisheries", partly because of scarcity of appropriate recording and monitoring systems (Chuenpadgee 2018; Chuenpadgee & Jentoft 2018). The FAO statistics on which most of the assessments of fisheries resources at world-wide level are based are not a clear indication for the vast majority of SSF. "The only 'assessment' metric regularly reported in the SSF literature is the

common declaration of 'decrease in mean sizes' or 'declining catches'" (Kolding et al. 2014: 10). Unfortunately, such measures are not solely associated with overfishing. In most scenarios, they may only indicate the natural effect of fishing (Kolding et al. 2014). Furthermore, such indicators, like any other model for conserving and regulating fisheries, were developed in the global North countries and controlled by international organisations like Worldfish (Kolding et al. 2014; Chuenpagdee 2018). The question, however, rests on whether the same principles can be uncritically used to SSF in developing countries where endangered livelihoods are at stake.

It is important for this study to determine who the actors are, what determines who the actors will be, and how they can be classified, as this has far-reaching consequences on determining whose livelihoods will be in question. The interaction of the established role players will also be important as they have a bearing on governance and how such governance affects the different categories of role players.

2.3 ACTORS INVOLVED IN SMALL- SCALE FISHING

The composition of actors in the small-scale fishing industry has generally brought consensus amongst scholars with the players varying slightly with the area or fishery in question. Companies, co-operatives, governments, fishermen, Non-Governmental Organisations (NGOs), lobby groups, service providers involved directly and indirectly in fishing, have all been identified as actors in SSF. The composition of the actors in any particular place has in-turn shaped the different interactions, power-dynamics, and governance arrangements. The actors involved have themselves been influenced by different factors including accessibility, size of fishery, laws and regulations put in place to manage natural resources, historical and cultural factors, and the level of global influence experienced at a particular fishery.

Monaco & Soltanpour (2017) identified participants in terms of the level of involvement as either direct or indirect. Direct participants include fishermen who carry out the day-to-day fishing activities; fish processors; consumers; the government through policymakers and its security (such as the parks and wildlife officials, and the police); and traditional institutions such as chiefs (Monaco & Soltanpour 2017). Indirect participants include those who provide services to the direct participants, especially those found at the fisheries location. These service providers include boat repairers; food and accommodation providers; lobby groups that fight for the right of fishermen, and those who advocate for environmental conservation; competing users of land, and water (Monaco & Soltanpour 2017). This is a more comprehensive distinction of actors as it is much broader and more inclusive than that given by Jacinto (2004).

2.3.1 Legal and illegal actors in small-scale fisheries

As noted by Jacinto (2004) the role players in any small-scale fishery are determined largely by institutional and legal factors centred on the persistence of *de facto* open access to fisheries. Although these resources are *de jure* state property, weak implementation of existing policies and laws has led to a multiplicity of players, some legal, others illegal, but influential, nonetheless. There are, therefore 'legal' actors – those that are permitted and recognised by existing governing laws controlling fisheries – and those that are 'illegal' – meaning those who may not necessarily be permitted to take any role in fishery activities, but do so, nonetheless. Jacinto (2004) therefore brings an interesting dimension to the actors in SSF, where participants can either be 'legal' or 'illegal' depending on the existing laws and regulations. In cases of state-controlled fisheries, the legal participants would include the government and its agents, by virtue of being the controlling authority; registered companies; and lobby groups within the fishing industry (Jacinto 2004). The illegal actors would include unregistered fishermen and companies (also referred to as 'poachers'), most of whom are locals (Jacinto 2004; Kupaza et al. 2015). The access rights of the locals would be more traditional than legal. However, such classifications by Jacinto do not take into consideration actors in the SSF who might not necessarily be either 'legal' or 'illegal'.

2.3.2 Subsistence and commercially oriented small-scale fisheries

Another distinction can be made between subsistence-oriented and more commercially oriented SSF. As argued by O'Neil (2018), in most subsistence fishery activities fishing equipment such as boats might not be necessary, limiting the participants mostly to the fishermen, while in more commercial small-scale entities the participants tend to increase both in volume and variety. Frocklin et al. (2013) posit that whilst in subsistence activities individuals would be expected to carry out all duties associated with fishing on their own, more commercial activities would demand personnel in diverse tasks such as mending nets, keeping accounts, and preparing food for fishers. The levels of participant interactions in both cases are therefore also different; meaning the influence of the type of governance on the fisheries might also differ.

Fish buyers (also regarded as middlemen or intermediaries) are also crucial actors in SSF, and their significance is expected to expand in an era of globalisation characterised by trade, liberalisation and free market economy (Gonzalez-Mon et al. 2019). Fish buyers liaise between fishers and fish consumers in the fish supply chains. Previous research has indicated that through this mediating role, they can influence fisher's behaviour, which in turn has an impetus on the

management of fish stocks. Gonzalez-Mon et al. (2019) find this to be a reality in developing countries, where there is often inadequate formal governance which negatively affects the effective regulation of fisheries management.

Furthermore, non-state actors (NSA), including civil society organisations (CSO), companies, research organisations and consultancies, are increasingly acknowledged to matter for global governance of natural resources (Petersson et al. 2019). In the same vein, Guggisberg et al. (2019) maintain that 'Non-governmental actors' is a label which can be attached to a variety of groups, with the only requirement being that they do not fall within the organizational structure of a State. This category can encompass nongovernmental organisations (NGO), companies, or still looser networks and partnerships. The different categorisation of actors above has implications on the livelihoods of SSF as demonstrated in the next section.

2.4 IMPACT OF SMALL-SCALE FISHERIES ON LIVELIHOODS

The question of livelihoods in fisheries has attracted two main interpretations which have not necessarily contradicted but have been reliant on each other. Whilst most scholars opt for the narrow and traditional sense of livelihoods, expressed in thematic terms such as social, economic, source of food, and employment (Neiland et al. 2000; Sarch & Allison 2001; Wedathanthrige et al. 2013; Yuerlita 2013; Temesgen et al. 2019), a different and more complex dimension has also been adopted where the contributions of SSF are often interdependent and interlinked, and some of their main contributions lie at the configuration between these themes rather than within each other (Béné 2006; Béné et al. 2009; Béné & Friend 2011; Béné et al. 2015; Stanford et al. 2017). In challenging the traditional view of livelihoods, Béné (2006: 13) argues that the capacity of activity to eradicate poverty from people, "is not simply correlated to the absolute number of people depending upon this activity to sustain their livelihoods". A more comprehensive understanding therefore is required, based on the following appreciation of combined components thus: social roles of SSF; economic roles of SSF; cultural roles of SSF; environmental roles of SSF; food security roles of SSF; poverty reduction roles of SSF; interactions between SSF and other rural activities (Béné 2006; Béné et al. 2009; Béné & Friend 2011; Chan et al. 2019).

Such a broader and comprehensive measurement of the role of SSF in livelihoods gives the study a deeper understanding of the very nature of SSF and their diverse influence on participants. However, these components are not necessarily independent as they are dependent and interlinked. This study will appreciate such, and will follow in the footsteps of Béné (2006: 14) who argues

that, "the overall contribution of SSF is more than simply the sum of its social, economic, cultural, food security, environmental, and poverty reduction contributions".

SSF have undoubtedly had an influence on livelihoods, with literature revealing controversy regarding whether this influence is negative or positive. Most scholars agree that for developing countries, SSF enhance and promote livelihoods whilst in developed countries the contribution of SSF to livelihoods has been marginal (Neiland et al. 2000; Sarch & Allison 2001; Wedathanthrige et al. 2013; Yuerlita 2013). Chuenpagdee (2018) however, challenged this view by arguing that the attention on food security and poverty reduction may be portrayed to mean that the Sustainable-Small-Scale Fisheries Guidelines (SSF Guidelines) focus on developing countries only. But as argued by Jentoft, quoted in Chuenpagdee (2018), the "SSF Guidelines are relevant for SSF in the global North in the same way that SSF are important to many developing countries. A fundamental question is on how to make use of the SSF Guidelines in enabling the sustainability of SSF in countries in the global South" (Chuenpagdee 2018: 308).

2.4.1 Small-scale fisheries guidelines

"The Voluntary Guidelines for Securing Sustainable Small-Scale Fisheries (SSF Guidelines) was adopted in 2014" (Chuenpagdee 2018: 306). It is the first worldwide instrument that is designed "by" and "for" SSF. The SSF Guidelines "was a bottom-up consultative process, which was led by networks such as the International Collective in Support of Fish workers and the World Forum of Fish Harvesters and Fish Workers (WFF)" (Chuenpagdee 2018: 306).

Developed as a supplement to the 1995 FAO Code of Conduct for Responsible Fisheries, the SSF-Guidelines proposes a human rights-based approach (Singleton et al. 2017; Chuenpagdee 2018). This entails that it emphasises the importance for SSF to have secure tenure rights of the fishery resources that sustain their cultural rights and their livelihoods (FAO 2015; Chuenpagdee 2018; Smith & Basurto 2019). Giving small-scale fishers exclusive rights over fishery resources can allow them to side-line other users from accessing these resources, conferring the benefits of the fishery purely to their communities (FAO 2015). This security may be especially crucial for SSF, which are always at risk of being superseded by large scale fisheries, which are more powerful in political and economic arenas (Antonova 2016; Smith & Basurto 2019).

Paramount to a discussion of rights is the question of allocation of these rights, either to individuals or entities. When considering the issuance of rights to entities or individuals within a fishery, rights may be allocated collectively or individually, they may be allocated in the form of a restricted

entry system (such as fishing permits), Individual Transferrable Quotas (ITQs), area access including Territorial Use Rights for Fishing (TURFs), harvest quotas including Individual Quotas (IQ), or another means of granting access to fishery resources (Hosch et al. 2011; Smith & Basurto 2019). However, because of the often-complex nature of SSF, including their political, social, and economic importance, the allocation of fishing rights is likely to be equally cumbersome in such a context (Smith & Basurto 2019).

Some of the problems facing the execution of the SSF Guidelines emanate from the tendency for governments to prioritise large-scale fishing industries, at the expense of SSF sector. The concentration on large scale fishing is attributed to a number of reasons which include its overall contribution to the GDP of various countries, as established industries. This prioritisation on large scale fishing industries contributed to unequal power relations (conflicts) with SSF (Antonova 2016).

Béné (2006) posits that in developing countries, SSF play extremely important welfare and economic functions at the local level in many rural areas. "Some potential positive results can be identified which confirm that coastal and inland SSF can play an important role with respect to key development issues such as food security, poverty reduction and pro-poor growth" (Béné et al. 2015: 7).

2.4.2 "I am poor, therefore I fish": Poverty in small-scale fisheries

Poverty in SSF cannot be measured through income, but must consider other forms of impoverishment such as education, authority, and health (Chuenpagdee 2018). Thus, "I fish, therefore I am poor gives a distinct depiction about fishing people and requires different policy interventions when compared to I am poor, therefore I fish" (Chuenpagdee 2018: 311). It is crucial for policymakers and other governing actors, to convey images about SSF from a group of deprived people needing support to recognising their capabilities, including organisational capacity, and potentials in contributing to sustainability, food security, and poverty reduction (Chuenpagdee & Jentoft 2018; Chuenpagdee 2018).

In the studies which were conducted in Senegal and Bangladesh, Béné (2006) mentions that through direct and indirect food security mechanisms, fisheries and related activities such as trade play an important role especially for the poorest households who depend on these activities. Other studies have also reached the same conclusion with notable examples being in East Africa and West Africa (Neiland et al. 2000; Sarch & Allison 2001).

For households with no access to land, or other factors such as access to financial capital, SSF, trade and processing play an extremely crucial role in augmenting alternative low per capita food production options and cash income (Neiland et al. 2000; Sarch & Allison 2001; Béné et al. 2010). Further, SSF institutions have been appreciated to indirectly impact positively upon rural development by strengthening local communities' gender and empowerment programs (Béné 2006; Béné et al. 2009; Béné & Friend 2011).

In the study of Singkarak Lake in Indonesia, Yuerlita (2013) observed that, in spite of declining catches and resources, fishing remains a key activity and livelihood among most households, although with some changes. Fishing households tend to diversify their fishing strategies, and their livelihood strategies while fishing practices remain quite homogenous among households. However, some studies have revealed a completely opposite effect of SSF. As noted by Yuerlita (2013) there is some research that has shown that fishing is the last choice of economic activities. Wedathanthrige et al. (2013) observed that the contribution of the SSF to livelihood in Sri Lanka has largely been negative as communities reliant on fishing have been vulnerable to socioeconomic ills. It is explained that income from fishing has generally declined due to competition from larger fisheries whilst small-scale fish stocks have been dwindling (Wedathanthrige et al. 2013). Moreover, escalating costs including rising fuel costs have further reduced the net profits from fishing (Wedathanthrige et al. 2013). All these factors have resulted in many SSF being caught within a poverty debt trap, leading to many seeking better livelihood alternatives (Wedathanthrige et al. 2013; Béné et al. 2015).

Such failure to sustain and enhance livelihoods tends to support the view that people who engage in small-scale fishery do so because they do not have any ability or access to pursue other livelihood options due to some limitations such as having no access to land, and lack of skills (Chowdhury et al. 2011). Chowdhury et al. (2011) argue that the participants in small-scale fishing would be poor because of their lack of access to alternative employment opportunities with a lucrative income. Nevertheless, Béné & Friend (2011: 137) make a counter-argument that "fishers are not poor because they are fishers, but they are unable to diversify their livelihood hence they are vulnerable to any stresses and shocks of their activities". What is apparent is that despite a few instances where SSF are said to negatively impact livelihoods, studies have largely pointed to a positive influence.

As a result of the established importance of SSF in livelihoods above, it is not surprising that the governance of these SSF is heavily influenced directly and indirectly by livelihood considerations.

In turn, the way SSF are governed has a strong bearing on livelihoods, creating a cause-effect cycle. The next section focusses on institutional arrangements in SSF.

2.5 INSTITUTIONAL ARRANGEMENTS IN SMALL-SCALE FISHERIES

Institutions mean different things to many people and its definition is sometimes related to the context in which it is used. North (1990: 3) defines institutions as, "the rules of the game in a society, or more formally, the humanly devised constraints that shape human interaction", which reduce uncertainty by providing a structure to everyday life". Cleaver (2012: 8) expands on this, defining them as "arrangements between people which are reproduced and regularised across time and space and which are subject to constant processes of evolution and change". From these definitions, it can be deduced that institutions can be hard to identify and understand and may change over time, or their influence and role may also change (Nunan et al. 2015).

Building on the seminal work of North (1990), and Ostrom (1990), "most scholars have provided in-depth examinations of the characteristics of the institutional frameworks necessary for sustainable resource use" (Haller & Merten 2008: 700). However, limited attention has been given to the historically based analysis of the socio-political processes which trigger institutional change and influence the vigorousness of institutions (Haller & Merten 2008). An exception is a work of Agrawal (2001) who stressed that in the investigation of the commons, ideology and power issues between communities need to be assessed in historical depth. Haller & Merten (2008: 700-701) maintain that, "indigenous institutions were in place for fisheries in pre-colonial Africa and before state rule, which reduced transaction costs for communal action by providing clear regulations for who can access the fisheries, under what conditions, when, and with what equipment".

Institutions for this study are social structures, whether in the form of human groupings, norms, values, laws, agreements, rights, procedures, organisations, beliefs, culture, or behaviours pronounced within the small-scale fishing communities (Kooiman et al. 2005; Kooiman et al. 2008). Cooperatives are an example of institutions in SSF. Development organisations saw cooperatives as an instrument for organising SSF development. The United Nations declared 2012 the National Year of Cooperatives (Bennett 2017). The FAO also held a workshop focussed precisely on reinforcing the role of organisations such as cooperatives in the implementation of sustainable SSF. The workshop summary emphasised that if fishing cooperatives are to play a contemporary role in governance and development, then there is a need to look deeper into the economic, political, social and cultural conditions in which the fisher's organisations operate (Bennet 2017; Bennett & Basurto 2018).

2.5.1 Cooperatives in small-scale fisheries

A cooperative is broadly defined as "an autonomous association of persons united voluntarily to meet their common economic, social, cultural needs and aspirations through a jointly-owned and democratically-controlled enterprise" (Bennet 2017: 97). Fishers around the world have used cooperatives as an organisational mechanism to provide themselves with a wide range of club goods. Several studies have been conducted worldwide to demonstrate the presence of cooperatives in SSF (Hardy et al. 2016; Bennet 2017; Bennet & Baturso 2018; Lozano et al. 2018). In Zimbabwe, several studies were conducted to acknowledge the presence of cooperatives in SSF, specifically in areas such as Kariba, Gache Gache, Lake Chivero and Norton (Alexander & Chitofiri 2010; Mawere et al. 2014; Kupaza et al. 2015; Nyikahadzoi et al. 2017). Many of the benefits that cooperatives generate are economic. For example, cooperatives may organise collective marketing activities such as auctions or selling in volume, and provide access to lowinterest loans and credit (Bennet 2017; Bennet & Baturso 2018). Benefits may also be political, such as accessing government programs that provide loans, and subsidies, obtaining legal rights to fish, and representing fishers in the policy process (Bennet 2017; Lindkvist et al. 2017; Bennet & Baturso 2018). Some cooperatives have even made important contributions to sustainability and resource governance. Jentoft (2017) also remains fascinated with the cooperative model. He expanded the analysis from Canada and Norway to other countries such as Mexico, and Costa Rica, based on existing literature (Chuenpagdee 2018).

It must be mentioned that cooperatives are not without challenges. Setbacks in cooperative setups include inadequate legislative support by the government, complex bureaucratic environments, and unfavourable tax systems. Furthermore, the government's failure to account for existing organisations and traditional modes of cooperation may impede the development of cooperatives (Bennet 2017; Lindkvist et al. 2017; Chuenpagdee 2018). More so, the cooperative model does not take a stronghold many SSF. This could be partly due to the growing recognition of global fish trade, which favours few large companies at the expense of SSF (Chuenpagdee 2018). Fishers' organisations, marketing cooperatives, and producers' associations for SSF are crucial actors at the community level but their control of fisheries products and fish that are traded in the world markets today is minimal (Bennet 2017; Chuenpagdee 2018). In some cases, small-scale fish cooperatives operate alongside private co-operations or by engaging in patron-client relationships with fish buyers (Bennet & Basurto 2018). Bennet (2017) acknowledged the presence of this set up in her studies of SSF communities from Yucatan, Mexico.

2.5.2 Institutional implications on governance arrangements

As observed by Nunan et al. (2015), institutions play an important role in ascertaining the nature of access people have to natural resources and in influencing decision-making concerning natural resource use in terms of who makes decisions and the nature of those decisions. Fisheries are no exception. Nunan et al. (2015) take note of the influence and role of socially embedded institutions, whether informal or formal, such as power relations, gender, and kinship, and how these institutions are used to gain and maintain access to the benefits from natural resources. As argued by Mawere et al. (2014), institutions determine whose voice matters in decision-making and what kinds of practices are recognised despite formal decisions and laws. Jacinto (2004) makes distinctions between institutions in small-scale fishing in terms of either their wealth or power and resultant level of influence and the nature of the pressure they can exert on the others, arguing that the influence of such power and its recognition is responsible for most of the friction which arises amongst participants in small-scale fishing.

Therefore, as argued by Nunan et al. (2015), understanding of governance arrangements in any fishery entails a need to understand and identify which institutions play a role in management and access of the said fisheries. It is argued that the institutions with control over how natural resources are used are not necessarily developed or designed with natural resource management in mind, but are instead closely associated with social life and interactions, kinship, with power relations, and gender norms (Nunan et al. 2015). Chambers & Kokorsch (2017) slightly differ with this observation and add a different dimension, arguing that institutions cannot only be viewed socially as fisheries are a complex mixture of political, social, biological, and economic aspects. An understanding of this complex phenomenon in SSF is of importance as the determination of who takes part, how they take part, when and with what effect, are controlled by this complex phenomenon.

As argued by some scholars, SSF often lack formal institutional capacity, which hinders effective governance (Chuenpagdee 2018; Apine et al. 2019; Lindkvist et al. 2020). Management is thus often left in the hands of indigenous users in the form of various governance approaches (for example co-management, and traditional). According to Alexander et al. (2018), the potency of these approaches inherently relies upon some level of social cohesion among resource users. This social cohesion contributes to the development of shared views, norms, and perceptions, all of which are crucial in bringing communities together to collaboratively manage SSF where institutional capacity is weak and formal authorities are absent (Alexander et al. 2018).

Scholars have observed and made varying conclusions on the effects the different institutions have had on SSF. One of the most common traits observed has been conflict arising in both formal and informal institutional arrangements. Such has been the case in Iceland (Chambers & Kokorsch 2017), Southeast Asia, especially the Philippines (Jacinto 2004), East and Southern Africa (Njaya et al. 2012; Nunan et al. 2015; Schultz 2017) and in Zimbabwe (Mawere et al. 2014). The conflict has taken many different shapes and has been rooted in several institutional interactions. For instance, Pourcq et al. (2015) posit that conflicts between parks administrations and indigenous communities are some of the most prevalent problems and have been extremely destructive.

In the Zimbabwean context, conflicts have been more noticeable where changes in the governance of fisheries have occurred. Mawere et al. (2014) note that the decentralisation of authority over resources in independent Zimbabwe has resulted in overlapping jurisdiction on resources between traditional institutions and new institutions, thus bringing to the fore concerns of 'voice, power and contestation' (Mawere et al. 2014). Overlapping of policies and jurisdictions have resulted in confusion to the fisherfolk who were used to own fishing rights as communities. The transfer of fishing rights from the communities to the government brought confusion and expenses on the part of the fisherfolk. For example, the fisherfolk communities were incurring expenses through payment of fish permits which deprived the communities of their source of livelihoods as many fishers could not afford to pay.

Nyikahadzoi & Raajaer (2014) note that at Lake Kariba the central problem has been the issuance of access rights within the kapenta fishing industry before and after Zimbabwe's political independence. There have been tensions between established companies, locals, and individuals who seek to gain control of such access rights. With the changing access rights, initially in favour of big companies and later redistributed to allow individuals and locals to access the fish, the effects on livelihoods have also changed. It was concluded that whilst local communities benefited from the income derived as employees of established companies before, their livelihoods were positively enhanced with the redistribution of access rights, allowing locals to be entrepreneurs in the fishing industry and reaping more direct benefits. As such, it will be interesting to explore later on whether the different institutions in Norton have the same effect.

As argued by Jacinto (2004), those who compete with fishermen for water resources, such as those who use water for tourism and recreational purposes, and those involved in irrigated agriculture, are a huge force. Nielsen et al. (2004) observed that fisheries are under strain from other uses of the freshwater and coastal environment such as irrigation and flooding control, aquaculture, and hydropower development, creating exclusions which have led to reduced access to resources and

increased conflicts within communities. Besides other water resource users, competition amongst different fishery interest groups has also been noted. Giving the example of fisheries in the Philippines, Jacinto (2004) explains how local fisheries are affected negatively by the formidable threat of the entry of foreign investors with the increase in tensions and fights over the few resources. The next section documented literature on power and conflicts within small-scale fisheries to show that they do not operate without challenges.

2.5.3 Power and conflicts in small-scale fisheries

Power dynamics have taken different forms and have manifested in different angles. The notion of power has been receiving heightening attention in governance literature (Haris et al. 2004; Svarstad et al. 2018) although it has been defined in different ways. Lukes (2005) for instance gives an extensive narrative of power that can be examined as various forms of restriction on human action while making action possible in a specified scope. As with other forms of governance, coastal management and fisheries rest ultimately on power; "power to enforce, decide, and implement management decisions. Power is in this perception a productive force. Without it, managers could fail to do their job" (Jentoft 2007: 426). But power can also be corruptive, and negative. It can be used to block management initiatives, creating injustice and inequity. Therefore, power in fisheries management involves risks as well as potentials, making it one of the key problems in institutional design (Jentoft 2007). Power, in this case relates to how sections of a society control resources (human, material, and financial) (Njaya et al. 2012).

The existence of unequal power relationships in SSF communities created what has been referred by Chambers & Kokorsch (2017) as "little kings" in Iceland fisheries. The term carries numerous meanings, ranging from derogatory to pride. In fisheries, a little king is an attitude represented through the inherently different interests in fisheries created by overlapping identities: boat size, species fished, gear used, and so on. According to Chambers & Kokorsch (2017), the discourse of "little kings" is an expression of the processes and social relations present in Icelandic fisheries governance, where conflicts between fishermen form little kings within communities, and where power dynamics in the national fisheries governance process form little kings.

Another classical example of power imbalance between the state and indigenous people in Nicaragua is demonstrated by Gonzalez (2018) who pointed out that conflicts erupted between Campesino settlers and indigenous people because of weakening of traditional authority. Furthermore, SSF faced governance challenges in terms of access to fisheries and tenure rights to waters and land which also resulted in conflicts between the state and SSF. Problems also

emanated from conflicts between hierarchical versus decentralised government modes (Gonzalez 2018). Similarly, Njaya et al. (2012) noted the conflicts which existed between traditional leaders and fishermen in Malawi, with regards to payment of tributes by the fishermen to the leaders. According to Njaya (2009), this 'elite capture' of the resources was causing tensions between user committees and the traditional leaders over authority to manage resource use.

In their study of Cambodia (Tonle Sap), Uganda (Lake Victoria), and Zambia (Lake Kariba), Ratner et al. (2018) noted that in spite of differences among the three regions in conflict intensities and conflict behaviours, there are many similarities. In all three ecoregions, most conflicts emanate from attempts to limit or control community access to fisheries resources: for example, through prohibitions, licensing on the use of certain fishing gears, and fishing in prescribed zones. When describing conflict causes, fishers in all the three mentioned lakes pointed to a "shrinking commons", due to overfishing (Ratner et al. 2018: 803). Fish catches were reported to be dwindling, pushing fishers toward illegal fishing and theft. Conflicts between large-scale and SSF were also common (Cochrane & Cundill 2018; Ratner et al. 2018).

Nunan et al. (2015) observe in their study of East and Southern Africa that institutions and interpersonal relations are important within the inland fisheries for accessing employment and incomes, and are pervaded with power dynamics. In Southeast Asia tensions have also arisen over community property rights where the government is not directly involved in fishery resource governance, affecting access to fishery resources and consequently livelihoods (Jacinto 2004).

Institutions have also been crucial in determining what goals are pursued by fisheries management. Jacinto (2004) observed that in Southeast Asia, the power to determine and set goals lies in the social institutional arrangements. This, however, has not been the case in some countries, especially in Europe. For instance, Chambers & Kokorsch (2017) concluded that in Iceland, fisheries management has given economic and biological goals' priority over social goals, and there is no formal representation of a social science advisory body or input from all relevant stakeholders in the fisheries governance process. However, there has been an acceptance that knowledge of social dynamics can add crucial information and considerations that in turn make fisheries more sustainable in the foreseeable future (Chambers & Kokorsch 2017). As argued by Nielsen et al (2004), such can be the only way in which the problems of conflicts concerning access to resources can be resolved and meet almost any reasonable set of objectives, including preventing stock depletion, increasing profitability, and resolving user-group conflicts.

Mawere et al. (2014) in their study of Gache Gache fisheries in Kariba, Zimbabwe, emphasise the importance of traditional norms and values in the management of natural resources including fisheries. They observed that traditional norms and values promote the functional involvement of the whole community in resource management and made everyone feel secure as both managers and owners of the resources in their communities. They concluded that in the Gache Gache area, this increased compliance to rules and regulations by stakeholders including the fishermen, and the sustainability of fishing resources, impacted positively on their livelihoods.

2.5.4 Conflict resolution in small-scale fisheries

Conflict is not really a bad thing as it can also lead to productive change. Coser (1956) pointed out that conflict is a form of interaction. By initiating interactions, conflict can have a positive contribution, as it forces people to clarify for themselves and others what their real values and interests are, what is negotiable or not, and what they are for and against (Jentoft 2017). Thus, conflict may be a step towards a positive solution and may present as an opportunity for people to get a better understanding of the relevance and meaning of social justice (Gaus 2016). It is also a learning curve, an experience of personal and institutional growth, which can lead to more constructive social relationships that foster collaborative and cooperative action. Indeed, Hirschman (1994), quoted in Jentoft (2017), maintained that social conflicts are the pillars of a democratic society.

Conflict resolution strategies in SSF therefore sees strategies such as multi-stakeholder dialogues and agreements as a means to mitigate the problems of conflicts. Research has indicated that natural resources have great potential to build peace, foster cooperation, and transform or prevent conflicts. Sustainable and just management of natural resources can prevent conflict, for example, by building resilient livelihoods, and reducing grievances (Cochrane & Cundill 2018; Ratner et al. 2018). A multi-stakeholder dialogue research project was conducted for three ecoregions in Cambodia, Lake Kariba, Zambia, and Uganda. The project titled The Strengthening Aquatic Resource Governance (STARGO) supported institutional innovations aiming to build resilient livelihoods among poor, rural producers who depend on freshwater and wetland resources (Cochrane & Cundill 2018; Ratner et al. 2018). These ecoregions are characterised by chronic poverty, high dependence on aquatic resources for food security and livelihoods, and the marginalisation of locals in decision-making (Ratner et al. 2018).

Jentoft (2017) concurred with Ratner et al. (2018) that there is a need for institutional transformation that allows conflict resolution and knowledge incorporation to be more synergistic

and interactive. He suggested equal participation for all stakeholders, with a particular focus on SSF as a marginalised group. He proposed for Blue Growth⁴ and maritime spatial planning (MSP)⁵ to empower SSF globally. This MSP would need institutional innovation that allows the governance to be interactive in ways that, while addressing conflict, also facilitate transparency and nurture shared responsibility among stakeholders (Jentoft 2017).

However, there are simply too many interests, and concerns involved to expect that Blue Growth will be a win-win-win, even if institutions are designed to be comprehensive of stakeholders' interests and knowledge. What position SSF will be in when MSP is introduced is a concern considering that most of these initiatives are designed for fisheries in the global North, which most of them operate in different contexts and setups with global South SSF. Considering this, their applicability might be questionable. Solving such conflicts needs also to consider the diversity of the various fisherfolk communities. Some communities value the contribution of traditional leadership in solving their disputes in situations where centralised fish policies have eroded the power of traditional leadership. Within such conflict resolution, which involves traditional leadership, social relationships and kinships are highly valued. Therefore, it is crucial not to regard all small-scale fishers as a homogenous group in issues related to understanding their challenges or in solving their problems.

In a comparative study on the experiences of governance transformation in the pelagic fisheries between Zimbabwe and South Africa done by Nyikahadzoi et al. (2010), it has been observed that one has to take into consideration that there is a close link between land allocation and reallocation of property rights in Southern Africa. It is beyond doubt that state the government control of fisheries in Zimbabwe had been mostly influenced by the fast-track land reform (Nyikahadzoi et al. 2010). "In the case of South Africa, the state has been cautious not to introduce unmanageable policies on land reform that would create an example for other sectors such as fisheries, as was the case in Zimbabwe" (Nyikahadzoi et al. 2010: 674).

⁴ "The blue growth initiative is a strategic approach to improving the use of aquatic resources resulting in better economic, environmental, and social outcomes. The constant factor of the Blue Growth Initiative is its emphasis on stimulating sustainable development for fisheries and aquaculture communities" (Food and Agriculture Organisation 2018: 9).

⁵ Marine Spatial Planning (MSP) "a public process of analysing and allocating the spatial and temporal distribution of human activities in marine areas to achieve ecological, economic, and social objectives that are usually specified through a political process" (Food and Agriculture Organisation 2016: 5).

Given the varying institutional arrangements observed the world over, and the noted divergent effects of the interaction of such institutions within SSF, it is important to establish the institutional arrangements prevalent in Norton and establish how these have affected different issues in the said fishery. Institutional arrangements have implications on the governance of SSF as the following section demonstrates.

2.6 GOVERNANCE ARRANGEMENTS IN SMALL-SCALE FISHERIES

Fisheries governance is mainly oriented towards large scale fisheries in several countries of the world and this, in turn, undermines the sustainability of SSF (Chuenpagdee 2018). "Transformation in SSF governance is taking place in several places around the world making it possible for a better future" (Jentoft & Chuenpagdee 2018: 110).

There are diverse typologies of governance such as network governance, community, and market governance (Bednar & Henstra 2018). However, the dominant modes of governance in the fisheries discourse have proven to be hierarchical, self-governance, and co-governance. These three modes of governance formed part of the interactive governance framework. The various typologies of governance and the interactive governance framework will be explained in detail in the next theoretical framework in the third chapter of the dissertation.

The literature on fisheries reveals that there are varying arrangements on SSF governance. However, there are three prominent arrangements, and as explained by Kosamu (2015), institutions that manage SSF across the globe can be locally based, state-controlled or of a mixed, cross-scale nature. The involvement of central governments in the control of fisheries oscillate within the following: "(a) strong top-down regulation irrespective of fishing community wishes, (b) a co-management mode of negotiation with fishing communities, (c) a merely supportive role of the state, or absence from the fishing scene" (Kosamu 2015: 365). Selig et al. (2017: 545) identify three general classifications of fishery management tools: "output controls, input controls, and technical measures. Output controls are direct limits on the number of fish harvested while input controls limit the amount of fishing effort to control the number of fish caught". Technical measures are regulations on when and where fishers may fish and the size of fish they may catch (Selig et al. 2017). It is within these controls that contestations, agreements, and achievements in the small-scale Fishing Industries are set.

However, defining these achievements or 'success' in fisheries management can be problematic given divergent management objectives. The definition of success by Selig et al. (2017) focuses

on biological improvement and not measuring social and contextual factors. Yet, good governance, as maintained by Kolding et al. (2014) requires a knowledgeable perception of biological and socio-economic sub-systems and how they respond and react to different contexts. The lack of consistent reporting outside of biological variables is a known problem in evaluating fisheries management's 'success'. "Success can be context-specific and management tool-related. For example, a stringent catch limit that almost eliminates fishing activity might be viewed as 'successful' from a conservation perspective but may be considered by others to be economically or socially inadequate" (Selig et al. 2017: 546).

2.6.1 Decentralisation in small-scale fisheries

There has been a general shift in fishery governance in the world towards a more relaxed and decentralised approach, especially in Europe and Northern countries such as Canada and the USA. They followed the neo-liberal policies of the 1970s and 1980s which advocated for a shift in policies from state centralised fisheries governance systems to decentralisation initiatives (Weiss 2000; Symes 2006; Gupta et al. 2015; Bednar & Henstra 2018; Bresnihan 2019).

As observed by Chambers & Kokorsch (2017) the delegation, devolution, and decentralisation in the decision-making process to create greater stakeholder participation have been a growing trend in fisheries governance and management systems of all fish species, sizes, and cultures. Jacinto (2004) notes that in these cases communities and NGOs have increasingly adopted community-based approaches to fishery resource management defined as a process by which residents of a community are provided the opportunity and responsibility to manage their own resources; define their goals, needs, and make decisions affecting their welfare.

However, such change has not been very prominent in Southern countries. As Nielsen et al (2004) observed, in Southern Africa and Southeast Asia, fisheries management approaches are still largely based on centralised government intervention. It has also been noted that fisheries and aquatic resources management in Southeast Asia and Africa is still largely government-driven although experiences worldwide show that various forms of collaborations between industry, government, and fishers strengthen management and yield results (Njaya et al. 2012; Nunan et al. 2015; Fabinyi et al. 2015). The participation of fishing communities has been rather limited in all respects, and the management system is top-down (Neilsen et al. 2004; Kosamu 2015; and Chambers & Kokorsch 2017).

Njaya et al. 2012 posit that since the early 1990s, many African countries have been adopting decentralisation reforms in their fisheries sectors. These essentially involve the devolution of management duties to the resource users as part of governance reforms commonly termed comanagement in the fishery literature. Co-management is defined as "an arrangement where responsibility for resource management is shared between the government and user groups" (Nunan et al. 2015: 204). Co-management is therefore about the incorporative right to take part in making key decisions about where to fish, how to fish, when to fish, who has the "right" to fish, and the quantities of fish to be harvested (Kooiman et al. 2008; Jentoft & Bavinck 2014). As such, it is another form of governance focussing at addressing the difficult challenge of managing the fisheries resources.

Decentralisation policies advocated for self-governance, community-based governance, and active roles of non-state actors such as NGOs in the governance of fisheries, especially SSF. In support of the community-based management systems, the World Bank stated in 1992 that, "Governments need to recognise that smaller organisational units such as villages or pastoral associations are better equipped to manage their own resources than are large authorities, and maybe a more effective basis for rural development and rational resource management than institutions imposed from the outside" (Bresnihan 2019: 210). These neoliberal policies were adopted by some developing countries such as India, Brazil, and some countries in East Africa, to mention just but a few (Nunan et al. 2015; McGrath et al. 2015). In India for instance, informal councils (known as *ur panchayats* in Tamil) are known to comprehensively engage in self-governance by governing the fishing villages of the Coromandel Coast. These councils take charge of an amalgam of village affairs, including the management of fisheries and the resolution of disputes (Bavinck & Vivekanandan 2017).

It should be noted that the decentralisation management policies also advocated for interactive roles of state, private companies, civil societies, and NGOs in the management of SSF (Jentoft & Chuenpagdee 2009). Nunan et al. (2015) maintain that some East African countries (such as Tanzania, and Kenya - largely illustrating on research from Lake Victoria) and Malawi in Southern Africa, adopted the co-governance initiatives as part of interactive fisheries governance. Several fisheries co-management arrangements were initiated on some of the largest and most productive water bodies in Africa including Lake Malawi and Lake Kariba since the 1990s. However, Kolding et al. (2014) maintained that the limited success in creating efficient co-management institutions has resulted in a revived call for top-down government enforcement in some places such as Lake Victoria.

2.6.2 Co-management in small-scale fisheries

The process of design and implementation of co-management in developing countries is very often top-down, usually supported by donor funding. For instance, the introduction of co-management in Uganda, Tanzania, and Kenya by the departments of fisheries was supported by a number of internationally funded projects, starting with the Lake Victoria Environmental Management Project from the late 1990s (Nunan et al. 2015). This co-management in Malawi and East Africa has taken a top-down, formal approach, with an emphasis on supporting the formation of community-based structures known as Beach Management Units (BMUs). The Lake Victoria fisheries co-management guidelines define a BMU as "an organisation of fisherfolk at the beach (charterers, boat owners, boat crew, managers, fishmongers, fish processors, fishing equipment dealers, and local gear makers or repairers) within a fishing community" (Nunan et al. 2015: 205).

However, it should be noted that in most of the developing countries where these decentralisation policies such as co-management reforms have been introduced, several factors triggered the reforms, including pressure from the international donor community, and budgetary constraints from the governments (Njaya et al. 2012; Nunan et al. 2015; Selig et al. 2017). In some cases, local level traditional institutions governing resource use are not readily visible to the state officials. For Example, the Zimbabwean government took over control of SSF and delegated the management responsibilities to local authorities (Rural District Councils) and entry into the fishery was controlled (Nyikahadzoi & Raakjaer 2009; Nyikahadzoi et al. 2017).

Furthermore, despite some potential, community engagement in natural resource management has recently been denounced for the recurrence of issues such as "elite capture" (Béné & Neiland 2004; Njaya et al. 2012) whereby particular individuals or groups seize the reform to serve their own interests. This influenced some recent studies to stress the importance of power asymmetries and their arrangement among different local actors. In support of this, Davies & Ruddle (2012) criticised the weaknesses in the small-scale governance literature. Their critique is particularly centred on the concept of co-management and human rights approaches. These approaches do not recognise historical, cultural, and social characteristics and so cannot accommodate "power relationships, social class inequalities and exclusion, social class-based exploitation, vested interests, and wealth appropriation as factors that must be overcome to deal effectively with inequity, poverty, and powerless" (Davies & Ruddle 2012: 244). As such, adoption of comanagement initiatives needs to embrace culture and historical legacies of fisherfolk communities since many communities are bound by their culture and history. Failure to include that in such

policy initiatives is a recipe for disaster in terms of implementation as communities would likely shun the policies.

2.6.3 Effects of governance arrangements on livelihoods of small-scale fisheries

There has been controversy regarding the effects of the various governance arrangements on SSFs' livelihoods. The dominant view has been that the government dominated centralised governance arrangements have not been as effective as decentralised (more accommodating) arrangements in sustaining both the fisheries and the dependent livelihoods thereof (Frocklin et al. 2013; Neilsen 2004; Kosamu 2015; Chambers & Kokorsch 2017; Monaco & Soltanpour 2017; O'Neil 2018). Comparatively, fisheries in the global North countries where decentralised and inclusive governance arrangements have been made, livelihoods have better benefited than the SSF in the global South countries where centralised government-controlled governance arrangements are still intact (Neilsen 2004; Kosamu 2015). Such may point to the conclusion that the different governance arrangements adopted have had different levels of successes and challenges globally, regionally, and locally. Such, however, can be challenged as some studies have suggested that results are not as linear as the above observations may suggest. There have also been positive results on livelihoods and fisheries' sustainability even in centralised governance arrangements, leading to some form of controversy.

A study by Battista et al. (2018) challenges the conclusions that central and decentralised governance arrangements have pre-determined polarised results and brings to the fore different dimensions of understanding governance arrangements and how they could possibly affect livelihoods and small-scale fishery sustainability. The study concludes and emphasises that even within fisheries governed by the same system, differences in livelihood and conservation achievements could still be found due to deeper factors going beyond merely considering what system is adopted.

2.6.4 Implications of centralised governance arrangements on the livelihoods: A critical perspective.

In a comparative study of some fisheries in the USA and the EU where both fisheries are largely government-controlled through government agencies, Battista et al. (2018) argued that fisheries management in the USA, as regulated by the Magnuson-Stevens Fishery Conservation and Management Act (MSA), has been regarded as more successful at reaching its conservation goals than has fisheries management in the EU, as regulated by the Common Fisheries Policy (CFP),

because of five functional governance qualities which were fully realised under the MSA but were absent from the CFP system. The qualities which were identified included adequate regulatory authority, effective enforcement mechanisms, and conservation-oriented goals. These governance system gaps, along with uneven distributions of rights, were held accountable for the identified difference in conservation and livelihood outcomes. However, both fisheries management in the EU and the USA are controlled by the United Nations Convention on the Law of the Sea (UNCLOS), which according to Hollway & Koskinen (2016) are regularly employed as law-making tools. UNCLOS is an example of a multilateral agreement, which means it is an engagement of more than two countries.

Battista et al. (2018) explain that the differences in the effectiveness of the seemingly similar governance arrangements go deeper than mere central control because both management authorities are controlled by a central governing body, and they use regional councils to promote the use of indigenous knowledge in the expansion of management measures. The pair stimulate the involvement of various stakeholders in the policy making process, yet EU fisheries management has largely failed to meet its sustainability and conservation goals. It is apparent therefore that an examination of the governance arrangements for this study must dig deeper than the mere spelt out arrangements to considering the intricacies within the given arrangement, and asking questions such as: Is there adequate authority? (Whether it is centralised or decentralised); Are there effective enforcement mechanisms? Are there clear objectives and aims being targeted? And whether the directives of the governing authority are clear?

Regional and local studies have however reinforced the idea that centralised governance arrangements have had a comparatively less positive outcome on the livelihoods of SSF. Malasha (2008), using illustrations from Lake Kariba, noted that decentralised arrangements such as comanagement actually create better fish-marketing arrangements, thereby raising standards of living for the fisherfolk. Malasha (2008) further observes that co-management is instrumental in creating not only poverty reduction but also poverty prevention amongst SSF. With the establishment of co-management system in the Lake Kariba fishery, mobility dynamics and access rights changed, leading to more positive livelihoods as compared to arrangements before where the government had more centralised and concentrated control (Malasha 2008).

In the cases where centralised control is shared between two central powers, especially in transfrontier areas, centralised governance arrangements have been argued to negatively affect livelihoods. Nyikahadzoi et al. (2017) in the study of Lake Kariba fisheries observed that the governments of Zambia and Zimbabwe usurp local level management authorities and pursue

different policies, goals, and management approaches that have polarised the governance of Lake Kariba's small-scale gill net fishery resources. The study noted that whilst the Zimbabwe government pursued the objective of maintaining the optimal level of target species, Zambia emphasises social considerations such as employment (Nyikahadzoi et al. 2017). It should be noted that the arrangement between Zambia and Zimbabwe is an example of a bilateral fishery agreement.

The study concludes that the conflicts caused by the trans-boundary nature of the fisheries resources impact negatively on sustainable use and the livelihoods of those dependent upon the small-scale gillnet fishery. Menon et al. (2016) also acknowledged the presence of transboundary fishing conflicts between Sri Lankan artisanal fishers and Indian trawl fishers. The conflict intensified as a result of the fact that Indian fishers continuously undertake cross-border fishing at the expense of Sri Lankan artisanal fishers whose nets are beyond repair. Salman et al. (2018) concurred with Nyikahadzoi et al. (2017) and Menon et al. (2016) by arguing that fishing concessions by the governments deprived local communities of their livelihoods. This reveals the crucial task of the state in structuring the conflicts over natural resources. The argument made is that had there been more decentralised governance approaches used on both sides, involving the local stakeholders, there would have been a more receptive approach to fishery governance, appreciating the needs of the locals without negatively affecting their livelihoods.

Empirical evidence on two transboundary cases demonstrated that conflicts in SSF are complex and vary from place to place. This further illustrates that conflicts can be between two fishers or amongst many fishers of the same cooperative or same community. Furthermore, conflicts also existed between small-scale fishers and regulatory authorities within the same country. Conflicts are also of a transboundary nature, that is between two different countries. Causes of such conflicts also vary from case to case. Some of the common causes of conflicts as the literature revealed included tough legislations imposed on small-scale fishers, and different visions and policies in the cases of transboundary conflicts.

Some studies have concluded that even in areas under the governance of one central government, hierarchical governance arrangements have impacted negatively on livelihoods. Chisango (2017), in the study of Deka Drum Fishing Camps, in Zimbabwe, observed that the continued obligatory authority to manage all fisheries and aquaculture under ZimParks has negatively impacted on livelihoods. It is explained that local resource users were not recognised in the policy formulation, compromising the inclusion of the indigenous knowledge in the integrated management systems (Chisango 2017). Chisango (2017) concluded that such top-down, centralised systems, caused

conflicts between fishers and government departments. Such conflicts have led to fishing families resorting to wide-scale use of unregulated and illegal fishing practices.

Poaching as a process in many SSF in Africa is a result of the weak centralised fishery laws which are imposed by the governments to fisherfolk communities. The hierarchical formal laws imposed by the governments largely ignored the voice, concerns, histories, and customary rights of the affected fisherfolk communities. Many post-independence African states inherited the colonial administration fishing laws which largely neglected the indigenous fishing communities' customary laws and rights (Mamdani 2001; Mawere 2013). The colonial governments' tactic was to destroy the culture of the African communities first before they establish their colonial administrations. They were aware that culture is a symbol of unity in the communities. By destroying culture, it became easier for them to rule the disunited communities using a divide and rule tactic. This divide and rule tactic was also used in drafting laws which forbade African fishing communities from accessing their fishing lakes. Limited access to the lakes denied these communities access to fish as a source of food and livelihoods.

It should also be noted that most pre-colonial African communities were involved in barter trade. As such, the fishing communities could trade their fish with other agricultural communities for grain, or with blacksmiths for spears and arrows. Therefore, imposition of stringent fishing regulations to access the lakes was a strategy to force the fishing communities to provide labour force in the industries. Thus, post-independence, African states' first port of call after usurping power from the colonial administrations was to review such colonial fishing laws which deprived and dehumanised the fisherfolk communities of their identity, culture, and generational legacy (Chigwenya & Manatsa 2007; Makanyisa et al. 2012). They were supposed to draft policies which addressed the fisherfolk communities as subjects and not objects. Addressing them as subjects meant that they would engage the communities in a participatory process, and collaborate and partner with them in reviewing the fishery laws and policies. Considering that fishing is a source of food security, livelihoods, and generational legacy for many Zimbabwean and other African fisherfolk communities, attention to the small-scale fishing sector is needed as a matter of urgency (Mawere 2013; Nyikahadzoi et al. 2017). The above analysis reinforces the arguments that the inherited colonial centralised governance fishing laws have a greater disadvantage in promoting and sustaining livelihoods when compared to decentralised governance arrangements. Such fishing laws favoured the large-scale fishing firms at the expense of small-scale fishers. Most of the firms were owned by privileged white farmers.

Using the example of centralised SSF in Southeast Asia, Jacinto (2004) buttresses this idea and observes that centralised fisheries management and export regimes have ensued in a reduction of fish and fisheries products, undermining local food security and loss of foreign exchange, which has implications on the GDP of the said regimes.

2.6.5 The paradox of decentralised arrangements

Decentralised arrangements have also been said to be of a greater advantage, especially where they incorporate traditional institutions in the managing of local SSF. Bavink et al. (2015) argue that pre-modern organisations are relevant and adaptive to new challenges and provide important lessons for regionalisation in the modern era. They contribute local knowledge, solve conflicts, and assist in regulating fishing, all of which work positively for the promotion and sustainability of small-scale fishery livelihoods.

However, decentralised arrangements have also been argued to work against promoting SSFs' sustainability and livelihoods. Haller & Merten (2008), in their study of open fisheries in Zambia, noted that the main challenge in open-access fisheries, where there is an absence of effective state control, "is the paradox of a state that is both absent and present: present in actions that destroy local farming institutions but absent when it comes to the capacity to implement the laws that might safeguard the resources" (Haller & Merten 2008: 699). If the state failed to manage and control natural resources, and overlooks the capability of the community management, the resources will be open to everyone, there by overused (Haller & Merten 2008).

Therefore, it is worth noting that although neo-liberal policies call for decentralisation arrangements such as co-management as the 'most suitable' system of governance SSF, such systems should not be tailor made to suit all fishing communities. Various governance models such as community management may also be considered. There is a lot to consider when devising such policies, including the system of government administration and the constitution of a particular country. Decentralisation policies could work for democratically run countries who respect rights of expression of their citizens. But even in 'democratically' run countries such as South Africa, decentralisation policies are still facing challenges. Thus, decentralisation policies are likely to fail in autocratic political states which are not yet ready to cede power and rights to the citizens.

Countries such as Zambia and Malawi have drafted decentralised fishery policies which give rights to fishers on paper, but implementing such policies is still a challenge. Failure of such policies

could also be a result of the fact that they excluded small-scale fisher representatives in drafting the policies. They impose policies which do not address the voice and concerns of the fishers. Countries such as Zimbabwe could hurriedly draft such decentralised policies to receive funding from international organisations such as FAO. However, they misuse such funding to finance other government departments such as military and defence or use it for political campaigns. This is typical of highly militarised states who treat their citizens as enemies. Therefore, the intended beneficiaries such as fisherfolk communities would end up suffering in the process. It is high time governments need to shift focus to the deprived fisherfolk communities.

Other reasons could also be lack of financial capacity to implement the decentralisation policies as such arrangements need funding to train local administrations on how to run them. Therefore, the system of governance entirely depends on case by case scenario taking into cognisance the values and perspectives of the researched population. It is, therefore, the researchers' duty to collect the data and understand the voice of the voiceless fishers to determine the system of governance arrangements suitable for their context. Decentralised governance arrangements cannot be used as a one size fits all solutions for all small-scale fisheries, although some elements can be applicable.

Some studies have, however, concluded that it is not the governance arrangement per-se that determined the nature and effects on livelihoods, but there were other 'external' factors, which when present or absent determined the sustainability and nature of small-scale livelihoods (Bundy et al. 2017; Kosamu 2015; Kosamu 2017). Whether the governance arrangement is centralised or decentralised, there have been suggestions that what matters is the nature of input made by whatever system, and not necessarily the system itself. Bundy et al. (2017) found out that the execution of a long-term management plan, including social and economic dimensions of fisheries in utilised ecosystems, was a fundamental factor in sustainable fisheries management. For Bundy et al. (2017), the most important determinant factor is tied to the level of planning, be it successfully long-term or of a short-term nature. Having established the governance arrangements at play, this study will examine whether any form of planning is made and adhered to, other than simply make conclusions solely based on the nature of governance arrangements.

In the same vein, Kosamu (2015) argues that with inadequate local social capital, levels of government participation did not make any notable difference; the fisheries were unsustainable in all cases. The argument is that governance on its own is not a strong factor affecting livelihoods. This seems to go against most studies, and this study seeks to find out if in the Zimbabwean situation in Norton such claims would be refuted or upheld.

From all the above, it is apparent that there are diverse governance arrangements through-out the world, with differences being seen even in different fisheries within the same region or country. Whilst there is controversy surrounding the effects different governance arrangements have on livelihoods, it is clear that there are deep-lying factors that this study needs to consider in order to fully understand how governance arrangements in Norton have likely affected livelihoods.

2.7 CONCLUSION

This chapter introduced the reader to the subject of study and set the context for understanding SSF. The chapter demonstrates that small-scale fishers are not a homogenous group and that they operate in different situations and processes. Small-scale fisheries in the global North could not be likened to SSF in the global South because of various reasons which include the varied system of government administrations and access/ lack of access to resources. However, although undermined in policy discourses and largely excluded in decision making initiatives, SSF are dynamic and innovative by using low capital and local-skill intensive labour. The chapter also highlighted that SSF are not stagnant as they are complex and dynamic in carrying out their fishing practises. Small-scale fishing sector is also innovative and employed a large number of artisanal fishers' world over. Their innovation can be traced back to the pre-colonial period where they used their customary rights to govern and access the fish resources. They also used their indigenous knowledge systems to conserve the fish resources. Therefore, their contributions to the livelihoods of the poor people should not be undermined as they contributed to the incomes and food security of the people, especially in the global South countries. Although continuously side-lined, small-scale fishers are 'too big to ignore' and too 'important to fail'.

The chapter also examined the different governance approaches that have been adopted in different parts of the world. It also examined the literature available concerning SSF governance issues and was divided thematically according to the study's objectives. The penultimate section gives the empirical evidence of studies done in the same area and establishes the knowledge gaps that this study seeks to fill.

The chapter's aim was to draw the appropriate parameters for the study, set by existing evidence of what has been happening the world over. The literature analysed and revealed that many post-independence countries especially in the global South inherited hierarchical centralised systems of fishery governance from the settler colonial administrations. The challenge with such formalised systems and legislations is that they largely neglected customary rights when drafting legislations. The imposition of such legislations on fishing communities, who have a history of

deprivation and dehumanisation from colonial legacy, suffered a lot of challenges from the fisherfolk communities. Statutory instruments imposed by parks departments such as payment of permit fees caused untold suffering to poor fisherfolk communities who cannot afford to make ends meet in the global South countries. Weak centralised governance arrangements especially in the global South countries also stemmed from kleptocracy and corruption in government administrations. The overlapping and confusing institutional arrangements adopted by some countries in form of legal pluralism have resulted in different forms of conflicts and informal fishing. Confusion also emanated from different legal instruments imposed on small-scale fishers.

The confusion resulted in poaching as a challenge to the governments and a process to the fishers. Many governments in the global South have largely ignored the various processes, concerns, and fisher perspectives when drafting small-scale fisherfolk policies. This exclusion has resulted in on-going governance problems in SSF. Small-scale fish guidelines have been drafted by organisations such as FAO and are championed by other international organisations such as Worldfish to be used as guidelines by countries when they are drafting their fishery policies. However, although the guidelines are useful, it is the researchers' and governments' obligation to make sure that they include the fisher's perceptions, their cultural rights, and the historical processes involved when drafting policies for small-scale fishers. Fishers need to be subjects and active participants and not objects in policy formulation.

Neoliberal system of governance such as co-management have been advocated for in small-scale fishers by various international organisations such as FAO. However, it is the duty of policy makers and governments to critically assess such initiatives and analyse the suitability of their policies to their contexts. They should not be used as a one size fits all for all countries since a lot is involved when devising policy processes. One of the factors to consider is the structure and system of government; whether its autocratic or democratic. The next chapter focusses on conceptual and theoretical underpinnings of the study.

CHAPTER 3: THEORETICAL UNDERPINNINGS OF GOVERNANCE AND LIVELIHOODS OF SMALL-SCALE FISHERIES

3.1 INTRODUCTION

This chapter focuses on the theoretical framework adopted for the study. The study adopted the interactive governance theory, which will be scrutinised and understood first from a global perspective, through regional adoptions, to the local Norton understandings. Interactive governance, however, is broad and this study encompasses other theories such as the Sustainable Livelihoods Approach, which will also be discussed as part of the broader Interactive Governance Theory. As background to the theory, the two concepts underpinning the study, which are governance and livelihoods are unravelled. The following section discusses the conceptual framework for the study.

3.2 THE CONCEPT OF GOVERNANCE

3.2.1 Defining the concept

Governance is the most important concept in this study. As such governance needs to be unpacked in order to ensure an understanding of both the theoretical framework and the study at large. The debate among proponents and critics of the governance perspective can, among other things, be attributed to the lack of a precise definition. Governance denotes different things to different scholars and is used within different theoretical traditions. Researchers drawing on political science or international relations perspectives, for instance, tend to concentrate on issues of legitimacy, and participation, while anthropologists might emphasise contextuality and hybridity (Gupta et al. 2015; Bednar & Henstra 2018). Approaches drawing on a more geographical perspective, as this thesis does, tend to emphasise on networks, and human-environment interactions amongst other issues (Weis 2000; Gupta et al. 2015; Song et al. 2017).

Some popular writers tend to use governance synonymously with the government (Bednar & Henstra 2018). Therefore, it is crucial to give a short description of the two terms to understand the distinction between governance and government. According to Gupta et al. (2015: 28) government includes, "the formal institutions of the state that perform the action of governing based on their monopoly of legitimate coercive power within a demarcated territory" while governance is the aggregate of the many ways individuals and institutions (private and public)

manage their common affairs. It has been argued that governance "is a continuous process through which conflicting or diverse interests may be accommodated and cooperative action may be taken" (Commission on Global Governance 1995: 2). Proponents of governance perspective associate everything related to governance as good. For instance, they depict governance as a magical antidote to all the problems associated with bureaucratic, hierarchical, top-down government, whilst its critics accuse governance of all sorts of mischief and evil (Sorensen & Torfing 2018).

The broadening of government to governance emerged in the 1970s and 1980s with the emergence of other social actors such as NGOs and corporations actively involved in governance processes (Weiss 2000; Gupta et al. 2015). There was also a heightening emphasis on the decentralisation of government duties and the rise of decision making at the lowest possible level as a principle during that era. Yon & Kim (2019) support this view by stressing that governance has recently evolved around the world from being rigid and central to being decentralised with devolved power and collaboration between central governments and other non-state actors. A number of countries including some Southern African countries have adopted this decentralisation policy, in the context of SSF (Njaya 2009; Isaacs 2012; Njaya et al. 2012; Nunan et al. 2015).

Despite some scholars divorcing governance from the political process, it should be maintained that governance is a highly political process as captured in the European Commission's (EC 2003: 2) definition of governance as "the rules processes, and behaviour by which interests are articulated, resources are managed, and power is exercised in society". The concept of governance emphasises the interactive roles of state and non-state actors in shaping the rules and managing society as has been put forward by Kooiman et al. (2005: 17)'s definition which stipulates that,

governance is the whole of public as well as private interactions taken to solve societal problems and create societal opportunities. It includes the formulation and application of principles guiding those interactions and care for institutions that enable them.

The most crucial element of the above definition is the term interactions, which stands at the heart of the prominent interactive governance perspective that will be explained in detail later in this chapter (Kooiman et al. 2005; Kooiman et al. 2008; Bednar & Henstra 2018). While some have asserted that the state is being channelled out by the displacement of political power upwards, downwards and outwards as has been put forward by Sorensen & Torfing (2018), others affirmed that the role of the state is not weakening but is, rather, being transformed by the unfolding reality of interactive governance that requires it to act as a facilitator, sponsor, and initiator of collaborative forms of governance.

Furthermore, the definition of governance refers to the significance of institutions in governance. Institutions offer order, structure, and predictability in human relations such that social actors would know what is expected of them, and how to interact with others. Thus, for institutions, being considerate is a part of governance. The same applies to principles. Without basic principles, no governing interaction or human relation can last (Kooiman et al. 2005; Kooiman et al. 2008; Borzel & Risse 2010; Bavinck et al. 2013).

Governance is used as both an analytical and normative tool. As an analytical tool, it is utilised to understand how, at what scales, and by whom, territories, and resources are governed, whereas as a normative tool, it relates to neoliberal and models of good governance (Gupta et al. 2015). It is neoliberal in the sense that it moves away from state-centred models of governance towards network-based models whilst on the other hand good governance models prioritise democratic ideals such as participation and transparency (Weiss 2000; Kooiman et al. 2005; Gupta et al. 2015). However, in application, these two models are often interconnected, if sometimes in contradictory ways. Proponents of the neoliberal model encourage shifting away from state-centred models of governance towards decentralised and participatory models in resource allocation (Borzel & Risse 2010; Bresnihan 2019). Such decentralisation policies originally focused on transferring power to lower levels of government; only later was decentralisation also viewed as a way to transfer authority to non-state actors at the local level (Njaya et al. 2012; Isaacs 2012; Hara et al. 2015; Nunan et al. 2015). According to Kooiman et al. (2005), all of the above indicates that the framework of actors engaged in governing is often as complex and dynamic as is the system-tobe-governed. There is no reason to presume that fisheries and aquaculture are exceptions. In reference to marine ecosystems, groups such as SSF, user-associations, and industries have all participated in governance (Chuenpagdee 2011).

Governance in this study does not equate to the government but it is about the processes of making decisions, and often by actors other than the state. Kooiman et al. (2008) maintain that governance of natural resource systems involves interaction roles of market, civil society, and state. This entails that when the state fails to govern successfully, other actors such as civil society and the market would chip in. The government also interacts with other actors such as companies, voluntary associations, NGOs, and political parties in shaping societal futures (Jentoft & Bavinck 2014; Bavinck & Vivekanandan 2017; Sumaila & Le Billion 2019). This concept was borrowed from the interactive governance theory which postulates that private actors often play a much more crucial informal role than states, nationally and globally (Kooiman et al. 2008; Bavinck et al. 2015; Gonzalez 2018). However, interactive governance often looks at formal arrangements and not

informal arrangements. Informal arrangements, however, also play a critical role in Southern Africa especially at a community level. It is crucial therefore, to highlight these informal arrangements where applicable. The next section gives an analysis of typology of governance.

3.2.2 A typology of governance

Typologies have long been acknowledged as a valuable tool in helping to categorise policies "in such a way that the relationship between substance and process can be more clearly understood" (Hall 2011: 441). The typological tradition in policy studies is esteemed as dating back to Lowi's (1964) exceptionally leading paper with respect to how different kinds of policies have different kinds of policies linked with them (Hall 2011).

Diverse typologies of governance were propounded by Bednar & Henstra (2018), and these are hierarchical, market, network and community governance. It is important to give a detailed analysis of each of these typologies of governance. However, the dominant modes of governance theory in the fisheries discourse as maintained by Kooiman et al. (2008) are hierarchical, cogovernance, and self-governance. These modes of governance lend themselves to what Kooiman et al. (2008) refer to as interactive governance. This will also be discussed and analysed in detail later since this study will attempt to use it as a reference point to develop a conceptual framework for understanding governance in the SSF sector in Norton, Zimbabwe. The typology of ideal governance modes which are hierarchical, market, network and community governance are presented in table 3.1. The table summaries each mode's distinct actor responsibilities regarding the implementation of actions. Furthermore, it summaries the function of the state and suitable policy instruments.

Table 3.1 Typology of modes of governance

	Hierarchy	Market	Network	Community
Direction of	top-down	circular (supply	horizontal	bottom-up
Authority		and demand)		
Initiating and	federal, regional,	government and	government,	citizens,
Implementing	and local	market actors	private sector,	community
Actors	governments		and non-	groups,
			governmental	neighbourhood
			experts	associations
Dominant	legislation and	Supply and	negotiated	self-regulation,
Policy	regulation	demand;	agreements,	voluntary
Instruments		government	codes of	participation
		market	practice,	
		intervention	voluntary	
			programs	

Source: Adapted from Bednar & Henstra (2018: 151).

Detailed assessments of the modes of governance stated in table 3.1 above are expanded and analysed in greater detail in the next sections. The first typology of governance to be discussed in this section is hierarchical governance.

3.2.2.1 Hierarchical governance

Hierarchical governance is a centralised type of governance that is state-centric and uses a top-down approach. Hierarchical governance entails top-down "levels of state authority, wherein each unit is subordinate to its vertical superior, and in which tasks are separated into more manageable forms" (Bednar & Henstra 2018: 149). Hierarchy in public governance involves bureaucracy from state administrators who come up with strategic objectives that civil servants then execute through state enterprises (Hall 2011; Bednar & Henstra 2018). The key actors in hierarchical governance are public officials and those with whom the state wishes to consult. Non-state actors may be providers of information in some instances, but they will act as passive rule-takers (Hall 2011).

According to Bednar & Henstra (2018: 148), "dominant policy instruments are typically associated with command and control, including regulations, permits, and state intervention into individual liberties". Elected members and senior officials dictate policy obligations and

initiatives, while the ordinary citizens apply the decisions (Kooiman et al. 2005; Kooiman et al. 2008). Hierarchical governance, just like any other governance typology has its own strengths and weaknesses. One of the strengths of hierarchical governance is that it essentially acquires "democratic legitimacy via representation in that power flows from those with an electoral endorsement from voters" (Bednar & Henstra 2018: 149). However, hierarchy is inflexible in some instances where it lacks a clear consensus in addressing policy. Lack of broader societal inputs can as well suppress innovative contributions. The next section summarises the main traits of market governance.

3.2.2.2 Market governance

Market modes of governance are driven by the "invisible hand of the market or, to a lesser extent, the use of market-driven behavioural change" (Bednar & Henstra 2018: 149). This entails that market governance is controlled by negotiation and competition among market actors and therefore, not top-down from the government (Dixon & Dogan 2002; Ebers & Oerlemans 2016; Bednar & Henstra 2018). The sole mandate of the state in market governance is to protect legitimate currency and property rights (Ebers & Oerlemans 2016; Bednar & Henstra 2018). Negotiation and competition are determined by the free-market economy which is often referred to as "laissez-faire" (Thompson 2003: 15). Governance is decided essentially by the practices of demand and supply, and there is less state involvement. According to Hall (2011), the major actors of market governance are market participants. The state acts as a passive observer or rule maker.

The key strength of market governance as maintained by Bednar & Henstra (2018: 149) is that both "policymakers and policy takers are authorised to influence policy decisions by their actions in the marketplace". Furthermore, a free market economy allows a flexible individual choice to the society to determine their market needs. However, the major limitation of the market governance emanates from the wide failure of market mechanisms to consider the negative externalities (Ebers & Oelemans 2016). More so, "market governance is typically regarded as inappropriate for harmonising services that are rights-based" (Bednar & Henstra 2018: 150). The weaknesses of market governance introduced another form of governance which is network governance.

3.2.2.3 Network governance

Network governance assumes that the ability and authority of countries are decreasing, needing collaboration with corporate and civil society actors in the formulation public services delivery (Dixon & Dogan 2002; Davies et al. 2016). Centralised state is relatively succeeded by collaboration of private and public actors (Kooiman et al. 2005; Davies et al. 2016; Bednar & Henstra 2018). In differentiating networks from hierarchies and markets as a way of organising social order, Bednar & Henstra (2018) posit that it is cooperation and trust that centrally articulate networks. Networks are also referred to as new modes of governance. In market governance, there are many actors but the state has outstanding power and authority to initiate the regulations of the network, which is sometimes called 'metagovernance' (Bednar & Henstra 2018). "Typical policy instruments such as accreditation schemes, self-regulation, and codes of practice carry the unique component of 'trust' that is absent in market and hierarchical instruments" (Bednar & Henstra 2018: 150).

Davies et al. (2016: 136) identified two approaches to network governance, which are, "problem-centred and actor-centred approaches. Problem centred approaches regard networks as effective responses to increasing societal diversification and complexity, which weakens the ability of states to rule competently through traditional means of market and hierarchy". One such example, as has been put forward by Roberts (2000) is the doctrine of "wicked problems". This is a notion usually utilised in network governance to typify problems so intricate that they are complicated to solve. The wicked problems associated with networks may take many forms such as informal or formal but with the objective of collaborating market and civil society actors (Kooiman et al. 2008; Davies et al. 2016).

Actor-centred approaches understood network governance as a realistic reaction to specialisation and fragmentation that subscribe to neo-liberal reforms. The main concept, "of 'New Public Management' is centred on the idea that independent agencies or public companies cope better than traditional multifunctional administrative units" (Davies et al. 2016: 136).

Networks as a form of governance have several strengths. They are more participatory, and can encourage innovation to address challenging policy problems through the involvement of many actors (Bevir 2012; Bednar & Henstra 2018). However, critiques of network governance reveal that networks are vulnerable to elite capture by powerful individuals and companies, thereby exacerbating power relations (Davies et al. 2016; Bednar & Henstra 2018). More so, critics assert genuine network governance is difficult to sustain because of mistrust among various interest

groups. For example, Davies et al. (2016: 137) argued that "societies are essentially evolving away from trust relationships towards externally regulated behaviour, an instinct revealed in widespread disregard for political elites labelled provocatively as anti-politics". This entails that the level of trust, unity and networks is slowly eroding in political arrangements as individualistic, ambitious, powerful individuals engage in selfish tendencies. The hunger for power and the quest to control people, resources, and wealth, influenced the political elites to move away from trust relationships. Their interests and decisions are not done for the good of the people but for their selfish individual gains. Hence the saying there are no permanent friends and enemies in politics for as long as the political clouts benefit from the arrangements and secret deals, which in most cases are acquired through corruption.

3.2.2.4 Community governance

Community governance is also another mode of governance in addition to networks and other typologies of governance mentioned above. This model, which is also called self- governance, substantially overturns the roles found in hierarchical governance. This entails that local governments and community members enhance policy (Bednar & Henstra 2018). Community governance is very much determined by communitarianism and requests for more complete citizen participation in governance. "Communitarianism proposes that large-scale government should be substituted by smaller spatial units of governing that are accessible to the community" (Hall 2011: 447). The concept of community governance was first propounded by Pierre & Peters (2000). According to Bednar & Henstra (2018), this mode champions several of the same inclusive models of network governance but the drive and management rest at the local level. The phenomenon of this type of governance rests on the gist of "subsidiarity and local control over localised problems" (Bednar & Henstra 2018:151). Given the key concepts of cooperation and unity, distinctive "instruments in the community governance mode include open public consultation, direct democracy, and education campaigns to inform local participants" (Hall 2011: 447).

Community governance, just like any other form of governance has its strengths and weaknesses. The vital strengths of community governance are its ability to promote outcomes that are customised locally (Hall 2011). "For many cultural, environmental, and social policy issues, local independence is regarded as the only option to avoid controversial policies developed at higher levels that are not suitable for local conditions" (Bednar & Henstra 2018: 151).

Community governance has shortcomings, however. Foremost, it is viewed as idealistic and expecting too much from the local agreement (Hall, 2011). It is obvious that the communicative logic at the centre of community governance is positive, and the ideal of local freedom seems decreasingly possible in the 21st-century globalised world (Bednar & Henstra 2018). More so, "Community governance may also suffer from the same power asymmetry as networks, providing the opportunity for limited interests within communities to direct governance towards certain goals and issues" (Bednar & Henstra 2018: 151). Furthermore, if community governance is truly independent from state control, then there will be clear shortcomings to what it can fulfil due to deficient localised resources (Hall 2011; Bednar & Henstra 2018). Thus, it is sometimes hazy as to how local actors interact with state arrangements in community governance forms.

3.3 THEORISING GOVERNANCE IN NORTON SMALL- SCALE FISHERIES WITH SPECIAL REFERENCE TO INTERACTIVE GOVERNANCE THEORY

Fisheries governance is defined by the Food and Agricultural Organisation (FAO) as a "systemic concept relating to the exercise of economic, political, and administrative authority" (Pita et al. 2012: 347). In a general sense, fisheries governance covers the economic, social, and political frameworks of fisheries. It considers the instruments, institutions, structure, government, civil society, and markets in relation to the fisheries management agenda (Pita et al. 2012; Wentink et al. 2017). This definition of fisheries governance aligns well with the interactive governance perspective, which prioritised interactions of different actors such as individuals, NGOs, and state (Pita et al. 2012; Bavinck et al. 2015; Bavinck & Vivekanandan 2017). The interactive governance perspective brings together all these governing fraternities in a fish value chain in one conceptual framework and ensures that the considerations of the fish chain become part of the governing efforts (Kooiman et al. 2008; Jentoft & Bavinck 2014; Gonzalez 2018).

IG is defined by Kooiman et al. (2008) as "the whole of interactions taken to solve societal problems and to create societal opportunities; including the formulation and application of principles guiding those interactions and care for institutions that enable and control them" (Kooiman et al. 2008:2). To simplify it, IG is an approach that relates on understanding the governing systems, the system to be governed, and their interactions (Chuenpagdee 2011). The attention on 'interactions' constitutes the main novelty in this approach. Interactions are specific arrangements of action, between and amongst various actors. Institutions and principles are also incorporated in the definition as they are deemed to be essential for any governance interaction (Wentink et al. 2017).

Theoretically, the interactive approach suggested that societies comprised of governance actors, who are enabled or constrained by structures. Actors, in this approach, are any social unit possessing power or agency of action. These include firms, individuals, and associations (Kooiman et al. 2005; Kooiman et al. 2008). Structure refers to "the frameworks within which these actors operate, which widen or limit their action potentials, therefore demanding their consideration" (Kooiman et al. 2008: 3). These frameworks include law, culture, and agreements (Kooiman et al. 2008). As a matter of fact, IG approach argues that many actors at different levels and positions of society are engaged in governance.

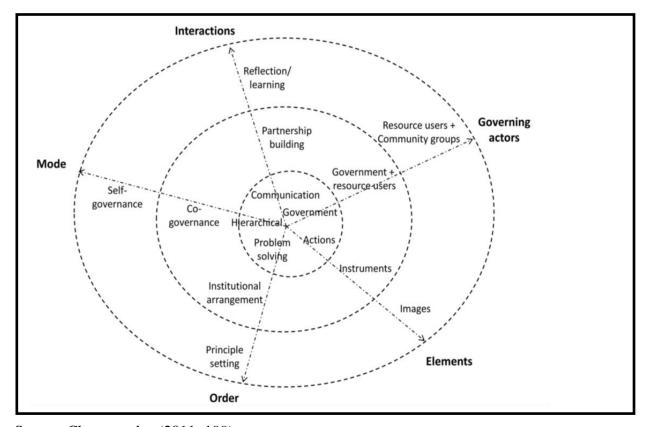
In addition to that, IG also proposes that there are key distinctions between governance, management, and policymaking. The difference between these activities may differ with language and culture (Kooiman et al. 2005; Kooiman et al. 2008). For instance, "what is named policy in Anglo-Saxon politics may be known as 'gouvernance' in the Francophone tradition. American authors, on the other hand, may regard the same phenomenon as management" (Kooiman et al. 2008: 3-4). However, Kooiman et al. (2005) argued that governance is the more comprehensive term followed by policy, with management being the most influential of the three concepts.

Chuenpagdee (2011) gives a conceptual specimen of the IG model in Figure 3.1 which reveals critical variances between governance and management. According to Chuenpagdee (2011: 198), "traditionally, management inhabits the inner circle, with governments as the key figure in interpreting daily problems and formulating management decisions". The first facet of moving outward is the extension of governing actors, from governments to NGOs, and resource users. This signifies a shift from the centralised government to the collective and more inclusive approaches introduced in 1980s when it was realised that governments need interactions with other actors to solve complex societal challenges (Chuenpagdee 2011; Gupta et al. 2015; Bednar & Henstra 2018). In the context of marine ecosystems, industries, user associations, and fishery-dependent communities have all taken part in governance.

However, not all entities partake concurrently or equally. Their level of involvement and roles relies on the functioning of governance. As shown in Figure 3.1, governance can take any of the three forms: self-governance, co-governance, or hierarchical. IG theory examines the governing system in terms of orders, modes, and elements of governance as will be discussed in the next sections.

3.3.1 Interactive governance modes

The three modes of governance mentioned above roughly equate to the three interaction modes at the action level of governance and they all influence governability. Chuenpagdee (2011) presented a distinctive figure summarising the conceptualisation of the interactive governance model in Figure 3.1 in the next page which shows different modes of interactive governance.



Source: Chuenpagdee (2011: 199)

Figure 3.1 Interactive governance model

Figure 3.1 is illustrated and expanded in greater detail below where various modes, governing orders and interactions in SSF are analysed. Firstly, I discuss the hierarchical governing mode. Under this mode, "the government determines the decisions about marine resources, while in the self-governance mode, community groups do" (Kooiman et al. 2008: 9). Co-governance mode involves shared responsibilities and partnership arrangements between resource users and government. Co-governance which is sometimes referred to as co-management is much comprehensive than the other modes of governance and it signifies the use of organised forms of

governing interactions (Kooiman et al. 2005; Kooiman et al. 2008; Chuenpagdee 2011; Bavinck et al. 2013).

Chuenpagdee (2011) posits that the contemporary trend in governance of marine resources, is a drift from hierarchical to either co-governance, or self-governance. Hierarchical governance is increasingly replaced by networks, markets, and partnerships. Davies & Ruddle (2012) however, criticised the co-management and human rights approaches by arguing that the approaches do not recognise cultural systems, undermine family life, and destroy the local social organization of production.

The arrows in Figure 3.1 above show the growth of governing participants, "the broadening of governance elements and order, the evolving governance mode, and governing interactions" (Chuenpagdee 2011: 200). These outward movements denote distinct ways that happen in shifting from traditional management, at the core, to a comprehensive, interactive governance notion. It does not demonstrate, however, that the outer circle where community groups and resource users function in self-governance mode is completely vital. Chuenpagdee (2011: 201), for instance, highlighted the cases of the "2004 Indian Ocean Tsunami, and the 2010 Mexico oil spill" to demonstrate that effective centralised system is a prerequisite in cases of disasters and emergencies. The next section highlights the orders of governance in an interactive governance framework.

3.3.2 Orders of governance

IG theoretical framework also relates to orders of governance. Kooiman et al. (2005) identify three orders of governance, which are First Order, Second Order, and Third Order governance as demonstrated in Figure 3.1 above. First order governing occurs wherever people and their organisations interact to solve challenges and create new opportunities (Chuenpagdee 2011; Jentoft & Bavinck 2014; Bavinck et al. 2015). First Order governing attempts to solve the challenges faced by fisherfolk communities in the fish chain. These challenges could be diverse and include problems of employment, price, supply, and market. However, it is important to consider the diversity, and complexity of situations in the analysis (Kooiman et al. 2008).

Second Order governing emphasises the institutional arrangements within which First Order governing takes place. The term institution means the systems of agreements, rights, rules, laws, and procedures that are applied by First Order governors to determine decisions. (Kooiman et al. 2005; Isaacs 2012; Bavinck et al. 2015; Gonzalez 2018). Institutions contribute a framework for

First Order governance and establish the meeting ground for those governing and for those being governed. One of the key research questions of this study would be to identify and analyse various institutions that govern the management of SSF in Zimbabwe. Therefore, the Second Order governing in the governance theoretical framework is key in attempting to analyse various institutions that govern small-scale fisheries.

The last order of governance is the Third Order (meta-order) which evaluates the governing exercise. The main thrust of this order is on principles which control activities in relation to natural resources. Principles of responsibility and sustainability are key in the Third Order of governance (Allison et al. 2012; Jentoft & Bavinck 2014; Gonzalez 2018).

Third Order governance also demonstrates the governance principles in the sustainability and responsibility of SSF. According to Kooiman et al. (2008), the aim is to initiate principles and international standards for responsible fisheries defined in relation to the effective conservation, and management of living aquatic resources. Although the evaluation of governability orders' special importance is acknowledged, the crucial questions that remain are: are the three governing orders in a societal system supplementary to one another, or are they at odds? And does each order receive sufficient attention? One of the reasons why this study adopts the governance theory is to try and demonstrate that these three governing orders are complementary to one another, which is a crucial aspect of the interactive governance process. Governance interactions is also a crucial aspect in interactive governance theory as demonstrated in the next section.

3.3.3 Governance interactions

One important feature differentiating the IG model from others is the attention on the various forms of private and public interactions, which can be collaborative, proactive, or adaptive, depending on the properties. These interactions happen all over the governance process, "((from stage zero to the implementation, and at different orders, which are problem-solving (first-order), institutional design and arrangement (second-order), and principle setting (meta order)) (Chuenpagdee 2011: 200)". Such interactions may promote or hamper governing efforts, resulting in the system being more governable or vice versa, and therefore beyond the full jurisdiction of governors (Kooiman et al. 2005; Kooiman et al. 2008). For instance, interactions within marine ecosystems generate certain levels of dynamics and complexity that are tough to understand. Likewise, the dynamics and complexity of the social systems and the governing systems are determined by the relationships and interactions among organisations, and individuals (Chuenpagdee 2011).

Furthermore, interactions take place between the social and natural SG and the GS. The IG model acknowledged that governing interference have effects on social and natural systems. (Chuenpagdee 2011). Since governance systems are in motion rather than stationary, the IG perspective must also be a vigorous one. Thus, "principles such as the adaptive management and precautionary approach need to be copied since they allow the systems to be flexible" (Chuenpagdee 2011: 200).

Kooiman et al. (2005)'s interpretation of IG is useful in this study, especially in policy formulation recommendations. Co-governance is influential in the management of SSF (Symes 2006; Allison et al. 2012; Isaacs 2012; Sumaila & Le Billon 2019). It entails the use of arranged models of interaction for governing purposes. Co-governance can also be illustrated in terms of public-private partnerships, co-management, and networks (Kooiman et al. 2008; Bavinck et al. 2015).

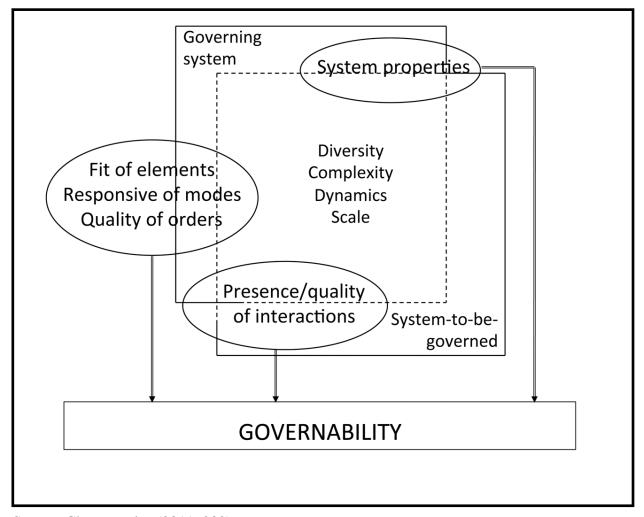
Wentink et al. (2017), quoting Kooiman (2005), define co-governance as referring to occasions where societal parties unite with common goals, as independent partners. A key assumption here is that there is interaction of actors. Pourcq et al. (2015) understood co-management as a system of collective partnership between local communities and state institutions. It allows all parties involved to negotiate, and guarantee equitable sharing of natural resources management. Keywords like, "'cooperation', and 'collaborate' are scattered throughout discussions on the meaning of co-management, which, as proclaimed, decentralises decision making through delegation and devolution of authority, thereby empowering resource users" (Davies & Ruddle 2012: 247).

Some of the benefits of co-management have been put forward by D'Armengol et al. (2018) who stressed that co-management delivers both social and ecological benefits. It increases the abundance of fish species, actors' participation, as well as encouraging processes of social learning. However, some literature review sources still document the challenges of conflicts and power dynamics in co-management arrangements (Njaya et al. 2012; Schultz 2017; D'Armengol et al. 2018; Kantel 2019). These power dynamics and conflicts in co-management initiatives occurred because of various factors such as different goals and visions. Some traditional authorities also felt that their positions in managing fisheries resources were threatened by these co-management initiatives. Therefore, the challenges in co-management initiatives are a wakeup call to policy makers that co-management is not a one size fits all solution to fisheries related governance issues. Thorough assessments and diversity of contexts need to be considered when proposing policy frameworks, and the governability of the society in general.

3.3.4 Assessing governability

Within the interactive governance perspective, governability is defined as "the overall capacity for governance of any societal entity or system" (Kooiman et al. 2008:3). This can simply mean the overall quality of governance (Chuenpagdee 2011). There is a direct relationship between governance and governability, influenced by interactions. Any practice that attempts to further the understanding of governance inevitably results in the need to assess and investigate governability. Governability can be fragmented into three main components: the system-to-be-governed (SG); the governing system (GS); and the interactions between these two governing interactions (GI) (Kooiman et al. 2005; Kooiman et al. 2008; Jentoft & Bavinck 2014; Hara et al. 2015).

Jentoft & Chuenpagdee (2015) quoted by Steenbergen et al. (2019) argue that any assessment of a fishery's governability depends not only on the capacity of the governing systems but also on the fishery itself (i.e., the SG) and the interactions between these. Kooiman et al. 2008 posit that in the context of aquatic resource systems, the GS consists of different parties having varying images of their roles and tasks with regard to the SG. Governments, for example, may wish to take measures against overfishing and prevent social conflicts whilst market associations will be more concerned with variations in the fish chain. Civil society organisations, on the other hand, would be more focussed on public awareness on conservation of the aquatic ecosystems (Kooiman et al. 2005; Kooiman et al. 2008). This explanation and examples provided by Kooiman et al. (2008) demonstrate that the IG perspective assemble in one conceptual framework all necessary, governance arrangements and efforts in a fish chain. Figure 3.2 shows the three-part analysis of governability, governing system quality, and governing interactions. Comprehensive explanation of the three-part analysis of governability will be given after Figure 3.2.



Source: Chuenpagdee (2011: 202)

Figure 3.2 Three-part governability analysis

Assessing governability requires detailed examination of the SG, the GS, and the GI (Figure 3.2). "Specifically, it involves a three-part analysis of: (1) how governable a system is (system properties), (2) how capable a governing system is (system capacity), and (3) how conducive the interactions are for governing (system interactions). System properties form what enables (or interdicts) governability" (Chuenpagdee 2011: 201). According to the IG framework, it is decided largely by four properties: scale, dynamics, diversity, and complexity (Jentoft & Bavinck (2014). Aquatic resource systems are therefore becoming more complex, dynamic, and diverse all the time because of forces of globalisation and the broadening of value chains (Kooiman et al. 2008). The diversity here is described as an origin of innovation and creation but also faced the risk of conflicts. "Dynamics trail from tensions that create flows of energy, and information within and among systems" (Kooiman 2008: 5). Dynamics create prospects for change but can also be unruly

(Kooiman et al. 2005; Kooiman et al. 2008). However, this diversity, dynamism, and complexity tends to be overlooked by governors. Many governors treat small-scale fishers as a homogenous group, forgetting that SSF systems have various secular and special scales. According to Kooiman et al. (2008), this is easily demonstrated with documentation from capture fisheries. Therefore, the GS capacity is determined partly by these properties (dynamics, diversity, scale, and complexity), but also by the other three criteria, namely: the responsiveness of modes, fit of elements, and quality of orders (Kooiman et al. 2008; Chuenpagdee 2011). The next section analyses the elements of governance.

3.3.5 Elements of governance

IG comprises of three elements, namely: images, instruments, and action. Images constitute the guidance as to the why and how of governance. They are demonstrated in many types, which includes facts, knowledge, and hypotheses (Kooiman et al. 2005; Kooiman et al. 2008). Images also encompass assumptions on important issues such as the connection between nature and society, and the function of government (Kooiman et al. 2008). The Tragedy of the Commons propounded by Hardin (1968) is regarded as the most powerful image governing fisheries. It foresees the unavoidable exhaustion of a natural resource if exploitation is left to the users. The supposition made in the context of fisheries is that fishermen are individually inspired to capture more fish even when the harvest is already on the decrease, thus causing a tragedy for all (Kooiman et al. 2008). One of the recommendations put forward is for the state to institute restrictive measures.

Instruments, on the other hand, join images to action. The order of instruments available to influence societal interactions is exceptionally wide. Instruments may be soft, as in bribes, information, or peer pressure (Kooiman et al. 2008). They may also have origins in the financial or legal realms and involve permits, fines, or taxes. Furthermore, instruments may also be in form of physical force. Moreover, instruments have a diverse range of applicability – some being specific and others general – and they often show a potent of their own. For example, the individual transferable quota (ITQ)⁶ has been embraced worldwide as a management instrument to curb overfishing.

⁶ Individual Transferable Quota "provides a share of the fish catch or fishing effort allowed in a fishery to an individual fisher" (Acheson et al. 2015: 1).

The final aspect in the element of IG is action, which involves placing instruments into practise. This includes the enactment of policies according to codified guidelines which are a routine affair. Action may also involve mobilising actors in new and uncharted directions. Numerous questions for the evaluation of governability emerge with regards to elements, including inquiries on how governing instruments, images, and action used by governors contribute to governability (Chuenpagdee 2011). It should be noted that both the quality and presence of interactions influence governability.

The interactive nature of IG theory advances institutional stability through adaptations, which depict a continuously evolving institutional learning process. A crucial component of the interactions is an essential flow of communication, most often in the order of feedback loops (Kooiman et al. 2008). The usefulness of communication, therefore, contribute to consideration of stakeholders' perceptions.

Symes (2006) points out that IG is believed to be able to reflect on the diversity of systems being governed and measuring up to the challenges posed by issues such as social equity, food security, and employment. This entails that IG is broad and can be used to analyse many challenges faced by fisherfolk communities. It can be used not only to analyse governance related issues but may also encompass the livelihoods related aspects faced by fisherfolk communities such as food insecurity and unemployment. Interactive governance approach has its strength as demonstrated in the next section.

3.3.6 Strengths of interactive governance approach

It should be noted that IG is one of the more comprehensive theoretical approaches in the field as it prioritises on interpretation the governability of societal systems. The approach has been applied most comprehensively to fisheries (Bavinck & Vivekanandan 2017). Factors limiting governability, such as conflicts and devastating policy initiatives, can be logically analysed using the IG framework which also provides an analytical lens to establish where problems may arise and where opportunities for improving governance may be unearthed (Chuenpagdee 2011). Comparably, in the case of legal pluralist fisheries communities, Jentoft & Bavinck (2014) maintain that IG put forward an analytical lens that permits comparative analysis of legal systems for enhancing governability.

Jentoft & Chuenpagdee (2009: 558) also acknowledge the advantages of IG processes by asserting that

the advantage of partnership arrangements as governing interaction modes is that they widen the source of knowledge, including tapping local knowledge, and provides opportunities for interactive learning.

The exchange of knowledge, and resources between actors in IG platforms allows public-private partnerships between various stakeholders such as citizens and companies, thus enhancing participatory processes such as public policymaking (Sorensen & Torfing 2018). Empirical research on IG has afforded valuable insights into the barriers and potential drivers for enhancing effective democratic governance (Damgaard & Torfing 2010; Sorensen & Torfing 2018).

The pioneers of governance discourse not only assisted to simplify the notion of governance but also expanded the "concept of meta-governance" (Sorensen & Torfing 2018: 353). The concept of meta-governance is crucial because "it takes researchers beyond the false choice between 'governance without government' and the notion that governance is merely a manipulative version of the autonomous rule of government" (Sorensen & Torfing 2018: 353). Hence, the idea of meta-governance gives concentration to the many distinct methods in which government departments seek to determine IG processes without going back to traditional forms of hierarchical approach (Sorensen & Torfing 2018). Therefore, "instead of regarding the relationship between governance and government and as a zero-sum game, meta-governance enables governors and policymakers to see how the government may gain from facilitating IG, and vice versa" (Sorensen & Torfing 2018: 354).

The IG approach through its modes of governance such as co-management allows the shared responsibilities between or amongst different stakeholders. Shared responsibilities entail less burden on management responsibilities, especially on the central government. Devolution of powers by the central government to districts, councils and fisherfolk communities open the doors for partnership and collaborative arrangements amongst the government and these various stakeholders. Furthermore, partnership arrangements give fisherfolk representatives powers to make decisions with regards to fisheries related matters, challenges, their perceptions, and prospects. Their voices and concerns will be integrated in policy making initiatives. The interactive nature of such initiatives as co-management would allow participatory processes amongst the government and other stakeholders such as the fisherfolk and NGOs. However, careful assessments should be done by policy makers to determine the suitability of several modes of governance according to the governability and other governance related matters of each community or country. The interactive governance approach has its own challenges as assessed in the next section.

3.3.7 Critiques of interactive governance approach

Despite the prominence of interactive governance theory in explaining the fisheries legislation, policy, and management processes, it has been criticized for its failure to locate power relations in SSF (Bavinck et al. 2005; Davies & Ruddle 2012). IG theory is further challenged by Bayart (2009) who challenges traditional models of governance, particularly formal systems and argued that state power in Africa is not channelled through formal systems but there are informal channels through patronage which link citizens and state through client-patron relationships.

Furthermore, IG is challenged for the lack of technical solutions, and non-transferability in the application of tools such as Marine Protected Areas (MPAs), ITQs, and community-based management (Degnbol et al. 2006; Chuenpagdee 2011). Chuenpagdee (2011) maintains that despite efforts that have been made to analyse governance issues in Lake Victoria, and in Lake Malawi fisheries, IG approach remains inaccessible to ordinary people and other researchers because it is often considered too theoretical.

While it may be presumed that certain configurations of interactions generally subscribe to increasing governability, "the quality of these interactions, as well as of those involved may vary the governance outcomes" (Chuenpagdee 2011: 203). For instance, challenges related to the knowledge gaps and interdisciplinary jargon that impede essential communication when local experts, and researchers attempt to share information were identified. Furthermore, the ambiguity regarding what several forms of interactions bring to the process was acknowledged (Chuenpagdee 2011). Other problems are also recognised such as the complications in partnership arrangements when the process is highly determined by influential participants. However, by admitting to these challenges, efforts can be conveyed towards fostering meaningful interaction. With the understanding of potentials as well as limits for governability, there remains a need for the governance to be patient, and creative. This is also true for researchers when applying the governance lenses to assess and address challenges and outcomes related to fisherfolk communities.

Jentoft & Chuenpagdee (2009) pronounced that governance problems related to ocean and coastal ecosystems are wicked, meaning that they are not easy to differentiate and identify from others, and are difficult to solve. Therefore, despite the popular use of the term 'good governance', there is generally no agreed set of yardsticks for governance success (Chuenpagdee 2011). This entails that what can be termed as 'good governance' models and initiatives by the global North aligned

international organisations and countries may not be applicable in the global South context. There are a lot of questions than answers to determine the indicators used to determine 'good governance' and 'bad governance'. The global North countries' 'good governance' models cannot be imposed to all global South countries. Imposition of such models are a major source of civil wars and conflicts in most African countries to date. For many years, the Americans fuelled the civil war in Angola by supporting Jonas Savimbi (an opposition leader) in the pretext of championing democracy and 'good governance'. However, a lot was happening in Angola with some scholars and journalists arguing that the Americans were interested in exploiting resources such as oil and diamonds. The chaos through civil war initiated the exploitation process. The list is endless with the looming of crises and conflicts in Libya where America and her allies intervened militarily on the pretext of spreading the 'good governance' gospel.

Most former British and French colonies' independence governments in Africa who inherited the colonial systems of administrations are still suffering from the 'good governance' dilemma. The reason being that the colonial administrations eroded the traditional systems of governance which existed in the pre-colonial period and imposed a different system of government which ignored the cultural and traditional institutional processes. Inheriting colonial systems of administration which were not compatible to African situations contributed to a lot of conflicts and crises faced by many independent African countries to a greater extent, although other factors such as corruption and nepotism also played a part.

The 'good governance' policy processes are advocated for by neo-liberal policies, through initiatives such as co-management. Such processes and dilemmas of 'good governance' are inherent in fisheries governance discourse. A lot of global South countries are confused and often facing pressure from international organisations to shift their management initiatives to the neoliberal 'good governance' forms of governance such as co-management and community management in small-scale fisheries. Although these initiatives are participatory and integrative on paper, they should not be tailor made for every fisherfolk community in the world. They need to embrace the diversity and complexity of fisherfolk communities. As has been put forward by Jentoft & Bavinck (2014: 76), "one size fits all governance solutions are likely to fail given the complexity, dynamics, diversity, and the multiple scales that are involved". The multifaceted problems which occur at the interface of environmental and social systems require approaches that consider many variations of governance arrangements.

However, addressing "governance with holistic lens, like the IG and governability analysis, can help address issues of sustainability" (Kooiman et al. 2008: 7). A suitable position between socio-

economic viability and ecological integrity can be stimulated as government, and other resource users gain an insight about the ecosystems. (Kooiman et al. 2005; Kooiman et al. 2008; Chuenpagdee 2011).

Despite the weaknesses of IG, advanced frameworks are developed, new study concepts are being attached, earlier ones are being reconstructed, "and empirical research on distinct forms of governance is enhancing our understanding of how our increasingly complex, multi-layered, and fragmented societies are governed" (Sorensen & Torfing 2018: 351). As such one of the major objectives of this dissertation is an attempt to develop a conceptual framework for analysing governance in SSF in Norton, Zimbabwe. The next section contextualises the interactive governance theory to the Norton fishing community.

3.3.8 Assessing the applicability of interactive governance theory in the Norton fishing community: Challenges and prospects

IG has been offered academically as a concept and theory to assess SSF, as outlined in several publications such as Kooiman et al. 2005; Bavinck et al. 2013; Jentoft & Chuenpagdee 2015; Jentoft & Chuenpagdee 2019. Proponents of this theory believe that it has more to offer as it is applied to investigate why SSF continue to be neglected despite the recognition of their importance. Furthermore, the proponents are of the view that IG provides a lens – a set of concepts – by which governance challenges can be assessed (Kooiman et al. 2005; Bavinck et al. 2013; Jentoft & Chuenpagdee 2015; Jentoft & Chuenpagdee 2019). But in addition to this, the conceptual frameworks that SSF people apply and the classification they employ to make sense of their world must also be appreciated. Otherwise, governance failure in social, technical, and ethical senses is a likely outcome.

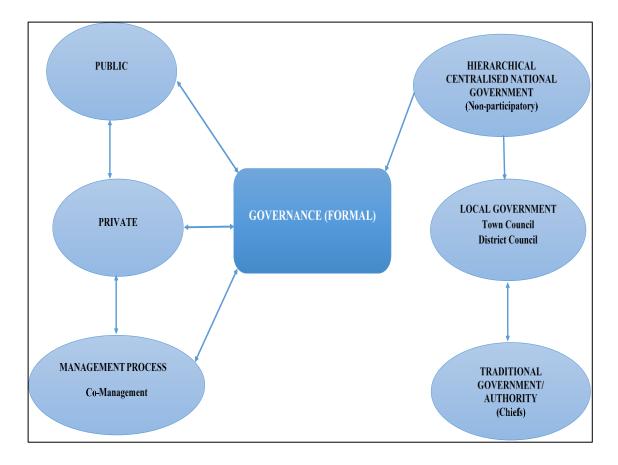
Small-scale fish governance scholars such as Scholtens et al. 2019; Johnson et al. 2019; Bower et al. 2019; and Jentoft & Chuenpagdee 2019 have recently called for a transdisciplinary approach in the governance of SSF. Transdisciplinary research is defined as "research that addresses questions of broad societal interest and fosters integration not only among researchers from different disciplines but also with individuals and organizations from outside academia" (Bower et al. 2019: 342). Thus, involving groups and different actors in an interactive process of problem recognition and problem-solving is the belief for a transdisciplinary approach to fisheries governance. The scholars further argued that good SSF governance calls for transdisciplinary knowledge, which involves more than the general knowledge of natural science and the specialised

knowledge that social science offers (Jentoft & Chuenpagdee 2019). Transdisciplinary science incorporates knowledge of multiple academic disciplines and the ethical and contextually founded 'phronetic knowledge' of stakeholders (Flyvbjerg 2001; Jentoft 2006) whereas transdisciplinary governance is about understanding how the mischievous problems raise concerns that are about social values, on which scientists have no superior authority and are therefore not the only suitable voice. As such, addressing major issues in SSF requires both transdisciplinary governance and transdisciplinary science (Jentoft & Chuenpagdee 2019). Furthermore, it is believed that employing transdisciplinarity via IG processes that move from disagreement to an agreement can result in long-term success (Bower et al. 2019).

This study analyses the varying governance aftermaths under the three modes of governance (cogovernance, hierarchical, and self-governance) using the IG framework's three components which are GS, SG and GI. Such a critical analysis will contribute towards new framings to current governance in Norton and other SSF in Zimbabwe. This study acknowledges the weaknesses of attempting to apply theories from the global North such as an IG theoretical approach to Zimbabwe, which is in the global South. Thus, some concepts are borrowed and, at the same time, other aspects might not be applicable to Norton. Applying an IG approach to Zimbabwe might be difficult in the sense that it mainly focusses on formal institutional arrangements, yet there are also informal institutions that are powerful in the governance and management of SSF especially at a community level. The study further attempted to use IG as a reference point to contribute to theory in arriving at locally grounded solutions to local problems (Bednar & Henstra 2018). The next section envisages the preliminary conceptual framework for Zimbabwe SSF.

3.4 A CONCEPTUAL FRAMEWORK GUIDING THE STUDY

A conceptual framework was formed through an iterative research process, as a means of guiding data collection and analysis. This framework is 'preliminary' as this is how the thoughts and ideas approaching the study is presented. An overview of SSF governance in Zimbabwe was sketched in form of a diagram in Figure 3.3. The diagram was formulated from information gathered through literature review and exploratory fieldwork. The development of this framework is crucial in providing an instrument with which to understand the preliminary data and to further explore, and analyse additional information collected during the research process (Hauck 2009). The framework therefore attempts to highlight the complex political and institutional systems that are operating in Zimbabwe's SSF.



Source: (Author's construct).

Figure 3.3 Preliminary conceptual framework for small-scale fisheries governance in Zimbabwe.

As illustrated in Figure 3.3, the system of fishery governance in Zimbabwe is hierarchical, centralised, and non-participatory (Muchadenyika 2015; Chisango 2017; Utete et al. 2018). Hierarchical governance is a top-down formal style of control which expresses itself in law and policies (Kooiman et al. 2008; Jentoft & Bavinck 2014). From the diagram, the central government through its agency, ZimParks, is the decision maker and orders commands to local authorities such as town councils and district councils. In some cases, the chain of command will also move from local authorities down to traditional authorities such as chiefs. In some instances, there are governance interactions between local and traditional authorities. In other words, the researcher envisaged a formal system of governance where there is a smooth flow of command from top-down arrangement. This formal system will be having a hybrid system of governance where in some instances will make partnerships with private players such as NGOs and SSF in a co-management process, as demonstrated in Figure 3.3.

Interactive governance forms the underpinnings/ foundation of the conceptual framework of this study, but it is crucial to complement it with the Sustainable Livelihood Approach (SLA) to explain the livelihood aspect of the Norton fish communities. Livelihoods in this study have been

integrated as an implication of the broader governance arrangements. Therefore, it is crucial to explain some important aspects of SLA and how they influence governance arrangements. The next section gives a brief description of SLA and its relationship to governance arrangements of SSF.

3.5 THE SUSTAINABLE LIVELIHOODS APPROACH IN SMALL-SCALE FISHERIES

The SLA has had the most significant role globally in informing and framing the debate on sustainable livelihoods in SSF over the last two decades (Stanford et al. 2017; Temesgen et al. 2019). The SLA is influential in contemporary development programs that aim to reduce poverty and vulnerability in communities involved in small-scale fishing, trading, and processing (Allison & Horemans 2006; Reed et al. 2013; Steenbergen et al. 2019). The livelihood approach emanated from studies concerned with understanding the distinctive ability of rural families to cope with crises such as floods and droughts (Chambers & Conway 1992; DFID 1999; Scoones 2009). The SLA is utilised in this study especially in assessing the livelihoods of fisherfolk communities at the household level in Norton. The SLA is also deemed essential in this study because of its emphasis on poverty reduction as well as sustainability issues around livelihoods, which are also critical issues that this study seeks to address.

The multi-dimensional nature of poverty and the relationship between poverty, and vulnerability in fishing communities is increasingly recognised. Allison & Horemans (2006: 758) observe that "fishing communities are often characterised by overcrowded living conditions and inadequate services, low levels of education and a lack of skills and assets (particularly land)...". Comparably the FAO stresses that some fishers live in remote communities, are politically voiceless, and poorly organised (Allison & Horemans 2006). The above assertions demonstrated the continuous exclusion of fishing communities from decision making initiatives with regards to issues such as fisheries related governance policies. What is disheartening is that, despite its contribution to the livelihoods and Gross Domestic Product (GDP) of many countries, the sector is largely ignored and undermined in policy at the expense of large industrial fishing. However, apart from the little attention given to the small-scale sector in terms of research, there is need to recognise the small-scale fishers as agents of their change. Thus, they need to engage as stakeholders and collaborate with other stakeholders in participatory processes. Many governments and policy makers have a tendency of imposing policies on the fisherfolk communities without considering their issues and concerns.

Interpreting and responding to these numerous dimensions of poverty requires SLA. The SLA is applicable in this context as it provides both a set of analytical frameworks and guiding principles (Scoones 2009; Schulte et al. 2013; Steenbergen et al. 2019; Ratner et al. 2018). Apine et al. (2019) concur with this view by asserting that the SLA is a people-centred approach and has been often used as a practical tool to develop programmes with aims such as community empowerment or poverty reduction, yet it also can be used as an analytical tool and as a set of principles. The approach considers four dimensions of sustainability which are economic, social, environmental, and institutional (Steenbergen et al. 2019; Apine et al. 2019). SLA has also been used in livelihoods development related issues. Allison & Horemans (2006) give an outline of the SLA principles as should be shown in the next section.

3.5.1 The sustainable livelihoods approach principles

The core concepts that underlie SLA thinking are summarised by Allison & Horemans (2006). Firstly, the principle given by the authors stressed the need to put people's economic and social activities at the pivot of the analysis. This entails acknowledging that efforts to reduce fishing pressure or allocate rights of access to the poor require governors and researchers to understand more about people than just their 'fishing effort'. Furthermore, there is need to assess the options for management intervention that surpass sectoral boundaries such as fisheries, and pastoralism. Such management initiatives need to include issues affecting all people irrespective of occupation, such as access to social services, and political representation.

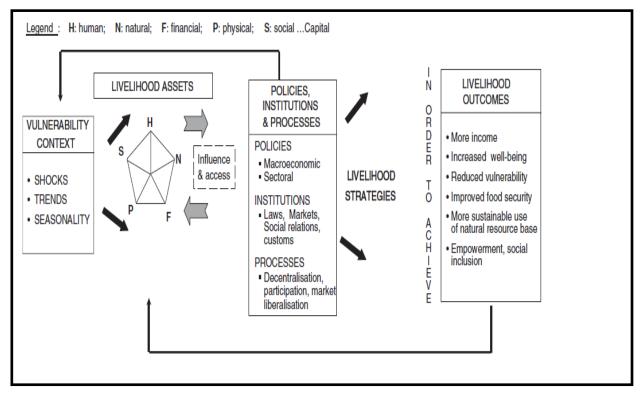
Livelihood procedures further encourage clear consideration of micro-macro links between local issues such as allocation of resources among divergent types of resource-users engaged in fishing. SLA principles also call for partnership arrangements with fishers and various stakeholders in the private and public sectors. The relationship amongst the various sectors needs to be responsive and participatory and acknowledge that fisherfolk communities are dynamic and complex.

Fishers also need to be encouraged to utilise strong initiatives such as indigenous knowledge system, and diverse livelihood strategies in fishing communities. Such initiatives would assist to reduce cases like low incomes, food insecurity, or vulnerable livelihoods (Allison & Horemans 2006). The SLA further acknowledged the dynamism of people's lives and does not view sustainability in fixed terms. Thus, sustainability is regarded instead as the capacity of elements of a livelihood system (such as environment, and institutions) to cope with shocks and adapt to change.

Chambers & Conway (1992) define livelihood as the capabilities, assets and activities required for means of living. They describe livelihood as sustainable if it can cope with and recover from shocks and stress. There are several modifications of the SLA yet all of them are united by common components. These components are assets or livelihood resources, mediating or transforming processes, sustainable livelihood outcomes and livelihood strategies (Scoones 2009; Stanford et al. 2017; Apine et al. 2019). To interpret the complex and evolving processes through which livelihoods are constructed, it is inadequate just to analyse the different aspects. One must also examine the organisational structures and institutional processes that link these diverse elements together. To achieve this, it is vital that sustainable livelihood analysis fully involve the local people to let their knowledge, and perceptions be heard. Detailed elements of the SLA are expanded on the next section on the livelihoods framework.

3.5.2 The livelihoods framework

The livelihood framework brings together activities and assets. The interactions between them are illustrated in Figure 3.4. The economic and social unit considered in the livelihoods framework is the household (Scoones 2009; Stanford et al. 2017). The household is considered to be a social group that stays in the same place, shares the same meals, and makes joint or harmonised decisions over income pooling and resource allocation (Allison & Horemans 2006; Scoones 2009; Morse et al. 2009). However, it is also crucial to recognise distinctions in well-being and access at an intrahousehold or individual level, as well as the community.



Source: Allison & Horemans (2006: 759)

Figure 3.4 The rural livelihoods framework

The most complex of the various components of a livelihood is the portfolio of assets out of which people construct their living (Allison & Horemans 2006). The capital assets controlled, or owned by the household are grouped into five categories. These encompass physical capital (at household level, for example boats, but also, at community, for example, access to infrastructure such as road networks); financial capital (such as credit); natural capital (for example, areas of lakes accessed by licence); human capital (for example, education); and social capital (such as cooperatives) (Ellis 2000; Allison & Horemans 2006; Morse et al. 2009; Apine et al. 2019).

Access to these assets, however, could be hindered or enhanced by organisations, policies, and institutions. The institutions can be customary or formal (Schulte et al. 2013). These policies and institutions involve access rights regimes and how they work or not work (Allison & Horemans 2006; Apine et al. 2019). These are of course at the core of fisheries management. The SLA helps to ensure that any fisheries policy considers the range of resources that people may be able to draw on (Allison & Horemans 2006).

Livelihood sustainability is also influenced by external factors, referred to as the vulnerability context. Vulnerability context comprises of cycles (such as seasonality), shocks, and trends that are beyond the household's jurisdiction (Allison & Horemans 2006; Morse et al. 2009; Apine et

al. 2019). Trends might involve increasing prices for fish, decreasing catch rates, and rising costs of medicines or staple food (Ratner et al. 2018; Steenbergen et al. 2019). Shocks comprise currency devaluations, fuel-price hikes, and theft of fishing nets (Allison & Horemans 2006; Morse et al. 2009; Schulte et al. 2013).

Understanding and interpretation of how people fail or succeed in sustaining their livelihoods in the face of trends, shocks, and seasonality can help to institute policies to assist peoples' coping strategies (Allison & Horemans 2006; Morse et al. 2009). These coping strategies may include diversification into other sectors like agriculture, and improving access to healthcare and education facilities (Allison & Horemans 2006; Steenbergen et al. 2019).

Capital assets allow livelihood strategies to be formulated by households or individuals. Migration and mobility, for example, is a crucial component of many fisherfolk's livelihood strategies (women in the post-harvest sector and men in the catching sector). Strategies can also relate to people's utilisation choices (for example, the sale of assets). Long- and short-term measures to ensure survival are often characterised as 'adapting' and 'coping', respectively (Allison & Horemans 2006: 759). Finally, this framework points to livelihood outcomes. A livelihood is sustainable, for example if people can improve or maintain their standard of living related to income and well-being, and reduce their vulnerability to external trends and shocks (Allison & Horemans 2006; Morse et al. 2009; Schulte et al. 2013; Apine et al. 2019).

The methods and concepts of livelihood analysis have recently been applied to understanding the role that fisheries play in the rural economy of fishery dependent communities in both developed and developing countries to inform policy debates on fisheries management. Fisheries contribute to poverty reduction in the rural economies by providing incomes, employment, food security and other livelihood options. This study will use certain aspects of SLA to understand the dynamics and interactions of governance arrangements and livelihoods in the Norton fishing community. It will also be used to diagnose community livelihood strengths and weaknesses and allow the community to prescribe their own development solutions. Other indicators utilised by SLA may not be applicable in Norton fishing community. The next section outlines the strength of SLA as a framework for understanding community livelihoods.

3.5.3 Strengths of sustainable livelihoods approach

The strength of the SLA is that researchers can select from a range of possible research methods, using non-participatory and participatory approaches, as well as using quantitative and qualitative

data sources (Stanford et al. 2017). This makes the SLA a flexible instrument that can be modified to a given situation. However, this very strength also creates limitations. For instance, a high level of human and resourcing capacity is needed for its execution (Reed et al. 2013; Stanford et al. 2017). Because of these factors, new methodologies are required that continue to capture the diversity and complexity of livelihoods but are also practical, given time and resource impediments (Stanford et al. 2017).

By giving attention to the variety of assets that people utilise when constructing their livelihoods, the SLA approach presents a more comprehensive view on what resources or combination of resources are crucial to the poor (Krantz 2001). Such resources range from natural, physical, to their human and social capital.

Furthermore, the SLA is heralded as a comprehensive conceptual foundation for understanding community livelihoods with a specific capacity for undertaking poverty-reduction through livelihood diversification (Schulte et al. 2013; Stanford et al. 2017; Apine et al. 2019). Stanford et al. (2017: 1012) support this view by maintaining that, "one of the greatest strengths of the SLA is its ability to bring together complex causes of poverty, including elements of empowerment, economic growth, governance, safety nets, vulnerability, human rights, and welfare". Correspondingly, Morse et al. (2009) concurred with Stanford et al. (2017) by asserting that, the SLA considers all characteristics of wealth and poverty simultaneously. It asks not just the number of poor people, but why, to establish the reasons of their poverty. This paints a more perfect picture of why ecosystems become degraded or overexploited, and what such degradation can mean for their human dependent communities (Morse et al. 2009; Schulte et al. 2013).

In addition, SLA aggregates integrated coastal management (ICM) in that it prioritises sustainability of people, rather than ecosystems. The SLA stresses the potentialities and capabilities that exist within resource user communities and focus on government processes, and institutions in contributing to livelihoods (Schulte et al. 2013). Horemans (2004: 232) asserted the participatory, people-centred, and dynamic nature of SLA, adding that the framework was 'holistic', 'responsive', and 'multi-level'. Similarly, Morse et al. (2009) concur by asserting that SLA is people centred and promotes stakeholder participation. Therefore, SLA offers a more pragmatic framework for analysing indirect and direct effects on people's living conditions.

Moreover, by using the FAO Code of Conduct for Responsible Fishing and the SLA framework within Sustainable Fisheries Livelihoods Programme (SFLP), practitioners have addressed issues such as social, and economic needs in Senegal and other 23 countries in West and Central Africa

(Failler & Kane 2004; Horemans 2004). The results have included recognition of the gaps in fisheries policy in Nigeria (Schulte et al. 2013).

More so, the SLA is a valuable approach in SSF management as artisanal fisheries are exposed to uncertainty in terms of demand and supply, and fishing activities are usually influenced by institutional and social factors (Allison & Ellis 2001; Apine et al. 2019). However, despite its usefulness and the fact that this approach has been previously used in projects targeting small-scale fisher communities, it is still not extensively applied to SSF (Allison & Horemans 2006; Schulte et al. 2013; Apine et al. 2019). One of the main challenges why SLA is still not widely applied to SSF is that this approach largely remains as an initiative of donors and is divorced from practical realities of many local development administrations. One procedure to counter act this would be to ensure that counter staff are included from the initial stages when discussing how and if such a strategy should be applied. It is also crucial to train the staff to utilise the approach and start with the elementary version of the approach.

3.5.4 Critiques of sustainable livelihoods approach

The SLA is not without its limitations. Schulte et al. (2013) maintain that the greatest weakness of any participatory social analysis is the dependence on good quality information. Response bias to meet researcher or even respondent expectations may be unavoidable when dealing with concepts such as natural resource management, and poverty. More so, the constructivist argument maintains that there are layers of knowledge and reality which entail that each actor assess reality through his or her lens. A result of this will most likely subject a researcher to a perception of the local context (Schulte et al. 2013).

Despite the wide acceptance of SLA by many scholars, it is still criticised due to its avoidance or ignoring of some important issues. The main weakness of SLA is its inability to address the political, social, and institutional processes (Scoones 2009). It downplayed the role of institutions, and structures and placed emphasis on the activities of the household (Sarker et al. 2019). SLA generally analyses the livelihood condition at household level, which is a key to local level but less concentration to connect with national and international levels. Furthermore, SLA does not demonstrate on the significance of political economy structural forces which are necessary to examine the dynamic and complexity of rural livelihoods and resilience.

Although all capital assets are replaceable in the SLA framework, proponents of 'strong sustainability' foundations argue that for a livelihood to be truly sustainable, it must maintain

essential levels of natural capital (Ekins et al. 2003). However, besides the term 'sustainable', a key term of SLA, has not been properly well defined on terms of variable local condition (Sarker et al. 2019). SLA cannot provide solutions to some questions such as on the actual beneficiaries of sustainability and whose reality is to be addressed. These questions are pivotal in dynamic vulnerability contexts. SLA is very much improved and applicable only for reducing poverty in relatively stable contexts. One of the major weaknesses of SLA is on how to tackle sustainability in the dynamic vulnerability context where livelihood assets are continuously hindered with environmental factors (Sarker et al. 2019). Therefore, SLA is a fundamentally outcome-based approach which cannot undertake the related capacity and processes. It gives priority only on short-term dynamics rather than long term ones, which lessen the ability to tackle the vulnerability context of livelihood.

Despite the inclusive and rounded approach of projects such as the SFLP, key challenges for practitioners and researchers remain, including corruption, centralised governance, rights and access allocation. (Schulte et al. 2013). This entails that, researchers have a role to play to include all factors which affect the day to day running of SSF. Addressing their issues and concerns with regards to governance related matters (customary rights, rules and regulations) and all the challenges they are facing under the weak centralised governance arrangements. Issues of kleptocracy and nepotism also needs to be highlighted. All these aspects demonstrate that small-scale fisher related matters are complex and they can not only be addressed under the livelihood lens. Nevertheless, despite the limitations, the SLA remains a practical tool for bridging the gaps between practice and policy through the participation of natural resource-dependent fisherfolk communities (Schulte et al. 2013). What is crucial is to ensure that the policy initiatives align with people's livelihood strategies and make them better at responding to the opportunities and constraints affecting the poor.

3.6 CONCLUSION

This chapter focused on the theoretical framework adopted for the study. As background to the theory, the concept of governance underpinning the study was unravelled, demonstrating that governance in this study does not equate to government but it is about the processes of making decisions, and often by actors other than the state. It also critically assessed the neoliberal concept of 'good governance' and questions the indicators used to determine whether the system of governance can be termed 'good governance' or 'bad governance'. The chapter demonstrated that such terms need to be used with cautions as some of the terms were developed in the global North

countries to suit their contexts which might not be applicable in the global South countries. The chapter revealed that the so called 'good governance' system of administration are contributing to civil wars and conflicts in some African countries, although other factors like corruption also play a part.

After discussing the dichotomies between 'good' and 'bad governance', the chapter explored the IG theory, examining the different components, elements, interactions, modes, orders and actors it emphasises within a fisheries perspective. The chapter argued that IG framework will be used as a reference point to develop a conceptual framework suitable for Norton SSF. One of the reasons for using IG approach being that it has broader applicability and has been widely used in capture fisheries and aquaculture. However, the chapter also acknowledged the weaknesses of the IG approach, which included its failure to locate power dynamics in SSF. Furthermore, the interactive approach mainly focusses on the formal governance arrangements and does not pay attention to informal arrangements which also play equal roles with the formal arrangements, especially in weak centralised formal governance arrangements.

The chapter outlined a preliminary framework for SSF in Zimbabwe. The framework was developed from information gathered from literature review and preliminary exploratory fieldwork visit. The preliminary framework reveals that the system of fishery governance in Zimbabwe is hierarchical (formal) and non-participatory. It also assumed that there was interaction of actors between government, small-scale fishers and NGOs in terms of decision making and other conservation related matters. Whether, this interaction of actors existed in Norton, Zimbabwe or not, was one of the main research questions of the study as will be revealed by the empirical data. The assumptions of existence of informal actors in the study coupled with the weaknesses of IG approach demonstrated the need for the development of an updated conceptual framework as the main aim of this study. The chapter therefore highlighted the need for revisions from the preliminary framework to the updated framework.

Interactive governance was also viewed within the context of the SLA since the study focuses on how governance issues in fisheries affect livelihoods. Therefore, IG approach was complemented in this chapter to explain the livelihood aspect of the Norton fish communities. Livelihoods in this study have been integrated as an implication of the broader governance arrangements. Thus, the chapter presented some important aspects of the SLA and how they influence governance arrangements. It also demonstrated that SLA as a holistic conceptual framework has the ability to bring together complex causes of poverty, including elements such as governance. However, the main limitation of SLA is its inability to address the political, social, and institutional aspects. The

chapter therefore highlighted that although IG approach and SLA can play complementary roles in trying to analyse the governance and livelihoods aspect in Norton SSF. It is crucial to understand the fisher's issues, concerns, and perceptions in order to come up with locally grounded solutions to local problems. The following chapter give context to the evolutional fish governance policies and processes which were instituted from pre-colonial to post-colonial independent Zimbabwe.

CHAPTER 4: SMALL-SCALE FISHERIES GOVERNANCE IN ZIMBABWE

4.1 INTRODUCTION

This chapter examines the governance and management of small-scale fisheries in Zimbabwe to give context to the evolutional fish governance policies and processes which were instituted by the post-independence Zimbabwean government. It describes and characterises Zimbabwe's main water bodies and the most common fish species found on the small water bodies (SWBs) and lakes. It also explores the contribution of the water bodies and fish to the livelihoods of the people. The chapter further traces the governance system from the pre-colonial period to the post-colonial period where traditional authorities used to contribute to the management of fish resources. A snapshot on pre-colonial fish governance arrangements is crucial in highlighting the indigenous traditional leadership arrangements and cultural rights which existed before the colonial period. The post-independence government inherited the colonial governance system despite efforts to revisit some of the policies especially on access rights. Zimbabwean government, just like many other African post-independence states, instituted several policies of transferring access rights to formerly disadvantaged black people. However, among other reasons, the country faced challenges of achieving total economic emancipation from former privileged white settlers. The chapter also discusses the government's intervention through socialist policies, black empowerment, redistribution through the market, the effects of the Economic Structural Adjustment Programme (ESAP), and radical transformation through Land reform, and how these policies influenced fisheries governance in Zimbabwe. The next section explores the background of natural resources management in Zimbabwe from pre-colonial to colonial period.

4.2 BACKGROUND TO NATURAL RESOURCE MANAGEMENT IN ZIMBABWE

Traditional authority in Zimbabwe symbolises the earliest and most buoyant community based natural resource management initiative which is commonly known as organic CBNRM (Mawere et al. 2014; Nyikahadzoi et al. 2017). Yet, with the advent of colonialism and the resultant Western biased post-independence states, there has been an inclination to side-line traditional authorities in issues of management of natural resources in rural communities (Mawere et al. 2014). Most post-independence states in Southern Africa introduced externally led decentralisation policies that have been regarded by many local communities as a threat to indigenous natural resources management (Mawere et al. 2014). This is because, in indigenous societies, conformity to natural

resource use was regulated through traditional values and norms which the colonialists despised and relegated to the periphery as irrational and unscientific (Mawere et al. 2014). It should be noted that decentralisation introduced a new politics of governance in the rural areas of Zimbabwe, especially the power arrangement in management of natural resources (Nyikahadzoi et al. 2017). Contestation, voice, and power were at the centre of environmental governance in Zimbabwe. The next section explores the natural resources management in the pre-colonial era. This history is crucial in exposing the indigenous cultural fish rights before the advent of colonialism.

4.2.1 Pre-colonial

The background of natural resources governance in Zimbabwe can be traced back to the colonial period when the country had resources which captivated many outlanders including the likes of Robert Moffat (Chigwenya & Manatsa 2007; Mapira & Mazambara 2013). This era dates back to the pre-1890s when traditional customs were the prime natural resources management systems in the country (Chigwenya & Manatsa 2007; Mawere 2013). The traditional authority and beliefs formed the institutions that were responsible for natural resources management. The Chief assumed leadership of the community, was the custodian of traditional values, and had land allocation powers (Chigwenya & Manatsa 2007; Makanyisa et al. 2012). In relation to management of natural resources, there were traditional practises and systems that helped to preserve natural resources. There were areas which held social and religious values and these areas were stringently safeguarded. These areas included various shrines, pools, and sacred grooves (Chigwenya & Manatsa 2007; Mawere 2013). "Sacred pools played a very crucial role in the conservation of Wetlands while sacred grooves and shrines were responsible for forest conservation" (Chigwenya & Manatsa 2007: 103). They formed a manifestation of concepts and ideas that were able to be produced and reproduced into a set of practices that formed the pillar of natural resource management and customary rights, which had both substantive and procedural rights (Katerere 2001).

The local community had indigenous knowledge that was characterised by deep principles of moral being, which were spiritually based (Dore 2001). It was these morals that formed the foundation of management of natural resource in the pre-colonial period. They developed taboos and cultural beliefs that formed the underpinning for natural resource management. The whole aim of forming and sustaining taboos was, "meant to ensure that immoral behaviour towards the environment was monitored" (Makanyisa et al. 2012: 13). These taboos and beliefs therefore formed etiquette of behaviours that ensured sustainable natural resource utilisation (Chigwenya &

Manatsa 2007; Mawere 2013). In this set up, the founding spirits and ancestors were the custodians of wildlife and natural resources and their utilisation was expected to be done in line with the agreed codes of behaviour that differ from society to society. Societies, religious sanctions, and social conformity fostered compliance to natural resource management regimes. Any contravention of these codes of behaviour was said to instigate some disasters such as famine and droughts (Chigwenya & Manatsa 2007). These informal institutions have been flawless for many decades and managed to control natural resource utilisation including fisheries in Zimbabwe.

People used their resources sustainably even though their whole livelihood survived on natural resources. They used their environment for food, and raw materials for weapons. Although indigenous people's diet depended mostly on meat and fish catching, these resources were utilised sustainably (Murombedzi 1990). Not all animals were hunted as some animals were considered to hold special societal values and hence were not hunted. For example, one was not allowed to hunt animals of his totem. Therefore, as mentioned by Murombedzi (2003), the hunting did not negatively affect big game even though wildlife products comprised important commodities.

Murombedzi (2003) argues that some of these pre-colonial ethnology and environmental management practices were so deep-rooted in the lives of indigenous people that they survived long into the colonial period because of their continued applicability in conservation of natural resources. The next section discusses the natural resources management policies in the colonial period.

4.2.2 The colonial period

The colonial era in Zimbabwe dated back to 1890 when the British South African Company (BSAC) was formally accorded the Royal Charter of union from the British government (Chigwenya & Manatsa 2007). The central characteristic of the colonial government was dispossession of land from the locals. The expropriation of land resulted in displacement of local people from their land into poor fertile soils called reserves. "The population in the reserves increased to unbearable levels and the signs of environmental degradation started to show in the early 1900s" (Chigwenya & Manatsa 2007: 106). The emergence of environmental degradation in the reserves was received with different perspectives between the settler whites and blacks. The white attributed it to poor farming methods such as lack of crop rotation whilst blacks were condemning it on the inadequacy of land (Nyikahadzoi et al. 2017).

The growing environmental degradation led to the promulgation of the Land Apportionment Act (LAA) of 1930. The Act endeavoured to battle with the challenges of soil erosion and advances in African agriculture. This was, however, a perspective from the privileged white settlers. In contrast, Africans were cautious about the environment as was demonstrated by their methods of farming, which included shifting cultivation (Makanyisa et al. 2012). As such, to argue that Africans lacked soil conservation methods showed ignorance and enlightenment of the Zimbabwean history. Prior to this, the state had made efforts to conserve the environment through enacting various statutory instruments, but this was not meant to assist the communal areas. The state's main focus was on alienated lands. The first of such attempts was the passing of the Game Law in 1886 which was meant to regulate, "the utilisation of wildlife through issuing of licences and permits to privately owned land" (Murombedzi 2003: 8). The law also aimed to reduce the growing export of game and prohibit commercialisation of the same (Murombedzi 2003; Chigwenya & Manatsa 2007).

The colonial government however showed their willingness to manage natural resources in 1929 when they instituted the Game and fish Act. "The Game and fish Act of 1929 was meant to preserve and give protection to game and fish and further protected certain fauna of Southern Rhodesia for educational purposes" Malasha 2002: 4. It was in this new act that there was a direct authority to the way fisheries resources were to be exploited in Southern Rhodesia (SR) (Malasha 2002). More so, it was in this act that a section dealing with fishing was also comprehended. The section on fish in the act restrained the use of cast, drag, and other nets, and provisioned that any unregulated sized fish shall be returned to the water. The act also embargoed the use of chemicals or dynamite, and fishing without a licence (Malasha 2002). The Act further centralised the issuing of licences to the Ministry of Agriculture. These restrictions on hunting methods marginalised Africans' access to fisheries or game, just like any other regulations on natural resources. Most Africans could not afford to obtain the required licences and did not have resources to utilise the required fishing methods.

In 1938 the Game and Fish Preservation Act was transformed to the Game and Fish Amendment Act. "These amendments were a result of strong pressure that was being put on government by associations with an interest in angling; sport and fly-fishing that wanted direct government funding for their activities" (Malasha 2002: 17). Institutions such as the Flyfishers Association of SR persuaded the state to offer financial assistance to angling clubs that wished to import alien fish species from outside the country. The society also asked for more powers to control the manner in which the alien species were harvested and stocked (Malasha 2002).

Malasha (2002) noted that, in SR, the evolution of fishing rules was pushed more by clubs, associations and individuals with an interest in sport fishing than government initiative. The government's participation in the industry was not as visible as was the case in Northern Rhodesia (NR). The minimal involvement of the government was as a result of the various reasons which included the assumption that the agricultural sector was well advanced and able to supply affordable food products (such as beef) to labour. Another reason was that fish demand, especially for the large immigrant community in the farms and mines, were met through importation from Northern Rhodesia and Nyasaland (Malasha 2002). SR, NR and Nyasaland were under a Federation government and the Federation administration offices were situated in SR.

A succession of other Acts were enacted in the following years such as the "Parks and Wildlife Act (1949), Natural Resource Act (1942), Forest Act (1948), Parks and Wildlife Act (1975)" (Makanyisa et al. 2012: 179). The Department of National Parks and Wildlife Management assumed responsibility for all fish research in the country in 1966. Despite the proliferation of these acts the issue of sustainable resource utilisation remained unsolved (Chigwenya & Manatsa 2007; Nyikahadzoi & Zamasiya 2012). The failure can be ascribed to the command-and-control approach which was used by the colonial government. The approach had limited contribution in policy making by the communal people. This meant that the management of natural resource initiatives were not participatory and people centred. They lacked common vision, community involvement, and they were characterised by conflicts between government and local people (Mawere et al. 2014; Nyikahadzoi et al. 2017).

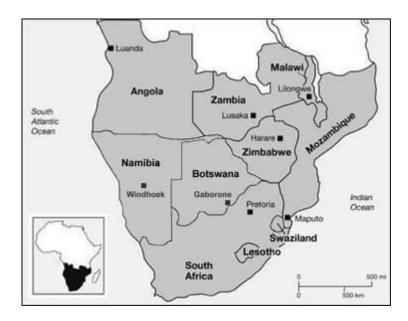
The allocation of natural resources by the colonial government contributed to the advent of elements of open access system to natural resources. Individuals begin to invade the commons because they felt that they were entitled to benefit from the resources by virtue of being the indigenous inhabitants. People protested and resisted the laws and regulations in various ways which included poaching and destruction of infrastructure such as fences (Nyikahadzoi & Zamasiya 2012; Nyikahadzoi et al. 2017).

African fishing methods were undermined on the basis that they were unsportsmanlike and destructive. The priority on sport angling was based on the assumption that the diet of the white settlers was diversified to the extent of not making fish a staple. Instead, fishing was to be supported as a sport (Malasha 2002). Generally, it was recommended by the colonial government that the fisheries policy was to put attention on sport fishing to attract tourists. "African fishermen were accused of using explosives and throwing remnants of bees' dregs and poisonous plants into the water and catching out all sizes of the fish" (Malasha 2002: 19). These methods, as was

stressed, did not afford fish a 'sporting chance' and hence needed to be prohibited. These views however, largely disregarded the importance of fish as a means of incomes and food security for most of the indigenous African fishers. They merely strengthened the preconception of the settler-people towards local fishing methods. African fishermen were further undermined as most of the water bodies were on National Parks or private lands. Existing land tenure system and legislation made it almost inconceivable for local people to access these water bodies for purposes of fishing. However, other non-white races such as Asians were treated much better (Malasha 2002; Nyikahadzoi et al. 2010). The next section gives an account of state intervention in the management of fisheries. It locates and characterises Zimbabwe's main water bodies and demonstrates their importance to the food security, incomes, and livelihoods of the people.

4.3 LOCATING AND CHARACTERISING ZIMBABWE'S WATER BODIES

Zimbabwe is a land-locked southern African country surrounded by neighbouring countries such as Botswana, and South Africa. The country occupies the terrain between the Limpopo and Zambezi rivers (Shizha & Kariwo 2011; Magidi 2018). Zimbabwe is a member of the Southern African Development Community (SADC). The following map locates Zimbabwe within Southern Africa (Figure 4.1).



Source: Mupfuvi (2014: 44)

Figure 4.1 Zimbabwe within Southern Africa

"There are over 10,000 dams in more than 60 District Council jurisdictions in Zimbabwe with most of them holding a net capacity of more than 1,000,000 m3 of water each" (Chisango 2017: 19. The availability of freshwaters has led to an increase of the spreading of capture fishery activities of varying scales along the country's major lakes, dams, and rivers (Chisango 2017). Five major reservoirs in the country with notable commercial fish stocks for capture fisheries and aquaculture are namely, Kariba, Manyame, Chivero, Mazvikadei and Mutirikwi. Ponds, rivers, and smaller dams provide fish for subsistence purposes. The largest fisheries are however on Lake Kariba, which contributes to almost 90% of the country's fish production (Chisango 2017). Lake Kariba is often referred to as the powerhouse of Zimbabwe's fisheries (FAO 2016).

Lake Kariba supports a semi-industrial and an open water commercial (industrial) fishery that exploits Tanganyika sardine *Limnothrissa miodon* locally known as Kapenta fish, and bream fishing (Nyikahadzoi & Raakjaer 2009; Nyikahadzoi et al. 2010). Chisango (2017: 19) established that, "there are over 130 fish species in Zimbabwe recorded from river systems such as Limpopo, Zambezi, Pungwe, and Save-Runde". From the recorded fish species, about 41 species were documented in Lake Kariba. However, Zimbabwe has limited fisheries output despite the existence of many dams. As such, a collaborative effort to promote fish production is crucial if Zimbabwe is to expand its annual production. The next section highlights the small water bodies, most of which are found in Zimbabwe's communal areas.

4.3.1 Small water bodies in Zimbabwe

Zimbabwe's communal areas are well-endowed with small water bodies (SWBs) that can be used to improve the livelihoods of the poor living in those areas. According to Nyikahadzoi & Zamasiya (2012), Zimbabwe has over 12000 SWBs of which 40% are in communal and resettlement areas where 90% of the poor people live. The distribution of the SWBs is such that on average, people have to travel less than three kilometres to the nearest one. The proximity and accessibility of these water bodies to many rural people makes them the only most valuable source of the much-needed animal protein for communities living around them (Nyikahadzoi & Zamasiya 2012). Having realised the importance of SWBs in promoting sustainable food security and livelihoods, the Zimbabwean government embarked on a number of strategies to increase fisheries productivity. Such strategies included stocking or restocking some of the SWBs (Nyikahadzoi & Zamasiya 2012).

Initially, fishing was not regarded as a full-time activity by the communal people. During the farming season, there was a shift of labour from fishing to farming and gardening. Fishing was mainly for subsistence, and they could subsidise their diet with other protein-rich foods such as termites, caterpillars, and grasshoppers (Nyikahadzoi & Zamasiya 2012; Mawere 2014). Fish caught was largely for household consumption. Evidence shows that fishing was not for profitmaking as is currently the case in Lake Kariba and other lakes in Zimbabwe (Nyikahadzoi et al. 2017).

However, with the advent of colonialism and post-colonial states which inherited the colonial administrations, traditional fishing methods changed. The Zimbabwean government inherited the Rhodesian (colonial) government's fishing methods such as the use of "boats with inbuilt buoyancies", in accordance with the Inland Waters Shipping Regulation Act of 1971(Nyikahadzoi & Zamasiya 2012: 55). However, the cost of these boats, which was estimated to be US\$ 800, forced the fishers to resort to inflated tubes or dugout canoes, and by so doing, violating the shipping regulation act. The use of these 'modern' fishing methods is criticised for causing depletion of fish resources by scholars who subscribe to indigenous knowledge systems.

Fish was regarded as a communally owned resource and the resource was well-managed by certain well-defined communities with institutions for regulating the use of the common (Nyikahadzoi & Zamasiya 2012). The community had a common purpose in protecting the fish resource. For instance, they were against the use of destructive and unselective gear. People using such gear usually used to fish at night. It should be noted that although fishing in these SWBs was not restricted, there was no evidence of over-exploitation. Communities were promised unlimited access to these resources just after independence up until the Agricultural Research and Extension (AREX) department came to reorganise fishing (Nyikahadzoi & Zamasiya 2012; Mawere et al. 2014; Chisango 2017). The next section highlights the level of state engagement in small water bodies.

4.3.2 State intervention in the management of small water bodies.

The disenfranchisement of chiefs in the post-colonial period in Zimbabwe left a power void in the management of natural resources in rural areas. Traditional institutions are not legitimised in natural resource management despite being community leaders (Mawere et al. 2014; Nyikahadzoi et al. 2017). "Disempowerment came partly as a way to decentralise resource management, ensuring even development in rural communities" (Mawere et al. 2014: 2). The Zimbabwean

government had laid the foundation for a decentralised natural resource managed through the formation of Village Development Committees (VIDCOs⁷) and Ward Development Committees (WADCOs⁸), but still faced challenges of integrating communities as part of management processes. The process was initiated by the 1984 decree on decentralisation as part of the process of community-based management/ governance (Nyikahadzoi & Zamasiya 2012; Mawere et al. 2014). According to Herlaar & Olthof (1994: 14), "the VIDCO-WADCO source of planning was meant to promote a bottom-up approach where local people were supposed to actively engage in the selection of the village and ward plans". Some critics such as Hammar (2005) quoted by Mawere et al. (2014) criticised VIDCOs and WADCOs for being used as the ruling party's (ZANU-PF) committees instead of being committees to spearhead development and democracy in rural areas.

However, despite the efforts by the government to initiate community-based governance, the formation of contemporary institutions namely WADCOs and VIDCO became a major source of conflict at the village level as they were interpreted by traditional authority as grabbing their power. Much as policy frameworks to re-install traditional leadership such as the Traditional Leaders Act (1998) have been put in place, these legal instruments ironically do not represent traditional leadership as they duplicate interests and roles of rural district councils (RDCs) and ZimParks (Mawere et al. 2014). For that reason, communities felt that the post-independence government, just like the colonial establishment, has taken over their resources, compromising their livelihood strategies.

According to Nyikahadzoi & Zamasiya (2012), local level traditional institutions' governing resource use were not readily visible to the state officials in Zimbabwe and the state took over the control of SSF. The Zimbabwean government delegated the management responsibilities to local authorities (RDCs) for all fishing grounds adjacent to communal areas and entry into the fishery was controlled (Nyikahadzoi et al. 2017).

Local authorities relied on the Fisheries unit of the Livestock Production Department (LPD) for scientific expertise and technical guidance. Assessments were carried out by the Fisheries unit to determine the number of gillness to be allowed. A licence system was to be introduced which

⁷ "VIDCO is the lowest level of government administration in the rural areas comprising only of one village and a total of about 100 households" (Mawere et al. 2014: 2).

⁸ WADCO is made up of six or more villages (Mawere et al. 2014).

meant that access and management rights of SWBs were given to an identifiable group of people (Nyikahadzoi & Zamasiya 2012; Nyikahadzoi et al. 2017). Each group was supposed to have 12 people, and the licence was restricted to a specific water body. Licences were to be issued to people with historical and traditional fishing rights to the SWBs and were to be renewed annually. Licences issued to a group were collectively owned and stipulated the number of nets to be used depending on the estimated size of the fish biomass (Nyikahadzoi & Zamasiya 2012). However, from several studies conducted at Siya dam fishing group in Zaka, and Gache at Lake Kariba, all fishing groups visited had difficulties in obtaining the fishing licence and none of those who have acquired the licences had successfully renewed them (Nyikahadzoi & Zamasiya 2012; Mawere et al. 2014). Therefore, the tedious application process and issuance of licence forced other fishing groups to illegally use gillnets.

Fishing nets of three inches and above were to be bought from a registered dealer to make sure that only licenced fishers had access to gillnets. Furthermore, the dealers would sell the nets to people with a valid fishing licence only (Nyikahadzoi & Zamasiya 2012). It should be noted that the main emphasis of fisheries management in the SWBs fisheries was promoting gill netting. The thrust was on organising communal fishing groups and encourage them to undertake legal fishing to ensure that conservation measures were followed (Nyikahadzoi & Zamasiya 2012). However, to avoid poaching, members of the fishing group were drawn from the community. The assumption was that poachers would not want to threaten the resource base on which their fellow community members depended for their livelihoods.

However, there was reluctance among fishing groups to self-police and exclude others from the natural resources. For instance, a fishing group in Siya dam maintained that fear of witchcraft and losing important social relations made it impossible to self- enforce the management regulations (Nyikahadzoi & Zamasiya 2012). Although the groups were expected to be financially sound, ready to invest money, and manage its finances well, all fishing groups were advised to keep their operations small and not to invest in freezers, or other capital-intensive investments (Nyikahadzoi & Zamasiya 2012). The requirement was meant to discourage the emergence of a profit motive, which has been blamed for overfishing and the collapse of many fisheries, and natural resources.

Furthermore, communities around the SWBs were assisted to form dam management committees (DMCs) and to formulate fishing by-laws. The committees were also expected to fulfil all functions of resource management such as controlling entry and determining how much and what kind of fish to harvest. They were also required to "regulate fishing gear, extracting resource rent if desired, and distributing benefits to community members if they wished" (Nyikahadzoi &

Zamasiya 2012: 52). More so, these communities were responsible for enforcing compliance with management regulations. DMCs worked as a sub-committee of a ward conservation committee, which was in turn accountable to the rural district councils. This, however, suggests that DMCs were just conduits through which top-down, centralised, and non-participatory directives were channelled from the state machinery to local level resource users. This entails that traditional leadership was left out of the management process. The next section interrogates the impact of state intervention on SWBs.

4.3.3 Impact of state intervention on small water bodies

Community leaders alleged that the selection of people eligible for fishing licences was marred with favouritism. They argued that the issuing of fishing licences to a few members of the community created a situation whereby those who had access to the fish became wealthier than others. Those who were excluded developed several strategies to access fisheries resources. Nyikahadzoi & Zamasiya (2012) maintained that women and other excluded members of the community used cheap but highly unselective and destructive gear, such as mosquito nets, that are relatively easy to access and operate. Perhaps the use of mosquito nets was a vengeful strategy to demonstrate against the authorities who favoured a clique at the expense of the poor majority (Platteau 2000).

Gillnets, required as per the Parks and Wildlife Act of 1975 stipulation, which were to be procured from registered dealers proved to be expensive. A study Which was conducted at the Siya dam in Zaka showed that it would take almost six months of fishing without the group sharing profits to raise US\$120, which was a price for a net (Nyikahadzoi & Zamasiya 2012). The cost of nets thus forced many groups to resort to cheap locally made nets which were less than three inches in mesh size, thus violating the minimum mesh size requirements. The next section explores the different evolutionary fisheries governance processes taken by the Zimbabwean government from the euphoric period (period after the independence of Zimbabwe in 1980).

4.4 EVOLUTION OF THE FISHERIES GOVERNANCE IN ZIMBABWE (POST-INDEPENDENCE)

It is crucial to understand the governance system in Zimbabwe and the evolution of the policy process that informs it. Zimbabwe, at independence (1980) "faced the challenge of eliminating extreme inequalities generated by discriminatory regulations created during the colonial era,

without compromising the integrity of the resource" (Nyikahadzoi & Raakjaer 2009: 639). The transformation from colonial to independence Zimbabwe was marred with conflicts between policy debates amongst political and economic interest groups (Nyikahadzoi & Raakjaer 2009; Nyikahadzoi et al. 2010; Nyikahadzoi et al. 2017). The fishing industry was predominated by whites who had access to financial capital (Nyikahadzoi & Raakjaer 2009). One of the incumbent government of Zimbabwe's tasks was a redistribution of rights from the established, mostly whiteowned companies to emerging black entrepreneurs, and revamping governance of the fisheries sector in line with the new political orders (Nyikahadzoi et al. 2010). However, "during the first 10 years of independence, the government was more concerned with national food security issues than correcting racial imbalances" (Nyikahadzoi & Raakjaer 2009: 642). After independence, the Zimbabwean government borrowed the socialist ideologies from Russia which was influential in supporting the liberation struggle. The next section summarises the socialist approaches in small-scale fisheries taken by the government.

4.4.1 Socialist approaches

The government of Zimbabwe embarked on a succession of policies embraced at independence to redress the imbalances. The government adopted an adaptive management approach "where fishing licences were issued progressively and the effect on the biomass was carefully monitored" (Nyikahadzoi & Raakjaer 2009: 640). White operators benefited from the awarding of licences before independence. However, the cooperative system instituted by the Zimbabwean government after independence became a new way of awarding licences especially to war veterans. (Nyikahadzoi & Raakjaer 2009; Alexander & Chitofiri 2010). Thus, at independence in Zimbabwe, 12 of the 20 licenses for redistribution were issued to cooperatives and the remainder were given to persons with high-level political connections (Nyikahadzoi et al. 2010). Cooperatives were preferred to extend socialist and popular democratic participation in the ownership and management of natural resources (Nyikahadzoi et al. 2010). Most of the cooperative members were privileged individuals and groups linked to the ruling party, ZANU-PF, partly as political patronage. These included war veterans, politicians, and ex-detainees (Nyikahadzoi et al. 2010; Nyikahadzoi & Raakjaer 2014). The existence of cooperatives was also acknowledged by Kupaza et al. (2015) in their study of Lake Chivero. However, "white domination within the fishing industry continued well into the mid-1980s as black entrepreneurs were finding it difficult to set up fishing companies" (Nyikahadzoi & Raakjaer 2009: 641). This status quo is discussed by Nyikahadzoi & Raakjaer (2014) who maintain that the redistribution of access rights or fishing licences is a major management issue in Zimbabwe. The Zimbabwean

government did not only engage in socialist approaches but considered many redistribution policy options, which include redistribution through the market.

4.4.2 Redistribution through the market

The redistribution through the market was premised on willing buyer willing seller bases. The Zimbabwean government adopted the Lancaster House land settlement guidelines to redistribute rights of access from whites to blacks since there was no specific policy dealing with fisheries (Nyikahadzoi & Raakjaer 2009). The Lancaster House agreement provided a constitution for post-colonial Zimbabwe in 1980 (Nyikahadzoi et al. 2010). "Under this arrangement, a willing buyer was supposed to acquire one of the specially developed fishing vessels (rigs) from a willing seller through the market" (Nyikahadzoi & Raakjaer 2009: 641). This resulted in the government awarding a fishing licence to the new owner (Nyikahadzoi & Raakjaer 2009; Nyikahadzoi et al. 2010). Access rights were to be transferred to new entrants on condition that they were ready to take over operations from previous owners of the rigs. This process was meant to ensure stability in the employment and catch levels (Nyikahadzoi & Raakjaer 2009; Nyikahadzoi et al. 2010).

The redistribution through the market was meant to retain some skilled whites to train new black entrants and to ensure stability in the fish industry. However, according to Nyikahadzoi et al. (2010), a small white privileged class continued to have monopoly over fisheries a decade after independence because the state was not active in the redistribution of access rights in the sector. This, "reflected an unchanged legacy of the colonial rule" (Nyikahadzoi & Raakjaer 2009: 642). After facing challenges on redistribution through the market, the post-independence government embarked on an Economic Structural Adjustment programme (ESAP). The next section details the effects of the ESAP.

4.4.3 Effects of economic structural adjustment programme (ESAP) on small-scale fisheries

The slump of communism by the end of the 1980s forced the renunciation of socialist policies. At about the same time the Bretton Woods Institutions, (the World Bank, and the International Monitory Fund) forced the introduction of the Economic Structural Adjustment Programme (ESAP) in Zimbabwe (Nyikahadzoi & Raakjaer 2009; Nyikahadzoi et al. 2010). ESAP was introduced to limit the state's control of economic and social development and allow free market economy. The government was entitled to trade liberalisation and market deregulation. It was

believed that ESAP would lead to economic growth, job creation and poverty reduction (Isaacs et al. 2007; Nyikahadzoi et al. 2010). The emphasis was on free market to control the issuance of access rights. However, the restructuring of the fishing industries through ESAP was not successful. "Rather it benefited the existing, established (white-owned) fishing companies more than the new entrant (mainly black-owned) fishing companies" (Nyikahadzoi et al. 2010: 671). Failure of the new entrants to benefit from ESAP resulted from issues such as lack of financial support, skills, and collateral for loans. The next section analyses the black economic empowerment policies which were instituted by the Zimbabwean government to facilitate the transfer of access rights from the former privileged white settlers to disadvantaged black people.

4.4.4 Black economic empowerment policies in small-scale fisheries

In efforts to make amends for the shortfalls of the market, the government of Zimbabwe instituted "Black Economic Empowerment (BEE) policies that sought to bring about significant increases in the numbers of black people that manage, own, and control the country's economy, as well as ensure significant decreases in income inequalities" (Nyikahadzoi et al. 2010: 672). The BEE had to address four crucial concerns that included the provision of capital to support black empowerment, promotion of employment equity, and forced reallocation of licenses in Zimbabwe.

South Africa, just like Zimbabwe, also introduced these affirmative action programs. In both countries, one of the most crucial elements of the BEE initiatives has been the motivation to give financial assistance to the historically underprivileged. For example, Zimbabwe, intended to offer these credit facilities through financial intermediaries such as Small Enterprise Development Corporation (SEDCO) (Nyikahadzoi & Raakjaer 2009; Nyikahadzoi et al. 2010).

However, although the funding was available, traditional fishing companies opted selling shares to promote black ownership. "The shareholding approach increased black ownership, but not to the extent the two governments would have desired" (Nyikahadzoi et al. 2010: 673). As part of the Affirmative Action initiative, Employment equity was utilised to offer top management positions to blacks, most of whom lacked genuine management decision-making powers. As such, after facing challenges from the implementation of ESAP and other policies, the government resolved to radically redistribute the access rights.

4.4.5 Radical redistribution of access rights

Radical redistribution of access rights to natural resources in Zimbabwe was initiated through the fast-track land reform programme (FTLRP) in 2000 (Alexander & Chitofiri 2010; Nyikahadzoi et al. 2010). The revised constitution allowed the government to expropriate land and other assets without compensation (Nyikahadzoi et al. 2010). However, the FTLRP is one of the factors that contributed to the collapse of the Zimbabwean economy, although it is a debatable issue to date.

Radical approaches were also introduced by the government in the fisheries sector to acquire fishing licences from the year 2000 (Nyikahadzoi & Raakjaer 2009). The obtained licences were redistributed among war veterans, women and the youth. This resulted in an increase of small companies operating fewer than 4 rigs (Nyikahadzoi 2006). This created a new management challenge since small companies operated in prohibited fish breeding zones to reduce operational costs. This resulted in catching of huge volumes of immature fish.

Radical redistribution further impeded the high level of cooperative governance between traditional rights-holders and government authorities that were a result of shared culture, and language. At Lake Kariba for instance, the transformation has resulted in two kapenta producers' associations along racial lines. The white-dominated Kapenta Producers Association (KPA) (which sought to protect the whites from losing licenses), and the Indigenous Kapenta Producers Association (IKPA) which (was formed to lobby the government to redistribute licenses). (Nyikahadzoi & Raakjaer 2009; Nyikahadzoi et al. 2010).

The destruction of cooperative relationships between existing companies and management agencies persuaded Nyikahadzoi (2006) to maintain that, both racial groups criticised the government's procedure in redistribution of licences. There was no clear structured support for new entrants. On the other hand, white operators also criticised the whole redistribution exercise as based on political orders rather than on logical economic situation (Nyikahadzoi & Raakjaer 2009).

Poverty has been identified as one of the most serious challenges facing Zimbabwe despite the government's initiative to transfer access rights to the majority of the people. Poverty in Zimbabwe has been described as "widespread and severe" and it continues to ravage rural communities despite efforts by the government to empower the populace through the formulation of policies such as indigenisation, agrarian reform, and the Zimbabwe Agenda for Sustainable Socio-

Economic Transformation (Zim-Asset⁹), most of which were, "either wrongly implemented or died a natural death on paper" (Chisango 2017: 20).

It has been projected that, "Zimbabwe's increased policy support towards fisheries and aquaculture development will facilitate Zim-Asset's Cluster on Food Security and Nutrition. The attainment of its mandate of creating a self- sufficient food surplus economy, and see Zimbabwe re-emerge as the Bread-Basket of Southern Africa" (Chisango 2017: 20). However, the country's weak governance arrangements supplemented by its weak implementation policies continuously drag the country in its political and economic quagmire.

4.4.6 Insights from the transformation

Majority of black population continue to be largely excluded from benefitting from economic transformation of their national economies. There is huge inequality gap between the formerly privileged group and the underprivileged one (Nyikahadzoi et al. 2010). It can also be observed that the government sometimes used its control to institute policy or revise it in such a way that would fall in line with its political and economic agenda. For example, "understanding that the policy of 'willing seller, willing buyer' under the Lancaster House agreement had proved insufficient for addressing the historical imbalances in access rights, the government withdrew and terminated all commercial fishing licenses using powers under section 82 of the Parks and Wildlife Act of 1975" (Nyikahadzoi et al. 2010: 674). This allowed the Minister, "if necessary or in the interests of the preservation, and conservation ..., to prohibit any person from fishing absolutely or subject to certain conditions or from possessing fishing gear" (Nyikahadzoi et al. 2010: 674). However, fear of alienating international donors forced the state to take a cautious approach in its efforts to redress racial imbalances (Nyikahadzoi et al. 2010). It should be noted that to achieve economic emancipation in Zimbabwe as elsewhere in Africa is not easy because of debt traps from the International Monetary Fund (IMF) and World bank. Thus, economic emancipation is more complex and challenging than political change.

⁹ Zim-Asset is a government blue-print policy document "on economic transformation. The blueprint intended to bring about accelerated economic growth and wealth creation in Zimbabwe between October 2013 and December 2018" (Makaye & Mapuva 2017: 1).

4.5 CONCLUSION

The aim of this chapter was to give context to the nature and systems of fisheries governance in Zimbabwe. The chapter locates and describes the state of water bodies in Zimbabwe and their contribution to the livelihoods of the people. The chapter further explored Zimbabwe's path to restructuring governance of the SSF sector in line with the post-independence government's initiatives. One of the government's main agenda was the redistribution of rights from the former privileged white settlers to previously disadvantaged black people. The Zimbabwean government embarked on evolutionary policy processes to redress the inequalities in the fisheries sector. Some of the policies included socialist policies, redistribution through the market, adoption of ESAP, and radical redistribution of access rights. However, despite various attempts to address economic inequalities, little has been achieved to emancipate the poor black fisherfolk, and there is a huge inequality gap between the rich and poor people in Zimbabwe.

The chapter further explored on the background of natural resources governance from pre-colonial to post-colonial period. The aim of the background was to demonstrate that traditional leadership with its respect for cultural values and rights in the pre-colonial period managed fishery resources sustainably. These cultural rights were eroded by the colonialism, which instituted policies which undermined and denigrated the indigenous people. The colonial government promulgated the command-and-control policies on fisheries which were segregatory and favoured the white minority group to whom fishing was a sporting activity for boating and angling, whilst to the majority Africans fishing was the main stay of their livelihoods as it contributed to food security and incomes.

The chapter also unpacks the decentralisation policies which the government attempted to put in place in its quest to manage fisheries and the reasons for the failure of such policies. The Zimbabwean government inherited the command-and-control, top-down fisheries policies from the Southern Rhodesia white settler government. Fisheries management in Zimbabwe takes a hierarchical centralised approach, which is controlled by the Parks and Wildlife Management Authority. The chapter that follows discusses the methodology adopted for the study. It further locates and characterises Norton as the study area highlighting its demography, history, population, social services, socio-economic characteristics, and land use and governance.

CHAPTER 5: METHODOLOGY AND DESCRIPTION OF STUDY SITES

5.1 INTRODUCTION

This chapter describes the methodologies employed to collect the data regarding SSF governance arrangements and livelihoods in Norton. The chapter also presents the background and context of the two lakes under study, which are Lake Chivero and Lake Manyame, pivotal as sources of fish for the Norton community. The research structure, which comprises the study area selection process, and field research details is also presented. Furthermore, the methodology used to address the research questions and data analysis procedures are described. Qualitative research methodology forms the basis of this study, and the chapter also presents the challenges faced during fieldwork.

5.2 RESEARCH APPROACH - PHILOSOPHICAL STANDPOINT

This section focusses on the philosophical standpoint of the dissertation and utilised some of the principles of grounded theory. The choice of a grounded theory, which is qualitative based scholarship, was enlightened by the study's aim to develop a conceptual framework suitable for the governance arrangements in SSF in Norton. The framework will be informed by empirical data gathered. One of the advantages of grounded theory is that it allows the participants (fisherfolk) to speak for themselves, narrating their perceptions. The process of highlighting their perceptions allows the fisherfolk community to reveal their experiences, challenges, and prospects. As such, grounded theory approach allowed this study to see the outcomes and analyses occurring organically without pre-conceived hypothesis and ideas. The philosophical assumptions in qualitative research include

a stance toward the nature of reality (ontology), how the researcher knows what she or he knows (epistemology), the role of values in the research (axiology), the language of research (rhetoric), and the methods used in the process (methodology) (Creswell 2007: 16).

This research employed some of the principles of grounded theory to the study of governance arrangements and livelihoods of small-scale fisheries in Norton, Zimbabwe. Grounded theory is "a qualitative research method that uses a systematic set of procedures to develop an inductively derived theory about a phenomenon" (Neuman 2014: 71). It is a method for discovering new theory and its purpose is to build a theory that is faithful to the evidence. SSF are excluded in most

government policies and little attention has so far been paid to them by government and other stakeholders in Zimbabwe. Therefore, the choice of a grounded theory was informed by the need to contribute to SSF consideration in policy and governance processes. Grounded theory is further utilised to interpret the governance arrangements (formal and informal) as well as its associated power dynamics and how these shape SSF livelihoods in Zimbabwe.

The grounded theory also inspired the researcher to understand the world view of Norton SSF and how they understand and view their institutional arrangements' relations with other stakeholders. It also motivated the researcher to understand the local context and meaning of environment as interpreted by the fishers through indigenous knowledge systems as opposed to the Western notions of environment. Grounded theory is also crucial in interpreting the livelihoods of small-scale fisheries, define their problems, and generate meaning that enables them to see how as individuals they fit in with the larger picture of their communities. In other words, the grounded theory approach in my research was meant to enable the participants 'to speak for themselves' through data (Sunde 2014). These techniques also allowed the researcher to examine how people acted on their perception – how they responded by attempting and sometimes succeeding to improve their relationships, conditions, and their relationships with the environment.

5.3 RESEARCH DESIGN

A research design is a plan used by a researcher to recruit participants and collect information from them (Welman et al. 2005). It provides a blueprint on how the researcher will conduct the study (Mouton 2001; Babbie 2008). Creswell (2013) concurs with Welman et al. (2005) by maintaining that a research design is a plan of action that describes when, where, and how data is to be collected and analysed. Furthermore, it involves the interaction of philosophy and specific methods and strategies of inquiry (Creswell 2009). For this study, the research design provides the details of how the research was carried out by outlining the research methodology, study area, data collection tools, and analysis of the data. The study used qualitative approaches, which explore and understand the meaning of individuals or groups assigned to a social or human problem (Cresswell 2009). Qualitative approaches in this study ensured a deeper understanding of the relationship between such variables as governance arrangements, power dynamics and social relations to fisheries, access to fisheries and livelihoods (including food security), and how the community is affected.

5.4 A CASE STUDY DESIGN

The study adopted a case study design. The word 'case' in case study is mostly associated with a location such as community or organisation (Bryman 2012). A case study is a strategy of inquiry in which the researcher explores in depth a program, event, activity, process, or one or more individuals (Creswell 2009). It is an investigative study in which a researcher commences on a comprehensive data collection that includes multiple sources of information which relates to phenomena and context (Creswell et al. 2003). Furthermore, "a case study is an in-depth analysis of a research problem that is undertaken in real-life settings where data may be obtained through using a combination of methods like personal/ participant observations, unstructured interviews, and external or internal documents" (Magidi 2018: 91).

Bhattacherjee (2012) further acknowledges other benefits related to this research outline. Initially, the study questions employed can be amended throughout the research if the researcher finds the earlier ones to be irrelevant. Furthermore, because they "capture a rich array of contextual data", case studies yield "richer, more contextualised, and more authentic interpretation of the phenomenon of interest when compared with other designs" (Bhattacherjee 2012: 93).

More so, a case study design allows the researcher to grasp a holistic understanding of the phenomenon under investigation since it is performed in a natural setting with the intention to comprehend the nature of current processes in a previously little-studied area (Diaz Andrade 2009). Instead of seeking answers to questions such as "how much" or "how many," a case study design is useful for answering "why" and "how" questions, or when one cannot manipulate the behaviour of those involved in the study (Baxter & Jack 2008; Diaz Andrade 2009). It is also acknowledged as a tool in many social science studies and its role in research becomes more prominent when issues about poverty, unemployment, and community-based problems are raised (Zainal 2007). This research thus, maximised on the flexibility of the case study design to gather quality data on influence of governance arrangements on the livelihoods of the Norton community.

Linguistically, the choice of Norton as a case study gave me a comparative advantage since all the respondents and myself were Shona speakers. The fact that there was no language barrier allowed the researcher to build good relationships and gain trust from the respondents and to get credible information. Amit (2011) emphasised the significance of good interpersonal relationships between the researched and researchers, arguing that they both act as crucial tools for obtaining research results and enhancing the study. The researcher's staying in Norton for a period of 5 months (end of November 2020 to April 2021) further strengthened the relationships with the respondents. The

participants perceived the researcher as a fellow countryman applauding the study as one of the studies which addressed the challenges faced by the Norton fishing community.

Although the case study design helps in clarifying the line of action and sketch the boundaries of the research, it does not provide enough suggestions to produce theory. (Diaz Andrade 2009). A case study design and grounded theory supplement each other and can be used in a combined fashion by interpretive researchers aiming at building theory. Therefore, the study utilised case study design and grounded theory to revise the conceptual framework suitable for Norton small-scale fisheries.

5.5 RESEARCH METHODOLOGY

Rajasekar et al. (2013) defined research methodology as the approach by which researchers go about their work of explaining, describing, and predicting the phenomena. This implies that the research methodology guides the researcher on how the process of research should be carried out as it shows the varying methods that can be used. This study utilised the qualitative research approaches to understand the governance arrangements in the Norton small-scale fisheries.

5.5.1 The qualitative methodology: Understanding social reality

This research preferred qualitative research approaches because the approach intents to comprehend and expand initial forms of social interactions. It answers "the 'why', 'how' and 'what' questions compared to quantitative research which relies on hypothesis testing, surveys and experiments collecting numerical indicators to answer questions of, 'how many', 'how much', 'how often' and 'to what extent' (Johnson & Christensen 2008: 33)

Furthermore, qualitative research aims to decode, characterise and analyse events as they occur in their natural social settings (Matveev 2002). The emphasis is on average people's descriptions and observations of their lives. Therefore, qualitative methods were useful for the study as they intent to capture the myriad perspectives of participants in the social world. This qualitative research approach is also applicable to understanding the experience of the participants. In supporting this view, Merriam (2002: 3-4) asserts that:

the key to understanding qualitative research lies with the idea that meaning is socially constructed by individuals in interaction with their world. The world, or reality, is not the fixed, single, agreed upon, or measurable phenomenon that is assumed to be in

positivist, quantitative research. Instead, there are multiple constructions and interpretations of reality that are in flux and that change over time. Qualitative researchers are interested in understanding what those interpretations are at a particular point in time and in a particular context.

Following the above contention, this study serves human processes and activities as part of an integrated context and social process in contrary to perceive it as something which can be researched in isolation (Magidi 2018). A qualitative researcher is entitled to prioritise the subjects of the study's interpretations, philosophies and perceptions of their lives (Joniak 2007). Contextualising the above pronouncements about qualitative methods to the study, the argument is that coping strategies employed by actors in Norton can only be understood well by interacting and engaging the subjects. Such was achieved through interpreting and exploring their governance arrangements and its implications on the livelihoods, the challenges they faced and their coping strategies to mitigate the problems. Interpretation of these realities provided a clear image of the people's livelihoods in the existing governance arrangements. It is arguable that fish actors in Norton have their own methods of establishing and diversifying their livelihoods, which could be different from other contexts.

The strength of qualitative research also afforded the researcher an opportunity to focus on what actors were involved in governance arrangements of Norton SSF. This strengthened his conception of the issues under exploration (Chambers 2001). Familiarisation with actors contributed to the understanding of activities, stories, and perceptions of the respondents under investigation.

Furthermore, qualitative research is essentially multi-method in focus (Flick 1998; Denzin & Lincoln 2000; Nemarundwe 2003). The use of compound methods reflects an attempt to secure an in-depth understanding of the phenomenon in question which, in this case, is governance arrangements of small- scale fisheries in Norton (Sithole 2011). It is crucial to bear in mind that objective reality can never be attained since we can know something only through its depictions (Denzin & Lincoln 2000: 5). Several qualitative methods used for this study included the semi-structured interviews, key informant interviews, focus group discussions and participant observation. These methods were essential for this study since Norton small-scale fisheries comprised of diverse actors. Small-scale fishing is generally a busy industry hence the choice of using qualitative data collection methods such as semi-structured interviews as most fishermen did not have time for in-depth structured interviews. Detailed sections of these qualitative methods are discussed in the latter sections of the chapter.

5.5.2 Data collection phases

The process of research included three phases. The initial phase was site selection, which embraced preparatory fieldwork and selection of a study area. The second phase was field research, which comprised data collection and analysis, and verification and research monitoring. The third phase was dissemination of research findings with the department of Geography and Environmental Studies and a larger audience.

5.5.2.1 Phase 1 - Preparatory phase

The purpose of having a preparatory phase was to select the study area with the most suitable fishing community and fisheries that would provide responses to the research objectives. The choice of Norton as a study area was made based on literature review, recommendations from colleagues who specialise in fisheries research, and policy and personal experiences of the researcher having conducted research on Southern Africa Development Community (SADC) intra-regional fish trade. The aim of the preparatory/ exploratory visit was to familiarise with the study area and the fishing community. This was also crucial in determining the applicable research methods and tools to utilise in this study. It was also the stage of engaging potential participants and relevant stakeholders such as ZimParks to partake in the research (see attached letter in Appendix G). Exploratory fieldwork was done for four months at different times (February and March, then July and August) of 2019. Community interaction gave the researcher a chance to introduce the research topic and to meet key members in the community. Department of Parks and Wildlife officials also referred the researcher to meet officials from the relevant fisheries division.

5.5.2.2 Phase 2 - Field research

Field research is the study of people acting in the natural courses of their daily lives. The fieldworker ventures into the worlds of others in order to learn first- hand about how they live, how they talk and behave, and what captivates and distresses them. . .. It is also seen as a method of study whose practitioners try to understand the meanings that activities observed have for those engaging in them (Neuman 2014: 432).

The field research phase included planning, data collection, and final data analysis. The field research phase was undertaken from 26 November 2020 to 30 April 2021. The preparatory phase allowed the researcher to revise and review the initial plan and to integrate the perceptions and suggestions from the community. The plan was made to reflect the needs of the fisherfolk

community, ZimParks, and the researcher. Data collection instruments such as interview guides, observation guides, and focus group discussion guides were designed in preparation for fieldwork. Each research tool was pre-tested and corrected before the final guide was accepted. Also important were the logistics of undertaking the data collection, determining where to administer the interviews, who to target, and the sample size. Ethical clearance application was submitted to the Research Ethics Committee and the ethical clearance certificate was granted to the researcher. Other related data collection tools such as cameras were also procured. Questions and data analysis techniques were tested and modified during the first stages of the main data collection. Field notes were collated and verified with fisherfolk and key informants at the end of each interview. A final detailed data analysis was conducted using thematic analysis. Results were discussed with key individual stakeholders and consideration given to the theoretical and conceptual implications of the results (Grant 2006).

5.5.2.3 Phase 3 - Dissemination

Several dissemination activities were planned for the study, and these included: Geography and Environment department presentations, conference presentations, local meetings, and production of reports. This thesis is also part of the dissemination activities.

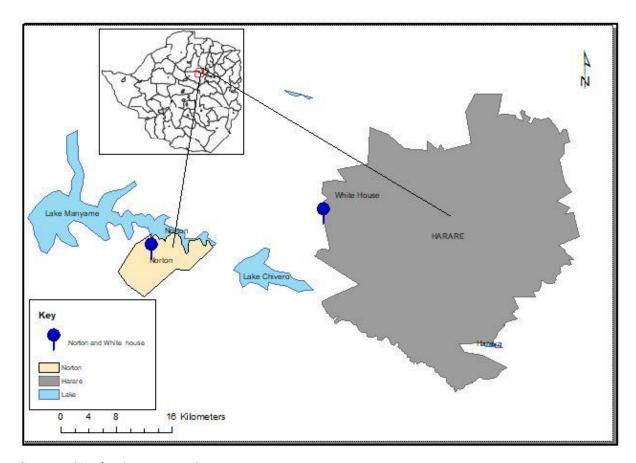
5.6 IDENTIFICATION AND LOCATION OF THE STUDY SITES

The study was carried out in Norton district under Mashonaland West Province in Zimbabwe. Norton district was crucial in this study because of its centrality and proximity to two large water bodies, which are Lake Chivero and Lake Manyame. These two lakes are pivotal as sources of fish for Norton community and the capital city, Harare. Fish resources contribute enormously to the livelihoods of the community as a source of food, income, and employment. This section describes the Norton community as well as the geography and location of Lake Chivero and Lake Manyame.

5.6.1 Demographic growth

Norton town is located about 40 kilometres west of the capital city, Harare, along the A5 Highway that links Bulawayo and Harare, and is nearer to Darwendale. "It lies between latitudes 17° 50' S and 17° 54' S, and longitudes 30° 38' E and 30° 45' E" (Chigonda 2011: 297). It is located between

Lake Chivero and Lake Manyame (Vushoma 2016). The following map locates the town and the twin lakes.



Source: (Author's construct)

Figure 5.1 Location of Norton and the twin lakes (Lake Chivero and Lake Manyame)

The town is home to approximately 45000 people (Alexander & Chitofiri 2010). However, this figure is said to have increased. According to Zimbabwe National Statistics Agency (ZIMSTAT) (2013) Norton had an urban population of approximately 68,000 with growth rate of 3.2 % which shows an increase in the population as compared to 45000 recorded by Alexander and Chitofiri (2010). "The World Bank (2014) projected that at such a rate, its population will be at least 111,000 by 2022" (Magidi 2018: 10). The 2012 census also demonstrated that there were 35209 females as compared to 32382 males. Norton is a very small town, which is found within the Chegutu district of the province (Vushoma 2016; Munyanyi 2017). The town has a mixed population which comprises of the urban component located in the suburbs, the peri-urban component located within the surrounding farming areas, and the rural component, which includes the rural areas that are 45kms away from Norton central (Siampondo 2015). The major ethnic group in the town is made up of the Shona people followed by the Ndebele people (Munyanyi 2017). Zimbabwe National Statistics Agency (2013) recorded that 88% of the population are

permanent residents within the town while 8% are from areas within the province whereas 3% are people from other districts (Munyanyi 2017). Some sections reside in the town by virtue of working there whilst others stay there because of its proximity to Harare. Thus, Norton has become resident to a significant number of people who work in Harare because of its proximity to the city (Zimbabwe Election Support Network 2016).

5.6.2 History and climate

Norton was formed in 1914 from a farming settlement established by colonial European farmers. These farmers stayed in Norton in the early 1890s. The name of the town was derived from the "Norton Family, a white family killed during the 1896 Shona Uprisings" (Vushoma 2016: 19). With time, increased agricultural production in the area called for other ancillary industries such as farm equipment machinery. The area expanded into a small industrial hub which intended to support the farming community (World Bank 2014; Magidi 2018). Norton was recognised as a municipal town in 1914. The erection of industries influenced its expansion and as a result captivated a significant number of the people to settle. It achieved Town Council status in 1994. The history of Norton is crucial in highlighting how the town evolved from being a farming area and how it diversified into other ancillary industries such as farm equipment machinery. The town further expanded into a fishing town by virtue of being close to the two lakes.

"Norton is located in the country's agro-ecological region two, whose climate is made up of cool dry winters and hot wet summers. Its rainfall averages between 650 and 800mm/pa" (Magidi 2018: 10). It has rich productive soils that support a diversity of crops such as maize, and wheat. It also supplements good pastures for livestock production (Mudumi & Mundenga 2015). This vibrant agricultural prospect initiated the establishment of Chibero as the earliest Agricultural College in Zimbabwe. The college was formed in 1961close to Norton (Zimbabwe Election Support Network 2016).

5.6.3 Land use and governance

Norton is comprised of low, medium, and high-density suburbs. It has an industrial area and a small Central Business District (CBD), known as *Kwa-Govans* (Magidi 2018). The town is split into 13 wards, each designated by an elected councillor. The council is led by the Chairperson. Wards one to four consists of medium, and low density housing (such as Twin lakes, and Nharira). According to Magidi (2018: 11), "these consume the bulk part of the town, almost covering two-thirds of its overall area. The remaining one third contains the remaining nine wards which are

made up of high-density housing such as Ngoni and Katanga, and peri-urban/semi-formal settlements which include Garikai." The town is presently represented in parliament by an independent candidate, Honourable Themba Mliswa. This candidate won the seat in 2018. However, the battle to control Norton as a political constituency, has been ongoing since 2008 as both political parties (Movement for Democratic Change (MDC) and Zimbabwe African National Union Patriotic Front (ZANU-PF)). This political contention has been marred by political violence, casting implications on the livelihoods and governance arrangement of the community (Alexander & Chitofiri 2010).

5.6.4 Socio-economic environment

The town also consists of a Grain and Marketing Board and a paper and pulp industry. It is also surrounded by large commercial farms that have been sub-divided to provide more residential suburbs to the people (Munyanyi 2017). According to Zimbabwe National Statistics Agency (2015) Norton has limited job opportunities and most people commute to work in Harare every day. The district used to house big industries such as Dandy Zimbabwe, Hunyani and Morton Jeffery waterworks among other industries. These industries provided employment and means of survival for the small town's residence which, unfortunately, have closed or downsized their operations due to the country's economic meltdown (Siampondo 2015). However, Norton has a booming fishery business since it houses Lake Chivero and borders with Lake Manyame. The lakes support numerous small-scale fishing cooperatives and traditional anglers, and by so doing, contribute to employment creation (Utete 2019). Furthermore, the booming fishery business is crucial for livelihoods and food security of the community (Muzvondiwa et al. 2013; Kupaza et al. 2015; Utete et al. 2018).

The Norton fishing community has different actors and most of them are engaged in informal sector selling fish (fish trading) for their survival (Alexander and Chitofiri 2010; Kupaza et al. 2015; Munyanyi 2017). Amongst the actors are fishermen who are responsible for fish catching. There are different categories of fishermen ranging from individual to groups or cooperatives. Group fishermen range from two to six. This group also constituted people who fished for leisure mostly during weekends (Kupaza et al. 2015). Cooperative fishermen range from 10 or more. The number of cooperative members sometimes depends on the regulations of the particular cooperative. However, most cooperatives have an average of 10 members (Kupaza et al. 2015; Magadza 2003). Utete et al. (2019) acknowledged that the two lakes support a total of 23 registered fishing cooperatives, and each fishing cooperative comprises of 11 individuals.

Middlemen in the Zimbabwean context means people who buy fish from fishermen at a wholesale price who in turn retail them to consumers at various landing sites such as White house. Some of the middlemen travel from Harare to Norton to buy fish for retailing in Harare especially in high density suburbs (Kupaza et al. 2015; Munyanyi 2017; Utete et al. 2019). Poachers refer to illegal fishermen without permits. (Utete et al. 2018; Kupaza et al. 2015; Alexander and Chitofiri 2010). The next section will give a brief description of Lake Chivero and Lake Manyame.

5.6.5 Lake Chivero and Lake Manyame

Lakes Chivero (Chibero) and Manyame (Darwendale) are popularly referred to as the famous 'twin-lakes' (Chigonda 2011). Lake Chivero, (formerly McIlwaine) was built in 1952 and lies 37 kilometres Southwest of Harare, on the central Zimbabwean Plateau at an altitude of 1368.59 metres above sea level and extending from 30° 46'22.71" East to 17° 52'59.25" South (Muzvondiwa et al. 2013; Magadza 2003). Lake Chivero is located 8 km to the East of Norton and is one of Zimbabwe's biggest inland water reservoirs (Utete et al. 2018; Utete et al. 2019). Lake Chivero has 3 main streams which are Marimba, Mukuvisi, and Manyame. It has a capacity of 247,181 × 106 cubic metres, a mean depth of 9.4 m and a surface area of 2,630 ha, a maximum length of 35,7km and a maximum breath of 8km, and is the main water supply for Harare and its environs, including Norton (Magadza 2003; Muzvondiwa et al. 2013; Utete et al. 2018). The lake is found in agro-ecological region IIa under the Northern Highveld Plateau with a mean annual rainfall of between 750 – 1000 mm (Muzvondiwa et al. 2013). Temperatures can be described as mild in winter and hot in summer and range between 13.1°C and 26.3°C, respectively. Apart from being major water supply, it also offers sport, fisheries, and tourism (Muzvondiwa et al. 2013; Utete et al. 2018; Utete et al. 2019). Lake Chivero has a protected area called Miller's Creek, where fishing is strictly prohibited and an open fishing area (Carolina Bank). (Muzvondiwa et al. 2013). The lake is a habitat to several fish species and there are 27 reported fish species which include yellow fish, and tiger fish, among many others. Other dominant fish species in Lake Chivero include Clarias gariepinus, Oreochromis macrochir, and oreochromis niloticus (bream). "This makes fishing a vital economic and recreational activity in Norton's immediate environs" (David 2015: 187).

The Lake is "highly eutrophic and is infested by aquatic macrophytes such as the water hyacinth (*Eichhornia crassipes*) and spaghetti weed (*Hydrocotyle americana*)" (Muzvondiwa et al. 2013: 398). Lake Chivero is known to have one of the highest densities of African Fish Eagle in Africa. Two types of fishing gear which are used are gillnets and seine nets. Annual total production from

both gillnets and seine nets has fluctuated between 160 and 412 tonnes (Food and Agriculture Organisation 2016).

Lake Manyame (formerly Darwendale Dam) was built in 1975 and lies downstream of Lake Chivero on the Manyame River, to the western side of Norton Town in Mashonaland West Province (Zimbabwe National Water Authority 2014; Utete et al. 2018). It is bordered by the Mazowe catchment with the Gwebi River a significant side stream (Utete et al. 2018). "Lake Manyame is situated five kilometres to the north and is home to a diversity of fishes, other aquatic creatures, and recreational facilities and activities" (Magidi 2018: 13). It should be noted that the two lakes (Manyame and Chivero) form part of the seven Ramsar sites of Zimbabwe. The Ramsar Convention on Wetlands provides a framework for wetland conservation and calls for nations to promote the sustainable utilisation and conservation of wetlands (Zimbabwe National Water Authority 2014). The dominant fish species in Lake Manyame includes *Oreochromis macrochir* (bream), O. mossambicus Tilapia rendalli (bass), and Clarias gariepinus (muramba) (Food and Agriculture Organisation 2016). Both Lake Chivero and Lake Manyame have abundant fisheries resources dominated by the sharptooth catfish (Clarias gariepinus) and the exotic Nile tilapia (Oreochromis niloticus) (Utete et al. 2019). The two types of fishing gear used are gillnets and seine nets. Annual production from the commercial fishery varies from about 100 up to 400 tonne (Food and Agriculture Organisation 2016). However, over-fishing and the use of unregulated nets has resulted in a decline in fish numbers and the general biodiversity (Marshall 2011; Utete et al. 2019).

Lakes Manyame and Chivero are also used for game viewing, water sports, bird watching and they attract both domestic and international tourists. Approximately 15 habitual clubs and resorts are found along their shores (Zimbabwe National Water Authority 2014). Despite being surrounded by lakes, Norton faces water shortages (Chigonda 2010). The biggest challenges to these lakes are pollution from industrial and domestic waste, sewage effluent, fertilizer, and pesticide run-off from farming in the catchment area (Muzvondiwa et al. 2013; Utete et al. 2018).

5.7 RESEARCH METHODS - DATA COLLECTION

5.7.1 The researcher

The researcher stationed himself in the area of study "as an instrument for gaining access to the experiential, performative and discursive practices of social actors during fieldwork" (Siziba 2013:

101). The researcher in this study thus made vigorous attempts to interact with respondents of various fishing traditions to amplify an interpretation of their governance arrangements and livelihood perceptions. Researchers are challenged to take part in collecting and analysing data for their studies (Magidi 2018). Thus, fieldwork for this study was mainly conducted by the researcher. He was directly involved in pilot studies, recruiting participants, designing data collection tools, field observations, interviewing, facilitating focus group discussions, transcribing, and analysing data. This assisted the researcher to understand and illustrate the situation on the ground.

5.7.2 Sampling

"Sampling refers to the process by which a researcher chooses a suitable sample to determine the characteristics of the whole population that the study seeks to research. It is the selection of a dataset from the larger group where presumption about the larger population will be drawn" Magidi 2018: 95). The choice of sample size was guided by the level of saturation. Two types of sampling techniques were used, which are purposive sampling and snowball sampling. In the purposive sampling technique, the study specifies the characteristics of the population of interest and locates individuals with those characteristics (Creswell 2013). Consequently, purposive sampling participants were determined "based on a variety of criteria which includes specialist knowledge of the research issue" (Jupp 2006: 244). In this context, purposive sampling was used to target relevant stakeholders for interviews (such as fishers, fish traders, fish *bongas* (poachers), cooperatives etc). Purposive sampling was also used because Norton is a fish resource area, hence the specific targeting of fishers and other relevant participants for interviewing. Furthermore, the purposive selecting strategy was used for identifying key informants such as Parks and Wildlife officials, Environmental Management Agency officials, and other relevant officials.

In snowball sampling, each research participant is asked to identify other potential research participants (Creswell 2013). Snowball sampling technique was used in this study to identify other potential participants in Norton small-scale fisheries. Interviewees referred the researcher to other fish points, markets, meeting places, and relevant government departments and ministries to interview other participants and observe other small-scale fishing related activities. Snowballing assisted in the observations as some interviewees referred the researcher to some fish markets to confirm what they found. A total of 113 respondents participated in the study, with 40 fisherfolk taking part through nine focus group discussions (5 held at Lake Manyame and 4 held at Lake Chivero). Table 5.1 shows a summary of all the relevant stakeholders interviewed for this study

including individual fishers, fish traders, fish poachers, cooperatives, fish union chairpersons, and officials from various government departments. Detailed tables (A.1-A.5), for each stakeholder are placed in Appendix A.

Table 5.1 Number of stakeholders interviewed

Period	Categories	Individual	Focus Group
26 November 2020 to 30 March 2021	Fish traders	36	
	Individual fishers	10	
	Fish cooperatives	40	9
	Fish poachers	17	
	ZimParks officials	2	
	Fish Union chairpersons	2	
	Fish Association chairperson	1	
	Community leader	1	
	ZINWA official	1	
	EMA official	1	
	City of Harare	1	
	SME official	1	
	Total	113	9

Source: Field survey 2021

5.7.3 Qualitative techniques

Data collection for this study includes both primary and secondary data. Primary data included information gathered from unstructured and semi-structured interviews with fishers and focus group discussions with cooperatives. Primary data was also provided from in-depth semi-structured interviews with key informants such as Parks and Wildlife officials. Primary data was further recorded from observations undertaken from 4 field sites which are White house, Lake Chivero, Lake Manyame, and Katanga in Norton. Secondary data was reviewed from the Parks

and Wildlife Act and other government policies on SSF. Both primary and secondary data augmented one other in investigating governance issues.

5.7.4 Interviews

Interviews are an essential source of data as well-informed interviewees can provide salient insights. However, the outcome of the interview can be influenced by the political, economic, and social context in which it is conducted (Fabian 2001). Hence it is crucial to establish a rapport with the respondents. Two interview approaches were used for data collection, and these are unstructured interviews and semi-structured interviews. The interview questions were extracted from the research questions of the study which were: (i) who are the actors involved in SSF in Norton?; (iii) what are the current governance arrangements within the SSF sector in Norton?; (iii) what are the existing formal or informal institutional arrangements that govern SSF in Norton?; (iv) what are the contestations, agreements, and achievements in the small-scale fishing industry in Norton and its impact on livelihoods and governance of resources?

5.7.4.1 Unstructured interviews

Unstructured interviews (informal) were conducted with stakeholders which included fishers, fish poachers, fish buyers (middlemen), fish traders and fish consumers. These stakeholders were interviewed to express their experience and opinion about relevant issues including:

- The current institutional arrangements in Norton SSF.
- The significance of lake resource for local people.
- The current condition of the lake resources, the changes noticed by the fishers, and the reasons behind the changes.
- Fishing activities.
- Governance structures.
- Fishing community's interaction with other stakeholders e.g., the government and cooperatives.
- Constraints and suggestion for fisheries management.

The style of questioning was informal since fishers were very busy to conduct a structured interview. They did not want much hinderances when conducting their business. The structuring and sequencing of questions varied from interview to interview. Unstructured interview is similar in character to a conversation (Bryman 2012). This interview style was suitable in this case

because most fishers felt comfortable to have a conversation and, in the process, answered some questions. Interviews lasted anything between 10 and 60 minutes.

It should be noted that unstructured interviews were managed in one or two basic ways. The first way of unstructured interview was planned and more formal, with the conversation being controlled observing a few broad research questions. The researcher attempted to lead these conversations along particular topics, while also affording an interviewee a chance to control the line of discussion and to express issues in their own line of thought. This technique was crucial in affording the participants a chance to unravel issues and experiences which they perceive to be important according to their understanding. These interviews were recorded in a notebook.

The second form of unstructured interview was a highly informal conversation, conducted and initiated originally, with the topics of conversation being primarily controlled by the interviewee (Schultz 2015). The highly unstructured informal conversations were initiated spontaneously and most of the times they were conducted without a pen and paper. Therefore, notes from such interviews were immediately recorded after the conversations.

Informal conversations for this study were conducted by the researcher in various places such as taxis (*combis*) or fish marketplaces. These conversations were done randomly. For instance, the researcher boarded a taxi from Norton to Harare, and from Lake Chivero to White house in some of his field trips. The taxi had different fishery stakeholders who included fish poachers, wholesalers(middlemen), and fish consumers. The researcher initially started the discussions by asking the selling price of the fish from the wholesalers. The discussions were fruitful in that all stakeholders including fish poachers ended up contributing to the discussions. Some of the topics discussed included the challenges faced by the fishing community and how they thought these challenges would be addressed. The highlighted challenges included stringent government legislations and exorbitant permit fees. Therefore, these informal engagements provided crucial information that might have been left out from formal data collection.

5.7.4.2 *In-depth interviews*

The term in-depth interview is increasingly used by researchers to mean both semi-structured and un-structured interviewing. It can also be used interchangeably with qualitative interviews (Bryman 2012). In-depth interviews were carried out with key informants. Key informants are those people in authority, with specialised knowledge of the issues under study (Bryman 2012). It is important to note that not every community member is knowledgeable about that society or

issues that affect it when selecting respondents for the interviews, hence the need for key informants (Magidi 2018). The main role of the key informants was to enlighten the study on their experiences about institutions and regulations responsible for the governance of SSF in Norton and how they influence the livelihoods of the people. Key informants provided specialised knowledge since they were drawn from skilled officials from government departments which included:

- Parks and Wildlife Authority these officials had knowledge about institutions and regulations which govern Small-scale fisheries in Zimbabwe.
- Environmental Management Agency (EMA) the regulator of environmental laws through the Environmental Management Act.
- Ministry of Environment, Water, and Climate the environmental condition of the lake and its catchment area.
- Norton District council officials councils facilitate the provision of permits for sale and marketing of fish under the Rural District Act (RDA).
- Fish cooperative union leaders cooperative members representation, regulation, trend of fishing activities.
- Fish cooperative leaders structure and operations of cooperatives.

In-depth interviews were also utilised to extract information from fishers that permitted them to unfold their lived experiences, perceptions, and cultural rights. They were thus, interested with exploring people's daily lives, how the fishers sustain alternative livelihoods to mitigate the challenges or prospects that emerged because of the current fisheries governance arrangements. They also comprised of elderly interviewees who had stayed in Norton town for longer periods. This facilitated the researcher to document how the governance arrangements and livelihoods had changed over time.

"In-depth interviews were utilised in this research because they use an open-ended approach that uses several guide questions but gives the interviewee the opportunity to answer the question broadly on the aspect under discussion, while also giving the interviewer the chance to probe context-specific issues that arise during the interview". (Jimu 2017: 38). The approach allowed me to adjust the questions according to the responses of the interviewees. Semi-structured interviews lasted anything from 15 minutes to 75 minutes. The interview span relied on the respondent's time, and the quantity and depth of information they were willing to share.

Qualitative interviews were primarily recorded by taking exhaustive and detailed notes (often augmented with a camera and voice recorder). An interview guide with questions is attached in

Appendix B for various stakeholders. The degree of authority that was exercised over the discussion on semi-structured interviews enabled the study to obtain information specific to the research questions, something which could have consumed the researcher's time in the context of an unstructured interview.

Focus Group Discussions (FGD) were also utilised in this research and in some instances the information gathered from FGD was used to complement the data collected through key informant interviews.

5.7.5 Focus group discussions

Focus Group discussions have been widely used in social science research. FGD is a form of group interview in which there are several participants, and there is an emphasis in the questioning on a particular defined topic (Smithson 2000; Bryman 2012). This method is often referred to as 'public hearing' (Bryman 2012). Although the sizes differ according to different authors, the number of participants per group for this study were ranging from 4 to 6 people. FGD were used in this study for a number of reasons: for instance, the discussions were often very lively as respondents listened and responded to each other 's contributions. Furthermore, the interactive aspect provides opportunity to explore different points of view and formulate and reconsider their own ideas and understandings (Onyango 2011; Sunde 2014). The technique, therefore, captures numerous views and perceptions at once. The responses from different groups were compared and analysed.

Group members were recruited using the snowballing sampling method. "The researcher would initially approach one or two potential 'group candidates' who would in turn help to identify the next candidate, who would also do the same, and the cycle would continue until the desired number was reached." (Jimu 2017: 39). FGD were conducted with members assembled from Norton fish cooperatives. These cooperatives comprise of mostly fishers. However, it should be noted that some of these fishers were involved in both fishing and trading/selling of fish. In some cases, FGD interviews happened unplanned. For instance, when I was interviewing one fish trader at Katanga fish market, other traders who were close by voluntarily contributed to the discussion, concurring, and disagreeing on certain aspects of governance arrangements in Norton small-scale fisheries.

A total of nine FGD were held for the study. Five FGD were held with fisher cooperative groups at Lake Manyame and the other four FGD were conducted with fish cooperatives at Lake Chivero. Both male and female fishers were involved in these FGD although the male outnumbered the female participants. Most of these focus group discussions were done at the lakes since it was

difficult to find another venue because of the busy nature of the fishing business. Another setback for organising these meetings in advance was the COVID-19 pandemic with its restrictive regulations on assembly, travelling, and social distancing. Luckily, it was easier and convenient than the researcher had anticipated since most cooperatives which were interviewed at both lakes referred the researcher to their counterparts who were also fishing in the same lakes. However, the choice of interviewees per group were determined by time, cost, and availability of participants.

FGD were generally open, but checklists were used to guide discussions. In some cases, the discussions were followed by more probing questions on specific issues of interest in order to get more detailed information (Bryman 2012; Kosamu 2017). The fishers were encouraged to express their opinions and experiences about relevant issues including, the importance of lake resources for local people; fishing activities; cooperative governance issues; constrains and suggestions for fisheries management. An interview guide for FGD is attached in Appendix C.

One of the advantages of FGD is that the researcher managed to generate valuable information easily without incurring high costs compared to the individual interviews. Group discussions further stir other models of communications like jokes and anecdotes. These assisted the respondents to reveal themselves and magnified the researcher's interpretation of the concerns that arises. This also facilitated open conversations and, ease expression of ideas that could have been missed on individual interviews.

However, although the group in FGD provided a measure of safety for individuals to speak and describe their fishing practices and the influence of fisheries governance laws, inevitably the collective nature of the discussion and the tendency for the group to work towards a shared articulation of the practice in their community silenced more distinct experiences of individuals. Whilst this can be a limitation, the method afforded an opportunity for the researcher, using informed analysis, to become aware of the way in which narratives are socially constructed (Sunde 2014).

Moreover, gathering respondents was challenging since most of the potential participants were busy with catching and selling fish. Persuading a group of five people to stop their work and spend an hour or more was not easy. However, the researcher managed using snowballing although he initially intended to interview an average of ten people per group.

5.7.6 Field photography

Photographs of different types of boats, scales used to weigh fish, fishing nets and fish were captured and used to present tangible evidence in terms of images relevant to governance of SSF in Norton. Photographs highlight the textual claims as well as observations and serve to animate the story through its visual reification by recording signs and memories in space. Furthermore, the use of photographs may stimulate the interviewee to remember people, events, or situations that might otherwise have been forgotten (Bryman 2012). Photographs can also be useful for data analysis as they are useful in reminding the researcher of the scene.

5.7.7 Field observations

Observation is a data collection approach which includes, "the researcher's direct participation in capturing data through observing, taking note of events, phenomena, objects, or behaviours as they occur in their natural setting" (Bhattacherjee 2012: 104). The method can be utilised as a pathway of validating and supplementing information extracted from other techniques. This study largely employed direct observation techniques.

5.7.7.1 Direct observations

Direct observation allows for observations made in the course of fieldwork that were not necessarily planned. Direct observation implies that the researcher is taking part in the study. Whyte (1979) further defines direct observation as a technique whereby the researcher engages in social activities with the participants of study over a long period of time. The strength of this observation as a research method was guaranteed during this study. "This method allowed the study to compare what people *say* they do, and what they *actually* do in practice" (Schultz 2015: 62). In some cases, the researcher plays a passive and neutral role and observes from a distance without active participation (Bhattacherjee 2012). In most instances, the observed lack the knowledge that they are part of a research study or are being observed. In social research, analysis of observations must be done from the participants' perspective.

Furthermore, the extended stay in Norton for five months doing fieldwork allowed the interviewer to gain trust and establish some rapport with respondents because they ended up treating him as one of their own. The study usually used direct observation with key informants such as cooperative leaders and community leaders since they had established some level of trust amongst

themselves. Moreover, this observation technique facilitated some degree of involvement in which respondents felt more willing to speak and act freely about their lived experiences.

Staying in Norton further enabled the researcher to see small-scale fisheries differently from the way he had understood them before conducting the research. In this study, the researcher appreciated how the fisher respondents associate to their fishing not as an occupation of last resort, but something which has a cultural value regardless of the income it provides. The researcher also attended their meetings, which were convened for various reasons including: resolving conflicts among cooperative members and making contributions to members who were bereaved, among others. Direct observation further allowed the study to note ignored facets of these fishers' lives. For instance, the interviewer did not see certain characteristics which have been used to describe the poor, such as hopelessness, powerlessness, and misery. By using 'the wide-angle lens' that Onyango (2011) talks about, the investigator was able to take cognisance of rich information finding out what it feels like to be a fisher and live under conditions of poverty and complex governance systems. This also allows the researcher to understand the meanings of poverty as constructed by the Norton community. Poverty was part of their life but certainly did not define everything about their lives since they opted for alternative livelihoods for survival.

Direct observation was also used to understand the culture and behaviour of the Norton fishing community. Listening, observing, and writing field notes, became crucial in understanding how the community operated. Observations were undertaken using an observation guide in Appendix D. An observation guide is a list of things that a study intends to find out in the field during observation sessions. The researcher conducted 2 preliminary visits in Norton, 2 months each in different intervals in 2019. One was done in February and March and the second one in July and August. These visits enabled the researcher to observe things on the ground and establish some rapport with the respondents. Furthermore, he stayed in Norton for five months from November 2020 to April 2021whilst doing fieldwork research.

Typical observation activities included attending community meetings and attending cooperative meetings. Participating in fishing activities and observing the informal activities of local fisher stakeholders was also another direct observation activity. This was aided by observing private meetings held by fisher representatives and cooperatives along the lakes. Observing lived experiences of fishers and their fishing practices along the two lakes also formed part of the observation activities. The researcher sometimes spontaneously met and spoke with people on the fish markets or along the lakes. This was coupled with buying fish at fish markets, or sometimes going fishing with them.

The data obtained through direct observation was primarily recorded using a pen and a notebook. A camera was also used as a supplementary tool to collect observation data. An observation guide is attached to show a list of some of the things expected to be observed in the field.

The study recorded the narratives that fisherfolk and government representatives in the case sites shared regarding participation, contestation, and power in governance of fisheries. These lived experiences included narratives, images, and metaphors (Schultz 2015). When it was suitable, the investigator "also recorded observations of their facial expressions, tone of voice, and body language as they expressed these constructs" (Schultz 2015: 67) The recording of these interpersonal observations was supplemented by general observations of socio-economic conditions, and governance of fisheries in the community.

In the context of this study, the interviewer stayed across Katanga fish market, which was the nucleus of fishing activities in Norton. He also regularly visited the White House fish market. Katanga was a crucial location to sit and observe activities in the area such as, the landing of fish, trading and marketing of fish, interaction between fish traders and consumers, and the movement and transportation of fish to other selling points. Conflicts between individual fishers and cooperatives were also observed. Causes of conflicts and their resolutions were of scrutiny to the study as they gave insight into the customary justice system in the community.

Specific consideration was also given to collecting observational and verbal data regarding to the strategies and tactics of fisherfolk and other actors as they disputed issues of representation, access, and participatory processes of SSF governance, most significantly the processes relating to SSF policy, power and contestation, the establishment of cooperatives, and the redistribution of fishing rights. Observations were also crucial to identify different actors in fish governance. Such observations were also used to verify and validate information from interviews or secondary documents.

5.7.8 Documentary sources

Secondary data was reviewed from government policy documents on SSF legislation, fisheries data (catch limits, price variation, etc), socio-economic, demography, physical, biophysical, case studies, and project reports. Furthermore, the policy documents provided information on evolutionary fishery governance processes, the resource status, policy and legal changes that have occurred, and the livelihoods in general. Other related regional policy documents on the governance of SSF such as the SADC Protocol on Fisheries were scanned through. Journal

articles, books, and newspapers with the literature on small-scale fisheries governance were also reviewed. By referring to these, the researcher managed to encapsulate governance systems and processes that were implemented and the livelihood-related events that took place before the commencement of this study. These documents also helped in formulating questions posed to Norton residents.

In addition to socio-economic and biophysical data, secondary data mainly include fisheries resource information (institutions, stakeholders, production), lake water level, land use, and water quality data. Documentary sources were utilised because they are less time consuming and easier to find in comparison to other techniques, "and further played a part in the study's attempt to avoid 'the danger of a single story'". (Magidi 2018: 97)

35.7.9 Development of a preliminary conceptual framework

Chapter 3 of this study highlighted that interactive governance framework as postulated by Kooiman et al. (2005) was used as a reference point to develop a conceptual framework that analyses governance arrangements in Norton SSF. The preliminary framework was introduced in chapter 3 for guiding the research and was developed from literature review and exploratory fieldwork. Furthermore, the preliminary conceptual framework offered crucial guideline in developing the interview schedule for the fieldwork and analysis of the findings (Bhatt 2004). Conceptualisation is important in terms of specifying what the research aims to achieve, as well as when particular terms are used in order to rework and refine these throughout the research process (Babbie & Mouton 2001). Through exploration of these themes, the researcher identified priority areas and saw the emergence of new themes (Williams 2013).

5.8 QUALITATIVE DATA ANALYSIS

The qualitative data generated by the study was analysed using a thematic analysis. This thematic approach entailed refining data from semi-structured interviews, focus group discussions, in depth interviews, and informal discussions according to emerging themes. The thematic analysis draws themes from the set objectives (Creswell 2009). Ryan & Bernard (2003) maintain that theme identification is one of the most underlying tasks in qualitative research. The focus is on analysing field data based on identifying themes and sub-themes in texts and other qualitative data (McLellan et al. 2003). Sithole (2011: 83) emphasised that "... Identifying themes is the basis of

much social science research. Without thematic categories, investigators have nothing to describe, nothing to compare, and nothing to explain".

Themes in this thesis came from both the findings and from the researcher's prior theoretical understanding of the circumstances under study. The act of discovering themes is what grounded theorists call 'open coding' and what classic content analysts call 'qualitative analysis' (Berelson 1952), or 'latent coding' (Shapiro & Markoff 1997). Themes are abstracts and often constructs that the researcher identifies before, during, and after data collection. Themes were developed based on both relevant literatures reviewed for the study and from text recorded during interviews.

During the process of identifying key emerging themes, the preliminary analysis involved looking for evidence addressing the main objectives and questions of the study, and analysis of governance arrangements and livelihoods of small-scale fisheries in Norton. Theme identification involves judgement on the part of the investigator (Sithole 2011). If these judgements are made explicit and clear, then readers can argue with the researcher's conclusions (Agar 1980). One of the advantages of using thematic analysis is that it permits flexibility. Furthermore, new ideas and refinements from the data can be added and amended (Neuman 2014). Direct quotations, tables, and pictures were also used to present some of the information emerging from the study.

Most techniques to qualitative data analysis tend to involve some popular steps, although there are several ways of data analysis. The study conducted thematic data coding guided by the following steps given by Miles and Huberman's (1984) and Lacey and Luff (2007) in analysing the data.

5.8.1 Documentation familiarisation

The researcher took time to listen to recorded interviews, transcribe, and translate them and reading through the transcriptions as recommended by Boch & Piolat (2005) and Laws et al. (2003). Field notes and pictures were also studied and converted into informative and usable write-ups. The researcher's transcription of all the interviews on his own enabled him to interact with the data, and to understand and interpret the relevant issues central to the study. This further encouraged the study to identify key themes, and to become aware of similarities and differences between different participants' accounts (Bryman 2012). The researcher repeatedly referred to the data in preparation for an in-depth analysis. This process through which a researcher repeatedly goes over his/her data until he generates some meanings as part of data analysis is called iteration. The next stage in qualitative data analysis is organising data into concepts.

5.8.2 Organisation and categorisation of data into concepts

At this stage, the study determined key themes, concepts, and categories unfolding from the data, reverting to the main aim and research questions of the study. The investigator further assigned preliminary codes to his data to describe the content and searched for themes from the codes across the various interview transcripts.

5.8.3 Data verification and legitimisation

This section involved testing for data reliability through corroboration and triangulation. The researcher further juxtaposed data to establish variability, discarding the illegitimate information (Magidi 2018). This step was consistent with the study's attempt to disqualify the risk of a single story. The study further reviewed the themes generated above, defining and renaming them in the process.

5.8.4 Data interpretation

Here, the researcher aimed to create meanings from gathered data by illustrating the respondents' perceptions, looking for connection between themes with the intention of giving discussions for the results, and linking the study's findings to existing literature, and from other studies.

5.8.5 Reporting findings

This was the last stage in the procedure of analysing data in which the investigator assembled the final report with the results of the study. The study used the narrative technique enhanced with explanations and descriptions as it aimed to initiate the indications of the findings through discussion, linking them to literature review and the research questions. The researcher manually analysed the field notes and pictures.

5.9 METHODOLOGICAL CHALLENGES AND ISSUES FACED DURING FIELDWORK

The first challenge had to do with the political environment in Zimbabwe. Discussing issues around governance (government institutions, legislations) characterised by economic and political meltdown alongside other economic sectors, unemployment, inflation, and the general livelihood

situation, is regarded as politically sensitive. Since some cooperative licences were acquired through a patronage system, members of such cooperatives avoided to answer some questions related to how they accessed the licences (political connections). Other respondents also refused to be interviewed because they thought that the researcher was a Parks and Wildlife official investigating on illegal fishing. However, through introductions from some of the key informants and from the chairperson of the cooperative union, most cooperatives and fisher respondents felt comfortable to answer the questions. They later trusted the researcher and established some rapport after they were convinced that he was not a ZimParks official.

Furthermore, several respondents were also not comfortable to have a formal interview and seeing the researcher jotting down some notes because they thought that he was a government spy. Respondents were not comfortable sharing their stories because most of them were involved in illegal fishing activities. To counter this setback, the researcher resorted to informal conversations so that the respondents felt confident and comfortable to answer the questions. Furthermore, with time the researcher gained trust from respondents. The interviewer then jotted down some notes in a notebook after every informal conversation.

Some respondents also thought that the researcher was a journalist bound to unearth the coping strategies they employ to counter the Parks and Wildlife legislations for lake access and fishing methods. Therefore, fear of being broadcast on radio or featuring in newspapers was another challenging situation that this study encountered. However, after having several meetings/conversations with individual respondents, they felt comfortable to share their experiences and the challenges they faced in the existing governance arrangements in Norton SSF. Furthermore, individuals also thought to verify my status as a graduate student/ researcher for themselves. It was only after checking/ verifying that I was a graduate student that they agreed to participate in the study.

The researcher also failed to get consent to record some interviewees such that he had to rely on notetaking. Some respondents did not want to sign the consent forms although they had fully agreed to participate. In some instances, others did not agree to be recorded. They provided verbal consent. They felt recording violated the principle of privacy and confidentiality.

Another challenge involved recruitment of FGD participants. The researcher found it difficult to convince an average of five people at once to come and spend more than 30 minutes in a group discussion. This was further worsened by the nature of fishery business (fish catching, fish processing and fish trading) which is generally busy and time consuming. Many fishers were not

prepared to sacrifice their time on something that was not of direct benefit to them. However, the study managed to overcome this challenge by conducting FGD on both lakes where respondents were located. The advantage was that some of these fish cooperatives were operating close to each other. Hence, the researcher was referred to the next cooperative by the interviewed one. The random conduct of FGD interviews saved time and costs.

The global health crises resulting from the COVID-19 pandemic also impacted negatively on the study's FGD participant selection. The study initially intended to have more than five participants per group and interview more cooperatives, but it could not do that because of social distance rules. Furthermore, the situation was exacerbated by strict lockdown regulations to reduce the spread of virus which was implemented by the Zimbabwean government from 5 January 2021 to 20 February 2021. One of the major effects of the lockdown to the study was that the researcher could not travel to the study sites since traveling was only restricted to essential service personnel. Furthermore, travelling restrictions also affected the fishers since they were prohibited to accessing the lakes by virtue of not being on the essential services list.

More so, because of COVID-19, the researcher could not interview some of the key informants (government officials) who were working from home. Therefore, the study collected data from these interviewees telephonically and via electronic means since the researcher had contact details of these respondents. These data collection methods were also encouraged by Stellenbosch University where the researcher is based, and protocols for ensuring compliance with Covid-19 safety measures were promoted and followed in this study.

5.10 ETHICAL CONSIDERATIONS

The researcher applied for an ethical clearance for the study on governance of SSF. The Research Ethics Committee of Stellenbosch University (SU) assessed the application and initially approved the study in June 2020. However, the outbreak of COVID-19 initiated some alterations to be made on the initial approval in order to address and follow the COVID-19 research protocols and guidelines. The updated research ethics clearance certificate of the study was issued by Stellenbosch University in November 2020 (attached in Appendix F). This authorised the researcher to proceed with the fieldwork after completion of the proposal. The next stage was to seek informed consent from the potential respondents (see attached informed consent form in Appendix E). Issues such as transparency regarding the aim and use of the research, free and informed prior consent, and issues about anonymity and confidentiality were addressed at the beginning in the ethical clearance application, and with participants. The study indicated that

respondents' identities would be protected and therefore the use of a label (i.e., interview number) is used in the reporting of data collected during the study. Informed consent also sought permission to audio-record and/or photograph for later analysis. Where a respondent declined, their choice was respected, and the researcher resolved to taking down notes.

Conducting research with individuals and communities requires adherence to ethical guidelines and practices. Therefore, issues of voluntary participation and the right to withdraw from the study at any point, even if they agreed to take part, were also explained to the respondents (Creswell 2009; Bryman 2012). The purpose of the study was explained to the participants and that they would not be financially compensated for taking part in the study.

5.11 CONCLUSION

This chapter discussed the qualitative methodology adopted for the study, and the various methods used for data collection to triangulate the information gathered. Both primary and secondary sources of data collection were utilised. Primary data collection methods such as semi-structured interviews with fishers and FGD with cooperatives were discussed in this chapter. These were supported by secondary sources of data such as government policy documents and reports. Two sampling techniques which are purposeful and snowball sampling were found to be suitable for this study since fishers and cooperatives were specifically targeted for interviews and in the event referred the researcher to other specific fish marketing places and sites. Furthermore, of note in this chapter is the description of Norton fishing community (socio-economic, political) endowed with two fishery sources, which are Lake Chivero and Lake Manyame.

Different data collection phases were also documented, demonstrating that the study used thematic analysis as the method of analysing qualitative data. Data collection process and fieldwork was not without its challenges. Thus, methodological challenges and issues faced during fieldwork were also highlighted, complemented with ethical considerations. Importance of transparency regarding the intention and use of the research and issues about anonymity and confidentiality were addressed. The next chapter profiles the SSF actors and their implications on governance and livelihoods.

CHAPTER 6: PROFILE OF SMALL-SCALE FISHERIES' ACTORS AND THEIR IMPLICATIONS ON LIVELIHOODS AND GOVERNANCE IN NORTON

6.1 INTRODUCTION

This chapter profiles the different small-scale fish (SSF) actors found in Norton, document the activities they are involved in, their role in the fisheries system, their legal standing, the nature of their access to fisheries; and the implications these have on livelihoods and SSF governance. On the actors' front, the chapter also highlights an important aspect in Norton's SSF – poaching. It presents the two prominent views which emerged in the study of such actors and how these views shape SSF governance in the area. In order to understand better the said implications of the nature and involvement of the different actors on the Norton livelihoods, the chapter also draws on the consequences of Fast Track Land Reform Programme in Zimbabwe, an era which marked a transformation in socio-economic activities, resulting in SSF in the community becoming of paramount importance to livelihoods. The contributions of SSF to livelihoods are considered at both the individual and community levels, with community implications drawing on the effects SSF have had on the community at large.

6.2 PROFILES OF STAKEHOLDERS IN NORTON SMALL-SCALE FISHERIES

The study collected data from representatives of the various actors in the small-scale fisheries sector in Norton to get a comprehensive understanding of the governance structures dominant in SSF in Norton. A total of 113 respondents participated in the study, with 40 fisherfolk taking part through nine focus group discussions (5 held at Lake Manyame and 4 held at Lake Chivero). Seventy-three (73) individual interviews were also carried out, with interviewees comprising individual fishers (10), fish traders (36), fish poachers (17), community leadership (1), fish union chairperson (2), fish association chairperson (1), and representatives of various government departments (6). Tables A.1; A.2; A.3; A.4 and A.5 in Appendix A give a tabular illustration of the study's respondents and a summary of the details of respondents.

The respondents of the study in general ranged from 19 to 56 years of age, with fish cooperative members, individual fishermen, traders, and poachers ranging in age from 19 to 46, representing the economically active age range of the community. All those above 46 turned out to be part of the community leadership and representatives of various government departments. This suggests

that the different activities in SSF are labour demanding and can only be carried out by a certain age group, which is still physically strong. The respondents of the study were male dominated, reflective of the situation amongst different actors in Norton's SSF. Except for fish traders, most SSF respondents, and indeed SSF actors emerged as males. The socio-demographic information revealed in Appendices 6.3 and 6.4 emphasise the observation that fishing (whether legal or illegal) is predominantly a male activity. From data collected it was established that most fish traders in Norton are women, sharp contrast with cooperative fishers who are dominantly male. Women dominate the trading / vending part of the SSF sector as compared to the fishing activities. This can also be linked to the general history and nature of vending in the country. Vending is generally dominated by women, be it flea markets, street side vending in the Central Business District (CBD), stalls, or even in the small-scale mining industry. Therefore, women often go to these places to sell different commodities, including fish.

Twenty-nine men out of the 40 interviewed cooperatives members were involved in the actual fishing activities, using boats and nets, whilst the remainder, comprised of women, were involved in fish processing and trade. Twenty-nine women out of the interviewed 36 individual fish traders were involved in processing and trading of fish. This suggests a division of labour along gender lines, although it is not rigid, because there are men involved in fish trading as well. The low number of women involved in the actual fishing could be attributed to the dangers associated with actual fishing related to wildlife attacks such as crocodile, elephant and hippopotamus attacks (Rupapa 2021). Half of the fisherfolk respondents (fishers, traders, poachers) corroborated this view on the dangers associated with actual fishing to explain the low number of women in actual fishing. This means that at some point, fishing in the context of Norton is a physical activity. Furthermore, according to a significant number of fisherfolk respondents, the nature of conflicts between legal and illegal fishers in the form of physical fights using dangerous weapons was also another reason why actual fishing is a male dominated activity in both Chivero and Manyame lakes.

6.3 ACTORS IN NORTON'S SMALL-SCALE FISHING

This section presents a representation of different actors in Norton SSF. A detailed outline of the activities of each and every actor (formation, activities, and challenges) will be provided in chapter 7. The study found out that there are direct and indirect participants involved in small-scale fishing in Norton. The notion of direct and indirect participants was borrowed from Monaco & Soltanpour (2017) who identified participants and categorisation of actors in terms of their level of

involvement. Some of the direct participants include fishermen who carry out the day-to-day fishing activities; fish processors; fish buyers (fish traders), fish poachers (*fish bongas*¹⁰), consumers, and cooperatives. The study further found that indirect participants include those who provide services to the active participants, especially those found at the fish markets such as Katanga and White House¹¹. These service providers include boat repairers; food and accommodation providers; and Union groups that fight for the rights of fishermen. These two distinct groups are considered in detail below.

6.3.1 Direct participants

The researcher documented that small-scale fishing in Norton involved direct actors who comprise of individual fishers, fish buyers (fish traders), poachers (*fish bongas*), fish processers, fish consumers, and cooperatives. They were labelled as direct actors in terms of their level of involvement in the day-to-day fishing activities.

According to interviewees at both fish landing sites (*fish shops*) at Lake Chivero and Lake Manyame, most of the individual fishers were those who carry out fishing activities for subsistence or domestic consumption, and for sporting activities (boating and angling). The individual fishers' category is also denoted by fishing limits of less than five kilograms per catch as regulated by fishing laws and regulations. More details of their permitted fishing gear and access rights as individual fishers is given detail in later chapters focusing on regulatory frameworks which govern fisheries in Zimbabwe.

Seventy-four fisherfolk respondents who were interviewed at fish markets at White House and Katanga highlighted that fish wholesalers were the ones who were involved in buying bulk fish at fish landing sites at lake shores (Manyame and Chivero) and resale the fish in smaller amounts, either to other traders at the lake shores or in Harare and nearby towns such as Chegutu and Kadoma.

¹⁰ The local term *fish bonga* is derived from the Shona terms '*mazikiti/ katsi or magora*' denoting wild/ stray cats. Therefore, fish bongas are fish poachers likened to these stray and wild cats, which unlike domesticated cats are unruly, are not guided by any regulations and have to hunt for their meal (Interview with fisher respondents).

¹¹ Katanga and White House are popular markets in Norton where people sell various products including fish (Interview with fisher respondents).

Fish buyers (fish traders) fall in the category of those who usually buy the fish from wholesalers for resale directly to the consumers. Fish is usually sold directly to the consumers mostly in high density locations of Harare such as Kuwadzana, Highfield, Dzivarasekwa and other high-density locations in Norton and Katanga fish market. The fish traders usually buy the fish in twenty litre bucket containers.

The study gathered that fish cooperatives were organised groups of people who pooled their resources together, sought official fishing permits from relevant authorities, and were responsible for most of the commercial fishing at the two lakes. These are also known for being registered entities and are supposed to be professionally run, with some specific structures and responsibilities in place, such as secretary of the cooperative. Legally, a fishing cooperative should comprise ten people. However, there are cases whereby people ended up being more than ten in a cooperative. However, without the consent of ZimParks, they ended up creating what they called syndicates (Syndicates and the formation and constitutions of cooperatives are discussed in chapter 7).

The study observed that the Norton fish community had awoken to the urgency of mobilising resources and working together for their incomes and livelihoods, and formed fish cooperatives. Some of the reasons behind the formation of cooperatives were to organise common marketing activities such as trading or selling fish in bulk and providing access to low-interest loans. In other words, cooperatives are structured as a form of social capital. Besides, forming a fishing cooperative meant easily securing legal rights to fish. According to ZimParks officials and cooperative respondents, there were 40 registered cooperatives at Lake Manyame and 40 registered cooperatives at Lake Chivero. The formation of these cooperatives was guided by the Ministry of Small to Medium Enterprises, with the Department of Parks and Wildlife (ZimParks) responsible for the issuance of permits to the cooperatives. Thorough discussions of cooperatives will be done in the foregoing chapter under the institutional arrangements in the governance of SSF in Norton. However, 85 of the fisherfolk respondents (fishers, fish traders, fish poachers, fish union chairperson and community leadership) out of the 107 interviewed maintained that exorbitant permit fees for cooperatives and other restrictive access rights to the lakes contributed to the emergence of fish poachers (fish bongas).

Fish poachers were identified as unruly elements by the government agency ZimParks, but poaching was an 'accepted' phenomenon within the Norton fishing community. Details of fish poaching according to the community perception and ZimParks officials will be given later in the chapter. The study established that some sections in formal fishing denotes poaching as

characterised by failure to seek fishing permits, use of unregulated fishing equipment, and disregard of fishing regulations. They, therefore, acquired unknown fish amounts and were a product of a corrupt system involving law enforcement agents at the two lakes.

Fish processors denote the group of people who clean, sort, and pack the fish after the fish is caught. Lakes Chivero and Manyame produce different sizes and types of fish, including Nile tilapia (*Oreochromis niloticus*) and the sharp tooth catfish (*Clarias gariepinus*), which may be caught together, especially when using fishing nets. As such there is need to separate the different types and sizes, which are often priced differently as well. Fish processors ensure that the fish are sorted according to type and size, and are packed separately, while in some cases they are also cleaned and dried where necessary. Fish processing is usually done at the landing sites, but according to interviewees at Lake Manyame, huge and pressing demands from fish wholesalers lead to the fish being sold and dispatched without proper processing.

The study established that consumers are both direct and indirect actors in small-scale fishing at lakes Manyame and Chivero. Consumers were identified as the end-users of the fish caught at the two lakes, most of which take the fish for cooking and eating. Consumers were deemed direct actors where the end-users got their fish within the vicinity of the lakes, whilst they were deemed indirect actors where they accessed the fish through numerous intermediaries, away from the lakes.

The study observed that actors in Norton do not have clear-cut roles as the above categorisation seems to suggest. In some cases, actors assumed double or even multiple roles. Fifty percent of the fishers were also consumers, fish processors, and in some cases, traders. In some cases, members of cooperatives also acted as individual fishermen, and some individuals, who at some point had fishing permits, would fail to purchase permits and become poachers. Therefore, whilst the different categories of actors could be established, it was difficult to clearly and permanently identify and distinguish individuals as belonging to a particular category.

Of note also is the division of labour along gender and age lines within the existing small-scale fishing systems at Chivero and Manyame lakes. Many adult males were involved in fish catching whilst most women and children were involved in fish processing and trading. However, this does not necessarily mean that there were no women who fished and that there were no men involved in trading. Besides, given the fact that the actors changed roles often, the different activities ended up being done in differing proportions by men, women, and children.

6.3.2 Service providers / Indirect participants

Service providers/indirect participants were established by the study as those who provide different services to direct participants – such as the people who offer food to fish traders at Katanga, boat repairers, those who provide accommodation in Norton, and Union groups that fight for the rights of fishermen. These service providers are also crucial actors in SSF.

Food providers/caterers cook variety of foodstuffs such as pap (*sadza*) and rice prepared with various relish dishes which include roasted fish/ stewed fish, beef stew, chicken stew, roasted chicken, and beef offal. These food providers cook food for sale to make ends meet and thus act as a source of income for their families. They provide services like welding and small scale mining to fisherfolk and other informal industries around the lakes.

Service providers also include both mechanical and equipment repairers. Mechanical repairers were identified as those who repair motorboats. Other equipment repairers were identified as those who dealt with non-mechanical problems on boats and other fishing equipment such as fishing nets menders. Most repairers offer their services to cooperatives as compared to individuals. According to interviewees at both lakes, it is expensive to own a boat as an individual, which is one of the reasons why 28 respondents resorted to joining cooperatives so that they make contributions to afford such fishing gears. However, not all fishing cooperatives afford owning boats. Some hire them from well-established cooperatives, from elite individual fishers, or rich people in the community who own such boats. The study also established that a significant part of those involved in individual fishing do not seek the services of repairers but do most of the repairwork themselves, unless it is for some problem that requires specialist services.

Unions in the fish industry in Zimbabwe, and specifically in Norton, were established to denote the organised and registered representation of fishermen and cooperatives under a certain body whose mandate is to fight for and represent their rights. The study established that these unions are registered by ministries of Women Affairs, Community, Small and Medium Enterprises and have guiding regulations which inform their activities. According to one respondent, the fact that they are registered and are forced to work within certain legal parameters explains why the government is comfortable working with them. As one union chairperson relates,

"cooperatives used to work with associations (with their own independent constitutional mandates separate from government), but the government was comfortable to work with unions because they have by laws which correspond to

government's by laws and constitution" (Interview with union chairperson KI/2, Lake Chivero, November 2020).

All stakeholders interviewed at various sites expressed that cooperatives in Norton have union membership which represent their interests and work as arbiters between fisheries and the government. According to respondents, cooperatives elect a chairperson of the Union who oversees 40 cooperatives at Lake Chivero. Lake Manyame has its own union chairperson, overseeing 40 cooperatives as well. The chairpersons are elected by union members. The chairperson coordinates cooperatives under the membership of the union and represents them where necessary, acting as liaison with key government departments such as ZimParks, Ministry of Women's Affairs, Community, Small and Medium Enterprises Development (SME), and Ministry of transport.

The study established that, over and above the fishing cooperatives and unions available in Norton, exists fish associations. Fish associations were described by respondents as unregistered forms of fish community representation. One typical example of such associations in the Norton fishing community is the Darwendale Canoe Association which represents unregistered individual fishermen and fish poachers (fish bongas). According to respondents, the association was established in 2015 and was never registered thus, never formally recognised by ZimParks authorities. However, respondents maintained that they elected their committee (leadership) which represents them to ZimParks, for instance in cases where their boats would have been confiscated by Parks officials. The leadership negotiates for the release of the boats on behalf of the 'fish bongas'. Although three of the 17 fish poachers interviewed reiterated that they paid subscription fees to the association, it was really difficult to trace the formal structures of the organisation and they only referred to one person as 'their leader'. The researcher observed that other committee members were usually silent and inactive. However, despite not being formally recognised by ZimParks, the Darwendale Canoe Association and the Lake Chivero Users Association represent a significant portion of the fish bongas, which is commendable in clean up campaigns to reduce pollution at the lakes.

The grievances of the associations are sometimes not addressed or taken into consideration compared to the grievances which were aired by the fish unions. Fish unions are given comparative advantage over fish associations. The somewhat negative treatment of such fish associations was attributed to their informal operations and lack of formal recognition by ZimParks. Other respondents also highlighted the existence of councillors in Turnpike, Norton who represented members and relayed information to ZimParks.

The aim of the above section on actors was to give a comprehensive synopsis of all the role players who are part of the study, then later, in the next chapter demonstrate how they fit in the fishery system. The next section highlights the socio-economic background of the actors. It traces the policy initiatives such as the Fast Track Land Reform Programme (FTLRP) in the year 2000 and how the programme resulted in deindustrialisation. This policy initiative led to the negative impacts on the livelihoods of the Norton community, such as loss of jobs and incomes, which resulted in many turning to fishing as a livelihood strategy.

6.4 NORTON COMMUNITY PROFILE AND LIVELIHOODS

Fishing as it is practised today is a product of the socio-economic shifts experienced in Zimbabwe in general, and the community specifically, starting with an unexpected economic melt-down which was exacerbated by the adoption of controversial policies such as land reform. The ultimate result was de-industrialisation, rise in unemployment levels, and the need to adopt alternative livelihood approaches. Having established the different actors involved in SSF in Norton, the study sought to evaluate the contribution of fisheries and SSF actors to livelihoods in Norton within the context of the socio-economic background of the actors, to fully understand the contribution of SSF. Appreciating the historical background that face actors is important in enlightening the study on how different aspects forced them into formulating alternative coping strategies to sustain their livelihoods. The study established that the period of deindustrialisation that Zimbabwe underwent, especially after the onset of the FTLRP in the year 2000 contributed to the negative impacts on the livelihoods of the Norton community and resulted in many turning to fishing as a livelihood strategy.

Fast-track land reform programme led to the collapse of the economy and as a result to deindustrialisation. Deindustrialisation in most cities and towns in Zimbabwe, including Norton, ensued in the shutdown of firms across all economic sectors with manufacturing heavily afflicted (Magidi 2018). According to interviewees of the older generation who have stayed in Norton since its infancy, Norton transfigured from being a farming small town to a residence town supporting Harare, and ultimately, a maverick industrial town which housed many large companies. It was stressed by one interviewee that,

Norton used to accommodate big industrial firms such as Rio-Tinto, Hunyani Paper Mills, Karina Textiles and David Whitehead ... and they used to build schools and roads for people.

(Individual community member KI/1, Katanga, December 2020).

Other industries identified include Zimbabwe's largest platinum producing company, ZIMPLATS which is also located close to Norton. Interviewed former farm workers also mentioned that Norton was surrounded by productive farms such as Kent, and Kintyre where some section of the community used to sustain their livelihoods and incomes. Not only farms were located close to Norton, but so were also other numerous gold and chrome mines located on the outskirts of Norton. In the case of fisheries, significant economic activity was happening at Lake Chivero,

"where former white settlers such as Lewin...and a number of large firms were involved in commercial fishing".

(Fish Co-operative Union Chairperson KI/2, Lake Chivero, December 2020).

Most of the above stated manufacturing firms are no longer functional and some are non-existent as they sold their assets. For instance, Allied Steel and David Whitehead disposed all their assets, dismounting every bit of machinery and equipment. The firms also sold off their immovable properties. Most of these former industrial sites are now in a dilapidated state. Some remaining firms such as the National Railways of Zimbabwe (NRZ) depot in Norton and Dandy Zimbabwe are partially operating due to the economic meltdown. Some of the industrial and commercial buildings have been turned into schools and beerhalls, which reveals that the country's economy is in shambles. For example, a complex which used to house Central African Pharmaceutical (CAPS) holdings is now used by the Vatal Private Primary School.

The agricultural sector was not spared either. Field observations on the nearby farms found that huge surrounding farms are underutilised and general infrastructure was in a ramshackle state – same as the irrigation equipment which used to be intact back in the day. One respondent maintained that,

new beneficiaries of the fast-track land reform especially politicians are only cell-phone farmers... They do not have expertise in farming, neither do they spend time on the farms to oversee the day-to-day activities and inputs required to get a bumper harvest.

(Unnamed Former farm worker IF2, Katanga fish market, December 2020).

As a result of all the above, Norton has miniature economic activity in terms of manufacturing industries and formal employment and can be best described as a ghost town in economic terms. Therefore, with all the above stated examples, one can see that deindustrialisation is a reality in

Norton and it has a bearing in the livelihoods of the people (Magidi 2021). Deindustrialisation and the collapse of formal industries especially in the manufacturing sector forced people to engage in informal activities for their livelihoods. Small-scale fishing has over the years thus become the dominant livelihood activity for the Norton community.

6.4.1 Loss of jobs and unemployment

Seventy-five interviewed fisherfolk noted that preceding to year 2000 and the complete slump of formal heavy industries and the economy, loss of jobs was not such a big challenge in Norton and most people had little to do with fishing, but for recreational purposes. Most interviewed 'born frees' reiterated that the FTLRP of 2000 had a negative impetus in the collapse of industry in Norton whilst a small section of the older generation, especially those who grew up before independence, argued that FTLRP emancipated them and gave them access to their natural resources, including fisheries. The diverging views in land reform shows that respondents and the community in general have mixed feelings on the impact of FTLRP on the livelihoods of people. The same number of respondents felt that FTLRP had to a greater extent contributed to the collapse of industries such as David Whitehead and Dandy, directly leading to people losing their jobs and the shrinking of formal employment. Hence with the looming crises, people were forced to engage in informal activities such as small-scale fishing for their livelihoods. The crumble and ensuing shutdown of many lead companies in Norton resulted in extensive job losses.

Unemployment led to income losses for most of the Norton population. The study observed that 90 of the fisherfolk respondents lost their jobs and incomes which compromised their sustainable livelihoods. A significant number of respondents aired the same sentiments that, after the closure of several companies, they did not receive their exit packages. In fact, their respective companies owed them arrears which ranged from one to two years' salaries and benefits, and they never received anything.

From interviews respondents noted that salaries for those who remained in formal employment have since lost real value and most companies are delaying salary payments. Furthermore, the study found that several companies have resorted to employ on short-term contract basis, as a way of cutting down remuneration-related costs. This strategy is meant to erode the system of giving benefits like exit packages, and bonuses related with permanent employment. ZimPlats was

¹² Born frees refers to people who were born after independence of Zimbabwe on 18 April 1980 (Fisher respondent, Lake Manyame)

mentioned by interviewees as an example of a company where upon the expiry of contracts, workers will either be granted with short-term new contracts or termination of employment. The net effect has been the erosion of people's livelihoods; thus, people were driven by circumstances to turn en masse to fishing as a livelihood alternative. The next section outlines the poverty and food insecurity as a result of government policies on land reform.

6.4.2 Poverty and food insecurity

Political and economic instability have raised growing concerns of increasing poverty in Norton. Unemployment has left many households exposed to poverty. Those who lost their jobs and the ones poorly remunerated are bound to endure poor living standards which typify escalating chronic urban poverty. Respondents agreed that the closure of industries and subsequent income losses were the major causes of poverty in Zimbabwe's urban centres. Poverty is also related to food insecurity and 85 of the fisherfolk respondents alluded to the fact that people were surviving from hand to mouth and they were lacking basic food. Most community members were starving as was suggested by one respondent who lamented that, "tongorova zero, zero one [We survive on one meal (supper) for the whole day]" (Informal conversation with fish trader FT6, White House, January 2021).

Given the above challenges Norton residents have faced over the years, the study found out that residents resorted to fishing and related activities as substitutes. The study however established that people in Norton are involved in fishing at different levels. Some engage in subsistence fishing whilst others have taken fishing as a source of employment and income. These different levels are explored separately below. Over time however, the majority of fisherfolk have changed the way they engage in fishing, which reflects the changing economic situation in Norton.

6.4.3 The transformation of fishing in Norton and local livelihoods

As a result of the broader socio-economic changes Norton and Zimbabwe in general underwent, fishing in Norton has correspondingly shifted from subsistence and recreational to mainly commercial fishing. Fisher respondents identified subsistence fishing as the catching of fish mainly for own and family consumption, with very little of their catch sold as surplus. Ten individual fishers at Katanga and White House maintained that people used to engage in fishing for domestic consumption and leisure before the collapse of the economy in Norton. One respondent pointed out that,

we used to go fishing so that we could have a balanced diet in our meals... So that we could diversify with other proteins such as beef, pork, and chicken ... Sometimes we could just go fishing with my friends for leisure (boating and angling). (Individual fisher IF4, Katanga, January 2021).

In the industrialisation period in Norton (prior to the year 2000), people were involved in fishing not as a full-time activity but as something they could do during spare time especially weekends when they were off duty from industries. According to the respondents, fishing was something which they could relate to a hobby or having a catch for domestic consumption within a family set up. It was basically fishing for subsistence and not fishing as a source of income. According to one fisherman,

"people used to catch fish which include tiger fish, yellow fish, Hunyani salmon and black bream for domestic consumption".

(Interview with fisherman FT17, Manyame Lake, February 2021).

Some preferred the fish as smoke-dried whilst others wanted them as fresh and in frozen form. The inclusion of fish in the diets of the Norton community meant that fish played an important double role as a source of proteins and food.

The post-FastTrack Land Reform Period onwards, which the researcher also referred to as the deindustrialisation period in Norton, witnessed a shift from formal to the emergence of an informal economy. Through the various interviews, the study gathered that the dearth of industries marked the birth of informal livelihood strategies and the growth of the informal economy not only in Norton, but in Zimbabwe as a whole. Seventy-five of the fisherfolk (fishers, fish traders and poachers) respondents noted that the informal sector was not popular before the economic crisis but only became notable after the plunge of the economy. The respondents maintained that people are now engaged in informal activities to make ends meet and for survival. Fifty-four fisherfolk respondents, including one official from the ministry of SME, also alluded to the fact that people engage in informal activities for different reasons, some of which include supplementing meagre salaries for those who are formally employed. The salaries were reported to be so inadequate. Some of the formally employed chose to quit their jobs and engage fully in informal activities whilst others opted to work in fisheries on part-time basis, especially during weekends. Others join informal activities out of frustration because they have never been formally employed, and these usually constitute those who grew up after the collapse of the Zimbabwean economy. Forty

percent of the interviewed graduates have joined informal activities in Norton because of unemployment, as reiterated by one University of Zimbabwe graduate:

I have realised that it's better to lock my academic certificates and accolades in a cabinet for now and dance according to the demands of the prevailing situation...otherwise I will starve and lose dignity in the community if I fail to fend for my family hoping that maybe one day things will change for the better... We have waited for too long now...its more than 10 years now, hoping that there will be a turnaround in the economy and things will work out for the better... We are a lost generation.

(Interview with a fish trader FT21, Lake Chivero, February 2021)

The sorrow and sadness on his face revealed the general frustration in the Norton community. People felt betrayed by the government's empty promises existing in its election manifestos as was expressed by one respondent at Katanga:

prior to 2018 elections, the ruling ZANU-PF government promised us jobs in exchange for our votes...but look my brother what is happening now, we are languishing in poverty and things are getting worse every day. Our local currency is losing value every day and prices of basic commodities are skyrocketing every hour trying to beat the inflation... how can we survive in this hyper inflationary environment if you can tell me?... Where are the jobs which they promised us?... We do not have a choice but to hustle to feed our families.

(Informal conversation with a fish trader FT11, Katanga, February 2021).

Thus, people engage in informal activities to fend for their families and boost their incomes. People were frustrated with the broader economic governance because they felt that it affected their day-to-day livelihoods. Failure by the government to implement sound economic policies in resuscitating industries has continued to be blamed for the huge unemployment levels in the country. Some respondents expressed displeasure at some corrupt tendencies in government. One interviewee, an academic at White House, explained:

You know, what's surprising me my brother is that the government has this blame-colonialism-mentality in all their failures to handle duties and mandates, arguing that the colonial government never taught them how to run and lead the country... Not only do they complain about handling the country politically...but they also blame the

sanctions on their kleptocracy and corrupt activities...look at the RBZ scandal on farm mechanisation loans where most beneficiaries were politicians, and they did not pay back the money... can we blame the sanctions on that?... What about the ministry of health's tender scandal on COVID-19 protective gear supplies?... The list goes on and on...how can we resuscitate our industries and economy if we cannot put our house in order.

(Informal conversation with an unnamed university lecturer IF10, White House, March 2021).

Sixty-four of the fisherfolk respondents were of the idea that they were into informal economy because of bad governance — described as the failure to implement good economic policies, kleptocracy and corruption. There are different informal activities in Norton such as small-scale mining, welding, vegetable vending, and small-scale fishing. 80 respondents of all the stakeholders interviewed in the study acknowledged that small-scale fishing is the largest informal activity in Norton.

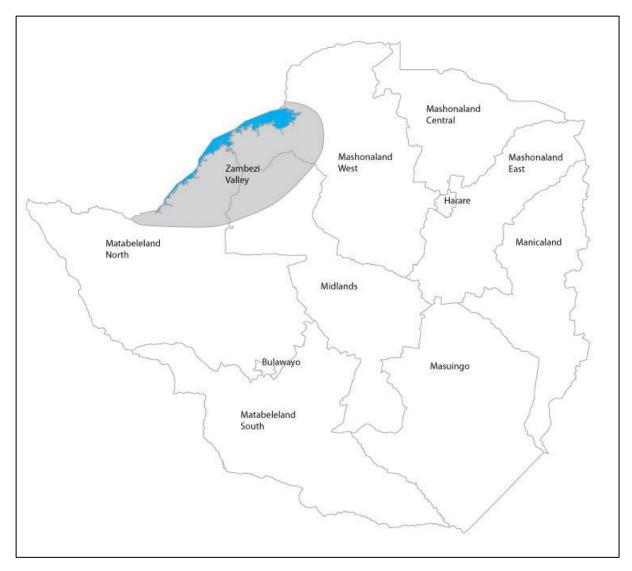
Prior to deindustrialisation, the Norton community was mainly involved in fishing for subsistence but in the post-FTLRP most people engage in fishing as a full-time activity and employment creation. They are involved in fish catching and fish trading as a source of income and a livelihoods activity. Different age groups and people with diverse academic and professional backgrounds were involved in this informal economic activity because of the collapse of the formal job market. Both men and women were also involved in small scale fishing with a large group of women mainly involved in fish trading. SSF also offered employment opportunities for Norton community. Established fisheries offered fishers and fish processor posts to other unemployed community members.

The Norton fisherfolk community sell these fish species in Norton suburbs such as Katanga, Ngoni and Maridale. The largest fish market in Norton is called Katanga, where one of the women fish traders reiterated that

we sell fish to get incomes to buy our groceries such as cooking oil and soap to use in the house...We also sell fish to get school fees, buy uniforms and books for our children... Selling fish is our full-time activity and that is where we derive our incomes and livelihoods from... Thanks to these lakes.

(Interview with woman fish trader FT17, Katanga, March 2021).

The above expresses the reality experienced by the Norton fisherfolk community whose livelihoods now entirely depend on fish resources. Fishing has become a full-time activity for the community and it acts as a source of income, catering for diverse needs. Figure 6.1 shows the Zimbabwe map with some cities and provinces where fish wholesalers and traders sell their fish.



Source: (Manyena et al. 2016: 6).

Figure 6.1 Towns and intercity for fish sale.

The Norton fisherfolk community supplies its fish to more than Norton residents with their market stretching to nearby towns such as Chegutu and Kadoma, and for intercity business escapades to cities such as Bulawayo and Mutare/Manicaland (Masikati 2021). Some of the fish was also sold

in Harare high-density¹³ suburbs such as Kuwadzana, Dzivarasekwa, Budiriro, Mufakose and Highfields, amongst others. Seventy-five fisherfolk respondents further pointed out that some wholesalers buy fish in bulk from fish landing sites at both lakes for resale at mark up prices in their respective residential suburbs and cities. Four fisher respondents maintained that they sell their fish to large supermarket shops and chain stores, which signifies that a significant number of fisherfolk conducted their fish business on a small-scale basis, and only a few had access to large supermarket supply chains.

As noted by half of the fisherfolk interviewed at both lakes, they played double roles of being involved in fish catching and fish trading at their fish landing sites. This implies that the Norton fisherfolk community is involved in most parts of the fish value chain process to maximise the incomes they could get from the activity. They sell both fresh and dried fish at their fish shops/fish landing sites packaged from one kilogram going upwards, and they use scales to weigh their fish and sell to customers. The study established that there was no fixed price and that prices were not homogenous across the market. Prices were based on demand and supply. If catches are low, fisheries charge more than \$2 per kg, and if catches are high, charges range from as little as 80cents to a dollar per kilogram. The next section gives empirical data of fishing as an alternative source of income and livelihoods after the collapse of the economy from the interviewees' perceptions.

6.5 FISHING AS A SOURCE OF INCOME AND LIVELIHOODS

The study established that SSF in Norton have played a plethora of roles economically and socially, ensuring that lives are preserved regardless of adverse economic conditions faced in the past few decades. Eighty-one fisherfolk respondents and two ZimParks officials pointed out that fisheries played a pivotal role in the livelihoods of the Norton fisherfolk community. SSF have become a source of employment creation and income generation for many Norton households since the collapse of the Zimbabwean economy and the closure of industries. One fish cooperative group at lake Manyame stated that:

our cooperative employs a number of youth in our community who are struggling to make ends meet... some are even scared to engage in marriages and start families because they will not be able to sustain and look after them...that's how bad the

¹³ High-density suburbs is a term used in Zimbabwe to refer to housing with a higher population density than the average. Such settlement patterns were designed during the colonial period specifically for black people to provide labour in the factories and farms (Manjengwa et al. 2016).

situation is... we have realised that the social structure of our culture and families have been destroyed...hence we sat down as members and decided how we can uplift the youth from this economic quagmire...thus we employed some members of the community as gutters and fish processors

(Blue star fish cooperative members C1,C2,C3,C4 and C5, Lake Manyame, December 2020).

Mambokadzi cooperative members, supported the above notion by asserting that they employed several youths (men) as fishermen to help them do the actual fishing than to go in the water and get involved in actual fishing themselves. Employment of men as fishermen was also done by Environmental Care Fishery, as related by its members who indicated that, "four members in our cooperative are men and they are involved in fish catching" (H1,H2,H3,H4, Lake Chivero, February 2021). Female cooperative members instead concentrated on fish processing and fish trading. Therefore, cooperatives act as a source of job creation for many members of the Norton community.

Fifty-three of the interviewees, who included widowed women and single mothers, explained that they used the proceeds they get from SSF incomes to pay school fees for their children and buy all the required stationery for their use. Not only did they use the money for school fees, but others also even suggested that they used the income to buy basic groceries such as cooking oil, rice, washing soap, and other basic food necessities for their families. They also used the incomes to pay other bills such as rents and electricity. Therefore, fishing is the major source of food security, employment, income, and livelihoods for the Norton community.

The study further established that SSF such as those found in Norton are an important mechanism that is responsible for achieving food security. It emerged that many households depend on fish as a source of food. This implies that apart from providing incomes for the Norton fisherfolk community, fish is also used for domestic consumption, and is an important source of proteins and other nutrients (Masikati 2021). The study found out from observations that a notable number of households in Norton more often consumed smoked, dried fish because of electricity power cuts. In this way, fish acts as a critical source of dietary micronutrients and protein for many Norton fisherfolk households. It was often emphasised that fish was the sole affordable and accessible source of animal protein for the poor Norton community. Therefore, nutritionally fish contributed as the direct source of protein and micronutrients to the community, and as a result, contributed to the food security of the people.

Unions and cooperatives have socially contributed fish as food to social gatherings organised by the traditional chiefs and councillors of the area. The exercise was done as a gesture of giving back to the community in form of community social responsibility. It was also done as a symbol of unity to bring together cooperative members from two different lakes to mingle with other members of the community. According to one of the respondents,

cooperatives donate fish as food to social gatherings organized by the Member of Parliament (MP) or council...gatherings such as independence celebrations or heroes' day...chief's gathering or rituals...we can donate different types of fish delicacies... which range from smoke dried and fresh muramba and makwaya (bream/tilapia).

(Interview with Chairperson of Lake Manyame Fisheries Union KI/5, Lake Manyame, February 2021).

Five cooperatives have donated textbooks to local schools and contributed towards the payment of school fees to some orphaned children in the area. All this has been done in the hope of eradicating poverty in the community as this is one of the "visions of some cooperatives" (Cooperative Union Chairperson KI/2, Lake Chivero, December 2020). Proceeds from fishing activities have also been used in socially important periods such as funerals. It emerged that other cooperative members contributed all funeral expenses if one member passed on. More so, in cases where a relative of a cooperative member passed on, they contributed a certain amount of money.

The study also found out that SSF are more than an economic tool, but are a social tool, used for relaxation and recreational purposes. According to some fisherfolk, SSF play the double role as a form of employment and as a hobby. One individual fisher maintained that,

some of us have been introduced into fishing since tender age by our parents...it is sort of a way of life for us...to me fishing is more like a hobby or sport... I am addicted to fishing. I cannot spend more than 2 days without visiting the lake.

(Individual fisher IF7, Katanga fish market, January 2021).

The next section demonstrates the flexibility of the Norton fishing community, where the proceeds from fishing are re-invested in diversification to other ancillary sectors.

6.5.1 Diversification into other economic activities

The study documented that economically, proceeds from fishing and fish related activities have been used for diversification and investments in other projects such as poultry, farming, and cattle ranching. Diversifying into other projects gives investment security to the fishers as they do not solely depend on fisheries. Diversification into other projects is meant to cushion the fishers in times of crises like the events where there has been depletion of fish resources. Diversification further gives security from competition as one can get more incomes or profits from other investments. One union leader praised those cooperative members who diversified and invested in such huge projects as cattle ranching. However, he castigated the ones,

who invested in buying imported second-hand cars from Japan...buying a car is not an investment but a liability... a car depreciates value and it is a liability unlike if u can invest in fixed assets such as land and they can appreciate value...? I have realised that several youths these days are flocking to buy those second-hand cars... I have tried to advice a few but as you know at the end of the day is their money and they are willing to do whatever they deem necessary with it (Lake Chivero Union Chairperson KI/2, Lake Chivero, December 2020).

Two of the interviewed cooperatives are able to diversify into other economic activities, investing their incomes into such capital-intensive projects as housing projects and farming. SSF contribute to the buying of houses and the development of residential and business stands. Having decent housing is one of the goals of most cooperatives. Other fishers also vowed to invest in transport business to lessen the transport woes which the Norton fisherfolk community currently faces.

However, it is worth noting that not all fishing cooperatives and individuals managed to reinvest and diversify. Seven of the remaining interviewed fishing cooperatives are languishing in poverty and are only surviving from hand to mouth. The income some make from fisheries is not even adequate to sustain daily lives. Their livelihoods are further compromised by the staggering economy operating in a hyper inflationary environment, with high levels of unemployment and the collapse of the formal industry. Fishers were also involved in environmental conservation as the next section demonstrates.

6.6 ENVIRONMENTAL CONSERVATION

The issue of environmental conservation became apparent through exploring the contribution of SSF on livelihoods and governance. The importance of the fishing environment and its surroundings to livelihoods was apparent to the fisherfolk. As such, it emerged from the study that most are aware of the need for the conservation of fishing ecologies, with some taking active steps to safeguard the sustainability of the fishing industry in Norton. Five of the interviewed fisheries played a major role in conserving the environment, whilst others in contrast contributed to its pollution and general decline.

Fishers pollute the lakes with litter and used nets close to the shores. So far, five of the cooperatives at both lakes have agreed that they should clean up their camping sites after use to avoid pollution of the lakes. Pollution of the lakes resulted in depletion of fish stocks. Some fishers further raise awareness on the importance of cleanliness to other cooperatives to protect the endangered species, which in this case is fish, thereby playing a role in ensuring the sustainability of fisheries. The study understood that cooperatives and individuals in Norton have agreed informally to protect the two lakes for their children and for the generations to come since their livelihoods depend on the lakes. More so, to protect the environment, cooperatives

engage in clean up campaigns to pick up the litter especially when water levels are low. They used to do it quarterly as lake users and not specifically cooperatives. (Cooperative chairperson KI/2, Lake Chivero, December 2020).

From the field observations made and the interviews conducted, 25 fish traders maintained that fish consumers preferred fish from Lake Manyame compared to the fish from Lake Chivero. Some of the reasons for their preferences were that fish from Lake Manyame was tastier and could last longer before getting spoiled compared to fish from Lake Chivero, which according to them, could easily get spoiled because the water is heavily polluted from sewage and industrial affluent from Harare. A fisher from Lake Chivero supported the above observation by asserting that

most of the times we lie to our fish consumers that we catch our fish at Lake Manyame when in reality the catches are from Lake Chivero because consumers shun fish from Lake Chivero according to them fish from Lake Chivero does not have good taste because of chemical waste from the industries (Informal conversation with fisher FT25, Lake Chivero, March 2021).

Another fisher respondent further alluded that

it is difficult to store fish from Lake Chivero for the whole day as it can easily get spoiled since we do not have refrigerators at fish landing sites...however, fish from Lake Manyame under the same conditions can survive the whole day [Informal conversation with a fish trader in a combi (taxi) FT13, Lake Chivero, March 2021].

The Lake Chivero Fish Union Chairperson expressed concern over the pollution of the Lake and said that they had even sent a letter to the president of Zimbabwe explaining the ramifications of the problem and the need for urgency to address it. Otherwise, the livelihoods of the Norton fisherfolk community would be compromised. Such pollution is credited for the growth of a big threat to lakes and fisheries at Lake Chivero, known as water hyacinth. This is a fast spreading weed which covers the surface of water bodies. An interesting dynamic from other respondents was that the water hyacinth plant is also crucial in avoiding the depletion of the fish because the fish species could use it as sanctuary from 'fish bongas' (fish poachers). The next section presents and interprets poaching as part of the greater system that shapes governance of SSF. Poaching has a huge impact on governance and livelihoods.

6.7 FISH POACHING

Whilst the poaching of fish resources is a major challenge in Norton SSF, it is a subject worth examining separately as it reflects the different discourses existing on fisheries access and has important implications on governance. The practice is so rampant that it is crucial to establish the reasons as to why people engage in fish poaching from the respondents' point of view and whether they support fish poaching or not. If not, what possibly could be done to conserve the natural resources? Respondents stated that they know the dangers of fish poaching and that poaching is not good in conserving the endangered species. One view contends that poaching is a serious problem, whilst the other views poaching as a reaction to an already existing and even bigger problem.

During informal conversation, it came to the attention of the researcher that fishers faced difficulties in catching fish during the winter season and that it was frustrating to go back home with next to nothing. Fishers pointed out that some cooperative members are engaged in poaching by using unregulated fishing nets with smaller sized holes. This was later clarified during a focus group discussion with Two sunrise cooperative members indicating that

cooperatives use mosquito nets with smaller sizes than the regulated ones under Parks and wildlife Management... they lay their mosquito nets at night so that they will not

be recognised by Parks rangers...they will spend the entire night beating the water using banana leaves as a way of driving the fish towards the laid nets... they will take even the smallest fish since they will be using mosquito nets... (Interview with Two sunrise fish cooperative D1,D2,D3,D4, February 2021).

A Tempascon fishing cooperative member also echoed the same sentiments and indicated that when catches are low "ndinoona yekutamba semurume ndotombotorao manets angu ndega asingatenderwi ndotomboita inoitwa nevakomana ma fish bonga. Hapana chavanoita chandisingazive". [...when things are tough, I also engage in fish poaching, just like the fish poachers. I know every trick they use to catch the fish.] (I3, White House, January 2021).

From the informal conversations and subsequent discussions, the study found out that poaching is broad and it should not be only associated with the group of people who allegedly cannot afford permit fees or those who are outside the legalised formalised institutions or organisations. It was observed that poaching exists in the formalised institutions as well.

Nine cooperatives complained about poaching from informal fishers who operated outside their fishing cooperatives. A significant number of these poachers were unregistered individual fishermen (*fish bongas*). Fisherfolk respondents pointed out that people engaged in poaching because they could not afford the exorbitant permit fees required by the ZimParks Authority. Furthermore, informal fishers were involved in fish poaching because they could not afford to raise capital or membership fee to join other members as cooperatives. Five fish poachers also stressed that they were excluded from joining cooperatives based on their political affiliations. The study observed that seven cooperatives were ruling party affiliated. As a result, one needed to be a card-carrying member/supporter of the ruling ZANU-PF party to be admitted/registered in such cooperatives/fisheries. Two individual fishers maintained that they could not join the cooperatives because there was a limited number of permits granted to cooperatives at any given time.

Besides, the period FTLRP in Zimbabwe witnessed a collapse of industries because of economic and political factors as explained in chapter four, factors including deindustrialisation and unemployment led to loss of incomes, which forced people into illegal fishing/ poaching. Loss of incomes meant that a large section of the fisherfolk could not afford biodegradable nets as required by the Parks and Wildlife Authority. Biodegradable nets were expensive since they were imported from countries such as Zambia. There was therefore limited access of biodegradable nets by local

fishers. For that reason, many indicated that they were forced to fish using twine nets which were widely available in Zimbabwe and are considered cost effective in business (Mutingwende 2014). One interviewee at Lake Chivero stressed that,

we use twine nets because they are cheap... A net 100 metres long goes for \$17 at fishing gear shops in Harare... others make their own twine nets for even less money by using plastic (Interview with fish poacher P15, Lake Chivero, February 2021).

The same sentiments were shared by eight individual fishermen, who have been fishing for more than 10 years. One fisherman stressed that he used biodegradable nets for intermittent periods, but often struggled to find them in fishing shops in and around Harare:

The nets are rare because they are not manufactured in Zimbabwe... the nets are also difficult to use because they are too visible for the fish ...If I use them, I do not get many fish as I could get from twine nets because twine nets are thinner....Others also consider using wool nets but I still stand with twine nets as the best in catching more fish (Informal conversation with fish poacher P9, Lake Manyame, February 2021).

As evidenced, three cooperative fishers and 17 poachers confirmed that they could catch more fish using non-biodegradable nets compared to what they could get using the required fishing nets.

Six cooperatives and two ZimParks officials indicated that they faced serious challenges because of fish poaching. They maintained that the problem with fish poachers is that they use unregulated fishing gear such as smaller sized fish nets like mosquito nets, nets made of monofilament fishing line, and twine nets. This resulted in the catching of smaller fish, endangering the very existence of the fish and the sustainability of fishery livelihoods. According to Parks and Wildlife Act, fishers are required to use regulated fish nets of sizes 3.5 inches to 5 inches. As such, use of these unregulated nets is in contravention with the Parks and Wildlife Act. Other poachers also used poisonous chemicals to kill the fish, which was also hazardous to the lake and the environment.

Poaching is also rampant in the breeding zones¹⁴. Breeding zones are a no-go fishing zone and are prohibited for fishing activities by ZimParks authorities (Manomano 2021). Interviewed

¹⁴ Breeding zones are areas identified by ZimParks in Lakes Chivero and Manyame which were considered for protection as breeding and nursery grounds for many fish species in the lake. The areas were identified, characterised, and mapped to provide information on fish that needed protection. Fishers were prohibited from accessing these areas (Interview with ZimParks key informant at Lake Chivero).

authorities said that fishing in these zones disrupts the process of breeding certain types of small fish such as kapenta. However, some unregistered individual fishermen and registered cooperatives were involved in illegal fishing/poaching in those breeding zones (Masikati 2021). Fish poachers indicated that they were involved in kapenta fish poaching because it is popular among Zimbabweans and is cheap and can feed large families. Interviewees maintained that,

we have been selling this fish for years although the fish is mostly found in lake Chivero's breeding zones where fishing is prohibited...we know it is illegal to fish in these breeding zones but we are doing it for survival to bring food on the table for our families" (Informal conversation with fish poachers P11,P12,P13,P15,P16, White House, February 2021).

Another interviewee at Lake Manyame observed that, "we fish in breeding zones because that's where we could get more fish catches" (Informal conversation P5 cooperative members).

The study learnt that attempts have been made to deter poachers from carrying out illegal activities through the imposition of fines. The study gathered that there were different types of fines, with some for poaching, polluting the water, and lack of adequate fishing gear. According to interviewees, ZimParks charged the whole cooperative even if the offence was committed by one cooperative member (fishermen at lake Manyame). Fishers who were caught using unregulated fishing gear (wrong nets) were apprehended and their fishing gear was confiscated by ZimParks officials, and they could pay a fine. One respondent pointed out that,

a fisherman caught using a net such as this (twine net) or fishing in breeding zones can receive an equivalents of USD \$20 fine or imprisonment (Individual Fisherman IF4, Lake Manyame, March 2021).

Individual fishers had regulated times to access the lakes. They could access from 06:00 hours to 18:00 hours. If found not recognising the time zones they were required to pay fines. However, legal fishers raised their frustration concerning the nature of the fine system and how they regard the practise as too light a sentence to seriously deter any poaching. In a focus group discussion, one cooperative member pointed out that

poachers just pay token fines under current laws. Although we have witnessed quite several individuals being arrested... say for instance more than 10 times in a month, they continue to poach, the penalties are too light (Blue star cooperative members C1,C2,C3,C4,C5, Lake Manyame, March 2021).

According to ZimParks regulations, poaching is a crime and poachers must be reprimanded and are required to pay fines. Besides poaching, the study found out that there were other petty crimes which attracted fines as penalties. An example is what is commonly referred by locals as 'the compensation of fish'. Respondents explained that compensation of fish meant that ZimParks rangers will weigh one's catch and then charge the fisher for any excess weight per kilogram. Another ZimParks official further stressed that on average, forty people per month are arrested for fishing without a permit at Lake Chivero.

However, according to the fisher interviewees, ZimParks rangers are not executing their duties to full capacity because they have a shortage of resources. ZimParks rangers did not have enough speed boats to conduct patrols for monitoring illegal fishing at both Lakes Chivero and Manyame. The interviewees stressed that the government is constrained since each lake had one speed boat, which was not enough to conduct thorough patrols considering the capacity and length of these lakes. The number of boats to lake ratio was not proportional. To worsen the situation, most of the times these boats did not have fuel to do the patrols. Interviewed Mambokadzi cooperative members stressed that,

we sometimes mobilise our resources as fishers or cooperatives to contribute money for fuel to give the Parks rangers so that they can do patrols to minimise poaching... it is not our mandate or jurisdiction to provide ZimParks officials with fuel...but sometimes we must step up to protect our endangered fish species if the government is failing or incapacitated to play its role (Mambokadzi cooperative members at lake Manyame A1,A2,A3,A4, Lake Manyame, March 2021).

The shortage of resources is also worsened by some section of ZimParks rangers who demanded bribes from poachers to access the lake. According to respondents, rangers allowed the poachers' unlimited access to the lakes even in breeding zones in exchange for bribes in the form of money. One of the fish poachers showed the researcher a photo of the 'beast' (cow) which was used by one of the fishers to bribe the ZimParks warden in return for unlimited fishing access favours. Other rangers also practiced the catch and release¹⁵ strategy in exchange for bribes. The study learnt that this exercise is rampant at both lakes and is the reason it is still difficult to eradicate poaching in Norton.

¹⁵ The catch and release is a process whereby rangers arrest the poachers with fish catches or fishing in unregulated fishing zones and then release them when they are given bribes (informal conversations with fisher respondents).

The Norton fisherfolk community expressed concern over the depletion of certain fish species due to overfishing and poaching. Fish was the mainstay of the society as the largest contributor of their incomes. According to the Lake Chivero Fishers Union, it once conducted research in March 2018 to prove that the use of unregulated nets is leading to depletion of fish resources due to overfishing of even the smallest fish species. In their survey, the fish union weighed a kilogram of fish catch from recommended fishing gear (3.5 to 5 inch) and it gave them six fish. On the other hand, a kilogram of small fish species caught with unregulated fish nets gave them 25 fish. Thus, the survey confirmed that fish poaching has devastating effects on the lakes due to overfishing and depletion of fish stocks. Cooperatives and individual fishers even called for stiffer penalties for those apprehended in fish poaching activities and that they could not afford to lose the fish species and the lakes since their livelihoods depend on the *twin* lakes. Fish resources provide food security and incomes to the Norton fishing community. To them, fisheries in both lakes should be a legacy for their children and the future generations to come.

While the system of poaching was despicable in the eyes of authorities, the study found out that it unearthed a people's reaction to what they viewed as a breach in their right to access and use natural resources as citizens with equal rights. The study revealed that, although considerations of economic deprivation were important in pushing individuals into poaching, equally important were convictions amongst some local people, individuals, and groups, that the current resource governance system carried with it gross injustice, which tended to benefit certain individuals at the expense of others. As explained by a local leader,

although it is often politically dangerous to go against authority in Zimbabwe, dissenting voices in the small-scale fisheries have found solace in poaching, which they use as a tool to express their dissatisfaction with natural resource governance. Importantly, some pressure groups and individuals have argued that current laws governing fish resource management and use-rights do not recognise customary access rights to communities within which the resources are found. Local resources, first and foremost, should benefit local communities, and as such it is these communities that must be responsible for such resources, eliminating prejudices, discrimination, malice, and favour... People then use a deliberate resistance to regulations as a weapon to show their dislike for and anger against the existing system. (Community Leader Interview KI/1, Katanga Ward, December 2020).

Respondents felt strongly that the restriction of access rights to SSF was the biggest factor propagating poaching. Respondents pointed out that a strict, top-down system did not give room to the views, concerns, and preferences of the fishing communities and as such was responsible for breeding the very idea of poaching.

6.8 CONCLUSION

The chapter profiled the different actors in Norton SSF. It gave a snapshot as to who these people are and how they relate to the livelihoods of the community. The study categorised actors into two: direct and indirect. This classification was according to their level of involvement, where direct actors were those involved in fishing related activities such as fishers, traders and cooperatives. Indirect actors were found to be service providers such as boat repairers and catering providers. The study, however, observed that actors in Norton do not have clear-cut roles as the above categorisation seems to suggest. In some cases, actors assumed double or even multiple roles. Fishermen were also consumers, fish processors and in some cases traders and catering providers.

Major issues which were highlighted in the chapter include the FTLRP implications in post year 2000 and how it resulted in the collapse of industries, loss of jobs, and unemployment thus transforming the nature and meaning of fishing in Norton. The collapse of the formal economy has led to the emergency of the informal economy where communities had to find alternative livelihoods for their survival. People also engaged in fish poaching for survival because they could not afford exorbitant permit fees, amongst other reasons. This is the story of the Norton community where people had to survive after losing jobs from the manufacturing industries and surrounding farms. The dynamism, spirit of resilience, and innovation of the Norton fisherfolk community motivated them to engage in SSF.

Small-scale fishing became the main source of livelihood in Norton. People engaged in small-scale fishing for food security, income, and general well-being of the household. The community uses income from fish to cater for varying needs. Notably, some have used proceeds from fishing to diversify into other economic activities. The chapter also presented findings on pollution and environmental conservation and how the fisher community has decided to ensure that their newly found livelihood activities are sustainable. The problem of poaching, which is both a threat to and a livelihood dynamic, was also presented in the chapter. The next chapter discusses the governance issues surrounding SSF in Norton.

CHAPTER 7: GOVERNANCE OF SMALL-SCALE FISHERIES IN ZIMBABWE: RESARCH FINDINGS

7.1 INTRODUCTION

While the previous chapter established the importance of SSF in post-2000 Zimbabwe and identified the diverse role players in SSF of Norton, this chapter establishes the governance systems in place, and the challenges identified as impacting SSF and resultant livelihoods. The chapter further presents the image of what data has revealed in the context of Norton SSF. Using Norton as a case study, the chapter will assess whether regulations governing SSF in Zimbabwe are effectively implemented or not. The chapter further interrogates the probability of stand-alone SSF legislations in Zimbabwe and how such legislations would affect the livelihoods of fisherfolk in Norton.

7.2 HIERARCHICAL SMALL-SCALE FISHERIES GOVERNANCE SYSTEMS IN NORTON

The study established that the system of fisheries governance in Norton is hierarchical, characterised by top-down approaches in the management and conservation of natural resources. The structure of this hierarchical system is underpinned by formal regulatory systems. The top-down approach as experienced in Norton denotes the government being in control of the management of the fisheries resources. Such control is implemented through the enactment of legislations and policies which regulate fisheries in Zimbabwe, and Norton in particular.

Hierarchical governance in Norton and Zimbabwe at large entails formal levels of state control whereby each department or section is subordinate to its perpendicular superior, and in which duties are split into more compliant forms. The system is bureaucratic, and the series of instruction involves state administrators who set out planned objectives that civil servants then implement through state schemes.

According to the official position of Parks and Wildlife, the dams in Zimbabwe can be grouped into two broad categories, namely those outside the Parks and Wildlife Estate and those within the Zimbabwe Parks and Wildlife Management Authority (ZPWMA) Estate. The two lakes in Norton (Chivero and Manyame) fall under the guardianship of the ZPWMA Estate (hitherto referred to as ZimParks) and are therefore delegated as Recreational Parks according to the (Parks and Wildlife

Act Chapter 20,14). Fisheries management in the lakes within the Parks Estate is centralised and access to the fishery is regulated.

7.3 INSTITUTIONAL ARRANGEMENTS IN NORTON'S SMALL-SCALE FISHERIES

Institutions are understood in this study as relating to social structures, whether in the form of human groupings, norms, values, laws, agreements, rights, procedures, organisations, beliefs, culture, or behaviours pronounced within the Norton small-scale fishing communities (Kooiman et al. 2005; Kooiman et al. 2008). 'Institutions' in this study should therefore be considered in broad terms as it covers organisations and their structures, including cooperatives and their constitutions. It also embraced government departments/ministries and the acts which govern fisheries such as ZimParks as an organisation and the Parks and Wildlife Act as the law of governance. Traditional leadership and cultural rights, if any, also form part of the institutional arrangements.

7.3.1 Fisheries regulations, regulatory frameworks and acts which govern small-scale fisheries in Norton

In Zimbabwe, fish are managed under legislation governing wildlife and other natural resources. However, unlike other countries of the region such as South Africa, the study established that Zimbabwe is yet to develop a dedicated, stand-alone, fisheries and aquaculture policy framework. It emerged from the enquiries that The Parks and Wildlife Act (Chapter 20,14 of 1996, as amended) is the principal legislation governing the control, development, and management of fisheries in Zimbabwe. Part XIV of the Act deals with conservation of fish.

The final authority over the fishery resource for some time has been placed in the Minister of Environment and Tourism, but was transferred to the Ministry of Agriculture as gazetted on the 28th of January 2021, with a fisheries department created within the ministry to better serve the needs of fisheries. The Minister exercises this authority through the Director of ZimParks. ZimParks, through its director, is empowered to control, restrict, regulate or prohibit fishing in controlled waters. The following are the main Acts controlling the regulation of SSF in Norton, as in the rest of the country.

The Parks and Wildlife Act is the main Act regulating SSF and fisheries in general in Zimbabwe. The Inland Waters Shipping Act (Chapter 13,06), as amended in 2001 also regulates fisheries in Zimbabwe. Generally, the Inland Water Shipping Act regulates the fishing boats and engine sizes

to be used in inland waters. Lake Chivero and Lake Manyame belong to this inland water's category. However, according to six cooperatives respondents, many cooperative boats were last registered in 2005 by Ministry of Transport and Energy. Respondents further complained that the ministry is currently concentrating on registering the speed boats for leisure at the expense of cooperatives' fishing boats.

According to key informant interviewees in the Ministry of Environment and Tourism, Environmental Management Agency (EMA) under the ministry was also responsible for ensuring that fisheries and fishers were working in and maintaining environmentally friendly conditions. EMA was established under the Environmental Management Act [Chapter 20,27] and enacted in 2002. Furthermore, although 14 of the interviewed fish traders talked about the Rural District Act (RDA), to some extent, this legislation regulated fisheries in certain areas such as those which were on the periphery of Norton town. Fish traders maintained that they go to sell their fish in rural areas and other districts close to Norton such as Zvimba, Chegutu and Mhondoro. According to the respondents, these districts have their separate rural district councils which required district specific fish selling permits in addition to ZimParks fish permit. One fish trader maintained that,

we ended up getting confused as to what are the exact requirements needed by the Parks and Wildlife authorities and councils... because sometimes the rural district councils requested us to produce the permits for marketing and sell of fish which is supposed to be processed by their respective (rural) offices...besides us telling them that we had already processed our fishing permits from Parks and Wildlife headquarters in Harare...There were instances where I went to sell fish in Mhondoro and Zvimba, and to my surprise these two rural districts demanded separate fish selling permits specific to their respective districts in addition to the ZimParks fish permit which I already obtained from head office in Harare.

(Interview with fish trader FT 9, Katanga, December 2020)

The above assertion from the respondent and that by other respondents indicated that small-scale fishers incurred a lot of expenses from paying permits from different government departments and district councils. This bureaucratic system further confused the fishers as there was no specific department or ministry to deal with fisheries related issues. Under the Rural District Act, the Council has the mandate to promote, establish and maintain fisheries and fish farms. Further, the council facilitates the provision of permits for sale and marketing of fish. However, the above assertion pertaining to Rural District Act concurs with the fish cooperative union leader's statement that, "One has to follow by laws of the particular town/ city for selling of fish". (Lake

Chivero fish cooperative union chairperson KI/2, December 2020). Other fishers also concurred with the Union chairperson by asserting that they acquired fishing licenses from ZimParks and selling/vending licenses from Norton town council.

More so, 10 out of 36 fish traders stated that the Ministry of Health and Child Care officials demanded health certificates from them. The certificates, according to the health officials, were meant for food handling, especially for fish traders. According to the officials, fish traders were supposed to be issued with medical certificates to make sure that they are medically fit to handle food products (fish). Implications of various fisheries regulations and Acts are highlighted in the next section.

7.3.2 Implications of fisheries regulations and Acts

The study documented that, fishers from Norton were experiencing frustrations in acquiring fishing permits and having to pay multiple taxes due to duplicated procedures from different licencing and administrative authorities. Fisheries were entitled to apply to Ministry of SMEs to register their cooperatives and Parks and Wildlife Authority for fishing permits. There is no dedicated, stand-alone fisheries policy in place. Many respondents complained that, currently, several laws regulate fisheries and these include Parks and Wildlife Management Act, Cooperative Societies Act, Environmental Management Act, Inland Waters Shipping Act, Rural District Act and Ministry of small and medium enterprises, with overlapping requirements and enforcers. Besides, these Acts are too fragmented, resulting in high licencing costs. For some fishers who sell fish outside Norton to close-by rural areas, it meant that they were supposed to be registered under Parks and Wildlife Act and Rural District Act to be permitted to sell fish in those areas. Therefore, the overlap in these Acts meant that for fisherfolk to be fully recognised, they should be registered adequately and satisfying both laws.

To make matters worse for the fisherfolk community, at the moment, only the Parks and Wildlife headquarters in Harare issues fishing permits while individual rural district councils sold their own trade permits separately. Environmental clearances from the Environmental Management Agency (EMA) were sometimes a serious issue, resulting in fishers needing to seek these clearance certificates. This consequently entails that every fisherfolk would need to commute to Harare to get a fishing permit and visit different town councils and rural district councils to get other permits. One respondent stated that,

we are facing a problem of paying double levies to Parks and Wildlife Authority and Rural District Council which of course is a burden to our cash-strapped budgets...we cannot even afford to put food on the table, imagine paying double levies. Why can't they make it a single permit with all the requirements? (Interview with fish trader FT 15, Lake Manyame, January 2021).

Furthermore, respondents maintained that they faced challenges in interpreting those Acts since they are written in legal jargon. It emerged that not much was being done to simplify these laws or thoroughly explain and give adequate information on the contents of the requirements of the different permits and clearances. More so, five individual fishers maintained that the current laws are discriminatory, favouring cooperatives at the expense of individual fishers. For instance, they argued that the daily ticket is not paid per catch or quantity, which entails that one is obliged to pay the daily fee, whether one managed to catch fish or not. Individual fishers maintained that sometimes it is hard to get a good catch especially during the winter season, but one is still expected to pay. One fisher maintained that, "it's very possible to go home empty handed in the winter season, but one has to raise funds for the next day" (Informal conversation with a fisher IF2, Lake Manyame, December 2020).

Other interviewees felt that the access laws should not be stringent and that there should be a dedicated standalone policy on fisheries such that they would benefit from the natural resource (fish) within their area because they are the indigenous people. They however understood the need of instituting restrictive access laws as a measure of protecting endangered fish species and from poaching. Forty percent of the fisherfolk respondents were against poaching and they had enlightenment on how poaching can destroy the endangered species. They were worried about depletion of certain fish species and that their children and future generations would suffer because of that. The next section highlights the governance arrangement and access rights of individual fishers from the respondents' point of view, and as stipulated by ZimParks regulations.

7.3.3 Fishing regulations for individual fishers

Officially, individual fishers who engage in fishing activities at Parks Estates, under which lakes Chivero and Manyame fall, are required to follow certain guidelines and pay certain fees before accessing the lakes. The study gathered that, individual fishers within the Parks estates fall in the category of leisure fishing or sport and competition. It emerged that individual fishers have different methods of access as compared to cooperatives. Individual fishers pay tickets on daily

bases, which were valid for 24 hours. It also emerged that they normally use rod and fisher-lines as their fishing method. They were prohibited from using fish nets. Furthermore, as explained by one fisher at Katanga,

individual fishers are not allowed to catch more than 5kgs and are not allowed to sell the fish... the fish is meant for domestic consumption or sporting activities (boating and Angling) ... individual fishers are also not allowed to catch certain fish species... They are allowed to pay 400 Zimbabwean dollars which is an equivalent of USD \$5 (Per day) to National Parks to access the Lakes (Interview with individual fisherman IF3, Katanga, December 2020).

A Mambokadzi cooperative member at Lake Manyame also echoed the same sentiments by stressing that ZimParks charged an equivalent of \$5 USD for daily ticket. In addition to that, if they were using a boat, individual fishers ended up having a cost of \$8 USD daily (\$5 USD for road and line fishing plus \$3 USD for using a boat). Calculating the total amount per month and per year, one would realise that it is costlier to be an individual fisher as compared to joining a cooperative because an individual fisher ended up paying approximately \$2880 compared to a cooperative which pays \$3500 as a group. Furthermore, one individual fisher at Lake Manyame posits that price of daily permits changed regularly because of inflation; "we sometimes see the new prices when we go for payment of the daily permits" (IF4, Lake Manyame, December 2020). Therefore, there is no fixed price.

It emerged that in as much as individuals would wish to form cooperatives and cut costs, they found it impossible to gain access as new cooperatives. Two individual fishers at Lake Manyame and five poachers reiterated that they could not join cooperatives because ZimParks notified them that both lakes are currently full. Hence a significant number of the Norton fisherfolk community ended up indulging in illegal fishing.

ZimParks officials noted that individual fishers could operate from 06:00 hours to 18:00 hours. Respondents further noted that individual fishers fall in the category of leisure fishing with Parks Estate or subsistence fishing by resident communities, according to Parks and Wildlife Management Authority (S.I 108 of 2019).

7.3.4 Cooperatives and access to fisheries in Norton

Cooperatives is the main mode of SSF governance in Norton. The study found out that cooperatives in Norton have the highest access to fisheries. Each of the two lakes has 40 cooperatives licenced to engage in SSF in Norton. These cooperatives are important as coordinated structures through which fishing is organised and they play a significant role in fisheries governance. This section presents the results pertaining to SSF cooperatives at both lakes, their organisational structures, the government institutions which have a bearing in their functionality, and how these cooperatives contribute to the livelihoods in Norton community. The section further explores the access methods and rights of these cooperatives and the challenges they face in conducting their day to day running of business.

Cooperatives are a popular form of fishing associations in Norton. The interviewees also referred to cooperatives as fisheries. It is, however, crucial to understand the meaning and contribution of cooperatives as understood within the context of the Norton fisherfolk community. For example, how do the communities view cooperatives and their importance? If it is not the community's initiative, how are these structures formed and for what purpose? The study aimed to address some of these questions and others which are related to the contribution of cooperatives to the livelihoods of the fisherfolk community and the challenges associated with them.

Initially, three cooperatives at Lake Chivero and two cooperatives at Lake Manyame were interviewed through focus group discussions. Interviewees were asked the reasons why and when they formed cooperatives. Importantly, it emerged that fishing licences for commercial purposes are only granted to cooperatives while individuals were given licences for recreational purposes, permitting one to take only a few kilograms of fish home. Such emerged as the major driving force behind the formation of cooperatives.

One cooperative interviewee at Lake Chivero maintained that,

we joined cooperatives for various reasons... some of the reasons include sharing of capital, as you are aware that it is expensive to acquire fishing licences from the department of Parks and Wildlife...it is also expensive to procure fishing gear such as nets and boats as an individual, hence joining hands as a cooperative with a unity of purpose meant that we could agree on capital contribution which was supposed to be made by every member of the cooperative. Cooperatives also encourage teamwork, and it informs some form of shared responsibility within the members...One of our main visions is to expand into large fish projects and having capacity to export fish to

other countries and generate foreign currency... After good fish catches, we could share the dividends (profits); let us say after two weeks or one month. In a nutshell, I can say the cooperatives provide us with a wide variety of club goods (Tempascon Fishing Cooperative director I2, Lake Chivero, January 2021).

The above sentiments were shared by many cooperative members at both lakes. Therefore, from the data gathered at both lakes and fish markets, most people joined cooperatives because they could not afford to pay fishing licence fees on their individual capacities. Furthermore, they also highlighted that a shared responsibility in gathering funds makes it easier for them to organise transport to carry fish from lake shores to the markets. Procurement of fuel for the boats and boats repairs was also a bit affordable when done by a cooperative than as it was on individual capacity. Cooperatives were, in other words, structured as a form of social capital 16.

It is crucial to understand the background of this cooperative system in fisheries and how it is linked to conflicts between policy discourses and economic and political interest groups in Zimbabwe. The fishing industry before the independence of Zimbabwe was predominated by white role players who had access to financial capital. As such, one of the Zimbabwean government's tasks after independence was the redistribution of rights from the prominent white-owned companies to new black entrepreneurs, and to reorganise governance of the fisheries sector (Nyikahadzoi et al. 2010). The redistribution of rights was to be done through issuance of licences to ex detainees and war veterans organised as cooperatives, as a way of extending the socialist principles that had been embraced by the new government. Thus, the cooperative model was the initiative of the government in its quest to redistribute the access rights to the black majority so that they can own and manage their natural resources. It was done through different phases which include socialist policies, redistribution through the market, and radical redistribution of access rights.

Radical approaches in the fisheries sector were introduced by the government to acquire fishing licences from the year 2000 after the FTLRP. The acquired licences were redistributed among indigenous entrepreneurs, women and youth groups, and war veterans mostly aligned to the ruling ZANU-PF. Therefore, it should be noted that the cooperative model in Norton fisheries was an extension of the government's patronage system in using its control of natural resources to gain favours during election times. Political power, rather than race, became a key determinant in

¹⁶ "Social capital refers to the networks of relationships among people who live and work in a particular society, enabling that society to function effectively" (Interview with key informant, University lecturer).

accessing fish resources in the new dispensation as opposed to the colonial (Rhodesian) government. Poor households could not easily access the lakes.

According to respondents, cooperatives increased in numbers in the late 2000s. An interviewed fish cooperatives union leader maintained that,

initially they were three cooperatives at both lakes and they increased to thirteen. Currently they are forty (black owned cooperatives) at each of the lakes ... The first three black owned cooperatives at Lake Manyame included Zvido, and Tashinga as beneficiaries of the cooperative system... However, in the period before independence, these lakes were controlled by the white settlers. They were the ones who had access to the fisheries. For instance, a white man called Lewin almost controlled the entire Lake Chivero fisheries (Interview with Lake Chivero Fish Union Chairperson KI/2, Lake Chivero, January 2021).

Interviewees at Lake Manyame concurred with the above assertion as they noted that, Manyame, Joseph, and Jackson (used to work for whites before) were some of the first black companies (cooperatives) to engage in fishing at Lake Manyame (Blue star and Mbuya Nehanda cooperative members C1-C5 and B1-B6, Lake Manyame, February 2021).

The increase in the number of cooperatives attracted diverse reactions from respondents. Three cooperatives welcomed the idea that by giving more fishing licences to cooperatives, the government sought to redress the racial imbalances which had existed before independence where whites had privileged access rights to the lakes compared to the black majority. According to the respondents who subscribed to this notion, the issuance of more licences to many cooperatives meant that the government was redistributing the access rights to the blacks as was promised during the liberation struggle. Such respondents were happy that they are now getting fishing rights to the lakes because of indigenisation policies. They call it black empowerment to the lakes which used to be white dominated areas before independence.

However, six of the cooperatives and 12 fish poachers subscribed to the view that although indigenisation policies in fisheries were meant to empower blacks, they were poorly planned and hurriedly done. "For instance, government is not offering financial support to the cooperatives" (Fisherman at IF1, Lake Manyame, December 2020). Furthermore, other respondents, especially the youth, felt that the issuance of licences to more cooperatives and the increase in numbers of

cooperatives was attributed to the government's patronage system in using its access to resources to get votes during election seasons. These interviewees felt that the awarding of licences to cooperatives came increasingly under partisan control as senior ZANU-PF leaders sought to reward ZANU-PF youths for their 'activism' and loyalty. Through publicly performing their loyalty in this way, some youths gained much coveted direct access to cooperative membership. A cooperative fish member at Katanga fish market maintained that,

it is not easy to join these fish cooperatives if you are not politically connected... Many beneficiaries of these cooperatives are ZANU-PF youths...These programs were introduced in the party as an initiative to indigenisation programmes... It is easier to acquire the fishing licence in time especially if you know some ZANU-PF bigwigs in higher offices...without those links your application will take forever to be processed and to go through the channels starting from Ministry of Medium and small enterprises for a registration certificate to ZimParks for a fishing licence (Cooperative member C5, Katanga, December 2020).

This sentiment was also echoed by Environmental Care fishery members who noted that there is no guarantee that if one received a certificate from ministry of cooperatives, then it is automatic that the person will receive a fishing permit from ZimParks (Cooperative members H1,H2,H3,H4, Lake Chivero, January 2021)

The above assertion showed that the indigenisation programme was used as a campaigning tool to spearhead the agenda of the ruling party, yet this initiative was supposed to be apolitical and serve the interests of every member of the Norton community regardless of his/ her political affiliation. The indigenisation policy was deliberated and implemented on government level and not on party level and as such expected to benefit every member of the Norton fisherfolk community. According to Interviewees, the cooperatives benefitted the ZANU-PF youths and other card-carrying members to a larger extent although there were testimonies from few members who joined cooperatives without being linked to the party.

Furthermore, politicians used their political muscle to control resources such as access to maize at Grain Marketing Board (GMB) and, most importantly, fisheries. According to 70 fisherfolk respondents, it was sometimes difficult to access the resources, including food, if you are not politically aligned or if you are not a member of the ruling ZANU-PF. One respondent lamented:

You see my brother its survival of the fittest... a dog-eat-dog scenario... for you to survive in this world and in the Zimbabwean situation you have to dance according to the tune to put food on the table and to support your family. Some of us are members of ZANU-PF and we are card carrying members not because we want to belong there, but we do not have a choice. Take for instance sometimes if you want to access maize or grain from the Grain Marketing Board, you must produce a party membership card for you to buy the grain...The same situation is rampant in the fisheries sector these days since most people are engaged in small-scale fishing for their survival in Norton. It is very difficult for us to join the fisheries/ cooperatives if you are not an active member of the ruling ZANU-PF party...to make matters worse, most of these violent ruling ZANU-PF officials are employed in the district council...you know what this means right? It means if you are not politically connected you cannot even access the housing stands and the fishing licences to access the lakes (Fishing cooperative member I3, White House, January 2021).

The extract from the interview above suggests that politicians, especially councillors, became involved in fish governance. According to respondents, fishers had to get a letter from ZANU-PF councillors as supporting documents for cooperative registration with ministry of SME. Therefore, politicians use their political power and influence to control the access and utilisation of resources such as residential stands, access to granaries (GMB), and fisheries. They use the allocation of permits and operational licence certificates in a patronage system meant to position them favourably and canvas for election support. The control and utilisation of these fisheries resources by the powerful politicians led to the emergence of the 'elite capture'. The fisheries resources were also captured in the sense that there were fishing turfs/areas in the lakes especially at Lake Manyame which were known to be controlled by powerful politicians. Five of the cooperatives were scared to access such turfs. Furthermore, these elites became so powerful in different cooperatives such that they ended up dictating the day to day running of the cooperatives in contravention of the laws as stipulated in their agreed constitutions. The degree of political influence in fisheries was also witnessed through the naming of cooperatives with liberation war heroes such as Mbuya Nehanda and Hebert Chitepo. The use of these liberation war credentials was meant to identify the cooperatives as patriotic ZANU-PF party affiliated in a bid to get cooperative registration favours from ministry of SME officials.

In addition, 73 respondents also felt that the increase in number of these cooperatives by the government led to congestion at both lakes. Government through the ZimParks is issuing more licences to cooperatives beyond the capacity of the lakes as was reiterated by one cooperative:

in as much as the issuance of licences promoted the gutsaruzhinji (equality)in accessing the lake...the government is doing that for its popularity and to remain relevant to the community at the expense of the fishery resources... We are facing a major challenge of the depletion of fish stocks because of overfishing...some fish species are no longer available such that we fear that our children and the next generation would not be able to access them (Cooperative members F1,F2,F3,F4,F5, Lake Chivero, January 2021).

The congestion of lakes by many fishers, which entails that they were more cooperatives than the lakes could sustain, suggested that there was competition for few available fish resources which results in depletion of fish stocks. Thus, the researcher realised that overfishing is a serious problem faced by both Lake Chivero and Lake Manyame and 61 fisherfolk respondents raised concern about the problem.

Apart from knowing the initiators of the cooperative model in Norton, the researcher was also interested in getting insight into how these cooperatives are formed, their structure and how they operate. Who Are the people responsible for the leadership of such institutions, if any? How do they settle disputes and power struggles? Who designs the constitution, if they have that system of governance?

7.3.5 Fishing cooperative constitutions

Cooperatives are formed by local community members. According to seven cooperatives and one Ministry of SME official, cooperative members draft their own constitutions in line with the Ministry of Women's Affairs, Community, Small and Medium Enterprises Development (MWACSMED). MWACSMED's mandate is to maintain and create a conducive environment that promotes the development of Small and Medium Enterprises (SME) and cooperatives to facilitate economic growth and provision of employment (Bomani et al. 2015). Government through MWACSMED design their framework (By-laws), on which cooperatives derive their constitutions from (using by-laws as guidelines). By laws for cooperatives in Zimbabwe are guided by the Cooperative Societies Act (chapter 24,05).

This Act provides rules relative to the constitution, registration, functioning and winding up of co-operative societies, establishes the National Co-operative Federation and the Central Co-operative Fund and makes provision in general for the development and organisation of the cooperative movement in Zimbabwe. Co-operative societies shall be registered with the registrar of Co-operative Societies. The Act specifies the structure of the co-operative movement of Zimbabwe and sets out co-operative principles. Apex societies may form, with the approval of the Minister, a National Co-operative Federation (FAOLEX).

Cooperatives will then draft their own constitutions and submit to MWACSMED for assessments. The respondent who happened to be a MWACSMED official maintained that,

if the constitution is not properly drafted, the Ministry of enterprises will give recommendations on amendments of the constitution (MWACSMED representative interview, virtual KI/6, Harare, February 2021).

Fishing cooperatives will then register with the Ministry of Small & Medium Enterprises and Cooperative Development after submission of their constitutions. Some cooperatives maintained that they were entitled to pay five percent tax yearly to Ministry of Medium and Small enterprises (MWACSMED).

When asked about the number of members a cooperative was entitled to have, most of the respondents lamented that cooperatives are made up of ten people as required by the guidelines of small and medium enterprises. According to the Cooperative Societies Act (Chapter 24,05), "no society shall be registered - as a primary society, unless it consists of at least ten natural persons who are not disqualified from membership...". This entails that many cooperatives aligned their constitutions as per the Cooperative Societies Act (Chapter 24,05) guidelines.

Four FGD also talked about cluster cooperatives. The fish cooperative union chairperson maintained that a cluster is a cooperative made up of three groups of cooperatives. This suggests that 30 members were registered under the same name of the cooperative. According to respondents, the cluster cooperative initiative was introduced by ZimParks to give access rights to more members of cooperatives at both Lake Manyame and Lake Chivero. The initiative was meant to increase members using the same cooperative name so that they could share the expenses such as the fish permit fees.

The idea was that if more cooperatives come together under the same ticket... there would be some level of shared responsibility amongst the group members (Lake Chivero fish union chairperson KI/2, Lake Chivero, January 2021).

A typical example of a cluster cooperative is Mambokadzi at lake Manyame which also incorporates Sunrise and Nharira cooperatives to make them three. They were all registered under the same permit recognised by ZimParks as Mambokadzi cooperative. Another example of a group cooperative at Lake Manyame is Grabster cooperative, operating with other ancillary cooperatives, One-star and Tempascon.

Regarding age restrictions for people to become cooperative members, the study noted that prospective members were 18 years of age and above. The structure of leadership suggests that cooperative members vote for chairperson, treasurer, secretary, and committee members. Some of the roles and duties of this leadership, as was put forward by the respondents include,

Chairman enforces rules/ monitors members... and secretary writes monthly reports such as type of fish, size, and quantity of the catches, weight, mesh size, net length and sends the statistics to department of research, which falls under National Parks and Wildlife Authority (Three Sunrise Cooperative members E1,E2,E3,E4,E5, Lake Manyame, February 2021).

It should be maintained that, officially, some of the Cooperative Societies Act (Chapter 24,05) stipulations are that the functions of every formation committee shall be to:

- (a) determine the appropriate contribution to be made by members in the form of shares, labour, savings or otherwise, and assess the expected volume of business and the benefit to members; and
- (b) prepare, where necessary in consultation with a co-operative officer, draft by-laws for the proposed society.

The above suggest that cooperative committees of every cooperative should decide the contribution to be made by members in relation to labour, shares, and savings. All this should be done in consultation with other members of the cooperative. Constitutions of the cooperatives should be drafted in line with the by-laws of the ministry.

According to seven cooperative respondents, all committee members and cooperative members are responsible for the drafting of the constitution. Members from Sonset Free fishing cooperative provided the constitution of the cooperative and some of the laws of the constitution state that:

Members are supposed to vote at all general meetings...and they should attend all meetings...When it comes to registration, each member shall be free to resign...must give three months' notice for this to enable the organisation to prepare all terminal benefits and find a suitable replacement. Each member should pay a joining fee and all members should have equal shares (same dividends) (An extract from Sonset Free Constitution G1,G2,G3,G4, Lake Chivero, February 2021).

However, there is no universal joining fee for all cooperatives. Each cooperative has its own requirements. The Sonset constitution was a typical example or true reflection of most cooperatives such as Mbuya Nehanda, Mambokadzi, and others that align their constitutions to the Cooperative Societies Act (Chapter 24:05) as required by the MWACSMED. Eight cooperatives echoed the same sentiments with regard to the structure and laws of their constitutions. Four cooperatives from both lakes did meetings every Saturdays whilst the remainder of the cooperatives, especially from Lake Manyame, stressed that they initially conducted meetings after every fortnight but now they could do even after three to four months. The reason for the prolonged period taken by cooperatives before convening other meetings could be attributed to trust and good working relationships between members since they worked together for several years.

However, the use of cluster cooperatives has its challenges, as shall be demonstrated in the latter sections of the chapter. Some of the challenges include depletion of fish resources due to overpopulation of the lakes. This entails that ZimParks gave access rights to more people than the lakes could sustain. Furthermore, it is alleged by other respondents that some Parks officials have charged more permit fees for cluster cooperatives than the ordinary fish permit. More so, despite working as a cluster, each group of ten members ended up working separately from the other groups, leading to disunity and disputes within the cooperatives.

7.3.6 Settlement of disputes

Settlement of disputes in cooperatives was done in various forms and procedures according to the constitution of a cooperative. Some disputes emerged because of offences committed by other members of the cooperatives. Offenses in cooperatives include defrauding the organisation and absenteeism from meetings for longer periods. "Coming to work drunk" cases also led to suspension from the cooperative. In some instances where other cooperative members were found guilty of stealing fish catches and fish nets, the disputes were settled by negotiations, or the

accused would be instructed to pay back the stolen fish catch or its monetary value. Five cooperatives gave three months' suspension period while the remainder gave six months' suspension depending on the nature of the offense. For some cooperatives like Environmental Care fishery some punishable offences like absenteeism from meetings attracted a fine of deduction of money from the shared allowances. Other disciplinary measures included termination of membership or expulsion from the cooperative.

Committees selected by cooperative members were responsible for settling of disputes. These Committee members abide by the constitution of the cooperative in settling their disputes. However, 4 of the interviewed cooperatives maintained that cooperative members were also consulted in settlement of the disputes by voting procedure. They could vote for reinstatement or suspension of the offender. One committee member reiterated that,

... if the accused is not satisfied with the judgement passed by the committee, he/she may report the case to Ministry of Small and medium enterprises. The committee will then be summoned by the ministry to assess the case and give it a fair judgement (Lake Manyame Chairperson KI/5, Lake Manyame, March 2021).

All the above point to examples of how a significant number of cooperatives settled their disputes. The constitution can also be amended if two-thirds of the directors agreed on the amendments. In cases of liquidation of the constitution, some provisions state that "the organisation will pay the debts first and share what remains". Cooperative system is the most common fisheries organisation system in Norton. Thus, it is crucial to give a detailed discussion on how they are formed and the process they follow to acquire fishing permits from ZimParks.

After drafting their constitutions and creating their membership list and profile, cooperatives will then register with MWACSMED for a cooperatives' certificate to be recognised in order to apply to ZimParks for a fishing permit. According to ZimParks officials, cooperatives pay a fishing permit fee of US\$ 3500 per year to get a ten-year lease operational permit renewable every year. Four cooperatives maintained that payment of the permit, "should be done within the first quarter of the year". However, two ZimParks officials and five cooperatives maintained that this provision has recently been amended and "currently, cooperatives are given five-year lease by parks and wildlife and the permit will be renewed every year" (ZimParks officials, KI/3 and KI/4, Lake Manyame and Lake Chivero, March 2021). The officials further stated that, "After five years they will do a review on whether they will retain the same cooperative or they will give permit to a new cooperative".

In the event that ZimParks decided to give the permit to a new cooperative, three cooperatives reiterated that other cooperatives' members have a tendency of registering a new cooperative with a different name when the ten-year lease or five-year lease expired as a survival strategy in the sector. The move is meant to make ZimParks officials believe that it would be a new cooperative applying for a new permit when in reality it would be a new cooperative name in old faces. Fishers said that they see the same faces in the cooperatives for more than ten years. It is not clear whether they renewed their leases or not, but they were still involved in fishing activities. ZimParks was not practically involved. There are ignoble inconsistencies between policy and practice. ZimParks policy stipulated that, new cooperatives should be given access to the lakes after expiring of the old lease (given to former cooperatives), but what was said in blueprint was not what was happening on the ground. In some instances, other few unnamed connected cooperatives could renew their leases because of political and partisan connections. It should also be mentioned that these inconsistences were further aggravated by corruption on the registration of a cooperative, procurement, and processing of cooperative fish permits.

However, it should be noted that the official government provision on cooperatives is that they fall under the category of commercial/Gillnet fishing. Both Lake Chivero and Lake Manyame also fall under the jurisdiction of Parks Estate, which means that they are under the management of ZimParks. Some of the provisions of the ZimParks (Tariff of Fees) By-laws, 2019, Statutory Instrument 108 of 2019 stipulate:

- (1) Commercial fishing operators shall submit returns to Area Managers responsible for the relevant fishing area.
- (2) Commercial fishing permits may be paid once off at the beginning of the year or through two instalments, with the second instalment payable before the 1st of July of the same year.
- (3) The Authority shall have unlimited access to fishing records.
- (4) The authority shall publish any changes to annual permit fees.
- (a) The minimum annual permit fees shall be:

 - (ii) Manyame \$3 500,00, per annum.

As per the legislation, these commercial fishing permits may be paid once off at the beginning of the year or through two instalments, with the second instalment payable before the 1st of July of the same year (S.I No.108 of 2019) (FAOLEX).

Fishers were asked on whether they are charged separate taxes on fish catching and fish trading to which they relayed that, taxes for fish catching and fish retailing is included in the permit fee. The fish union chairperson further pointed out that, "Parks and Wildlife will pay 5% to small and medium from permit fees".

7.3.7 Authorised/recommended fishing gear

As part of the institutional arrangements, the study sought to understand the recommended fishing gear to access the lakes in the Parks Estate. Fisher respondents indicated that with regards to gillnet (commercial fishers), they are required to use 3,5 inches to 5 inches fishing nets sizes. More so, they must use life jackets, engine boats, raincoats, gumboots, work suits (without buttons), gloves, aprons, scales, and receipt books. Eight individual fisher respondents maintained that individual fishers were authorised to use a rod and line, or winding machines. It should be noted that what the respondents said concurred with what is stated on the Parks and Wildlife Act (Chapter 20,14).

However, the shortage of or failure to access recommended fishing gear sometimes forced the fishermen to use what they referred to as 'kringer' 17 boats and canoes 18. Cooperative fishers alleged that fish poachers preferred canoes because they are faster than kringers. Interviewed fishers indicated that there are few instances where cooperatives owned at least one engine boat (a kringer attached to an engine) as was the case with Mambokadzi cooperative. Nonetheless, such engine boats did not meet the standards of the Ministry of Transport and Energy as stipulated by Inland Waters Shipping Act (Chapter 13,06). Recommended engine boats were out of the reach for most Norton fisherfolk communities because of the expenses which were involved in procurement and servicing of the boats. Figures 7.1 and 7.2 show fishing gear used by the cooperatives at two lakes.

¹⁷ Kringer boats are human powered boats, medium in size and accommodate an average of two fishermen and are mostly used by cooperatives (Interview with fisher respondents).

¹⁸ Canoes are human powered boats, smallest in size and accommodate an average of one person and mostly used by fish poachers (Interview with fisher respondents).



Source: Field survey, December 2020

Figure 7.1 Boats used by cooperatives at Lake Chivero and Lake Manyame



Source: Field survey, December 2020

Figure 7.2 Fishing nets used by cooperatives at both lakes

Cooperative respondents further explained that they were initially allowed to use six boats per cooperative, but the regulations did not change when cooperatives were allowed to adopt ancillary groups to their structure. This means that the main and the ancillary cooperatives still had to use six boats among them, translating to a group of ten people using two boats. As mentioned earlier on cluster cooperatives, ZimParks allows a registered cooperative to adopt two more groups of ten people each, making a grand total of 30 members in a cluster, as an initiative to increase more access rights to the impoverished Norton fisherfolk community.

7.3.8 Access times and fish limits for cooperatives

According to fisher respondents, there are no fish catch limits for cooperatives. Fishers are allowed to catch what they can if they use the authorised fishing gear. Furthermore, the respondents noted that the only limit is on the number of nets which they are recommended to cast in the lakes and not necessarily on the quantity of the fish catches. According to interviewees, cooperatives are allowed to cast nets which are 1600 meters long. It has also been noted that there is no extension of fish metres for cluster cooperatives and that the members shared the 1600 metres fish accessing turf in the lakes just like any other cooperative.

More so, five cooperatives reiterated that gillnet fishers could cast their nets from 15:00 to 06:00 hours. However, the Parks and Wildlife Act (Chapter 20,14) stipulates that, "the appropriate authority for any waters may fish at any time in the waters..." which may seem like some contradiction between policy and practise. However, as one ZimParks Fisheries Department official explained, the officials on the ground are allowed to put in place any such measures that ensured an orderly manner is followed when fishing is carried out.

Key informants from ZimParks (KI/3 and KI/4) also pointed out that officially, no cooperative owns a fishing space or TURF (Territorial Use Rights in Fisheries), and that Cooperatives can cast their nets everywhere except on the breeding zones. This entails that every space was open for and accessible to any willing cooperative. However, there were fish cooperatives owned by powerful politicians which were informally controlling some fishing areas at lake Manyame. Five cooperatives maintained that they avoided such areas for fear of victimisation.

7.4 CHALLENGES FACED BY FISHERIES

Small-scale fishers faced a lot of challenges because of a multiplicity of factors which ranged from financial, Institutional, and human, among others. Fishers faced financial challenges because most of them lost jobs after the collapse of the economy, especially post FTLRP period in the year 2000. Raising of funds to pay permit fees was a challenge to them coupled by ZimParks stringent laws and regulations which were overlapping and confusing. Conflicts between fishers and wildlife officials and between cooperatives members were also common.

7.4.1 Financial challenges

85 out of 107 interviewed fisherfolk complained of exorbitant or high fish permit fees. One interviewee maintained that the permit fees for cooperatives used to be US\$11500 per year although it had recently been reduced to US\$ 3500 or equivalent in local currency.

The United States dollar (USD) is out of reach for most fishers who sell their fish in local Zimbabwean currency. Therefore, the demand by the Parks Authority to receive the permit fees in USD is challenging for us because we incur the costs of changing the local currency to USD on black market rates which is very expensive...(Fish trader FT3, Katanga, December 2020)

The complaint above summarises the plight of many fisherfolk the study interviewed at the different fish landing sites at the lakes and in Norton. Lack of funds to mobilise fishing permits forced many members to resort to getting loans with unfriendly credit terms to manage the permit fees. One interviewee pointed out that,

ndotoenda kuchimbadzo kuti ndikwanise kubatanidza mari ye permit. This is directly translated to "I survive on getting money from the loan sharks to mobilise funds for the fishing permit (Fish trader FT35, White house, December 2020).

Eight members from three cooperatives maintained that they also borrowed money from banks to raise enough funds for the payment of fishing permits, but the challenge was that the payment terms were also unfavourable to them since they struggled to pay back the loans. The remainder of the fishers who borrowed the funds from the banks had their credit facilities in arrears.

7.4.2 Shortage of fishing gear

The study also learnt that fishers also faced challenges to mobilise funds for the procurement of fishing gear. Twenty-eight fish cooperatives members pointed out that most of their fishing nets were imported from countries such as Mozambique and Zambia. The importation process meant that they were supposed to buy the nets using foreign currency. According to respondents, these fishing nets were sold at \$10 USD each. Shortage of foreign currency and funds to procure fishing gear was also another challenge faced by the Norton fisherfolk community (Masikati 2021).

Furthermore, cooperatives and individual fishers face challenges in organising funds for the procurement of fishing boats, either engine boats or *kringers*. They reiterated that they could not

afford to buy and own the fishing boats such that they resorted to hiring the boats from other established fisheries or few individuals who own such boats. However, the process of hiring the fishing boats further aggravated their already cash strapped budgets. The owners of the boats took advantage of the crises by profiteering as some of the respondents complained:

We end up working for the owners of the boats because the charges they inflicted on us are exorbitant such that all the incomes we get from selling fish will go to the expenses of hiring the boats. This is a tough business for us. Shortage of fishing gear is of major concern for us. Imagine a life jacket will be sold at \$20 USD each (Environmental Care fish cooperative members H1,H2,H3,H4, Lake Chivero, January 2021).

Furthermore, thirteen *fish bongas* alluded to the fact that they used canoes because they could not afford to use engine boats. According to interviewees, the engine powered boats were expensive and needed fuel, service, and spare parts. However, an interesting dynamic from other fishers is that the noise from the engines drives away the fish hence they preferred to use canoes. They further reiterated that the smoke from the engine boats was not environmentally friendly. Shortage of fishing gear was compounded by lack of cold storage facilities as explained in the next section.

7.4.3 Lack of cold storage facilities

Other challenges faced by Norton SSF are lack of cold storage facilities or fridges at fishing shops or fish landing sites. Eighty-five fisherfolk interviewees from both lakes reiterated that the shortage of cold storage facilities usually forced them to sell their fish at give-away prices since they could not store them for more than 24 hours. The shortage had a bearing on the livelihoods of the fisherfolk community since they were getting less incomes than what they could possibly be getting if they were utilising the cold storage facilities. Sixty fishers mentioned that fish from lake Chivero could not stay fresh for long possibly because of sewage affluent and industrial waste (Masikati 2021). Cold storage facilities were crucial in that fishers could store their fish catch for long and thus maintaining their sell prices. More so, the cold storage facilities meant that the fishers could not be rushed to sell their fish stocks for fear of their stocks easily getting spoiled. Shortage of cold storage facilities was further worsened by lake of refrigerated small trucks and transport in general from the lakes to the markets, according to fishers.

7.4.4 Transport problems

Seventy-three interviewed fisherfolk indicated that they faced transport problems to access the fish lakes, and from the lakes to the fish markets in and outside Norton. "Lake Chivero is situated eight kilometres to the East of Norton while Lake Manyame is five kilometres to the North of Norton" (ZimParks official, KI/4). This distance from the lake was a barrier to the Norton fisherfolk community who had to pay high transport costs to the lake, and from the lake to Katanga fish market in Norton and other markets outside Norton. Twenty-six fish traders also sold their fish stocks in the capital, Harare, which is located about 40 kilometres away from Norton. Fishers had to pay huge transport costs to access their fish markets, which of course had a bearing on their incomes. Huge transport bills meant less incomes for their livelihoods. Another factor which dealt a heavy blow to the fisherfolk is the banning of pirate taxis (combis) by the government. One interviewee mentioned that,

combis used to be a faster and efficient mode of transport to ferry us from Lake Manyame and Lake Chivero to Katanga and Harare...but now that the government has abolished the use of taxis...it becomes difficult for us to access the lakes and markets... transport has become a huge problem for us... the ZUPCOs they gave us are not enough and they are always overloaded, which is very risky under this Covid-19 pandemic. (Fish Trader FT 18, Katanga, January 2021)

The above shows that transport problems escalated in Norton and other major towns and cities with the banning of taxis by the government. According to fishers, the government introduced the Zimbabwe United Passenger Company (ZUPCOs) buses as the sole public transport services provider in urban and peri-urban dwellers such as the Norton community. However, the ZUPCO fleet could not adequately meet the demand of commuters. Therefore, shortage of transport had also limited the versatility of the fish traders in accessing the diverse markets, which hindered food security and livelihoods of the Norton community by denying them access to incomes.

Related to the COVID-19 pandemic challenge, fisherfolk respondents indicated that the shortage of these buses led to passenger overloading and by so doing not respecting the social distance regulations as stipulated by the World Health Organisation's COVID-19 safety regulations. Sixty-four interviewees maintained that these buses became death-traps and a cause of concern regarding the spread of the COVID-19 pandemic. Lack of transport had an impetus to access the markets to and from the lakes. The next section outlines the shortage of formalised markets.

7.4.5 Lack of formalised markets

The study learnt from diverse stakeholders, such as the fish union chairperson and fishers, that the lack of formalised fish markets in Norton and other towns close to it was a big challenge. The study observed that, currently, there are no formalised fish markets in Norton and surrounding areas. The fisherfolk depend on informal road sites and the Harare-Bulawayo highway to sell their fish, which is a risk, considering that Norton Town Council Municipal police can arrest them any time, and at times destroying their merchandise. Even popular fish markets such as Katanga pa Speed and White House, are not formalised marketplaces.

Fisher respondents indicated that most of these popular market areas are informal marketplaces frequented by people who engage in different informal businesses ranging from welding, brick making, selling of fresh vegetables, and even fish traders. It emerged that most of these fish traders were selling without fish permits and by so doing often playing cat and mouse with law enforcement agents. According to the Lake Chivero fish union chairperson, Norton Town Council was accused of turning a blind eye to the needs of fish traders, yet the fish traders were paying taxes. These informal places are reportedly always dirty and not conducive for fish selling.

The study also established that fish traders struggle to access the supermarket chain market such as OK and Pick 'n Pay. The advantage of supplying large supermarket chains, according to fishers, was that they would supply their stock in bulk and get paid once. The advantage of supplying in bulk was that they could do away with the hustle of selling in small quantities, which is expensive and labour intensive in terms of moving from place to place looking for customers. Fish traders struggle to supply large supermarket chains because of such challenges as explained by one trader who said,

...these large supermarket chains pay the fish delivered to them in local currency... which becomes a challenge for us because we need to procure fishing gear and nets in foreign currency (Fish Trader FT6, Katanga, February 2021)

The challenge of receiving the payment in local currency was a disadvantage to the fishers in that they ended up incurring extra costs by going to the black market to buy foreign currency for fishing gear. Generally, most sectors are currently demanding foreign currency in Zimbabwe. For instance, one fisher recalled that he received a message from a funeral policy called Nyaradzo notifying him that they had transformed their monthly subscription plan from local currency to United States dollars.

In addition to payment terms, members alluded to the fact that capacity also played a major role in denying fish traders the opportunity to supply large supermarket chains. According to fish traders, large supermarket chains sometimes demand bigger quantities of fish than the fishers can supply. The failure to meet the demand by the fishers resulted from a multiplicity of factors which included lack of training and formal skills to manage a business, theft of fishing nets and fish catches by poachers, and seasonality. Most supermarket chains prefer suppliers from Kariba, who are larger scale and make constant supplies.

According to the interviewed fisher respondents, the shortage of formalised markets forced fish traders to resort to door to door selling during the COVID-19 pandemic. Door to door selling was reportedly not effective since most consumers were not comfortable due to social distancing rules, and were sceptical of encountering people known for moving door-to-door for fear of contracting the virus.

Fisherfolk respondents felt that they should have permanently stationed market stalls at permanent fish markets to avoid risking their lives by moving door to door, and as a way of circumventing price distortions caused by the lack of a centralised market system. Formalised cooperatives or fishers complained that they faced stiff competition from poachers who sell their fish at cheaper prices because they will be aiming at quickly exhausting their illegal fish stocks before getting arrested by the Parks rangers. However, it should be noted that, 11 fish traders were wary of the need to pay taxes and levies once markets were formalised, which they emphasised meant parting with a considerable fraction of much needed income.

7.4.6 Overlapping procedures and regulations in small-scale fisheries

Small-scale fisheries in Norton are regulated through overlapping statutory instruments from ZimParks, EMA, RDC, MWACSMED, Ministry of Transport and Energy, the Ministry of Health and Child Care. The laws are confusing to the fisherfolk community. These various ministries and departments regulate the fisheries sector through Acts and legislations which are enforced by the issuance of permits and licences. Failure to produce these permits and licences invited the full wrath of the law to be unleashed on the Norton fisherfolk community. According to the fisher respondents, those who were found to be illegally fishing in the two lakes without the possession of the permits were arrested by Parks and Wildlife rangers and instructed to pay a fine. Others who were to be found with unregulated fishing gear such as illegal nets, had their "nets and fishing

catch confiscated by the parks rangers" (Fish trader FT27, Lake Chivero, February 2021). The next section interrogates government's involvement and assistance to the fishers.

7.4.7 Government involvement and assistance

Generally, the government is not giving enough financial support to the cooperatives. Although one cooperative, and a key informant from MWACSMED maintained that the ministry offers some loan and credit facilities with flexible payment terms to cooperatives, and that "they will assess the terms and need for funding before disbursing them to cooperatives" (Ministry of SME official KI/6, Harare, March 2021), most of these funds were accessed on partisan lines by politically connected people as was suggested by one young fish poacher:

We have not seen such loan or credit opportunities...and even if they do exist such opportunities will not be accessed by the general populace from the street...Major beneficiaries of such initiatives are ZANU-PF youth members who are highly connected to those who are in the gravy train... (fish poacher P3, Katanga, February 2021).

However, 4 FGD argued that the government is mainly involved with cooperatives by offering guidelines through which cooperatives can use as the framework for designing their constitutions. This service is provided by the MWACSMED. Key informant official from SME, and ZimParks officials indicated that they offer training and workshops to fishers on the importance of the licensing system (permit requirements) and its importance in conserving the fisheries resources. However, a significant number of interviewed fisherfolk argued that they were yet to be invited to such workshops. Therefore, the Norton fisherfolk community is largely neglected by the government in as far as the governance and management of fisheries resources is concerned. Government is offering little support to either cooperatives, individuals, or the community.

There were however few initiatives highlighted by the fish union chairperson where the government was involved in Norton fisheries. The chairperson reiterated that the MWACSMED offers workshops and educative programs to cooperatives on value addition of fisheries. They also educate members on by-laws and on solving disputes. Furthermore, the chairperson argued that the ministry also organises international cooperative days where different cooperatives including fisheries showcase their talents and share ideas. However, many respondents felt that the government is not doing enough in terms of giving them support in the fisheries. The abovementioned initiatives were not enjoyed by all the cooperatives save for only few which had

government connections. The initiatives were not enjoyed at the grassroots level. Generally, there was inadequate participation of the community and exclusion of females in fisheries governance. The next section explores the contribution of Non-Governmental Organisations (NGOs) in Norton fisheries (if they are any) and the relationship between the NGOs and government in the governance of Norton SSF.

7.5 GOVERNMENT-NGO RELATIONS AND FISHERIES GOVERNANCE IN NORTON SMALL-SCALE FISHERIES

The study established that the government oversees activities and governance in Norton such that other potential stakeholders' involvement relied on the willpower of the government. According to a fish union respondent, International Organisations such as FAO have tried to build fish shops and a fish market at White House but the vision died a natural death because of government's suspicion on NGOs. He stated that,

the Zimbabwean government believes that most NGOs want to meddle in internal politics and most probably pushing an agenda for the main opposition party, the MDC... There was also a land dispute at white house in terms of ownership of the land at which those fish shops were supposed to be constructed. The whole wrangle was political (Fish Union member KI/2, Lake Chivero, January 2021).

The above illustrates the government's alleged reluctance in cooperating with NGOs in capacity utilisation projects, whilst NGOs might have positive agenda and objectives. It emerged that the government views some civil society organisations as enemies of the state. NGOs are associated with.

Britain and its allies who have a regime change agenda in Zimbabwe...and who want to topple the sovereign government from power (Individual fisherman IF1,Calfa, January 2021).

International organisations and NGOs have always been seen in the eyes of the government as an extension of the Western ideology (Britain, USA, and other European countries) who allegedly want to meddle in Zimbabwean politics. The relations between Zimbabwe and Western countries became strained following Zimbabwe's FTLRP (Nyikahadzoi et al. 2017). In sectors such as fisheries, FTLRP became associated with transferring access rights from the privileged minority group (especially the whites) to the previously disadvantaged black majority people (Nyikahadzoi

et al. 2010). It is arguable that the hostile relations between the government and the NGOs influenced the government's efforts not to support FAO's vision and initiative to erect the fish market at White House.

Key informants also highlighted another instance where the government denied potential partners access to the Norton fisheries. It was observed that another NGO wanted to introduce a certain type of bream at Lake Chivero from Mozambique for cage fishing, but the initiative failed.

The initiative failed because of the government's hostility on NGOs... it could also be a result of the fact that cage fishing is not sustainable in Lake Chivero" (Community leader KI/1, Norton, March 2021).

The lake Chivero Union Chairperson further concurred on the issue of cage fishing when he gave an example of another Iranian project whose success was hindered by the government's NGO policy. He stressed that, "Iranians also wanted to introduce cage fishing on running water at Lake Chivero, but the project did not materialise" (KI/2, Lake Chivero, January 2021).

However, there are instances where the government has been forthcoming and extended a welcoming hand to NGO initiatives in Norton. For instance, an organisation called SOFA initiated a community education campaign and collaborated with ZimParks. The campaign runs under the theme 'Speak Out for Fish and Crocodiles'. The programme targeted the Norton fisherfolk community with an agenda of teaching animal law and its importance to fishermen. The organisation also aims at teaching the Norton community on sustainable fishing and the importance of having legal permits to access the lakes. Although different stakeholders from fishing cooperatives and fishermen (both legal and illegal) attended the first meeting organised by SOFA, they still felt that such organisations are not doing enough to reach all actors who are involved in the fish value chain. Furthermore, the government has been accused of affording such organisations limited recognition in as far as governance of SSF in Norton is concerned. All the evidence related by the respondents confirmed that the relationship between government and NGOs in the fisheries is strained because government representatives are derailing potential progress, including possible value addition, which are tabled by NGOs.

7.6 ACTORS' INTERACTION AND RESULTANT POWER DYNAMICS

The study established that the interactions between and amongst the various actors in small-scale fisheries in Norton were informed by the potential benefits actors stood to gain, or lack of such benefits thereof. Tensions mostly seemed to characterise interactions between actors at the same level (in the same category). This was more pronounced among cooperatives operating within the lakes, a phenomenon less likely among individual fishers. The study observed that such tensions and lack of cooperation was attributed to competition for fish resources. As one cooperative head indicated,

other cooperatives see us as rivals against whom we must compete for the few fish resources available. Whoever gets more fish has an advantage over the others. As such, we rarely assist each other. There are always tensions especially regarding fishing grounds. Some seem to take certain areas of the lake known for larger fish population, as personal sites, and often disputes arise.

(Interview with Blue star cooperative member C5, Manyame Lake, February 2021)

Competition for fish resources also existed between fishermen and crocodiles (Masikati 2021). Many accounts of crocodile attacks on the fishermen were given by 11 fish poachers which suggested that human-wildlife competition for fish existed in Norton.

However, the study established that across actors often exist ambient relationships due to mutually beneficial interactions characterised by mutual respect and good working relations. The different actors know their activities depend on the activities of other actors for their success. As evidenced above, it emerged that conflict is constant in the interactions between and among the different actors in SSF. It was established that power asymmetries exist in Norton's SSF as exposed by conflicts, which are rife. These conflicts, according to respondents, emanated from theft amongst cooperative members. One cooperative stressed that,

we are facing several challenges in our cooperative...Some of these challenges include theft of fishing nets by some of our members. Some guys have a tendency of going to the lake during the night and they steal our fishing nets and our fish catches...why I say so is because we usually lay our fishing nets secretly with the knowledge of an insider... so most of these thefts are a result of inside jobs from some of our cooperative members (Mambokadzi Cooperative members A1,A2,A3,A4, Lake Manyame, January 2021).

The above confirms that intra-cooperative problems and conflicts exist outside inter-cooperative conflicts. Conflicts also existed between cooperatives and other actors. Many cooperatives complained that the 'fish bongas' usually carry out their fishing operations during the night when cooperative members were resting (Matenga 2014). In an attempt to counter fish poaching, many cooperative fishermen have resorted to establishing temporary fish camps along lake sides so that they help Parks officials keep watch over the lakes. Such has resulted in conflicts over access rights (The Herald 2020).

Besides, as reported by all interviewed cooperatives, the theft of fishing nets and fish catches has often resulted in physical fights erupting amongst fishermen. Physical fighting usually emanates from disagreements about fishing space since both lakes are overcrowded. One respondent stated that:

people fight for fishing space since the lake is now congested ... everyone wants a piece of the lake; most community members' livelihoods solely depend on the lake ... of course the rule of the lake is that no one owns any space in the lake and everyone is free to fish wherever they deem necessary ... but do not forget that there are party big wigs and government officials who secretly own some cooperatives. It is not official that they own certain fish spaces in both lakes ... but there are fishing spaces which are known to belong to such bigwigs and they have their cartels who sort of control those areas (Fish poacher P12, White House, February 2021).

The above testimony confirms the power dynamics which exist in Norton's SSF where there has been 'elite capture' in natural fish resources characterised by powerful government officials' misuse of power. It should be noted that the 'elites' in Norton SSF are not only politicians, but also well-established cooperatives with 'modern' standardised fishing gear such as engine boats and even general canoes. These powerful fishery elites monopolise the SSF sector by owning boats and controlling certain fish spaces. It emerged that the accrual of power and its exercise was also made even within cooperatives. One cooperative mentioned that,

even some members in our cooperative who volunteered to process permits at ZimParks and practicing licence with the Ministry of SMEs felt that they are now more powerful than the other members of the cooperative... by virtue of knowing the procedures and various departments responsible for processing such permits... secretaries also felt that they are better than other members who are not selected in the committee...the list goes on and on...even elected chairpersons would feel that

they are above the constitution, which all of us drafted and agreed upon that no one is not going to be above it. (Two sunrise Cooperative members D1,D2,D3,D4, Lake Manyame, February 2021).

The accrual and use of relative power is a reality in Norton SSF where unelected members in cooperatives feel that they were undermined by their colleagues because "they contributed nothing but their labour" compared to their colleagues who financed operations. Cooperative members accused their colleagues of deliberately undermining the constitutions they all agreed to, stating that they were equal members of an entity.

The study established that conflicts over inequality created further conflicts in the operations of cooperatives. It should be noted that these power dynamics resulted in conflicts in various cooperatives. Disgruntlements over sharing of profits are reportedly common. Members from five cooperatives felt that they should share their profits monthly due to the erosion of the local currency which plummeted on the world markets almost every day. On the other hand, some 'powerful' committee members felt that they should cover their expenses first before sharing the profits. Disagreements of such nature became the source of conflicts in different SSF cooperatives and the magnitude of such conflicts had a devastating impact on the structure and governance of cooperatives.

Furthermore, according to fisher respondents, conflicts erupted because of dishonesty amongst fishing cooperative members. One respondent noted that there is dishonesty especially in the procurement of fishing gear. In some cooperatives, the treasurer and those responsible for procurement had a tendency of inflating prices for the procured fishing gear so that they would pocket some money for their personal use. Sometimes they exaggerated the costs and the expenditure incurred by the cooperative so that they would embezzle the funds for personal use. Furthermore, generally, other members did not respect teamwork and deadlines. Differences in vision within the cooperatives also contributed to conflicts. Members of four cooperative groups noted that having these different visions in a cooperative, like in situations where most members in a cooperative are driven by monetary gains (profits) as opposed to growth of the fishery or diversification into other industries, also led to conflicts in different fisheries. These conflicts led to power dynamics where the 'little kings' in such cooperatives wanted to push their own agendas at the expense of other members.

¹⁹ Little kings were the powerful individuals in cooperatives and syndicates who had direct or indirect influence in small-scale fisheries operations in Norton. Some used their financial muscle to control the

7.6.1 Conflicts between cooperatives and authorities

The study established that conflicts also erupted between fisherfolk and authorities. Conflicts existed between ZimParks authorities and fisherman. SSF felt that they were being mistreated by ZimParks authorities in the sense that the authority instituted tough regulations and legislations on procurement and processing of fishing permits, and some individuals were unnecessarily discriminatory against them – targeting them amongst all other fisherfolk.

The study also found out that six of the interviewed cooperatives were of the conviction that poachers were not given stiffer penalties for illegal access of the lakes and fishing in breeding zones. They complained that too much effort and resources were wasted in policing the licensed fishers while many other people fished illegally and went unnoticed. They questioned why regulations were tougher on legal fishermen as opposed to 'fish bongas' (poachers).

7.6.2 Implications of power dynamics

The nature of the relations tended to determine the power relations existing among different actors in Norton's SSF although there were other factors which also helped power dynamics amongst the various actors. Such factors included legitimacy, connectedness, and levels of wealth, among others. For instance, while it was difficult to establish the hierarchy of power among the different actors mutually existing (across levels) because of the cordial relations existing among them, it was easier to establish among actors who shared the same task. In order for rival actors to outmuscle each other for the available, often limited, fish resources, they had to exhibit their level of power. Once an actor showed that they had more power than their rival, they had an advantage over them in accessing and using available resources.

Other factors that had a bearing on small-scale fisheries power dynamics included the level of legitimacy within which actors were operating. The study found out that permit holders who were licensed to fish tended to have a larger share of power as compared to their illegitimate companions. As such, where conflicts arose, those with the right to fish or operate at the lakes had overbearing power over those who operated illegally.

operations, for instance their capacity to own engine boats, whilst others used their political connections and influence to control the fishing operations (Interview with fisher respondents).

Another factor determining power relations among the different actors is the level of connectedness. Those with personal relations with people in authority such as law enforcement agents bore greater power over those without any such connections. Those actors aligned to certain political powers controlling the small-scale fisheries often had a say over the way in which their rivals operated, and such often affected the way the two groups would interact. The study observed that membership to cooperatives in general was on a partisan basis and most members were aligned to the ruling ZANU-PF party. The Chairpersons of cooperatives at both lakes were influential members of the ruling ZANU-PF party. They also participated in the District Coordinating Committee elections of the ZANU-PF party, the latest of which were held in November 2020. Both Lake Chivero and Manyame fish union chairpersons played the double roles of being the Chairpersons of all cooperatives and being the Union leaders (Chairpersons) of the Fisheries Unions. Hence, it is difficult to dissociate fisheries from ruling party's political power plays, and this affects the power relations among the different actors.

Besides, power dynamics within actors' interactions were also influenced by the amount of wealth one had. It should be noted that the emergence of elite fishers who are often referred to as 'little kings' influenced power dynamics in the Norton fishing community. These 'little kings' felt that they had control or hegemony over poor fishers who couldn't afford the large engine boats. One responded suggested that

the problem of asking for help or utilising the services of these little kings is that they felt that they own us or we are indebted to them despite the fact that we pay for the services rendered."

(Individual fishermen IF9, Lake Chivero, February 2021)

Fish unions and fish associations were also involved in fighting for the rights of fishermen in Norton –the difference being that the former was a formal governance arrangement and the latter informal.

7.7 THE RISE OF FISHING SYNDICATES

The study observed the emergence of a peculiar phenomenon in Norton –the rise of fish syndicates – which is a manifestation of the need to gain and abuse power over others. The syndicate system is one of the emerging terms and practices in Norton SSF. According to respondents, a syndicate is a product of a process whereby cooperative members and permit holders decide to stop active fishing but organise and run complicated systems meant to dominate control of the fishing process

and all other actors from a distance. The study established that although this is outside the realms of the laws and regulations governing the operations of both cooperatives and fisheries, it was largely becoming a common practice in Norton and was also steeped in illegal activities.

At best, the syndicate system involves a member loaning out their fishing rights to other fishers. The researcher interviewed five syndicate fishers who reiterated that they do not just inherit the membership for free but instead they paid the registered members for accessing the lakes using their membership rights. Some charged the access rights on daily basis while others charged for the services weekly. Those permit owners who charged daily enforced their syndicates to pay 25% to 30% of their daily catch in monetary value. Members who would be hiring their membership to such syndicates are for instance those individuals who probably got lucrative jobs or offers from other sectors. Others would have gotten temporary 'piece' work in mining or other sectors.

The study found out that the challenges of such arrangements included the lack of guarantee to continued use of access rights for the one who temporarily assumes ownership since the owner of the permit or registered member may come any time to claim his membership. There were incidences of members popping up to claim their membership having realised that their syndicates are doing well in catching more fish or are getting more profits than what they used to do. Other fisher members, however, return to their fishing activities and make their syndicates pay permit fees and still charge them 30% of the daily fishing catch on top of that. Therefore, syndicate leaders benefited to a larger extent from the syndicate process because they were only reaping the profits and not bearing the burden of paying permit fees and other costs like buying fishing nets. It is worth noting that syndicates are not formally recognised by ZimParks officials because they are not registered. Therefore, the syndicate system represents an informal governance arrangement in Norton.

At its worst, syndicates are a system of power where powerful individuals ensure that they put everyone, including fishermen and law enforcement authorities, in their pocket and as such create a group or groups of fishermen who are powerful in their own right. Such syndicates are found in Norton, often led by politicians, and prosper through corrupt tendencies. According to other respondents, those dominant powerful individuals at the helm of these syndicates were highly connected to ZimParks officials at head office in Harare and other Ministry of SME officials such that they sometimes sent some fish catches to those officials to show allegiance and as a form of bribe to gain some favours. Those powerful individuals assumed indirect influence in the day to day running of cooperatives, for example the voting procedure; and the day to day running of fisheries themselves, most of the time resulting in the prejudicing of their rivals.

The researcher observed that some law enforcement agents such as ZimParks officials and municipal police joined these cooperatives and syndicates using different names or pseudo names since formally it would be a conflict of interest for them to join cooperatives. Another tactic they also used was to make their siblings or family members join the cooperatives. The challenge of the involvement of ZimParks officials in cooperatives, according to respondents, was that it was difficult to execute their duties with due diligence. For example, it was challenging to arrest one of their syndicate members if found in illegal fishing activities.

The net effect of the syndicate system in Norton has been to create and promote divisions and individualism in a cooperative system which operates as a unit. The whole idea of having a cooperative system is to work as a group. Furthermore, the syndicate leaders gained some leverage or power over other players and increasingly over authorities, creating the impression that they were above the law or they were the law. They ended up establishing some form of cabals who controlled the fisheries, albeit indirectly. According to respondents, such syndicate members often disregarded cooperative constitutions and all regulations controlling fisheries in general. One cooperative indicated that syndicates

do not value the visions of our cooperative...they were not there when we set the agenda, dreams, and aspirations...they are just the mafikizolos (newcomers) (Mbuyanehanda cooperative members B1,B2,B3,B4,B5, Lake Manyame, January 2021).

It should be noted that syndicates were not formally recognised by ZimParks but became powerful informal governance arrangements in Norton SSF. The emergence of the syndicates in fisheries contributed to disputes. Some of these syndicates formed some form of alliances in cooperatives as was maintained by one respondent that some cooperatives have three or four members from the same family. Having three or four members of the same family caused some divisions in the SSF because they were bound to make factions against other members and in the process influence some decisions when it comes to conflict resolution and settlement of disputes in the fisheries.

Furthermore, according to fisher respondents, syndicates also resulted in sabotage and theft of fish, especially in cooperatives which run as clusters and operate at different times. Fisher respondents further reiterated that conflicts in syndicates further emanated from different catch sizes. Some fishermen were catching more fish than the others and as a result others felt that those with large catches were benefitting more than them.

More so, according to respondents, the syndicate system led to the depletion of fish resources because they ended up ignoring the ZimParks legislation which only allowed them to use six boats. The overcrowding of the lakes because of syndicates contributed to the increase in the number of boats used by the fishers. According to interviewees, the fishers ended up using more than six boats in contravention to Parks and Wildlife legislation. The increase in number of boats in the fisheries was also attributed to the disputes and lawlessness in the cooperatives. The next section explores in detail the governance structures and systems in small scale fisheries in Norton.

7.8 THE GOVERNANCE STRUCTURE AND SYSTEMS OF SMALL-SCALE FISHERIES IN NORTON

This section outlines the current governance structure and different systems operating in Norton SSF. From the data collected and analysed, this study can discuss current governance of SSF in Norton at two levels. There is the theoretical level, which sets what the situation is supposed to be on paper. Here, the governance of SSF in Norton is informed by the different laws such as the Parks and Wildlife Act. The Acts establish the different roles and responsibilities each of the government departments have in the governance – with ZimParks taking overall control on behalf of the government through the Parks and Wildlife Act. Other government departments take different responsibilities as given through the various laws. The laws thus establish a hierarchical governance structure, which is strictly top-down in nature, characterised by the government at the apex of governance through different units, with each unit subordinate to a vertical superior. The ZimParks representative at Lake Manyame explained that,

decisions are made at government level and information is usually given to the Lake Captain through memorandum and directives from the ZimParks board. In turn, the Lake Captain gives the information to his subordinates and representatives of other units such as EMA and the City Council, Cooperatives, and individual fishers. Decisions come from above and cascade downwards (Interview with ZimParks official KI/3, Lake Manyame, March 2021).

The study also established that the power exercised by the government to determine the accessibility of other players to the fisheries emphasised the nature of government control over SSF governance in Norton. The refusal of the government to allow NGOs and International Organisations to play certain roles in the fisheries reveals the government's power and the need to retain that power regardless of the potential benefits of involving other players.

The study also established that the different laws make no provision for the active involvement of fisherfolk in the use and conservation of fisheries. As such, fisherfolk, in their various capacities are mere recipients of government policy. The day to day running of the fisheries and decisions on the ground are supposed to be made by the Lake Captain in consultation with other units, and should be in accordance with established policy and acceptable procedures. Besides explaining how fishermen should go about their activities, the laws are silent on the other contributions' fishermen are supposed to make regarding fishery governance, including decision making.

On the ground however, the study established that SSF governance in Norton is complex, and often does not follow what is stipulated on paper. Whilst the study observed that most of the actors in Norton's small-scale fisheries had little or no power over activities and decisions that affected them, there were notable exceptions. The so called 'little kings' and emerging fish syndicates emerged as growing powers, with some of them influencing the day to day running of the fisheries. It emerged that these powers often determine who fished where, when, and how much fish was caught. As one cooperative member pointed out,

concerning the actual fishing, it is not the authorities who are in power anymore, but they are themselves under the influence of third parties; the ones who hold the real power and money. These determine the areas cooperatives are allotted to when fishing, the fishing hours, and how much fish they can take (Nehanda Cooperative Member B5, Lake Manyame, January 2021).

Others pointed out the involvement of these powers in corrupt activities, and explained that, corruption is what determines the running of the fisheries. Regardless of laws and regulations, decisions are made depending on what is at stake. Those with the money have the power over key decisions. Laws are broken and protocol ignored where money exchanges hands. The wealthy and politically connected indirectly make all the decisions, and decisions regarding fishing are made in their favour all the time (Mbuyanehanda Cooperative Members B1,B2,B3,B4,B6, Lake Manyame, January 2021).

It emerged that authorities in-charge of fisheries are not independent in terms of decision making as their administration and operations are controlled by the ruling party. Officially, the government and ruling party officials reiterate that such fishery projects are apolitical, but the situation on the ground says otherwise. A significant number of fisherfolk respondents agreed that being a member of the ruling party, or purporting to be one, gave fishers so much power over day-to-day fishing

decisions. Well known party members emerged as the de-facto authorities at the fisheries, as explained by one ZimParks official:

Members of the ruling party are in control. The well-connected ones can even have power over office bearers. We often have decisions overturned by our superiors, especially in cases where one would have gone against the wishes of these individuals. They report you to higher authorities and you find yourself sanctioned, even where you are legally and procedurally correct (ZimParks Official KI/4, Lake Chivero, March 2021).

Besides, most of the actors were hardly consulted in any policy changes or establishment of laws governing fisheries' activities. All interviewed fisher respondents indicated that they had not yet participated in any consultation process before the establishment of any policy or regulation. As one fisherman reiterated,

consulting the ordinary fisher on the ground? In my 20 years' experience as a fisher, I have never been consulted before any policy or regulation is put in place. Even for the decisions that affect us directly. We simply receive ready-made decisions and are not consulted. Maybe they consult the big fish [little kings and syndicate leaders] (Individual Fisherman, Interview IF5, Lake Chivero, February 2021).

Cooperatives also indicated that they were hardly consulted on policy and regulation formulation, but it emerged that two of the nine cooperatives had influence on the day-to-day operations at fisheries, albeit indirectly. However, it emerged that not all the cooperatives had input on decisions concerning fishing operations, but only those that were connected to wealthy individuals and members of the ruling political party, or are part of fishing syndicates.

The large failure to consult fishermen in the governance of SSF in Norton should not disregard the role played by fish unions and fisher associations in representing the interests of fishermen, especially where conflicts arise between fishermen and authorities. Although the two fish unions indicated that they were also not consulted on policy and regulation issues, they felt they got a measure of respect when it came to daily operations. It emerged that unions were sometimes consulted by the Lake Captains and the other unit representatives when problems arose. This however does not mean that their contributions are taken wholesomely. As the Lake Chivero Union leader explained,

consultation does not necessarily mean that contributions are accepted and reflect in decisions made. Most of the time we feel consultation is just a mere formality. The failure to recognise our ideas results in conflicts (Lake Chivero Fisheries Union member KI/2, Lake Chivero, January 2021).

However, the Unions accepted that their ideas were highly regarded when it came to complaints or queries on behalf of the fisherfolk they represented. It emerged that unions were given more attention and respect than fisher associations, which are informal. The Fish Union leader explained that,

as far as conflicts and general fisher concerns relate, union voice is superior to association voice. As such, we are given a much bigger platform to express our grievances and negotiate on behalf of those we represent. We are given room to negotiate in instances where regulations are not clear. However, in terms of policy, it is a take it or leave it situation for everyone (Union Chairperson KI/2, Lake Chivero, January 2021).

It therefore emerged from the study that the governance of SSF in Norton is complex. Having a say in the day-to-day operations of the fisheries depended on the amount of wealth and political power one wielded for them to be able to influence decisions. Corruption made it possible for the wealthy and politically powerful and connected to have indirect influence on key decisions. All the fisherfolk were, however, not consulted when it came to official policy and legislation in small scale fisheries. The government, through its various sectors and representatives, made their decisions, which were then passed to the fishermen top-bottom style.

7.9 CONCLUSION

The chapter established the governance systems in place within small scale fisheries in Norton as deduced from observations and various responses in the field. The researcher observed that small-scale fisheries in Norton are organised in cooperatives. Cooperative system is government driven and is the main system of fisheries governance in Norton. The cooperative system was introduced by the government as a process of re-allocating resources to the previously disadvantaged black people. However, although the cooperative system was initiated as a process of the indigenisation drive to benefit the Norton community, major beneficiaries of the system were ruling ZANU-PF supporters, according to a significant number of fisher respondents. Allocation of permits was mainly done on partisan lines. The system of fisheries in Norton further comprised individual fishers who fell in the category of boating and angling.

The study further revealed that the system of fishery governance in Norton is hierarchical and centralised. It takes a top-down approach with ZimParks as the government agency managing the two lakes (Manyame and Chivero). The two lakes were managed with overlapping and often confusing rules and regulations from various departments/ ministries such as Women, Small and Medium Enterprises. The chapter further presented the findings on whether these overlapping laws and policies governing SSF in Zimbabwe are effectively implemented or not, through the lens of Norton. The chapter also interrogates the institutional arrangements in Norton's small-scale fisheries, the different conflicts arising from actor interactions, government relations with NGOs and International Organisations and the ultimate governance results thereof. The study revealed that conflicts were complex and existed between ZimParks rangers and fishers, and that they were intra-cooperative conflicts as well. Such power dynamics and conflicts resulted in the emergency of syndicates and 'little kings' who were informal but became very powerful in the governance of SSF in Norton. The next chapter is a discussion of the study's findings.

CHAPTER 8: DISCUSSION: GOVERNANCE ARRANGEMENTS AND IMPLICATIONS ON LIVELIHOODS IN SMALL-SCALE FISHERIES

8.1 INTRODUCTION

The aim of this chapter is to analyse and consolidate the information that has been collected in this study. The first section of the chapter gives an overview of FTLRP and its implications on the governance arrangements of SSF. An updated conceptual framework for understanding governance is presented here, based on empirical research and the key concepts and theoretical ideas introduced in Chapter Three. The intention here is to expand on the key governance processes and mechanisms controlling access to fishery resources, as well as the livelihoods of locals. Governance issues in natural resources are inextricably linked to the broader livelihood issues in every society. In SSF, the challenge is to establish how power dynamics and governance arrangements (both formal and informal) shape livelihood patterns in the SSF sector. The way these outcomes are discussed in this chapter is based on the relevance of certain aspects of governance procured at the case study sites.

By drawing on the preliminary framework introduced in Chapter Three, this study sought to identify the governance arrangements of SSF in Zimbabwe and the implications of such arrangements on livelihoods. The focus has been on Norton, which has the 'twin' lakes of Manyame and Chivero where the nature and importance of SSF have transformed tremendously as socio-economic conditions have changed, partly due to the negative consequences of a largely controversial land reform exercise (Nyikahadzoi & Raakjaer 2014; Nyikahadzoi et al. 2017). On the one hand, therefore, SSF have become a potentially viable alternative to the majority who lost formal jobs and regular incomes. On the other hand, SSF have been a contested issue related to socio-economic trends characterised by resource access bottlenecks and inequality.

The discussion is divided into three parts. The first part discusses the governance arrangements in Norton, including the institutional arrangements controlling operations at both Lake Chivero and Lake Manyame; the SSF actors in Norton, their interaction, and the resultant power dynamics. The second part discusses the impact the governance arrangements have had on Norton livelihoods. The discussions in the first and second part are represented in the revised conceptual framework (Figure 8.1). The third part discusses the study's recommendations, which are envisaged to help improve governance of SSF in Norton and Zimbabwe at large. The next section discusses the first part of the discussion on SSF governance in Norton.

8.2 SMALL-SCALE FISHERIES GOVERNANCE IN NORTON

The involvement of central governments in the control of fisheries oscillate on: (a) strong top-down regulation regardless of fishing community wishes, (b) a co-management mode of conciliation with fishing communities, (c) an entirely supportive role of the state, or inactivity from the fishing scene (Kosamu 2015; Bednar & Henstra 2018). In Norton, the study established that the system of fisheries governance is hierarchical (formal), characterised by strong top-down approaches in the conservation and management of natural resources. The top-down approach as experienced in Norton denotes the government being in control of the management of the fisheries resources under ZimParks. Such control is implemented through the enactment of legislations and policies which regulate fisheries in Zimbabwe and Norton in particular.

As with Southeast Asia and most of Southern Africa, excluding South Africa (Nielsen et al. 2004), fisheries management approaches in Norton are still largely based on centralised government intervention and are still largely controlled by government, although experiences globally show that various forms of partnerships between government, fishers and NGOs strengthen management and produce better livelihood results (Njaya et al. 2012; Nunan et al. 2015; Fabinyi et al. 2015). As argued by Chambers & Kokorsch (2017), the devolution, and decentralisation in the decision-making process have been a growing trend in fisheries governance and management systems of all fish species.

Yet in Norton, the involvement of fishing communities has been rather limited in all respects, and the management system is top-down in relation to both setting management objectives, defining the knowledge base, and implementation. While Zimbabwe in general, and Norton in particular, have not benefited much from a centralised resource governance system (as illustrated by the failure of both fisherfolk and government to gain from envisaged organisational, social, and economic advantages of a centralised system, which is hierarchical), scholars have highlighted that, alternatives can prove better options. One such alternative is co-management, which allows the involvement of other stakeholders, especially the community around which fisheries are found. Malasha (2008), in the study of Lake Kariba observes that co-management is instrumental in creating, not only poverty reduction, but also poverty prevention amongst SSF.

Observations in Norton concur with and reinforce arguments made by scholars such as Salman et al. (2018), Nyikahadzoi et al. (2017) and Menon et al. (2016), that fishing concessions by the governments whilst meant to foster order in resource usage through strict regulations, deprived local communities of their livelihoods. The argument made is that, had there been more

decentralised governance approaches used on both sides, there would have been a more receptive approach to fishery governance, appreciating the needs of the locals without negatively affecting their livelihoods.

From the data collected and observations made of Norton in this study, it is conceivable to concur with arguments made by such scholars as Chisango (2017) – that hierarchical governance arrangements have impacted negatively on livelihoods. In the study of Deka Drum Fishing Camps, in Zimbabwe, Chisango (2017) observed that the continued obligatory jurisdiction to manage all fisheries under ZimParks has negatively impacted on livelihoods as fishers are not recognised in management strategies and policy formulation, compromising the inclusion of the essential indigenous knowledge in fisheries management. He concluded that such centralised, top-down, non-participatory approaches created antagonistic working relationships between the fishers and government departments, as the study observed in Norton.

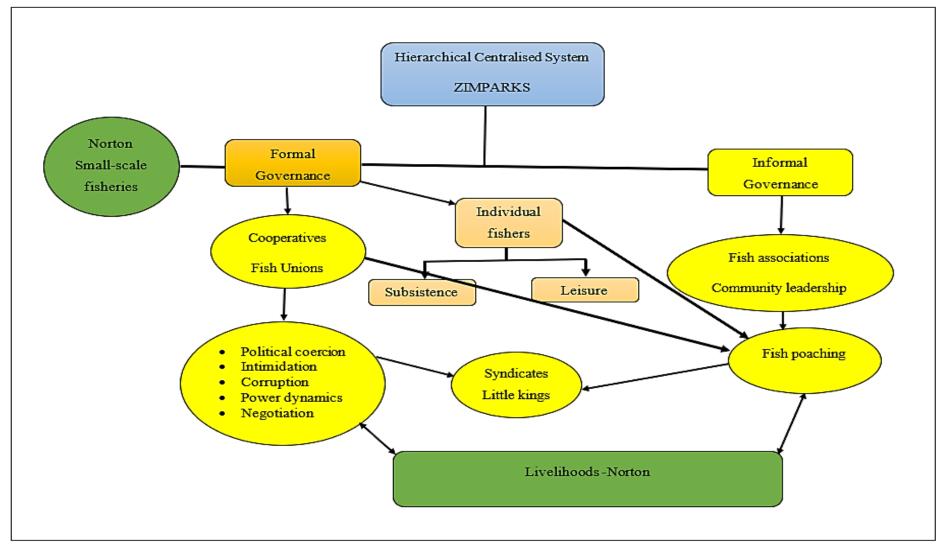
Some studies have however concluded that it is not the governance arrangement per se that determine the effects of a system on livelihoods, but there were other 'external' factors, which when present or absent determined the sustainability and nature of small-scale livelihoods. Whether the governance arrangement is centralised or decentralised, there have been suggestions that what matters is the nature of input made by whatever system and not necessarily the system itself. Bundy et al. (2017) argued that the implementation of a long-term management plan, including social and economic dimensions of fisheries in utilised ecosystems, was a key factor in sustainable fisheries management. For Bundy et al. (2017), therefore, the most important determining factor is tied to the level of planning – whether it is successfully long-term or short-term in nature.

This study found out that the planning system of the current governance regime is not effective. The spreading of corrupt tendencies and the development of unscrupulous individuals and groups with total disregard for regulations leads to questions arising over the whole planning and governance system. There is no tangible evidence of any efforts being made to ensure that regulations are adhered to, equality amongst fisherfolk is maintained, and that the fisheries remain sustainable. In the same vein, Kosamu (2015) argues that, with incapacitated local social capital, levels of government participation did not make any variances. The fisheries were not sustainable in all cases, whether centrally governed or with decentralised governance. The argument is that governance on its own is not a strong factor affecting livelihoods. The next section outlines the current governance structure and different systems operating in Norton SSF. The governance

structure is presented in form of an updated conceptual framework based on the empirical data collected from fieldwork.

8.2.1 The governance structure and systems of small-scale fisheries in Norton

This section outlines the current governance structure and different systems operating in Norton's SSF. Changes in the updated conceptual framework are outlined, highlighting how these changes are going to lead to a better understanding of Norton SSF. Figure 8.1 shows the updated conceptual framework for understanding the governance structure and systems of SSF in Norton. The structure and systems in place are explained thereafter.



Source: (Author's construct)

Figure 8.1 A conceptual framework for understanding governance of small-scale fisheries in Norton

Figure 8.1 presents a conceptual framework, a product of the research findings and an improvement of the initial framework adopted in chapter three. This framework differs from the initial framework presented in Chapter three in that it highlights the involvement of different actors in SSF from those earlier anticipated as the study discovered the co-existence of a mutually inclusive formal-informal arrangement at the two lakes. Formal structures in the framework, do not exist in isolation but encompass an informal side to fish governance reflective of SSF governance arrangements in Norton. The conceptual framework above shows the interaction between regulations and government structures and institutions on the one hand, and actors as recognised formally, and those operating informally, to inform governance.

The study results in part confirmed the anticipated SSF governance arrangements in Norton. The study found out that there exists a top-down governance structure in Norton's SSF where government, through ZimParks, and other agencies, control access to, and the use of SSF in Norton. In that light, the study found the existence of individual, licenced fishermen who fish for recreational purposes, and fishing cooperatives, who are the only permitted commercial fishers. These fishing cooperatives are supposed to register, pay licence fees, and carry out activities as per regulation, themselves guided by constitutions and represented by fish unions. Fish unions act as the conduit through which fish cooperatives and government representatives interact.

However, the research findings also reflected a deviation from the anticipated SSF governance structure. The findings reflect the existence of an informal system co-existing with the formal system in the SSF governance structure and interactions. As reflected in Figure 8.1, in Norton informal arrangements are as important as formal arrangements, resulting in a complex governance system where even the formally recognised institutions and actors are tainted with informality. As highlighted by the conceptual framework, various informal actors and processes, which are important in the Norton's SSF, include fish associations, syndicates, 'little kings', and poachers. These stakeholders represent not only resistance to formality, but the growth of corruption and the usurpation of power from government institutions. These informal fishing arrangements, dominant and visible in the governance of SSF in Norton, also reflect reliance on and use of indigenous fishing rights amongst the Norton fisherfolk. Informal fishing activities and role-players operate in formalised institutions and display dominance and influence in the SSF in Norton. Despite their domination in SSF, informal governance systems' role and contribution are largely ignored by the government in decisions and policy making,

and where conflicts arise, they are not consulted. However, although their influence and power are minimised in the formal SSF system, these informal arrangements continue to seek relevance in representing the traditional, indigenous fishing rights of those referred to in the system as poachers. Poachers, fish associations, and syndicates led by 'little-kings' show powerful epochs of power, though at different levels and with different effects, to the extent of disrupting and corrupting formal governance arrangements. It is this complexity that this study wants to highlight and draw attention to. The activities and structures of these informal governance arrangements are discussed in greater detail in the later sections of this chapter.

By presenting the framework highlighted in Figure 8.1, attention is also drawn to the role of private players in SSF. This research embarked with the assumption that there were strong and positive interactions between government and private players (such as NGOs) although the government had a final say in terms of policy. However, the data collected and analysed indicates that government-private players' interactions were often negative and close to non-existence in SSF. This is due to government mistrust of private role players, and the fact that government ultimately decides and exercise power over natural resources. This has resulted in deliberate mechanisations to frustrate and exclude private players.

As highlighted earlier, the interactive governance framework was used as a point of departure because it focuses on interpreting the governability of societal systems and has been implemented most broadly to capture fisheries. Proponents of IG believe that it has more to offer as it is applied to investigate why SSF continue to be ignored despite the recognition of their importance (Kooiman et al. 2005; Bavinck & Vivekanandan 2017; Jentoft & Chuenpagdee 2019). This study and the conceptual framework developed for understanding SSF in Norton concurs with this assertion by highlighting the importance of Norton's SSF in the livelihoods of the Norton community despite the little recognition being paid by the Zimbabwean government. The researcher interrogated the IG approach in this study, supported by empirical data, and presents this conceptual framework here to understand the Norton SSF. IG focusses on formal governance arrangements and does not pay attention to informal governance arrangements in Norton, such as fish associations and syndicates, which also play an important role in as far as governance of fisheries is concerned. Informalities have legitimacy and implications for fisheries resources and activities governed in Norton. IG also fails to locate power relations in Norton SSF, but power dynamics and asymmetries are important aspects in the sector. Power dynamics have also been included in the conceptual

framework to recognise their importance. It therefore provides an analytical lens to determine where problems may lie and where opportunities for ameliorating governance may be found (Jentoft & Chuenpagdee 2019). This has been demonstrated by assessing the challenges faced by Norton SSF and suggested recommendations for better understanding their operations and improved governance arrangements in terms of policy.

Various studies have been conducted which criticised IG for its failure to locate power relations in SSF (Bavinck et al. 2005; Davies & Ruddle 2012). IG theory is further challenged by Bayart (2009) who questions traditional models of governance, especially formal systems and asserts that state power in Africa is not channelled through formal systems as there exists informal channels which link citizens and the state through client-patron relationships. Such relationships and other informal channels have been presented here to demonstrate the current systems and processes in place, which guide and impact on governance arrangements in Norton.

Changes and aspects that this study highlights are depicted in Figure 8.1, and emphasises the co-existence of formal and informal fishing arrangements. These arise from various factors, among them complex and often confusing institutional arrangements instituted by the Zimbabwean government through ZimParks. The section below will further outline these implications in the Norton fisheries and its relevance for livelihoods and governance of SSF.

8.2.2 Emergence of informal fishing

The study found that the question of livelihoods and how they are negatively threatened by the bottlenecks created by centralised, hierarchical SSF governance arrangements, are at the core of the emergence of informal fishing arrangements in Norton. SSF governance in Zimbabwe generally, and particularly in Norton, has failed to transform with emerging needs, thus communities have had to devise ways of circumventing bottlenecks. Before the early 2000s, centralised, hierarchical arrangements, went unchallenged and pressure on fish resources was low, with many fishing for subsistence and recreational purposes. However, the period following Zimbabwe's controversial FTLRP witnessed an accelerated economic meltdown which saw many industries closing down, a vast majority of economically active people being retrenched, and unemployment levels rising. As such, the informal sector grew and fishing emerged as a viable and readily available activity, which if commercialised would provide livelihood opportunities for many.

Most Norton community members were deprived of their livelihoods because of the limitations in accessing the fish resources. Government's failure to do a thorough consultative process by engaging the locals in instituting fishery laws largely contributed to the disgruntlement of the fishing community who felt that they were largely excluded and being undermined from benefitting from fishery resources. The disgruntlement from the large spectrum of the fishing community contributed to the emergence of informal fishing practises, which is also referred to as 'poaching' in government legal terms. The community was engaged in informal fishing to make ends meet. Furthermore, poverty and a high reliance on fish as a major source of livelihood pushed the Norton community to engage in informal fishing. During data collection, it was also reiterated by respondents that they have customary rights to harvest fish by virtue of being the indigenous Norton community members. Therefore, informal fishing was 'legalised' by many community members who felt entitled to benefit from the fish resource. The emergence of various informal actors that the study identified not only demonstrates resistance to formality, but the growth of corruption and the usurpation of power from government institutions. It was found that poaching was regularised by fisherfolk as normal, with arguments being made that community members had traditional rights to access and utilise fish resources.

The study established that the fishing community elect their own community leadership in form of fish associations as opposed to the government fish unions (which were largely politicised). Fish associations represented a large spectrum of the informal fishers to solve their disputes without government or ZimParks intervention. Fish associations played a crucial role in informal governance arrangements in Norton by negotiating and settling disputes among informal fishers. In some instances, fish associations extended their activities to include negotiations between ZimParks and informal fishers. Fish associations are however, not formally recognised by ZimParks. As such, their intended roles and functions are not utilised as their informal status results in them not being recognised by such formal structures as ZimParks. On the other hand, fish unions are formally recognised by ZimParks and they represent the formal governance arrangement and instrument through which governance of SSF occurs. Their role, therefore, sees them settle disputes and negotiate fisheries related matters between ZimParks and Cooperatives, although their powers are minimal in terms of decision making and policy initiatives.

Informal fishing also exists within formal government arrangements such as fish cooperatives. This is usually practised through the use of unregulated fishing gear such as boats and nets. These informal activities undertaken by such cooperatives also include fishing in breeding zones, which is prohibited by ZimParks. Formal and informal fishing arrangements operate simultaneously in some instances and there is a significant overlap, and interaction between formal and informal fishing, with informal fishing considered larger than the formal fishing. Within these formal and informal fishing arrangements further exists power dynamics as a result of conflicts. The power dynamics, however, contribute to powerful individuals such as 'little kings' and informal powerful institutions such as syndicates who play major roles in the governance of SSF in Norton in terms of determining where fishers fish and deciding on who is allowed membership into various cooperatives. The syndicate system represents an informal governance arrangement in Norton and a system of power where key individuals are able to regulate the activities of fishers as well as dictate to law enforcement authorities. This has resulted in the creation of groups of key fishermen who are a power in their own right. Furthermore, such syndicates are often led by politicians and are able to sustain their activities through corrupt means.

The implications of such informal arrangements have led to the politicisation of resource management and access. Within the various institutions, such as cooperatives and syndicates, often exist political coercion and intimidation as demonstrated earlier. Party politics plays a major role in cooperative membership and some of the syndicate leaders and 'little kings are powerful political figures, especially in the ruling ZANU-PF party. Ordinary fishing community members are intimidated by these powerful and politically connected elements in the syndicates and fishing cooperatives. These elements are informal but very powerful in the governance of SSF.

The study found that corruption exists especially in the awarding of licences to the cooperatives. Various cooperatives have to bribe officials in Ministry of Small and Medium Enterprises to facilitate and fast-track the process of cooperative registration. Claims of ZimParks members that are involved in corrupt activities have also been highlighted by poacher respondents in the results chapters.

The emergence of informal fishing arrangements in Norton have had varying impacts on the socio-economic life of the Norton community and governance of fish resources on the ground. One area of note where informal arrangements have impacted ordinary fishers is on livelihoods.

While the study proved that it is possible to sustain lives using SSF, it emerged that those actors outside the formally recognised institutions, such as cooperatives, were disadvantaged. Being a poacher denied unlicensed fisherfolk the right to fish when and where they desired, losing the rights against cooperatives which were the rightful owners of fishing rights. In any conflicts involving fishing rights, the licensed institutions were at an advantaged position. Thus, the more lucrative fishing sites were monopolised by those regulated to fish in the twin lakes, undermining the potential of poachers to have meaningful catches. Apart from not being able to fish freely, their activities were regularly disturbed and at times their catch was lost to authorities. Governance arrangements in Norton are complex as demonstrated by the next section.

8.3 GOVERNANCE ARRANGEMENTS IN SMALL-SCALE FISHERIES

This section discusses the institutional arrangements, the SSF actors in Norton, and their interactions, and the resultant power dynamics. The section also discusses the nature and characteristics of governance arrangements in SSF in Norton.

8.3.1 Institutional arrangements in small-scale fisheries

The institutional arrangements at play in SSF in Norton include the legislative frameworks controlling SSF activities and the different roles played by governmental departments and non-governmental organisations (the latter of which play a minimal role, if at all, in Norton). A strict legislative framework, putting in place laws that control SSF such as Chivero and Manyame in Norton have worked to build a centralised governance system, in the process avoiding the recognition and use of confusing common property regimes. The Parks and Wildlife Act (Chapter 20:14 of 1996, as amended); the Inland Waters Shipping Act (Chapter 13:06), as amended in 2001; and the Environmental Management Act [Chapter 20: 27] enacted in 2000 have a bearing in the regulation of SSF in Norton. These overlapping statutory instruments from various ministries regulate the fisheries sector through issuance of permits and licences. The laws thus establish a hierarchical governance structure.

It is arguable that the statutory instruments controlling SSF in Norton, and so in Zimbabwe are meant to avoid the inconveniences established by alternatives, such as common property rights, which do not assert centralised control of resources like fisheries. Common property regimes,

often in the form of TURFs, are dominant in the developing world as suggested by literature (Neiland et al. 2005; Kurien 2007; Andrew et al. 2007; Campling et al. 2012). Communities can control access to fishing turfs by determining who and where to fish. Social boundaries play important roles in permitting or limiting access for certain people (Jentoft & Bavinck 2014; Chuenpagdee 2018; Smith & Basurto 2019). For instance, the caste system (in India), or ethnic organisation structures in the rest of the world often limit access to the occupation to certain groups (Kolding et al. 2014). Some African lakes have also a limiting mechanism that is intensively related to residential rights (Bene et al. 2003). However, in the case of Zimbabwe, and specifically Norton, SSF are controlled by statutory instruments which establish precisely, and beyond contestation, who is supposed to do what, where, and how.

The combination of statutory instruments control access and usage of SSF resources on paper, under the regulation of the government in a top-down approach, which is not recognised by SSF actors on the ground. This is evidenced by the development of fishing syndicates and other informal fishing arrangements, and the rampant growth of poaching activities. Zimbabwean SSF are still based on centralised systems of governance as opposed to countries like South Africa in the region, and most Northern countries in Europe and America, which have adopted the decentralised system of governance. It shows that Zimbabwe and other centralised SSF are in the majority, as indicated by Chuenpagdee & Jentoft (2018), who maintain that in many of the 34 case studies they undertook, the hierarchical mode of governance still dominates. However, there have been tangible efforts amongst several countries, including USA, and Canada, to shift SSF governance through preparing their institutions either for assuming a hybrid system or for totally transforming to the co-governance mode.

Devising a central system in Zimbabwe, and in Norton in particular, and putting in place laws that consolidate this position have been meant to avoid problems associated with governability concerns which have been raised about SSF globally. For instance, due to the open-access nature of their activities and their large number, SSF are often associated with the "Tragedy of the Commons which claims that resources held in common will inevitably be overused" Haller & Merten 2008: 699). Several studies, however, have shown that not all common property regimes cause resource depletion. Nevertheless, devastating fishing practices, like use of cyanide and bomb blasting, continue to persist in some SSF which are not centralised despite the effort to remove them (Chuenpadgee & Jentoft 2018; Pita et al. 2019). Many also fall into the list of, "illegal, unregulated, and underreported (IUU) fisheries", because of the lack of

proper recording and monitoring systems which are theoretically afforded by centralised governance systems (Chuenpadgee 2018; Chuenpadgee & Jentoft 2018).

The centrality of governance however does not directly translate into order, proper monitoring and evaluation, and organised fishing activities that are beyond reproach, as illustrated by the Norton fisheries case. Even though SSF in Norton are centralised, destructive fishing practices are still rampant despite measures put in place to ensure that such is contained if not eliminated. Policing, monitoring, and evaluation practices have neither been clear, consistent nor effective. At the root of such failure has been the entrenchment of corrupt practices, fanned by the establishment of informal groupings and individuals, including cartels and 'little kings' whose activities and influence negate the purpose of governance centralisation in the first place. The illegal, or rather informal fishers, stressed that they had rights to have unlimited access to the lakes allowed them by custom. They were opposed to 'colonial' statutory laws.

The study found that cooperatives in Norton have the highest access to fisheries. Each of the two lakes had 40 cooperatives licenced to engage in SSF. These cooperatives are important as part of the organisational structure and institutions involved in the sector. Fishers around the world have utilised cooperatives forms of social capital, and many of the benefits that cooperatives generate are economic (Bennet 2017). For example, cooperatives may organise collective marketing activities (Bennet 2017; Bennet & Baturso 2018). Benefits may also be political, such as representing fishers in the policy process, or obtaining legal rights to fish (Bennet 2017; Lindkvist et al. 2017; Bennet & Baturso 2018). Some cooperatives have even made remarkable contributions to resource sustainability and governance (Jentoft 2017; Chuenpagdee 2018).

However, although dominated by cooperatives, SSF in Norton have not shown significant advantages highlighted in other parts of the world. The only notable advantage cooperatives in SSF in Norton have demonstrated is in having preferred access to the lakes and being allowed unregulated amounts of catch as opposed to individual fishers. Economically, they have not necessarily undermined exploitative relationships with middlemen, or successfully organised collective marketing activities such as auctions. Although they sell in volume, they still do not have access to low-interest loans and credit mainly due to lack of collateral. The cooperatives have also not maintained the physical infrastructure of marketplaces nor have they increased production efficiency. The significance of cooperatives in Zimbabwe has therefore been questionable beyond their control of the number of regulated fishers. Politically, the benefits

of cooperatives have been limited to obtaining legal rights to fish, but they have been largely insignificant in lobbying the government to change fisheries regulations, or representing fishers in the policy process.

In Norton, cooperatives have not had a largely positive impact, but rather a negative one, as they have facilitated the development of fish syndicates and powerful individuals who control cooperatives. Besides, beyond local activities, cooperatives in Norton are insignificant, especially with regards to value addition and making inroads into regional and international markets. Such is explained by Chuenpagdee (2018) as being partly due to the growing importance of global fish trade, which affects the fisheries value chains and has in many cases led to the steep integration of most of the fisheries' production and product distribution under the control of a few large companies which have a financial advantage that cooperatives can hardly challenge. Fishers' organisations, producers' associations, and marketing cooperatives for SSF are key stakeholders at the local level, but they control a small fraction of fisheries products traded at world markets today (Bennet 2017; Chuenpagdee 2018).

Cooperatives in Norton are not consulted on policy and regulation formulation, but it emerged that some cooperatives had influence on the day-to-day operations at fisheries, albeit indirectly. However, it emerged that not all the cooperatives made input in decisions concerning fishing operations, but only those that were connected to wealthy individuals and members of the ruling political party or are part of fishing syndicates. Regardless, the large failure to consult fishermen in the governance of SSF in Norton should not disregard the role played by fish unions and fisher associations in representing the interests of fishermen, especially where conflicts arise between fishermen and authorities. The cooperatives in Norton's SSF are therefore different from those found in other countries in terms of functionality, importance, and effectiveness. The next section discusses the small-scale fish actors present in Norton.

8.3.2 Small-scale fish actors

Whilst globally there has been a varied existence of actors in SSF with slight variations, the study noted limitations in the Zimbabwean situation. The global trend has been an array of companies, co-operatives, governments, fishermen, Non-Governmental Organisations (NGOs), lobby groups, and service providers involved directly and indirectly in fishing, being actors in the small-scale fishing industry. The Zimbabwean situation, however, has revealed actor limitations. Companies, in the sense of big players like multi-nationals and branded

entities, are not part of SSF actors. The government has control over fisheries activities and governance in Zimbabwe and in Norton such that other potential stakeholders' involvement relied on the willpower of the government.

Further, it is arguable that the exclusion of other potential actors in different capacities stems from a centralised governance structure. The government exercises its power over decisions regardless of the role or inputs, and possible benefits to other stakeholders, especially the fisherfolk. It may be argued that if a different management system (decentralised) was in place, the result would be processes that would see the need to involve other actors, with government still playing an oversight role. This could further benefit the SSF industry. Given the importance of SSF in the Norton community in the post 2000 era, it is evident that political interests have been prioritised over other pertinent socio-economic issues such as the expansion of livelihoods. For political reasons, it becomes unthinkable for the government to allow local development to be associated with institutions and organisations identified with opposition parties. Therefore, the fisherfolk and local communities have no say, and are, neither consulted nor listened to.

SSF actors in Norton are either direct or indirect, legal or illegal, and subsistence or commercial oriented. Monaco & Soltanpour (2017) identified participants in terms of the level of involvement and noted that they can either be direct or indirect. Direct participants include fishermen; the government; and traditional institutions. Indirect participants include those who provide services to the direct participants, especially those found at the fisheries location. These service providers include boat repairers, food, and accommodation providers (Monaco & Soltanpour, 2017).

As mentioned above, actors in Norton are also either legal or illegal. As Jacinto (2004) noted, 'legal' actors are those that are permitted and recognised by existing governing laws controlling fisheries, while 'illegal' actors denote those who may not necessarily be permitted to take any role in fishery activities, but do so, nonetheless. As illustrated by the Norton case, where fisheries are state controlled, the legal participants include the government and its agents, by virtue of being the controlling authority; and recognised fish unions, as aptly observed by Jacinto (2004). The illegal actors include unregistered fishermen and associations, also referred to as 'poachers', most of whom are locals. The observations are in agreement with the observations of Jacinto (2004) and Kupaza et al. (2015).

This study reported on the emergence of key actors in Norton namely a group of informal actors known as syndicates. These syndicates are not formally recognised by ZimParks officials because they are not registered. The net effect of the syndicate system in Norton has been to create and promote divisions and individualism in a cooperative system which operates as a unit. Furthermore, the syndicate leaders have gained some leverage and power over other players and increasingly over authorities, creating the impression that they are above the law, or they are the law.

Additionally, actors in Norton do not have clear-cut roles as the above categorisation seems to suggest. In some cases, actors assumed double or even multiple roles. Most fishermen were also consumers, fish processors, and in some cases traders. Members of cooperatives also acted as individual fishermen with individuals who at some point had fishing permits, would fail to purchase permits, and become poachers. Therefore, while the different categories of actors could be established, it was difficult to clearly and permanently identify and distinguish individuals as belonging to a particular category.

The gendered division of labour in Norton SSF among the actors is also apparent. Many adult males were involved in fish catching whilst women and children were involved in fish processing and trading. However, this does not necessarily mean that there were no women who fished and that there were no men involved in trading. Given the fact that the actors changed roles often, the different activities ended up being done in differing proportions by men, women, and children. The composition of the actors in any place has in-turn shaped the different interactions, power-dynamics, and governance arrangements.

8.3.3 Power dynamics within small-scale fisheries

As noted in the section above, the actors in Norton's SSF are varied, with different levels of power. As a result, power dynamics have been created in Norton's SSF where there has been 'elite capture' in natural fish resources, characterised by powerful individuals and government officials' misuse of power. It should be noted that the 'elites' in Norton SSF are not only politicians but also well-established individuals who control cooperatives and equip such cooperatives with 'modern' standardised fishing gear such as engine boats and canoes. These powerful fishery elites monopolise the SSF sector as boat owners and control certain fishing sites, creating an apex of power concentrated in the observed syndicates.

Scholars have observed and made varying conclusions on the effects the different institutions have on SSF. One of the most common traits observed has been conflict arising in both formal and informal institutional arrangements. This has been observed in Iceland (Chambers & Kokorsch 2017), Southeast Asia, especially the Philippines (Jacinto 2004), East and Southern Africa (Njaya et al. 2012; Nunan et al. 2015; Schultz 2017), and in Zimbabwe (Mawere et al. 2014). The conflict has taken many different shapes and has been rooted in several institutional interactions. For instance, Pourcq et al. (2015) posit that conflicts between Parks authorities and local communities are some of the most prevalent problems and have been extremely destructive. Observations from Norton indicate that Zimbabwe has not been an exception to this phenomenon. In line with conclusions reached from other Zimbabwean studies (Mawere et al. 2014; Manyena et al. 2016; Nyikahadzoi et al. 2017), SSF in Norton experience conflicts, which are fuelled by the need to control over and access to fisheries resources. This study established that conflicts mainly occur between fishers and ZimParks authorities. In this regard, small-scale fishers lamented that they were being mistreated by ZimParks authorities in the sense that the authority instituted tough regulations and legislations on procurement and processing of fishing permits. Some individuals were also unnecessarily discriminatory towards them, targeting them amongst all other fisherfolk.

The nature of the relations between and among actors tends to determine the level of engagement existing among them in Norton's SSF, although there were other factors which also affected power dynamics, such as political connectedness, and levels of wealth (for example ownership of boats), among others. Power is a crucial concept in fisheries management - being an inevitable political process or activity (Jentoft 2000: 58) - and power differences have often been ignored or deficiently addressed in co-management studies. As with other forms of governance, fisheries management rests ultimately on power; power to enforce, and implement management decisions. (Jentoft 2007). Power in fisheries management involves risks as well as potentials, making it one of the critical challenges in institutional design (Jentoft 2007). To understand power in practice, Nuijten (2005) suggests focusing on conflicts, and on interactions between actors. Conflicts are more often mentioned as good 'food' for analysis and function quite centrally in natural resource management studies (Kraan 2009). The reason being that "conflictive situations give insight into the central issues at stake and the power struggles and practices which develop around them" (Nuijten 2005: 9). Most conflicts stem from attempts to limit or control community access to fisheries resources. For example, this is done through prohibitions on the use of certain fishing gear, licensing, and

fishing in prescribed zones. Whereas conflicts between fishers occurred mostly as a result of theft of fishing nets and fish.

In Norton, as has been observed by Chambers & Kokorsch (2017) in Iceland, power relationships have been unequal amongst the different actors. The existence of unequal power relationships in SSF communities created what has been referred to as "little kings" in Iceland fisheries. The term carries multiple meanings, ranging from proud to derogatory. According to Chambers & Kokorsch (2017), the discourse of "little kings" is a telling illustration of the social capital present in governance of fisheries where conflicts between fishermen create little kings within communities. These are also found in Zimbabwe, and the underlying reason for the creation of such a group is to control fishery resources as well as human capital and the activities in SSF for their own economic aggrandisement. A few of the 'little kings' in Zimbabwe however seek such power for political expedience. Furthermore, such conflicts have led to fishing families resorting to wide-scale use of illegal and unsustainable management practices of capture fisheries, characterised by high scales of poaching.

8.3.4 Poaching in Norton small-scale fisheries

Poaching is indeed a strong management challenge even in Norton, aggravated by the mushrooming of syndicates, characterised by high levels of corruption. However, it should be maintained that it is regarded as poaching by the state authorities which sets out fisheries regulations that undermine socio-cultural legalities. This study has emphasised that people involved in the Norton fishery believed that they are entitled to benefit from fishery resources whether they have a fishing permit or not. Community members, for instance, believe that customary rights override their obligation to comply with formal rules. Therefore, poaching, or rather informal traditional fishing, is an accepted livelihood strategy in Norton. Even formal fishers, who may be threatened by the impact of informal fishing, acknowledged the economic need of informal fishers and their traditional right to access fish resources (Hauck 2009; Williams 2013). Thus, poaching is taking place as the current governance structure does not fully benefit the local fishing community. The fishing community 'legitimised' poaching because they are constrained by lack of income and unemployment. Poaching did not only exist in informal governance arrangements. It also existed even in formal governance systems such as cooperatives and formalised individual fishers. Hence, central systems that do not adequately respond to the needs of locals and acknowledge indigenous systems are likely to

contend with activities such as poaching and the organising of syndicates. This reinforces the arguments that centralised governance arrangements have a greater disadvantage in promoting and sustaining livelihoods when compared to decentralised governance arrangements.

There were also activities on the surrounding farmlands that had an impact on the lakes. Empirical data from this study revealed that fish poaching was rampant following the loss of farmland by former white farmers who used to own the farms surrounding the lakes. Former white farmers with farms surrounding the lakes used to protect the natural resources through funding anti-poaching initiatives and contributing towards the conservation of fish species and the natural environment around the lakes. However, such protection initiatives were a success because former white farmers had financial capital and government support in form of loans to fund such operations as opposed to the newly resettled black farmers. The current beneficiaries of the FTLRP interviewed in this study stated that they lacked the capacity and resources to engage in such operations to protect the endangered fish species.

Governance of SSF in Norton, as in the rest of Zimbabwe, is framed in the political discourse and influenced by the political climate. Politics shape almost every social and economic aspect in Zimbabwe, and the governance of SSF is not spared. In Norton, indirect control of operations in SSF is made by politically connected individuals who use their positions to undermine and override the authority of ZimParks officials and to clandestinely carry out illegal fishing operations, especially through syndicates. As observed in the study, party politics is a big issue in Norton's SSF especially where management and leadership are concerned. For instance, leaders of cooperatives and fish unions are ruling party card carrying members and are feared amongst the fisherfolk. ZimParks authorities are sceptical when making decisions and resolving conflicts involving politically connected actors because they are aware that those with political standing have indirect authority over them.

The Zimbabwean economy is thriving largely on informal small and medium enterprises, although most of these enterprises are not formally registered and recognised by the state. The prominence of the informal economy was necessitated by the collapse of the heavy formal industries and the economy in general the post-2000, after the controversial FTLRP. The government is aware of the informal governance in Norton and that the economy in general is largely informal. Fisheries in Norton are largely organised and based around informal fishing because informality is happening even in the formalised institutions such as cooperatives.

Roitman (2005) challenged the notion of informality and calls it an irregular economy instead of an informal economy. His argument is that the situation in Zimbabwe is an irregular economy in the sense that the central state knows what is happening on the ground and chooses to turn a blind eye. Furthermore, the state is aware that if it intervenes it might cause political disaffection. However, in some instances, the state would intervene where it may seem that a situation is out of control. In Norton, these interventions can be seen when ZimParks arrest people to control/contain the situation on the fisheries. This state control process is what Roitman (2005) referred to as irregularity. Whether termed informal or irregular, unregulated fishing is playing an important role in the governance of SSF in Zimbabwe.

8.4 IMPACT OF GOVERNANCE ARRANGEMENTS ON LIVELIHOODS

This section discusses the importance of SSFs in Norton livelihoods and the impact of the governance system on livelihoods. Small-scale fisheries are also important for food security, employment, and incomes.

8.4.1 Importance of small-scale fisheries in livelihoods

The question of livelihoods in fisheries has attracted two main interpretations which have not necessarily contradicted but have been reliant on each other. Whilst most scholars opt for the narrow and traditional sense of livelihoods, analysed in thematic terms such as economic, social, income, and food security (Neiland et al. 2000; Sarch & Allison 2001; Wedathanthrige et al. 2013; Yuerlita 2013; Temesgen et al. 2019), a different and more complex dimension has also been adopted where the contributions of SSF are often interdependent and interlinked, and some of their major contributions lie at the interface between these themes rather than within each other (Béné 2006; Béné et al. 2009; Béné & Friend 2011; Béné et al. 2015; Stanford et al. 2017). In challenging the traditional view of livelihoods, Béné (2006: 6) argues that, "the capacity of an activity to uplift people from poverty is not simply correlated to the absolute number of people depending upon this activity to sustain their livelihoods". For that reason, determining the impact of SSF on livelihoods is a complex issue. However, when taken in the traditional sense, the impact of SSF on livelihoods among fisherfolk in Norton can be easily described as direct and significantly linked to life and death.

The observations made in this study concur with the arguments made by most scholars who agree that comparatively, for developing countries, SSF enhance and promote livelihoods while in developed countries their contribution to livelihoods has been marginal (Neiland et al. 2000; Sarch & Allison 2001; Wedathanthrige et al. 2013; Yuerlita 2013). In Zimbabwe, as shown by the study in Norton, SSF are an important source of livelihood, giving people not only a source of income and food, but also safeguarding livelihoods in times of emergencies and contribute to economic and social safety nets. SSF have become a source of employment and income for many Norton households since the collapse of the Zimbabwean economy and the closure of industries. Observations from this study are therefore in line with Béné's (2006) arguments that in developing countries, SSF play extremely important economic and welfare functions at the local level in many areas. The positive results from Norton confirm that inland SSF can play a crucial role with respect to key development issues such as food security, poverty reduction, and pro-poor growth.

Small-scale fisheries such as those found in Norton are an important source towards achieving food security. This implies that, apart from providing incomes for the Norton fisherfolk community, fish is also used for domestic consumption and is an important source of proteins and other nutrients. This study is again in line with other studies in Africa where SSF have proved to be important socio-economically. In his study of Senegal and Bangladesh, Béné (2006), noticed that, through indirect and direct food security mechanisms, fisheries and related activities play an important role for the poorest communities who depend on them. Other studies have also reached the same conclusion, with notable examples being in Nigeria and Chad (Neiland et al. 2000; Sarch & Allison 2001).

Proceeds from fishing and fish related activities in Norton have also been used for diversification and investments in other projects such as poultry, farming, and cattle ranching. Some cooperatives were able to diversify into other economic activities, investing their incomes into such capital-intensive projects as housing projects and farming. For households with shortage of land and other factors of production, SSF play a crucial role as a source of food security and incomes (Neiland et al. 2000; Sarch & Allison 2001; Béné et al. 2010).

While in other areas SSF institutions have been appreciated in contributing positively to rural (political) development, gender equality and economic empowerment (Béné 2006; Béné et al. 2009; Béné & Friend 2011), the same cannot be said of Norton. This is because of the limited level of involvement of locals in decision making and policy change. The top-down centralised

governance system hinders such development. Besides, the nature of party-political power at play in Norton undermines the potential for any political development of individuals, let alone women, who in a patriarchal society are marginalised. Although gender related policies and issues of women emancipation are recognised in Zimbabwe, women are continuously sidelined in decision making positions. Such was the case in Norton SSF where community leadership and fish union chairpersons' positions were held by men.

8.4.2 Effects of current governance arrangements on livelihoods

While fishing activities in Norton are important for livelihoods, especially given the largely informal nature of the Zimbabwean economy presently, it is argued here that the existing top-down centralised governance system is having a negative impact on the SSF livelihoods. To this end, the observed creation of patronage systems and informal syndicates remove the potential for any equal access to the fisheries. Little kings and syndicate leaders indirectly influence operations, break laws, and disregard regulations through corruption, coercion, and intimidation. This result in benefits from fisheries resources not being channelled to the poor and ordinary fishers and fish workers.

Scholars emphasise the need for SSF to have secure tenure rights of the fishery resources that sustain their socio-cultural welfare, and their livelihoods (FAO 2015; Chuenpagdee 2018; Smith & Basurto 2019). Giving small-scale fishers rights over fishery resources, as has been happening indirectly in Norton, can allow them to exclude other users from accessing these resources, conferring the benefits of the fishery exclusively to only a section of small-scale fishers and the communities (FAO 2015). Ensuring equal access and usage of resources is key to the security needed in SSF and may in turn lead to more powerful economic and political capacities for all actors in SSF (Antonova 2016; Smith & Basurto 2019). The next section highlights the recommendations of the study and proposes changes or improvements to be effected on the existing governance structure.

8.5 RECOMMENDATIONS

This study adopts the view of change advocates who argue that it is crucial for policymakers and other governing actors to shift images about SSF from a group of deprived people needing support to recognising their capabilities, and potential in contributing to poverty reduction, and

food security (Chuenpagdee & Jentoft 2018; Chuenpagdee 2018). Borrowing from their viewpoint, this study suggests that Zimbabwe needs to adopt co-management models and how they could work as the governance strategy for SSF in Norton and Zimbabwe in general. Co-management in fisheries refers to the shared responsibility for resource management between the government and user groups (Jentoft 2007; Kooiman et al. 2008; Jentoft & Bavinck 2014). Currently, the involvement of other actors outside the government regime is limited to fishing, with no say over regulations, policy, or fisheries management.

Neo-liberal policies of decentralisation can ensure increased involvement of other actors in the management of fishery resources. Decentralisation is, by definition, a mechanism of empowerment and inclusion (Béné et al. 2009). The mechanism of inclusion is expected to lead to empowerment and pro-poor policies and outcomes (Béné et al. 2009; Lewins et al. 2014). Decentralisation policies advocate for self-governance, community-based governance, and active roles of non- state actors such as NGOs in the governance of fisheries, especially SSF. In support of the community-based management systems, the World Bank stated in 1992 that, "governments need to recognise that smaller organisational units, such as villages or pastoral associations, are better equipped to manage their own resources than are large authorities and may be a more effective basis for rural development and rational resource management than institutions imposed from the outside" (Bresnihan 2019: 210).

These neoliberal policies were adopted by some developing countries such as India, and Brazil, to mention but a few (Nunan et al. 2015; McGrath et al. 2015). In India for instance, informal councils known as (Tamil: *ur panchayats*) are known to comprehensively engage in self-governance by governing the fishing villages. These councils take charge of village affairs, including the management of fisheries, and the resolution of disputes (Bavinck & Vivekanandan 2017). While they have improved efficiencies in management, such neoliberal approaches have also eliminated problems such as corruption, nepotism, and poaching, through introducing a communal sense of ownership and, more importantly, responsibility. Despite some potential, central governance in management of natural resources has recently come under denunciation, following evidence of the recurrence of issues such as 'elite capture' (Be'ne' & Neiland 2004; Njaya et al. 2012) whereby particular individuals or groups (usually among the local elites and politically connected) usurp government power to serve their own interests, as is the case with Norton's little kings and fish syndicates.

The dominant view has been that the government dominated centralised governance arrangements have not been as effective as decentralised – more accommodating arrangements – in sustaining both the fisheries and the dependent livelihoods thereof (Frocklin et al. 2013; Neilsen 2004; Kosamu 2015; Chambers & Kokorsch 2017; Monaco & Soltanpour 2017; O'Neil 2018). Comparatively, fisheries in the More Economically Developed Countries where decentralised and inclusive governance arrangements have been made, livelihoods have better benefited than the SSF in the Less Economically Developed Countries where centralised, government-controlled governance arrangements are still intact (Neilsen 2004; Kosamu 2015). Decentralised arrangements have also been said to be of a greater advantage, especially where they incorporate traditional institutions in the managing of local SSF. Bavinck et al. (2015) argue that pre-modern organisations are relevant and adaptive to new challenges, and provide important lessons for regionalisation in the modern era. They contribute local knowledge, solve conflicts, and assist in regulating fishing, all of which work positively for the promotion of SSF livelihoods. The next section advocates for devolution of power and co-management in SSF in Zimbabwe.

8.5.1 Devolution of power

Given the above arguments, this study proposes the adoption of co-management system of fisheries governance. It has been argued that introducing co-management measures is easier in fisheries that already have a tradition of cooperative behaviour among groups of fishers, a description that fits the Norton SSF (Garza- Gil et al. 2020). Co-management decentralises decision making through devolution and delegation of authority, thereby empowering resource users. Of note, is that the Zimbabwean government is calling for devolution of powers to provinces and districts, which if the process is executed properly, is going to have far reaching advantages to local resource users. In the context of fisheries, devolution entails the shared management responsibilities between the government's agency in charge of fisheries (ZimParks) and the fishing communities or their representatives (Béné et al. 2009).

The Zimbabwe Constitution Amendment (No.20) Act 2013 provides the framework for devolution of governmental powers and responsibilities in Section 264 (Zinyama & Chimanikire 2019). Sub-section 1 of the constitution states that, "whenever appropriate, governmental powers and responsibilities must be devolved to provincial and metropolitan councils and local authorities to carry out these responsibilities efficiently and effectively".

One of the major objectives of devolution of the governmental powers, which can be beneficial to Norton community and other Zimbabwean communities, is the recognition of the right of communities to manage their own affairs and resources to further their development. It would be argued that the preconditions for successful devolution must be implemented in succession and with a clear delimitation of functions among the various levels of government (ZEPARU 2019). While progressive, some questions arise regarding how devolved economic management proceeds without a devolved political governance framework, considering the hierarchical system of the government (Zinyama & Chimanikire 2019).

Currently, decentralisation policies and initiatives are lacking in Norton SSF. Whether the agenda is for populism, the devolution initiatives put forward by the government, if fully implemented are going to empower the Norton SSF. Such devolution measures might as well call for decentralisation in the governance of SSF since centralised arrangements brought more questions than answers in solving the challenges faced by small-scale fishers in Zimbabwe. The next section calls for developing policy frameworks.

8.5.2 Enhancing or developing policy frameworks

The study recommends and calls for a fisheries policy in Zimbabwe. There is no stand-alone fisheries policy for SSF in the country and the fisheries regulations are often complex, overlapping, and confusing – regulated by different ministries and government departments. Therefore, there is need to formulate a dedicated policy for SSF in Zimbabwe. Small-scale fisheries in Norton and elsewhere in the country should be consulted and collaborate in the drafting and outlining of such a policy instrument. Empirical data from this study demonstrated that fishers also favour a co-management model for fisheries as well as the establishment of regulating mechanisms and monitoring compliance with fishing rules. It would be crucial to include fisher's role and participation as well as perceptions of the governance of the fisheries sector (Pollnac et al. 2018).

In adopting a co-management model, bottom-up approaches that embraces indigenous systems and grassroots contributions and participation in SFF should be encouraged. The role of government in monitoring the status quo would remain, but that meaningful stakeholder involvement and devolution of powers are considered in a reformed fisheries management process for Zimbabwe. Involvement of fishers in enforcement could be channelled into a regulated and organised system that works hand in hand with ZimParks enforcement officers.

This trend is also occurring in many African nations, including Senegal, Malawi, and Ghana (Pollnac et al. 2018).

8.5.3 Formalisation and acknowledgement of different small-scale fish sectors/ activities

There should be the formalisation and acknowledgement of different SSF sectors to enhance relations and SSF governance, improve accessibility to all, and promote equality among the different participants. Currently the government mostly gives financial support to agriculture and mining activities. Therefore, formalisation of the SSF sector in Zimbabwe would allow for greater attention to SSF as an important contributor to the economy of the country. Recognition of the sector further entails support in form of government grants, and loans with credit extensions. This would also afford many small-scale fishers access to financial opportunities to enhance their small-scale fishing businesses and activities.

In Zimbabwe, government support to the agricultural sector sees inputs such as seeds and fertilisers being made available to famers. This has been initiated through programs such as Command Agriculture²⁰, and Pfumvudza²¹. If such initiatives could be extended to SSF, their production efficiency and their local value chain provisions could be boosted. Constraints in terms of fishing gear and equipment, and lack of cold storage facilities mean that the current small-scale fishers and their activities are not fully maximised.

Formalisation of the SSF could also result in formalisation of their markets. Small-scale fishers do not have permanently stationed market stalls and permanent fish markets with proper infrastructure. Therefore, having permanent markets with good infrastructure means that fishers will be having a centralised marketing system and sell their fish at gazetted prices. Price controls and regulations would avoid price distortions, and as such, would not give comparative advantage to unregistered fishers to sell at lower prices by virtue of not paying taxes to the government. However, some fishers were wary of the need to pay taxes and levies once

²⁰ "Command agriculture is a Zimbabwean agricultural scheme aimed at ensuring food self-sufficiency that was introduced at the start of the 2016 - 2017 farming season following the drought of the previous season. The scheme was introduced as Zimbabwe struggled with economic problems" (Dube 2020: 1). ²¹" Pfumvudza is a crop production intensification approach under which farmers ensure the efficient use of resources (inputs and labour) on a small area of land in order to optimise its management" (FAO 2021: 2).

markets were formalised, which they emphasised meant parting with a considerable fraction of much needed income. Overall, if payment of taxes and payment terms are agreed upon between the government and SSF representatives, there would not be too many problems.

With formalisation of markets and fishing activities, there is potential for training and capacity building for local fishers. It would therefore benefit the sector if such support structures were put in place, which may extend from financial, and skills training, to sustainability and conservation considerations.

8.6 CONCLUSION

The aim of this chapter was to analyse and consolidate the empirical data that has unfolded from the research to highlight the key processes and mechanisms that are relevant for SSF governance in Zimbabwe. To do so, it has been essential to reflect on both practice and theory to determine the underlying factors that influence actors, institutions and governance processes, and their implications on livelihoods of SSF. The synopsis of the empirical evidence outlined in this chapter demonstrated that governance of SSF is complex, which entails that all governance processes (both formal and informal) are crucial in the management of fisheries in Norton and Zimbabwe.

The revised conceptual framework has illustrated key processes and actor actions and interactions in the SSF fisheries especially the informal arrangement which has largely been ignored and not recognised by the government in the decision-making processes. Informal fish actors such as syndicates and little kings played a larger role in the governance of SSF in Norton although they were not formally recognised by ZimParks. Processes and actions such as power dynamics, political coercion, intimidation, corruption, and negotiation were also visible and influential in the informal governance of SSF. To identify and extend on these systems in place, the updated conceptual framework building on the interactive governance approach was developed. The IG approach was used because it has been widely used in capture fisheries and aquaculture. The approach was used as a reference point to develop a conceptual framework suitable for SSF in Zimbabwe.

However, some of the challenges of the IG approach were that it mainly focusses on formal governance arrangements. The development of the updated conceptual framework was therefore meant to address such challenges and highlighted the informal governance

arrangements and power dynamics which also played an influential role in the governance of SSF in Norton. SSF are largely ignored in policy formulation despite their contribution to the livelihoods of the people. The study proposes the adoption of devolution systems of governance and a co-management model, which call for participatory roles between the government and small-scale fishers.

CHAPTER 9: CONCLUSION

9.1 INTRODUCTION

Sustainable fisheries require effective governance and strong management (Bundy et al. 2017). Yet SSF often lack formal institutional capacity, which impedes effective governance (Alexander et al. 2018; Lindkvist et al. 2020). However, mainstream social science work on fisheries focuses extensively on examining the livelihoods dimension of this sector and pays limited attention to how power dynamics and governance arrangements shape livelihood patterns in the SSF sector.

The SSF sector in Zimbabwe has been marred by mis-governance and the existence of a poor, fragmented, regulation framework that has resulted in a lack of access for several fishing communities, which consequently has threatened livelihoods (Mawere et al. 2014; Chisango 2017). It is therefore, assumed that a careful assessment of fisher's attitudes, and perceptions concerning fisheries governance in a complex socio-political context may assist in efforts to modify or establish evolving fisheries governance systems (Pollnac et al. 2018).

The aim of this study was to contribute to understanding the complexity of governance arrangements by developing a conceptual framework based on empirical research to better understand the different role players involved in Norton SSF, institutions and legislations which govern them, and how these regulations impact on the livelihoods of the Norton fisherfolk community. To achieve this, the study focussed on SSF in Norton, Zimbabwe, a sector which has been given very limited attention in scholarship. The findings from the study provide an opportunity to explore the dynamic, complex, and in some cases, overlapping actions and interactions between formal and informal fisheries as well as the various governance processes. Although the study's focus was on SSF in Zimbabwe, there is capacity for it to have broader applicability.

Fisheries governance is mainly oriented towards large scale fisheries in many countries of the world and this, in turn, undermines the sustainability of SSF (Chuenpagdee 2018). However, transformation in SSF governance is taking place in various places around the world, making it possible for a better future (Jentoft & Chuenpagdee 2018; Pita et al. 2019).

There has been a general shift in fishery governance in the world from centralised governance systems to decentralised approach, especially in global North countries. They followed the neoliberal policies of the 1970s and 1980s which calls for decentralisation initiatives (Gupta et al. 2015; Bednar & Henstra 2018; Bresnihan 2019). However, such change has not been very prominent in the global South countries including Zimbabwe. The country is still running a centralised (formal), top-down, and non-participatory system of fishery governance (Mawere et al. 2014; Chisango 2017).

The complex, overlapping, and fragmented institutional arrangements imposed as a result of a centralised fisheries governance system have resulted in power dynamics and conflicts between the government agency (ZimParks), and fishers. Conflicts also erupted among fishers because of factors such as theft of fishing nets. Poaching as one of the major processes in Zimbabwean fisheries also emerged because of the different legislations which had a major bearing on the livelihoods of the small-scale fishers. These various governance arrangements and processes were highlighted in chapter seven and chapter eight. The continuous challenges faced by fishers highlight the importance of instituting an integrated SSF policy which recognise the capabilities of SSF as partners and stakeholders in policy formulation. There is no stand-alone policy for SSF in Zimbabwe. Therefore, this study is also crucial in contributing to SSF policy in the country.

9.2 OVERVIEW OF THE STUDY

The overall aim of this study was to develop a conceptual framework for understanding governance arrangements as well as its associated power dynamics and their implications to livelihoods of SSF in Zimbabwe. To do so, the research sought to answer the following research questions: (i) who are the actors involved in SSF in Norton?; (ii) what are the current governance arrangements within the SSF sector in Norton?; (iii) what are the existing formal or informal institutional arrangements that govern SSF in Norton?; (iv) what are the contestations, agreements, and achievements in the small-scale fishing industry in Norton and its impact on livelihoods and governance of resources?; and (v) how can a conceptual framework for analysing governance in SSF in Zimbabwe be developed?

The conceptual foundation of this study was informed by the IG approach. The study borrowed the notion of interaction of governance actors and processes in SSF and expanded on the concept of informalities which are absent in the IG approach. The study further demonstrated

that there was an overlap between formal and informal fisheries arrangements in Norton, Zimbabwe. After an investigation of both formal and informal governance arrangement, the study concluded that, although not recognised, SSF in Norton were dominated by informal arrangements. Furthermore, this study analysed power dynamics which were existent in the Norton SSF but absent on the interactive governance model. This dynamic therefore contributed to the development of the conceptual framework which encompassed various processes and interactions which were active in the SSF. The study adopted a grounded theory approach, and qualitative methods for data collection were employed. Grounded theory was crucial in interpreting the livelihoods of SSF, and to enable the participants 'to speak for themselves' through data. Data collection and analysis was conducted through an iterative process.

Grounded theory was complemented by qualitative research methods to conduct empirical research. Building rapport with both formal and informal fishers was influenced by qualitative research techniques such as informal conversations. Without trust, this research would not have been successful because of sensitivity of governance related issues in Zimbabwe. The choice of Norton as a case study for this research was made because of the abundance of fisheries resources from the twin lakes; Chivero and Manyame. Qualitative research techniques further enabled a careful examination of fishers' attitudes, and perceptions which existed in a complex governance arrangement. In addition to primary data, the study further employed secondary data, which included government policy documents on fisheries related issues, and newspapers. An analysis on governance discourses and literature, supported by empirical data, was crucial in contributing to policy formulation and the development of the conceptual framework.

9.3 RESEARCH RESULTS: A REFLECTION ON SMALL-SCALE FISHERIES GOVERNANCE.

This study aimed to investigate, document and analyse how governance and power relations in SSF shape fisheries' livelihoods and how in turn livelihood activities impact on governance. Understanding the various formal and informal governance processes and interactions in Norton was demonstrated by the development of a conceptual framework. This conceptual framework was crucial in informing the recommended policy formulations for Zimbabwe SSF since it highlighted the various actors and processes present in SSF. The contribution of the framework is summarised below.

The conceptual framework (Figure 8.1, chapter eight) used interactive governance framework as a reference point because it focuses on understanding the governability of societal systems. The conceptual framework, therefore, used empirical evidence from Norton to indicate the various actors and governance processes (both formal and informal), which are active in SSF and their implications to livelihoods.

The study demonstrated that fishing is a source of livelihoods that is regarded as a 'right' irrespective of formal laws in Zimbabwe. However, one needs to understand the context in which fishing became the main source of livelihoods or economic activity in Norton. The economic meltdown in post-2000 Zimbabwe led to the collapse of formal industries. This resulted in unemployment and loss of incomes to the large spectrum of the Zimbabwean population. The economic collapse was linked to government policies, especially the radical redistribution of access rights in form of FTLRP. Radical redistribution also occurred in the fisheries sector. Whilst the government's intention to give access rights to the formally disadvantaged black fishers in form of cooperatives was a positive and welcome initiative on paper, major beneficiaries of such initiatives were few politically connected people. Such black empowerment policies would have been more fruitful if the general Zimbabwean populace benefitted from it regardless of political party affiliation or any government connections. Cooperative model became a major tool for ZANU-PF government induced patronage system to gain votes during election seasons since cooperative membership was mainly done through party membership. Access and utilisation of the fish resources was therefore used for political mileage.

The FTLRP was hurriedly done by the government and there was no proper planning in implementation of the programme (Mawere et al. 2014). Although a debatable issue to date, major beneficiaries of the FTLRP were few, powerful, ruling party connected people. Ordinary Zimbabwean citizens were allocated in areas with unfertile soils that also receive little to no rainfall in most parts of the year. Such processes also applied in the fisheries sector where cooperative membership was based on partisan lines, and where political coercion and intimidation was the order of the day.

Therefore, the historical processes and initiatives in form of FTLRP had an impetus in the fisheries sector which in turn had implications on the livelihoods of the community. The community was engaged in fishing in Norton because it was the main source of their livelihoods. Although the laws and regulations instituted by the ZimParks (such as the Parks

and Wildlife Act (Chapter 20,14 of 1996)) were meant to control fishing access in the protected areas of Lake Manyame and Lake Chivero and avoid issues related to overfishing, the regulations and permit fees were not affordable to many ordinary fishers. Failure to pay permit fees was also largely driven by the economic meltdown of the country where the economy is largely driven by informal actors and players.

In terms of policy, the government is regulating fisheries in a non-participatory, centralised (formal), top-down approach. The regulations are complex, overlapping, and often confusing since they are regulated by different ministries. The confusion and exorbitant permit fees pushed the fishers to engage in informal fishing, which is also referred to as poaching. Other fishers also took part in poaching because they felt that they were entitled to benefit from accessing the fish by virtue of their customary rights as the indigenous people of the area. As such, it is evident that the practice was termed poaching by formal government regulators while a large spectrum of the Norton community felt that they had the right to access the fish without permits. The hierarchical approach was not effective because of several reasons including its failure to include customary rights in policy formulation, and corruption and bribery between ZimParks rangers and fishers. It is also difficult to run an effective centralised governance system in a country like Zimbabwe where the state is underfunded to provide security to the lakes and do thorough monitoring and evaluation on ZimParks officials. The ailing economy further pushed the people to solely depend on fishing as the major source of livelihood activity. As such, there was pressure on fishing as there was no diversity in terms of income provision from other industries.

Because of weak structural arrangements in the formal fishing, there was an overlap between formal and informal governance arrangement. Poaching as a process was happening in both formal and informal fishing arrangements as demonstrated in the conceptual framework (Figure 8.1). Informal fishing dominates the SSF because of weak centralised institutions and the nature of the economy, which is largely driven by informal players.

The Norton SSF comprised of direct and indirect actors. Direct actors included individual fishers, poachers (*fish bongas*), and cooperatives. This categorisation was done according to the level of involvement in the day-to-day fishing activities. Indirect actors/service providers were established by the study as those who provide different services to direct participants, such as food providers, boat repairers, and Union groups. However, the study observed that actors in Norton do not have clear-cut roles as the above categorisation seems to suggest. In

some cases, actors assumed double or even multiple roles. In some instances, members of cooperatives also acted as individual fishers and some individuals who at some point had fishing permits, would fail to purchase permits, and become poachers.

There is no shared responsibility in resource management between government and fisherfolk actors in Norton. The relationship which exists between the two entities is of command and control whereby ZimParks, as the government agency, acts as a regulator and controller of all fishery activities while the fisherfolk community acts as subjects to the law with no power in policy and decision making. The study observed that the government commands fisheries and governance activities in Norton such that other potential stakeholders' involvement relied on its willpower. NGOs are not visible in the governance arrangements of SSF. The strained relations between government and NGOs escalated after the controversial FTLRP. There are no partnership arrangements as governing interaction modes between government, small-scale fishers and NGOs.

Power dynamics in the fisheries resulted in conflicts between ZimParks and fishers and intraconflicts within cooperatives and between fishers. Conflicts stemmed from various factors, including bribes and theft of fishing nets. Conflicts resulted in the emergence of powerful elements in the form of syndicates. These syndicates became very powerful informal governance in Norton SSF and are indirectly controlling the fishing operations in terms of joining membership and percentage determination in terms of payment. Payment is done in form of cash or fish catch. Although informal, some powerful government officials are involved in these syndicates.

Some members of syndicates became more powerful than others by virtue of controlling some fishing areas. Others controlled fishing boats and renting them to the have nots. Owning of boats and controlling of fishing areas gave them a sense of entitlement. This concentration of power in the hands of the few politically connected individuals led to the emergency of 'powerful elites' who are also regarded as 'little kings'. These powerful individuals were involved in 'elite capture' of the fish resources. Therefore, although not recognised by government, informal governance arrangements dominated the Norton SSF. It can be argued that government is aware of these informal arrangements but because it is benefitting politically, it chooses to give minimal attention. The government only intervened when the situation spiralled out of control, and when the ruling party was not directly or indirectly benefiting from the process. This state control process is what has been referred to by Roitman

(2005) as an irregular process, or rather an irregular economy, when a state chose when to intervene and not to intervene.

9.4 CONCLUDING REMARKS

This study's main aim was to develop a conceptual framework to better understand the governance arrangements and their implications to livelihoods of SSF in the Norton community, Zimbabwe. Understanding the country's background and the various governance processes is also crucial in determining and investigating the current governance arrangements and their implications on livelihoods. Some governance policies are as a result of the underlying historical legacies and policy transformations. Although the framework is based on the Norton SSF, it might have broader applicability for SSF with similar circumstances nationally and internationally. More so, the framework can be applied to other natural resource sectors such as small-scale mining, which also play a pivotal role in sustaining the livelihoods of impoverished Zimbabwean communities.

The study calls for the recognition of small-scale fishers in policy making, poverty reduction, and food security. Zimbabwe need to collaborate and engage small-scale fishers in a comanagement, stakeholder participatory process to understand their concerns and suggestions which suit their customary rights, historical processes, and governance arrangements contexts.

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APPENDIX A: PROFILES OF INTERVIEWED STAKEHOLDERS

Table A.1: Profile of Cooperative Member Respondents

Method of Data Collection	Field Site	Organisation Represented	Name/ Respondent Identity	Age	Sex	Total	
Concetion		Mambokadzi	Al	27	F		
		Cooperative	A2	32	M	14	
			A3	26	F	-	
			A4	21	M		
		Mbuya Nehanda	B1	39	F		
		Cooperative	B2	22	F		
			В3	36	F	46555	
			B4	30	M	6	
			B5	41	M		
			В6	37	M		
		Blue Star	C1	44	F		
		Cooperative	C2	19	M	1	
	Lake		C3	23	M	5	
EOGHA	Manyame		C4	28	M	1	
FOCUS			C5	35	F	1	
GROUP DISCUSSIONS		Two Sunrise	D1	45	M		
DISCUSSIONS		Cooperative	D2	42	F	4	
			D3	27	M		
			D4	31	M		
		Three Sunrise	E1	27	M		
			E2	33	M		
			E3	24	M	5	
			E4	36	F		
			E5	29	F		
		Sydney	F1	27	F	5	
		Cooperative	F2	19	M		
			F3	35	M		
			F4	46	M		
			F5	28	M		
		Sonset Free	G1	39	M	4	
		Fishing	G2	30	M		
	Lake	Cooperative	G3	36	M		
	Chivero		G4	28	M		
		Environmental	H1	41	M	4	
		Care Fishing	H2	46	M		
		Cooperative	Н3	45	M		
			H4	27	M		
		Tempascon	I1	38	M	3	
		Cooperative	I2	22	M		
			13	20	M		

Table A.2: Profile of Fish Trader Respondents

Method of Data Collection	Field Site	Organisation Represented	Name/ Respondent Identity	Age	Sex	Total	
			FT1	53	F		
			FT2	47	M		
	Katanga		FT3	27	F		
			FT4	33	F		
			FT5	41	F		
			FT6	39	M		
			FT7	51	M		
			FT8	27	F		
		No	FT9	31	F		
		Organisation	FT10	46	F	19	
		Represented	FT11	24	F		
		(Representing	FT12	37	F	-	
	Lake	self)	FT13	34	F		
CEMI	Manyame		FT14	36	F		
SEMI-			FT15	41	F		
STRUCTURED			FT16	45	F		
INTERVIEWS			FT17	42	F		
INTERVIEWS			FT18		F		
AND INFORMAL			FT19	27	F		
CONVERSATIONS			FT20	23	F		
CONVERSITIONS	White		FT21	36	F	_	
			FT22	29	F		
			FT23	27	F		
	House		FT24	45	M		
			FT25	56	F		
			FT26	48	M		
			FT27	31	F		
			FT28	43	F]	
	Lake		FT29	28	F	17	
	Chivero		FT30	33	F		
			FT31	47	F		
			FT32	51	M]	
			FT33	34	M]	
			FT34	26	F		
			FT35	44	F		
			FT36	41	F		

Table A.3: Profile of individual fisher respondents

Method of Data	Field Site	Name/	Age	Sex	Total
Collection		Respondent			
		Identity			
		IF1	36	M	4
	Katanga (Lake	IF2	42	M	
	Manyame)	IF3	27	M	
SEMI-		IF4	38	F	
STRUCTURED		IF5	31	M	6
INTERVIEWS		IF6	42	M	
AND INFORMAL	White House	IF7	36	M	
CONVERSATIONS	(Lake Chivero)	IF8	33	F	
		IF9	28	M	
		IF10	44	M	

Source: Field survey 2021

Table A.4: Profile of Poacher Respondents

Method of Data Collection Used	Field Site	Name/ Identity of Respondent	Age	Sex	Total
	Lake Manyame	P1	44	M	
		P2	39	M	
		Р3	28	M	
		P4	41	M	
	Katanga	P5	47	M	9
SEMI-		P6	37	M	9
STRUCTURED		P7	33	M	
INTERVIEWS	P8	41	F		
AND INFORMAL		P9	32	M	
CONVERSATIONS	Lake Chivero	P10	38	M	
		P11	40	M	
		P12	29	M	
		P13	32	M	8
		P14	21	M	
	White House	P15	43	M	
		P16	36	M	
		P17	34	M	

Table A.5: Profile of key informant respondents

Data	Field Site	Name/Identity	Organisation/	Age	Sex	Total
Collection		of Respondent	Department			
Method			Represented			
	Lake	KI/1	Community	40	M	
	Manyame		Leader-Katanga			
	Lake	KI/2	Lake Chivero	55	M	
	Chivero		Fisheries Union			
INDEPTH,	Lake	KI/3	ZimParks-	54	M	10
INDIVIDUAL	Manyame		Manyame			
INTERVIEWS	Lake	KI/4	ZimParks-	45	F	
	Chivero		Chivero			
	Lake	KI/5	Lake Manyame	50	M	
	Manyame		Fisheries Union			
	Lake	KI/6	Ministry of SME	40	M	
	Chivero					
		KI/7	Fish Association	43	M	
	Telephonic/		Chairperson			
	Virtual	KI/8	EMA	38	M	
	Interviews	KI/9	City of Harare	41	F	
		KI/10	Fisheries	43	M	
			Department			

APPENDIX B: INTERVIEW GUIDE FOR INDIVIDUAL RESPONDENTS

Interview guide B.1: Fishers, fishmongers, fish poachers

Da	te of Interview
Int	erviewee's Name
Pla	ce of Interview (community name)
1.	Background Information of Interviewee Age Employment Place of Birth Gender Educational background Size of household
2.	How long have you been fishing in Norton?
3.	Explain any customary laws which were there before the advent of statutory laws (fishing practices; tenure, and territorial use and access rights to the Lakes etc)?
4.	Are the customary laws currently practised?
5.	Describe the fishing gear?
6.	Describe fishing in Norton - fishing practices, access rights to the Lakes, selling and distribution of fish etc.?
7.	Describe fishing after Independence, including for instance effects of Land reform and indigenisation policies on the fishing communities?

8.	(Statutory laws)?
9.	Mention the recommended fishing gear?
10.	What type of fishing permits are you entitled to have?
11.	What's the validity of the permits? If any (daily, monthly, annually, etc.)
12.	Do you have different types of permits e.g fishing permits, retail permits or wholesale permits, etc.?
13.	Do you pay taxes for fishing or retailing?
14.	What type of fines are you expected to pay if you are caught on the wrong side of the law?
15.	What are the current fish catch limits?
	What is your opinion with regards to legislations, policies, taxes, fines, etc.?
17.	What is the effect of these policies on your livelihoods?
- / •	
18.	What other challenges do you face?
19.	How do you mitigate these challenges? (Payment of bribes to access the Lakes etc. if any)
20. 20.	Are you a member of any cooperative group or fish organisation?

21.	Are there any ministries that promote small-scale fishing in your community?
22.	Are there N.G.O s or other organisations that promote small-scale fishing?
22	
23.	What is the influence of community representatives/ traditional leadership in the governance of SSF?
24.	Are they recognised?
	What type of assistance do these various stakeholders offer to promote small-scale fisheries?
26.	How do you receive information on fishing access and fishing rights?
27.	How would you describe the relationship between the government department/ministries, NGOs (if any) and the community?
28.	In your opinion what can be done to enhance the small-scale fisheries sector in your community?
29.	Would you like to make any other comments about small-scale fisheries?

	Interview guide B.2: Fisher community representatives/ leadership
Da	ate of Interview
Inte	erviewee's Name
Pla	ce of Interview (community name)
1.	Tell me about yourself:
•	Age
•	Employment
•	Place of birth
2.	Are you involved in the governance of SSF in Norton?
3.	Who are the other actors involved in the governance of SSF, If
	any?
4.	What governance arrangements are in existence in Norton fishing community?
5.	Describe the fishing in Norton- fishing practices, access rights to the Lakes, selling and distribution of fish etc?
6.	If you play a part in the governance of SSF, what system of rulemaking do you use?
6.1	Do you use customary laws, or Statutory laws, or both?
7.	Do you experience any power struggles in the governance/ management of SSF?
8.	What could be the cause of those power struggles?
9.	Describe your biggest challenges in administering a fishing
	community?

	vision'								
12.								toward	
12.	Do you	ı have a v	vision for t	he future	of the small-	scale fis	shing sector	in your comn	nunity?
	l Enviro	Economonmentall	nically? So	ocially?					
11.	How d	o you thi	nk the sm	all-scale f	fishing secto	r is mak	ing contribu	utions to the	
10.	•••••			• • • • • • • • • • • • • • • • • • • •					

Interview guide B.3: Government departments/ ministry officials (ZimParks, EMA)

1. Tell me about yourself:

•	Name
•	Age
•	Employment
2.	What is the mandate of your department/ministry?
3.	Could you explain the problems faced by the Norton fishing community?
4.	What is your department/ministry's primary role in the regulation of the small-scal
	fisheries sector?
5.	What problems do you encounter as department/ ministry when planning for ways to govern/ manage small scale fisheries sector?
6.	How have you involved other departments/ ministries in your efforts to assist the
	Norton fishing community?
1.	Are there any national, provincial, or local policies/strategies that your department/
	ministry uses to inform its decisions on the governance/ management of natural resources such as small-scale fisheries?
1.1	How or when do you draw on these documents?

7.	Tell me more about the community involvement in the use and management of small-
	scale fisheries in Norton?
8.	What is your department's position in terms of considering small-scale fisheries as a
	livelihood and poverty reduction strategy?
9.	In your own opinion, how important are small-scale fisheries to the Norton fishing
	community?
10.	What advice should be given to the community for them to benefit fully from access
	and utilisation of fish?
Int	erview guide B.4: Fisheries management
11.	Does the Department have a management plan for small-scale fisheries? If so, how was
	it developed?
12.	Are fishers involved in fisheries planning? Do you think they should be involved?

13.	How is the department/ministry involved (or should be involved) in fisheries planning?
14.	What type of fishing licenses do you offer to fishers?
15.	Do you have catch limits?
16.	What harvest quotas do you give to fishers?
17.	What management instruments are you using to curb overfishing?
18.	Do you also use Individual Transferable Quota (ITQ) to curb overfishing?
19.	Do you also offer area access to fishers e.g Territorial Use Rights for Fishing (TURFs)
20.	What other means of granting access to fishery resources do you have in place?
21.	Are your regulations embodied in the FAO code of conduct for responsible fishing?
22.	Do your fishery policies abide by the SADC Protocol on Fisheries (2001)?

23.	Do you also involve fisher representatives/leadership in the management of small-scale
	fisheries (SSF)?
24.	Are cooperatives involved in the management of SSF as well?
25.	How is policy created by the Division? Who is involved?
26.	Who enforces fisheries policies? How?
27.	How involved has the department/ministry been towards fishery issues?
28.	How has the department/ministry improved the lives of fishers and the community?
_ 0.	now has the department manistry improved the fives of fishers and the community.
20	De la calacter de la companya de la
29.	Do you work with other stakeholders such as NGOs in the management of SSF?

APPENDIX C: INTERVIEW GUIDE FOR FOCUS GROUP DISCUSSION (COOPERATIVES).

Mo	derator:	Interviewee ID:
Cor	nmunity:	Field Site:
Dat	e and Time of FGD:	FGD No:
Tin	ne started:	Time ended:
<u>Par</u>	ticipants: fishers	
FG]	D Guide Questions:	
Per	sonal information:	
1.	Introductions	
2.	Let's talk about our positions in the coopera	ative/organisation, if any?
3.	Let's talk about the reasons why we join the	e cooperative?
4.	What are the benefits to the members?	
5.	Let's talk about the history of the fish circumstances)?	er's group/cooperative (first established,

6.	Why did the group/ cooperative start OR Why was there a need to start the group?
7.	Let's talk about the goals and objectives of the cooperative?
8.	What are the criteria for membership?
9.	What are the requirements for one to be a member?
	Rules:
10.	Let's talk about the constitution of the cooperative. Do we have a constitution and what does it entail?
11.	Were you part of the rulemaking process?
12.	What are the penalties if members break the rules?
13.	How are the rules enforced?
14.	Why are you in/not in agreement with the rules?

15.	Does the government have a bearing in the drafting of your constitution?
16.	Are you aligned to the government, or you are independent?
17.	How are members appointed in positions?
18.	How are meetings conducted?
19.	Benefits of the cooperative?
20.	Let's talk about the structure of the cooperative.
21.	Who does the cooperative/ organization report to?
	How long have you been members?
24.	What form of support does the cooperative acquire from the government?
25.	Do you also get support from other stakeholders such as NGOs or any other non- state actors?

Relationship between cooperative members

26.	Let's talk about the problems being faced by the group.
27.	Would you say your members are cooperative?
28.	What other challenges are faced by the cooperative?
29.	Do you trust the members?
30.	Do you like the direction in which the group/cooperative is going? Why?
31.	What are some of the changes you would like to see?
32.	Why do you think more fishers are not members?
33.	How do you see the future of the cooperative?
	Thank you for participating.

APPENDIX D: OBSERVATION GUIDE

Typical participant observation activities in this research include:

- Attend community meetings
- Attend cooperative meetings
- participating in and observing the informal activities of local fisher representatives
- observing private meetings held by fisher representatives and cooperatives along the Lakes
- observing daily community life
- observing fishing practices along the 2 Lakes
- spontaneously meeting, and speaking with people on the fish markets, or along the
 Lakes
- buying fish at fish markets

These activities will be done to observe issues which include:

- 1. Who are the actors involved in small-scale fishing (SSF) in Norton?
- 2. Is the government and other stakeholders such as NGOs involved in SSF?
- 3. Who are the actors within the fisher community?
- 4. Are there any power asymmetries between actors within the fisher community?
- 5. Are there any power dynamics between the fishing community and other stakeholders such as government and its enforcement apparatus?
- 6. Observing how fishers access the Lakes?
- 7. Is it an open access? If not
- 8. Are the fishers abided by the access laws set by the government?
- 9. What enforcement measures used by the government?
- 10. What strategies used by the fishers to access the Lakes informally?
- 11. What type of fishing gear is used by the fishers?
- 12. Are there any customary fishing practises?
- 13. What is preferred by the fishers?
- 14. What are other access methods and access rights utilised by the fishermen?

- 15. What is the role of fisher community representatives/leadership?
- 16. What is the role of fish cooperatives in the management of small-scale fisheries?
- 17. What are the existing relations between individual fishers and cooperatives?
- 18. What are the existing relations amongst all various stakeholders which includes individual fishermen, cooperatives and government?
- 19. What are the existing interactions between the stakeholders and the environment?
- 20. What is the dominant governance arrangement in place?

APPENDIX E: INFORMED CONSENT FORM



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STELLENBOSCH UNIVERSITY CONSENT TO PARTICIPATE IN RESEARCH

Dear Participant

My name is Tawanda Jimu and I am a PhD student in the department of Geography and Environmental studies at Stellenbosch University. I would like to invite you to participate in a research project entitled Towards a conceptual framework for the analysis of governance arrangements and livelihoods of small-scale fisheries in Norton, Zimbabwe

Please take some time to read the information presented here, which will explain the details of this project and contact me if you require further explanation or clarification of any aspect of the study. Also, your participation is **entirely voluntary**, and you are free to decline to participate. If you say no, this will not affect you negatively in any way whatsoever. You are also free to withdraw from the study at any point, even if you do agree to take part.

The study is about governance/ management of small-scale fisheries in Zimbabwe using Norton as a case study. Norton is a fish resource- rich community surrounded by Lake Chivero and Lake Manyame. However, despite the availability of the fish, small -scale fishing is not a formally recognised sector in Zimbabwe. This study intends to contribute to policy recommendations which promote small-scale fishing as a formally recognised sector.

If you have any questions or concerns about the research, please feel free to contact Tawanda Jimu at $\underline{23438630@sun.ac.za}$; +27746854539

Research supervisors: Dr Samantha Williams at $\underline{samantha williams@sun.ac.za}$; +27218084975 and Dr Manfred Spocter at $\underline{mspocter@sun.ac.za}$; +2721 808 3095

RIGHTS OF RESEARCH PARTICIPANTS: You may withdraw your consent at any time and discontinue participation without penalty. You are not waiving any legal claims, rights, or remedies because of your participation in this research study. If you have questions regarding your rights as a research participant, contact Ms Maléne Fouché [mfouche@sun.ac.za; 021 808 4622] at the Division for Research Development.

You have right to receive a copy of the Information and Consent form.

If you are willing to participate in this study, please sign the attached Declaration of Consent

DECLARATION BY PARTICIPANT

By signing below, I		agree to	take	part	in a	research	study
entitled	and conducted by (Nam	e of Resear	cher)				

I declare that:

- I have read the attached information leaflet and it is written in a language with which I am fluent and comfortable.
- I have had a chance to ask questions and all my questions have been adequately answered.
- I understand that taking part in this study is **voluntary** and I have not been pressurised to take part.
- I may choose to leave the study at any time and will not be penalised or prejudiced in any way.
- I may be asked to leave the study before it has finished, if the researcher feels it is in my best interests, or if I do not follow the study plan, as agreed to.
- All issues related to privacy and the confidentiality and use of the information I provide have been explained to my satisfaction.

Signed on
Signature of participant
SIGNATURE OF INVESTIGATOR
I declare that I explained the information given in this document to [name of
the participant] [He/she] was encouraged and given ample time to ask me any questions. This
conversation was conducted in [Afrikaans/*English/*Xhosa/*Other] and [no translator was used/this
conversation was translated into by].

APPENDIX F: ETHICAL CLEARANCE



NOTICE OF APPROVAL

REC: SBER - Amendment Form 25 November 2020

Project number: 10583

Project Title: Towards a conceptual framework for the analysis of governance arrangements and livelihoods of

small-scale fisheries in Norton, Zimbabwe

Dear Mr Tawanda Jimu

Your REC: SBER - Amendment Form submitted on 16 October 2020 was reviewed and approved by the REC:

Social, Behavioural and Education Research (REC: SBE).

Please note below expiration date of this approved submission:

Ethics approval period:

Protocolapproval date (Humanities)	Protocol expiration date (Humanities)
13May 2020	12 May 2023

GENERAL REC COMMENTS PERTAINING

TO THIS PROJECT: INVESTIGATOR

RESPONSIBILITIES

Please take note of the General Investigator Responsibilities attached to this letter. You may commence with your research after complying fully with these guidelines.

If the researcher deviates in any way from the proposal approved by the REC: SBE, the researcher must notify the REC of these changes.

Please use your SU project number (10583) on any documents or correspondence with the REC concerning your project.

Please note that the REC has the prerogative and authority to ask further questions, seek additional information, require further modifications, or monitor the conduct of your research and the consent process.

CONTINUATION OF PROJECTS AFTER REC APPROVAL PERIOD

You are required to submit a progress report to the REC: SBE before the approval period has expired if a continuation of ethics approval is required. The Committee will then consider the continuation of the project for a further year (if necessary).

Once you have completed your research, you are required to submit a final report to the REC: SBE for review.

Included Documents:

Document Type	File Name	Date	Version
Default	PhDBudget COVID 19	14/10/2020	docx
Default	COVID 19 Risk Mitigation Strategy	15/10/2020	docx
Research Protocol/Proposal	JimuPhD proposal FASS Covid 19	15/10/2020	docx
Default	COVID 19 Contact register pdf	15/10/2020	pdf
Default	Motivation to conduct in-person research COVID-19 final	15/10/2020	docx

If you have any questions or need further help, please contact the REC office atcgraham@sun.ac.za. Sincerely,

Clarissa Graham

REC Coordinator: Research Ethics Committee: Social, Behavioral and Education Research

National Health Research Ethics Committee (NHREC) registration number: REC-050411-032.

The Research Ethics Committee: Social, Behavioural and Education Research complies with the SA National Health Act

No.61 2003 as it pertains to health research. In addition, this committee abides by the ethical norms and principles for

research established by the Declaration of Helsinki (2013) and the Department of Health Guidelines for Ethical Research:

Principles Structures and Processes (2nd Ed.) 2015. Annually a number of projects may be selected randomly for an

external audit.

Principal Investigator Responsibilities

Protection of Human Research Participants

As soon as Research Ethics Committee approval is confirmed by the REC, the principal investigator (PI) is responsible for the following:

Conducting the Research: The PI is responsible for making sure that the research is conducted according to the REC-approved research protocol. The PI is jointly responsible for the conduct of co-investigators and any research staff involved with this research. The PI must ensure that the research is conducted according to the recognised standards of their research field/discipline and according to the principles and standards of ethical research and responsible research conduct.

Participant Enrolment: The PI may not recruit or enrol participants unless the protocol for recruitment is approved by the REC. Recruitment and data collection activities must cease after the expiration date of REC approval. All recruitment materials must be approved by the REC prior to their use.

Informed Consent: The PI is responsible for obtaining and documenting affirmative informed consent using **only** the REC-approved consent documents/process, and for ensuring that no participants are involved in research prior to obtaining their affirmative informed consent. The PI must give all participants copies of the signed informed consent documents, where required. The PI must keep the originals in a secured, REC-approved location for at least five (5) years after the research is complete.

Continuing Review: The REC must review and approve all REC-approved research proposals at intervals appropriate to the degree of risk but not less than once per year. There is **no grace period.** Prior to the date on which the REC approval of the research expires, **it is the** PI's **responsibility to submit the progress report in a timely fashion to ensure a lapse in REC approval does not occur.** Once REC approval of your research lapses, all research activities must cease, and contact must be made with the REC immediately.

Amendments and Changes: Any planned changes to any aspect of the research (such as research design, procedures, participant population, informed consent document, instruments, surveys or recruiting material, etc.), must be submitted to the REC for review and approval before implementation. Amendments may not be initiated without first obtaining written REC approval. The **only exception** is when it is necessary to eliminate apparent immediate hazards to participants and the REC should be immediately informed of this necessity.

Adverse or Unanticipated Events: Any serious adverse events, participant complaints, and all unanticipated problems that involve risks to participants or others, as well as any research-related injuries, occurring at this institution or at other performance sites must be reported to the REC within **five (5) days** of discovery of the incident. The PI must also report any instances of serious or continuing problems, or non-compliance with the RECs requirements for protecting human research participants.

Research Record Keeping: The PI must keep the following research-related records, at a minimum, in a secure location for a minimum of five years: the REC approved research proposal and all amendments; all informed consent documents; recruiting materials; continuing review reports; adverse or unanticipated events; and all correspondence and approvals from the REC.

Provision of Counselling or emergency support: When a dedicated counsellor or a psychologist provides support to a participant without prior REC review and approval, to the extent permitted by law, such activities will not be recognised as research nor the data used in support of research. Such cases should be indicated in the progress report or final report.

Final reports: When the research is completed (no further participant enrolment, interactions or interventions), the PI must submit a Final Report to the REC to close the study.

On-Site Evaluations, Inspections, or Audits: If the researcher is notified that the research will be reviewed or audited by the sponsor or any other external agency or any internal group, the PI must inform the REC immediately of the impending audit/evaluation.

APPENDIX G: INTRODUCTORY LETTER FROM STELLENBOSCH UNIVERSITY



The Director General Parks and Wildlife Management Authority P.O Box CY 140 Causeway Harare

Dear Sir / Madam

RE: LETTER OF CONFIRMATION FOR MNR TAWANDA JIMU

This is to certify that:

- 1. Mr Tawanda Jimu (Passport no: BN823859) is registered for a PhD (Geography and Environmental) in a full-time capacity at Stellenbosch University, South Africa (student number: 23438630).
- 2. Mr Jimu is also a recipient of a full-time doctoral scholarship at the Graduate School of the Faculty of Arts and Social Sciences at Stellenbosch University. The scholarship was awarded to him for three consecutive years (2019 2021).
- 3. Mr Jimu is currently working on his doctoral study titled *Towards a conceptual* framework for the analysis of governance arrangements and livelihoods of small-scale fisheries in Norton, Zimbabwe, under the supervision of Drumantha Williams (supervisor) and Dr Manfred Spocter (co-supervisor) at the Department

of Geography and Environmental Studies, Stellenbosch University.

14 FEBRUARY 2020

You are welcome to contact my office should you require any additional information or verification.

Kind regards

Prof Anthony Leysens
Dean: Faculty of Arts and
Social Sciences
STELLENBOSCH
UNIVERSITY

saam vorentoe · masiye phambili · forward together

Nagraadse Skool van die Fakulteit Lettere en Sosiale Wetenskappe | Graduate School of the Faculty Arts and Social Sciences Private Bag X1, Matieland, 7602, South Africa

Tel: +27 21 808 4198 | Fax: +27 21 808 2123 |graduateschool@sun.ac.za