# AN INVESTIGATION OF THE ACQUISITION, TRANSFER AND PRESERVATION OF INDIGENOUS KNOWLEDGE BY TRADITIONAL HEALERS IN CHIBOMBO DISTRICT OF ZAMBIA

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#### **DECLARATION**

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## **CERTIFICATE OF APPROVAL**

This dissertation by Dalitso Mvula is approved as fulfilling the requirements for the award of the Degree of Master of Library and Information Science (MLIS) by the University of Zambia.

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#### **ABSTRACT**

Indigenous Knowledge on healing is in danger of diminishing because of modern medical facilities and yet there are inadequate efforts from national and organizational institutions to capture this knowledge. Therefore, this study aimed at investigating the acquisition, transfer and preservation of Indigenous Knowledge by traditional healers in Chibombo District. This was achieved by firstly exploring how traditional healers acquired Indigenous Medical Knowledge. Secondly, by identifying the methods used during IMK transfer. Thirdly, identifying the methods which were used by traditional healers to preserve IMK and fourthly, through investigating the challenges which were associated with acquisition, transfer and preservation of medical knowledge. Using qualitative research method and snowball sampling, primary data were collected from 29 traditional healers and 5 key informants through face-to-face interviews. Findings of the study revealed that traditional healers acquired knowledge of healing through training and ancestral calling. The study also established that the majority of trained healers were females as they were much more willing to be trained than males. Findings on IK transfer revealed that majority of traditional healers transferred IK on healing through demonstration and observation. Findings on knowledge preservation showed that majority of traditional healers were training their family and other interested individuals. Results on challenges during acquisition, transfer and preservation of IK revealed that would-be healers experienced sickness, difficulties in mastering what was demonstrated and observed, segregation from their known communities and panicking when patients showed no signs of recovering after administering the herbs to them. The need for community leaders in Chibombo district to consider educating the local youths during ceremonial gatherings on the need to acquire and preserve indigenous practices was recommended. Similarly, the aged traditional healers especially those called by the spirits should be encouraged to share the knowledge revealed to them to avoid extinction of such knowledge when they die. This was seen as a way through which unwillingness to learn and share would be reduced. Secondly, it was recommended that collaborative efforts between community leaders and traditional healers to document most of the indigenous medicine and the ailments they healed be strengthened. This was seen as a way through which difficulties in mastering and panicking among the would-be healers reduce. And thirdly, it was recommended that Lenje Cultural Association consider documenting and disseminating information to the local people through showcasing what is available in the Mukuni Culture Village Museum and Library. This was seen as a way through which many youths would be encouraged to appreciate the indigenous values in their culture.

## **DEDICATION**

This work is dedicated to my Father (*Peter James Mvula*) and my Mother (*Patricia Malako*) whose re-echoed love for indigenous knowledge shaped the foundation for this study.

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#### LIST OF ABBREVIATIONS AND ACRONYMS

AFM - Apostolic Faith Mission

CSO - Central Statistical Office

IIRR - International Institute of Rural Reconstruction

IK - Indigenous Knowledge

IMK - Indigenous Medical Knowledge

MOE - Ministry Of Education

MOH - Ministry of Health

SDA - Seventh Day Adventist

SECI - Socialization Externalization Combination Internalization

TMK - Traditional Medical Knowledge

THPAZ - Traditional Healer Practitioners Association of Zambia

THP - Traditional Health Practitioners

UNAIDS - United Nations Programmes on HIV/AIDS

UNESCO - United Nations Educational, Scientific and Cultural Organization

WHO - World Health Organization

ZMA - Zambia Medical Association

#### **CHAPTER ONE**

#### INTRODUCTION

#### 1.1 Overview

This chapter introduces the context of the study by discussing the background, statement of the problem, purpose of the study, objectives and research questions, significance and the limitation and delimitations of the study.

#### 1.2 Background

African communities in rural setup have over the years relied on indigenous knowledge on climate, agriculture, medicine, health as well as education in the nonexistence of conventional knowledge generated through scientific research or statistical information. However, the current society has not appreciated the use of Indigenous Knowledge (IK) and others have associated its usage with witchcraft or black magic (Lumpa, 2017). This knowledge is passed on by word of mouth and cultural rituals from generation to generation and it is also known as local knowledge, folk knowledge, people's knowledge, traditional wisdom, or traditional science. IK is transmitted orally or through imitation and demonstration, additionally, the characteristics within which such knowledge is shared is much greater than other forms of knowledge and is distributed within a population, by gender and preserved through distribution in the memories of different individuals (Senanayake, 2016).

Makinde and Shorunke (2013) argue that IK is in three broad aspects including traditional knowledge that is inter-generational and passed from generation to generation, empirical knowledge that is based on observations of the surrounding environment (nature, culture, and society), and revealed knowledge that is provided through dreams, visions, and intuition.

IK has existed since the beginning of humanity as Mawere (2014) observed that this knowledge has survived the test of time and history. He further adds that the tacit nature of IK is intergenerational thus; it is passed by word of mouth from generation to generation by the custodians who hold it such as the elders in society. However, this knowledge is in danger of obliteration as its custodians die and those that remain do not have the whole story or look down upon IK as backward and also view it as the knowledge of the poor and illiterate; an effect of colonialism that necessitated the adoption of a different way of knowing that devalued most of the IK present in communities (Makinde & Shorunke, 2013).

Accordingly, it was during colonialism that Africans were encouraged to abandon their African scientific knowledge as it was labelled as unscientific and void of rational thoughts (Mawere, 2015). This path led to the control of African ways of knowing. The colonizer further encouraged the colonised to consider formal education but during that time the curriculum was never developed to meet the need of local communities. Kantini (2012:4) adds that "the colonial authorities supported such subjects which were not costly to implement both materially and politically thus; they funded subjects and syllabus that served well in the perpetuation of colonial legacy and hegemony."

On the other hand, emerging from IK was the establishment of traditional medicine which is cultural-based and existed in every society and it was the only medical institution which was available before colonial contact. However, colonisation of Northern Rhodesia by Britain necessitated a dead end to the use of traditional medicine as modern medicine was introduced. The genesis of modern medicine was followed by a fight to eradicate traditional medicine (Mulungushi Report, 1977) as cited in (Kanenga, 2013).

The coloniser asserts that just like IK, traditional medicine does not undergo rigorous testing hence raising a great deal of suspicion. This has been influenced by western knowledge system which is built upon the idea of positivism where truth is established by logical, scientific or mathematical testing (Agrawal, 1995). But Kaniki and Mphahlele (2002) argue that IK represent the beliefs of a community based on its culture and religion; thus, respect of deities and the conviction that ancestors are the community's intercessors with God, if not gods in their own right (Kaniki & Mphahlele, 2002).

Additionally, Twaumasi (1983) as cited in Kanenga (2013) noted that before the colonial experience and contact with other people, traditional medicine was there and it was the only medicine being used by indigenous people. The practise was mostly done by experts called Ng'angas (traditional healers in most of the ethnic languages). However, it was during the colonial period that a campaign aimed at dishonouring the work of traditional healers was witnessed and a demeaning name was coined called witch doctors which associated the traditional healers with negativity.

In the 19<sup>th</sup> Century when Zambia was still called Northern Rhodesia under the British colonisers, an Act was passed and under this Act, a campaign to eradicate traditional medicine was launched. The campaign aimed at paving way to introduce modern medicine while restricting traditional medicine practise (Kanenga, 2013).

Three years (3) after gaining independence, the nationalist government amended the British Act in 1967 by making it legal for traditional healers to practise traditional healing. Furthermore, recommendations were made that a national association of traditional healers be formed to regulate the practise of traditional medicine and a national council be formed to direct the affairs of traditional healers. The amendment was an attempt to encourage the growth and development of indigenous institutions as well as clean up the institution of traditional medicine to meet modern standards (Mulungushi Report, 1977). This led to the formation of Traditional Health Practitioners Association of Zambia (THPAZ) mandated to regulate and protect traditional healers as well as ordinary people from deceptive acts (Mvula, 2015). Furthermore, the protection of traditional knowledge, genetic resources and expression of folklore bill of 2016 was passed which provides for among other things a transparent legal framework for the protection of, access to, and use of, traditional knowledge, genetic resources and expressions of folklore, which also guarantees equitable, sharing of benefits and effective participation of holders; recognise the spiritual, cultural, social, political and economic value of traditional knowledge, genetic resources and expressions of folklore of holders as well as promote the preservation, wider application and development of traditional knowledge, genetic resources and expressions of folklore (Protection of Traditional Knowledge Bill, 2016). The Bill is currently effective hence the observed collaborative efforts between Zambia Medical Association (ZMA) and Traditional Health Practitioners Association of Zambia (THPAZ).

#### 1.3 Indigenous Knowledge and health care practises

Most African population, Zambia inclusive consult traditional healers and depend on indigenous medical knowledge for survival. This is noted from the estimations made by the World Health Organisation (WHO) that 70% to 80% of developing countries depend on traditional medicine for their primary health needs (Poorna, Mymoon & Haiharan, 2014). Most people in rural areas survive on traditional medicines when need arise especially in instances where hospitals are very far away. Thus, preservation of IK is cardinal because it will ensure that knowledge on traditional medicines as well as the dosages is well documented and disseminated in the quest to protect lives and benefit the local people (Munsanje & Mulauzi, 2013).

On the other hand, estimations from Central Statistical Office and Ministry of Education indicate that most rural areas of Zambia have about 46% of residents living within a 5km radius of a health centre whereas many have to travel more than 50km to reach their nearest health facility. This indicates that access to modern medical care in more remote areas is not

just limited by non-availability of modern medication but further limited by national shortage of clinical staff has some health facilities are run by unqualified staff to cater for the population (MoH, 2019).

It can also be noted that even in places were health facilities are reachable some spiritual suspected illnesses require indigenous practises to administer the traditional medicine because modern medication and modern experts may have no idea and capacity to treat such illnesses.

Additionally, this practise done by traditional healers comprise of knowledge that enables diagnosing, preventing or eliminating a physical, mental or social disease which relies on indigenous knowledge system. It is through such practise and experience that traditional healers are recognised as competent to provide health care using traditional methods in communities (Goma et al., 2016).

The administering of traditional medicine through indigenous practises asserts that humans are both somatic and spiritual beings, and that diseases can be due to mystic causes that may arise from the ancestral spirits being angry, result of suspected witchcraft or the entry of an object into the body. It therefore raises suspicion in the manner in which the stages of healing are done because even after administering herbs and roots, the words and rituals practise have to be followed as well thus, not only the symptoms of the disease are taken into account but also psychological and sociological factors (Makinde & Shorunke, 2013).

#### 1.4 Chibombo District

Chibombo district of Zambia is located in Central Province and shares boundaries with Chisamba, Kabwe, Kapiri Mposhi, Lusaka, Mumbwa, Ngabwe and Shibuyunji districts. The area has an estimated population of 224,215 as recorded by the Central Statistical Office (CSO, 2010). The district still recognises a traditional hierarchy of leadership hence falls under the control of a Chief and many Headmen/women who look after the smaller constituent villages. In addition, the area sits between 27 and 29 degrees GMT, hence receiving between 800 and 1,200 millimetres of rainfall every rainy season making it a farming district with a mixture of commercial and peasant farmers where cotton, maize and wheat are grown on a large scale with fishing in the Lukanga Swamps and livestock rearing being the mainstay of the local people's livelihoods (Daily Mail, 2014). The district faces a number of health challenges such as inadequate health facilities, shortages of personnel, lack of equipment, stock out of drugs and low budgetary allocation which hampers delivery of

primary health care. In addition, physical and economic barriers are major obstacles which people face in accessing primary health care facilities and services (Shikabi, 2013).

Chibombo district of Central Province in Zambia has a unique practise by the Lenje ethnic group called Mooba. It is a spiritual dance performed during events such as funerals, harvest time, healing sessions, as well as during installation of traditional leaders with an aim to appease the gods. The dance has been performed since time immemorial, and has been transmitted from one generation to the other through observation and practise of stated functions and events. Embedded in such practise is the spirit of acquiring, transferring and preserving IK by traditional healers who practise as well as train those who take up the mantle after them (UNESCO, 2017).

#### 1.5 Statement of the Problem

Local people rely so much on indigenous knowledge to make their decisions on various aspects of their lives. This is related to the activities such as growing of food, preservation and preparation of food, medicines, their roles in society as males and females, etc. Some people in Zambia are not able to access formal education and as such may not be privy to conventional or scientific knowledge on how to do several things or make decisions (Munsanje & Mulauzi, 2013).

However, despite 70% of Zambian population heavily relying on consulting traditional healers and depending on indigenous medical knowledge for survival (Muyenga, Musonda and Chigunta, 2019), little is known about acquisition, transfer and preservation of indigenous knowledge by traditional healers in Chibombo district leading to negative perception towards the practise. This knowledge gap can be attributed to the fact that tradition medicine has remained largely under researched hence lacking awareness of its primary health benefits and cultural values (Goma et. al, 2016).

#### 1.6 Purpose of the Study

This study intends to investigate the acquisition, transfer and preservation of indigenous knowledge by traditional healers in Chibombo District.

#### 1.7 Specific Objectives

- 1. To explore how traditional healers acquire indigenous medical knowledge.
- 2. To establish how traditional healers transfer indigenous medical knowledge.
- 3. To identify the methods used by traditional healers to preserve indigenous medical knowledge.

4. To investigate the challenges associated with acquisition, transfer and preservation of indigenous medical knowledge.

#### 1.8 Research Questions

This study is guided by the following research questions:

- 1. How do traditional healers acquire indigenous medical knowledge on healing?
- 2. How do traditional healers transfer indigenous medical knowledge on healing?
- 3. What method do traditional healers use to preserve indigenous medical knowledge?
- 4. What challenges do traditional healers face in the acquisition, transfer and preservation of indigenous medical knowledge?

#### 1.9 Significance of the Study

There is currently unexploited gap in literature on the acquisition, transfer and preservation of indigenous knowledge by traditional healers in Zambia. Therefore, this study is meant to fill that gap and additionally, it is hoped that the study will help policy makers in institutions such as the Traditional Health Practitioners' Association of Zambia (THPAZ), Medical Association of Zambia (MAZ), Ministry of Health (MoH) and other development agencies to foster adoption of indigenous medical knowledge in harnessing local communities through its provision of primary health care.

#### 1.10 Limitations of the Study

The study will seek to investigate how indigenous knowledge is acquired and transferred and preserved by traditional healers in Chibombo District; thus the study will have a limited sample of the population in order to allow the researcher to complete the survey according to the disputed time. Therefore, the results and any inferences made are limited to the surveyed population and not eligible for generalisation.

#### 1.11 Delimitation of the Study

There were a number of issues arising from the study such as traditional healers not willing to open up concerning their practise, as well as copyright issues which the researcher did not cover in this study. Indigenous healing as envisioned in this study implied that every, if not all forms of practises shared were considered to be a communal rather than individual knowledge.

#### 1.12 Theoretical Framework

This study is guided by a four stage model proposed by Nonaka and Takeuchi (1995) called the SECI model. The theory presents a cyclical model of knowledge creation processes and transfer which is a wheel of tacit and explicit knowledge transformation, following four sub processes namely socialisation, externalisation, combination and internalisation (Nonaka, 2008).

The process starts with socialization where knowledge is converted from tacit to tacit implying that, the knowledge is being shared or taught to apprentice in a social circle. The knowledge shared cannot easily be replicated as it is only shared within a chosen social group. Adachi (2011) notes that there are two types of socialization modes of knowledge conversion; one which focuses more on physical communication while the other on verbal communication. When dealing with physical communication for instance, in traditional apprenticeship apprentices can learn knowledge through sharing as well as hands-on experience. Nonaka calls this process sympathized knowledge. This practical aspect of the socialization mode of knowledge conversion process normally takes place at individual level (Adachi, 2011). The second type of the socialization mode of knowledge conversion takes place at team level. This focuses more on the face-to-face repeated knowledge-sharing processes among team members and on the sharing of cognitive knowledge and skills of team members (Adachi, 2011).

In relation to this study, socialisation is a process through which the IK inherent in traditional healers' and elders is transferred to individuals identified as the next healers within a community. Thus it is perceived that it is through this process that indigenous medical knowledge is imparted and acquired by the identified successors.

The second process of the model called externalization takes place when tacit knowledge is converted into explicit knowledge, such as concepts, images and written documents which provides a broader understanding of the hand-on experience conducted at the first stage of knowledge acquisition. The advantage is that knowledge can be shared widely (Nonaka & Toyama 2003). Adachi (2011) observed that shared language facilitates the externalization mode of knowledge sharing among the team members and organizational structures and further called the knowledge created during an externalization process as conceptual knowledge.

However, under externalization in this study, it is believed that all identified successors are gathered in one place to demonstrate the medical knowledge through treating sick individuals

under the observation of many traditional healers who have vast experience within and beyond the society they live in.

Combination is the third stage and involves collection of knowledge from inside or outside the establishment and then combining, editing or processing to form more complex and systematic explicit knowledge (Nonaka & Toyama, 2003). It is a process of exchanging, sorting, adding, disseminating, sharing and reconfiguring explicit knowledge among the members through documents, meetings, telephone conversations, computerized communication methods and others. This combination knowledge-creation process is called systemic knowledge (Adachi 2011). The process is a preservative measure which may be used to preserve traditional knowledge within a community in order to allow continuity in decision making in various aspect of their lives.

Combination in this study therefore refers to a time when all the different ways of knowing which were expressed during externalization are put together and sorted in order to come up with a uniform method that will be unique within that community. Additionally, it is during this time that the preserved indigenous medical knowledge is determined.

Lastly, internalization implies a process by which explicit knowledge created and shared throughout a society is again converted into tacit knowledge. This stage is viewed as practise because knowledge is applied and used in practical situations and becomes the base for new routines. The specific way of learning-by-doing is an effective method to test, modify and embody explicit knowledge as one's own tacit knowledge (Nonaka & Toyama 2003). According to Adachi (2011), knowledge created through an internalization process is called operational knowledge.

Therefore, it is believed that internalization in this study refer to a process by which apprentices are considered ready to serve as traditional healers and have been recognised by the elders and other clergymen within and beyond. It is at this time that the trained can conduct all the traditional medical procedures without guidance from the knowledge keepers.

The stages explained from the model above are shown in figure 1, which is proposed by Nonaka & Takeuchi (1995) and the model has helped in explaining the acquisition, transfer and preservation of knowledge from tacit nature to explicit.

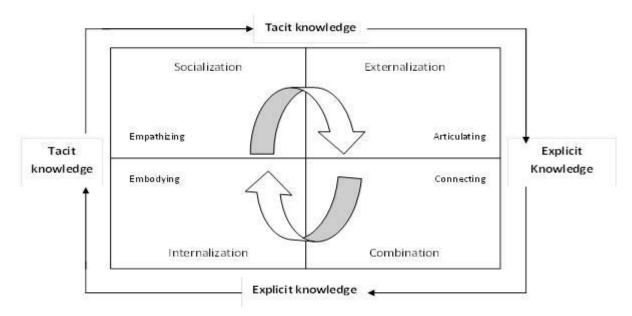


Figure 1:1 Acquisition, transfer and preservation SECI model.

(Source: Nonaka & Takeuchi, 1995).

SECI model has been adopted in this study as it outlines the knowledge conversion processes (knowledge management) that better indicate a flow of knowledge from its unwritten form (i.e. tacit) to an expressive form (i.e. explicit) that allows replication and re-learning. In this study, the methodology used is supported by this model through socialization. The model clearly presents selection criteria that are based on purposive choices and spiritual interventions. This means that socialization is used in order to provide an environment where those selected come from different locations and become acquaintances while learning about tacit knowledge. What they learn therefore is expressed, combined and internalised among and within themselves for the benefit of the community and beyond.

Furthermore, the model supported the acquisition, transfer and preservation of indigenous medical knowledge. Firstly, participants acquired knowledge through socializing with the trainers who made sure that they master through observation or practising. Secondly, any form of knowledge learned during socialization was to be externalised through demonstration and mediation by the participants. Thirdly, what was taught through socialization had to be thoroughly combined with what was externalised, this means that if a participant made a mistake when demonstrating, the trainer had to re-demonstrate thoroughly to train the participant. Fourthly, everything learnt had to be kept confidential and ideas could only be shared among those who were part of the training. It is at this time that the trained can conduct all the traditional medical procedures without guidance from the knowledge keepers.

#### 1.13 Operational Definitions of Key Concepts

The following concepts will be used and have been defined and understood in the context of this study.

#### **Preservation of IMK**

Preservation is an act of keeping something safe from being destroyed (Kaniki & Mphahlele, 2002). The idea of preservation is very important and it is noted that many authors have discussed it. Agarwal (1995), for example, speaks of in situ preservation, where indigenous knowledge is preserved by local communities for local communities. Another illustration suggest that a collection development policy must serve as a starting point to assist in identifying knowledge holders, recording procedures, repackaging, dissemination and preservation of indigenous knowledge (Anwar, 2010).

#### **Acquisition of IMK**

Acquisition in this context implies knowledge sharing which takes place during socialisation (where tacit knowledge is shared) and mainly done through observations, shared experiences and imitation, to name only a few (Maluleka & Ngoepe, 2018). However, it is important to note that for successful acquisition and sharing of this tacit knowledge to take place, an opportunity for participation as well as access to knowledgeable people is necessary (Koskinen et al., 2003). It is important to note that for information to be acquired there should be a willingness to share; without knowledge sharing there will be no knowledge to be acquired.

#### **Transfer**

Transfer is defined as the transmission and receipt of knowledge – a process that is most easily accomplished across actors who share a common practice (Berends et al., 2011). This transfer of knowledge occurs on various levels: from individuals to explicit sources, between individuals, from individuals to groups, between groups, across groups, and from groups to the organization or community Hence, all parties involved can be a holder or recipient of knowledge, and sometimes even both (Van de Wal, 2013). Additionally, Szulanski (1996, 2000) observed that the knowledge transfer process consists of four stages. Firstly there is an initiation stage which includes the decision to transfer knowledge to the place where it is needed. Secondly, the implementation stage which entails the knowledge flow between source and recipient. The third stage is ramp-up, it is about using the transferred knowledge. The last stage, the integration, is about the results that the recipient achieves with the transferred knowledge (Szulanski, 1996).

#### **Traditional healer**

A traditional healer also known as a Traditional Health Practitioner (THP) is a community member recognized as competent to provide health care using traditional methods. Traditional healers include herbalists, bone setters, traditional psychiatrists, traditional paediatricians, traditional birth attendants, occult practitioners, herb sellers, and general practitioners. Thus, traditional medicine encompasses therapeutic practices that include the use of herbal medicines (Goma et al. 2016).

#### **Summary**

The chapter started by providing a background of indigenous knowledge. It is within this background that it assessed how rural people over the years relied on indigenous knowledge on climate, agriculture, medicine, health, education etc. It is clear that this knowledge existed before beginning of humanity. It is obvious that most African population Zambia inclusive consult traditional healers and depend on indigenous medical knowledge. These points led to the problem statement indicating that little is known about acquisition, transfer and preservation of indigenous knowledge by traditional healers in Chibombo District of Zambia and this knowledge gap was attributed to the fact that tradition medicine originating from indigenous knowledge passed from generation to generation remained largely underresearched. The main objective sought to investigate the acquisition, transfer and preservation of indigenous knowledge by traditional healers in Chibombo District. The specific objectives explored on how traditional healers acquire and transfer indigenous medical knowledge; identified the method used by traditional healers to preserve indigenous medical knowledge and lastly investigated the challenges associated with acquisition, transfer and preservation of medical knowledge. Furthermore, the significance of the study has been explained as well as the SECI model framework and its relevance to this study.

#### **CHAPTER TWO**

#### LITERATURE REVIEW

#### 2.1 Overview

This chapter reviews relevant literature on the acquisition, transfer and preservation of indigenous knowledge by traditional healers. The focus of the review is on four themes. The first will be based on the definitions, types and importance of indigenous knowledge. Secondly, will be the acquisition and transfer of indigenous knowledge on healing by traditional healers. Thirdly, the process of preservation used to preserve indigenous knowledge and fourth, the challenges faced in acquisition, transfer and preservation of indigenous knowledge.

#### 2.2 Definitions, types and the importance of Indigenous Knowledge

Many African communities are experiencing corrosion of Indigenous Knowledge resulting from the massive migration to more developed countries and the influence of westernization and modernization within their communities. IK is unique to particular geographic location and it develops outside the formal education system (Kaniki & Mphahlele, 2002). For many years human beings have been generating and producing knowledge that has allowed them to live on and flourish within their communal and usual environments (Mehta et al, 2013). Thus, IK is used by many cultures as the basis for their decision making processes in relation to various issues such as food security, human and animal health, education, natural resource management and other vital economic and social activities (Gorjestani, 2000). IK is a part of everyday life for some cultures and is entrenched in people's experiences and beliefs (Mehta et al, 2013).

IK refers to the knowledge systems held by traditional communities based on their know-how and adjustment to a local culture and environment. This knowledge is used to uphold the society and its customs (Chakravarty, 2010). This definition shows that IK is rooted within a particular location and is directly associated to the experiences that are generated by the people in these locations. Battiste and Henderson (2000) further defined IK as an inclusive knowledge system with its own epistemology, beliefs, scientific and, rational validity which can only be understood by means of pedagogy traditionally employed by the people themselves.

There are two types of IK namely tacit and explicit. Smith (2001) refers to tacit IK as practical, action-oriented knowledge or know-how which is based on practice acquired by

individual experience that is rarely expressed openly. Tacit knowledge is difficult to convey openly with words because it involves carrying out something without having to think about. The very nature of tacit knowledge is that it is complex to extract from the heads of individuals. Thus, it is rarely found in books, manuals, databases or files as it is developed from mental models, values, beliefs, perceptions, insights, experiences and assumptions (Smith, 2001). In contrast to tacit, explicit knowledge refers to proof, convention, relationships and policies that can be realistically codified in paper or electronic form and shared without need for conversation (Wyatt, 2001).

IK is very important in many areas and local people depend so much on it to make their decisions on various aspects of their lives. This may be related to the growing of food, preservation and preparation of food, medicines, their roles in society as males and females, etc. (Munsanje & Mulauzi, 2013). Some specific examples of the importance of IK in Zambia include its use of the canal system for transport and irrigation in Western Province, Chitemene system of agriculture, which is used in Luapula, Muchinga and North-Western Provinces, sustainable wildlife management systems among the Lozi and Bemba tribes, traditional iron smelting among the Tumbuka/Chewa tribes, salt making in Kaputa and Mununga in Luapula and the Traditional medicine practiced among many tribes in Zambia (Lumpa, 2017).

There has been a significant rise in the number of known and unknown diseases in many African countries. The rise has necessitated the use of traditional medicine especially in rural parts were patients are required to walk long distances to access modern health facilities (Munsanje & Mulauzi, 2013). Statistics shows that about 80% of the sub-Sahara's population in developing countries depend on traditional medicine for their primary health care (Muyenga, Musonda & Chigunta, 2018). Traditional medicine is important in reducing significant costs for much of the rural population that lacks full or partial coverage of the modern health facilities (Alexander et al. 2015).

#### 2.3 Knowledge Acquisition and transfer of Indigenous Medical Knowledge

The process of knowledge acquisition is viewed in two categories namely; organizational level and individual level. Thus at organizational level, knowledge acquisition refers to a process of accepting knowledge from the external environment and transforming that knowledge in order to be used by an organization. Accordingly, at individual level, knowledge acquisition involves three activities namely; sourcing of organizational knowledge from repositories, learning from others and learning from experiences (Pacharapha & Ractham 2012).

Acquisition and creation of knowledge marks the first step in the process of knowledge development (Liao, Wu, and Hu & Tsui 2009). Additionally, the process of knowledge acquisition demands total willingness, attitude and the ability of a receiver to acquire and use such knowledge thus both the source and recipient must be willing to share the acquired knowledge as this is the form of social exchange which is moderated through individual social value orientation (Pacharapha & Ractham, 2012; Chigada & Ngulube, 2015).

However, the acquisition of indigenous medical knowledge is stressed by Matsika (2015) when he urges that there are two ways through which one can become a traditional healer. Firstly is by personal choice, thus when one wants to be a healer and then goes to seek the services of a master healer to be trained under him or her. The second one is by being called to the job. The first one rarely occurs because not many people are willing to volunteer to be traditional healers as this demand more time and financial resources. It may also be the fear to be involved in the divine, the unknown world of spirits and magic (Matsika, 2015).

Additionally, Nyundu and Naidoo (2016) noted that traditional healers can be categorised into 2 types namely the sangomas and the inyangas. The sangomas are believed to be called by the spirits while the inyangas are mostly trained. However, although anyone can be called to be a sangoma the calling mostly follows a chain of families that had a member who at some point accepted the honour of becoming a sangoma in the past or present (Gcabashe, 2009).

A study conducted by Muyenga, Musonda and Chigunta (2018) aimed at surveying medical plants used in treatment of diabetes in Ndola's Chipulukusu compound of Zambia. The study revealed that the majority were females (56%) while males accounted for (44%). Furthermore, the study revealed that 20% of the traditional healers acquired their knowledge on traditional herbs from family members mainly the parents and grandparents; while 70% acquired the knowledge through the spirits and dreams and 10% through an apprenticeship. The study concluded that plant parts which were commonly used were roots and that all herbs were administered orally.

Additionally, the dominance of female in this study shows that the gender differences result from the environment within which one conducts day to day duties (Dhewa, 2008). Thus men repeatedly demonstrate knowledge of plants primarily procured from the wild, whereas women generally showed greater familiarity with the therapeutic uses of weedy and semi domesticated plants found around the homestead. Arguably, this does not exclude any gender

from being a traditional healer if they are called by the spirit or are willing to undertake the training but rather just a reflection of division of labour that exist within rural societies.

A similar study by Maluleka (2017) investigated the acquisition, transfer and preservation of indigenous knowledge in Limpopo Province, South Africa. The study revealed that individuals that are called recognise their healing gift through dreams that is, messages from ancestors are believed to be delivered to them in their sleep. Additionally, it was revealed that for one to have been called there must have been someone in the family who was or is a healer and has to pass on the knowledge to the one selected by the spirits to continue with the work.

In support of the study, Thornton (2009) asserts that in African's belief system, one rarely becomes a traditional healer by being elected in that it's a special calling from the ancestors and should be embraced upon being called. This should therefore call for honour and value of traditional healers from their societies has they are not only spiritual mediums or metaphysicians, but as practitioners of science as well (Leonard, 2000). Traditional healers have a distinctive body of civilized knowledge and are considered spiritual authorities thus, their remedial practice is part spiritual and part homeopathic. A traditional healer is a minister of religion, a diagnostician and a philosopher. He or she is internally gifted. This means that healers are believed to be able to contact the spirit world in order to explain and predict phenomena (Matsika, 2015).

On the other hand, some individuals become traditional healers through training. Folden (2009) argues that what distinguishes the sangoma from the inyanga is the fact that while the former administers healing in various ways, goes through a strict apprenticeship and a formal initiation ceremony, the latter is more of an herbalist who does not undergo an initiation ceremony.

The training process is conducted by an experienced healer who specialise in training other healers (Maluleka, 2017). Thus the specialised healer in training is also referred to as the master in the event of knowledge acquisition. The training is commonly known to be a fulltime thing and the apprentice is expected to live with the master at his or her place for the duration of the training.

Matsika (2015) adds that the facilitator is responsible for instructing activities, and support the apprentice's learning in positive ways to assume responsibility for making decisions about what will be learned and when. And most important is that the master healer makes speak to the spirit to ask for wisdom, direction, and inspiration in teaching. He or she must also makes contact with the guardian spirit of the apprentice or student to direct, protect and inspire the student so that their guardian spirits collaborate for the mutual benefit of the student. And additionally, the master healer and the student may also call on the ancestral spirits of the patient in order for them to enhance the healing.

On one hand the study by Maluleka above provides exceptional knowledge on the processes within which most healers acquire the knowledge of healing but on the other, the study shows no link between acquisition on this knowledge and the transfer of it, thus the study focused on knowledge acquisition while neglecting the process of transfer which is a key stage during acquisition of knowledge by training.

A study by Struthers, Eschiti and Patchell (2004) was conducted in India on traditional indigenous healing. The aim was discovering the healing process and how it can be integrated into the western health system. The findings through an interview with a traditional healer reviewed that his knowledge on healing were taught to him through dreams. He further added that he learned from his elders who dedicated their time after discovering the gift of healing in him. The study concluded that traditional medicine is still in common use and thus given the attention indigenous traditional healing is receiving today, it is critical for health care providers and nurses to have an understanding of the basic ideology of traditional medicine. A similar study by Matsika (2015) on the education of Traditional Healers in Zimbabwe was conducted and it aimed at describing how the traditional healers teach their students or apprentice knowledge and skills to allow them function as science practitioners and practitioners of spirituality without engendering a sense of quarrel or contradiction as the dichotomy between science and spirituality. The findings reviewed that in traditional healer education, students are taught to be an expert in the practice of science. He or she learns first and foremost, forces acting on the environment from which traditional healers obtain their medicines. They learn how to preserve the environment and nurture it, and about factors that influence the wellbeing of the environment. The paper concludes that even though science and spirituality are completely opposed paradigms in the case of traditional healers they are applied to diagnose and treat patients.

Notably, during training, additional skills such as the mathematics of divination, the preparing and preserving of medicine and skill development were part of the curriculum of traditional healer trainees (Mutasa et al, 2008).

On the other hand, Knowledge transfer is referred to a process by which knowledge is conveyed as well as absorbed by a user (Garavelli, Gorgoglione and Scozzi 2002). This transfer of knowledge takes place between individuals, teams, and societies. Accordingly, knowledge transfer is centred on the useful transition of implicit knowledge and proper handling of such knowledge lies at the core of creation and transfer of that knowledge in societies (Szulanski, Ringov & Jensen 2016).

Knowledge is mostly transferred through a socialisation process were individuals, teams and societies interact. Nonaka (1997) explains the process of socialisation in the context where the well-informed person transfers skill in form of implicit knowledge to the apprentice who will be inexperienced at the time. In addition, throughout this process of knowledge acquisition and transfer, various trainings are used to evaluate the progress of apprentice, until such time that the master is satisfied with the performance of the trainees will he/she consider them ready to practice on their own (Bojuwoye, 2005).

Accordingly, Matsika (2015) urges that mentoring, precepting or job shadowing are the most common approaches used to transfer knowledge to the learner. He observed that during the process, learners will be learning through observation and imitation. Hawkey (1998) adds that teachers bring with them their own course and notion of their role and what is to be learned and practiced. However, the process of knowledge transfer requires that there should be a strong and positive relationship between the learner and the master healer. Furthermore, a partnership between the mentor and the learner ought to be physically powerful (Liu et al, 2011; & Sambunajak et al, 2006 and Ambrosetti et al, 2010).

Bagwana (2015) conducted a study aimed at exploring the ways in which traditional health practitioners acquire knowledge of traditional healing and treatment with herbal medicines. The findings reviewed that knowledge of traditional medical knowledge accumulated over a long time is transferred through word of mouth from generation to generation. The young generation acquired knowledge through their parents, grandparents or through interaction with other elderly members of their communities. The implication is that across generations, knowledge is acquired and transmitted through social interaction between those who possess the knowledge and those who seek the knowledge.

In conclusion, Bagwana (2015) noted that traditional healers should express aspiration and willingness to learn and share different strategies of healing so as to recover their standing and continue extending better services to the public. However, the study did not indicate as to whether there are challenges of willingness from both the learner and the mentor to receive the knowledge of healing, thus expression of the different strategies of healing is dependent upon the same ethnic groupings as most of the healers don't easily showcase the secrets behind the healing.

A similar study was conducted by Barnhardt and Kawagley (2005) which aimed at understanding the learning processes within and at the intersection of diverse worldviews and knowledge systems in Alaska. Findings, reviewed that indigenous knowledge is transferred through observation. The study indicates that elders have for long been able to predict the wheather patterns through observation of signs that presage subsequent conditions. The study concluded by noting that traditional processes used for learning to hunt through observation and other meaningful participation can provide insights on how indigenous students can learn to operate western products such as a computer.

This indicates that indigenous knowledge being non-formal ways of knowing is foundational to the genesis of formal education.

However, indigenous knowledge is acquired and transferred by the willingness to verbalise and share by custodians. Tabuti et al (2004) observed that indigenous knowledge is disappearing because of barriers that are increasingly affecting its transmission between community members. For instance, people from Uganda in the district of Kaliro are believed to have forgotten how to manage traditional food plants to ensure that such plants are available to future generations, or how to prepare traditional foodstuffs. Furthermore, indigenous people are not constantly willing to share this knowledge with people from outside their communities (Tabuti et al, 2004).

Furthermore, inadequate documentation of indigenous knowledge and the secrecy of custodians' especially traditional healers who despise to give away their knowledge on healing to outsiders and to some members of their families have negatively contributed to barrier in the transfer of indigenous knowledge, for instance some healers refused to expose their healing secrets to their daughters fearing that they would share the secrets with the families they marry into (Tabuti et al, 2004). In addition, changes in the social and environmental conditions have contributed to people considering indigenous knowledge less

important, for instance shifting cultivation was neglected In Nepal following a significant growth in human population (Sillitoe, 1998).

#### 2.4 Preservation of Indigenous Medical Knowledge

Knowledge preservation denotes the protection or the keeping safe of knowledge, especially indigenous knowledge, from being lost to future generations. Kaniki and Mphahlele (2002: 6) assert that indigenous knowledge is mostly passed on by word of mouth. Additionally, arguments may arise because of the perceived fact that preservation is what has necessitated the human race to survive, adapt and adjust over generations. It is also safe to say that people acquire and transfer knowledge with preservation in mind (Maluleka, 2017). However, the ongoing introduction of new technologies put its preservation at greater risk. The idea of preserving indigenous knowledge is an important issue and many authors have discussed it.

In this circumstance, preservation is used to signify the management of indigenous knowledge through the use of both traditional methods such as oral traditions, folklores and other traditional technological method. Modern methods of preservation were used to signify preservation of indigenous knowledge by codifying, documenting and digitising it.

Numerous indigenous knowledge proponents agree that indigenous communities have had their methods and tools of managing and preserving indigenous knowledge such as oral tradition, apprenticeship, artefacts, spirituality, food and seed drying systems; agricultural management technologies such as permaculture and folklores (Stevens, 2008).

Agarwal (1995), for instance, talks of in-situ preservation, a process where indigenous knowledge is conserved by local communities for local communities. Kaniki and Mphahlele (2002) argue about the use of technology for preserving indigenous knowledge. Notable fact is that the uses of technology in preservation need to be taken into cognisance by library administrators, to ensure that appropriate measures for indigenous knowledge collection and preservation are put in place within responsible public institutions.

However, for the unspoken knowledge to be preserved, it has to be acquired first. It is after acquisition that the knowledge is incorporated to our existing knowledge base and this process is called combination (Nonaka, 1995). Thus Knowledge acquired throughout the training is combined with the already existing knowledge and it is converted into our own personal understood knowledge. It is this form of knowledge conversion that involves

combining distinct bodies of explicit knowledge that Nonaka and Takeuchi (1995) referred to when they argued that the existing knowledge base has to be internalized after being integrated or combined.

Faust (2007) added that the internalization of the acquired knowledge takes place throughout a series of integrations within which individual concepts become tangible and ultimately engaged as an integral belief or value. This internalized knowledge is then preserved inside the human mind for future use. The preservation process is, however, a little different when it comes to explicit knowledge.

Thus explicit knowledge is readily codified into a tangible form, that is, documentary material that include reports, analyses, memos, videos, email and databases, that may be retained in a wide variety of media such as paper, film and electronic. It is possible to preserve this knowledge mostly by means of libraries, archives, museums and many other information handling agencies (McMahon, 2015). However, this exercise needs competencies in terms of skills, expertise as well as financial resources (Kashweka and Akakandelwa, 2008).

In many countries Zambia inclusive, museums are among the most important institutions that preserve indigenous knowledge in many different forms. These institutions contain information as well as artefacts on historical, scientific and artistic knowledge that are preserved as well as disseminated (Munsanje and Mulauzi, 2013).

Munsanje and Mulauzi (2013) further assert that preservation of indigenous knowledge in rural areas has encouraged continuity in the use of traditional medicines for survival when need arise. In instances where hospitals are very far away and local people cannot always gather modern medicines when needed they opt to use traditional medicine for primary health care. Thus, preservation of indigenous knowledge is fundamental because it ensures that knowledge on traditional medicines and dosages is well documented and disseminated. This will guard lives and advantage the local people.

Biyela (2016) conducted a study which looked at management and preservation of Indigenous Knowledge in Dlangubo village, South Africa. The results from the study revealed that the community used memory and artefacts to preserve IK. Further, it was observed that some preservation strategies had disintegrated or were gradually disintegrating like the culture of drying of seeds and plants and the use of granaries. It emerged from the discussion with the livestock keeping participants that although they still had knowledge

about traditional medicinal plants and the types of ailments they cured but they were no longer used.

In this study, it was apparent that in-situ preservation methods like oral tradition, memory and CoPs were predominantly used and exogenous methods were used at a very low rate.

It is noted from this study that there is need to integrate modern knowledge with indigenous knowledge if some of the practices are to survive. However, the study did not examine the reasons that led to the less usage of the preserved knowledge. Doing so is important as it is the only way a proper integration between modern and indigenous knowledge can be recommended.

Maluleka (2017) conducted a study which looked at the acquisition, transfer and preservation of IK in Limpopo district, South Africa. The major finding of this study was that ancestors are believed to be the ones preserving this knowledge of traditional healing and they pass it down to the chosen ones through dreams, visions and so on. The study concludes that traditional healers also preserved their knowledge orally and commonly shared and acquire knowledge during interactions with other healers. It was concluded that key stakeholders should play an active role in ensuring that traditional healing is incorporated into the country's healthcare system.

Accordingly, Herman (2013) also conducted a study which looked at the preservation and transmission of IK in diminishing bio-cultural environment in Botswana and Tanzania. The findings emphasise the support of individuals with unique talents or natural gifts like traditional healers, rain-makers and diviners to pass on their skills to academicians and younger generations so as to have the skills well documented for future use. Further, Herman also stressed the point of incorporating the knowledge in school systems as one way of preserving it for generations.

From the studies conducted by Maluleka (2017) and Herman (2013) it is clear that another way within which indigenous medical knowledge can be preserved is through integrating it into already existing systems such as the educational system and the health system to ensure preservation and continuity of its usage.

A study conducted by Issa, Owoeye and Awoyemi (2018) which aimed at examining the attitudes and the practice of documentation of IK by the traditional health practitioners (THP) in Kwara state, Nigeria complemented the studies above. This is noted in the findings that indicated that the traditional healers believed that documentation of indigenous practice in form of writing and other methods will prevent the knowledge from going into extinction.

The study also found that writing in books and storytelling are most prominent practices and methods of documentation of IK by the traditional health practitioners.

In this era of technology, the methods of preservation range from writing in books, to using both simple and complex technologies for the documentation. International Institute of Rural Reconstruction (IIRR) reported that IK could be documented in form of descriptive texts such as reports, inventories, maps, matrices and decision trees; audiovisuals such as photos, films, videos or audio cassettes as well as dramas, stories, songs, drawings, seasonal pattern charts, daily calendars and so on. It could also be stored in local communities, databases, card catalogues, books, journals and other written documents, audiovisuals and museums (Abioye, Zaid and Egberongbe, 2011).

A study by Anyaoku, Nwafor-Orizu and Eneh (2015) which investigated on highlighting the roles of medical libraries in the preservation of Traditional Medical Knowledge in Nigeria revealed that documentation was the reliable method used to preserve TMK. Thus Traditional Medical knowledge can be documented in books, periodicals such as news, papers, journals, indexes and material medica, other media for preservation has observed in the included multimedia recordings and the use of Information and Communication Technologies which would harness for collection and preservation of TMK.

In concluding, Olatokun (2010) conducted a study aimed at revealing IK of Traditional Medical Practitioners in the treatment of sickle cell anaemia in South-western Nigeria. The findings on knowledge of traditional medical practice were revealed to be orally preserved and transmitted by word of mouth from generation to generation. This and many studies above have shown that in most instances IK has been preserved through transmitting it orally and this however puts the knowledge at high risk of extinction has it custodians can die before passing on the knowledge. Nevertheless, most of the studies have also suggested documentation has the outstanding method to preserve this knowledge and ensure continuity in the absence of its custodians.

# 2.5 Challenges during acquisition, transfer and preservation of Indigenous Medical Knowledge

On the other hand, IK is diminishing because of an increase in barriers that affect its transmission between and within community members. For instance in Kaliro district of Uganda people are over and done with methods on how traditional food plants is prepared to

make sure that such plants are available for future generations, or how to prepare other traditional foodstuffs (Tabuti, 2004).

Barriers to preserve IK have been necessitated by inadequate documentation and the secrecy of custodians of IK. Some of the latter, especially traditional healers despise to disclose their IK on healing to strangers and to some members of their families. In Kaliro District of Uganda, some healers refused to make known their curative secrets to their daughters fearing that the latter would share the secrets with the families that marry them. Over time, IK fades away when its custodians die or migrate before their IK has been adequately transferred or documented. At present, much documentation of IK has been undertaken, especially in the domains of traditional medicine and traditional foods. However, many aspects of IK that includes the spiritual aspects remain undocumented (Maluleka, 2017).

Msuya (2007) conducted a study which looked at the challenges and opportunities in the protection and preservation of indigenous knowledge in Africa, the results revealed that preservation of IK is difficult because it is in rare cases that you find it in written form. Msuya further argues that IK in this case follows the pattern of an African Educational that is conducted through transfer of knowledge orally from one generation to the next. Okene, Ekere and Ekere (2009) added to this assertion when they argued that written form of IK may lead to the loss of essence of the knowledge due to its tacit nature. In other words, a shift from tacit knowledge to explicit knowledge entails losing the uniqueness of tacit knowledge.

Another study by Lwonga, Ngulube and Stilwell (2011) on the challenges of managing IK with other knowledge systems for agricultural growth in Sub-Saharan Africa in Tanzania revealed that the most common barrier attributed to IK acquisition is poor recognition of its existence. Additionally, the findings also revealed that resistance to change and poor knowledge sharing as barriers.

However resistance to change as well as poor knowledge sharing can be attributed to many factors that are mentioned in a study conducted by Zazu (2007) to explore opportunities and challenges for achieving the integration of Indigenous Knowledge System into environmental education processes in Zimbabwe. These findings revealed that some of the religions within the Sebakwe community viewed IK as pagan and unholy. There was concern amongst the research participants that children coming from Christianity backgrounds such as the Seventh Day Adventist (SDA), Apostolic Faith Mission (AFM) and Roman Catholic which are

heavily represented in the Sebakwe community might not appreciate or readily accept the use of traditional knowledge systems and the associated teaching and learning methods.

It was noted further that some of the children because of their religious backgrounds are not allowed to learn about certain IK thoughts such as traditional medicines and herbs, totems, rituals and ceremonies. These same children might also not be comfortable with traditional teaching and learning methods such as traditional games, folklores, proverbs, and ceremonial processes all of which are unfortunately quite an important part of IK systems.

Sithole (2007) conducted a study which looked at the challenges faced by African libraries and Information centres documenting and preserving IK in Zimbabwe. The findings to the study revealed that in instances where the knowledge custodians are willing to share the knowledge for the purpose of documentation, institutions such as libraries have inadequate equipments and poor infrastructure to accommodate such development.

These findings indicate that for IK to be documented, certain factors such as competence skills, expertise as well as financial resources to enable purchase of needed items ought to be available (Kashweka and Akakandelwa, 2008).

Chisenga (2002) on the other hand did a study on IK with a focus on African opportunities to contribute to global information content found out that where it is found necessary to share IK with others, international languages should be used. However, this assertion is challenging in the sense that translating IK into international languages would obliterate the specificity that is its core; the message would essentially be lost in translation. Chisenga further added that there are also certain indigenous terms that simply do not have an English equivalent hence it is difficult to capture and document IK, and why it will remain to some extent tacit knowledge.

#### 2.5 Summary

The chapter provides literature review on the acquisition, transfer and preservation of IK. The literature stresses that knowledge acquired and transferred is through calling or training. Calling refers to those who have been chosen by birth to become healers, on the other hand, training is by willingness to learn and become a knowledgeable healer. Accordingly, knowledge preservation is mostly done through a process called in-situ. This process entails conserving knowledge by local communities for local communities. Challenges noted include inadequate documentation and the unwillingness to share knowledge among the healers which maybe necessitated by cultural boundaries and religious belief.

#### CHAPTER THREE

## **METHODOLOGY**

## 3.0 Overview

This chapter discussed the methodology used in the study. The methods and techniques used in the collection and analysis of data comprised of the research design, target population, sampling procedure, data collection, method of data analysis, and ethical considerations.

# 3.1 Research Design

Kombo and Tromp (2006) defines a research design as a used structure in research that intends to show how all of the major component of the research project work together to tackle the central research questions. The research design of this study was 'hermeneutic phenomenology' as it investigated interpretive structures of experience of texts whether public, private in form of art or in other material forms (Grbich, 2007). This study adopted the phenomenological research method because it explored the lived experiences of traditional healers who share the different experiences in their practice of traditional healing (Maluleka, 2017). It was also applicable because it's a qualitative approach that attempted to understand hidden meanings and the fundamental nature of an experience together with how participants make sense of these (Grbich, 2007). Moustakas (1994) added that the approach helped the researcher to identify the essence of human experiences concerning a phenomenon as described by participants in a study.

Additionally, this design allowed the researcher to document real events by recording what people said and examining written documents and studying images. Thus qualitative research aims at capturing the attitudes and beliefs hence it provided the most effective tool for data collection.

Neuman (2011) further added that qualitative researchers document real events by recording what people say, observing specific behaviours, examining written documents and studying visual images. However in this context, the qualitative part of this study aimed to create insights on the acquisition, transfer and preservation of Indigenous Knowledge. Thus, it was made possible to draw conclusions based on the respondents' perspectives and understanding.

# 3.2 Target Population

A target population refers to a group of persons, objects, or items from which samples are taken for measurement (Kombo and Tromp, 2006). Zambia has over 44,000 traditional

healers registered with Traditional Healer Practitioners Association of Zambia (THPAZ). Accordingly, 55% of the practicing healers are females while 45% are males. However, from the total number of registered healers, about 37 were from Chibombo district. It was however very difficult to provide the exact number in relation to practising healers in Chibombo because not all were registered with THPAZ (Vongo 2020, Personal Communication, 11 July).

# 3.3 Sample size and sampling procedure

# 3.3.1 Sample Size

A sample is defined as a proportion of a given population (Polit et al 2001). Therefore, the sample chosen for the study were 29 traditional healers registered with THPAZ as well as the headmen/women living within villages and chiefdoms of Chibombo District of Zambia. 29 traditional healers were selected noting that generalisation was a fixation of quantitative research and in qualitative studies such as this; the researcher was not obliged to ensure sample representativeness because results were not generalised.

Neuman (2006:219) argues that for qualitative studies, researchers should focus less on the sample's representativeness rather on how the sample or small collection of cases, units or activities illuminates social life. In qualitative research a non-probability sample often fits the purpose of the study (Neuman 2011:267).

# 3.3.2 Sampling Procedure

This study was conducted using snowball sampling technique. This is because Snowball sampling is a technique that helped the researcher to identify possible subjects in studies where locating them was difficult. Chibombo District is said to be one of the active areas in providing traditional healing despite most healers not revealing their practice. Therefore, this study attempted to explore from the population in order to identify healers as they were more difficult to locate or contact than known populations (Sara, 2009). The first respondent helped in identifying the next and so on. Thus local traditional healers were selected for the study to provide insight on the acquisition, transfer and preservation of indigenous knowledge in the area.

# 3.4 Data collection methods and procedures

## 3.4.1 Data collection instrument

The research instrument for collecting data used in this study was a semi-structured interview guide; thus in-depths interviews were considered the best method for data collection because they allowed people to express their personal feelings, opinion and experiences on the subject being studied. Additionally, the approach was suitable for accommodating the views of those participants who refrain from expressing their opinion publicly as it provided a one-on-one interview session for each selected participant. In addition, the main local language mostly spoken in Chibombo District is Lenje hence the interview guide were translated into Lenje to suit respondents who did not understand English language.

# 3.5 Data Analysis

Qualitative data analysis deals with the transformation of raw data by searching, evaluating, recognizing, coding, mapping, exploring as well as describing patterns, trends, themes and categories in the raw data, in order to interpret them and provide their underlying meanings (Ngulube, Mathipa and Gumbo, 2015).

Birks and Mills (2011) further added that the means through which qualitative data and resources are managed and analysed contributes to procedural precision and the preservation of the quality of the research. During analysis, data will be organised thematically according to the main objectives of the study.

Firstly, the data was entered during an interview which is also called data logging. Secondly all the acquired data was transcribed; this was accompanied by recalling facial reactions or portrayed voices accompanying what was said by the respondents in relation to the question asked. Lastly, all the data was then coded with themes and subthemes according to the study objectives within which the responses fell.

## 3.6 Ethical Consideration

This refers to ethics which are a system of right values that is concerned with the extent to which research procedures hold on to professional, legal as well as social obligations to the study respondents (Dempsey, 2000). The researcher sought for permission from the Directorate of Research and Graduate Studies of the University of Zambia to ensure adherance to the code of conduct outlined in the institutional document. Respondents involved in the research were informed of the objectives, methods and anticipated benefits of the research beforehand, this was done in relation to the local language the participant best understood. All data collected were recorded in a book which was only accessed by the researcher. Moreover, an informed consent form disclosed potential risks associated with the

study. This was done to ensure that partipants wilingly take part in the study to avoid the risk of harming them. Confidentiality and privacy was considered by explaining the purpose of the research and not allowing respondents to disclose their names. Additionally, participants were free to remain silent or even withdraw from the study whenever they wished. Data obtained was analysed and reported the way it was and all used articles and books have been cited so as to ensure honest, truth and objectivity.

# 3.7 Summary

The chapter described all methods and methodology used in conducting this study. Hermeneutic phenomenology was used as research design which is a qualitative approach. The target population were both registered and unregistered traditional healers found in Chibombo district of Zambia. The study adopted sampling size of 37 traditional healers and used snowball sampling. The chapter further described that data was collected using a semi-structured interview guide and observation methods and data was analysed thematically. The last part of the chapter presented the ethical considerations to ensure research values were adhered to.

## **CHAPTER FOUR**

## PRESENTATION OF FINDINGS

#### 4.1 Overview

This chapter presented the research findings from the interviews that were conducted in the field on the acquisition, transfer and preservation of IK by traditional healers in Chibombo District of Zambia. The findings were thematically presented in relation to the themes and how they answer each question of this study. Thus the data was presented under the following themes according to the research questions:

- I. Characteristics of Respondents
- II. Knowledge acquisition and transfer
  - a) Acquisition through Training
  - b)Acquisition through Calling (Vision and Dreams)
  - c)Knowledge transfer
- III. Knowledge Preservation
- IV. Challenges faced in acquisition, transfer and preservation
- V. Response from the key informants

## 4.2 Characteristics of respondents

The intended sample for this study was 37 traditional healers registered with THPAZ, however only 29 took part in the study through in-depths interviews and results could still be regarded as valid in that the number of those interviewed is a representative sample. The interviews were conducted in different settings, thus part of the interviews was conducted at home of the participants and the other was conducted from the practising offices at a date and time determined by them. 29 took part in the study because some of the healers were not willing to take part citing that their practise was confidential to reveal information. Additionally, some of the healers recommended were unavailable at the time of the study.

Nevertheless, out of the 29 participants, 12 represented males while 17 represented females. Participants were asked to indicate there age, results revealed that males between the age of 26 and 35 who took part in the study were 2 and those aged between 36 and above were 10. Furthermore, participants were asked to reveal how long they have been using traditional knowledge for healing, results revealed that 2 of the males indicated having between 6 and 8

years of practising experience while the rest (10) had 9 and more years of practising experience.

On the other hand, female participants were asked to indicate there age, results revealed that those aged between 26 and 35 were 2 and those aged between 36 and above were 15. Additionally, participants were asked to reveal how long they have been using traditional knowledge for healing, results showed that 6 of the females indicated having between 0 and 5 years of practising experience while the other 11 indicated having 9 and more years of practising experience. Table 1 below provides a summary of the above information.

Table 1: General Information of Participants

VARIABLES	VALUES	FREQUENCY
	Male	12
Gender	Female	17
	26 – 30 years	3
Age	31 – 35 years	1
	36 and above	25
	1 – 2 years	3
Years of practicing	3 – 5 years	3
	6 – 8 years	2
	9 and above	21

# 4.3 KNOWLEDGE ACQUISITION AND TRANSFER

# 4.3.1 How participants became traditional healers

When finding out how participants became traditional healers, the study revealed two ways that took place, the first one was through training (mastering and practising; and demonstration and mediation) which were represented by 21 of the participants. In the context of this study, mastering and practising were an event where would-be healers observed attentively everything the trainer was doing and later practised without his or her guidance. However, demonstration and mediation presented a different scenario. Would-be

healers were required to follow demonstrations done by the trainer step by step and after that, they would be asked to administer herbs to a patient while under strict observation and guidance.

On the other hand, ancestral calling (*visions and dreams*) was the second process through which some participants became traditional healers. Ancestral calling involved a process through which a "called" healer received instructions through visions and dreams about different ailments and the type of herbs needed to administer. However, the instructions differed according to the circumstances within the community. For instance, the "called healer" would have revelations of a very sick patient in a far location and would be instructed on what should be administered for the patient to heal. Participants who became healers through this process were 8.

# **4.3.1.1** Traditional healers by training

The study found that there were two ways on how training among participants was conducted. The first process was through mastering and practising which represented 9 participants and the second was through demonstration and mediation which represented 12 participants.

## **4.3.1.1.1** Mastering and Practising

Most if not all trained healers who mastered and practised acquired the knowledge of healing from their family members. They were either chosen by the family healers to assume a similar position or they personally showed interest by being available and helping the healer in the execution of duty. The family members mostly cited to have trained the participants were mothers and grandparents, as indicated by one healer who said,

"I was trained by my grandfather who was a traditional healer, through observation I mastered everything he was doing. After a few years he allowed me to begin practising what I had mastered during his absence."

Another healer also said,

"I was trained by my grandmother who identified and taught only me exactly what she used to do. I used to go with her in the wild to collect herbs, I mastered some and those which seemed confusing I documented for easy identification."

Further, another one added:

"My mother trained me; she began by taking me along whenever she went to collect herbs. I used to help her with drying and pounding the herb to administable sizes until the time she saw it fit that I should be present when administering herbs. I mastered everything within a short period of time and she later allowed me to be her assistant and that is how I began practising."

#### 4.3.1.1.2 Demonstration and Mediation

Similarly, healers who trained participants through demonstration and mediation were their family members. However, would-be healers were carefully observed by their trainers to ensure that they do the right thing. In addition, the trainer would intervene immediately and provide instructions when the would-be healers made mistakes.

One healer noted that,

'I was trained to be a healer by my parents. They used to demonstrate on how to administer the herbs to patients. After some years, I began practising [mediation] in their presence while they observed.'

## Another healer said;

'My mother was the one who trained me; she started when I was twelve years old. I used to go with her in the wild to dig, collect, pound and dry different herbs. When a patient seeking her help comes, she would call me so that I can hear the ailment and observe as she administers the herbs.'

Furthermore, another one added;

"I got the knowledge of healing through training. My grandmother trained me. I used to observe her demonstrate by cutting and mixing different herbs for patients with different ailments. Later she allowed me to start administering herbs while she observed closely."

# 4.3.2.1 Selection of a trainer/mentor

On finding out why and how participants selected a trainer or mentor, the study revealed two ways, one was through *initiation* which were represented by 11 of the participants and the second was *passing on* which were represented by 10 participants. Initiation meant that the participants did not select who to train them but they were identified and selected by a family member who was a healer. On the other hand, passing on referred to those participants who became healers through being trained by their biological parents.

# 4.3.2.1.1 Selection by initiation

The study found that most of the participants did not select but rather were identified and selected by their members of the family to be trained. The members that were cited mostly to have trained them were the grandparents, as noted from what one healer said;

"I did not select my mentors. My grandmother and dad's elder brother collaborated and came to ask for permission from my parents to train me."

## Another healer urges:

"I did not select a mentor. I have lived my whole life with grandmother because my parents died when I was two years old. So, she started training me when I was ten years old and I helped up with minor activities during the healing sessions until she trained me in all areas, I am now a well-trained traditional healer ready to serve."

#### Another healer further said:

"I did not select my mentor. I learnt from my grandmother who was also a traditional healer. She practised traditional healing for over forty years and I learnt a lot from her."

## 4.3.2.1.2To Pass on

The study found that those who were trained by passing on had commonalities with regards to who trained them. Their biological parents where healers who decided to pass on the knowledge to their children. One healer said,

"I did not select my mentor. My parents were all traditional healers so I was trained by my father and he emphasised that he was doing so because I needed to continue practising after his death. My sister was also taught by my mother and since 1997 we both have been practising although we live in different places."

Another healer added that "I did not select my mentor. My mother taught me everything I am practising today."

# Furthermore, another one alluded:

"I did not select my mentor. My parents taught me everything. They said that I needed to learn how to treat my siblings since I was the eldest. Later they started calling for me whenever a patient came to seek treatment until the time I was ready to start practising on my own."

# 4.3.3.1 Duration of the training

The period taken for one to be completely trained as a healer differed due to the methods or the interest of the trainees. The study revealed that those who took 9 months and above were represented by 19 participants while those who took one day to 8months were represented by 2 participants respectively. Duration referred to the time taken for would-be healers to begin practising on their own without the guidance of the trainer.

# **4.3.3.1.1** Nine (9) months and above

The duration of the training for most of the participants seemed not to be a consideration as practising while being trained became their lifestyle. The findings indicate that majority were trained for 9 months and above. Further indications showed that humility and care became part of the lessons as eluded by one healer, who said,

"It took me more than 15 years of training to be ready for this practise. My trainer used to emphasise that my training was not only based on understanding everything about herbs and the ailments they heal but also the readiness to adopt and treat all patients with humility and spiritual care."

#### Another healer added:

"My training took more than 5 years. This is because I acted as an assistant to my grandmother even during the time when I could practise independently. I only managed to move and came to practise from Kangabala [A village in Chibombo] after my grandmother passed on."

Furthermore, another healer said:

"The training I did with my father took me 7 years to complete. He advised me to relocate and go to a new area to establish myself and begin practising."

## **4.3.3.1.2** One day to 8 months

For some participants, being involved in the healing process and focusing lessened the duration of the training. Among those whose training took one day to 8 months, one healer noted that:

"The training I had on healing only took two weeks. I was focused and only observed what my trainer was doing for four days. After that I got involved in helping with minor ailment through her instructions and by the end of 2 weeks, I was set to begin practising on my own."

## Another healer added:

"I took less than a year to complete everything my uncle was training me on."

## 4.3.4.1 Activities during training

On finding out about the major activities done by participants during training, the study revealed 3 main activities which constituted the training; the first was *digging the herbs and observing how they were being administered* representing 9 participants, the second was digging *the herbs and being taught how each of those herbs work* which represented 4 participants and thirdly, *digging the herbs and being instructed to administer with supervision* which was represented by 8 participants respectively.

# 4.3.4.1.1 Digging the herb and observing the administration

The ability to observe was a must have for those who acquired healing knowledge through training. After digging the herbs, the study showed that majority observed in order for them to learn on how to administer. Further indications showed that most if not all herbs dug and collected from the wild were much effective when combined,

As one of the healers noted;

'During training, there was a time when a lot of people got sick in the community and the sickness was unknown, so as a result we were sent to go and dig different herbs which the oldest healers mixed as we observed and administered to all who were sick. This was a major activity to me as my duty previously only involved digging.'

Another healer, said that

'My activity involved digging the herbs, roots and picking leafs which grandmother used to pound and mix in order to give to patients with different ailments as I sat and observed.'

Furthermore, another one added

'Observation and being attentive was my role, I would go with my father in the wild and he would instruct me to do the digging as well as the collection of every herb needed. When we got back home he would process (pounding and mixing) and later administer to a patient as I observed.'

# 4.3.4.1.2 Digging the herbs and being taught how it works

This form of activity during training provided hands-on experience for some participants concerning how and what to considered cardinal when digging. As mentioned by one healer,

"We used to go and dig different herbs and roots. Later we would be taught how each and every herb or root worked to cure different illnesses."

## Another one added

"After digging most of the herbs from the wild, I was being shown the categories of those herbs and the ailment they were used to treat."

# Further, another healer said

"Going into the wild to dig the herbs was my major activity. We used to go with her and she would explain how each root, leaf or any other herb works when you administer it to a patient."

# 4.3.4.1.3 Digging of herbs and being instructed to administer with supervision

The participants had two privileges during this activity. One was that they took part in digging the herbs and other necessities needed for mixing and secondly they had an opportunity to administer the herbs under the supervision of the trainer as noted by one healer that, "They used to demonstrate and teach me how to administer the herbs and later I was given a chance to practise in their presence. I also used to dig the herbs, roots as well as collecting leaves from the wild."

#### Another one said

"I used to help with digging, processing and preparing the herbs for administering. I also used to administer herbs to most youths who had sexual related ailments."

# Furthermore, one healer added

"Mostly I was sent to go and dig the roots and collect other herbs needed to be processed for patients. I would also be asked to administer some medication to patients that had non-complicated illnesses under the supervision of my grandmother."

# 4.3.5.1 Mastering during training

Mastering being a means through which knowledge was assimilated; participants were asked whether they remembered everything that was shown to them during training. The study revealed three aspects. Firstly, 18 participants indicated that mastering was the only means through which everything they practised were taught to them. Secondly, 2 participants indicated documenting as a way to help them remember what was taught. Documentation referred to the process of writing down the key features, the name as well as the medicinal

use of herbs. Thirdly, 1 participant indicated using both mastering and documentation as means through which to remember what was taught. The two processes were combined in order to deal with any demonstrated process that was complicated for the trainee.

## **4.3.5.1 Mastering**

Mastering was commonly used by most if not all healers who for one reason or another had interest in learning about healing practise. Further, the study showed that mastering was common among those with close family members, who could visibly be seen practising. One healer added that,

"I was very good at mastering during the training, once I see grandmother demonstrating I mastered through observation and never used to take time."

Another one said

"It took some time for me to master as I was learning through observation."

Another one further added

"I mastered everything at once. But my grandmother made me spend two years of training which I think brought more experience and humility in practising, something which I would have never learnt if I rushed to go and practise independently."

## 4.3.5.2 Documenting

Among those who indicated documenting as a way of recalling what they were being taught, one healer noted that:

"From the time I started training, I used to write in a book so that I can easily remember."

Another one pointed out that "mastering through observation did not seem to yield any results so I opted to documenting whatever I thought was important for use during the time of practising"

# 4.3.5.3 Mastering and documenting

One of the healers decided to take notes of whatever seemed difficult to master.

The healer added that,

"I was very sharp at mastering so to say, but when I noticed that certain administering of herbs to patients seemed confusing, I documented the process for easy reminder."

# 4.3.6.1. Involvement in healing during training

Involvement during training was a means through which participants practised what they had been observing or mastering from the trainer. However, the study revealed two ways through which participants were involved. Firstly, 8 participants indicated to have been fully involved in the process, this meant that participants had an opportunity to administer herbs to patients during the period of training. Secondly, 13 participants indicated to have been partially involved. This meant that participants had limited roles to perform during their training, for instance they could observe and take part in the digging and collecting of other herbs but could only be allowed to observe when it comes to administering the herbs.

# 4.3.6.1.1 Fully involved in the healing process

During the healing process, some healers had an opportunity to fully participate in administering herbs to patients with different ailments. It all depended on the method of training considered best by the trainer.

As emphasised by one of the healers

"Like I earlier mentioned, I was fully involved as I was given a chance to administer herbs to a patient in the presence of my trainer under her supervision."

## Another added

"My involvement was more than I had ever imagined because for many years I had been digging the roots and just collecting other herbs needed to be processed for patients. But later she started asking me to administer some medication to patients that had non-complicated illnesses as she stood and observed."

## Another healer further stressed

"I was fully involved, my trainer somehow made some division of labour because after some years of working with him, all patients with sexual related illnesses especially the youths were directed to me to administer herbs."

# 4.3.6.1.2 Partially involved in the healing process

For protection of both personal and communal reputation, some healers partially allowed those they trained to directly administer herbs to a patient. Among those who indicated being partially involved during the healing process, one healer noted that:

"I was involved, though part of my responsibility was digging the herbs and just observing my trainer administering the herbs to patients."

Another healer said:

"My involvement was limited to digging and collecting herbs, pounding the roots dried up roots and mixing them as I was taught to create desired herbs for different ailments. The administering part was for my trainer and I was only allowed to keenly observe."

Another one further added;

"My duty during training was to observe how my mother administered the herbs to patients. At the time, my mother had already collected a lot of roots and other herbs and stored them in one of our thatched hut so I never had an opportunity to go to the wild but I managed to master most of the trees she used to pound in order to make different herbs for different ailments."

# 4.3.7.1 Methods used for sharing experience during training

Methods of sharing experience varied according to what the trainer preferred. The study revealed that participants who indicated shared experiences during observation through demonstration were 14. Observation through demonstration meant that participants or trainees were keenly observing whatever the trainers demonstrated through practise. On the other hand, training through practise implied an event where trainees were instructed to administer herbs under strict supervision from the trainer. Participants who utilised this method of sharing experience during training were 7.

## **4.3.7.1.1** Observation through demonstrations

Majority of the healers trained found observation through demonstration as a preferred method through which to learn from their trainers.

One healer alluded:

"During my training, the only method I would emphasise which helped me attain the skills I have in this practise was by observing my trainers demonstrate to me all that which I needed to know,"

Another healer added that:

"Demonstrations were frequently used as we sat and observed. Even the time when we were put as a group with other trainers and trainees from other villages, all the trainers just demonstrated as we keenly observed."

Furthermore, another one said:

"All the knowledge and experience I have now was attained through my trainer demonstrating to me as I observed."

# **4.3.7.2** Training through practice

One of the participants whose method of sharing experience was training through practice noted that: "My grandmother used to just instruct me on what I was supposed to do. I listened and practised accordingly as she hated repeating the same thing over and over."

#### Another one added:

"During training, my uncle started allowing me to administer the herbs to patients hence much of the training was done through practising."

## Further, another one said:

"Since the time I started my practising journey, I was administering herbs to youths who had sexual related illnesses. On the first day of the training, we found 2 ladies waiting for my grandmother to seek help from her. Upon seeing her, the ladies explained their illness and she [my grandmother] immediately pointed at several herbs in different directions and instructed me to give it to the ladies, I did as I was told and she later gave further instructions. It was that tough as I had no time to observe or even ask."

# **4.3.1.2** Healing by Calling (Visions and Dreams)

Four conducts where revealed from the study as means through which healers who were called discerned the calling. Firstly, they discerned through sickness. In this context, sickness was induced to bring an individual to the realisation that the spirit had chosen him or her to take up a role as a healer. Accordingly, sickness was also induced in order to remind those who abandoned the calling for different reasons. Revelation was the second means through which healers discerned the calling. It meant that all the herbs used and every form of administering was revealed by the spirits to the healers. The third process was through confirmation. This implied a scenario were people confirmed to a healer that he was called because of the nature within which he conducted his healing. Thus it matched with others who used to practise before him. Revelation and sickness were the fourth process and it meant bringing one to the realisation that they were called and later revealing it to them through other healers.

#### 4.3.1.2.1 Sickness

The study found that sickness was used as a way to remind that one was being called to begin practising and also as a way of punishing those resisting or abandoning the calling.

# A healer urged that:

"I used to have a lot of visions. It became so worse that whenever I had the visions I would be unconscious for hours."

## Another one added:

"It was because of the weird dreams I used to have. I would get sick whenever I encountered those dreams. After sometime, I learnt that practising what I used to dream of led to many months of not experiencing such and had to adapt."

#### Another healer noted:

"The ancestral spirits never wanted me to leave my village. There was a time when I moved to Chirundu in search for a job, I did not stay for 2 months as I got sick and had to travel back home in Macha of Southern province. It was a disturbing experience until I discerned to the dreams I used to have. As long as I am practising, I am a free person and that is why I even managed to move and settle here in Mulaisho village of Chibombo district."

## **4.3.1.2.2** Revelation

It was revealed from the study that among the "called healers" some were taught everything they knew and practised by revelation without any influence from a physical being.

One healer noted "I used to have a lot of weird dreams. One day as I was dreaming, my mother explained that I started behaving strangely while lying on the bed. The dream took more time than expected. In that dream, it was revealed to me that within my village, there was a patient who was seriously ill. A tree was shown to me whose roots I was instructed to dig, pound and administer it to the same patient. When I woke up, I explained to my mother who upon being told the dream managed to locate the ill patient and she further advised me to do as it was revealed to me. I did everything as instructed and within that same week, the patient was completely healed. The following day the headman came to visit and suggested that I begin practising as I was called to do so. That is how it all started."

#### Another one added:

"I had a dream once, in that dream everything I know and practice was revealed to me. I have never even learnt anything from anyone to date."

## **4.3.1.2.3** Confirmation

Some among the called healers needed confirmation to discern what was upon them. This was necessitated by the nature of how the spirits availed themselves to the individual healers.

#### A healer said:

"Whenever I was given an opportunity to pray for the sick in church upon laying my hands on them I would start having visions which would last even for 30minutes. The church [Zion] elders confirmed that I had a calling for healing hence I needed to be helped. According to them, a previous healer who was part of the church before me experienced the same before fully understanding what was wrong."

# 4.3.1.2.4 Revelation and Sickness

"I started experiencing strange illness likened to madness. I was 18 years old at the time. My parents suspected that my illness could be associated with being bewitched. I got so worse that I could not even talk but behave completely like a mad person. My parents decided to take me to traditional healers in Kanyama compound of Lusaka. After days of treatment, two of the three healers revealed to me and my parents that I was being called to begin practising as a healer but I needed to be trained first. My parents agreed that I should be trained and that is how I was taken to Lundazi in Eastern province to be trained and only came back after I year 7 months."

## 4.3.2.1 Guidance among called healers

In finding out whether the "spirit called healers" sought for further guidance or help from other healers, the study revealed that among them, 6 represented those participants who were guided and those who relied on revelation were represented by 2. Guidance in this context meant seeking further information concerning the availed spirit and how to live according to its standard or rules as a healer.

# 4.3.2.1.1 Guidance

Strange and different means through which the spirits availed themselves to the healers brought more questions than answers to those close to the affected healer. This therefore called for guidance from those who had the knowledge and experience.

As noted by one of the healers,

"When I got very sick, my relatives took me to a traditional healer who confirmed after treating me that I was called to practice as a healer."

## Another healer added:

"My help came through the church [Zion]. It is the church that helped me to realise that I had a calling to become a traditional healer. I was further guided accordingly by those who had helped previous healers in the same congregation."

## Furthermore, another one said:

"My mother was the first person to confirm. She later took me to 3 healers who confirmed that I was truly called. They even taught me how to respond to those dreams in order to show acceptance of the calling."

#### **4.3.2.2.1** Revelation

One healer said "I did not seek any guidance or help from any. The very dream I had revealed everything to me."

#### Another one added:

"Throughout my practise journey, I have only been told what to do by the spirits. Every patient who comes to me with any form of illness, I treat them as the spirit reveals."

# **4.3.1.3** Knowledge of patient treatment

More information was sought after to find out how participants gained knowledge to treat patients that went seek their help, the study revealed that participants who gained knowledge of healing through revelation and guidance were 6. Revelation and guidance implied that despite having received the instructions through visions and dreams from the spirit, the healers needed guidance in their normal state to administer the herbs. On the other hand, those who relied on revelation by the spirit were represented by 2 participants.

## **4.3.1.3.1** Revelation and guidance

The study found that some healers had to be guided on how best discern and act upon what was being revealed to them. This was so because for some, what was revealed needed guidance in order to understand. For some, whatever was communicated to them by the spirits could not make sense hence the need for guidance through using a mirror as noted,

"I could not understand what was revealed to me in visions until another healer created a mirror for me to help me understand what was going on."

## Another healer said:

"I got the knowledge through visions and learning. When I got sick, some healers who took care of me started showing me how I needed to use the knowledge which was revealed to me by the spirit. All the interpretation and hidden knowledge in those visions were understood by me through the guidance of the healers."

Another healer, a Zion church member added:

"When I started dreaming, I could only see trees that heal certain diseases. Later, I could dream of a tree that I should use after a patient seeking help has fully explained his/her problem. The dream used to be initiated by the church as they needed to sing in order to call the spirit for revelation concerning the illness of a patient. But as it stands now, I have mastered most of the trees and roots and I do administer even without seeking guidance from grandmother who helped me in my early days to discern and understand how to administer herbs."

# 4.3.1.4 Revelation by the spirit

"Everything I practise to-date was all taught to me through dreams. I have never consulted nor have anyone confirm anything to me." Said one healer.

Another one added:

"I gained all the knowledge through visions and dreams."

# 4.3.2 Knowledge transfer

When finding out on how participants transferred skills and knowledge to those they train, the study revealed two ways through which knowledge was shared. Firstly, 15 participants indicated using *demonstration and observation* to share knowledge. This process meant that the trainees learnt through observing whatever the trainers were doing. Secondly, 6 participants indicated using *demonstration and practise* as a means through which to transfer knowledge. Demonstration and practise in this study referred to the process where trainees were required to practise everything the trainers demonstrated while being observed. However, a number of participants (8 healers) indicated not doing anything relating to knowledge transfer at the time of the study. Some of the reasons cited were that they had no one to transfer the knowledge to as their children were still very young, some indicated that the practise was too sensitive to share it, while others added that there was no need as most people seemed not interested.

#### 4.3.2.1 Demonstration and observation

The study found that in transferring knowledge on healing, majority of the participants adopted methods which seemed to have suited them best the time they were trainees, as noted by one of the healers "In training, I use the same method which was used during my training days thus, I usually demonstrated to them how it's done/or how it's practised as they sat patiently to observe."

# Another added

"Through demonstration, I trained my child how to identify, dig and process herbs as well as helping her to know which illness require what herb to be gotten led off. This was done through going with her in every step as she observed."

# Further, another one added

"My training was through demonstration and observation. This training idea has helped me not to force anyone to be interested in becoming a healer because those interested usually come and start observing. Most the young people find the practise so unnecessary to be trained in it hence my interest has only been focused on those who show interest."

# **4.2.2.2 Demonstration and practice**

Findings on the other hand revealed that the minority healers provided for an environment where those they transferred knowledge to practised what they demonstrated.

One healer urged that "Firstly I emphasise on observation because I believe it is one of the best ways to use when transferring traditional knowledge of healing, the second one is the practical part were those I train demonstrate the skills and after that they are allowed to ask questions for clarity sake."

## Another healer said

"I use demonstration to train my grandchildren; there are days when I ask them to practise so that I can monitor them to see if they are learning."

## Another one added

"I feel demonstrating if done in good faith [without hiding from those being trained] is a powerful way of teaching. Just like I was trained in the old days, I also demonstrate and later observe each trainee one by one as they practically show their knowledge level in my presence."

# 4.3.3.1 Methods of how knowledge was transferred to the participants

Different methods were used in transferring knowledge on traditional healing to the participants; the study revealed that 19 participants indicated being trained observation through demonstrations. This method implied that throughout the process of training, the participants were not allowed to do any form of practise but to observe as the trainers demonstrated. 10 participants on the other hand indicated being trained through practice. This meant that they had an opportunity to administer herbs or to just demonstrate their knowledge to the trainers through practising.

## 4.3.3.1.1 Observation through demonstrations

Majority of the participants were restricted to practising as they needed to observe and keep whatever they saw being demonstrated for future use. Their only role during this process of knowledge transfer was paying attention to everything that was being demonstrated as alluded by one healer:

"My parents just trained me like I said earlier. They practised as I observed keenly every day."

#### Another healer added that:

"I was trained to acquire this knowledge I practise. My uncle carried me through the whole healing process for years without being allowed to do any but only to observe as he demonstrated."

Furthermore, another one said:

"All the knowledge and experience I have now was attained through my trainer demonstrating to me as I observed."

# 4.3.3.1.2 Training through practice

On the contrary, other participants had the privileges of demonstrating what they mastered from the trainers. Among those who indicated having received the knowledge of traditional healing through practise, one healer noted that:

"Grandmother used to instruct me on how to administer the herbs to the patients with less complicated illnesses."

## Another one added:

"During training, my uncle started allowing me to administer the herbs to patients hence much of the training was done through practising."

# Further, another one said:

"I and my siblings were being monitored from digging roots and other herbs to administering the processed herbs to the ill patients by grandmother."

# 4.3.3.2 Nature of relationship among participants

In finding out the nature of relationship amongst healers, the study revealed that 18 participants had a relationship through there association (THPAZ), 9 had a relationship outside the association while those who indicated not having a relationship with any fellow healer accounted for 2 participants. In this study, a relationship referred to those who shared common interests and had the ability to share knowledge on healing and be willing to participate in helping other healers when called upon.

# 4.3.3.2.1 Relationship through the Association

The study found that some of the healers were connected beyond the boundaries of their communities through their participation in the association for traditional healers.

#### One healer said

"I am very much into a relationship with other traditional healers. Right now I hold two positions as trustee for THPAZ and also as a representative for healers within Chibombo to the association."

## Another one added

"I do have a good relationship but with a small number of healers. Mostly those I meet through our meetings at THPAZ. I don't need to associate with everyone because some healers may put an end to my business through dubious means."

# One added further

"I have a limited relationship with some healers in this area [Mweente village]. This is because most of them became healers through calling hence they don't share anything with anyone. The only 2 I associate with are those who are also members from the THPAZ association."

# 4.3.3.2.2 Relationship outside the Association

The study also found that some traditional healers had developed mutual relationships whose major aim was to provide service to the community. These healers not only came together to deal with complicated ailments but also to promote specialisation among them.

#### One healer said

"I have a strong relationship with most healers, especially in times when a patient has a lot of complications. We gather together during such times to share knowledge and administer different herbs to help the patient recover."

## Another one added

"My relationship with other healers is mostly dependent on specialisation. I noticed that associating with healers who specialise in healing the same illness brings about confusion because we administer herbs differently. Because of that, I only associate with healers who can help me with an ailment which I know nothing about so that I can learn as I also demonstrate my skills."

## Another one added further

"I have a very strong relationship with other healers. There are a lot of them that I have met who are now my friends through the same practise especially those from our neighbouring countries such as Mozambique, Malawi, Zimbabwe and Tanzania."

# 4.3.3.2.3 Never relate with any Healer

The study also revealed that some healers considered the practice to be an important gift which needed protection by those who possessed it. This therefore meant that secrecy of how the healing was conducted was paramount.

One healer said "I have never been involved in any relationship since the time I started practicing. I considered this practicing role as a very important task. I receive the instructions from the ancestral spirits hence sharing them with others may invalidate my role as a media for them to administer healing to the people."

# Another healer also

"Since the time I started practicing to date, I have never associated with anyone. The healing gift has a lot of envy and jealous as such, I made a vow never to associate with any healer no matter the situation."

# **4.3.3.3** Methods for knowledge transfer among participants (healers)

Knowledge sharing and the methods used were paramount. In finding out the methods employed by participants to transfer knowledge among them, the study revealed that 16 participants used demonstrations. This meant that knowledge was shared through showing how one practised when dealing with different ailments. 10 participants indicated teaching. Further, 2 participants indicated not having an idea of the method to use while 1 indicated mediation.

## **4.3.3.3.1 Demonstrations**

Indigenous knowledge transfer as practised among traditional healers was mainly done through demonstration. As indicated by one healer who said, "I use demonstration because I usually receive a big number of traditional healers who are referred to me for knowledge transfer. They come to me because of the experience I have gained over the last 35 years of my practices."

## Another one said:

"We sit down and demonstrate on how certain herbs are administered in relation to the illness."

Further, another healer added:

"Demonstration is used mostly because most of our work is practical, it is difficult for some of us to be taught without demonstration because personally I can't read and write. For instance, the last meeting we had on knowledge transfer [knowledge sharing], we shared the method of processing certain herbs, something we that would prove difficult to write than master."

# **4.3.3.3.2** Teaching

The study also found that, aside from demonstration, another way through which healers transfer knowledge was through teaching.

One healer said:

"We gather together and teach each other about herbs and the procedure of administering them to patients. Mostly we are taught about herbs we are not familiar with and the ailment they heal."

## Another healer added:

"We usually conduct scheduled meetings every six months were we help each other through teaching and learning. This is also one way we use to welcome and give a platform to new healers that come in our village."

# Further, another healer added:

"Teaching is the common method used, even at our association meetings we are encouraged to go with a paper and pen to write down certain notes when one is teaching."



Figure 4.2: An Association Certificate for a registered traditional healer (photographer: Researcher)

# **4.3.3.3.3 Mediation**

Some among the healers preferred to use methods through which knowledge was transferred to them. One healer said that,

"I use mediation since it was the first method I experienced. When I met up with a fellow healer to help me with knowledge on how she administered herbs to patient, she invited me on a later date and when I visit she had a patient who was suffering from an illness I had inquired on. So it was at that time when she ask me to administer the herbs to the patient through her instructions, I did everything under her instructions."

# **4.3.3.3** Commonality in knowledge sharing among participants (healers)

The researcher solicited the participants to have an informed view on how common knowledge sharing was among healers. The study showed 17 participants indicated that knowledge sharing was common while 12 stressed that it was not common.

## 4.3.3.3.1 Common

The study found that knowledge sharing among healers was common although it depended on the type of relationship some healers had. For instance, others even shared already prepared herbs for use when one needed them as indicated by one healer who said, "Like I had earlier mentioned when answering your question on knowledge transfer. The exchange of knowledge is very common through knowledge transfer. At times we even exchange already processed herbs in an event were your fellow healer runs out of a certain kind, especially in an event were they are dealing with a patient at that particular time."

## Another healer added:

"It's very common, since the day I started practising it has really helped me. Especially when dealing with strange illness, healers with many years of practising would come to our rescue and demonstrated to us thoroughly on how to go about administering herbs."

# Further, another one said:

"It's common but with limited people and proximity, thus the commonality of what we share is built through years of relationship. We do share but not with everyone else."

#### 4.3.3.3.2 Not common

Some among the healers indicated that knowledge sharing was not common. Reasons cited included lack of truthfulness which led to mistrust.

## One healer said:

"I don't see it to be common because you cannot be sure that the knowledge your friend has shared on certain herbs will work for you."

## Another one added:

"It's not common because there some amongst healers who always want to out-stand others. Therefore sharing such knowledge may cause havoc."

#### Further another healer said:

"It's not common because there is a lot of mistrust in this field (traditional healing). You may be provided with force information on how to administer certain medicines you get from your fellows (healers) the reason being that you mess up and lose clients (patients)."

# 4.4 KNOWLEDGE PRESERVATION

When finding out on how knowledge gained over the years was preserved by participants for future use, the study revealed that 22 of the participants were *training* relatives or other interested individuals as a way of preserving the knowledge. In this study, training meant an act of preparing one for a role through teaching them the needed skills and required behaviour for the practise. However, 7 participants indicated that they were *not doing* anything to preserve the knowledge. The participants highlighted that the current environment provides less support for traditional healing hence not many were willing to be trained for future continuity. Furthermore, other participants who were willing to preserve the knowledge through passing it on faced challenges as their children were very young.

# 4.4.1 Training

In an attempt to keep the unique practise of traditional healing, majority of the healers preserved the knowledge through training interested individuals as well as relatives. One healer said "I am training my grandchildren to make sure that this knowledge remains when I am no more. I believe that the knowledge should always be passed on to continue helping those in need within our community and beyond."

## Another healer added:

"I have been training my children for the past 2 years. I have witnessed them administer herbs to different patients with different illnesses. I know that even if I am no more today, they will continue practising what they were trained in. Due to the negative perception of the practise from our society, I have not engaged non-relatives in the training even though most of them have shown interest."

# Further, another healer said:

"I am training my wife who has now become my assistant. She knows everything because I have engaged her in every process of healing. I also tried to engage my children in the same but they seem not to be interested. In times when we go into the wild for days with my wife to dig the roots and other herbs, our children usually remove the poster for my advertisement."

# 4.4.2Not doing anything

On the other hand, some healers indicated interest to preserve the knowledge but were limited by two factors. The first one was the change in the environment as it embraced modern medicine while suspecting indigenous medicine. Secondly, one healer had no means through which to preserve the knowledge as his children were still young. As indicated below by one healer who said,

"I am not doing anything concerning preservation, I mostly want to pass on this knowledge to my children but they are still very young."

#### Another one added:

"For now, I am not doing anything that relates to preservation. I would really love to train my first born daughter but looking at the environment and how it perceives our practise, it draws me back."

## 4.4.3 Methods employed in knowledge preservation by participants (healers)

Different methodologies were employed to preserve the knowledge on healing, the study revealed three ways that were employed in knowledge preservation. Firstly, 23 participants indicated demonstrations as a means to preservation. This implied that whatever participants demonstrated to the trainees or other interested individuals were a deposition of the practise. Secondly, 5 participants indicated documentation as a preservation method. Documentation was done in two ways. Firstly, participants were putting a paper in a bottle of herbs bearing names and the ailments they healed. Secondly, some participants recorded in books all the name of herbs as well as the procedure of administer them to patients with different ailments. On the other hand, 1 participant indicated mastering as a method of preservation. The participant alluded that just like it were taught to her, observing while the trainer demonstrated was what she emphasised to those she trained.

# 4.4.3.1 Demonstration

The study found that most healers saw it favourable to use demonstration method in the process of knowledge preservation, one healer narrated that,

"We demonstrate to the trainers and among ourselves and also share already processed herbs to those involved in the similar practise"

#### Another one said:

"Demonstrations are commonly used; I have experienced it several times. A friend of mine shared with me new ways of administering and after some weeks, he invited me to go and be in charge of attending to his patients and administer herbs in his absence."

# Another one added that:

"In preparation for the ceremony [Kulamba Kubwalo] all healers are called upon to be part of the process. Depending on the experience and skills, we usually demonstrate what each healer will do to ensure protection and safety of those performing on the day and those visiting."

#### 4.4.3.2 Documentation

The study found that some healers easily identified the herbs if the bottles containing the substance were labelled or bears a paper indicating the ailment and herb type. In addition, some indicated listing down all the processing procedures in a book which they refer to when they are helping patients.

One healer narrated,

"I just indicate either outside or putting inside the bottle a paper bearing a name, and the types of ailment it can be used or administered to when and how. That way it is easy for my fellow healers to identify and use some of my herbs in my absence."

Another healer added that,

"We [the healer and his trainees] have listed down all the trees we have/or still using so far and how they are combined [processed into herbs] to heal certain illness."

## **4.4.3.3 Mastering**

One healer narrated that,

"Mastering has always been my emphasis to most of my fellow healers; I have learned a lot just by observing others practising it. This can be when you are visiting those with vast experience in the practise. You may not even need to ask anything but just observing them, you become their knowledge preserve."

## 4.4.4 Ensuring preservation of correct knowledge

The study revealed that there were two ways on how participants ensured that the correct knowledge was preserved. Firstly, 15 participants indicated mastering as a correct knowledge

preserve. Secondly, 10 participants indicated documentation while 4 participants indicated not being sure.

# **4.4.4.1 Mastering**

Majority healers observed attentively and mastered the healing processes by heart. This method therefore is what they advised those who were willing to take over after them to adopt.

One healer narrated that,

"Since the time I was trained I have never written down anything. The only way to everything I know is through mastering. Every herb and its administering method I mastered. It's an effectively way because no one can take away that from me."

Another healer said:

"I emphasise to those I have trained to only and always use and administer to patients herbs that they have observed me giving to patients."

Further another one added:

"Mastering is what I have always encouraged those I train to do; whenever I send a trainee to go and dig the roots and correct other herbs and they bring the wrong items, I go with them to the bush and give them insights on how to identify trees with the needed roots or other herbs. Off course this is done at a certain stage when they confidently show interest to learning."

#### 4.4.4.2 Documentation

However, the study also found that some healers were willing to use their literacy skills in order to document the procedures for easy reference.

One healer narrated that.

"I have been documenting everything I do. I was trained through mastering but for the sake of those who would be interested to learn about my practise when I am gone, I thought writing them down would be the best option."

Another healer added:

"I used to stick some papers on the herb bottles but I now got used. I have a book which my grandmother gave to me where all the herbs and the illness they heal are written down."

Further, another one said:

"Documenting is the best way to preserve, since the time I was being trained about herbs which were difficult to notice I documented its features for easy identification."

# 4.5 CHALLENGES IN ACQUISITION, TRANSFER AND PRESERVATION OF KNOWLEDGE

When finding out the challenges participants faced in acquiring, transferring and preserving the indigenous medicinal knowledge, the study revealed eleven challenges identified under each process. Thus under acquisition, four challenges were revealed. Similarly, under knowledge transfer four challenges were disclosed. However, under preservation the study recorded three challenges as highlighted by participants.

# **4.5.1** Challenges in acquisition

The study revealed four challenges that participants faced during knowledge acquisition. The first one was sickness which accounted for 6 participants; difficulties in mastering were represented by 5 participants. Segregation and panicking were accounted for 1 participant and 2 participants respectively. However, the majority healers (15) stressed that they did not face any challenge during acquisition. Different situations necessitated the challenges highlighted above. Sickness was induced to bring an individual to the realisation that the spirit had chosen him or her to take up a role as a healer. Accordingly, sickness was also induced in order to remind those who abandoned the calling for different reasons. Secondly, difficult in mastering meant that some among the trainees were slow learners or had challenges to identity most herbs used. Thirdly, participants had difficult adapting a new life in a new environment. Fourth, panicking was necessitated by patients' not reacting positively to administered herbs by trainees.

## **4.5.1.1 Sickness**

This was revealed to be the most challenging moment for most of the healers who were called. Worse off, some sickness induced by the spirits seemed very unusual to both the called healers and their relatives.

One healer narrated that,

"The most challenging thing during acquisition was when I got sick. My parents tried whatever they could to help me get better but to no avail. Until a healer was called to help, that is how I was healed"

#### Another healer said:

"The challenge I faced was when I got mad for 8months. I was even separated from the community and I lived in the bush. This was my terrible experience especially when I hear people and parents narrate the story to me."

## Another healer added:

"Getting sick every after some weeks without knowing why was the greatest challenge for me. I would be very weak and I had to be lying on the bed most of the times, having weird dreams every hour that passed. Until I was taken to a healer who helped me to understand what I was passing through and why."

## 4.5.1.2 Difficulties in mastering

One healer narrated that:

"I was a slow learner during acquisition; most of my friends were very quick to master what grand father taught us. Unfortunately, I am experiencing the same thing with my trainees. They are very slow hence they need close observation to whatever they doing."

#### Another healer said:

"I experienced difficulties in mastering most of the herbs, in order to gain the full knowledge of each herb I started documenting those herbs with similar texture but used to treat different ailments."

#### Another one added:

"I had difficulties in mastering what I was taught so my grandmother decided to give me a book as a guide."

## 4.5.1.3 Segregation

A healer narrated,

"I was separated from my family and friends for two years when I was taken to some experienced healers for training. That was a great challenge; living in a foreign land for that long was not easy for me."

## **4.5.1.4 Panicking**

Challenges on panicking include situations where patients being treated by a would-be healer showed no signs of recovery and recording zero recoveries in the first few days of practising independently.

One healer revealed that "My trainer would always give me a chance to demonstrate my understanding on healing when there is a patient suffering from a disease he [the trainer] has already demonstrated the administering process. Further panic was necessitated in situations where even after administering the right herbs in a right manner as trained but the patient shows no improvement."

#### Another one said:

"Personally I didn't face any challenge but just a concern from most of the pregnant women I helped. When the day they are expecting to deliver pass they panic a lot and develop doubt about the herbs and because of that, no matter the times I teach them, they still come back because they have never mastered."

#### Another one added:

"Failure to heal patients in the first phase of the acquisition process was my greatest challenge."

## 4.5.2 Challenges on transfer

The study revealed four challenges that participants faced during knowledge transfer. The first one was unwillingness to learn which accounted for 8 participants; those who indicated jealous were represented by 4. Time consuming and lacking help was accounted for 2 respectively. However the majority healers (15) stressed that they did not face any challenge during transfer. Different situations led to the challenges listed above. Firstly, unwillingness to learn meant that most healers portrayed a "know it all" behaviour which made it difficult for them to learn from their fellows. Additionally youths and some relatives sidelined the practise citing that it has been rendered unnecessary in the face of modernity. Secondly, cheating on one another in order to put them out of business was common, different beliefs systems and procedures for practising also acted as a barrier to knowledge transfer. Thirdly, some trainees took more time than usual to be trained and fourth, absence of helpers who were trained in the practise proved to be a challenge for some healers.

## 4.4.2.1 Unwillingness to learn

The study found that some healers were not open to discussions relating to the practise. Therefore they felt that what they knew is all there is and anything new suggested was neither influential nor caused any impact on them. As narrated by one healer;

"We have challenges were some traditional healers' feel they know everything and don't want to learn from others."

#### Another healer said:

"Unwillingness to learn and overlooking the practise among youths and individuals within the community. There is also a problem of sidelining knowledge especially if a new healer shares what most elderly healers don't know. Further, there is a tendency of not acknowledging the source of knowledge if something one share seems to be working better for the good of many healers."

## Another one added,

"Most family relatives are unwilling and look down on me and are not proud of this practise. This poses a challenge for me to transfer the knowledge beyond the boundaries of my siblings."

#### **4.4.2.2 Jealous**

The study revealed that some healers, especially those whose aim was shifted from helping the community to using the practise for monetary gains developed jealous. This resulted from the fact that despite other healers remaining true to the core purpose and not requesting any favours from patients, they continued receiving many patients them.

#### One healer alluded,

"Jealous is the common challenge, there is a lot of cheating amongst healers which then act as a barrier to the transfer of knowledge."

#### Another said:

"Jealous is what makes the transfer of such knowledge difficult because some fear that transferring may make one more famous than they were. For instance, my fellow healers have changed my phone number on my banner several times just to misled patients, as if that is not enough, the banner I am currently using is the fifth one because the last four were all

stolen. I am very sure that it's my fellow healers who are doing this because mere people are afraid of us and what we practise."

#### Another one added:

"I have a challenge were most healers who don't share my belief and culture demanding to have an understanding of what I do. I am hesitant to help such people [healers] even if they have a problem because of not understanding the core purpose of the practise, they may end up misusing the practise."

## 4.4.2.3 Time consuming

One healer narrated,

"My trainee (wife) takes time to master, I really need to be patient with her to make sure she understands and practise the right thing; this is time consuming on my part as a trainer."

#### Another one added

"The challenge I am facing currently is as a result of my siblings. I am training four at once. I have noticed that some are two are quick to master and the other two needs some more time."

## 4.4.2.4 Lacking help

The healer narrated that

"The challenge I face is lacking help. I had started training my grandchildren but they have gone back to school. Whenever any willing trainees show up, I am mostly found without herbs to use for training. I am very old and my grandchildren whom I trained are busy with school."

#### 4.5.3 Challenges when preserving

The study revealed three challenges that participants faced during knowledge preservation. The first one was unwillingness which accounted for 8 participants; those who indicated spirituality were represented by 1 participant. 1 participant accounted for expiration while the majority healers (19) stressed that they did not face any challenge during preservation. Unwillingness in this study meant a situation where most individuals show no concern about learning the practise. Further, those trained showed signs of forgetting what they were taught to do. Secondly, expiration meant the process by which herbs kept for long use healing power due to changes in wheather pattern. Thirdly, spirituality implied a scenario where the healer

practised only when he or she was possessed by the spirit. This made preservation difficult as one hardly remembered all they did when they were possessed.

#### 4.5.3.1 Unwillingness

The study found that the current environment seemed to be contributing to most healers abandoning or refusing to take up practising roles.

One healer narrated that,

"Most of the people are not willing to learn or be trained in this practise; this can be observed from how fast they forget when we teach them. For instance I have ten children and I have trained all of them, unfortunately only four have mastered and seem interested."

Another healer said,

"Those I have trained already reveal challenges of failing to recognise some of the trees we used to create certain herbs from. Further, most individuals are unwilling to take up our role when we are no more."

Further, another healer added,

"My children have shown no interest about learning the practise skills. They have since sidelined themselves from me and their mother."

## 4.5.3.2 Expiration

One healer said,

"The herbs lose power if kept for a long time without being used or administered to any patient. This is determined on were such herbs are kept. So in shot the temperature plays a role in relation to some form of herbs."

## 4.5.3.3 Spirituality

A healer, who got the knowledge through visions and dreams narrated,

"The fact that I got the healing powers from ancestral spirits, transferring and preserving are quite challenging because for me to know the ailment a patient is suffering from and what I should administer to them, I need to be possessed by the spirits."

#### 4.6 RESPONSE FROM THE KEY INFORMANTS

The study also involved 5 key informants who sought to explain their experience with traditional healers regarding acquisition, transfer and preservation of knowledge. 4 were male

headmen and 1 female headwoman. The study showed that 2 of the participants have held the position between four and eight years. Another 2 was recorded for those who have been holding the position for thirteen years and above while those who indicated between nine and twelve years was represented by 1 respectively.

# 4.6.1 Witnessing knowledge acquisition and transfer

On finding out wheather key informants have witnessed any form of indigenous knowledge acquisition and transfer within the village, the study revealed that 3 of the participants agreed being witness to such events while 2 participants indicated not attend any. Furthermore, participants who had witnessed such events indicated that observation and demonstration were mostly used during the acquisition and transfer of knowledge on healing.

#### 4.6.1.1 Observation and demonstration

The study found that during events were indigenous knowledge on healing is acquired and transferred; youths are selected from different corners of the village to be trained by healers. These events ensure continuity of such acts in the absence of old healers who may not be able to take part. All the selected youths are gathered in one as narrated by one informant, who said,

"All the selected youths to be trained are gathered in one place to observe what the healers are doing. These trainees respond differently to the trainings; there are those who gain the power to heal, others the power to train fellow trainees, and that group that learn deeply traditional dances and are always in the forefront during ceremonial gatherings."

#### Another one said,

"I have been called several times to be part of the observers for such gatherings. This is because every year a number of youths are selected from different villages to be trained by healers for the purpose of serving the community. Healers from different villages gather to demonstrate to these youths how to process and administer herbs to patients with different illnesses within the community."

## Another headman added,

"Demonstration is what the healers use to those being trained. The gathering is also part of the preparation for the ceremony because during such events, healers are considered a pillar when preparing. As a way of keeping the indigenous practise for the next generation, youths are trained."

## 4.6.2 Nature of relationship among healers

On finding out how informants perceived the nature of relationship among healers within the village and beyond, the study revealed that 4 participants indicated that a strong relationship existed among healers while 1 participant indicated non-existence of any form of relationship.

## 4.6.2.1 Relationship among healers

One headman who indicated the existence of a relationship narrated,

"I strongly believe that healers do interact with each other. If you look at how the training for selected youths is conducted, you may better understand that they work together because there is proper coordination in the manner in which they conduct the training"

Another one, the head woman added,

"I have never witnessed any form of training before but I noticed that there is a relationship among healers. I am saying so because there was a time when I received a guest who was directed to my place by villagers. He was a traditional healer coming from Petauke, Eastern province of Zambia. He was visiting a female healer in our district citing that they have been helping each other on a number of herbs and how to administer them for different illnesses." Furthermore, another headman said,

"My daughter got sick mysteriously and I urgently called for a healer within the village. I called for help from a nearby healer. He just came through, observed her for a few minutes and suggested that he needed to call another healer from a far village but within the same district to come help. I never thought that healers can refer patients to each other."

## 4.6.3 Non-existence of a relationship among healers

One head man alluded

"From what I have noticed, these guys [i.e the healers] can't have a relationship because they are in a competition. That is the reason why they even put posters, they may say it's for identity purpose but on the other hand it also a means of saying the best healer is here."

## 4.6.4 Methods used to preserve knowledge on healing

The informants listed the observed methods that healers used in preserving the knowledge of healing. The study revealed documentation as a way of preserving as noted from 2 participants. Another 2 participants stressed not having an idea of any method that could be used while 1 participant indicated storage as one of the methods for preserving knowledge on healing.

#### 4.6.4.1 Documentation

The study found that some processes have been documented by some of the trainees who had the ability to master and write. Further, old documentations left by healers both the living and those who pass on have been availed to the public through cultural heritage site as narrated by an informant,

"Some of the processes and procedures for training have been documented and made available through our cultural heritage sites and library spaces provided by the district council."

Another one added,

"My eldest son back in the year [i.e 2003] was selected for training. When he came back after a month, he documented everything he was taught. He even started writing down some of the unfamiliar experiences he faced as he received different patients with different illnesses."

## **4.6.4.2** Storage

On the other hand, one of the informants narrated that;

"I have noticed that some healers have built small huts which they have turned into storage space for their herbs. They have been to different places collecting different roots and herbs which they have stored into their huts for use when needed. The roots and other tree dried products have not yet been processed but were just stored."

## 4.6.5 Challenges observed in acquisition, transfer and preservation

4 Informants indicated not observing any challenges relating to acquisition, transfer and preservation of the knowledge of healing. However, 1 indicated unwillingness as the common challenge.

Those who indicated not observing any challenge narrated

"From my observation, there is total submission from the trainees to their trainer. I have not observed any challenge thus far."

Another one added that

"I think the selection process may be a contributing factor to having no challenges. Trainees are selected some months before and I think this prepares them in advance for the training."

## 4.6.5.1 Unwillingness

However, a headman who indicated a challenge in the preservation process narrated

"It is becoming difficult to select because most of our children have moved from rural to urban areas hence reducing the population. Moreover, those that remain behind have dedicated their efforts to schooling, neglecting most of the traditional values. We have since been using the same old men when in-fact we should be having energetic youths in the forefront."

## **4.6.5.2 Summary**

The findings indicate that becoming a traditional healer was attained through two ways namely training and calling. Training was achieved through mastering and practicing as well as demonstration and mediation. Calling on the other hand was achieved through visions and dreams. In addition, knowledge was transferred to traditional healers and the would-be healers through demonstration and observation as well as demonstration and practice. Secondly, findings on indigenous medical knowledge preservation revealed that training of relatives and other interested individuals was the ideal way through which knowledge was preserved. Lastly, challenges faced during acquisition and transfer included sickness, difficulties in mastering, segregation and panicking. During transfer, unwillingness to learn, jealous and time consuming were the identified challenges. Furthermore, unwillingness, expiration and spirituality were the noted challenges during preservation.

#### **CHAPTER FIVE**

#### **DISCUSSION OF FINDINGS**

#### **5.1 Overview**

This chapter discusses the research findings based on the objectives of the study thus to explore how traditional healers acquire and transfer indigenous medical knowledge, to identify the method used by traditional healers to preserve indigenous medical knowledge as well as to investigate the challenges associated with acquisition, transfer and preservation of medical knowledge. The chapter further highlight the extent to which the study findings relate to other previous researches conducted.

## 5.2 Knowledge acquisition and transfer

Indigenous knowledge acquisition and transfer plays a crucial role in ensuring continuity of existing knowledge from its custodians who are mostly aged. The acquisition and transfer of this knowledge takes place when the experienced healer transfers implicit knowledge to the least experienced individual who then acquire the knowledge.

According to the findings in this study, the majority (72.4%) of traditional healers acquired the knowledge of indigenous healing through training (mastering and practicing; and demonstration and mediation). This can be attributed to the fact that most healers grew up in an environment where traditional means of healing were a daily practise not only at home but even within their community. Growing up keenly observing their parents use herbal medicines led to a learning and interaction with their parents (Bagwana, 2015). Bagwana further added that young generation had acquired knowledge through their parents and grandparents, or through interaction with other elderly members of their communities. Moreover, the implication was that across generations, knowledge is acquired and transmitted through social interaction between those who possess the knowledge and those who seek the knowledge.

Additionally, among the trained healers, majority of them (88.2%) were females while (11.8%) were males, it can further be said that from the study, females were much willing to be trained as healers than males. This can be noted from the fact that most males (58.3%) were rather called than trained to be healers.

A similar study conducted by Maluleka (2017) in Limpopo province of South Africa revealed that healers acquired knowledge of healing through trainings conducted by an experienced healer. The findings also showed that 70.4% of those trained were females while 29.6% were

males. These findings compliment this study and can be attributed to the fact that in most communities, young women are engaged in different life lessons where such knowledge is availed to them than young men. This therefore meant that there was less resistance from females to be trained than males.

Furthermore, this study revealed a number of things. Firstly, from those who were trained through mastering and practising, the custom was that they observe attentively everything the trainer was doing at all times. The process of observing took different durations as guided by the trainer, for some it was for weeks, others months and years. At a time deemed fit by the trainer, the trainees were then allowed to start practising under the supervision and guidance of the trainer until such a time when they were ready to practise on their own.

A study by Kidane et al (2014) on the use and management of traditional medicinal plants by Maale and Ari ethnic communities in southern Ethiopia revealed that majority participants transferred the indigenous medicinal knowledge through training their first born sons. These findings compliment this study as it also reveals training as a means through which IK on medicinal plants was transferred. Similarities can be attributed to the fact that both communities had elders who were willing to pass on knowledge to favour disease prevention and promote healthy living while maintaining cultural identity.

Matsika (2015) added that the facilitator is responsible for instructing activities, and support the apprentice's learning in positive ways to assume responsibility for making decisions about what will be learned and when. These findings relate to this study and they are attributed to the fact that trainers protect their reputation as well as communal knowledge through ensuring that the trainees follow instructions as guided.

Secondly, the study revealed that those trained through demonstration and mediation participated in the practise under the supervision of the trainer. After such a collaborative practise, the trainees would then be mediators, thus they would be treating patients through guidance from the trainer who would be at a distance observing. A study conducted by Matsika (2015) on the education of traditional healers in Zimbabwe described how the traditional healers train their students to inculcate knowledge and skills that allow them to function as science practitioners and practitioners of spirituality without engendering a sense of quarrel or contradiction as the dichotomy between science and spirituality. The findings revealed that in traditional healer education, students were taught to be experts in the practice of science. He or she learns first and foremost, forces acting on the environment from which traditional healers obtain their medicines. They learn how to preserve the environment and

nurture it, and about factors that influence the wellbeing of the environment. The findings relating to the forces on the environment and how it can be preserved presents different findings from those of this study. This is so because; there is no indication of mediation. Further, it was noted that Matsika's study findings referred to formal learning while findings for this study referred to an informal means of training. Another study conducted by Zuma et al (2016) revealed that during intensive process of learning about traditional medicines, the trainees act as mediators as it is one of the assumed roles for being custodians of traditional African religion and customs. The findings above support that of this study in that mediation is used in both studies were the trainees demonstrate the skills learned in the presence of the trainer and patient. This can be attributed to the fact that in both communities, trainers protected their reputation by ensuring that those they train demonstrate to them what they were taught before they could go out and practice independently.

Furthermore, those who became healers through visions and dreams revealed four means through which they discerned the calling from ancestral spirits. Sickness was one of the four ways through which healers discerned the calling. The study revealed that the sickness was induced through weird visions that led the healers into unconscious state. For some, the sickness was induced as reminders in an event were the selected individual denied and escaped the calling. A similar study by Struthers, Eschiti and Patchell (2004) conducted through an interview with a traditional healer revealed that his knowledge on healing was taught to him through dreams. He further added that he learned from his elders who dedicated their time after discovering the gift of healing in him. The findings from the above study is different from those of this study in that, even though the same process was used to acquire the knowledge, there is no indication of sickness from the above study as it is from this study. The difference could be attributed to the fact that the healer interviewed in Struthers, Eschiti and Patchell's study indicated having experienced elders closer who helped him in recognising the calling and taught him how to discern in order to show acceptance of the gift. However, most of the healers in this study seemed to have no idea of what was going on not until the would-be healer got sick and went to seek healing from experienced healers who then revealed to them. Another study by Maluleka (2017) in his quest to find out how healers became aware of their calling revealed that sickness was a way through which those called were reminded that its time they needed to start practising. The author stressed that one among the would-be healers was brought in very sick and she couldn't even walk because she was resisting the calling even after being told by another healer a week earlier that she needed to accept the honour.

Revelation was the second means through which the healers discerned the calling. Through visions, everything they needed to know and learn relating to the practice was revealed. A study by Bagwana (2015) on answering the question of knowledge acquisition and transmission among the traditional health practitioners in Uganda revealed that the revelation works through the healer becoming possessed with the spirits that inform him or her of what to do, which medicine to use, where to find the medicine, how to prepare as well as prescribe it. These findings compliment the findings from this study. The similarity can be attributed to the fact that calling by ancestral spirits is not limited by ethnicity or tribal boundaries but works in unison for the good of any society.

The third method was confirmation; this method implied that those close to the would-be healer confirmed that he or she was being called upon observing how he or she behaved when unconscious. This could be attributed to the fact that within that family or community, someone in the past accepted the honour after discerning the calling in a similar way. A study by Struthers, Eschiti and Patchell (2004) indicated similar findings. A traditional healer was taught everything by the spirits but also learned from his elders who dedicated their time after discovering the gift of healing in him. However, in families or communities were such seemed strange; healers from different areas were consulted to provide help.

Lastly, under revelation and sickness; the chosen healer experienced continuous illness which could not be treated using modern medicine and processes. However, the study revealed that upon seeking help from the traditional healers, it was disclosed that she was called and the day she fall sick was the day the ancestral spirits deemed her fit to begin practising. A similar study by Bojuwoye (2005) revealed that the trainees are first possessed by the ancestral spirits, who make their presence known by inflicting illnesses and misfortunes which can only be explained by experienced healers after reading the bones. These findings compliment findings from this study because the ancestral spirits use similar ways in possessing and revealing themselves to those they have chosen.

## 5.2.1 Knowledge transfer

According to the findings in this study, the majority (52.4%) of traditional healers transferred the knowledge of indigenous healing through (demonstration and observation) while the least (19.1%) transferred the knowledge through (demonstration and practice). The findings further revealed that majority healers (66.7%) had knowledge transferred to them by observation through demonstration while the least (33.3%) received by training through practice.

Under demonstration and observation, the trainees keenly observed how the trainer identified the tree through its leaves; what was to be done before digging, how to process both the leaves and roots into consumable size and how to administer them to patients with different ailments. The duration for demonstration was determined by the trainer. Through this process, some trainees qualified to be healers without demonstrating to the trainer what they had been observing. This was made possible through mastering and documentation. That is, trainees had to write down whatever seemed difficult to master. These findings are complimented by a study conducted by Barnhardt and Kawagley (2005) which aimed at understanding the learning processes within and at the intersection of diverse worldviews and knowledge systems in Alaska. Findings showed that indigenous knowledge was transferred through demonstration and observation. Thus elders had for long been able to predict the wheather patterns through observation of signs that presage subsequent conditions. These similarity can be attributed to the fact that the method used made it easier for those learning to adopt the lesson.

Under demonstration and practice, the process presented a different scenario from the first. Trainees started by observing keenly what the trainers demonstrated, after a certain period stipulated by the trainer, trainees were required to demonstrate through practising what they have been observing. This was done under strict observation from the trainer who only intervened when the trainees demonstrate a wrong practise. This was done in order to protect the reputation of the trainer as well as the value of the communal knowledge from being applied wrongly or misused. Thus various trainings are used to evaluate the progress of apprentice, until such a time that the master is satisfied with the performance of the trainees will he/she consider them ready to practice on their own Bojuwoye (2005).

Matsika (2015) conducted a similar study and the results urged that mentoring, precepting or job shadowing are the most common approaches used to transfer knowledge to the learners. He observed that during the process, learners will be learning through observation and imitation. Hawkey (1998) adds that teachers bring with them their own course and notion of their role and what is to be learned and practiced. However, the process of knowledge transfer requires that there should be a strong and positive relationship between the learner and the master healer.

## **5.3 Knowledge preservation**

Research findings showed that majority (75.9%) of traditional healers were training their families and other interested individuals as a way of preserving the knowledge. The methodologies implored in the process of training involved demonstration (79.3%),

documentation (17.2%) as well as mastering (3.5%). These findings infer into a number of things about knowledge preservation. The first process on one hand revealed that trainers demonstrated and engaged interested trainees to acquire the knowledge for continuity sake. On the other hand, healers also exchanged such knowledge among themselves as a way of passing on new skills and practises at individual level. At communal gathering, healers were called upon to demonstrate the value of their skills in preserving and protecting communal events such as traditional ceremony, through such many healers acquired and in the same vain shared new knowledge and skills for preservation. As noted by one of the healers in the study, new knowledge was passed to him on how to administer one herb in different ways to treat more than one ailment. A study by Olatokun (2010) aimed at revealing indigenous knowledge of traditional medical practitioners in the treatment of sickle cell anaemia in South-western Nigeria found that knowledge of traditional medical practice was orally preserved and transmitted by word of mouth from generation to generation. Olatokun's study compliment the findings from this study in that the method of knowledge preservation used is similar and this can be attributed to the fact that most African communities use informal means as a way of training (inculcating skills) the young ones.

The second process showed that in some cases the trainees were given books bearing a list of herbs and the ailments they heal. Such books could have been passed on to many healers from the actual owners to promote continuity and preservation of such knowledge. In the same way, it was revealed that some trainees opted to recording down what seemed challenging to master, for instance adding papers with a name of an ailment in a bottle containing herbs for easy identification. Key informant further alluded that one way through which such knowledge were preserved was by documentation and making available the knowledge to the community through the library space provided by the council.

A study conducted by Issa, Owoeye and Awoyemi (2018) in Kwara state, Nigeria on examining the attitudes and the practice of documentation of Indigenous Knowledge by the traditional health practitioners (THP) revealed that the traditional healers believed documentation of indigenous practice in form of writing and other methods will prevent the knowledge from going into extinction. The findings from the above study compliment this study and the similarity can be attributed to the fact that healers regardless of the communities they are in have developed a desire to witness there practise live on through any means even in their absence.

The third process revealed that, on the part of the trainees observing attentively everything the healer was doing for many weeks, months or years of mastering made them a preserve of that knowledge. Among healers, some revealed that being in the presence of old men or women who had been practising for many years was seen as an opportunity to master and copy how they practised without their knowledge. Biyela (2016) conducted a study which looked at management and preservation of Indigenous Knowledge in Dlangubo village, South Africa. The results from the study revealed that the community used memory and artefacts to preserve indigenous knowledge. The results from Biyela's study compliment this study in that the knowledge which is past on and the ways within which the knowledge is passed require memory to be sustained and better used in the future. Another study by Herman (2013) was conducted which looked at the preservation and transmission of indigenous knowledge in diminishing bio-cultural environment in Botswana and Tanzania. The findings pointed those individuals with unique talents or natural gifts like traditional healers, rainmakers and diviners to pass on their skills to academicians and younger generations so as to have the skills well documented for future use. The study by Herman supports this study as the findings also emphasise the passing on of indigenous knowledge as a way of preserving.

#### 5.4 Challenges during acquisition, transfer and preservation

Finding of this study on challenges during acquisition, transfer and preservation of indigenous knowledge revealed that majority of healers did not face any. Acquisition and transfer recorded 51.7% of healers who indicated not facing challenges while preservation accounted for 65.5% of healers who indicated not facing any challenges. There were four guides that the finding of the study showed about challenges faced during acquisition. The first guide showed that sickness proved to be an unacceptable confront for most of the healers who acquired the knowledge of healing through visions and dreams. A similar study by Maluleka (2017) revealed that among the would-be healers one came in very sick, she could not walk. Findings further showed that she was told she had a calling by another healer a few months but ignored and decided to seek second option. These findings compliment the finding from this study, the similarity can be attributed to the fact that though the sickness is induced differently, it is one big sign the ancestral spirits use to remind the 'called' about the practise.

The second guide was difficulties in mastering; some healers indicated that they were very slow in catching up with what the trainer was demonstrating, an act which most of the trainers considered to be a lack of seriousness on the part of the trainees. A study by Faust

(2007) revealed that the acquisition of indigenous knowledge takes place through a series of integration and engagement of the trainees. The findings further revealed that this internalised knowledge is preserved inside the human mind for future use. The study above presented different findings from this study. The difference is attributed to the fact that Faust referred to multiple methods of engaging trainees while this study consider only one. Therefore, it can be said that from Faust's study, trainees could easily master considering the various engagement they underwent. On the other hand, those from this study may have had difficulties to master because the trainer may not have considered multiple methods to use in training.

The third guide was segregation. Some trainees called by ancestral spirits to become healers were taken in various places to seek medical and spiritual attention from healers who better understood their sickness. This meant that they were separated from their families and community for a period determined by the trainer. Similar findings from a study by Maluleka (2017) urged that the training is commonly known to be a fulltime thing and the apprentice is expected to live with the master at his or her place for the duration of the training. The findings above are similar to those of this study and this can be attributed to the fact that trainees may be required to exclude certain activities during training.

The last guide was panicking. A healer indicated that panicking was necessitated when an opportunity to mediate was given. Further, a healer highlighted that it was made worse were patients show no improvement even after administering indigenous medicine in the right way as taught by the trainer. Kaniki and Mphahlele (2002) in their study indicated that indigenous knowledge represent the beliefs of a community based on its culture and religion, thus respect of deities and the conviction that ancestors are the community's intercessors with God, if not gods in their own right. The study above present different findings from those of this study, the attributing factor may be that those who panic fail to acknowledge that healing is not just the responsibility of the healer but the healed in relation to one's belief and culture.

Accordingly, findings about challenges faced during transfer also revealed four patterns. The first pattern is unwillingness to learn. This pattern presented 2 sides, on one hand there is resistance to learn among healers such that any new knowledge that seem to present a better way of improving the practise is sidelined. On the other hand, some family members are unwilling to learn citing that such practise is no longer needed in the face of modern health facilities hence posing a challenge to transfer the knowledge. A study by Lwonga, Ngulube and Stilwell (2011) on the challenges of managing indigenous knowledge with other knowledge systems for agricultural growth in Sub-Saharan Africa in Tanzania revealed that

the most common barrier attributed to indigenous knowledge acquisition is poor recognition of its existence. Additionally, the findings also revealed that resistance to change and poor knowledge sharing as barriers. The findings above are similar to those of this study and this is attributed to the fact that in most Africa societies, introduction of formal system contributed to the poor recognition and resistance to learning indigenous medicines.

The second pattern was jealous, healers indicated that there is a lot of mistrust and jealous among healers hence making the transfer of such knowledge difficult. One healer highlights that the core purpose of their practise was losing popularity because most healers are after money and firm above help and service to communities. Bagwana (2015) asserts that barriers to preserve indigenous knowledge have been necessitated by the secrecy of custodians' especially traditional healers who despise to disclose their indigenous knowledge on healing to strangers and to some members of their families. In Kaliro District of Uganda, some healers refused to make known their curative secrets to their daughters fearing that the latter would share the secrets with the families that marry them. Attribution to the similarities may be as a result of respecting the practise as an honour within families and a confidential gesture.

The third pattern was time consuming. This was indicated by healers who were training trainees who took more than the usual time to understand and master what they were taught. A study by Matsika (2015) revealed that many people were not willing to be called healers as the role demanded more time. The results from this study may be attributed to the fact that some healers do not take into consideration the ability of their trainees in adapting to the training.

The last pattern was lacking help. This was a lamentation from an old healer who had trained his grandchildren with the same knowledge. However, after an enrolment into formal schooling for all his grandchildren, he is left with no helping hand and can no longer help the patients as most of his herbs were sourced for and prepared into administable size by his grandchildren.

Furthermore, challenges during preservation showed three patterns. The first was unwillingness; some children whose parents were healers showed no interest in learning the practise and taking up the role. Further, the study also revealed that some amongst the relatives who showed willingness were already demonstrating signs of failing to recognise the needed herbs after spending time without practising. A study by Tabuti et al (2004) stressed that indigenous knowledge is acquired and transferred by the willingness to verbalise and share by custodians. The authors further observed that indigenous people were not

constantly willing to share this knowledge with people from outside their communities. The findings from the study above are different from those of this study. on one hand, this study indicated willingness from the knowledge custodians to share to the knowledge to the unwilling relatives while on the other hand, the above study proved the opposite as custodians were not willing to share such knowledge to any outside their communities regardless of family ties. The difference can be attributed to the values upon which both societies place on indigenous knowledge.

The second pattern was expiration. Healers revealed that some prepared herbs that were not administered for a long time expired due to change in seasons. A study by Maluleka (2017) stressed that it was ordinary knowledge that traditional healers mainly use herbs to heal different ailments and these herbs are mostly kept in huts that are cooler inside designed to keep them for longer. Maluleka added that to be able to use those herbs the healers have a way of knowing which herbs to use at the time. The study by Maluleka compliment the findings in this study as both studies show that the usage of some herbs is determined by changes in wheather.

The last pattern revealed spirituality. A healer indicated that it was difficult to preserve the knowledge because the herbs and the processes of administering were revealed by the spirit and this happened only when they possess him. Thus, individuals that are called usually recognise their healing gifts through dreams and messages from ancestors are believed to be delivered to them in their sleep (Maluleka, 2017). The findings present a similar occurrence that manifests from the fact that selection of an individual to take over the practise maybe determined by the ancestral spirits and not from a practising individual.

### **5.5 Summary**

This chapter has discussed the research findings as presented in the previous chapter. Concerning acquisition and transfer of indigenous knowledge the study revealed that the majority of healers acquired knowledge through training. The training involved two processes, the first one was through mastering and practising while the second involved demonstration and mediation. Among the healers who were called, the study revealed that there were four ways used to discern the calling namely sickness, revelation, confirmation and revelation and sickness. The study also established that majority of trained healers were females while the least were males. Findings on transfer revealed that majority of traditional healers transferred the knowledge of indigenous healing through (demonstration and observation) while the least transferred the knowledge through (demonstration and practice).

On the preservation of indigenous knowledge, findings showed that majority of traditional healers were training their families and other interested individuals as a way of preserving the knowledge. Results on challenges during acquisition, transfer and preservation of indigenous knowledge revealed that majority of healers did not face any. The minority who faced challenges in acquisition urged that they experienced sickness, difficulties in mastering, segregation and panicking.

## 5.6 Implications of the findings

Practicing indigenous healing in Zambia is associated with negativity as it is perceived to be means through which many individuals practice witchcraft or black magic. Religion has also contributed to the reduction in using IK for healing and learning about its processes. In addition, foreign beliefs and its imposition on Africans have necessitated the damage, leading to extinction of traditional healing. The above perceptions indicate the on-going debates concerning the position of many people with regards to traditional healing. This study therefore adds to the existing theoretical issues that form on-going discussions on acquisition, transfer and preservation of IK on healing in Zambia.

On the other hand, the Ministry of Health and stakeholders such Traditional Healer Practitioners' Association of Zambia (THPAZ), Medical Association of Zambia (MAZ), the Lenje Cultural Association and Mukuni Culture Village Museum and Library should formulate policies and programs that will enhance, inform and improve understanding of local people on acquisition, transfer and preservation of Indigenous Medical Knowledge.

#### **CHAPTER SIX**

#### CONCLUSION AND RECOMMENDATIONS

#### **6.1 Overview**

While many traditional healers took part in revealing the processes through which they acquired, transferred and preserved indigenous knowledge on healing, some still felt that the practise and all its processes were very confidential to be shared.

#### **6.2 Conclusion**

Nevertheless, concerning acquisition and transfer of indigenous knowledge the study revealed that the majority of healers acquired knowledge through training. The training involved two processes, the first one was through mastering and practising while the second involved demonstration and mediation. On the other hand, a minimal number of healers acquired the knowledge through calling. Among the healers who were called, the study revealed that there were four ways used to discern the calling namely sickness, revelation, confirmation and revelation and sickness. The study also established that majority of trained healers were females while the least were males, it can further be said that females were much willing to be trained as healers than males. This can be noted from the fact that most males were rather called than trained to be healers. Findings on transfer revealed that majority of traditional healers transferred the knowledge of indigenous healing through (demonstration and observation) while the least transferred the knowledge through (demonstration and practice). The findings further revealed that majority healers had knowledge transferred to them by observation through demonstration while the least received by training through practice. On the preservation of indigenous knowledge, findings showed that majority of traditional healers were training their families and other interested individuals as a way of preserving the knowledge. The methodologies implored in the process of training involved demonstration, documentation as well as mastering. Finding of this study on challenges during acquisition, transfer and preservation of indigenous knowledge revealed that majority of healers did not face any. However the minority who faced challenges in acquisition urged that they experienced sickness, difficulties in mastering, segregation and panicking. During transfer, unwillingness to learn, jealous and time consuming were the stressed challenges. Furthermore, unwillingness, expiration and spirituality were the noted challenges during preservation.

#### **6.3 Recommendations**

- 1. There is need for community leaders in Chibombo district to consider educating the local youths during ceremonial gatherings on the need to acquire and preserve indigenous practices. Similarly, the aged traditional healers especially those called by the spirits should be encouraged to share the knowledge revealed to them to avoid extinction of such knowledge when they die. This could be means through which unwillingness to learn and share can be reduced.
- 2. There is need for collaborative efforts between community leaders and traditional healers to document most of the indigenous medicine and the ailments they heal. This may help reduce difficulties in mastering and panicking among the would-be healers.
- 3. The Lenje Cultural Association should consider documenting and disseminating information to the local people by showcasing what is available in the Mukuni Culture Village Museum and Library. This could encourage many youths to appreciate the indigenous values in their culture.

#### **6.4 Suggestions for Further Research**

It is clear that the area of this study is wide and need further detailed studies. The following are the recommendations for further researches.

- 1. There is need to conduct a study that intends to look at the implications of acquisition and transfer of indigenous medical knowledge on copyrights protection.
- 2. There is need to conduct separate in-depth studies on trained healers and those called to critically assess the differences and similarities of the nature of acquisition and transfer procedures of their practices.

#### REFERENCES

- Abioye, A., Zaid, Y., & Egberongbe, H. S. (2011). Documenting and Disseminating Agricultural Indigenous Knowledge for Sustainable Food Security: The Efforts of Agricultural Research Libraries in Nigeria. *Meeting of 78-Information Systems for Indigenous Knowledge in agriculture*. Retrieved August 28th, 2020, fromhttp://conference.ifla.org/past-wlic/2011/78-abioye-en.pdf [2020, November 20].
- Adachi, Y. (2011). An examination of the SECI Model in Nonaka's Theory in terms of TEAM Linguistic Framework. Available at: http://www.yamanashi-ken.ac.jp/wpcontent/uploads/kgk2011002.pdf [2020, May 20].
- Agrawal, A. (1995). Dismantling the divide between indigenous and scientific knowledge. *Development and Change*, 26(3):1-40.
- Ambrosetti, A., & Dekkers, J. (2010) "The interconnectedness of the roles of mentors and mentees in pre-service teacher education mentoring relationships." *Australian Journal of Teacher Education* 35.6: 3.
- Anwar, M.A. (2010). Role of information management in the preservation of indigenous knowledge. *Pakistan Journal of Library and Information Science*. Available at: http://www.faqs.org/periodicals/201001/2155571431.html (Accessed 9 August 2020).
- Anyaoku E, Obianuju E. Nwafor-Orizu & Ebere A. Eneh (2015). Collection and Preservation of Traditional Medical Knowledge: Roles for Medical Libraries in Nigeria. *Journal of Library and Information Sciences June 2015, Vol. 3, No. 1, pp. 33-43ISSN 2374-2372* (Print) 2374-2364 (Online) URL: http://dx.doi.org/10.15640/jlis.v3n1a2 [2020, April 14]
- Alexander et al (2015). Knowledge in traditional medicine and its contribution to rural development: case study Totonac region. Vol. 6, p1791-1805.
- Bagwana, P. (2015). Indigenous Knowledge of traditional medicine: answering the question of knowledge acquisition and transmission among the traditional health practitioners in Uganda. *Journal of Anthropology*, (1), 13-32 doi 10.1501/antro\_0000000318.

- Barnhardt, R, & Kawagley, O. (2005). Indigenous knowledge systems and Alaska Native ways of knowing. *Journal of Anthropology and Education Quarterly, Vol.36, Issue 1, pp. 8-23.*
- Battiste, M., & Henderson, J. Y. (2000). *Protecting indigenous knowledge and heritage: A global challenge*. Saskatoon, Canada: Purich.
- Berends, H., Garud, R., Debackere, K., & Weggeman, M. (2011). Thinking along: A process for tapping into knowledge across boundaries. *International Journal Technology Management*, 53(1), 69-88.
- Birks, M., and Mills, J., (2011). Grounded theory: a practical guide. Sage Publications, Inc.
- Biyela, A., N. (2016). The management and preservation of indigenous knowledge in dlangubo village in KwaZulu-Natal, South Africa. (Doctorate Dissertation, University of South Africa, 2016).
- Bojuwoye, O. (2005). Traditional healing practices in Southern Africa: ancestral spirits, ritual ceremonies, and holistic healing. In: R Moodley & W West (eds.). *Integrating Traditional Healing Practices into Counselling and Psychotherapy*, edited by University of South Africa: Sage. 61-71.
- Cajete, G. (2000). *Native Science: Natural Laws of Interdependence*. Sante Fe, NM: Clear Light Publishers.
- Central Statistical Office (2010), 2010 Census of Population and Housing Preliminary Report, Lusaka: Government of the Republic of Zambia.
- Chakravarty, R. (2010). Preserving traditional knowledge: Initiatives in India. *IFLA Journal* 36(2010): 294-299.
- Chigada, J. & Ngulube, P. (2015). Knowledge management practices at selected banks in South Africa. South African Journal of Information
- Chisenga, J. (2002). Indigenous knowledge: Africa's opportunity to contribute to global information content. *South African Journal of Libraries and Information Science*, 68(1):16–22. Available: https://doi.org/10.7553/68-1-759 [2019, November 9].
- Cyr, S. & Choo, CW. (2010). The individual and social dynamics of knowledge sharing: an exploratory study. *Journal of Documentation*, 66(6): 824 846.
- Dhewa, C (2008). *Is traditional medical practice in Africa still community property? Lessons from Zimbabwe*. 1-16

- $https://dlc.dlib.indiana.edu/dlc/bitstream/handle/10535/2172/Dhewa\_104101.pdf?sequence=1$
- Dei, George S. (2002). "Rethinking the role of IKS in the academy", *International Journal of Inclusive Education* 4.2 (2000): 111-32.
- Dempsey, M. (2000) *Ethical profit: An agenda for consolidation for radical change*. Vol 11, issue 5 p 515-648.
- Denis, P. (2006). 'The rise of traditional African religion in post-apartheid South Africa', *Missionalia*, Vol. 34, Nos. 2–3, pp.310–323.
- Faust, B. (2007). *Implementation of tacit knowledge preservation and transfer methods*. Available at: http://www.fraserhealth.ca/media/Implementation-of-Tacit-Knowledge-Presevation-and-Transfer-Methods.pdf (Accessed 27 October 2020).
- Flavier, J.M. (1995). The regional program for the promotion of indigenous knowledge in Asia In. D.M. Warren, L.J. Slikkerveer and D. Brokensha (Eds.) *The Cultural Dimension of development: Indigenous Knowledge Systems*. London, Intermediate Technology Publications. Pp 479-487.
- Garavelli; AC, Gorgoglione, M & Scozzi, B. (2002). Managing knowledge transfer by knowledge technologies. *Technovation* 22: 269–279.
- Gelfand, M., Mavi S, Drummond R & Ndemera B. (1985). The Traditional Medical Practitioner in Zimbabwe, Mambo Press: Gweru, Zimbabwe.
- Gcabashe, A. (2009). *Differences between isangoma neNyanga*. Available at http://www.mphutungwane.co.za/community/index.php?option=com\_content&view=artic le&Id=45:iz angoma\_vs\_izinyanga&catid=58: myths [accessed 30 June 2020].
- Goma, F. et al (2016). Indigenous Knowledge Systems for the treatment of Hypertension in Lusaka, Zambia: Perceptions, Knowledge and Practice. *Medical Journal of Zambia, Vol. 43 (3): pp 156 166.*
- Gorjestani, N. (1998). Indigenous Knowledge for Development, Opportunities and Challenges. 1–8.
- Grbich, C. (2007). *Qualitative data analysis, an introduction*. London, Sage Publication: Chennai, India.
- Herman, B.M (2013). Preserving and transmitting indigenous knowledge in diminishing biocultural environment: Case studies from Botswana and Tanzania. *African*

- Study Monographs (2013), 34(3): 161-173https://doi.org/10.14989/185088 [2020, April 14].
- Ijumba, P. & Barron, P. (2005). South African Health Review, Health System Trust, http://www.hst.org.za/publications/south-african-health-review-2005 [2020, June, 24).
- Issa, A. Owoeye, O & Awoyemi, O (2018). Attitudes and the practice of documentation of indigenous knowledge by the traditional health practitioners in Kwara state, Nigeria. (2018). *Library Philosophy and Practice (e-journal)*. 1678.
- Kaniki, A.M. & Mphahlele, M.E.K. (2002). Indigenous knowledge for the benefit of all: can knowledge management principles be used effectively? *South African Journal of Libraries and Information Science* 68(1):1-15.
- Kantini, S. (2012). Community and Academic Perceptions of the University of Zambia Post graduate education as a learning system for local community sustainable development in Zambia. (Masters Dissertation, the University of Zambia, 2012).
- Kashweka, K. and Akakandelwa, A. (2008). Indigenous knowledge and the attainment of MDG's in Africa: Opportunities and challenges. Eighteenth Standing Conference of East, Central and Southern African Library and Information Association: Proceedings. Lusaka: Zambia Library Association.
- Kawagley, A. O. (1995). A Yupiaq Worldview: A Pathway to Ecology and Spirit. Prospect Heights, IL: Waveland Press.
- Kidane, B. et al (2014). Use and management of traditional medicinal plants by Maale and Ari ethnic communities in southern Ethiopia. *Journal of Ethnobiology and Ethnomedicine*, 10:46 http://www.ethnobiomed.com/content/10/1/46,[2021, September 30].
- Kombo, D. and Tromp, D. (2006). *Proposal and thesis writing: An introduction*, Nairobi: Paulines Publications Africa.
- Koskinen, K.U., Pihlanto, P. and Vanharanta, H. (2003) 'Tacit knowledge acquisition and sharing in a project work context', *International Journal of Project Management*, Vol. 21, pp.281–290.
- Liao, S, Wu, C, Hu, D & Tsui, K. (2010). Relationships between knowledge acquisition, absorptive capacity, and innovation capability: an empirical study on Taiwan's

- financial and manufacturing industries, *Journal of Information Science*, 36(1):19-35.
- Lumpa, M. (2017). "Placing value on indigenous knowledge practices." *Zambian Daily Mail Newspaper*. February, 18<sup>th</sup>.
- Lwoga, E. T., Ngulube, P., & Stilwell, C. (2010). 'Understanding indigenous knowledge: Bridging the knowledge gap through a knowledge creation model for agricultural development. *South Africa Journal of Information Management*, 12 (1), 8.
- Maila, M.W. & Loubser C.P. (2003). Emancipatory indigenous knowledge systems: implications for environmental education in South Africa. *South African Journal ofEducation* 23(4):276-280.
- Mail, D. (2014). "Chibombo: an agro-based district." *Daily Mail Newspaper*, October 8<sup>th</sup>, 2014.
- Maluleka, J., R. (2017). Acquisition, transfer and preservation of indigenous knowledge by traditional healers in the Limpopo province of South Africa. (Doctorate dissertation, University of South Africa, 2017).
- Maluleka, J.R. & Ngoepe, M. (2018). Accumulation of cultural capital: the acquisition of indigenous knowledge by traditional healers in the Limpopo province of South Africa. *International Journal of Knowledge Management Studies* Vol. 9, No.3, pp. 278-292.
- Makinde, O.O. & Shorunke, O.A. (2013). Exploiting the values of indigenous knowledge in attaining sustainable development in Nigeria: the place of the library. *Library Philosophy and Practice* (e-journal). Available at: http://digitalcommons.unl.edu/libphilprac/908 [Accessed 29 April 2019].
- Matsika, C. (2015). The education of traditional healers in Zimbabwe: Pedagogy of conflicting paradigms. *The Journal of Pan African Studies, Vol.8, no.8 Number:* 60-74.
- Mawere, M. (2014). Culture, Indigenous Knowledge and Development in Africa: Reviving Interconnecting for Sustainable Development. Bamenda: Langaa Research & Publishing CIG.
- McMahon, K. 2015. Knowledge preservation for repository systems, paper presented to the *ANS International High Level Radioactive Waste Management Conference April 13 16, 2015*, Charleston, South Carolina.

- Mehta, K., Alter, T. R., Semali, L. M., & Maretzki, A. (2013). AcadmIK Connections: Bringing Indigenous Knowledge and Perspectives into the Classroom. *Journal of Community Engagement and Scholarship*, 6(2), 83-91.
- Ministry of Health (2019). National Community Health Strategy 2019-2021. Community Health Driving Primary Health Care for Universal Health Coverage. https://www.moh.gov.zm/?wpfb\_dl=68
- Moustakas, C (1994) Phenomenological Research Methods. Newbury Park, CA: Sage.
- Msuya, J. (2007). Challenges and opportunities in the protection and preservation of.

  \*International Review of Information Ethics, 7 (9).
- Mulungushi Report (1977). *National Workshop on Traditional Medicine in Zambia*: Lusaka: Mulungushi Conference.
- Munsanje, V and Mulauzi, F (2013). Local knowledge preservation and dissemination in Zambia: Opportunities and challenges. *Paper presented at the 3rd Indigenous Knowledge Systems (IKS) International Conference on Information, Records and Archives in a Knowledge Society*, Victoria Falls, Zimbabwe, 6-8 August, 2013.
- Mutasa, D., Nyota, S and Mapara, J. (2008). "Ngano: Teaching Environmental Education Using Shona Folktale," in *The Journal of Pan African Studies* Vol.2 No 3 pp33-54.
- Muyenga, T, A., Musonda, D & Chigunta, M. (2018). Ethnobotanical. Survey of Medicinal Plants Used In Treatment of Diabetes in Chipulukusu Compound, Ndola District, Zambia. *Journal of Preventive and Rehabilitative Medicine*, Vol. 1, No. 1, 2018, pp. 39-44. doi: 10.21617/jprm.2018.0101.5.
- Mvula, S. (2015). Health practitioners nod Bill on regulation. *Zambian Daily Mail Newspaper*, September, 12<sup>th</sup>.
- Neuman, WL. (2011). Social research methods: qualitative and quantitative approaches. 7th ed., Boston: Allyn and Bacon.
- Neuman, WL. (2006). Social research methods: qualitative and quantitative approaches. 6th ed., Boston: Allyn and Bacon.
- Ngulube P, Mathipa, ER & Gumbo, MT. 2015. Theoretical and conceptual framework in the social sciences. In: Mathipa ER, Gumbo MT(eds.) *Addressing Research Challenges: Making headway in developing researchers*. Mosala-MASEDI Publishers & Booksellers cc: Noordywk, :43–66.

- Nonaka, I. & Takeuchi, H. (1995). The knowledge-creating company. How Japanese companies create the dynamics of innovation. New York: Oxford University Press.
- Nonaka, I. & Toyama, R. (2003). The knowledge-creating theory revisited: knowledge creating as a synthesizing process. *Knowledge Management Research & Practice* (1):2-10.
- Nonaka, I., Toyama, R., &Hirata, T. (2008). Managing Flow, A Process Theory of Knowledge Based Firm. *Palgrave Macmillan*.
- Nonaka, I. (1994). A Dynamic Theory of Organizational Knowledge Creation. *Organization Science*, 5(1):14-37.
- Nyundu, T & Naidoo, K. (2016). Traditional healers, their services and the ambivalence of South African youth. *Commonwealth Youth and Development*, Vol. 14, No. 1, pp. 144-155.
- Ocholla, D. (2007). "Marginalized knowledge: an agenda for indigenous knowledge development and integration with other forms of knowledge", *International Review of Information Ethics* 7(2007):237-243.
- Okore, A.M., Ekere, J. N., & Ekere, E. H. N. (2009). Promoting access to indigenous knowledge in the digital age: libraries as facilitators. Paper presented at the Nigerian Libraries Association 47th Annual General Conference 2009, Ibadan, Oyo State. 26-31 July 2009 (p. a). Available: file:///C:/Users/yunnusf/Downloads/fulltext\_stamped%20 (4).pdf [2020, June 18].
- Olatokun, W.M., (2010). Indigenous knowledge of traditional medical practitioners in the treatment of sickle cell anaemia, *Indian Journal of Traditional Knowledge* 9(1), 119–125.
- Pacharapha, T & Ractham, VV. 2012. Knowledge acquisition: the roles of perceived value of knowledge content and source. *Journal of Knowledge Management*, 16(5): 724-739.
- Pooorna, R., Mymoon, M & Haiharan, A. (2014). Preservation and protection of tradtional knowledge diverse documentation initiations across the globe, *Current Science Journal*, Vol.107, No.8, 1240-1246.
- Sambunjak, D, Sharon E.S, & Marušić, A. (2006) "Mentoring in academic medicine: a systematic review." In *Jama* 296.9 pp 1103-1115.

- Senanayake, S. G. J. N. (2016). Indigenous knowledge as a key to sustainable development.

  \*\*Journal of Agricultural Sciences, 2(1), 87. https://doi.org/10.4038/jas.v2i1.8117
- Shikabi, P. (2013). Factors hindering primary healthcare delivery in Chibombo District. (Master Dissertation, University of Zambia, 2013).
- Sithole, J. (2007) The Challenges Faced by African Libraries and Information Centres in Documenting and Preserving Indigenous Knowledge. *IFLA Journal 33: 117–123* retrieved from <a href="http://ifl.sagepub.com/cgi/content/abstract/33/2/117">http://ifl.sagepub.com/cgi/content/abstract/33/2/117</a>. [2020, February 3].
- Smith, E. A. (2001). The role of tacit and explicit knowledge in the workplace. *Journal of Knowledge Management*, 5 (4), 311-321.
- Snelson, P.D. (1974). Educational development in Northern Rhodesia, 1883-1945. Lusaka: National Educational Company of Zambia.
- Stevens, A. (2008). A different way of knowing: tools and strategies for managing indigenous knowledge. *Libri: International Journal of Libraries & Information Services*, 58(1):25–33.

  Available:http://citeseerx.ist.psu.edu/viewdoc/download?doi=10.1.1.620.7282&re p=rep1&type=pdf [2020, March 3].
- Struthers R, Eschiti, V.S., & Patchell, B (2004). Traditional Indigenous healing: Part I.

  \*Complementary Therapies in Nursing & Midwifery (2004) 10, 141–149.
- Szulanski, G. (1996). Exploring internal stickiness: Impediments to the transfer of best practice within the firm. *Strategic Management Journal*, 17, 27-44.
- Szulanski, G. (2000). The process of knowledge transfer: A diachronic analysis of stickiness. Organizational Behavior and Human Decision Processes, 82(1), 9–27.
- Tabuti, J.R.S (2004). The status of wild food plants in Bulamogi County, Uganda. International Journal of Food Sciences and Nutrition 55, 485-498.
- Teffera, D.& Altbach, P.G. (eds.). (2003). Africa Higher Education: An Interational Reference Book. Bloomington: Indian University Press.
- Truter, I. (2007) 'African traditional healers: cultural and religious beliefs intertwined in a holistic way', *South African Pharmaceutical Journal*, Vol. 74, No. 8, pp.56–60.
- Twaumasi, P. A. (1983). Focus for the Medical Sociologist. IAS. Lusaka

- UNAIDS (2002). Ancient Remedies New Disease: Involving Traditional Healers in Increasing Access to AIDS Care and Prevention in East Africa. 20 Avenue Appia. Switzerland.
- UNESCO (2017). Saich selected elements. <a href="http://saich.orgldata/data/api/saich">http://saich.orgldata/data/api/saich</a> [2021, October 7]
- Van de Wal, N. (2013). The process of tacit knowledge transfer: An empirical study on managing the transfer of tacit knowledge in innovation projects. (Master Dissertation, Tilburg University, 2013).
- Wyatt, J. C. (2001). Management of explicit and tacit knowledge. *Journal of the Royal Society of Medicine*, 94, 6-9.
- Zazu, C. (2007). Exploring Opportunities and Challenges for achieving the integration of Indigenous Knowledge Systems into Environmental Education processes: A case study of the Sebakwe Environmental Education programme (SEEP) in Zimbabwe (Masters Dissertation, University of Rhodes, 2007).
- Zuma, T. et al (2016). The role of traditional practitioners in rural KwaZulu-Natal, South Africa: generic or mode specific? *BMC Complementary and Alternative Medicine 16:304* DOI 10.1186/s12906-016-1293-8 [2021, October 5].

## **APPENDIX: INTERVIEW GUIDE - ENGLISH**

My name is Mvula Dalitso. I am conducting this interview as a survey in partial fulfilment of my postgraduate studies at the University of Zambia in the Department of Library and Information Science (DLIS). I am seeking information from you on the acquisition, transfer and preservation of Indigenous Knowledge in Chibombo District of Zambia. Please note that such information and opinion will be purely used for academic purposes and be treated with maximum confidentiality.

## **SECTION A: GENERAL INFORMATION**

1. Gender
Male Female
2. Age range
20-25 $26-30$ $31-35$ $36$ and Above
3. For how long have you been using traditional knowledge on healing?
0-2 $3-5$ $6-8$ 9 and More
SECTION B (i): KNOWLEDGE ACQUISITION
4. How did you become a traditional healer?
If your response to question (4) above is by training;
5. How and why did you select your mentor?
6. How long did it take you to complete your training?

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••••	
7.	What was your major activity during training?
•••	
• • • •	
• • • •	
0	Did and the state of the state
8.	Did you master everything that was shown to you? Please explain
• • •	
• • • •	
9.	How involved were you during the healing process the time you were a trainee?
•••	
• • •	
10.	What are the methods used to share experiences during training?
• • • •	
•••	
11	What more can you add with regards to how you acquired knowledge of traditional
11.	What more can you add with regards to how you acquired knowledge of traditional
	healing?
•••	
• • •	

If	f your response to question (4) above was by calling;
12. H	Iow did you know that you were called to be a traditional healer?
••	
	Oid you seek any guidance from anyone who helped you to confirm that you were
b	eing called to be a traditional healer?
••	
••	
••	
 14 H	Iow did you gain the knowledge on how to treat patients that seek your help?
11.11	tow and you gain the knowledge on now to treat patients that seek your heip.
SECTIO	ON B (ii): KNOWLEDGE TRANSFER
	15 and 16 to be answered by those who were trained to be healer as indicated
on quest	ion (4) of Section B (i).
15. H	low do you transfer skills and knowledge of traditional healing to your trainees?
16 11	
16. H	ow was the knowledge of traditional healing transferred to you?
16. V	What is the nature of your relationship with other healers?

17. What are the methodologies employed to transfer knowledge among healers?
18. How common is knowledge sharing among traditional healers?
SECTION D: KNOWLEDGE PRESERVATION
SECTION D: KNOWLEDGE PRESERVATION  19. How do you make sure that the knowledge you gained over the years is preserved for use in the future?
19. How do you make sure that the knowledge you gained over the years is preserved for
19. How do you make sure that the knowledge you gained over the years is preserved for
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19. How do you make sure that the knowledge you gained over the years is preserved for use in the future?
19. How do you make sure that the knowledge you gained over the years is preserved for use in the future?

SECTION E: CHALLENGES
22. What challenges do you face with regards to knowledge acquisition about healing?
23. What challenges do you face with regards to knowledge transfer about healing?
24. What challenges do you face with regards to knowledge preservation about healing?

# INTERVIEW GUIDE - BWENDEBWAMIPUSHOMUMUBANDI (LENJE)

# GENERAL INFORMATION- BUNJI BWAMAKANI

1. Gender - Bubo bwa muntu
Male - Musankwa Female - Mwanakashi
2. Age Range – Myaka Yakushalwa
20 – 25 26 – 30 31 – 35 36 Akuyakunembo
3. For how long have you been using traditional knowledge on healing?
Ciindicilamfu buyanincemwatabatishishamolwiyolwacimuntumukushilikabalwashi? $0-2$ $3-5$ $6-8$ $9$ Akuyakunembo
CHIPANSHA ' B' (1) BWAKUCANALWIYO
4. mwakatalika buyani bushiliki bwacimuntu?
Nabukumbulobwamipusho uyuwalenga 4mbwakuswamulwyiyolwamuchikolo;
5. Mwakasalabuyaniushikumwiishaalimwicakalengancinshi?
6. Ino lwiiyo lwanu lwakatola ciindi cilamfu buyani?

7. Ngumulimonshiunenengomwamwakacitamulwiyolwanukuchikolocabushiliki?
8. Sa mwakeyashoonse ishonshomwakatondeshekwa alimwi akushilama? Twaseng busansulushi
9. Ndubasunshi ndomwakabwesa mubushiliki ciindi ndyemwalinga kuchikolo cabushiliki?
10. Ni nshilanshi nshomwakatabatisha kucafwana aba byanu kutabatisha lushibolwanu
Ciindi ndimwalinga kuchikolo cabushiliki?
11. Nshinshi nshimwinshenga mwaanungawopanshila nshomwakatabatishakucana lwiiyo wabushilikiabwacimuntu?

# Nabukumbulo pamwipusho uyu walenga 4 ngwa cishalilwa; 12. Mwakeshiba buyani kwambayi bushilikibwanu mbwacicishalilwa? . . . . . . . . . . . . . . . 13. Sa kuliumwi muntu wakamutangilila akumucafwilisha ayimushome kwambayi bushilikibwanu mbwacishalilwa? ...... 14. Mwakaba buyani alushibo lwakushilika balwashi abo bayandola lucafwokuswa kulindimwe? ..... ..... CHIPANSHA' C' (2) KUTUNTULUKA KWALWIIYO Mwipushowa **15** 16 a ulyeletekukumbulwaababobakeishikwaamushilikimbulimwipushowa 4 muchipanshacabili (i) 15. Mulatuntulula buyani lushibo alimwi alwiiyo lwabushiliki bwacimuntu kubabo beshikwiya?

16. Ino lwiiyo lwabushiliki lwakatuntululwa buyani kusakulindimwe?

17. Ndunyufwanonshi lulipakatikanu abashiliki bamwi bacimuntu?
18. Ninshilanshi shomutabatisha kutuntulula lwiyopakatikanu nobashiliki bacimuntu?
19. Nshiindi nsinji buyani nshomuntululalwiiyopakatikanunobashiliki bacimuntu?
CHIPANSHA CA "D' KULAMA LWIIYO
20. Mula lama buyani lyiiyondo mwakeyakwa myakainji kwambayi mukalutabatish
kunshikushito sakunembo?

 $21.\ Ninshilanshi\ nshomutabatisha\ kulamalyiiyo\ lwabushiliki?$ 

22. Ninshilanshi nshomutabatisha kwambayi lwiiyo lubotu alimwi lusuniki
lulamwekabotu?
•••••••••••••••••••••••••••••••
CHIPANSHA CA 'E' BUYUMUYUMU BUCANIKA
23. Mbuyumuyumunshimbomucana mukuyandolalwiiyolwabushiliki?
24. Mbuyumuyumunshimbomucanamukutuntululalwiiyolwabushiliki?
25. Mbuyumuyumunshimbomucanamukulamalwiiyolwabushiliki?

# INTERVIEW GUIDE – KEY INFORMANTS (ENGLISH)

My name is Mvula Dalitso. I am conducting this interview as a survey in partial fulfilment of my postgraduate studies at the University of Zambia in the Department of Library and Information Science (DLIS). I am seeking information from you on the confirmation of acquisition, transfer and preservation of Indigenous Knowledge in Chibombo District of Zambia by Traditional Healers living within your villages. Please note that such information and opinion will be purely used for academic purposes and be treated with maximum confidentiality.

1.	Gender
	Male Female
2.	For how have you been on the position of the village headman/women?
	4-8 $9-12$ $13$ and Above
3.	Have you ever been invited to witness any form of knowledge acquisition and transfer with regards to traditional healing?
4.	If your response is 'yes' to question 3 above, in what ways is knowledge of healing acquired?
5.	If your response is 'yes' to question 3 above, in what ways is knowledge of healing transferred?

6.	How would you rate the nature of relationship among the healers in your villages and
	beyond?
7.	In your own observation, what methods do traditional healers use in order to preserve
	the knowledge of healing?
8.	What shallonges have observed over the years regarding acquisition transfer and
0.	What challenges have observed over the years regarding acquisition, transfer and
	preservation of the knowledge of healing?

# BWENDE BWAMIPUSHO – BANENE KWAKUSWA MAKANI (LENJE)

1.	Bubo bwa muntu
	Musankwa Mwanakashi
2.	Mwekala myaka yongaye pa cuuna ca bu nduna?
	4 – 8
3.	Sa mwaka canikako kale mukwiya olo mukutuntulula lwiiyo lwa bushiliki lwa ci muntu?
4.	Namwa sumina mubukumbulo bwa 3,ino ninshilanshi nshomutabatisha kucaninamo
	lwiiyo lwa bushiliki bwa ci muntu?
5.	Namwasumina mubukumbulo bwa 3,ino ninshilanshi nsho mutabatisha
	kutuntulwitamo lwiiyo ulu kuya kubamwi bantu?
6.	Ino lunyufwano pakati ka bashiliki ba cimuntu mimishi yanu palwabo alimwi ababo
	bakusengwe luli buyani?
7.	Mukulanga kwanu,ninshilanshi bashiliki ba ci muntu nsho batabatisha mukulama
1.	lwiiyo lwa bushiliki kwamba ayi lutakalobi?

	••••		•••••				• • • • • • • • • • • • • • • • • • • •		
	••••			•••••					
8.	Ku	myaka	yoonse	iyi	yainda,ml	ouyuyumu	nshi	mbomwabona	mukucana
	lwii	yo,mukut	untulula l	wiiyo	alimwi aku	ılama lwiiy	o ulu k	wambayi lutakal	obi?