An audit of calls to a free South African mental health call centre

by

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DECLARATION

I hereby declare that the work in this mini-dissertation is my own, and an original submitted for the sole purpose of completing an MA Clinical Psychology Degree at the University of Pretoria. Where secondary sources have been utilised, they have been duly acknowledged and referenced according to university standards, to the best of my ability.

10 August 2017

SIGNATURE DATE

DEDICATION

If I can stop one heart from breaking,

I shall not live in vain.

If I can ease one life the aching

Or cool one pain

Or help one fainting robin

Unto his nest again,

I shall not live in vain.

Emily Dickinson

Above all, it is my sincerest hope that the work in the pages that follow can make a tangible contribution in easing the path to care for people who need help in carrying the weight of their reality.

This research is dedicated to the thousands of people who reach out to these mental health helplines every year – may their bravery continue and may what they find at the other end of the line be of great value and comfort.

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To my loved ones

You encouraged through the setbacks and delighted in the triumphs, as if your own – for that I am immeasurably grateful.

ABSTRACT

In South Africa, 1 in 3 people experience mental illness during their lifetime, at least 1 in 10 non-natural deaths are due to suicide, and poverty, crime, and HIV are common local psychosocial stressors. Despite this, it is estimated that only 5% of the national health expenditure goes towards mental health, and that nearly 75% of those with a mental health condition are not treated. Within this context exists an NPO offering free national mental health helplines, yet little is known about the population accessing this resource, the nature of difficulties reported, and the kind of assistance provided. Aiming to address this knowledge gap, the present exploratory mixed methods archival research is based on a sample (N = 300) of telephone counselling records from February and March 2017. The results of descriptive, inferential, and content analyses indicate that callers to the NPO's helplines were mostly female, aged 20 to 29, of Black race, and from the province of Gauteng. The discovery of significant associations between certain variables shows that the profile of callers may vary depending on the race of a caller, as well as the day and time of a call. The majority of people called due to self-related concerns, most often mental illness and interpersonal problems. The NPO predominantly assisted callers with referrals to other resources, mainly support structures and counselling services provided by other informal community organisations. The findings provide valuable feedback to the NPO. They further suggest a heavy reliance on the informal non-profit sector, and a need for mental health support and counselling services. A larger study is needed to expand on these exploratory findings.

Keywords: mental health; helpline; call centre; telephonic counselling; caller demographics; South Africa; informal community care; NPO; pathway to care; free resource

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LIST OF ABBREVIATIONS

APA	–	American Psychological Association
HIV	–	Human immunodeficiency virus
IT	–	Information technology
LMIC	–	Low- and middle-income countries
NGO	–	Non-governmental organisation
NPO	–	Non-profit organisation
PTSD	–	Post-traumatic stress disorder
SASH	–	South African Stress and Health Study
SEM	–	Social Ecological Model
UK	–	United Kingdom
USA	–	United States of America
WHO	–	World Health Organization

Chapter 1: Introduction

1.1 Introduction

In South Africa, mental health is a low priority (Lund, Kleintjes, et al., 2008), yet psychiatric conditions affect a substantial portion of the country's population (Eskell Blokland, 2014; Herman et al., 2009), and over 1 in 10 non-natural adult deaths are due to suicide (Schlebusch, 2012). While a minority of those affected by mental illness receive formal treatment (Seedat et al., 2008), an identified local non-profit organisation (NPO) receives hundreds of calls per day through its national mental health call centre. This free community resource has a wide reach, receiving millions of Rands' worth of free media coverage per month, and engaging in a multitude of mental health advocacy campaigns. Despite the NPO's work within a sector that is largely neglected, little is known about the population accessing its telephonic counselling service and the nature of assistance provided by the organisation through its call centre. No formal research had yet been undertaken into the NPO's helplines, other than a study on the suicide crisis line specifically.

The purpose of the current study was to redress this lack of knowledge by exploring who is calling the NPO's mental health call centre and when, what difficulties these people present with, and the help they receive through the telephonic counselling service. Such an investigation would further our understanding of this population, as well as offer valuable feedback to the NPO, which can be beneficial for the planning and implementation of its future initiatives.

1.2 Research Problem

The most recent study conducted into the prevalence of mental disorders in South Africa reported that 30.3% of the population experience a mental disorder during the course of their

lifetime, with a 12-month prevalence rate of 16.5% (Herman et al., 2009). One of the limitations of this research was that not all psychiatric disorders were included, which means that prevalence rates could be even higher than those the study reported. After human immunodeficiency virus (HIV) and other infectious diseases, neuropsychiatric conditions are the third highest contributor to the local burden of disease (Bradshaw, Norman, & Schneider, 2007), and the World Health Organization (WHO) (2008) identified neuropsychiatric conditions as one of the most prominent causes of disability across world regions. Furthermore, up to 50% of people infected with HIV are also living with a mental illness (Eskell Blokland, 2014).

Despite these alarming statistics, it has been estimated that nearly 75% of South Africans with a psychiatric condition do not receive treatment (Seedat et al., 2008). While comprehensive research is lacking – it is estimated that only 5% of the national health expenditure goes towards mental health (WHO, 2007b), which is closely interlinked with general health conditions, plays a vital role in early childhood development, and has a powerful impact on the national economy (Eskell Blokland, 2014).

In addition to the high prevalence but poor management of psychiatric conditions in South Africa, the local challenges of unemployment, poverty, and violent crime have been associated with mental ill-health (Lund et al., 2011). Thus, aside from those who can be clinically diagnosed with a psychiatric disorder, it is likely that many more South Africans experience daily stressors that can lead to psychological distress.

Against this backdrop, a local NPO is providing mental health support in the country, but not much is known about the community that is accessing its services. Exploring who is using this free mental health resource and when, why they are seeking help, and where they are being directed for further assistance can help to foster understanding about the people

accessing this service, their mental health-related needs, the function of this service as a pathway to care, and the nature of interventions that may be most useful in future within the local context. Further investigating whether any of the variables observed are significantly related can lead to greater insight into the population accessing the mental health helplines. As no informed consent is sought from the NPO's service users at the time of their contact with the organisation, the NPO's name is not revealed in this mini-dissertation, and the NPO anonymised the data before handing it over to the researcher for analysis.

1.3 Research Question

What are the demographics of callers to a nationwide South African mental health call centre, when do they call, why do they make contact, how are they assisted, and does the data reveal any significant associations?

1.4 Research Aim

This study's overarching aim was to develop a profile of the helpline users of a South African national mental health call centre, to identify when they call and the difficulties they face, and to determine how these callers are assisted and where they are referred for further aid. Through this study, the researcher sought to deepen understanding of the portion of people in the country who are seeking help for mental health-related issues.

1.5 Research Objectives

Objective 1: To establish the demographic details of callers.

Objective 2: To examine when calls were received.

Objective 3: To determine whom the callers were concerned about.

Objective 4: To assess the concerns callers presented with.

Objective 5: To ascertain how callers were assisted.

Objective 6: To identify where callers were referred for further help.

Objective 7: To explore whether any significant inter-variable associations exist.

1.6 Research Justification

As previously discussed, South Africa has high 12-month and lifetime prevalence rates of psychiatric disorders (Herman et al., 2009) and concerning levels of psychological trauma. Research reveals high rates of violence-related victimisation, with over 55% of the population experiencing two or more traumatic events (Williams et al., 2007). Despite these statistics, the country has poor mental healthcare (Burns, 2011), low treatment rates (Seedat et al., 2008), and needs more mental health research and evidence-based services (Lund, Stein, et al., 2008; Sorsdahl, Stein, & Lund, 2012). The desired local move towards community mental healthcare and interest in task-shifting demand greater research-based exploration of existing community resources and how they can potentially be best utilised. Against this backdrop, this study stands to make a valuable contribution by both expanding on existing knowledge about people in South Africa who are affected by mental health issues, and by offering helpful feedback to the NPO that runs the mental health call centre service. Furthermore, the findings of this study can serve as a base for future research, as well as be used to guide the development of new bottom-up community mental health interventions.

1.7 Research Design

This archival research adopts a mixed methods approach within a pragmatic paradigm (Creswell, 2014). It combines qualitative content analysis of mental health call centre

records, with quantitative statistical analysis in a concurrent manner, with both of equal priority (Creswell & Plano Clark, 2011).

Exploring variables as they naturally exist, this research employs inductive reasoning, beginning by gathering facts through observation, drawing conclusions, and then moving towards the possibility of making generalisations about the research population (Brink, Van Der Walt, & Van Rensburg, 2012).

1.8 Ethical Considerations

Throughout the research process, the ethical guidelines of the University of Pretoria have been observed. Written consent was provided by the mental health NPO for the use of their existing data as part of this research, which was required for ethical approval of this study. As informed consent is not requested from callers to the NPO's helplines, all personal details were removed from records before the data was handed over to the researcher, and the name of the participating NPO is not revealed in this mini-dissertation. All service users have thus remained anonymous, eliminating any personal risk of being associated with this research. Furthermore, the nature of this study and its possible findings do not pose any form of threat to people in South Africa who have made, are, or will be making use of this service. These considerations are in line with guidelines by the American Psychological Association (APA) (2010), which are applicable when dispensing with informed consent for research. Due to the nature of archival research, especially when it is low risk and anonymity can be maintained, informed consent is often not required (Fisher, 2012; Koocher & Keith-Spiegel, 2008; Roberts & Ilardi, 2003).

The anonymised data supplied by the NPO was only examined by the researcher, her supervisor, and a statistical consultant. The documents have been kept confidential and are being stored as hard copies at 11/23, Humanities Building, University of Pretoria.

Aside from the provision of data and information, the NPO played no role in the research process. The researcher worked as an independent body, under the guidance of her supervisor.

1.9 Definition of Key Concepts

Call centre: In this study, this pertains to an office where high volumes of telephone calls received through various mental health helplines are fielded.

Caller: A member of the public who calls one of the mental health helplines run by the NPO participating in this research.

Containment: The process of easing emotional distress that is facilitated by the volunteer counsellors through their empathic presence during helpline calls.

Counselling call: For the purposes of this research, such a call is defined as one where volunteers provide mental health information, crisis intervention, containment, or general support to a caller who is experiencing psychological distress.

Helpline: A telephone service that, in this study, provides assistance with mental health-related queries.

Mental health: A state of psychological wellbeing where people are able to work and contribute to society, adequately cope with daily stress, and realise their potential (WHO, 2014).

Psychoeducation: In this study, this refers to the provision of information on psychological health, as well as on mental illnesses and their management.

Referral: Directing callers for follow-up to a service separate to those offered by the NPO.

Telephone log sheet: A printed form onto which volunteer counsellors at the mental health NPO record the details of counselling calls they have fielded.

Shift: The volunteer counsellors at the NPO participating in this research work in shifts, which are made up of four-hour periods between 08:00 and 20:00 daily.

Volunteer counsellor: Within the context of this study, this refers to a lay counsellor who has received skills training from the NPO before fielding calls on the NPO's mental health helplines.

1.10 Study Outline

This mini-dissertation is divided into 6 sections, each with its own specific focus:

- *Chapter 1* provides an overview of this study, introducing the problem area, the purpose and nature of this research, as well as its significance.
- *Chapter 2* reviews the existing literature relevant to the present study, offering insight into what has already been researched and thus what is currently known about the research topic.
- *Chapter 3* introduces the theory serving as the framework for this research, which helps to conceptually integrate the different research elements into a coherent whole.
- *Chapter 4* outlines the methodology used to answer the research question, detailing the processes followed in conducting this study.
- *Chapter 5* reports on the results of this study, derived through quantitative and qualitative analyses of the data collected.

- *Chapter 6* offers a discussion of the study's findings, concluding this report with an exploration of the research limitations, and with future-orientated recommendations.

1.11 Chapter Summary

This chapter provides an overview of this research project, set against the background of a current problem in South Africa, which supports the significance of this study. An introduction to the participating NPO further emphasises the practical relevance the research findings can have on the organisation's functioning. The chapter expands into an explanation of the research question, aim, objectives and design, as well as ethical considerations, and key concept. It concludes with an outline of the chapters that comprise this mini-dissertation.

Chapter 2: Literature Review

2.1 Introduction

In the review that follows, existing knowledge relevant to the topic of this research project is presented. To start, background information is provided on the participating NPO, as well as on the mental health of the population it serves, and the major stresses in the environment. To understand how well the population's mental health needs are being attended to, the state of the formal South African mental healthcare system is examined. This is followed by an exploration into what is hindering access to mental healthcare, and how the challenges South Africa is facing can best be tackled, paying particular attention to the role that helplines and NPOs can play. Lastly, a discussion about what kind of mental health research is currently being called for in the country highlights the knowledge that can be helpful in guiding the development of a mental healthcare system that better meets the needs of the population.

2.2 NPO Background

Residing within the informal community care sector as a patient advocacy group, the organisation that runs the mental health call centre is a tax-exempt, Section 21-registered NPO that assists people throughout South Africa with mental health issues. In order to protect members of the public who utilise its services, the organisation will remain anonymous in this text.

Founded in 1994, it originated as a support network for people in the country experiencing mental health problems. Today, the organisation reports that it promotes mental health and advocates against the stigma surrounding mental illness through psycho-educational material distributed to the public, an informative website, newsletters, social

media activity, media campaigns, school talks, employee wellness days, workshops and training programmes, as well as countrywide support groups.

While the NPO's work is widespread, at its heart is a national call centre located in Johannesburg, currently consisting of 13 mental health-related helplines, the majority of which are toll-free. These lines are advertised as contact details for the NPO on official platforms, and are promoted through the organisation's media campaigns. Receiving a variety of calls through the call centre, the NPO has trained volunteers who staff the helplines and reroute calls to the appropriate divisions. The volunteers' main role, however, is to assist with counselling calls, as well as counselling-related queries that the NPO receives through dedicated SMS lines, and via email or social media messages. Counselling calls are defined as those where volunteers provide mental health information, crisis intervention, containment, or general support to a caller who is experiencing psychological distress. For such calls, the volunteers record the details onto telephone log sheets (see Appendix A), including biographical information, a summary of the call and the kind of assistance provided to the caller, such as where they may have been referred to for further assistance. Each year, the organisation trains hundreds of volunteers to staff the call centre, and these volunteers vary in age, race, background, and experience within the psychology field. In order to understand the population the call centre serves and the function it is performing, it is important to examine the context within which it operates.

2.3 Psychological Health of South African Population

Local research reveals that a substantial portion of the population is affected by psychiatric disorders. Almost 1 in 3 South Africans will experience a psychiatric disorder during their lifetime (Herman et al., 2009), with 17% of children and adolescents affected (Kleintjes et al.,

2006). This high prevalence is accompanied by a relatively early age of onset, with few differences observed between ethnic groups (Stein et al., 2008), provinces (Stein et al., 2007), and urban and rural settings (Williams, Herman, et al., 2008). Of adults diagnosed with a mental disorder, 26% were classified as serious, 31% as moderate, and 43% as mild (Williams, Herman, et al., 2008). Furthermore, 22% fulfilled criteria for two disorders, and 8% for at least three, with the severity of cases rising as the number of comorbid diagnoses increased. Men were more likely to have a substance use disorder, and women a mood or anxiety disorder, as well as a severe disorder. Younger age was associated with mood and substance use disorders (Williams, Herman, et al., 2008).

According to Stein et al. (2008), anxiety disorders were the most prevalent (15.8%), with substance use disorders second (13.3%), and mood disorders third (9.8%). In children and adolescents in South Africa, generalised anxiety disorder was most common, followed by post-traumatic stress disorder (PTSD), then major depressive disorder and dysthymia (Kleintjes et al., 2006). One of the central findings of the South African Stress and Health (SASH) study was the substantial substance abuse problem in the country (Williams, Herman, et al., 2008).

Showing a high percentage of violence-related victimisation (Williams et al., 2007), South Africans have also been greatly exposed to psychological trauma (Stein et al., 2007), with almost 75% experiencing a traumatic event during their lifetime (Williams et al., 2007). In a local study by Khasakhala et al. (2011), PTSD was the strongest predictor of suicidality among mental disorders, which were generally found to predict suicidal behaviour. Of South Africans who seriously considered suicide, 61% had a preexisting mental illness (Khasakhala et al., 2011). Locally, 11% of all non-natural deaths relate to suicide and, of non-natural deaths in the youth, 9.5% are due to suicide (Schlebusch, 2012). Common precipitating

factors are psychiatric illness, interpersonal problems, financial problems, academic difficulties, and exposure to violence (Schlebusch, 2012). More on common psychosocial stressors in the local context follows.

2.4 Factors Contributing to Psychological Distress

Internationally, unemployment/low income, income inequality, poverty, and lower social class have been shown to increase the risk of mental illness (Burns, 2013). South Africa faces numerous such contextual difficulties, including social disadvantage conditions, which Patel et al. (2010) link to poor mental health. Lund, Stein, et al. (2008) and Sorsdahl et al. (2012) confirm that poverty, unemployment, lower education levels, crime, interpersonal violence, and HIV are locally relevant risk factors for mental illness. The country also has a high prevalence of trauma related to violence and crime, which is a significant contributor to poor mental health according to the Republic of South Africa Department of Health (2013). Seedat, Stein, et al. (2009) add that recent negative life events and relationship problems are further predictors of mental disorders. The main psychosocial factors associated with suicidal behaviour in a local study were discord with a loved one, home-related stress, alcohol consumption, and financial concerns (Raubenheimer & Jenkins, 2015). Loneliness and helplessness were the two emotions most often reported, and conflict with a loved one appeared to greatly contribute to emotional distress, as did the absence of support from a loved one (Raubenheimer & Jenkins, 2015).

Examining the presence of psychological distress in urban South African hospital outpatients, Peltzer, Pengpid, and Skaal (2012) found that 17% had severe, 14% moderate, and 19% mild psychological distress. Severe psychological distress was linked to low

socioeconomic status, female gender, regular tobacco use, and a chronic illness diagnosis (Peltzer et al., 2012).

Socioeconomic status and social factors have been identified as determinants of mental health (Myer, Stein, Grimsrud, Seedat, & Williams, 2008), and compared to other middle-income countries, South Africa has more economic and sociocultural diversity. With a fifth of the South African population living below the poverty line, the risk of physical, emotional, and social difficulties is greater (Schneider et al., 2016). People who are living with a psychiatric condition can also enter poverty due to any impairment in functioning they may be experiencing. A mental health-poverty cycle is detailed within the South African National Mental Health Policy Framework and Strategic Plan 2013 – 2020 (Republic of South Africa Department of Health, 2013). A person who is in poverty struggles with unemployment, economic deprivation and lacking social support, facing poor physical health, social exclusion, and high stressors, which places him/her at risk of mental illness. At the same time, being mentally ill means higher health expenses, lower productivity, possible job loss, and social exclusion, which increase the risk of poverty. Myer et al. (2008) discovered a strong link between lower socioeconomic status and higher psychological distress, and a moderate association between greater psychological distress and lower social capital and social support. The more traumatic life events recently experienced, the higher the psychological distress. Overall, the data linked higher psychological distress to female gender, over 30 years old, Black African race, and rural setting (Myer et al., 2008).

In a multiracial country like South Africa, investigating the interplay between race and psychological health is of value. Compared to Whites, all non-White race groups have reported more non-specific distress, as well as higher levels of stress exposure by experiencing more undesirable life events (Jackson et al., 2010). Coloureds displayed more

anger/hostility than all other races, as did people in urban settings compared to those in rural environments (Jackson et al., 2010). Men were less distressed than women. According to Williams, Gonzalez, et al. (2008), perceived chronic discrimination (racial and non-racial in nature) negatively affects mental health. African, Coloured, and Indian races in South Africa displayed greater psychological distress than Whites, and there was a positive association between distress and perceived chronic discrimination (Williams, Gonzalez, et al., 2008).

Shifting focus to local research on factors affecting the mental health of the youth, adolescents attending private treatment in an urban setting for depression and anxiety reported their most common psychosocial stressors as academic workload, high parental expectations, time pressure, and pressure to succeed (Da Costa & Mash, 2008). Additional stressors included body image issues, interpersonal difficulties, and environmental challenges, like changing schools.

This review of the dominant psychosocial stressors active in present-day South Africa suggests that a substantial portion of the population is experiencing some degree of psychological distress in an environment riddled with risk factors. The health sector, however, is struggling to respond adequately to the needs of the population.

2.5 State of Mental Healthcare

Despite the prevalence and implications of mental illness, mental healthcare in South Africa is lacking, leaving treatment needs unmet. Seedat et al. (2008) found that only 25.5% of South Africans affected by a mental health disorder receive treatment.

Adults diagnosed with anxiety and mood disorders accessed mental health services most, and women were more likely than men to seek treatment (Seedat, Williams, et al., 2009). Those with substance use disorders had the lowest mental health consultation rates.

Mental healthcare use was the highest in the Western Cape, while race was linked to the treatment sectors chosen. Blacks accessed the complementary and alternative medicine sector more, while Whites and Coloureds more often sought help from a psychiatrist (Seedat, Williams, et al., 2009). The general medical sector was utilised more than mental healthcare – of those who were treated, only 6.7% consulted with a mental health professional. This is not surprising, as the country lacks mental health human resources, with 0.28 psychiatrists, 0.32 psychologists and 0.4 social workers serving every 100 000 people (Lund, Kleintjes, et al., 2008). The largest deficit in mental health professionals in South Africa is in psychosocial care providers, which includes psychologists, social workers, and occupational therapists (Bruckner et al., 2011). Nurses are the largest workforce in mental healthcare globally (Kakuma et al., 2011).

There are also structural limitations, as over 80% of the population relies on public healthcare (Ataguba, 2016), but general hospital inpatient psychiatric units only have 2.8 beds and public mental health hospitals only 18 beds per 100 000 of the population. Furthermore, only 1% of mental health hospital beds are allocated to children and adolescents (Lund, Kleintjes, et al., 2008). Concerns have been raised about the vast variation between provinces in mental health resources and service provision (Republic of South Africa Department of Health, 2013), as well as about the lack of data from provinces on the utilisation of their mental healthcare services (Lund, Kleintjes, Kakuma, Flisher, & MHaPP Research Programme Consortium, 2010). What is even more alarming is that mental health resources appear to be decreasing. In 1997, the bed/population ratio was 48/100 000, while statistics from 2005 show 28/100 000. Total mental health staff per 100 000 of the population were 19.5 in 1997, but dropped to 11.95 in 2005 (Lund et al., 2010).

In a review on the delivery of mental health services in the country between the years 2000 and 2010, Petersen and Lund (2011) report that in primary care, common mental disorders were still undetected and untreated to a large extent. They concluded that the gaps in mental health service delivery were still substantial and believe this to be a public health concern, particularly because of the influence of common mental disorders on the development and effective treatment of various other health conditions. For example, people living with a mental illness are at higher risk of being infected with HIV, and those who have HIV are more likely to develop a mental illness (Schneider et al., 2016).

According to Petersen and Lund (2011), South Africa needs to promote help-seeking behaviour and minimise defaulting from treatment. The National Mental Health Policy Framework and Strategic Plan 2013 – 2020 (Republic of South Africa Department of Health, 2013) acknowledges that something needs to be done, and that it is more costly for the country to leave mental illness untreated. The financial cost of mental illness to the South African economy is indeed a point of concern (Ismail, 2017; Lund, Myer, Stein, Williams, & Flisher, 2013). Yet, knowing how to improve mental health treatment in the country requires a more thorough understanding of what is currently standing in the way of treatment seeking and provision.

2.6 Mental Healthcare Barriers

A major local study found that there was no identifiable sociodemographic pattern to South Africans who received mental health treatment, suggesting the barriers to treatment are relatively uniform across gender, age, race, culture, and location (Williams, Herman, et al., 2008). The barriers explored in more detail below are of a structural, socioeconomic,

personal, educational, and discriminatory nature. It is likely that they combine in complex ways to obstruct care.

2.6.1 Poor infrastructure. As previously discussed, South Africa is experiencing numerous challenges within its mental healthcare system, affecting the nature of care available. According to Lloyd (2012), the key barriers to mental health service availability are lack of inclusion of mental health in the public health agenda, with the associated funding implications; the way in which these services are currently organised; poor integration of these services into primary care; lacking human resources; and poor public mental health leadership. These barriers are evident in South Africa today, particulary limited financial resources, which retsricts the provision of services (Schneider et al., 2016).

In a Western Cape study, community mental health users reported long periods of waiting to access services, poor mental health education and information sessions, as well as lack of peer support structures, as barriers to accessing information needed to manage mental health problems (Bimerew, Adejumo, & Korpela, 2015). Not only was the waiting time excessive, but the consultation time was also found to be rushed, with professionals trying to attend to all the patients in an overloaded, understaffed system. This, together with the patients' concerns about getting to the next queue in time, prevented them from being able to have their questions answered (Bimerew et al., 2015). General information sessions conducted in the waiting area were described as ineffective. Some patients shared that although they hadn't received any in some time, information pamphlets that had previously been handed out had been helpful. There were also suggestions of information provision via telephone or email (Bimerew et al., 2015). Previously available at the healthcare facilities, support clubs where patients and their loved ones could share information and experiences

appear to have been useful and were in demand. Loved ones particularly struggled with lack of information on how to handle uncooperative patients (Bimerew et al., 2015). The results of the research conducted by Bimerew et al. (2015) suggest that overall, patients' information needs are not being met due to structural health system challenges.

When psychiatric nurses in the Eastern Cape were asked about their perceptions of the barriers to care that exist for mental health patients, they identified two broad categories, namely organisational barriers, as well as societal barriers (discussed in 2.6.2) (Strumpher, Van Rooyen, Topper, Andersson, & Schierenback, 2014). Organisational barriers included inadequate support from mental health sector leaders, and lacking human, financial, and infrastructural resources. These result in insufficient mental health facilities, poor conditions at the ones that exist, and compromised availability and quality of services (Strumpher et al., 2014). Furthermore, with resources still centralised in bigger cities, there are geographical disparities in mental healthcare availability. Greater distance from a primary healthcare clinic has been associated with increased risk of depression, and reducing this distance, even if through technology, can prove beneficial (Tomita et al., 2017).

2.6.2 Socioeconomic challenges. Socioeconomic factors in low- and middle-income countries (LMICs) lead to greater structural barriers to the utilisation of mental healthcare, such as transport costs, even when the healthcare is available and free (Burns, 2013). Being unable to afford taking time off from work or family responsibilities to access mental healthcare, which is often not simply a once-off occurrence, can also act as a deterrent. According to psychiatric nurses in the Eastern Cape, patients battle to access services due to societal barriers, including socioeconomic difficulties and lacking family support (Strumpher et al., 2014). Burns (2013) expands on this by attributing poor local treatment rates to patients' sense of disempowerment, as well as to lacking health education.

2.6.3 Personal factors. Personal beliefs about mental illness may have a powerful influence on whether treatment is sought, especially if mental health literacy is low and people lack access to information (Andersson, Moore, Hensing, Krantz, & Staland-Nyman, 2014). According to the WHO World Mental Health Surveys, spanning 24 countries, the main barriers to seeking and continuing with mental health treatment were low perceived need and attitudes toward mental illness, including wanting to handle the problem on one's own (Andrade et al., 2014). The most common reasons given for dropping out of treatment were wanting to manage the problem on one's own, perceiving treatment as ineffective, and negative experiences with service providers (Andrade et al., 2014). In beginning and continuing treatment, attitudinal barriers were more prominent than structural ones in mild to moderate cases. Structural barriers were more deterring in severe cases (Andrade et al., 2014). In a different international study, the most common barriers to seeking mental healthcare in both genders were found to be believing the illness will pass on its own, doubting the efficacy of treatment, not knowing where to go for help, and shameful feelings (Andersson et al., 2014). Aside from no health insurance, the main barriers to care that emerged in a study by Gould, Munfakh, Kleinman, and Lake, (2012) were the perceptions callers had about mental health difficulties, such as underplaying the severity of the problem and believing it can be managed without treatment. In fact, perceptions were reported as a more prevalent barrier than those related to finances, stigma or structural restrictions. Pitman and Osborn (2011) support this view, reporting that help seeking in people who are suicidal is more negatively affected by their attitudes toward treatment than by stigma, structural or financial barriers. The participants in their study stated they did not need help, that treatments

were not very effective, and that they wanted to handle the problem on their own, plus they lacked belief in the benefits that services offer (Pitman & Osborn, 2011).

Waiting for a mental health problem to pass or wanting to manage it privately appear to be prominent personal barriers to care. Possibly related to this is another personal concern related to issues of trust and confidentiality. A third of callers to a helpline reported not seeking out mental healthcare after the call due to a lack of trust or having had negative experiences with service providers (Gould et al, 2012). Of people in the Eastern Cape experiencing depression, 57% did not seek help, voicing concerns that their problem would not be kept confidential by healthcare staff (Andersson et al., 2013).

2.6.4 Mental health literacy, stigma, and cultural diversity. More prominent in developing countries, poor mental health literacy hampers treatment (Ganasen et al., 2008). According to Thornicroft (2008), poor knowledge of psychiatric disorders' features and treatability, lacking awareness of how assessment and treatment can be accessed, prejudiced views of people diagnosed with a mental illness, and expectations that the mentally ill are discriminated against, contribute to treatment avoidance or delaying help-seeking. He argues that in every society across the globe, people with a mental illness diagnosis are not considered of the same value as and as acceptable as those not mentally ill (Thornicroft, 2008). Help-seeking behaviour is thus affected by a person's ability to recognise a mental illness (Ganasen et al., 2008), as well as by the stigma and discrimination against the mentally ill (Lloyd, 2012). Andersson et al. (2013) confirmed that stigma was one of the most prominent barriers to help seeking, while Thornicroft (2008) described it as a barrier to both care and social inclusion.

Within the South African context, mental heathcare use is influenced by ethnicity, culture, and the country's history of racial segregation. Naidoo and Kagee (2009) attribute the limited use of psychological services to the view of such services as a mainly Western way of addressing psychological problems, as well as to a lack of trust in mainly White professionals, insufficient numbers of psychologists to service the population, and the widespread availability of and trust in traditional healers. Language is another barrier to the provision of these talk-based services (Naidoo & Kagee, 2009). Cultural beliefs about mental illness and its causes tend to determine what help is sought, and from who (Ganasen et al., 2008).

2.6.5 Tackling the barriers. The barriers to care that have so far been examined are poor infrastructure in the healthcare system, socioeconomic problems, personal beliefs and attitudes, as well as low mental health literacy, stigma, and cultural influence. Investigating what facilitates service access, Brown, Rice, Rickwood, and Parker (2016) found this to include community and educational initiatives aimed at increasing service awareness and at attitudes towards mental health problems and help-seeking; easily accessible treatment; as well as confidence in the competence of a service provider. These are some clues as to the shifts that may be required in order to lessen the barriers to care.

Ganasen et al.'s (2008) view that better information dissemination to the general public is needed, as are more media awareness campaigns, is shared by Bimerew et al. (2015), who believe that providing adequate mental health information helps to empower patients, improving their care. They report that using information technology (IT), such as tele-health communication, can facilitate access to needed information (Bimerew et al., 2015). The authors' recommendations to help overcome the barriers to information access

include greater use of the telephone and IT, social networking, and public mass media (Bimerew et al., 2015). Based on their findings, Gould et al. (2012) suggested that helpline counselling needs to address callers' attitudes towards and perceptions of the use of formal mental healthcare services in order to promote continued help seeking.

Locally, Andersson et al. (2013) agreed that there is a need for better mental health literacy in South African communities, as well as for improved healthcare availability. Recommendations made by local psychiatric nurses also prioritise enhancing public mental health literacy, as well as greater support from relevant stakeholders (Strumpher et al., 2014).

However, in order to implement the recommendations made, various types of resources are needed, which is a major challenge in South Africa, as has already been established. To try to reduce the local barriers to mental healthcare within the constraints of limited resources, task-shifting is a concept that can be employed.

2.7 Task-shifting

Conceptualising the use of adequately skilled volunteers or non-health workers to assist in community-based interventions, task-shifting can be particularly beneficial in contexts with strained resources, such as South Africa (Eskell Blokland, 2014). As discussed above, most LMICs have insufficient human resources for mental healthcare, and the situation could worsen if new strategies are not undertaken. According to Kakuma et al. (2011), a larger and more diverse mental health workforce could be achieved through the collaboration of the government, private and non-governmental sectors. In primary care settings, mental health services can be delivered effectively by lay workers, caregivers and affected individuals (Kakuma et al., 2011). Seen as a necessary response to human resource shortages, this task-shifting would form part of community-based initiatives.

Schneider et al. (2016) too speak of the potential of applying an integrated, inter-sectoral approach to mental healthcare that makes use of task-shifting to overcome the obstacle of limited human resources, by training non-professionals to deliver services such as mental health screening. Further support is given to this idea by Mitchell (2008), who advises that, considering the limitations faced by specialist services, the potential roles that can be undertaken by non-medical primary health and social care services should be investigated. By applying a task-shifting strategy, it is possible non-professionals can become involved beyond screening and referral duties.

Local research outlines service gaps that exist between and within provinces, with rural areas especially under-resourced (Petersen, Lund, Bhana, Flisher, & Mental Health and Poverty Research Programme Consortium, 2012). At the base of a framework for primary mental healthcare that adopts task-shifting ideas are community level interventions. These encompass the work of traditional healers, non-governmental organisations (NGOs), community health workers, and spiritual leaders. The services delivered by this level are focused on mental health promotion, prevention of illness, identification of mental health problems, referral to appropriate care, self-help initiatives, disorder-specific counselling, and psychosocial rehabilitation (Petersen et al., 2012). The South African National Mental Health Policy Framework and Strategic Plan 2013 – 2020 (Republic of South Africa Department of Health, 2013) states that it is hoped that human resource needs in the country can be met by employing task-shifting to create a workforce of professionally supervised non-specialist trainees to deliver psychosocial interventions that are evidence-based. Such an approach would be situated at an informal community care level, which is the tier within which the call centre investigated by this study operates, and thus the most relevant mental healthcare level to the present research.

2.7.1 Informal community care. Because the move in South African mental healthcare towards deinstitutionalisation has not been matched with the required community-based psychosocial service development to support the shift, a revolving door phenomenon has been created (Petersen & Lund, 2011). Saraceno et al. (2007) believe that informal services can assist at this time, when the integration of mental health into primary healthcare faces the challenges of an overburdened system with limited time per patient, lacking specialist supervision and support of primary healthcare workers, and shortages of psychotropic drugs.

For primary mental healthcare to be more efficient, it needs to be supported by informal and community-based services, forming an integrated network of care (WHO & Wonca, 2008). Informal community care refers to services that fall outside of the formal health and welfare system (WHO & Wonca, 2008). Such services include those provided by NGOs, lay people, as well as user and family associations (WHO, 2009). Recognising the potential of community resources, WHO (2007a) recommends that for the optimal mix of mental health services, countries should expand their informal community care. As illustrated in Figure 1, according to the WHO pyramid framework, after self-care, informal community care is the next most needed in quantity and frequency, while costing less than formal services (WHO, 2009).

These informal services are usually accessible and acceptable to the community, as they are seen as forming part of it. Informal community care workers perform various functions, including supportive care and practical support, advocacy, mental health promotion and illness prevention, crisis support, mental health problem identification and referral to formal care (WHO, 2009). Basic counselling and mental illness understanding

skills, as well as advocacy skills are helpful competencies at this level. Used as a support structure, such services can help reduce the strain on higher tiers in the mental health system, which are locally already overtaxed. They can also help to prevent relapses in patients who have previously been hospitalised for a mental illness (WHO, 2009).

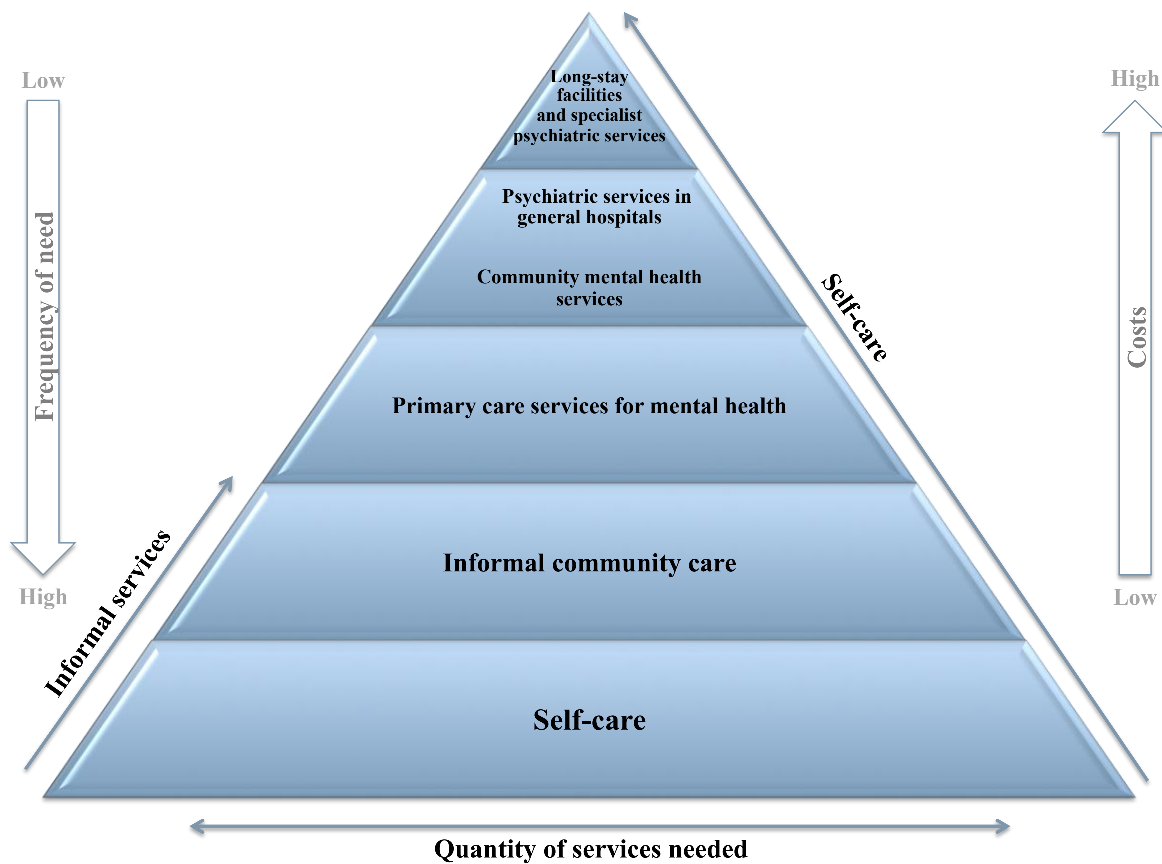

Figure 1. WHO (2009) pyramid framework for the optimal mix of mental health services.

In every society, self and informal care are responsible for a substantial part of healthcare (Pitman & Osborn, 2011). According to the WHO model, meeting the needs of the mentally ill requires the collaboration, support, information-sharing, and education across the levels of the pyramid (WHO & Wonca, 2008). A strong inter-referral system between the levels is essential (WHO & Wonca, 2008). Self-care is also an important component at each

level of the pyramid. NGOs can assist with this by providing information on how this can be achieved within the mental health context (WHO & Wonca, 2008).

Informal community care should operate according to the principles of effective mental health services, namely accessibility (available within reasonable distance, affordable, acceptable); comprehensiveness, continuity, and coordination (attending to various needs of a patient, psychological, social, and occupational, and doing so on an ongoing basis); needs-led care (providing services that are needed); and equity (all population segments can access the services) (WHO, 2009). Additionally, an effective mental health system needs to be guided by a mental health information system, which focuses on learning about mental health services and the needs of the populations they serve (WHO, 2009).

Mitchell (2008) revealed more about the functioning of the informal care tier by investigating the mental healthcare roles fulfilled by non-medical primary health and social care services, which are community based and can be accessed without a formal referral. Most of the people utilising these services presented with complex and numerous social and psychosocial issues. The largest age group of people served were 15 to 24, followed by 25 to 44 (Mitchell, 2008). The main role categories that non-medical primary health and social care services were found to be involved in were mental health promotion, formal disorder-focused care, cooperative care for clients with complex needs, psychosocial and preventative care, evaluation and education at the service level (Mitchell, 2008). These service providers identified mental health promotion as one of their central functions, yet one where their involvement was low.

Saraceno et al. (2007) suggest that opportunities to make use of non-formal human resources are wasted, despite the relief this could bring to under-resourced countries. They believe formal and informal mental health resources already available in the communities

need to be used more effectively, as is also recommended by Kohn (2014) and Ganasen et al. (2008). According to Saraceno et al. (2007), greater use needs to be made of informal community resources, utilising people with mental illness, their family members, and community members without formal training, for service provision and advocacy.

Locally, Seedat, Williams, et al. (2009) call for more community awareness initiatives, while the National Mental Health Policy Framework and Strategic Plan 2013 – 2020 (Republic of South Africa Department of Health, 2013) has as its objectives increasing public awareness on mental health, reducing discrimination and stigma, forming collaborative relationships between the Department of Health and other sectors, and encouraging community involvement. Some of the values embraced by this plan are to use community-based resources, encourage and support advocacy and self-help groups, engage in intersectoral collaboration, and ensure services are accessible to all (Republic of South Africa Department of Health, 2013). Partnerships with NGOs will reportedly be pursued, as they are seen as playing an active role in providing mental health and substance abuse information and education, as well as assisting the vulnerable groups in our society. Another important resource that is already very active in mental healthcare at the informal level is family.

2.7.2 Role of loved ones. A person’s mental illness has an impact on their loved ones, especially their family. With shorter hospitalisations and the shift towards deinstitutionalisation, people with severe mental illness are relying more and more on family members as primary caregivers (Shor & Birnbaum, 2012). Families of the mentally ill are thus taking on an increasing amount of responsibility, providing practical and emotional support. Research shows that when seeking help, people experiencing depression most often approached loved ones (Andersson et al., 2013). Furthermore, the families of young adults

play an instrumental role in the youths' help-seeking behaviour for mental illness (Wilson, Rickwood, Bushnell, Caputi, & Thomas, 2011).

Unfortunately, information and resources to assist their caregiving function are not widely available, with support for families fulfilling the caregiver role lacking (Shor & Birnbaum, 2012). After being discharged from hospital, especially in communities where resources are scarce, the only source of support for patients with severe mental illness is likely to be family. This can place a lot of pressure on loved ones, straining relationships and leading to help seeking by the caregiver (Tomita et al., 2016). In South Africa, family relations of a poorer quality were linked to higher total unmet needs of psychiatric patients. Serious unmet needs that psychiatric patients identified were challenges with accessing government benefits, lacking information about care, and needs related to company/social relations (Tomita et al., 2016).

Both internal and external strengths are used by families when providing support to family members who are mentally ill. Families engage in the support activities of taking their mentally ill loved one for treatment, ensuring they comply with follow-up care, and monitoring their medication adherence (Mokgothu, Du Plessis, & Koen, 2015). Other roles of supportive families include supervising their loved one's self-care and safety, calming them, explaining that treatment is important, protecting them from negative external influences (like peers who provide drugs), accessing social support, and utilising available external resources (Mokgothu et al., 2015).

When caring for a chronically mentally ill loved one, the main challenges caregivers reported facing were stress and emotional distress, need for education and information, socioeconomic effects and support, and physical strain (Shamsaei, Cheraghi, & Esmaeilli, 2015). Mental health issues were reported by numerous caregivers, with some taking

psychiatric medication themselves. Caregivers felt that fulfilling this role was resulting in financial strain and manifesting as physical conditions. Shamsaei et al. (2015) referred to caregiving as a chronic stressor that affected the caregiver's quality of life and resulted in physical, psychological, social, and economic problems. The caregivers shared that they wish to be involved in treatment planning, and to have more information in general about the mental illness diagnosis and prognosis (Shamsaei et al., 2015). They also reported that education on the mental illness and medication prescribed were not provided by health professionals, they were not involved in the treatment, and their needs were not addressed. All thought attending educational programmes would be helpful.

In India, family members who called a 24-hour crisis helpline often wanted to know how to manage ill loved ones when they were irritated, agitated or aggressive. They also sought advice on what to do when loved ones did not want to take their medication (Chavan, Garg, & Bhargava, 2013). Research by Shor and Birnbaum (2012) on a family peer support helpline revealed that the most commonly provided support was emotional, allowing a chance for catharsis, as well as offering encouragement, and hope related to the callers ability to manage the challenges being experienced. Advice was the second most frequent help provided, most often associated with difficulties in the relationships with their loved ones and in the ones with mental healthcare professionals. The third help provided most often was information related, particularly about psychological services for the mentally ill loved one, and information about mental illness. The help callers found most valuable was emotional support, advice on dealing with challenges when accessing mental health services, information useful in helping their loved one with their illness, and advice about coping strategies (Shor & Birnbaum, 2012). Most of the calls were by women, and by parents of mentally ill loved ones. Spouses, siblings, children and other relatives also made contact.

According to Shor and Birnbaum (2012), callers felt the telephone helpline's accessibility and immediacy were valuable, and it appeared that not having to deal with a crisis situation alone was especially appreciated. They also reported that the helpline contact acted as a catalyst for them to access rehabilitation services. It appeared that the helpline offered an alternative source of help that could facilitate their engagement with formal mental health services, as well as provide support when difficulties with professionals were experienced.

Helplines are a community resource on the same informal level of mental healthcare as support by loved ones, and are the subject of the present study.

2.8 Helplines as a Resource

According to O'Connor and Pirkis (2016), helplines can play a central role in providing mental health services, and Ingram et al. (2008) agree that telephone crisis helplines can be a quality brief mental health intervention. Emergency telephonic counselling services assist people in crisis with a variety of personal difficulties. Although ongoing treatment is not offered, people can call as many times as they desire. They can remain anonymous when calling, access the service for different issues, and generally do not speak to the same counsellor every time they call (Coman, Burrows, & Evans, 2001).

Offering information, advice, and referral is the main goal of crisis helplines (Ingram et al., 2008). While providing crisis intervention, the central tasks are to build understanding of a caller's experiences, ease their distress, assess the situation, plan how problems can be managed, and expand informal and formal support structures (Turley, 2013). These interventions can be understood as a caller and counsellor working together, collaboratively, at a time when the caller's resources are overwhelmed by challenging circumstances or life events (Turley, 2013). According to Turley (2013), informal

helpers/volunteers/paraprofessionals are able to deliver crisis interventions, as calls do not require clinical skills, but rather assistance with the management of transient adjustment difficulties.

Helplines offer person-led and person-centred care (Howe, Meakin, & Islam-Barrett, 2014). They can be the first point of contact for help, or a source of ongoing support, and they tend to provide callers with the encouragement and information needed for them to access formal services (Howe et al., 2014). O'Connor and Pirkis (2016) describe helplines as non-threatening, private, less stigmatising, accessible, easy to use, and helpful in moving callers towards an understanding of mental health, as well as supporting help seeking beyond the call by offering information and encouraging connection with local mental healthcare services. As such, they can be viewed as a pathway to care that can also be helpful in facilitating treatment adherence (O'Connor & Pirkis, 2016). Helpline crisis support aims to help people in managing stressful times more resourcefully, which can prevent crisis escalation and the development of more long-term health problems (Turley, 2013).

The emotional support offered through generalist helplines has its roots in Rogerian counselling theory, with its nondirective stance and value of empathy and warmth, congruence or genuine presence, and unconditional positive regard (O'Connor & Pirkis, 2016). Such telephonic counselling can play a role in the continuum of care, by assisting callers in between their treatment sessions (Ingram et al., 2008). Helplines also offer a more formal type of social support, allowing the experience of relief through human connection. Health, subjective wellbeing, and life satisfaction have been linked to the presence and quality of social connections in a person's life (O'Connor & Pirkis, 2016).

Howe et al. (2014) refer to helplines as "an unseen health provider and health solution" (p. 2), stating that a growing number of calls are being received by helplines, and

the calls appear to be increasing in complexity. Turley (2013) makes an argument for the inclusion of crisis intervention helpline services in primary healthcare settings. However, as callers can choose to remain anonymous, and because this may be a unique factor of helplines that motivates help seeking, evaluating helplines is challenging (Howe et al., 2014), which hampers the generation of evidence to support the potential of using telecommunication technology to bridge gaps in mental healthcare.

2.8.1 Use of telephone technology in healthcare. E-health in the mental health context refers to the provision of therapy or information through the use of a telephone or the Internet (Christensen & Hickie, 2010), and telehealth is a more traditional term referring specifically to the use of telecommunication technology to provide health-related services (Maheu, Whitten, & Allen, 2001).

The local use of mobile phones has grown substantially, with affordability and accessibility increasing rapidly. In fact, in South Africa, people are gaining access to cellphones faster than they are to basic services (Mapham, 2008). Mobile technology can be utilised for healthcare communication and service provision. Cellphones provide a mechanism through which patients can be provided with information, education, and support, even of a social nature from peers (Mapham, 2008).

As a medium of communication, the telephone is more accessible, and addresses physical and geographical barriers to care (Rosenfield, 1997). According to Christensen and Hickie (2010), e-health services offer anonymous help; are attractive to a younger population, which is when mental health difficulties often develop; and they offer a wide reach at low costs. An e-health programme can act as a free entry point to information, emergency assistance, mental illness screening, self-help tools, and referrals to professional help.

Christensen and Hickie (2010) also recommend capitalising on the rapid technological advancements experienced today, in order to improve mental health service delivery.

Telehealth offers a way to address the barriers to care in rural areas too. Evidence suggests mental health-related social stigma is higher in rural areas, and this is a common reason expressed by people for not seeking help (Jameson & Blank, 2007). Lack of privacy, scarcity of adequately trained professionals, and physical remoteness are other deterrents in a rural context from accessing mental healthcare. Jameson and Blank (2007) suggest that applying a telehealth approach can allow people in isolated areas to access needed mental health services. Utilising a telehealth system can also foster professional collaboration, connecting caregivers in remote areas to other professionals. The telehealth approach can be of benefit in South Africa, with the challenges faced by patients in rural areas, the restricted resources available for mental health systems, and the already available infrastructure of telecommunication technology and helpline services.

2.8.2 Benefits of helplines. Telephone helplines may be found an easier source to access due to less fear of stigma and the removal of geographical restrictions (Shor & Birnbaum, 2012), providing the means to reach isolated, vulnerable communities (Howe et al., 2014). Supporting this view, O'Connor and Pirkis (2016) describe helplines as an easily accessible, low-cost, private support service that removes some of the fear of stigma and discrimination linked to psychiatric illness. Toll-free lines specifically help to reduce the financial barrier to help seeking (Howe et al., 2014).

Whether for information, referral, or crisis counselling, the service is available immediately, as needed, and can be accessed from any location, including the safety of a caller's home (Coman et al., 2001). Callers report a greater comfort with speaking over the

phone, and relying purely on verbal communication appears encouraging of conversation (Coman et al., 2001). The anonymity and confidentiality upheld by helplines may make it easier for people to seek help for sensitive issues, allowing them to speak more openly about taboo topics (Howe et al., 2014). It also helps that callers remain in charge of a lot of aspects when using a helpline resource – how, when, from where to make contact, how much to reveal, and how long the call lasts (Howe et al., 2014). Helplines leave the caller with the power to terminate the call whenever they wish (Chavan et al., 2013) – being in control of a call tends to be reassuring for callers, easing their anxiety (Coman et al., 2001). Howe et al. (2014) report that callers tend to value the independent functioning of helplines, and that being able to access a helpline without having a diagnosis is an advantage. Another advantage is that family members of people with mental illness can also find support through helplines (Chavan et al., 2013).

One of the greatest potentials of helplines is that, when applied adequately, they can ease the pressure on other services (Howe et al., 2014). They can assist with public education (Chavan et al., 2013), support patients between face-to-face sessions (Coman et al., 2001), and promote help-seeking behaviour (Howe et al., 2014). Studies suggest that people are more willing to call a helpline than seek professional help, and O'Connor and Pirkis (2016) too believe that helplines are well positioned to encourage help-seeking behaviour in those who call and need psychiatric treatment. Evolving together with society, helplines are expanding their services to online, email, and text message mediums, as is the case with the NPO at the heart of this study. This gives people a choice of how to initiate contact (Howe et al., 2014).

2.8.3 Who utilises helplines and why. International research on callers to helplines reports that most callers are female (Ingram et al., 2008; Spittal et al., 2015), the most common age group is 25 to 34 (Spittal et al., 2015), and 77% of first-time callers found out about the helpline through the media (Ingram et al., 2008). Of callers to a large generalist telephone counselling helpline, most were women, single, between the ages of 25 and 64, reporting higher levels of depression and anxiety than the general population, and listing relationships and loneliness as the most prominent difficulties (Burgess, Christensen, Leach, Farrer, & Griffiths, 2008). Earlier research on the same helpline showed that the population it served was heterogeneous and mainly sought social support (Watson, Mcdonald, & Pearce, 2006). The authors found evidence that the helpline plays an important role in supporting people with mental health issues. Of those who reported a preexisting mental disorder diagnosis, the majority had depression, followed by schizophrenia, bipolar and general anxiety (Watson et al., 2006). A population survey in Australia agreed that compared to people who do not utilise telephonic counselling, those who do have a poorer clinical profile, are at greater risk of suicide, use various other mental health services, have a lower household income, and over 50% call the helpline more than once (Bassilios, Pirkis, Harris, Middleton, & Gunn, 2015).

Perkins and Fanaian (2004) found that over half of helpline callers were highly distressed and likely to be affected by a severe mental disorder. Symptoms associated with mood, anxiety, and psychotic disorders were between 2 to 13 times higher in callers than in the general population, yet about 60% were not receiving mental healthcare. For callers, using the helpline was most beneficial for emotional support and having someone to speak with, and 71% reported that due to the call, they had taken some form of action. In the United Kingdom (UK), Coveney, Pollock, Armstrong, and Moore's (2012) study on the Samaritans

helpline found that callers mainly made contact due to mental health problems, self-harm, and relationship-related problems. Before contacting the helpline the last time, most had felt depressed (68.3%), very distressed (64.1%) and lonely (62.1%). Generally, people tend to contact crisis helplines with issues pertaining to financial problems, conflict at work, domestic violence, relationship breakdowns, traumatic experiences, bullying, addiction, general illness, mental health problems, social exclusion and aloneness (Turley, 2013).

A study on an Indian population by Chavan et al. (2013) discovered that a local helpline fielded the most calls between 08:00 and 14:00, and – for 73% of callers – this was the first time they were accessing any mental health service. Most callers were male, aged 20 to 39, and married. People contacted the helpline to find out if they had a mental illness, if psychiatric disorders can be treated, where to get treatment, as well as due to acute stressors and interpersonal problems. People with affective disorders formed the largest group of callers, followed by those with substance use disorders, and then people diagnosed with schizophrenia (Chavan et al., 2013).

Locally, Meehan and Broom (2007) examined data from a suicide toll-free helpline and discovered that the majority of callers were women, the most common age group was 16 to 18, and most callers were from Gauteng, KwaZulu-Natal and the North West. A dominant reason for calling was the experience of problems callers felt unable to solve on their own, and over 97% said they would use the helpline again (Meehan & Broom, 2007). Yet, while helplines serve an important support function, their purpose extends beyond emotional distress containment and crisis management, and they are a vital component of the broader mental healthcare system.

2.8.4 Pathway to care. One of the goals of crisis helplines is to connect at-risk callers with appropriate and ongoing mental healthcare services. The findings of a study by Wilson et al. (2011) reveal that the greater the intent of young adults to access help from informal sources, the greater their intention to seek formal mental healthcare too. Classified as a source of informal care, helplines allow callers access to information and guide them to the appropriate mental healthcare provider, delivering a vital mental health service on the pathway to care (O'Connor & Pirkis, 2016). In a study by Gould et al. (2012), the most common referral made to callers was to a mental health service, especially one that was not previously used. About 42% of callers followed up on a referral they received during the helpline call, while half of those given referrals during the call accessed some form of mental health services afterwards, even if not the exact one given. Callers tended to be the most hesitant to try new services, with the highest follow-through rate being for a current or previously used resource (Gould et al., 2012). For the work of helplines to be meaningful in the pathway to care, specialist services need to be able to attend to the referrals they receive (Mitchell, 2008). This is, however, a major challenge in South Africa currently, which may be influencing the way that people are utilising helplines locally. As a result, the pathway to care is not always linear.

2.8.5 Frequent callers. Some people make repeated use of helplines that do not provide ongoing counselling but rather assist callers with referrals to relevant mental healthcare. One study reported that 2.6% of callers to a helpline were frequent users, but they were responsible for 60% of the calls received (Spittal et al., 2015). According to O'Connor and Pirkis (2016), repeated use of helplines by a caller suggests the presence of unmet needs. Middleton, Gunn, Bassilios, and Pirkis (2016) explain that frequent callers tend to utilise

crisis helplines for issues that are ongoing, and that they report experiencing short-term benefits when making contact. The more specific reasons for their calls were found to be having someone to speak with, for mental health-related assistance, and to find help with negative life events, past or present. Overall, their calling behaviours appeared to be reactive, support seeking, and dependent (Middleton et al., 2016). A different study focused on understanding more about frequent callers found that the top three presenting problems for frequent and non-frequent callers were the same – family and relationships issues, mental health disorders, and self-identity and self-esteem problems (Spittal et al., 2015). However, frequent callers were more likely than non-frequent callers to have significant mental health problems and were more at risk. People who presented with issues related to self-harm, suicidality, mental health, crime, domestic violence, and child protection were more likely to be frequent callers (Spittal et al., 2015). Being male or transgender, as well as never having been married were further predictors. In order to address the needs displayed by frequent callers, Middleton et al. (2016) suggest that helplines consider introducing a continuity of care component to the services they offer.

To better understand the mechanisms of action of helplines, what services are needed or how they should be expanded, more research is crucial. But research into helplines and the population they serve is limited, especially in South Africa, where mental health research in general is poorly prioritised and receives restricted funding (Lund, Kleintjes, et al., 2008).

2.9 Local Research Needs

With the local mental health agenda focusing on shifting mental healthcare into the community but with limited resources to make this happen, more knowledge is needed on community structures that already exist, like the NPO call centre that is at the centre of this

study. There are potential benefits to understanding what function these structures are serving and how they can be better utilised in future. Lund, Stein, et al. (2008) comment that more research is needed to monitor mental health needs and guide resource allocation at the local level. Seedat et al. (2008) add that little is known about how health and non-health services for the mentally ill are currently being used in the country. Considering the need to gather data that can inform decisions about the most effective interventions for the local context, Sorsdahl et al. (2012) feel investigating whether interventions can be effectively delivered by non-specialists would be helpful. South African researchers question whether task-shifting can be applied locally to help deliver more mental health interventions at the community level (Lund, Petersen, Kleintjes, & Bhana, 2012; Sorsdahl et al., 2012; Stein, 2012; Szabo, 2013). In order to answer this question, more research is needed into community mental health, which is the area of focus for this proposed study.

2.10 Chapter Summary

When examining the literature on the NPO and its call centre, mental health in South Africa, healthcare challenges, the opportunities for positive change, and the contribution mental health helplines could make, a few conclusions can be drawn. The call centre researched in this study exists in an environment of high, chronic psychosocial stress and concerning rates of mental illness. It is also assisting a population that is not being adequately treated by the formal healthcare sector, and one that experiences numerous challenges to accessing affordable, face-to-face, continuous care. International literature advises that the mental healthcare challenges faced by developing countries, such as South Africa, can be tackled by shifting some tasks to the existing informal community care sector, and in this way better meeting the mental health needs of the population despite the resource constraints present.

Local professionals have shown interest in this concept of task-shifting, and its potential application in South Africa, but more local research is needed to inform decision-making.

It is with this in mind that the present study seeks to learn more about the NPO-run call centre – an existing informal community resource. As mental health helplines have been shown to offer benefits that could be especially helpful in the local context, this call centre may be delivering valuable services to South African communities in need. Gaining more knowledge about this resource, as well as about who is expressing a need and what it is that is needed, can help to identify how best these existing mental health helplines could be used within the current local context.

Chapter 3: Theoretical Framework

3.1 Introduction

The theory guiding this research project is the social ecological model (SEM) of McLeroy, Bibeau, Steckler, and Glanz (1988). This is one of numerous social ecological theories that exist within the broader field of ecological approaches in psychology.

This chapter begins with an overview of the ecological framework, moves on to the social ecological theory that exists within it, and finally details the specific social ecology model selected as the grounding of this study.

3.2 Ecological Framework

The ecological conceptual framework developed within the health promotion, health education, and public health sectors (Chaney, Chaney, & Eddy, 2006), has become popular in public health (Golden & Earp, 2012) and has grown to play an important role in health promotion (Sallis, Owen, & Fisher, 2008). Community based interventions are also operating with greater awareness of the ecological perspective (McLeroy, Norton, Kegler, Burdine, & Sumaya, 2003).

The ecological concept in psychology does not subscribe to a purely individualistic nor a purely environmental perspective. Rather, it provides a framework that helps further understanding of how an individual interacts with his/her environment, and theorises about the constituents of human environments (Sallis et al., 2008). According to this paradigm, behaviour is the outcome of the interchange between internal and external factors (Hayden, 2014) and thus causation does not have a single source (Sallis et al., 2008). Stokols (2000) emphasises the complexity of human environments, which the ecological paradigm views as

characterised by several social, cultural, and physical dimensions or levels (Stokols, 1996). There are interactive and reinforcing functions between the ecological levels (Golden & Earp, 2012), thus an ecological intervention at one level can effect change at another (McLeroy et al., 2003). Because health behaviour is believed to be the result of complex multilevel interactions rather than simply an individual choice, effecting significant change requires interventions at both individual and environmental levels (Sallis et al., 2008). A major strength of the theory is this opportunity for broader intervention due to its focus on multiple levels of influence. All ecological models subscribe to a multilevel perspective, but the labels and nature of these levels differ between theories categorised within the ecological framework (Hayden, 2014).

3.3 Social Ecological Theory

This is one theory that belongs to the ecological paradigm and guides thinking about health status, health behaviour, and environmental risk factors (Orlowski, 2016). According to Stokols (1996), social ecology refers to a group of theoretical principles that describe the dynamic interplay between personal factors and the sociophysical context in human health and illness, with the impact of the physical environment potentially mediated by the social environment. Important social influences include who a person interacts with, the community they belong to, and the organisations with which they affiliate (McLeroy et al., 2003). Thus, according to this perspective, the different environments a person interacts with have a cumulative impact on a person's health.

Belonging within a systems orientation, social ecological models visually represent the active interrelations between individuals, groups, and the environment (Golden, McLeroy, Green, Earp, & Lieberman, 2015). Human environments have a dynamic systemic

quality, and the relationship between people and their environments is understood with the help of concepts that originated in systems theory (Stokols, 1996). For example, all the levels of influence exist within a system of interdependence and reciprocal causality (McLeroy et al., 2003).

Social ecological theory is applied within community psychology and when it comes to community interventions, this theory dictates a focus on person-context interactions, contextual characteristics, forming of partnerships in working towards common goals with shared values, and expanding community resources (Visser, 2007). Such interventions are monitored, and are adjusted based on feedback received from the community (Visser, 2007).

This theory can also be useful in analysing public health problems, as it allows the many aspects of a public health issue that require consideration to be held within one framework (Coreil, 2009). Public health practice and research adopts a social ecological approach to health, acknowledging broader influences on behaviour than just those within the individual (Andresen & Bouldin, 2010).

Research from a social ecological perspective aims at understanding the complex contextual background of community health problems, especially examining how individuals dynamically interact with their environment across space and time (Lounsbury & Mitchell, 2009). Health research that is ecologically aligned employs diverse methodologies and engages in numerous levels of analysis in an effort to assess the wellbeing of individuals and groups, and the degree of health of a particular context (Stokols, 1996).

Due to its multilevel nature, the social ecological perspective is interdisciplinary (Stokols, 1996; Stokols, 2000). Various social ecological model formulations exist (Andresen & Bouldin, 2010), all of them incorporating the idea of mutually influencing and interacting levels that operate within a reciprocal system (Coreil, 2009).

3.4 Social Ecological Model (SEM)

A new ecological model for health promotion, the SEM (McLeroy et al., 1988) is a variation on Urie Bronfenbrenner’s ecological systems theory, which describes human beings as nested within layers of concentric broader ecological systems (micro, meso, exo, macro, and chronosystems), engaging in a reciprocal manner with their environment (Bronfenbrenner, 1979). McLeroy et al. (1988) reported that the SEM is further influenced by the work of Belsky (1980) and Steuart (Eng, Hatch, & Callan, 1985).

The SEM is interested in patterned behaviour, considers the social and organisational setting within which health-related behaviours occur, and believes this behaviour is determined by individual and social influences at different analytic levels (McLeroy et al., 1988).

As an adaptation of the ecological systems theory, the SEM reflects revised levels of analysis as shown in Figure 2, proposing that health behaviour is under the influence of layers of intrapersonal, interpersonal, institutional, community and public policy dynamics (Simons-Morton, McLeroy, & Wendel, 2012).

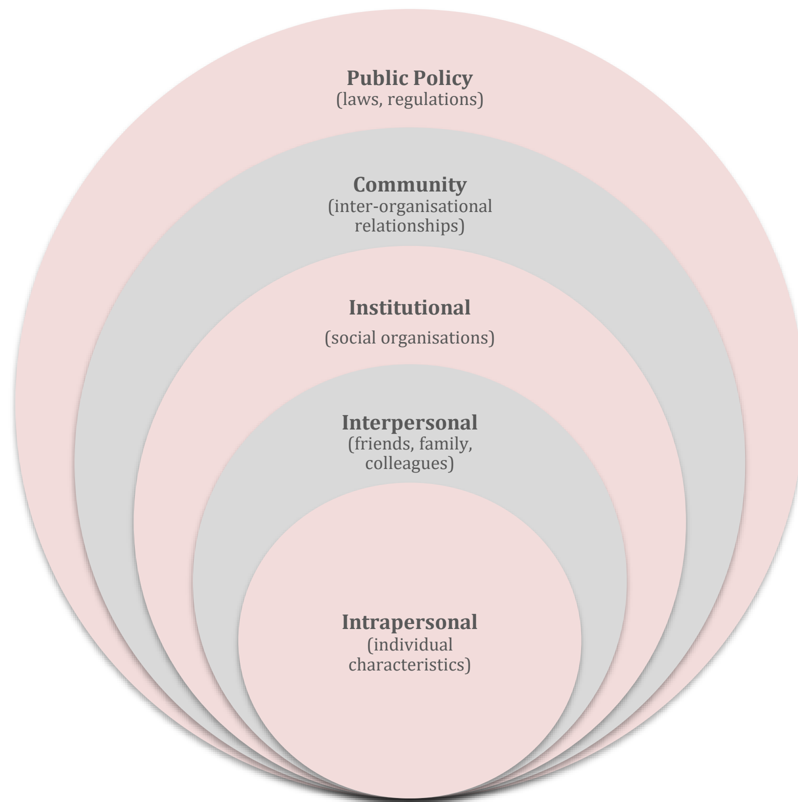

Figure 2. Societal levels of the SEM.

At the core of the model are the individual and his/her closest relationships (Orlowski, 2016). The outer spheres consist of the community and social system within which a person resides, which are more distal factors of influence. The first two levels are people-related, while the last three are places and systems related (Orlowski, 2016), yet changes at the upper levels can result in changes at the lower levels (McLeroy et al., 1988).

McLeroy et al. (1988) provide the following explanations about each of their social ecological levels:

- Intrapersonal – this refers to individual characteristic like attitudes, knowledge, self-concept, skills, behaviour, as well as developmental history. Change within the individual is expected by interventions at this level.

- Interpersonal – this is where relationships with family, neighbours, friends, and colleagues are located. It relates to social support systems and networks of a formal or informal nature. Social relationships offer social resources and contribute to social identity. Interventions at this level target social norms, the social groups to which a person belongs, or the nature of social relationships.
- Institutional – social institutions that operate according to informal and formal rules and regulations, and display organisational characteristics make up this level. This includes educational and employment settings, where the authors report that a lot of people spend one third to one half of their lives. Organisations are seen as offering economic and social resources, as well as contributing to social identity, norms, and values. Voluntary organisations are also found at this level, as are churches. Interventions here aim at organisational change through the creation of healthier environments. Community health initiatives are often run through community organisations.
- Community – this refers to the relationships among informal networks, institutions, and organisations, within certain boundaries. The SEM defines community as mediating structures like family, which act as social resources; interorganisational relationships within a political or geographic area; and community power structures that govern resources and public policies. At this level, interventions can be delivered to communities through mediating structures, they can target the development of existing organisations, they could encourage cooperation among community agencies, and they may facilitate access to power structures by the most disadvantaged in communities.

- Public policy – laws and policies are considered at this level. Such policies help to affect the health of populations instead of just individuals. Activities at this level can include increasing public awareness of policies, and encouraging engagement in political and policy-making processes.

The influence of the different levels on one another plays a role in the way each level evolves. For instance, community mediating structures link individuals to the greater social environment, and as such can influence public policy (McLeroy et al., 1988). The SEM further acknowledges that its different levels have an influence on health status and health behaviour (Orlowski, 2016), and the model attempts to reduce the overemphasis on an individual's behaviour in determining health, while working towards redressing the general neglect of the effects on health of aspects such as discrimination, unemployment, and economic inequities (McLeroy et al., 1988). Environmental initiatives are viewed as having the ability to support behavioural change in an individual (McLeroy et al., 1988). In addition, the SEM prioritises consensus and promotes defining problems and their sources with the involvement of the target population (McLeroy et al., 1988).

3.5 Chapter Summary

In this chapter, the theory underlying the conceptual framework of this research was explored and the specific model adopted by this study – the SEM – was introduced. This theoretical framework brings together the understanding of the institutional position within the wider ecology occupied by the NPO that runs the call centre being researched; the multilevel ecology within which this NPO and the people it serves exist (as reviewed in Chapter 2); and the ecological levels that may be influencing individuals, their mental health, and their behaviour of calling a mental health helpline. The main area of focus for the currently

proposed study is the interaction between the intrapersonal and institutional SEM levels within the context of mental health. Gaining understanding into the intrapersonal characteristics of callers, the patterns and reasons for their interaction with social organisations, and what ecological levels are employed when assisting them can enrich the depiction of how this informal mental healthcare system is functioning. Greater insight could also emerge on how the other levels in the SEM are contributing to the mental health status of individuals within the South African community, and the findings of the study may offer valuable feedback that can have a positive effect at the institutional, community and public policy levels, which have the widest reach. In future, all of this may support the development of more locally relevant health promotion interventions at multiple ecological levels, facilitating the reciprocal engagement between a person and his/her environment, which is at the heart of the traditional ecological systems theory (Nelson & Prilleltensky, 2010).

Chapter 4: Research Methodology

4.1 Introduction

In this chapter, information is provided on the manner in which the research was approached and executed. The research paradigm, design, and method contextualise this study's methodology within standard research practices and theories. Serving to focus the attention of the study, the research question and objectives identify the purpose for which the design and method were applied. The population is then discussed in order to describe whom this research applies to. The manner in which a sample of this population was drawn is also detailed. Thereafter, how the data was collected and analysed is explained. The chapter concludes with a discussion of this study's limitations and ethical considerations.

4.2 Research Paradigm

The philosophy underlying the research methodology utilised in this study is pragmatism. Researchers who subscribe to this paradigm value what works and is contextually appropriate to the research question, over adherence to theories or rules (Leavy, 2017). They are less preoccupied with the nature of reality and objective truth versus subjective experience, and are more concerned about the value of research, which is measured by its effectiveness, meaning the usefulness of the results in relation to the research problem (Mertens, 2015). This school of thought prioritises the research problem and believes in using a combination of approaches in the best way possible to further understanding of the issue under investigation (Creswell, 2014). Pinto (2010) refers to this as 'fitness for purpose'. Creswell (2014) defines this paradigm as one that is real-world practice oriented, attends to actions and their consequences, allows a researcher freedom to choose methods that are best-suited to the purpose and needs of a study, and draws on qualitative and quantitative assumptions.

According to this worldview, the outcomes of actions are of great importance, and thus it is the usefulness of a theory that makes it valid, not its orientation (Leavy, 2017). Pragmatism is described as one of the most widely accepted paradigmatic frameworks in mixed methods research (Biesta, 2010). According to Pinto (2010), pragmatic studies focus on real-world situations, observe a problem within its context to better understand it and, as a result, be able to solve it. The findings tend to be used for social change and policy suggestions. Furthermore, such studies are common in healthcare, and support the investigation of human experience, human adjustment, and complex, real-world, human problems in general (Pinto, 2010).

4.3 Research Design

Aiming to gain insight into a topic and context little is known about, this exploratory research gathers information through a preliminary investigation in order to create a basic overview of the current situation (DeForge, 2010; Terre Blanche, Durrheim, & Painter, 2006). Based on this, significant factors or patterns that require more detailed examination can be identified, generating focal points for future research (Blaikie, 2010). In line with the exploratory research design, this study employs inductive reasoning, beginning by gathering facts through observation, drawing conclusions, and then moving towards the possibility of making generalisations about the research population (Brink et al., 2012).

4.4 Research Method

This study was executed using mixed methods, archival research. Archival research refers to the use of existing information, gathered for other purposes, as the data for a new study (Goodwin, 2010). The archival data used for the present study are the existing telephone

counselling record sheets kept by the participating NPO. As both quantitative and qualitative data is collected on each record sheet, a mixed methods approach was chosen, in order to allow for the best possible use of the information available. The mixed methods approach describes the process of collecting and analysing quantitative and qualitative data in one study, which is believed to balance out the biases more prevalent when using either quantitative or qualitative exclusively (Creswell, 2014). In the present research, quantitative and qualitative methods were used concurrently, with both of equal priority (Creswell & Plano Clark, 2011).

4.5 Research Question

What are the demographics of callers to a nationwide South African mental health call centre, when do they call, why do they make contact, how are they assisted, and does the data reveal any significant associations?

4.6 Research Objectives

Objective 1: To establish the demographic details of callers, by extracting information from the record sheets about a caller's age, gender, race, province.

Objective 2: To examine when calls were received, by extracting information from the record sheets about the day of the week and the time/shift during which a call was received.

Objective 3: To determine whom the callers were concerned about, by analysing record sheet content.

Objective 4: To assess the concerns callers presented with, by analysing record sheet content.

Objective 5: To ascertain how callers were assisted, by analysing record sheet content.

Objective 6: To identify where callers were referred for further help, by analysing record sheet content.

Objective 7: To explore whether there are any significant associations between variables, by applying inferential statistical analyses.

4.7 Population

The population of this study is made up of people living in South Africa who contact the identified local NPO through its national mental health helplines, making use of the telephonic counselling services.

4.8 Sampling

In order to gain understanding into currently relevant factors in South Africa, the sample for this study was drawn from counselling calls documented by the NPO's call centre volunteers in the year 2017. In line with the pragmatic paradigm, it was essential that the sample selected could address the research question (Tashakkori & Teddlie, 2009).

4.8.1 Nonprobability. Applying nonprobability sampling means that not every caller in the population had a random chance of having their counselling call record sheet selected (Daniel, 2012). According to Daniel (2012), this sampling design delivers an advantage when the research is exploratory; resources like time, money and personnel are limited; and a sampling frame is not available and/or cannot be easily constructed; all of which are applicable to this study.

4.8.2 Purposive. When applying the purposive sampling technique, a researcher specifically chooses units that meet a set of predetermined criteria and thus help in addressing the research question (Tashakkori & Teddlie, 2009). Daniel (2012) too explains that purposive sampling offers greater control over sample selection, which was necessary in this study in order to ensure the record sheets in the final sample contained all the information needed to fulfil the research objectives. The purposive sampling used in this study thus had a more pragmatic motivation of guaranteeing the presence of the information needed for analysis, rather than focusing on the nature of information.

4.8.3 Inclusion/exclusion criteria. The criteria for including calls into the sample were that:

- They needed to have been counselling calls (see definition under 1.9)
- They must have been received through the helplines and not through email, SMS, or social media
- They must have been documented onto handwritten record sheets that are kept at the NPO as hard copies
- The call record sheets needed to be legible
- The call record sheets could not have missing information pertaining to age, gender, race, province, day of the week, shift during which a call was received.

4.8.4 Procedure. Beginning with March 2017 – the most recent completed month of call logs at the time ethics approval was received by the researcher – the record sheets were reviewed and the ones that met the inclusion criteria were selected. The minimum sample size required for this study was 271, which was calculated based on a sample size formula

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used when the total population size is difficult to determine (Thompson, 2012). For this calculation, a 5% confidence interval, 90% confidence level, and a standard deviation of 0.5 were utilised.

As surplus record sheets were available, the researcher decided to continue with the sampling process until 300 units of analysis were gathered. This was the final sample size. The records included in the sample were generated between 20 February 2017 and 31 March 2017.

4.9 Data Collection

As the study makes use of archival research, no primary data collection was conducted. Instead, the researcher analysed existing records generated in 2017 by the participating NPO's volunteers, who staff telephonic helplines at the call centre. These volunteers are of different ages, genders, and races. They are from diverse backgrounds and have varying degrees of experience in mental health, from psychology students to concerned community members. All volunteers undergo training, and the length of time they have been working at the NPO differs.

The data records consist of telephone log sheets (see Appendix A) completed by the volunteer counsellors at the time a counselling call is received from a member of the public. The records list biographical data and include a brief summary of the call, touching on the reason for making contact and what assistance was provided. The specific data extracted from these records for the present study was related to age, gender, race, province, day of the week, time of the call/shift, object of concern, reason for the call, type of assistance offered, and referrals provided. See section 4.12 for a discussion of the ethical issues surrounding use of the NPO's records.

4.10 Data Analysis

It is at this stage of the research process that the mixed methods approach in this study was most prominent.

4.10.1 Quantitative. The data from the record sheets related to objectives 1 and 2 – the quantitative variables of age, gender, race, province, day of the week and time of the day/shift – were captured electronically and coded. Data analysis was then conducted through the Statistical Package for the Social Sciences (SPSS) Statistics 24.0. Descriptive statistics were used to summarise and describe the data characteristics in the form of graphs, frequencies, and percentages (Rovai, Baker, & Ponton, 2014). Crosstabulations were also employed in order to provide a more detailed description of the data. In order to test for significant associations as per objective 7, the inferential non-parametric Pearson Chi-square Test of independence was utilised, as it is suited to nominal/ordinal variables and does not require data to be normally distributed (Morgan, Leech, Gloeckner, & Barrett, 2013). Where the assumptions of the Chi-Square Test were violated, the Likelihood Ratio was applied instead. When a significant Chi-Square Test or Likelihood Ratio result was obtained, the strength of that association was assessed through the Cramer's V Test (Morgan et al., 2013).

4.10.1.1 Validity and reliability. As the descriptive statistics in this study are based on direct demographic information rather than on measures of underlying constructs, they are seen as valid and reliable. To maximise the validity and reliability of the Chi-Square inferential analysis, a larger sample size was used for this research, and where the

assumptions of the Chi-Square test were violated in any way, a more suitable alternative inferential test was utilised.

4.10.2 Qualitative. For the qualitative Objectives 3 to 6, conventional content analysis was utilised (Hsieh & Shannon, 2005). According to Mark and Yardley (2004), content analysis is the practise of systemically reviewing text and coding it into categories, then counting their frequency to provide a numerical description that is linked to the research question. But Stemler (2001) warns against the view that content analysis is simply a word frequency counting technique, and Julien (2008) refers to the reduction of qualitative textual data to conceptual categories with the aim of uncovering consistent patterns or relationships between factors or themes. Adopting a ‘both/and’ rather than an ‘either/or’ approach, the researcher in this study considered important both the frequencies of categories/themes, as well as the relationships and patterns within and between categories/themes, as advised in Taylor-Powell and Renner (2003).

More specifically, the steps in qualitative content analysis followed by the researcher were based on those outlined in Roller and Lavrakas (2015), and are illustrated in Figure 3.

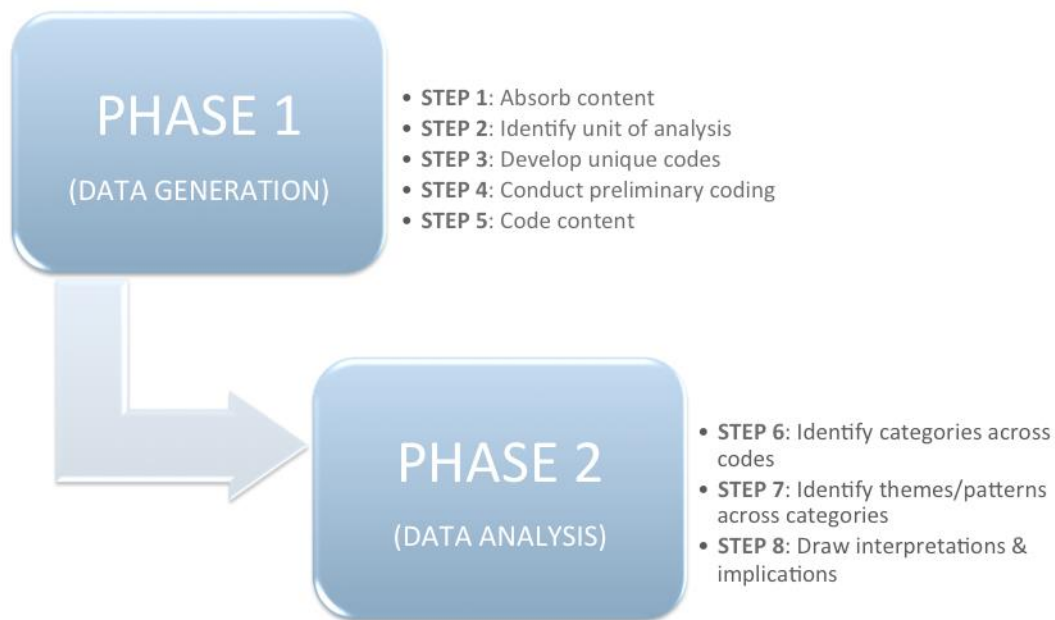

Figure 3. Steps in qualitative content analysis (Roller & Lavrakas, 2015)

After immersing herself in the content by reading through it numerous times, the researcher identified the text in the open-ended sections in a record sheet as the unit of analysis. Focusing on one qualitative objective at a time, she applied inductive coding during a preliminary coding stage, familiarised herself with the coding process, and then proceeded to code the content in all 300 record sheets that comprise this study's sample. Inductive coding draws the categories from the raw data instead of from a pre-existing theory, allowing them to emerge without preconceived boundaries. This process was repeated for each of Objectives 3 to 6. Then, within each objective, categories were abstracted from the codes, abstracting as far as possible (Elo & Kyngäs, 2008); linking (Mark & Yardley, 2004) was also used to identify higher order themes and patterns through the process of clustering conceptually related categories together; and interpretations were constructed.

4.10.2.1 Validity and reliability. Although helpful in quantifying qualitative information and adding descriptive richness to quantitative analyses, content analysis poses limitations in terms of the validity and reliability of the researcher's interpretations of textual material and the inferences based upon this (Roller & Lavrakas, 2015). To improve credibility and trustworthiness, iterative analyses were conducted, and authentic citations have been provided to illustrate the links between the raw data and the categories that emerged (Elo & Kyngäs, 2008). Working towards greater reliability within the means of available resources, the researcher's coding and categorisation were checked by her supervisor before proceeding onto Step 7 and Step 8 of the process illustrated in Figure 3 (Roller & Lavrakas, 2015). As objective reliability of the content analysis in this study has not been established, quantitatively analyses on this data were not performed.

4.11 Study Limitations

There are a number of limitations in this study that need to be considered, and within the context of which the findings should be understood.

4.11.1 Archival research. While archival research offers numerous advantages, one of its limitations relevant to this study is that the information was recorded for non-scientific purposes, and the researcher had no influence on the type and quality of data collected. Missing information and inconsistencies within the data were encountered. The researcher employed purposive sampling as a way to address this limitation by excluding such record sheets from the sample.

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Furthermore, the record sheets used as the data set were not completed by the callers as self-reports, but by the NPO's volunteer counsellors, which introduces an unknown degree of interpretation by a third party.

4.11.2 Sampling technique. The use of nonprobability purposive sampling in this study means that from a statistical perspective, making generalisations based on the findings from the sample is a challenge, as it is uncertain whether the sample is truly representative of the population. As a way to minimise the potential for researcher bias in purposive sampling, the inclusion criteria were set according to pragmatic rather than subjective judgements (see section 4.8.3).

4.12 Ethical Considerations

Ethical clearance for this study was received from the University of Pretoria (see Appendix B), and throughout the research process, the ethical guidelines of the university were observed. Written consent was also provided by the mental health NPO for the use of their existing data as part of this research, which was one of the conditions of ethical clearance for this study by the university.

4.12.1 Anonymity. Before the record sheets were handed over to the researcher, all identifying details (names, contact numbers, addresses, volunteer counsellor names) were removed in order to anonymise the data set, protecting participants' privacy.

4.12.2 Confidentiality. To protect confidentiality, the name of the participating NPO has not been revealed in this study. In addition, the anonymised data set was only examined by the researcher, her supervisor, and a statistical consultant.

4.12.3 Informed consent. Informed consent is not requested from callers at the time they contact the NPO's helplines.

Due to the measures taken to maintain confidentiality and anonymity, all NPO service users are not personally identifiable, eliminating any risk of being associated with this research. These considerations are in line with guidelines by the APA (2010), which are applicable when dispensing with informed consent for research. Due to the nature of archival research, especially when it is low risk and anonymity can be maintained, informed consent is often not required (Fisher, 2012; Koocher & Keith-Spiegel, 2008; Roberts & Ilardi, 2003).

4.12.4 Beneficence, non-maleficence, and justice. Although there was no direct contact with participants during this study, measures were taken to protect their privacy and to treat the information regarding the counselling calls with the utmost respect. The size of the sample and the kind of information presented in the research results and findings sections ensure that individual participants are not identifiable. Furthermore, the nature of this study and its findings do not pose any form of threat to people who have, are, or will be making use of this service, nor to the NPO providing the service. Instead, this study offers the potential benefits of new knowledge of the mental health needs of the population and the contextual factors that may be playing a role; guiding the improvement of the helpline services provided and the development of new initiatives by the NPO; as well as providing evidence of revisions that may be necessary in local policies and mental healthcare systems. It is the

researchers aim and hope that rather than just an academic exercise, this research is utilised to alter the circumstances of the participants and other people in South Africa needing mental health services, for the better.

4.13 Chapter Summary

Operating from a paradigm of pragmatism, this exploratory mixed methods archival research employed inductive reasoning to better understand people living in South Africa who make use of a mental health call centre run by a local NPO. More specifically, the research aimed to explore the demographics of callers, the timing of their calls, the object of their concern, the nature of the difficulty they expressed, and how they were assisted. Using nonprobability purposive sampling, a sample size of 300 was reached. There was no primary data collection due to the archival study design, instead existing counselling call record sheets kept by the NPO were examined by the researcher and information pertaining to each objective was extracted from there. To analyse this data, both quantitative analysis through SPSS Statistics 24.0 and qualitative content analysis were applied. The main study limitations relate to the nature of archival research, and to nonprobability sampling, which affect the quality of the data and the generalisability of the findings. Ethical concerns surrounding anonymity, confidentiality, informed consent, beneficence, non-maleficence, and justice have all been considered and addressed.

Chapter 5: Findings

5.1 Introduction

To answer this study's research question, quantitative and qualitative techniques were employed in order to work appropriately with the type of data available in the archival records utilised. The quantitative analysis was conducted through SPSS 24, utilising both descriptive and inferential statistics. The descriptive data are presented in frequency tables and graphs, while the inferential data are depicted using Chi-Square and Symmetric Measure tables, as well as crosstabulations and graphs. For the qualitative component of this study, content analysis tables are presented, with the main themes and categories identified.

5.2 Quantitative Results

The quantitative analysis conducted was guided by this study's objectives 1, 2 and 7:

1. Establish the demographic details of callers
2. Examine when calls were received

7. Determine whether any significant inter-variable associations exist

The 6 variables in this research that were analysed quantitatively using SPSS 24 were:

- Gender of caller
- Age of caller
- Race of caller
- Province in which caller resides
- Day of the week caller made contact
- Shift/time of day caller made contact

5.2.1 Descriptive statistics. Descriptive statistics, frequency tables, and bar graphs have been used to describe the sample of callers to the NPO helplines, as well as how calls were distributed across the days of the week and the shifts in a day.

5.2.1.1 Sample demographics. Out of a total sample of 300 records (N = 300), the majority of callers were female (76.3%; N = 229), Black (61.3%; N = 184), and residing in Gauteng (56%; N = 168). A total of 24.7% (N = 74) of callers were classified as White, 9.3% (N = 28) as Other, and 4.7% (N = 14) as Indian. KwaZulu-Natal (12.3%; N = 37) and the Western Cape (11.7%; N = 35) were the second and third most common provinces, respectively. The age group with the highest amount of calls was 20 to 29 (41.7%; N = 125), followed by 30 to 39 (19.7%; N = 59). The mean sample age was 32.26 with a standard deviation of 13.271; the minimum age was 13, while the maximum age was 87. A summary of the sample demographics is displayed in Table 1.

VARIABLE	CATEGORIES	FREQUENCY (N)	VALID PERCENT (%)	CUMULATIVE PERCENT (%)
Gender	Female	229	76.3	76.3
	Male	71	23.7	100.0
	TOTAL	300	100.0	
Age	10 – 19	35	11.7	11.7
	20 – 29	125	41.7	53.4
	30 – 39	59	19.7	73.1
	40 – 49	37	12.3	85.4
	50 – 59	33	11.0	96.4
	60 – 69	8	2.7	99.1
	70 – 79	1	0.3	99.4
	80 – 89	2	0.7	100.0
	TOTAL	300	100.0	
Race	Black	184	61.3	61.3
	Indian	14	4.7	66.0
	Other	28	9.3	75.3
	White	74	24.7	100.0
	TOTAL	300	100.0	

Province	Eastern Cape	13	4.3	4.3
	Free State	12	4.0	8.3
	Gauteng	168	56.0	64.3
	KwaZulu-Natal	37	12.3	76.6
	Limpopo	3	1.0	77.6
	Mpumalanga	15	5.0	82.6
	North West	14	4.7	87.3
	Northern Cape	3	1.0	88.3
	Western Cape	35	11.7	100.0
	TOTAL	300	100.0	

Table 1. Summary of sample demographics.

5.2.1.2 Timing of calls. As shown in Table 2, an assessment of the distribution of calls across the week revealed that more calls were received on weekdays than on weekends, with 23% (N = 69) of the calls having been received on Thursdays and 17.3% (N = 52) on Tuesdays. The day with the lowest number of calls was Sunday (8%; N = 24). In terms of the time of day when most calls were received, the NPO's 12:00 to 16:00 counselling shift received 47.3% (N = 142) of the calls, with the evening shift of 16:00 to 20:00 fielding 33.7% (N = 101) of the calls. The morning shift was the least busy (19%; N = 57).

VARIABLE	CATEGORIES	FREQUENCY (N)	VALID PERCENT (%)	CUMULATIVE PERCENT (%)
Day of the week	Monday	43	14.3	14.3
	Tuesday	52	17.3	31.6
	Wednesday	47	15.7	47.3
	Thursday	69	23.0	70.3
	Friday	37	12.3	82.6
	Saturday	28	9.3	92.0
	Sunday	24	8.0	100.0
	TOTAL	300	100.0	
Time of the day	08:00 – 12:00	57	19.0	19.0
	12:00 – 16:00	142	47.3	66.3
	16:00 – 20:00	101	33.7	100.0
	TOTAL	300	100.0	

Table 2. Summary of timing of calls.

5.2.1.3 Crosstabulation findings. Crosstabulation analyses were performed in order to gain a more in-depth understanding of the sample. The results reported here pertain only to variables with non-significant associations, which are thus not discussed in section 5.2.2 below.

Within all age groups, the majority of callers were female (see Figure 4), except in the 80 to 89 age category, where 50% (N = 1) were female and 50% (N = 1) male. There were no male callers aged between 70 and 79.

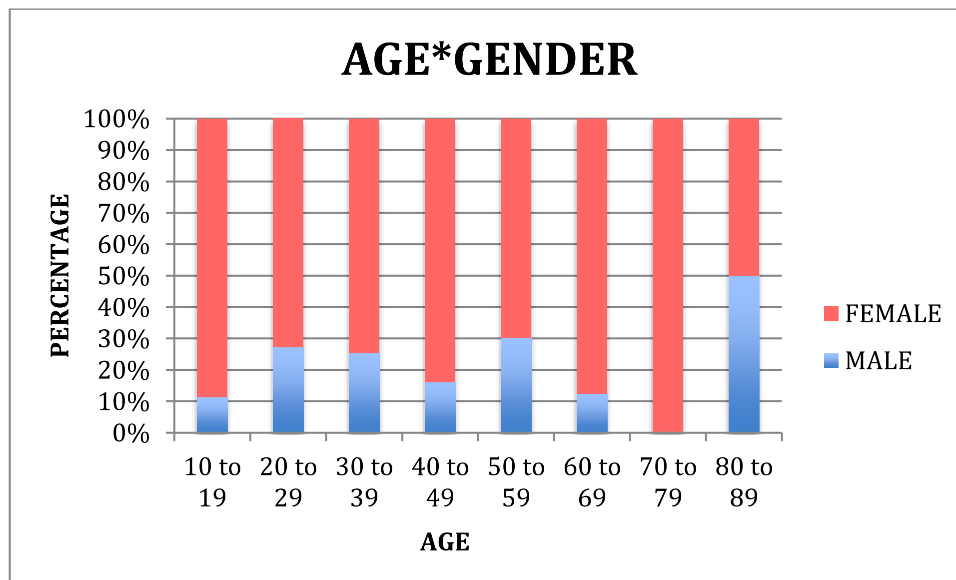

Figure 4. Age and gender crosstabulation bar graph.

For some provinces, the majority of callers were not from the 20 to 29 age group, which is the most common age group for the sample overall. As per Figure 5, callers from the Western Cape were most commonly aged 50 to 59 (28.6%; N = 10), and those in the Northern Cape, 30 to 39 (66.7%; N = 2). In Limpopo, callers were evenly split between three age categories (10 – 19; 20 – 29; 40 - 49). In the North West, the age groups of 10 to 19 (28.6%; N = 4) and 30 to 39 (28.6%; N = 4) were equally most common. Northern Cape callers were between the ages of 30 and 49 only. There were also no callers older than 49

from the North West, Limpopo, and the Eastern Cape. The greatest variation in the age group of callers was seen in Gauteng, KwaZulu-Natal, and the Western Cape.

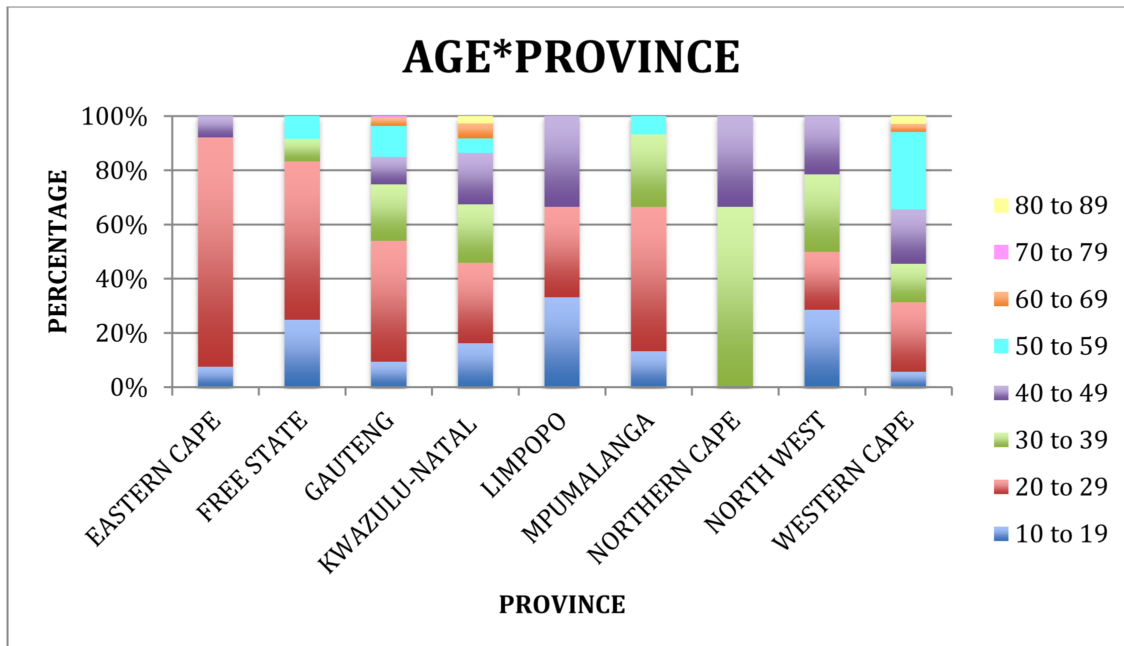

Figure 5. Age and province crosstabulation bar graph.

For the Northern Cape, most callers were male and not female, as is the case for the rest of the sample (see Figure 6). The least variation in the gender of callers was in the Western Cape, where 57.1% (N = 20) were female, and 42.9% (N = 15) male.

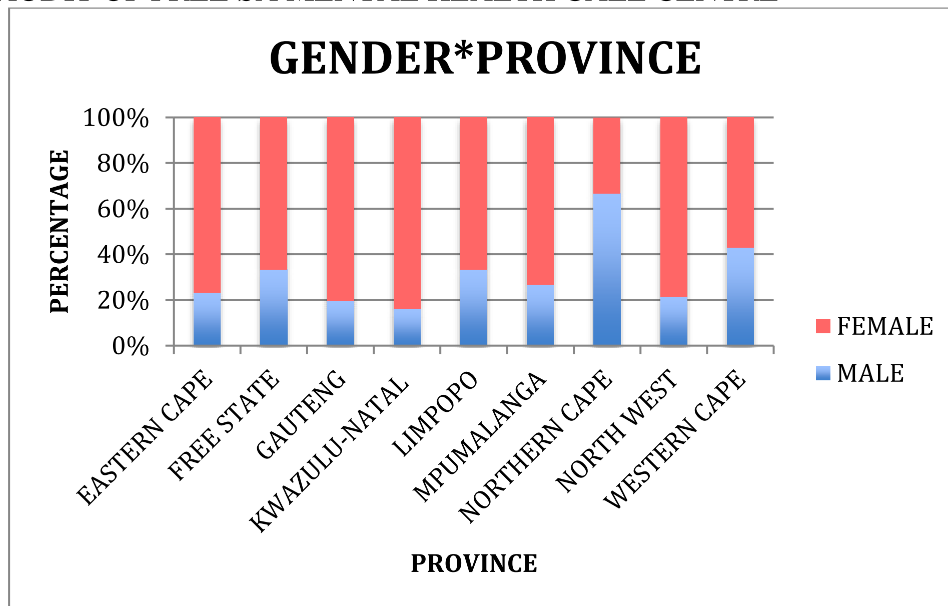

Figure 6. Gender and province crosstabulation bar graph.

As depicted in Figure 7, the day of the week with the highest number of female callers (19%; N = 57) was Thursday, while the day with the highest number of male callers (6%; N = 18) was Tuesday.

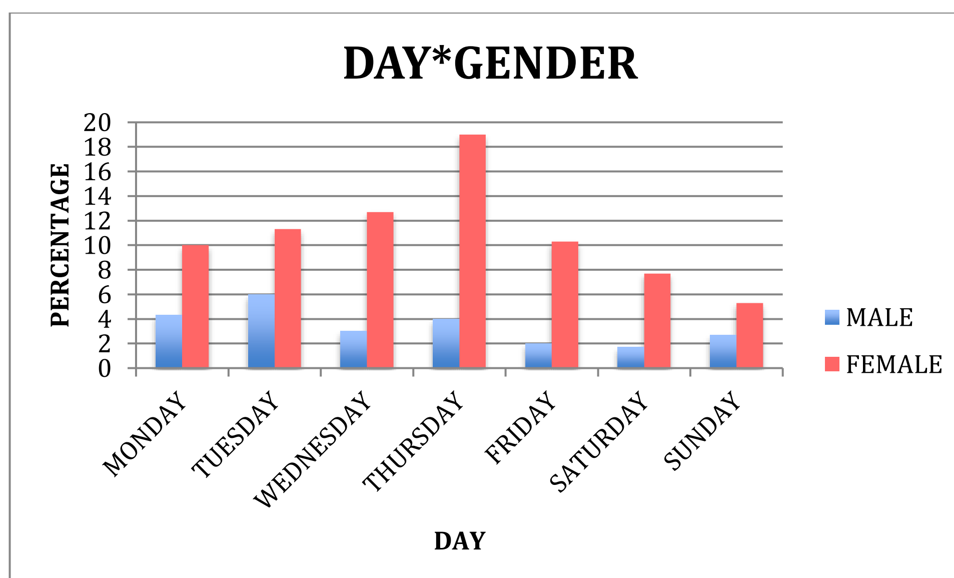

Figure 7. Day and gender crosstabulation bar graph.

While calls from all race groups were the highest on Thursdays, Black callers made the least contact on a Sunday (3.7%; N = 11); White (1.7%; N = 5) and Other (0.3%; N = 1) callers on a Saturday; and calls from the Indian population were the least on Wednesdays, Fridays, and Saturdays (0.3%; N = 1) (see Figure 8).

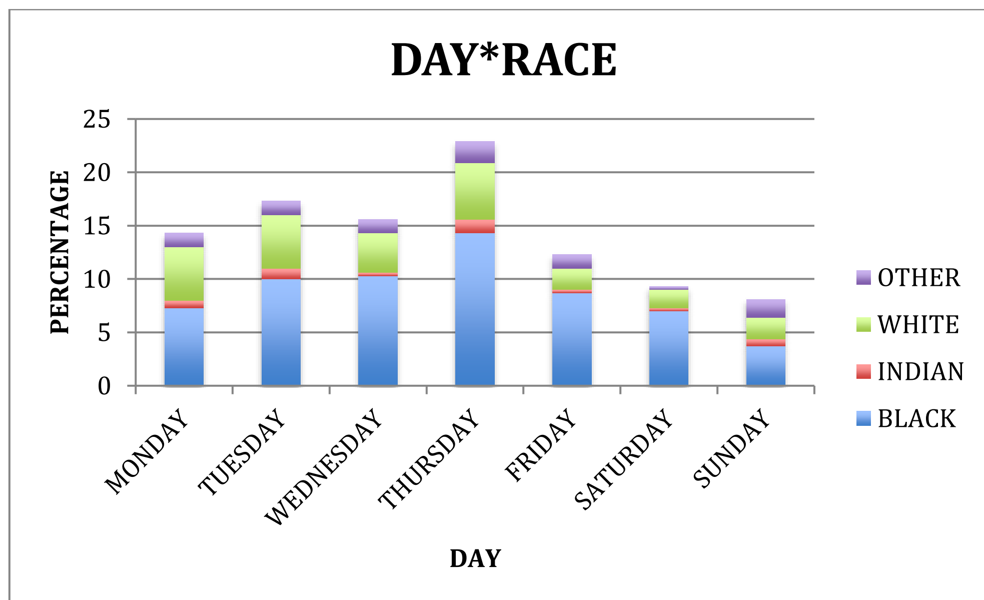

Figure 8. Day and race crosstabulation bar graph.

On each day of the week, calls from Gauteng were the most common, as illustrated in Figure 9. Western Cape callers contacted the helplines most on a Tuesday (3.3%; N = 10); those from Gauteng (11.3%; N = 34), KwaZulu-Natal (4.3%; N = 13), Mpumalanga (2.7%; N = 8), and the North West (1.7%; N = 5) made the most contact on a Thursday, and the most calls from the Eastern Cape came in on Wednesdays and Saturdays (1.3%; N = 4). Calls from the Free State, Limpopo, and the Northern Cape were more evenly spread throughout the week.

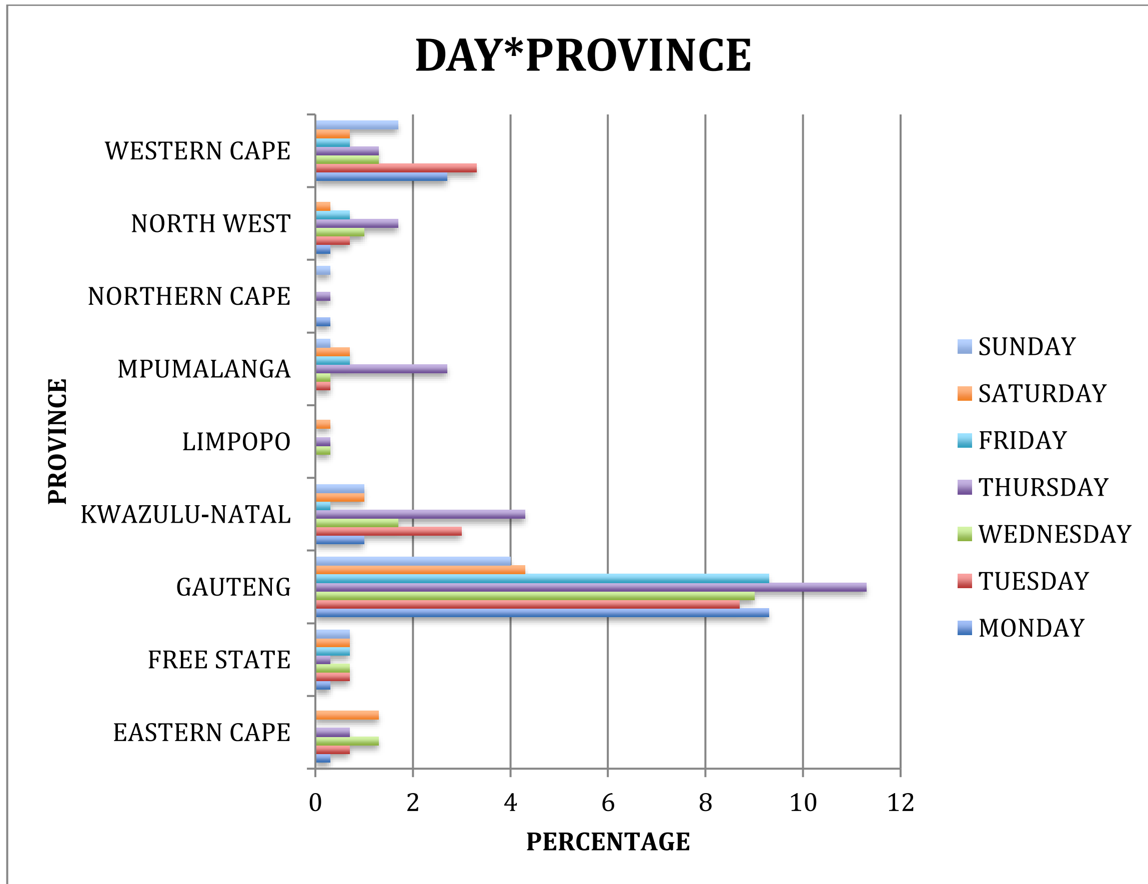

Figure 9. Day and province crosstabulation bar graph.

The majority of age groups contacted the helplines the most during the 12:00 to 16:00 shift (see Figure 10). Callers aged 10 to 19 made the most contact during the 16:00 to 20:00 shift (6%; N = 18); those aged between 70 and 79, during the 08:00 to 12:00 shift (0.3%; N = 1); and the 08:00 to 12:00 and 16:00 to 20:00 shifts were equally the most popular with 80 to 89 year olds (0.3%; N = 1).

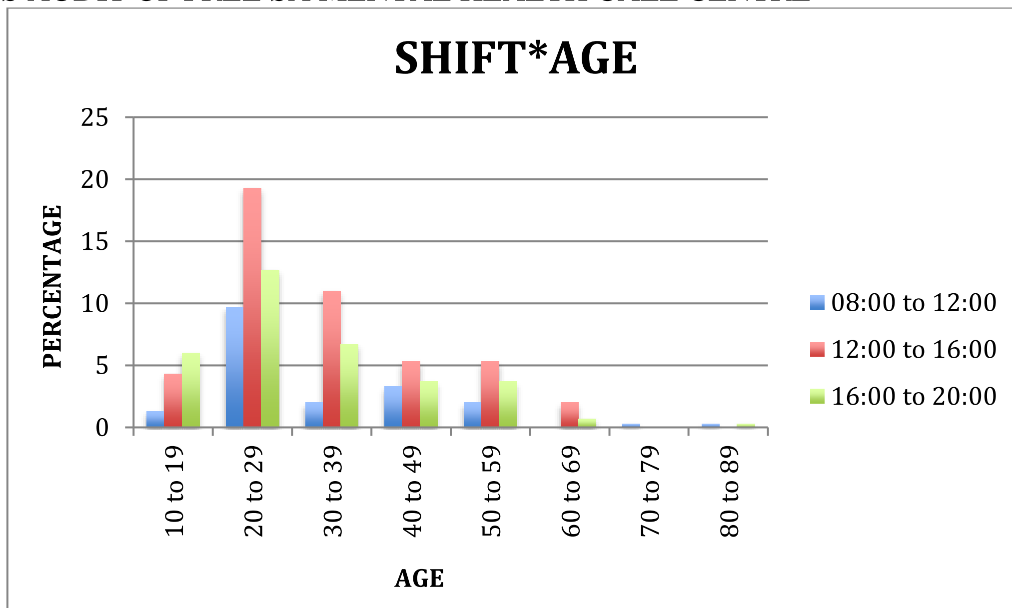

Figure 10. Shift and age crosstabulation bar graph.

As seen in Figure 11, both men (12%; N = 36) and women (35.3%; N = 106) called most often during the 12:00 to 16:00 shift.

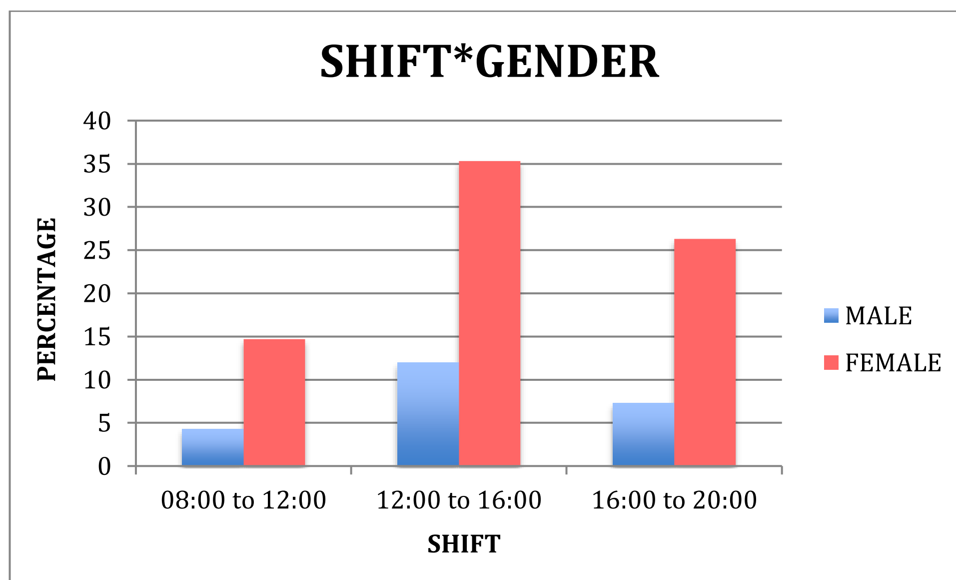

Figure 11. Shift and gender crosstabulation bar graph.

The 12:00 to 16:00 shift was the most popular with Black, White, and Other callers. However, Indian callers made the least contact during this shift (1.3%; N = 4), with the other two shifts receiving an equal number of calls from the Indian population (1.7%; N = 5) (see Figure 12).

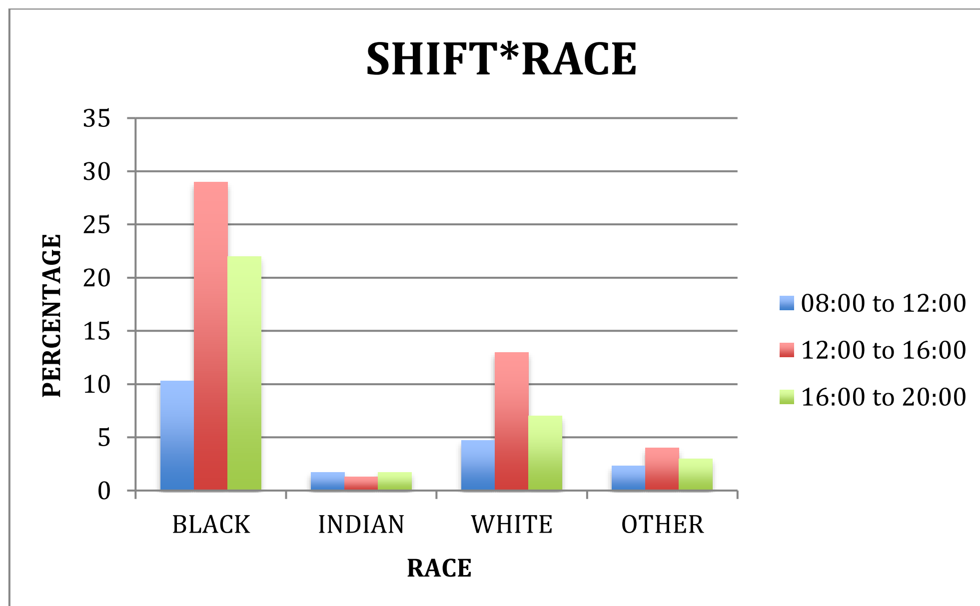

Figure 12. Shift and race crosstabulation bar graph.

5.2.2 Inferential statistics. The results of the descriptive analysis allowed inferential statistics to be applied, as per objective 7. For the purposes of this inferential analysis, the age variable was converted into categories and the Pearson Chi-square Test of independence was applied. This is a non-parametric test, which does not require data to be normally distributed. The Chi-Square analysis is utilised with nominal or ordinal variables to investigate whether a significant association exists between them. This test of independence is not a measure of causality, even when a significant association is established. For the purposes of this study, when the assumptions of the Chi-Square Test were violated, the Likelihood Ratio was utilised instead.

For all Pearson Chi-Square analyses performed, the hypothesis was as follows:

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H_0: The variables analysed are independent.

H_a: The variables analysed are not independent.

A statistical significance level of $p \leq 0.05$ was adopted. Only the associations that were found to be significant at this p-value have been detailed below.

5.2.2.1 Age and race. The minimum expected cell frequency was violated, thus the Likelihood Ratio was used instead of the Pearson Chi-Square value (see Table 3). The Likelihood Ratio indicates a significant association between race and age x^2 (1) = 70.605 and $p < 0.001$. As per Table 4, the Cramer's V value was 0.283, which shows a large effect size.

Chi-Square Test

	Value	df	Asymptotic Significance (2-sided)
Pearson Chi-Square	72.214[a]	21	.000
Likelihood Ratio	70.605	21	.000
Linear-by-Linear Association	51.768	1	.000
N of Valid Cases	300		

a. 19 cells (59.4%) have expected count less than 5. The minimum expected count is .05.

Table 3. Age and race Chi-Square Test.

Symmetric Measures

		Value	Approximate Significance
Nominal by Nominal	Phi	.491	.000
	Cramer's V	.283	.000
N of Valid Cases		300	

Table 4. Age and race Symmetric Measures.

Age * Race Crosstabulation

			Race				Total
			Black	Indian	White	Other	
Age	10 to 19	Count	29	1	3	2	35
		% of Total	9.7%	0.3%	1.0%	0.7%	11.7%
	20 to 29	Count	95	4	19	7	125
		% of Total	31.7%	1.3%	6.3%	2.3%	41.7%
	30 to 39	Count	37	3	15	4	59
		% of Total	12.3%	1.0%	5.0%	1.3%	19.7%
	40 to 49	Count	15	3	11	8	37
		% of Total	5.0%	1.0%	3.7%	2.7%	12.3%
	50 to 59	Count	7	3	17	6	33
		% of Total	2.3%	1.0%	5.7%	2.0%	11.0%
	60 to 69	Count	1	0	6	1	8
		% of Total	0.3%	0.0%	2.0%	0.3%	2.7%
	70 to 79	Count	0	0	1	0	1
		% of Total	0.0%	0.0%	0.3%	0.0%	0.3%
	80 to 89	Count	0	0	2	0	2
		% of Total	0.0%	0.0%	0.7%	0.0%	0.7%
Total		Count	184	14	74	28	300
		% of Total	61.3%	4.7%	24.7%	9.3%	100.0%

Table 5. Age and race crosstabulation.

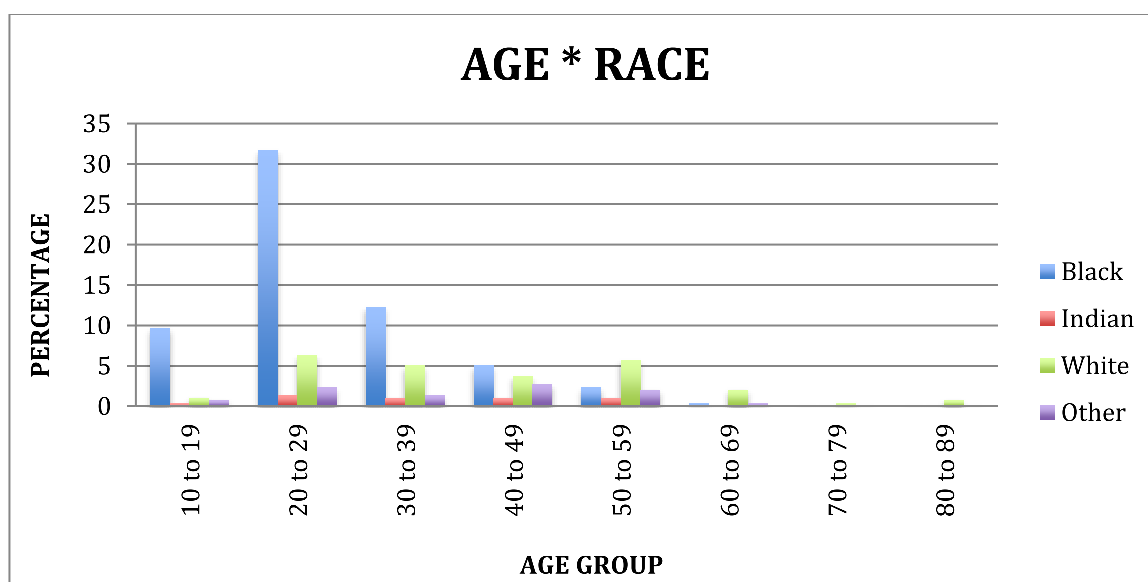

Figure 13. Age and race crosstabulation bar graph.

On examination of Table 5 and Figure 13, the Indian and Other race categories followed the expected sample pattern of being the two least common races of callers within each age group. However, while the majority of callers between ages 10 and 49 were Black, the majority of callers in the 50 to 89 age group were White. This suggests Black callers who contacted the helplines tended to be younger, while White callers were more likely older.

5.2.2.2 Age and day of the week. As this analysis violated the minimum expected cell frequency assumption of the Chi-Square Test, the Likelihood Ratio was utilised instead (see Table 6). The Likelihood Ratio indicates a significant association between age and day of the week x^2 (1) = 58.835, p = 0.044. As per Table 7, the Cramer's V value was 0.179, which reflects a medium effect size.

Chi-Square Test

	Value	df	Asymptotic Significance (2-sided)
Pearson Chi-Square	57.857[a]	42	.052
Likelihood Ratio	58.835	42	.044
Linear-by-Linear Association	4.849	1	.028
N of Valid Cases	300		

a. 32 cells (57.1%) have expected count less than 5. The minimum expected count is .08.

Table 6. Age and day Chi-Square Test.

Symmetric Measures

		Value	Approximate Significance
Nominal by Nominal	Phi	.439	.052
	Cramer's V	.179	.052
N of Valid Cases		300	

Table 7. Age and day Symmetric Measures.

Age * Date: Day Crosstabulation

			Date: Day							
			Monday	Tuesday	Wednesday	Thursday	Friday	Saturday	Sunday	Total
Age	10 to 19	Count	2	5	4	10	3	7	4	35
		% of Total	0.7%	1.7%	1.3%	3.3%	1.0%	2.3%	1.3%	11.7%
	20 to 29	Count	17	21	26	20	17	14	10	125
		% of Total	5.7%	7.0%	8.7%	6.7%	5.7%	4.7%	3.3%	41.7%
	30 to 39	Count	8	9	5	22	10	2	3	59
		% of Total	2.7%	3.0%	1.7%	7.3%	3.3%	0.7%	1.0%	19.7%
	40 to 49	Count	8	8	4	6	5	1	5	37
		% of Total	2.7%	2.7%	1.3%	2.0%	1.7%	0.3%	1.7%	12.3%
	50 to 59	Count	7	9	3	9	2	2	1	33
		% of Total	2.3%	3.0%	1.0%	3.0%	0.7%	0.7%	0.3%	11.0%
	60 to 69	Count	0	0	4	1	0	2	1	8
		% of Total	0.0%	0.0%	1.3%	0.3%	0.0%	0.7%	0.3%	2.7%
	70 to 79	Count	0	0	0	1	0	0	0	1
		% of Total	0.0%	0.0%	0.0%	0.3%	0.0%	0.0%	0.0%	0.3%
	80 to 89	Count	1	0	1	0	0	0	0	2
		% of Total	0.3%	0.0%	0.3%	0.0%	0.0%	0.0%	0.0%	0.7%
Total		Count	43	52	47	69	37	28	24	300
		% of Total	14.3%	17.3%	15.7%	23.0%	12.3%	9.3%	8.0%	100.0%

Table 8. Age and day crosstabulation.

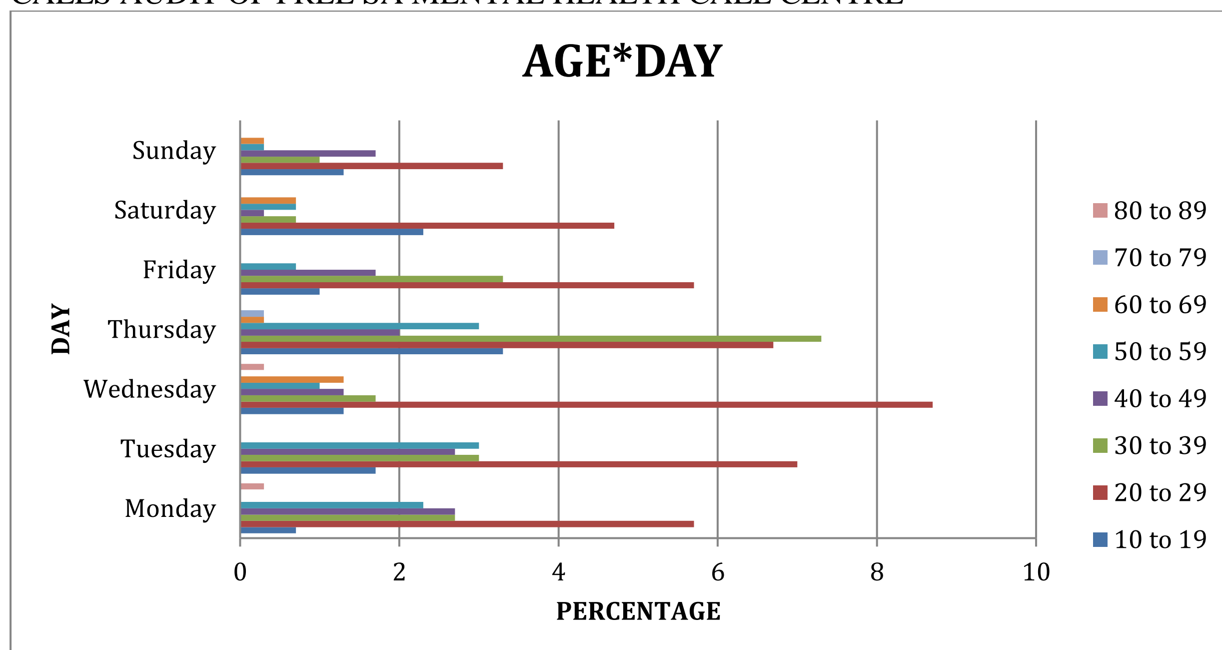

Figure 14. Age and day crosstabulation bar graph.

Table 8 and Figure 14 depict the days on which callers from different age groups contacted the helplines. The majority of callers were in the 20 to 29 age group for all days expect Thursdays, when there was a peak in calls from 30 to 39 year olds. For 10 to 19 year old callers, the most calls were on Thursdays, and the least on Mondays. The 20 to 29 age group was most prominent on Wednesdays, when it most strongly outweighed callers from other age groups. The 30 to 39 year old callers contacted the NPO the least over weekends. Mondays and Tuesdays had the most 40 to 49 year old callers, and Saturdays, the least. Saturdays were also the least common for 50 to 59 year olds, who tended to call most on Tuesdays and Thursdays. Most calls from 60 to 69 year olds were received on Wednesdays. Calls from 70 to 89 year olds were very few.

5.2.2.3 Gender and race. The Pearson Chi-Square Test for independence was used for this analysis and it revealed an association between gender and race x^2 (1) = 7.764, p =

0.051 (see Table 9). Due to the fact that the p value of 0.051 is extremely close to 0.05 – the statistical significance level adopted by this study – the researcher viewed this finding as statistically significant for the purpose of this research. As per Table 10, the Cramer's V value was 0.161, which indicates a small effect size.

Chi-Square Test

	Value	df	Asymptotic Significance (2-sided)
Pearson Chi-Square	7.764[a]	3	.051
Likelihood Ratio	7.296	3	.063
Linear-by-Linear Association	4.841	1	.028
N of Valid Cases	300		

a. 1 cells (12.5%) have expected count less than 5. The minimum expected count is 3.31.

Table 9. Gender and race Chi-Square Test.

Symmetric Measures

		Value	Approximate Significance
Nominal by Nominal	Phi	.161	.051
	Cramer's V	.161	.051
N of Valid Cases		300	

Table 10. Gender and race Symmetric Measures.

Gender * Race Crosstabulation

			Race				
			Black	Indian	White	Other	Total
Gender	Male	Count	35	6	20	10	71
		% of Total	11.7%	2.0%	6.7%	3.3%	23.7%
	Female	Count	149	8	54	18	229
		% of Total	49.7%	2.7%	18.0%	6.0%	76.3%
Total		Count	184	14	74	28	300
		% of Total	61.3%	4.7%	24.7%	9.3%	100.0%

Table 11. Gender and race crosstabulation.

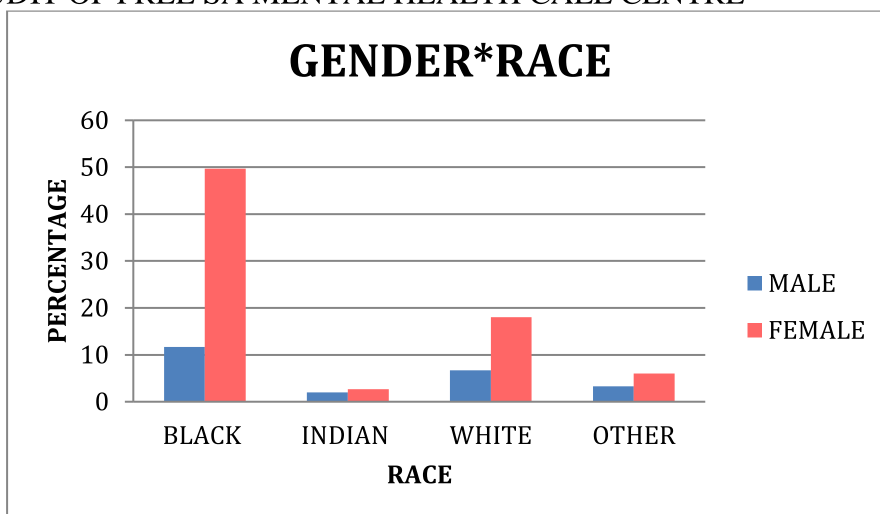

Figure 15. Gender and race crosstabulation bar graph.

In each race category, female callers were predominant, as evident in Table 11 and Figure 15. The least disparity in the gender of callers was found within the Indian racial group, with the greatest variation found in the Black racial group.

5.2.2.4 Province and race. This analysis violated one of the assumptions of the Chi-Square Test, namely the minimum expected cell frequency (see Table 12). The Likelihood Ratio was thus utilised instead and it showed a significant association between race and province x^2 (1) = 76.876 and p < 0.001. As per Table 13, the Cramer's V value was 0.320, which indicates a large effect size.

Chi-Square Test

	Value	df	Asymptotic Significance (2-sided)
Pearson Chi-Square	92.155[a]	24	.000
Likelihood Ratio	76.876	24	.000
Linear-by-Linear Association	17.846	1	.000
N of Valid Cases	300		

a. 24 cells (66.7%) have expected count less than 5. The minimum expected count is .14.

Table 12. Province and race Chi-Square Test.

Symmetric Measures

		Value	Approximate Significance
Nominal by Nominal	Phi	.554	.000
	Cramer's V	.320	.000
N of Valid Cases		300	

Table 13. Province and race Symmetric Measures.

Province * Race Crosstabulation

			Race				
			Black	Indian	White	Other	Total
Province	Eastern Cape	Count	10	0	2	1	13
		% within Province	76.9%	0.0%	15.4%	7.7%	100.0%
		% of Total	3.3%	0.0%	0.7%	0.3%	4.3%
	Free State	Count	10	0	1	1	12
		% within Province	83.3%	0.0%	8.3%	8.3%	100.0%
		% of Total	3.3%	0.0%	0.3%	0.3%	4.0%
	Gauteng	Count	105	7	48	8	168
		% within Province	62.5%	4.2%	28.6%	4.8%	100.0%
		% of Total	35.0%	2.3%	16.0%	2.7%	56.0%
	KwaZulu-Natal	Count	20	6	9	2	37
		% within Province	54.1%	16.2%	24.3%	5.4%	100.0%
		% of Total	6.7%	2.0%	3.0%	0.7%	12.3%
	Limpopo	Count	3	0	0	0	3
		% within Province	100.0%	0.0%	0.0%	0.0%	100.0%
		% of Total	1.0%	0.0%	0.0%	0.0%	1.0%
	Mpumalanga	Count	15	0	0	0	15
		% within Province	100.0%	0.0%	0.0%	0.0%	100.0%
		% of Total	5.0%	0.0%	0.0%	0.0%	5.0%
	Northern Cape	Count	2	0	1	0	3
		% within Province	66.7%	0.0%	33.3%	0.0%	100.0%
		% of Total	0.7%	0.0%	0.3%	0.0%	1.0%
	North West	Count	10	0	4	0	14
		% within Province	71.4%	0.0%	28.6%	0.0%	100.0%
		% of Total	3.3%	0.0%	1.3%	0.0%	4.7%
	Western Cape	Count	9	1	9	16	35
		% within Province	25.7%	2.9%	25.7%	45.7%	100.0%
		% of Total	3.0%	0.3%	3.0%	5.3%	11.7%
Total		Count	184	14	74	28	300
		% of Total	61.3%	4.7%	24.7%	9.3%	100.0%

Table 14. Province and race crosstabulation.

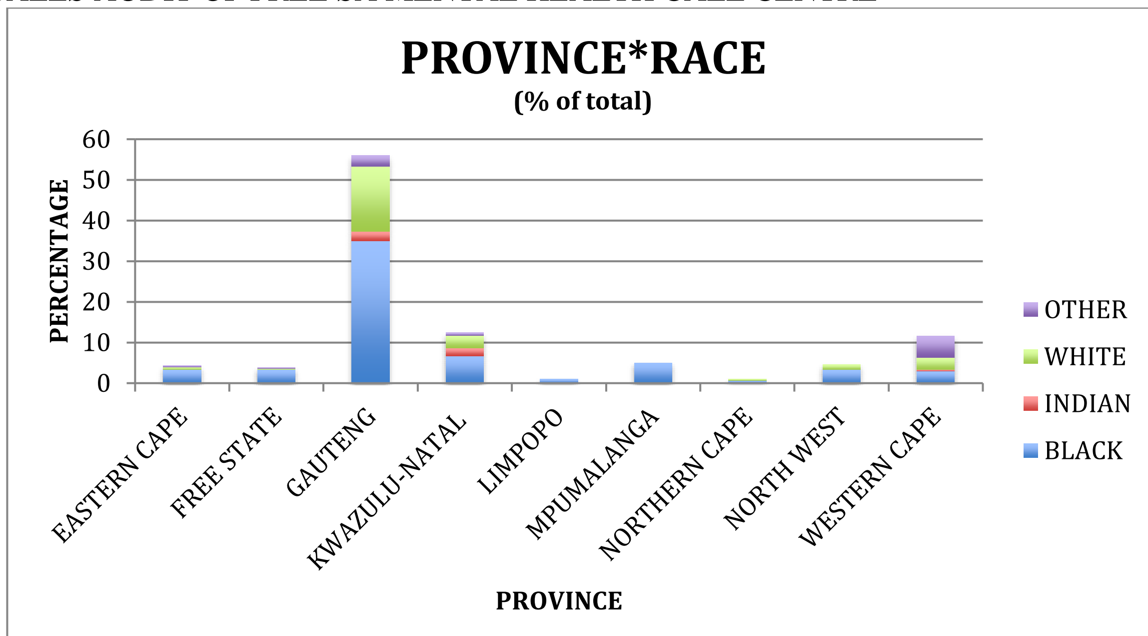

Figure 16. Province and race (percentage of total) crosstabulation bar graph.

As illustrated by Table 14 and Figure 16, in all provinces the majority of callers were classified as Black, except in the Western Cape where the majority of callers (5.3%; N = 16) were classified as Other, and there was an equal amount of Black (3%; N = 9) and White (3%; N = 9) callers. Most Black callers (35%; N = 105) were from Gauteng, so were most Indian callers (2.3%; N = 7), and most White callers (16%; N = 48). The most Other callers (5.3%; N = 16) were from the Western Cape.

Assessing the racial groups of callers within different provinces, Figure 17 shows that callers from Limpopo and Mpumalanga were only of Black race. Indian callers only made contact from Gauteng, KwaZulu-Natal, and the Western Cape. There were no callers classified in the Other race category from the Northern Cape and the North West.

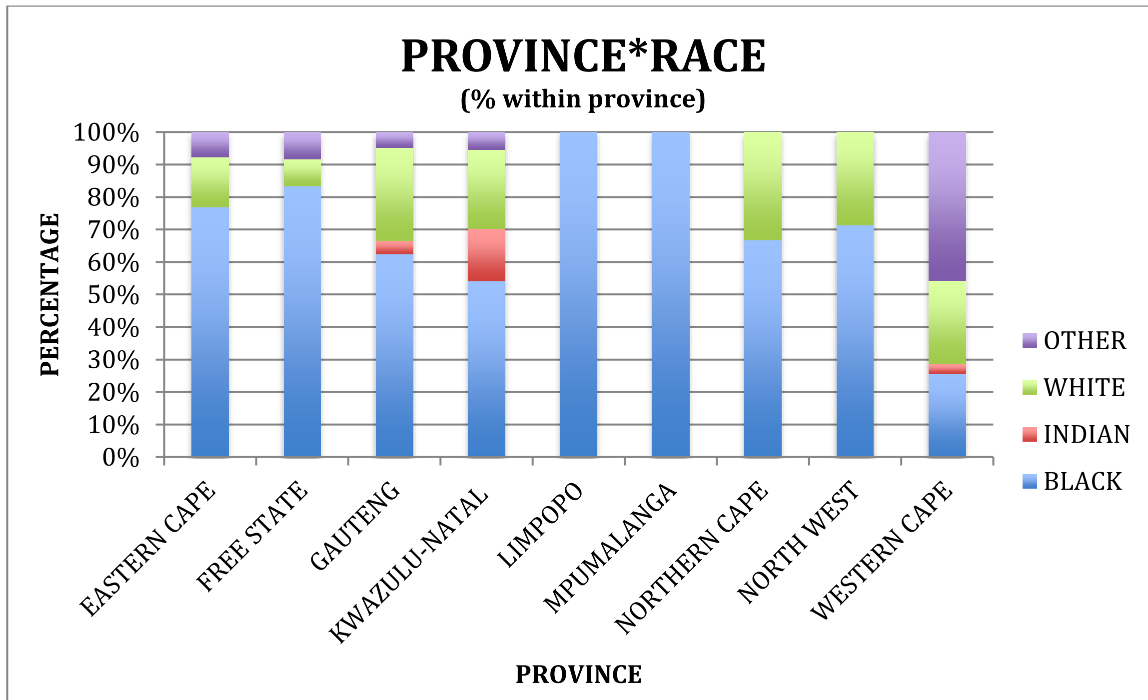

Figure 17. Province and race (percentage within province) crosstabulation bar graph.

5.2.2.5 Province and shift. As one of the assumptions of the Chi-Square Test was violated, namely the minimum expected cell frequency, the Likelihood Ratio was used for this analysis (see Table 15). The Likelihood Ratio indicates a significant association between province and shift x^2 (1) = 33.524 and p = 0.006. As per Table 16, the Cramer's V value was 0.229, which indicates a medium effect size.

Chi-Square Test

	Value	df	Asymptotic Significance (2-sided)
Pearson Chi-Square	31.456[a]	16	.012
Likelihood Ratio	33.524	16	.006
Linear-by-Linear Association	.869	1	.351
N of Valid Cases	300		

a. 13 cells (48.1%) have expected count less than 5. The minimum expected count is .57.

Table 15. Province and shift Chi-Square Test.

Symmetric Measures

		Value	Approximate Significance
Nominal by Nominal	Phi	.324	.012
	Cramer's V	.229	.012
N of Valid Cases		300	

Table 16. Province and shift Symmetric Measures.

Province * Shift Crosstabulation

			Shift			
			08:00-12:00	12:00-16:00	16:00-20:00	Total
Province	Eastern Cape	Count	5	5	3	13
		% of Total	1.7%	1.7%	1.0%	4.3%
	Free State	Count	0	6	6	12
		% of Total	0.0%	2.0%	2.0%	4.0%
	Gauteng	Count	34	92	42	168
		% of Total	11.3%	30.7%	14.0%	56.0%
	KwaZulu-Natal	Count	4	11	22	37
		% of Total	1.3%	3.7%	7.3%	12.3%
	Limpopo	Count	0	2	1	3
		% of Total	0.0%	0.7%	0.3%	1.0%
	Mpumalanga	Count	2	6	7	15
		% of Total	0.7%	2.0%	2.3%	5.0%
	Northern Cape	Count	0	1	2	3
		% of Total	0.0%	0.3%	0.7%	1.0%
	North West	Count	5	3	6	14
		% of Total	1.7%	1.0%	2.0%	4.7%
	Western Cape	Count	7	16	12	35
		% of Total	2.3%	5.3%	4.0%	11.7%
Total		Count	57	142	101	300
		% of Total	19.0%	47.3%	33.7%	100.0%

Table 17. Province and shift crosstabulation.

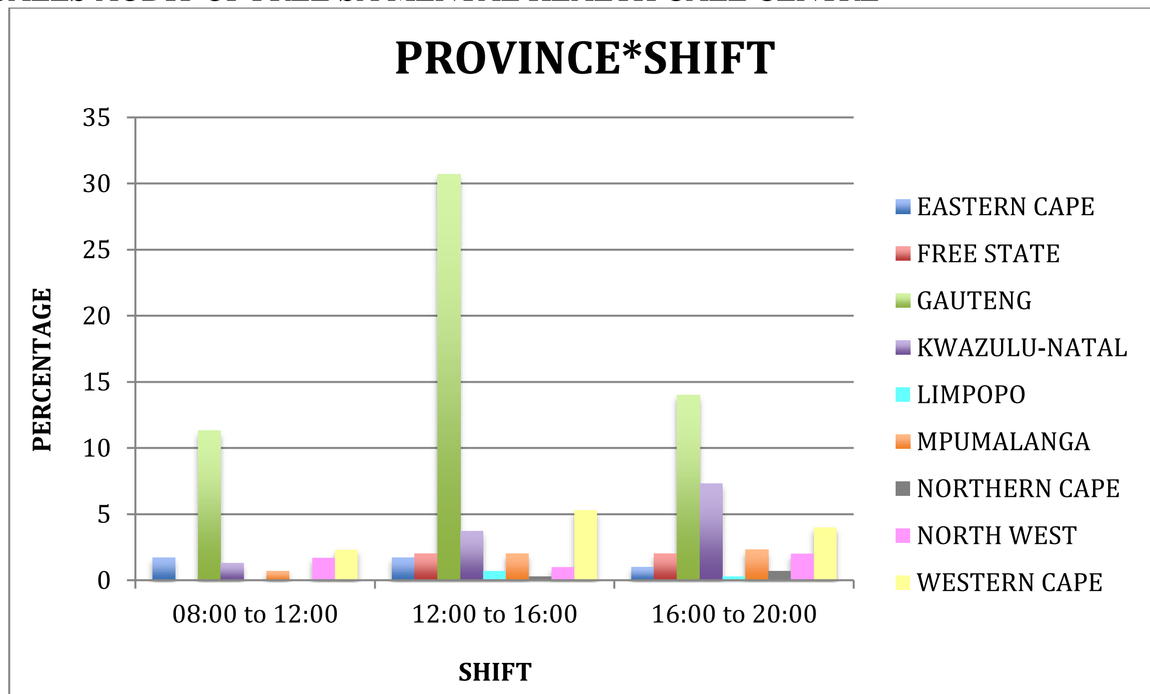

Figure 18. Province and shift crosstabulation bar graph.

For all of the shifts, the majority of callers, by far, were from Gauteng (see Table 17 and Figure 18). During the 08:00 to 12:00 shift, there were no callers from the Free State, Limpopo, and the Northern Cape. This was the only shift not receiving calls from all provinces. The 12:00 to 16:00 shift received more than double the amount of calls from Gauteng than either of the other shifts. It was also the shift with the most calls from the Western Cape. Calls from KwaZulu-Natal peaked during the 16:00 to 20:00 shift. Calls from the other provinces tended to have less extreme variation between the different shifts.

5.2.2.6 Day of the week and shift. The Pearson Chi-Square Test was used in this analysis (see Table 18). The Chi-Square Test for independence indicates a significant association between shift and day of the week x^2 (1) = 47.564 and $p < 0.001$. As per Table

19, the Cramer's V value was 0.282, which indicates a large association between day of the week and shift.

Chi-Square Test

	Value	df	Asymptotic Significance (2-sided)
Pearson Chi-Square	47.564[a]	12	.000
Likelihood Ratio	47.945	12	.000
Linear-by-Linear Association	.409	1	.522
N of Valid Cases	300		

a. 1 cells (4.8%) have expected count less than 5. The minimum expected count is 4.56.

Table 18. Day and shift Chi-Square Test.

Symmetric Measures

		Value	Approximate Significance
Nominal by Nominal	Phi	.398	.000
	Cramer's V	.282	.000
N of Valid Cases		300	

Table 19. Day and shift Symmetric Measures.

Date: Day * Shift Crosstabulation

			Shift			
			08:00-12:00	12:00-16:00	16:00-20:00	Total
Date: Day	Monday	Count	4	29	10	43
		% of Total	1.3%	9.7%	3.3%	14.3%
	Tuesday	Count	7	25	20	52
		% of Total	2.3%	8.3%	6.7%	17.3%
	Wednesday	Count	6	33	8	47
		% of Total	2.0%	11.0%	2.7%	15.7%
	Thursday	Count	13	20	36	69
		% of Total	4.3%	6.7%	12.0%	23.0%
	Friday	Count	14	18	5	37
		% of Total	4.7%	6.0%	1.7%	12.3%
	Saturday	Count	7	11	10	28
		% of Total	2.3%	3.7%	3.3%	9.3%
	Sunday	Count	6	6	12	24
		% of Total	2.0%	2.0%	4.0%	8.0%
Total		Count	57	142	101	300
		% of Total	19.0%	47.3%	33.7%	100.0%

Table 20. Day and shift crosstabulation.

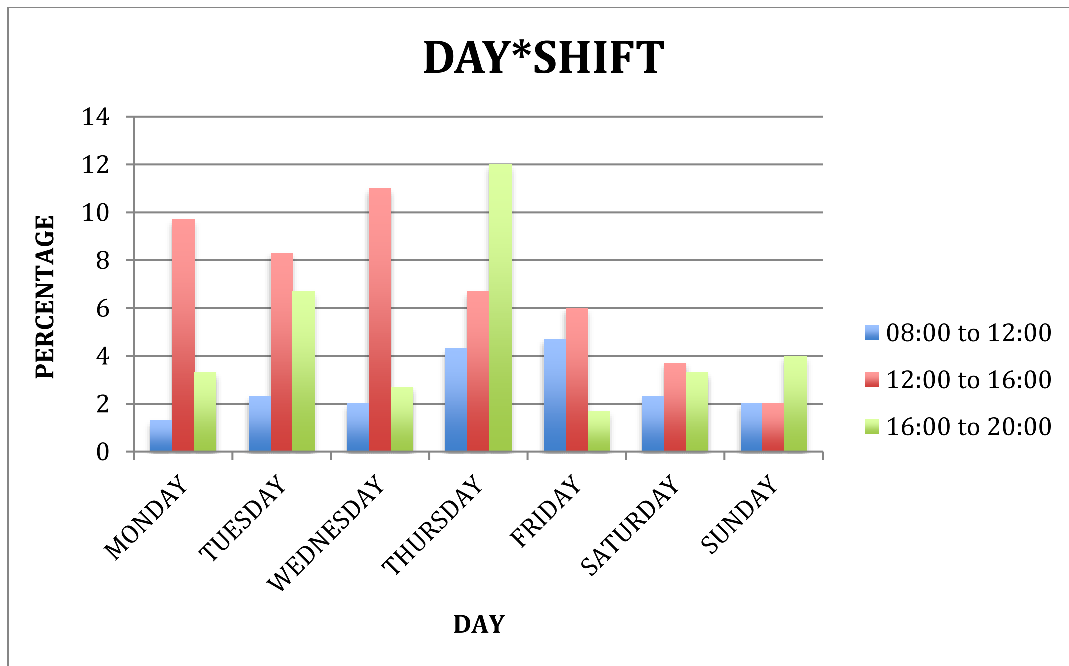

Figure 19. Day and shift crosstabulation bar graph.

An examination of the call volume distribution across shifts on different days of the week (see Table 20 and Figure 19) reveals that on most days, the majority of calls were received during the 12:00 to 16:00 shift. The exceptions to this are Thursdays and Sundays, when more calls were received during the 16:00 to 20:00 shift. The morning 08:00 to 12:00 shift was busiest on Fridays.

5.3 Qualitative Results

The qualitative research method of content analysis was applied in order to deliver on objectives 3, 4, 5 and 6:

3. Determine who the callers were concerned about.
4. Assess the difficulties callers were experiencing.
5. Ascertain how callers were assisted during the brief telephonic counselling.

6. Identify where callers were referred to for further help.

5.3.1 Content analysis. The frequencies reported below only serve as an indication of the main categories and themes that emerged under each objective, as quantitative analyses were not applied to this data as a secondary step.

5.3.1.1 Object of concern. In the whole sample (N = 300), 4 records were unclear and no conclusion could be drawn about who the caller focused on or was concerned about. As shown in Table 21, out of a total of 296 records, 251 (85%) were self-focused, 41 (14%) were about a close loved one – most often a child, and 4 (1%) were about someone other than the caller or a loved one. These categories are mutually exclusive.

MAIN THEMES	SUB-CATEGORIES	CRITERIA FOR INCLUSION	SELECTED DATA FROM RECORDS
Self (251)	None	Caller expressed self-related concerns	*"...she is having problems in her marriage..."* *"...caller has a problem with her anger..."* *"...feels depressed, can't get out of bed..."* *"...called in tears about levels of stress, anxiety and depression..."*
	Child (12)		*"...son is mentally disturbed..."* *"...son has ADHD..."* *"...daughter threatened to commit suicide..."* *"...son was expelled from school, he uses Nyaope..."*
	Sibling (9)		*"...sister attempted suicide..."* *"...brother is delusional, he is being attacked by illuminati..."* *"...concerned about her brother – thinks that he is an alcoholic..."* *"...wanting a referral for her brother who*

Close loved one (41)		Caller expressed concerns about a loved one	*needed help with substance abuse…"*
	Extended family (7)		*"…father-in-law is bipolar, in a constant manic state…"* *"…nephew diagnosed with schizophrenia…"* *"…granddaughter is now on Nyaope…"* *"…granddaughter is severely depressed…"*
	Partner (6)		*"…husband been abusing alcohol…"* *"…wife has been in clinic last year…"* *"…worried about her husband, he goes drinking the whole night…"* *"…husband, suicidal and alcoholic…"*
	Parent (5)		*"…mom is an alcoholic and has been raped last night…"* *"…problem with mom, takes clothes off…"* *"…her father is struggling with depression…"* *"…concerned about her mother who appears depressed…"*
	Friend (2)		*"…friend sent him a message saying she wants to commit suicide…"* *"…phoned in connection with his friend who he suspects has depressive bipolar…"*
Other (4)	Neighbour (2)	Caller expressed concerns about someone other than self or loved one	*"…children living near her, living with their stepfather, he beats them…"* *"…needs help for a neighbour who is terminally ill…"*
	Patient (1)		*"…called re a patient she is seeing…"*
	Other (1)		*"…she spoke about a gentleman who's GP suspects he may be schizophrenic…"*

Table 21. Content analysis – object of concern.

5.3.1.2 Difficulties experienced by callers. From the entire sample (N = 300), 6 records were unclear as to the difficulties callers were experiencing; these were excluded

from the content analysis. It is important to note that more than one difficulty was often listed in a record for a single caller, and where these difficulties varied in nature, each one was coded appropriately and included in the analysis. The categories are thus not mutually exclusive.

As seen in Table 22, the most frequent difficulty theme was mental illness (227), depression (113) being by far the most common sub-category across all, with anxiety (50) secondary under the mental illness theme. Social difficulties (121), especially interpersonal problems (105), was the second most common theme, with nearly half of interpersonal difficulties related to a romantic relationship. Loneliness (12) was the other main category within the social difficulties theme. The third most prominent theme that emerged was poor mental health (78), with counsellors noting signs of affected mental health, including stress (24) and anger (13). Thereafter, the main themes and sub-categories (where applicable), in order of frequency, were: socioeconomic challenges (58) – unemployment (27); suicidality (49); trauma (45) – abuse (19); physical health issues (23) – health concerns (12); other (21) – teen pregnancy (4)/school failure (4).

MAIN THEMES	**TOP 2 SUB-CATEGORIES**	**CRITERIA FOR INCLUSION**	**SELECTED DATA FROM RECORDS**
Mental illness (227)	Depression (113)	Issue identified by counsellor in record OR Record includes text reflecting this issue	*"...symptoms of depression..."* *"...diagnosed with depression..."* *"...never addressed his feeling of depression..."* *"...suspects she has depression..."*
	Anxiety (50)		*"...suffers with panic attacks..."* *"...high anxiety levels..."* *"...doesn't cope too well in social situations...gets anxious..."* *"anxiety...very scared about*

			cancer, terminal illness…"
Social difficulties (121)	Interpersonal problems (105)	Issue identified by counsellor in record OR Record includes text reflecting this issue	*"…going through a divorce…"* *"…boyfriend has cheated continuously…"* *"…daughter not speaking to her…"* *"…does not have a good relationship with his father…"*
	Loneliness (12)		*"…very lonely…"* *"…always feels alone…"* *"…have no friends to talk to…"* *"…totally isolated, no friends or family…"*
Poor mental health (78)	Stress (24)	Issue identified by counsellor in record OR Record includes text reflecting this issue	*"…feels stressed, overwhelmed, and just can't cope…"* *"…highly pressurised job…"* *"…at school her external crashed as she was about to submit…"* *"…feels that she is stressed but not coping well…"*
	Anger (13)		*"…anger whenever he sees people…"* *"…problem with her anger, becomes furious very quickly…"* *"…struggling with anger issues…"* *"…very angry, since childhood…"*
Socioeconomic challenges (58)	Unemployment (27)	Issue identified by counsellor in record OR Record includes text reflecting this issue	*"…struggling to find a job…"* *"…jobless for the last 9 years…"* *"…currently unemployed…"* *"…not working…"*
	Financial issues (20)		*"…no money/intermittent money…"* *"…financial problems…"* *"…can't afford a better place…"* *"…no money (for medication)…"*
Suicidality (49)	None	Issue identified by counsellor in	*"…overdosed on Monday…"* *"…kept threatening suicide…"*

		record OR Record includes text reflecting this issue	*"…feels like killing herself…"* *"…has suicidal thoughts…"*
Trauma (45)	Abuse (19)	Issue identified by counsellor in record OR Record includes text reflecting this issue	*"…living with their stepfather, he beats them…"* *"…abused by her husband…"* *"…sexual abuse as a child…"* *"…mother is now verbally abusing her…"*
	Death of a loved one/Grief (14)		*"…struggling to cope with loss of mother…"* *"…mom passed away yesterday…"* *"…lost a baby last year…"* *"…struggling with accepting the passing on of his father…"*
Physical health issues (23)	Health concerns (12)	Issue identified by counsellor in record OR Record includes text reflecting this issue	*"…cervical cancer symptoms…"* *"…terminally ill…"* *"…back was injured, has eye problem…"* *"…obese and wants to have a baby…"*
	Medication side effects (5)		*"…meds do not agree with her…"* *"…started taking meds for asthma last week, she is feeling tired, crying, irritable…"* *"…took sister's Zyban tabs, severe side effects…"* *"…given Citalopram and is having various side effects…"*
Other (21)	Teen pregnancy (4)	Issue identified by counsellor in record OR	*"…found out she is pregnant, does not want mother to know…"* *"…girlfriend is pregnant…"* *"…sister is pregnant, haven't told*

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		Record includes text reflecting this issue	*parents yet…"* *"…pregnant…"*
	School failure (4)		*"…failed matric…"* *"…grade 12, 3 times failed…"* *"…son did not pass his courses…"* *"…failed a grade…"*

Table 22. Content analysis – difficulties experienced by callers.

5.3.1.3 Nature of assistance. The records making up the total sample (N = 300) included 10 that were unclear or vague in terms of the assistance provided to the callers, and thus no accurate categorisation was possible. During the brief telephonic counselling, referrals were offered in 249 (86%) of the 290 calls included in the content analysis. As per Table 23, the second most frequent assistance provided was advice/guidance, which was offered to 56 (19%) callers. Containment was reflected in 23 (8%) of the records, and self-help tips were also given to 23 (8%) callers. Psychoeducation was provided in 21 (7%) calls, while the least common assistance was crisis intervention, which was recorded only 6 (2%) times. These categories are not mutually exclusive, as on some calls more than one kind of assistance was offered, together with brief telephonic counselling. The percentages provided here should thus be viewed individually, only as a reflection of the frequency of each separate category, and not in any relational capacity.

MAIN CATEGORIES	CRITERIA FOR INCLUSION	SELECTED DATA FROM RECORDS
Referral (249)	Caller was given other resources to follow up with after the call ended	*"…see a social worker at the government hospital…"* *"…gave her the number of a support group…"* *"…take to hospital for diagnosis…"* *"…get an appointment with FAMSA…"*

Advice/guidance (56)	Counsellor advised the caller in a directive counselling manner	*"…look for a job…"* *"…to call back for a support group once diagnosed…"* *"…advised her to think through her options…"* *"…spoke to her about a restraining order…"*
Containment (23)	Counsellor's presence appeared to be sufficient to lessen caller's distress	*"…spoke to her for a while…"* *"…gave her validation…"* *"…calmed her down…"* *"…just needed reassurance…"*
Self-help tips (23)	Counsellor offered the caller ideas on how to help themselves	*"…keep mood journal…"* *"…practise breathing and mindfulness…"* *"…exercise…"* *"…volunteer at a local facility during the day…"*
Psychoeducation (21)	Counsellor provided information on mental health	*"…explained this is normal and not alarming, as she is mourning…"* *"…explained how CBT is helpful…"* *"…info on depression…"* *"…MHCA04 procedural info…"*
Crisis intervention (6)	Counsellor became active in intervening to assist the caller	*"…send help to him…"* *"…called her father and explained the situation…"* *"…has no way to get to the hospital, agreed to call a friend…"* *"…her mom and brother will get her to casualty asap…"*

Table 23. Content analysis – nature of assistance.

5.3.1.4 Nature of referrals. For this analysis, only the 249 cases of the total sample (N = 300) where referrals were provided were considered. Of those, in 9 instances the nature of a referral was unclear, and these were thus excluded. The categories described are not

mutually exclusive, as more than one kind of referral was often given per call, and referrals to different resources within the same theme were at times given to one caller.

With 144 specific references, the most common referral theme was support structures (see Table 24). This includes social, mental health, online and socioeconomic support, as well as support services for women and children. Of these, social support was the most referred to category (51), and within that, support groups (36) was the most popular minor category. Counselling was the second biggest theme, with a referral frequency of 127. The top minor category across all was found here – a counselling NPO (52). The next most common referral was to clinics and hospitals (72), where government hospitals (34) and government clinics (20) were most often used. Thereafter, the main themes and minor categories in order of frequency were: medical professional (45) – private GP (20); psychologist (38) – private (25); other (26) – South African Police Service (SAPS) (4)/free legal assistance (4); substance abuse treatment (21) – prevention and treatment of substance dependence NPO (6); and social worker (20) – government (7)/unspecified (7).

The information available on the records and its categorisation during content analysis revealed that NPOs were referred to at least 160 times, government resources at least 77 times, and the private sector at least 61 times.

MAIN THEMES	SUB-CATEGORIES	TOP 2 MINOR CATEGORIES	CRITERIA FOR INCLUSION	SELECTED DATA FROM RECORDS
	Social support (51)	Support group (36) Loved one (5)	Referral provided was for a resource that offers	*"...support group..."* *"...Griefshare..."* *"...parents..."* *"...oldest sister..."*

			social support	
Support structures (144)	Mental health support (34)	Youth health NPO (11) Mental health NPO (8)	Resource recommended aims to facilitate mental health	*"…Lovelife…"* *"…SA Federation for Mental Health…"* *"…Durban & Coastal Mental Health…"*
	Online support (25)	Free psychoeduca-tional website (18)	Caller was given a referral to an online resource	*"…www.pndsa.org.za…"* *"…www.psychcentral.com…"* *"…thoughtsfirst.com…"* *"…socialanxietysupport.com…"*
	Socioeconomic support (9)	Shelter (4)	Referral provided was aimed at social/econo-mic difficulties	*"…New Beginnings…"* *"…Rhema Care Centre…"* *"…Bethany House…"* *"…Mercy Haven…"*
	Women & child support services (25)	Child protection NPO (9) Women's rights NPO (4)	Caller was guided to services catering to women and children	*"…Childline…"* *"…Child Welfare…"* *"…POWA…"*
Counselling (127)	None	Counselling NPO (52) Relationship counselling NPO (36)	Caller was referred to a counselling service	*"…Lifeline…"* *"…Teenline…"* *"…FAMSA…"* *"…Family Life Centre…"*
Clinic/ Hospital (72)	None	Government hospital (34) Government clinic (20)	Caller was directed to a clinic or hospital for help	*"…Addington Hospital…"* *"…Helen Joseph…"* *"…Paarl Street Clinic…"* *"…Lenasia Clinic…"*

Medical professional (46)	None	Private GP (20) Unspecified doctor (14)	Caller was guided to a medical professional for follow up	*"…GP…"* *"…Dr for diagnosis…"* *"…go back to Dr and get meds reviewed…"* *"…suggested go to Dr…"*
Psychologist (38)	None	Private psychologist (25) Government psychologist (9)	Caller was advised to see a psychologist	*"…referral to new psychologist or to get private treatment from current psychologist…"* *"…government psychologist…"* *"…Impungwe Hospital psychologist…"* *"…Tshwane Hospital psychologist…"*
Other (26)	None	SAPS (4) Free legal assistance (4)	Caller was guided to services of varied nature, not matching any of the alternative categories	*"…report to the police…"* *"…phone the police…"* *"…Legal Aid…"* *"…Wits Law Clinic…"*
Substance abuse treatment (21)	None	Prevention & treatment of substance dependence NPO (6) Alcohol abuse recovery network NPO (4)	Caller was guided to treatment for substance use	*"…SANCA…"* *"…Alcoholics Anonymous…"*
Social	None	Government	Caller was	*"…local clinic for a*

worker (20)		social worker (7) Unspecified social worker (7)	advised to see a social worker	*social worker…"* *"…appointment with a social worker at Tygerberg Hospital…"* *"…see a social worker in her area…"* *"…social worker…"*

Table 24. Content analysis – nature of referrals.

5.4 Chapter Summary

This chapter displayed the results of quantitative and qualitative analyses performed on information drawn from archival telephone counselling records of a free South African mental health call centre. The majority of callers were female, Black, aged 20 to 29, and from Gauteng province. The highest volume of calls was received on Thursdays, the least on Sundays, and the busiest time during the day in terms of calls was the 12:00 to 16:00 counselling shift. Statistically significant associations were discovered between the following variable pairs: age and race; age and day of the week; gender and race; province and race; province and shift; day of the week and shift. Most callers made contact with the NPO for self-related concerns, with mental illness and social difficulties emerging as the top themes of difficulties experienced by callers. During the brief telephonic counselling offered by the NPO, callers were mainly given referrals, while advice/guidance was the second most common type of assistance. Lastly, when referrals were provided, they were mainly to support structures, like free support groups and psychoeducational websites, as well as to counselling services outside of those provided by hospitals/clinics, psychologists and social workers.

Chapter 6: Discussion

6.1 Introduction

In this final chapter, the results of this research project are interpreted in relation to existing literature, and their relevance within the NPO and the broader South African context is explored. After presenting a summary of the key findings, the results are compared to those of similar studies on local and international helplines, before discussing their meaning at greater length. Next, the results are positioned within and explained from the perspective of the ecological conceptual framework adopted by this study. The chapter concludes with an examination of the research limitations, as well as the recommendations that can be made based on the study's discoveries.

6.2 Key Findings

The results of this research reveal that the population served by the helplines of the NPO under study was predominantly female (76.3%), Black (61.3%), aged in the 20s (41.7%), and from Gauteng (56%). Overall, the helplines were busiest on a Thursday, and during the 12:00 to 16:00 shift time. The majority of people who made contact with the NPO through its helplines called for self-related issues, with the main themes of difficulties experienced being mental illness and social problems. During the brief telephonic counselling, most callers were given referrals to follow up with after the call ended. Of those guided to other resources, the most common referral was to support structures, followed by counselling services provided by NPOs or other informal community care. Significant associations were found in the data between age and race; age and day of the week; gender and race; province and race; province

and shift; day of the week and shift. The direction and nature of the relationship between each variable pair is beyond the scope of the present study.

6.3 Comparison to Similar Local and International Research

Research on mental health helplines is lacking, particularly in South Africa. The current study's results confirmed the only local (Meehan & Broom, 2007) and most international findings (Burgess et al., 2008; Ingram et al., 2008; Spittal et al., 2015) that the majority of helpline callers are female. The most prevalent age group of callers in this study was 20 to 29, older than that of the only other local study on a suicide crisis helpline, where most callers were aged 16 to 18 (Meehan & Broom, 2007). This may be due to the generalist nature of the helplines explored in this research project. In research in Australia (Burgess et al., 2008; Spittal et al., 2015), the most common age of callers was 25 and older, compared to the present study's 20 to 29 age group. The slightly younger age of callers in the present study mirrors similar findings in the Indian population, where callers were most often aged 20 to 39 (Chavan et al., 2013).

Both the previous local study and the present one found that most callers were from the provinces of Gauteng and KwaZulu-Natal (Meehan & Broom, 2007). The third most prominent province was the Western Cape in the present study, as opposed to the previously reported North West (Meehan & Broom, 2007).

Some other commonalities emerged between the present study and international findings. Mental illness in general, as well as depression or mood disorders and anxiety were reported as common issues faced by callers (Chavan et al., 2013; Perkins & Fanaian, 2004), as were relationship/interpersonal problems and loneliness (Burgess et al., 2008; Coveney et al., 2012).

6.4 Discussion of Findings

More women contacted the mental health helplines despite the fact that the prevalence of mental illness overall in men and women in South Africa is not significantly different (Stein et al., 2008). This may be reflective of a gender-based social norm that suggests it is more acceptable for females to express their feelings and seek help, while the same is often viewed as a weakness or something shameful in men (Baumeister & Bushman, 2011; Robertson, Robinson, Gough, & Raine, 2016). According to a local study, women diagnosed with anxiety and mood disorders were also more likely than men with these conditions to seek treatment (Seedat, Williams, et al., 2009). The findings bring into question what factors hinder men from accessing the helplines as much as women do, as well as what they may be doing instead to try to cope with similar challenges.

The predominant racial group in the South African population is Black (79.2%) (Statistics South Africa, 2012), and its majority in the sample at 61.3% is thus expected. However, there was an over-representation of the White race in the sample when compared to the country's population ratios (Statistics South Africa, 2012) – 8.9% of the South African population is White, while in this study, White callers accounted for 24.7% of the sample. This may be linked to culture-based understanding of mental illness and a stronger belief by the White race in Western forms of assistance. It is also possible that access to telecommunication, differences in helpline promotion between areas, and the distribution of racial groups across provinces, with varying prominence in urban and rural areas, may play a role.

The fact that 20 to 29 year olds most often contacted the helplines may mean that young adults in South Africa are the age group most willing to seek help, but it could also

suggest that this is a vulnerable population in our country in need of mental health support. South Africa has a high prevalence of mental illness (Herman et al., 2009), and it is accompanied by a relatively early age of onset (Stein et al., 2008). With people of this age transitioning into adult life, it's possible that they are struggling to cope with the psychosocial stressors they are facing, and the country's current economic climate. However, more practical factors are also worth consideration, such as the possibility that this age group may be more exposed to helpline awareness campaigns; that they may reside in greater numbers in the urban areas from where more people seem to make contact with the NPO; or that their financial circumstances may be motivating them to seek free resources for assistance.

The majority of calls were received from the most urbanised provinces in the country. This finding can be understood in a multitude of ways – urban areas tend to have a higher population density, be more Westernised, and probably more exposed to messages in the media about the NPO's services and helplines. It should be considered that the demands of urban living and the associated stress are another possible reason for people from these provinces using the helplines more. It is further possible that easier access to telecommunication services in more urban areas plays a role, and that telephone use may be more limited in less developed areas. Even with widespread cellphone possession, messaging may be more often utilised than call functions. The highest number of calls came from Gauteng – the province within which the NPO's head office is situated. This suggests that physical proximity and community presence may be associated with greater awareness and use of the helpline services.

The analysis of the days and times most calls were received revealed that people tended to make contact during weekdays and work hours. Perhaps, it is during these times that people are able to call without having loved ones around, which would suggest they may

not be open with loved ones about the challenges they are facing or mental health issues they have. There could also be a practical aspects involved, such as callers using landlines at work in order to be able to contact the helplines, and to do so for free.

It seems a positive sign to discover that the majority of callers made contact due to self-related concerns, as this suggests an awareness of the need for help or intervention, and actual engagement in help-seeking behaviour. Another perspective on this finding is that callers may be lacking information and support within their personal environment, or may find it difficult to engage in such conversations with loved ones.

The fact that – in terms of difficulties callers were experiencing – mental illness came out as the top theme, with depression and anxiety as the two main categories, confirms findings of a local prevalence study that revealed almost 1 in 3 South Africans will experience a psychiatric disorder during their lifetime (Herman et al., 2009), with mood and anxiety disorders part of the top three most common conditions (Stein et al., 2008). It also shows that the NPO's helplines are being utilised for mental health queries, which matches the purpose for which they were created. What emerged as the second most common theme was social problems, mainly interpersonal difficulties and loneliness. The literature reveals that relationship problems are predictors of mental disorders (Seedat, Stein, et al., 2009); and that discord with a loved one and home-related stress are some of the main psychosocial factors associated with suicidal behaviour (Raubenheimer & Jenkins, 2015), with the emotion of loneliness often reported. Conflict with a loved one appears to greatly contribute to emotional distress, as does the absence of support from a loved one (Raubenheimer & Jenkins, 2015). It is also possible that relational problems may arise as a consequence of poor mental health. As this was a prominent concern for many callers, better understanding is needed about the interaction in South African society between mental illness and

interpersonal relations, as well as what support could be of value in this regard. With greater fragmentation of communities and shifting internal dynamics, the changes in present-day South African society may also have a role to play in relational difficulties being experienced.

As the majority of callers were given referrals by the volunteer counsellors they spoke with, one of the major roles of the NPO appears to be acting as a mental health directory, informing callers of the relevant resources available, and how they can be accessed. This supports the views of O'Connor and Pirkis (2016) who classify helplines as a source of informal care that allows callers access to information and guides them to the appropriate mental healthcare provider, fulfilling an important role in the pathway to care. The secondary most common assistance provided by volunteers during the brief telephonic counselling was advice/guidance, showing that people who call the NPO may not have the necessary knowledge or other resources to adequately address the difficulties they are facing. Initiating more community support structures may be of benefit in this regard.

The fact that the most referred to resources were not psychiatrists, clinical psychologists, social workers or hospitals, but rather support and counselling services is noteworthy, especially considering the fact that mental illness was the most frequently reported difficulty. There appears to be a heavy reliance on NPO services and free resources, at least double that on government services (hospitals and clinics / psychiatrists, psychologists, social workers in public facilities), and nearly triple that on the private sector (psychiatrists, general practitioners, psychologists, social workers in private practice). This is not surprising, considering the fact that South Africa is lacking mental health resources, especially in the government sector (Bruckner et al., 2011; Lund, Kleintjes, et al., 2008; Lund et al., 2010). The frequent referral rate to NPOs suggests that informal resources are playing a

prominent role in mental health care in the country, as is recommended by the WHO (2009). However, it is uncertain whether the NPO sector in South Africa is large enough and receives the financial support needed to carry this demand, especially in the under-supported field of mental health. The lack of prioritisation of mental healthcare is particularly concerning when reviewing the financial cost of mental illness to South Africa's economy (Ismail, 2017; Lund et al., 2013). There is also a lack of knowledge and regulation of the services provided by NPOs, despite the fact that they tend to be the first port of call in South Africa for many people with mental health problems. With support structures most often referred to, there seems to be a need for the expansion of social services. Using task-shifting, as suggested by Schneider et al. (2016), to overcome the obstacle of limited human resources by training non-professionals to deliver services such as mental health screening can be potentially beneficial in meeting these identified needs.

Based on the significant associations between race and the variables of age, gender, and province, the characteristics of those who call the helplines vary by racial group. For example, Black callers tended to be younger than White callers; the difference in the gender of callers was far greater within the Black racial group than the Indian group; and the majority of callers from each province were Black, except for the Western Cape, where the majority of callers fell within the Other race category. It's thus possible that some of the key demographic findings of this study are not equally representative of callers from all races. Furthermore, the day when people called was linked to their age (on a Thursday the majority of callers were aged 30 to 39 instead of 20 to 29), and the time when they called to the province they were from (during the 08:00 to 12:00 shift, no calls were received from the Free State, Limpopo, and Northern Cape). This means that the profile of callers may vary not just by race, but by temporal factors, namely the day and time of a call. A significant link was

also found between these two temporal factors, so that the time more calls came in differed depending on the day of the week. For instance, most calls were received during the 12:00 to 16:00 shift, except on Thursdays and Sundays, when the highest call volumes were experienced between 16:00 and 20:00. Overall, these findings suggest that the race of a caller and the timing of a call were somehow associated with who was calling and from where.

6.5 Understanding the Findings Within the Conceptual Framework

When considering the results of this study in relation to the SEM (McLeroy et al., 1988), there appears to be a largely outwards pattern of movement from the core of the model that could be described as follows: intrapersonal factors like age and mental illness interact with interpersonal difficulties like the ending of romantic relationships and community level challenges like unemployment, resulting in contact at the institutional level through the NPO. In order to assist, the NPO engages the community level, tapping into inter-organisational relationships through its referral network of informal, public and private services. What exists within this network and the access procedures are largely dependent on and governed by the public policy level. Thus, what is ultimately available to the individual calling the NPO is largely determined by the outer most ecological level, either through funding or regulation.

6.6 Limitations

While conducting archival research assisted with access to the population and allowed for a larger sample size, it also presented a number of limitations. The researcher relied on data collected by volunteer counsellors, their perceptions of what callers communicated, and the quality of information counsellors captured in the records. In addition, due to the fact that the data was anonymised to meet ethical requirements, the researcher had no way of controlling

for repeat or frequent callers. Furthermore, purposive sampling was utilised for pragmatic reasons, but this limits the generalisability of the findings.

While the researcher engaged in iterative content analysis and her categorisation was monitored by her supervisor, inter-rater reliability could not be established, as an independent content analysis by a second researcher was not feasible.

Exploring associations between the descriptive statistics and the results of the content analysis was not methodologically sound and thus not pursued, however this restricted the scope of this study. It would have been useful to examine, for instance, whether any relationship existed between age group and difficulty reported, or between difficulties reported and province.

6.7 Recommendations

6.7.1 NPO. Based on the results of this study, it may be beneficial for the NPO to explore the following:

- Offering volunteers more training on the most commonly found difficulties callers presented with, for instance depression, interpersonal problems, and anxiety.
- Promoting its services to the less commonly found gender, ages, races, and provinces in its call records.
- Planning support initiatives for the 20 to 40 age group.
- Dedicating more resources to the busiest days and shifts.
- Ensuring each shift has volunteers able to communicate in African languages.
- Reviewing the nature of assistance and referrals provided to callers, and how this aligns with the NPO's vision.

- Investigating more referral options in the most used support and counselling resource categories, and even considering whether these could be areas of future expansion for the NPO itself.

6.7.2 Mental healthcare in South Africa. One of the most relevant findings in this study in terms of the mental healthcare system in South Africa is the heavy reliance for assistance on the non-profit/non-governmental sector. A greater investment by government in these informal resources could both help to meet the current demand on these services, as well as potentially alleviate overburdened public healthcare facilities. This is in line with WHO (2007a) recommendations that for the optimal mix of mental health services, countries should expand their informal community care. However, in order for this to work effectively, informal services need financial and legislative support at policy level, possibly through the development of formal task-shifting initiatives.

6.7.3 Future research. It would be beneficial for a larger study to be undertaken with the aim of expanding on this exploratory research. It is recommended that such a follow-up study engage in primary data collection, track repeat callers, and employ a methodology that allows for the generalisability of the findings. The significant associations found during this research project, especially those with a medium to large effect size, require further investigation, as they may reveal research questions that are perhaps not obvious, but important.

Relational problems stood out as a main theme in terms of the difficulties callers were experiencing – this requires further assessment of the interplay between interpersonal problems and mental illness, as well as the role of mental health helplines. It's worth

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examining whether callers reach out to such helplines as a way of finding social connection more so than for assistance with mental health conditions.

Lastly, South Africa needs more knowledge on its informal mental healthcare sector and the local function of NPOs. By building understanding of NPOs and their current role, better-informed decisions can be made about their place within the South African mental healthcare system and, potentially, their acknowledgement as formally supported mental healthcare structures.

6.8 Chapter Summary

The results of this study mostly reflect other local and international findings, except for revealing a somewhat younger age of callers than similar international studies. The social norm of women being more open with their emotional distress than men received some support from the data, and there were more White callers than expected based on South African population race ratios. Young adults from urban areas appear to be the most help-seeking age group, making contact mainly during work hours. Confirming local prevalence studies, mental illness, depression and anxiety were prominent themes in difficulties expressed by callers, who mainly called in for self-related concerns. The secondary theme of relational problems was also common in pre-existing studies.

The function of the NPO appeared to be that of mental healthcare guide in the pathway to care, relying the most on other NPO services and free resources for follow-up care for callers. Overall, who was calling and from where seemed to be related to the race of a caller and the timing of a call. According to the conceptual framework of this study, the main difficulties experienced were at the intra-and interpersonal ecological levels, driving

individuals to interact with the institutional level, which in turn engaged community level services for assistance that is largely determined by the support at public policy level.

The results of this study can be utilised by the participating NPO to understand the current population it is serving, as well as its positioning within the local mental healthcare system; the NPO can then make decisions about the future direction it wishes to take. As the NPO seems to be calling on informal mental health resources to assist the majority of callers who contact its helplines, a need for greater support of this sector by the South African government exists.

It would be helpful for future research to expand on the current exploratory research while addressing this study's key limitations of relying on secondary data and not accounting for repeat callers.

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Appendices

Appendix A

Telephone log sheet

Version 16

Telephone Log Sheet

Date: ____ **Shift:** ____ **Counsellor:** ____

Name: ____ Daisy
Contact Number: ____
Email address: ____
Age: ____ Gender: ____
Address: ____ Postal Code: ____
Province: ____
Race: Black ____ White ____ Indian ____ Other: ____
Did they call for: themselves ____ loved one ____ Other ____
Why did the caller call?
1. Wanted info on MH ____ SGs ____ Referral ____
2. If Mental Illness info, which one? ____
3. Suicide ____ Advice: ____ Just to talk ____ Relationship Prob ____
How did you help?
Sent Brochures ____ Refer to Support Group ____
Refer to Mental Health Professional ____

ACTION POINTS
1. ____
2. ____
3. ____
4. ____

Name: ____ Daisy
Contact Number: ____
Email address: ____
Age: ____ Gender: ____
Address: ____ Postal Code: ____
Province: ____
Race: Black ____ White ____ Indian ____ Other: ____
Did they call for: themselves ____ loved one ____ Other ____
Why did the caller call?
1. Wanted info on MH ____ SGs ____ Referral ____
2. If Mental Illness info, which one? ____
3. Suicide ____ Advice: ____ Just to talk ____ Relationship Prob ____
How did you help?
Sent Brochures ____ Refer to Support Group ____
Refer to Mental Health Professional ____

ACTION POINTS
1. ____
2. ____
3. ____
4. ____

Appendix B

University of Pretoria Research Ethics Committee approval letter

UNIVERSITEIT VAN PRETORIA
UNIVERSITY OF PRETORIA
YUNIBESITHI YA PRETORIA

Faculty of Humanities
Research Ethics Committee

31 March 2017

Dear Ms Deysel

Project: **An audit of calls to a free South African mental health care centre**
Supervisor: **Dr L Blokland**
Department: **Psychology**
Reference number: **14265941 (GW20170329HS)**

Thank you for the application that was submitted for ethical consideration.

I am pleased to inform you that the above application was **approved** by the **Research Ethics Committee** on 30 March 2017. Data collection may therefore commence.

Please note that this approval is based on the assumption that the research will be carried out along the lines laid out in the proposal. Should the actual research depart significantly from the proposed research, it will be necessary to apply for a new research approval and ethical clearance.

We wish you success with the project.

Sincerely

Prof Maxi Schoeman
Deputy Dean: Postgraduate Studies and Ethics
Faculty of Humanities
UNIVERSITY OF PRETORIA
e-mail:tracey.andrew@up.ac.za

Research Ethics Committee Members: Prof MME Schoeman (Deputy Dean); Prof KL Harris; Dr L Blokland; Dr R Fasselt; Ms KT Govinder; Dr E Johnson; Dr C Panebianco; Dr C Puttergill; Dr D Reyburn; Prof GM Spies; Prof E Taljard; Ms B Tsebe; Dr E van der Klashorst; Mr V Sithole