

Effect of Mental Health Status on Socioeconomic Development in Rwanda: A Case of Masoro Cell, Ndera Sector, Kigali City. (2021)

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Abstract:- The research is aimed at analyzing the effect of mental health status on socio-economic development in Kigali. With objectives to evaluate mental health, assess socio-economic development, and determine whether there is a significant Effect of mental health status on Socio-economic development in Masoro cell. Testing the following research hypotheses: H_0 . There is no significant the effect of mental health on socio-economic development in Masoro cell and H_1 . There is significant the contribution of mental health status on socio-economic development in Masoro cell. The results of the analyses did not support the null hypothesis that mental health has no significant effect on socioeconomic development. The p-values obtained were 0.92 and 0.4 respectively. Instead, the alternative analysis was favored, indicating that mental health status has a significant effect on socioeconomic development. Research design utilized by the researcher is descriptive for this research. Using random sampling technique, residents of Masoro cell are selected as respondents representing households. Questionnaire and documentary are used as data collection techniques while the researcher conducted a desk review at the Neuro-Psychiatric Hospital Caraes Ndera near Masoro that provides mental health services for residents. The researcher employed bivariate and multivariate ordinal logistic regression techniques to investigate the connection between the dependent (socioeconomic development) and independent variable (mental health). Based on the results, the conclusion of the researcher states there is an optimistic correlation between mental health and socioeconomic development. Increase or Good mental health, will lead to good socioeconomic development. After adjusting for other covariates, the fitted model was good at estimating 65.7% of the change in the dependent variable, $p < 0.05$. The effect of mental health on socioeconomic development also increased from 3.8 to 7.5. The results show that improved mental health status is positively associated with socioeconomic development.

Keywords:- Mental Health, Socioeconomic, Social Inequality, Culture, Life Expectation.

I. INTRODUCTION

Mental health is understood as a condition in which persons recognizes their capabilities, can effectively handle life's daily challenges, do effective and efficient activities, and can make positive contributions to the society in which they resides (World Health Organization, 2018). Nevertheless, individuals with mental health challenge might encounter various challenges in their day-to-day lives. Mental health problems range from moderate disorders like loneliness, depression, fear, isolation, and anxiety to more severe psychotic disorders (schizophrenia and bipolar). As a result, mental health is a fundamental component surrounding public healthiness it can additionally have significant social and economic implications for society (World Health Organization Europe, 2011).

Mental health complications contribute meaningfully to health inequality in the Region of Europe. Comparatively great occurrences of mutual mental disorders are connected to poor education, unemployment, and material disadvantage. Suicide is also common in high social fragmentation, socioeconomic deprivation, and unemployment. The greater vulnerability of the underprivileged in each community to mental health complications where experience of hopelessness and insecurity, unemployment, poor education, indebtedness, social isolation, and inadequate accommodation could be described (World Health Organization Europe, 2011).

In Africa, it is said that mental health problems contribute to discrimination especially when it comes to socioeconomic status throughout populaces. The monetary effects of SMD spread outside the person with a mental health problem to unsympathetically shake household revenue. Household members could allocate time to provide care and support, diminishing their opportunities to work, in turn affecting their income, and thus further increasing the risk of household poverty. Persons living with severe mental disorders (SMD), including psychotic disorders, such as bipolar and schizophrenia disorder, are seen to float into poverty as a consequence of factors such as reduced income, increased medical and transport costs, and lost productivity (Hailemichael, Hanlon, Tirfessa, et al, 2018).

In Africa, just about the highest depression rates is recorded in Kenya. For example, in 2016, the number of

officially recognized cases of clinical depression in Kenya was 1.9 million. However, there has also been a disturbing rise in the number of suicides, with an estimated 7,000 young Kenyans aged 15 to 30 taking their own lives each year (Hostetter, 2018). Furthermore, in Kenya, mental health problems are subject to widespread stigma and lack of understanding. There is a prevalent belief that such issues are attributable to supernatural forces or divine retribution. These attitudes serve to isolate individuals suffering from mental illness and those who support and care for them.

Rwanda has made significant strides in economic growth and development over the past 28 years since the genocide against the Tutsi. However, there are still important mental health complaints the country still faces. A huge number of the population of Rwanda continues to grapple with trauma associated with the genocide, which is further compounded by psychological and socioeconomic distress. These challenges hinder social cohesion in the country (Interpeace, 2021). Survey done by Rwanda Mental Health in 2018 shown that among other disorders alcohol and substance use are common but, psychotic, and suicidal behavior remain the utmost predominant mental health challenges in Rwanda including depression, panic disorder, obsessive-compulsive disorder, and PTSD post-traumatic stress disorder. Some reasons that prevent people from gaining access to mental health services taking account of lack of knowledge about where to seek mental health services, mental illness humiliation, and cultural and religious beliefs (Rwanda Biomedical Centre, 2022).

According to the 2021 mHub report, employees across Rwanda miss approximately 1.3 hours of job every day because of stress, three out of four employees in Rwanda experiencing moderate, high, or extreme stress levels. This discovery is actually very frightening, specifically due to the fact that several of them rated their stress levels as high or extreme; on an ordinary basis, 44.4% miss at least one hour of work every day; about two hours by 23.4%, these mental health complications damagingly disturb the enactment of job and socioeconomic development (mHub report, 2021).

➤ *Statement of the Problem*

Mental health significantly impacts socioeconomic development in Rwanda as it impacts productivity in every aspect of economic and social development in Rwanda.

About 29% of people with mental illness experienced post-traumatic stress disorders PTSD in Rwanda. During April's annual national commemoration period, many people experience PTSD symptoms and generalized anxiety disorders with panic attacks (Global Burden of Disease Study, 2019). There are mental health MH facilities that offers services in Kigali. Still, many people do not see the importance of using them because they do not have the proper knowledge and are afraid of stigmatization. At least some Rwandans know that mental health facilities exist, but those who use them are less than 10 percent (Ufitiwapo, 2022).

➤ *Objectives*

These challenges significantly effect socioeconomic development, especially in Masoro cell, affecting the active labor force, reducing productivity, and affecting community output (Rugema. et al., 2015). This study therefore seeks to expose mental health, how it is understood including its effects on socioeconomic development in Rwanda.

Supposedly, challenges mentioned above are not addressed, in that case, there is a projection of increased mental illness, unnecessary disabilities, joblessness, substance abuse, homelessness, suicide, and reduced life's quality, placing a significant burden on the community, thereby reducing/slowing the socioeconomic development in the community and country.

The research is channeled by general and specific objectives

➤ *General Objective*

The general objective of the research is an examination on the effect of mental health on socio-economic development in Kigali.

➤ *Specific Objective will be:*

Specific objectives are:

- To evaluate mental health status in Masoro cell community for the study under review.
- To assess the socio-economic development in Masoro cell, for the period under study.
- To determine whether there is a significant effect of mental health status on Socio-economic development in Masoro cell.

➤ *Hypothesis*

The research tests the following hypotheses:

- H₀. There is no significant effect of mental health on socio-economic development in Masoro cell.
- H₁. There is significant the contribution of mental health on socio-economic development in Masoro cell?

II. REVIEW OF LITERATURE

➤ *Mental Health*

Mental health encompasses various aspects of an individual's wellbeing, including their emotional, psychological, and social health. This means that mental health is not limited to just one aspect of a person's life, but rather includes their overall state of being in terms of their emotions, thoughts, and interactions with others. It affects thinking, feeling, and acting. Furthermore, it has a significant impact on how we manage stress, interact with others, and make decisions, and is vital throughout all phases of human's life, including childhood, adolescence, and adulthood. Life experiences, like trauma or abuse, traumatic brain injury, biological factors, like genetic factor or brain chemistry, account of family mental health complications, socioeconomic situations, and cultures contribute to mental health issues. Additionally, mental

health permits realizing and actualizing one's full potential, coping with daily stresses, and increasing productivity to make meaningful individual and collective contributions.

Mental health disorders may be chronic, severe, or mild. They may include anxiety disorders like obsessive-compulsive disorder, depression, panic disorder, bipolar disorder, other mood disorders, eating disorders, post-traumatic stress disorder (PTSD), and psychotic disorders (mentalhealth.gov, 2022). Mental health permits the realization and actualization of one's full potential, coping with daily stresses, increase productivity, so as to make meaningful individual and collective contributions. Mental health problem/disorder may be chronic, severe or mild (MedlinePlus, 2020).

A clear connection exists among mental health problems and socioeconomic development of an individual and society. A societal slope in income inequality and mental health as it relates to the occurrences of mental issues. During the 20th and early 21st centuries, psychological and psychiatric viewpoints have ruled mental health study and policy, leading to the disregard of underlying socioeconomic factors (Macintyre, Ferris, et al., 2018).

Substance abuse and liquor, especially amongst adolescence, are public and mental health concerns and family problems in Rwanda. A Rwandan Ministry of Youth study demonstrated that 52.4% of the participants have used one or more in substances include tobacco, alcohol, marijuana, and other substances least once in their lifetime, using them are realities in the daily lives of youth in Rwanda (Callixte Yadufashije, 2020).

The financial and social costs of mental health conditions and connected disabilities are essential to understand that the penalties of not addressing mental health conditions extend to damaging both psychological and physical health and limiting chances to lead fulfilling lives. A Survey in 2018 conducted by Rwanda Mental Health reveals that only 38.3% of the general population knew the need of seeking mental health support. The World Economic Forum, predicted that if mental health concerns are not addressed between 2011 and 2030, the global economy will suffer a loss of \$16 trillion in terms of economic output. This is more than the financial costs of the combination of diabetes, cancer, and respiratory diseases (UNICEF RWANDA, 2020).

➤ *Social Inequality*

Social inequality is unequal access to the benefits of belonging to a society. In a socially equal society, each citizen can contribute to that society's general upkeep and wellbeing and benefit from their association with that society equally without direct or indirect discrimination. Indirect social inequality is the unfair treatment of a group of people. However, it may not be the primary purpose of an official/governmental action or policy. In contrast, direct inequality is a purposeful action by an individual, community, or government that takes away opportunity,

resource, or right from some and others (pachamama alliance, 2021).

Social Inequality effects wide-ranging variety of health and social problems, which includes reduction in life expectancy, educational attainment, lower social mobility, increased violence, and mental illness. Social inequality affects individual lives and psychologically divides people from the support, status, and solidarity that keeps people social, physical, and mentally healthy. Furthermore, social inequality is a crucial barrier that leads to a societal collapse in trust, unity, and social solidarity. It decreases willingness to act for the common good (Pickett, 2020).

Socially disaggregated and locally-grounded calculations disclose that some procedures have aggravated enacted and inequality considerable weights and limitations on some of the deprived societies in Rwanda. The policy approaches utilized in Rwanda may need to be reevaluated or reinforced with specific efforts aimed at reducing inequality and eradicating poverty, in connection with the United Nation's Sustainable Development Goals (SDGs) like the 1st and 10th SDG. Cleaver (2005) has noted that disparities among different economic and cultural groups have contributed significantly to the perpetuation of social status, a phenomenon that has been observed in other nations, including Tanzania. (Dawson, 2018).

Established that in Rwanda, individuals with psychosocial disabilities experience discrimination and prejudice, and their mental health issues may hinder their ability to participate in programs designed to benefit them. Consequently, many of these individuals have been marginalized. Families may face a difficult choice between allocating their limited resources to support their family members with psychosocial disabilities or to those considered "normal." Without previous targeted efforts to promote monetary enablement and combat societal humiliation, persons who faced disabilities psychosocial likely may continue experiencing these societal injustices except urgent actions are taken especially in the case of Masoro cell (Kalisa Joseph, 2020).

➤ *Education*

Education is a vital determinant of an individual's lifestyle and social status. It has an impact on various areas of life, such as health-related behavior and demographic characteristics. For example, Research has consistently demonstrated that the educational attainment or degree of education achieved by individuals significantly influence various aspects of reproductive behavior and family health. These areas include the use of contraception, fertility rates, infant and child death and morbidity proportions, as well as attitudes in addition to awareness related to family health and hygiene. (Lemma & Alemu, 2014).

Generally, an excellent educational structure in a society contributes to economic development. Direct investment decision in education has the most prolonged effect on poverty. It is the critical pillar of obtaining a formal sector job, which is one of the main avenues for

individuals and households to escape poverty (UNESCO Institute for Statistics, 2020).

The resolution of the United Nations recognizes education as the legal right of every child; however, it remains a privilege to many. The main objective of education includes helping individuals navigate how they live as well as how they contribute to the community. Generally, individuals who achieve higher education are often more employable and likely to earn a higher income than those with lower education status. Their earnings, in turn, mitigate their likelihood of poverty (Charizze Abulencia, 2021).

Education affects depression in several socioeconomic ways. Primarily, individuals with lower levels of education may have limited economic and social resources to cope with depression. Furthermore, education has a significant impact on one's socioeconomic status, with those who rank themselves lower in society, partially due to educational attainment, being more likely to experience depression. Education also provides greater access to a wider range of creative job opportunities that are mentally stimulating and involve greater autonomy, which may also contribute to positive mental well-being. These and other benefits of education for health and well-being may accumulate over an individual's lifetime (Cohen., et al., 2020). Studies focusing on mental health problems reveal that it can be classified into two main types, namely externalizing disorders and internalizing disorders. Externalizing disorders refer to behavioral problems such as anger control issues and antisocial behavior, while internalizing disorders involve emotional and psychological difficulties like low self-esteem, depression, and emotional distress. Previous research has consistently discovered externalizing conditions as strongly connected to lower educational achievement. In other words, individuals with externalizing disorders tend to perform poorly academically when compared to those without these disorders (Brännlund. & Edlund, 2020).

The study found that having lower family wealth and attending a school located in a deprived area were both independently associated with various risky and protective behaviors. Young people from relatively rich families may possibly experience health benefits from going to schools located in a more comfortable area (Moore, Anthony, et al., 2020).

Previous study recognized a robust and constructive connection concerning the mental health status and finalized education, frequently, scholars refer to such connection with the aid of languages such as: greater levels of education are believed to improve an individual's abilities, provide important societal benefits, and offer more effective coping strategies, ultimately resulting in improved mental health. In other words, advanced education can lead to better mental health outcomes by enhancing an individual's skills, providing them with structural advantages, and empowering them with better tools to manage life's challenges. Education serves as a replacement for neglected natural abilities and

other preexisting factors, which can complicate the association between the two variables (Halpern-Manners, Schnabel, et al., 2016).

While Rwanda boasts high enrollment rates in primary school, only a relatively small percentage of children complete their education. Crowded classrooms with a student-to-teacher ratio of 62:1 pose a significant challenge for effective learning. Children with disabilities face additional barriers to accessing education, with only 70 percent enrolled in primary school. Unfortunately, there are no penalties for government schools that refuse to admit students with disabilities, and many schools lack physical accessibility for such students. Additionally, schools often lack the necessary resources and training to provide appropriate classroom materials and differentiated learning plans for children with disabilities Masoro cell is no different (UNICEF Rwanda, 2022). In Rwanda, particularly in the cell of Masoro and across the world, education is an essential determinant of mental health based on the analysis and understanding from various research. For example, it makes it easier to conduct personal research on a mental health issue when diagnosed by a mental health professional. Higher education also provides better reasoning on mental health and social issues. It is easier to create mental health awareness without difficulties if the academic level of the people is significant. It is also common for mental health topics to surface in school discussions, providing insight on issues surrounding mental health. Higher educational attainment also helps secure better employment to give medication and care to people with severe mental health issues. All these may be opposite for people with low or no educational attainment as it impacts families in the Masoro cell.

➤ *Socioeconomic Status*

Socioeconomic Status (SES) speak of the position of persons in the surrounding according to the combination of economic and social factors, such as earnings, educational attainment, and profession. It normally measures fiscal disparities within a society. The socioeconomic status naturally breaks according to points such as (low, middle, and high) in describing how an individual or family may be with reference to others. There is a developing concentration from scholars concerning inequality economically in addition to how it relates to mental and physical health of the general population lately (L D Worthy; Lavigne; and Romero, 2020).

Individuals with a lower socioeconomic status (SES) are more likely to experience recurring mental health issues. Research suggests that individuals with very low SES are most possible to develop a mental disorder than those with the highest SES. Such phenomenon is generally attributed to one-sidedness especially concerning the burdens that is associated with individuals as well as the resources available in coping with such, which leads to heightened stress responses. Individuals with low SES face greater demands from exposures that threaten health and survival but are endowed with fewer resources to cope with such challenges (Young-Mee Kim & Sung-il Cho, 2020).

For instance, the environment can expose individuals to greater uncertainty, conflicts, and disadvantages. These are threats to which there are usually insufficient capitals to respond successfully. Long-term exposure to these challenges can result in chronic stress, which accumulates over time. Mental disorders can have a significant impact on society, including social marginalization and economic costs for both individuals affected and their families, as well as their work and social environments. A report by the World Health Organization (WHO) suggests that approximately 4.4% of the global population suffers from depression, and 3.6% are affected by anxiety disorders. (World Health Organization, 2017). The costs related to diagnosing and treating mental disorders worldwide are estimated to be approximately USD 0.8 trillion. However, the indirect economic costs of mental disorders, which include income losses due to care-seeking, mortality, lower productivity due to work absence or early retirement, are estimated to be around USD 1.7 trillion. These costs far exceed the direct costs associated with chronic illnesses like cancer and cardiovascular diseases (Trautmann, Rehm, & Wittchen, 2016).

A study in Ethiopia concludes that families with one or more members with depression or other mental health problems were socioeconomically deprived compared to everyone else. Furthermore, poorer socioeconomic status was linked with a higher psychological and physical disability (Macintyre, Ferris, et al., 2018).

The consequence of stigmatization/social exclusion may also hinder families' opportunities for income generation or their ability to rely on social networks for support. Sometimes income generated may not be sufficient to cater to basic needs and provide extra attention for a family member with mental illness. Earnings and long-term work inability are much more strongly associated with mental illness than other cases (Kessler, Heeringa, et al., 2008).

A study was conducted in Rwanda in October 2012, and participants from all levels of care professed that low socioeconomic status/ poverty hindered seeking care for mental disorders. Poverty could mean a lack of resources, like transportation, or even a yearly health insurance premium fee. Some families are so large that paying for every family member is challenging. The stress of a large family with low socioeconomic status often burdens that family member, resulting in stress and mental breakdowns. Necessary treatment follow-up was perceived as less successful due to a lack of family support and resources. Patients would not return to the health facility for needed follow-ups, medical providers prescribed unaffordable medicines, and follow-up visits were not attended (Rugema, Krantz, et al., 2015).

Socioeconomic status in Masoro played a crucial role in decreasing or increasing stress, depression, and the overall mental health of residents of Masoro. For instance, lack of transportation makes it difficult for some patients to make follow-up medical appointments.

➤ Culture

A culture is a large and diverse set of regularly intangible aspects of social life. According to sociologists, culture consists of the values, beliefs, systems of language, communication, and practices that people share in common (Nicki Lisa Cole, 2019).

In understanding culture, terms such as deviance also need to be understood. Deviance is behaviors that violate cultural expectations or social norms; with cultural relativism, there may be some cultural changes in due time. For example, many years ago, homosexuality was taboo in the US and considered a mental health disorder. However, it is presently accepted, but in many African cultures, it is still taboo (Worthy, Lavigne & Romero, 2020).

Culture can effect mental health in many ways: a growing stigma around mental health issues. For some, it is a weakness and something to hide or be ashamed of, making it difficult for those struggling to seek help. Culture also influences how people describe and feel about their symptoms. It can affect whether someone chooses to recognize and talk about only physical symptoms, only emotional symptoms, or both. Cultural factors can determine how much mental health support someone gets from their family and community. Because of the stigma, more people are left to find mental health treatment and support alone. Individuals often seek out someone who can relate to their unique experiences and concerns. However, it can be challenging and time-consuming to find appropriate resources and treatment options that take into account specific cultural factors and individual needs (Mental Health First Aid, 2021) Understanding how mentally ill individuals are referred to in local languages can provide insight into societal and cultural attitudes towards mental health issues. For example, in the Gikuyu language of Kenya, people with severe mental illness are often labeled as "a person of the devil or evil spirits," and similar terms exist in many other languages. In Oluluyia, the Marama sub-tribe dialect, mental illness is referred to as "obulalu," which translates to "madness" and is often linked to witchcraft or seen as a karmic payment for past wrongdoings. Many local languages lack specific terms for stress or depression, indicating a historical lack of emphasis on different types of mental health concerns (Njeru, 2021).

Mental illness is often perceived as a catastrophe in many African nations, and the Luhya community of western Kenya has various vague causes for it. These causes can be classified into several categories, including factors from the unseen world, rule-breaking, punishment, witchcraft, ancestral curses, nature, and even retaliation for committing wrongdoing (Ventevogel, et al., 2013).

In some communities in Masoro, it is believed that men should be the sole providers of their families. The men are also expected to contribute to the family's emotional, spiritual, physical, and mental well-being, which strains their mental health. For instance, a proverb in Kinyarwanda says 'Amarira y'umugabo atemba ajya munda,' interpreted as "A man's tears flow into his stomach" men should not

express their feelings and emotions but suffer silently. Therefore, men are not expected to cry or show any signs of emotional weakness publicly or not at all (Kageruka, 2022).

According to the researcher, culture in Masoro and other parts of Rwanda may promote mental health or mental illness depending on the norms and traditions of that community. However, primarily traditional and religious practices may significantly obstruct mental health. For instincts in Masoro, the reactions to people who attempted suicide or have a mental disorder would mean that they are either weak and cannot stand any tension or needs spiritual intervention. They are therefore hindered from sharing their burdens for fear of being judged. Consequently, they choose to keep it to themselves, which may be dangerous.

➤ *Socio-Economic Development*

Socioeconomic development is the process of social and economic development in a society. GDP, life expectancy, literacy and employment levels, and health (definitions.net, 2022).

Social-economic development incorporates public concerns in developing social policy and economic initiatives. The ultimate objective of social development is to bring about sustained improvement in the wellbeing of the individual, groups, family, community, and society. It involves a sustained increase in the economic standard of living of a country's population, generally accomplished by increasing its physical and human capital stocks and thus improving its technology (Akintunde, 2013).

Economic development makes more resources available for the government to distribute to social groups to improve their living conditions. In addition, a population can contribute to their economic development through labor at work, especially those involved in agriculture through manufacturing. Economic growth refers to long-term changes in systems of production and distribution of goods and services affecting human welfare. It involves changes in the form and the scale of economic activity (Gianonni, 2012).

The role of poverty, health, and education in social development has increasingly been acknowledged as a byproduct of economic development. To gain a comprehensive understanding of the effects, it is essential to consider both economic and social indicators. Both of these aspects are crucial for classifying countries' development and their economies. For instance, purchasing power parity can be utilized to compare the value of a country's currency for non-tradable goods such as haircuts, taxi fares, and sporting event tickets (Callen, 2017).

Rwanda has achieved significant socioeconomic development, with an average GDP growth rate of approximately 8 percent per year over the last twenty years. In 2019, the country experienced a double-digit growth rate in the second and third quarters, at 12 percent and 11.9 percent, respectively. The tourism industry in Rwanda has attracted investments totaling US \$1.5 billion since 2000,

with a substantial increase in the number of hotel rooms from 623 in 2003 to 14,866 in 2018. The country's tourism revenues have also increased dramatically from US \$131 million in 2006 to US \$500 million in 2019, including a rise in MICE tourism revenue from negligible amounts in 2000 to US \$66 million in 2019 (IMF, 2019).

As per Rwanda's seven-year social protection sector strategic plan (2018-2024), Social security (Direct income support, voluntary and mandatory social insurance, health insurance for subsidies groups), Linkages to complementary services (Employment/skills support, sensitization, and financial literacy, Needs assessment, Targeted asset transfers), Social care services (protection of women, children, and older people, Needs evaluations and referrals, psychosocial support, Institutional care, and placement of children and youth, advocacy and rights promotion), Disaster relief (shelter construction/rehabilitation, support for emergency health costs, cash and in-kind short-term assistance provided by local government) (Republic of Rwanda Highlights, 2021).

The Kigali City Council wanted an accurate assessment of the socioeconomic situation in the city, so they tasked the Kigali Institute of Sciences, Technology, and Management to conduct a survey. The survey aimed to evaluate the existing economy and identify opportunities for economic growth, including tourism, industries, agriculture, commercial services, construction, information technology services, and government and institutional activities. The survey also assessed the informal work sector, focusing on women's participation in the local economy, small business issues, and poverty reduction. Additionally, the survey analyzed government-influenced factors affecting economic growth, such as land, infrastructure, energy and water supply, labor, capital, and the business environment. The survey also included an assessment of the City of Kigali's revenue capacity and opportunities for increasing revenue. Finally, the report recommends improving the conditions of daily life across different generations to improve population mental health and reduce the risk of mental disorders associated with social inequalities (Foundation., 2014).

There were also provisions for many mental health facilities in Kigali city, as one of the biggest mental health centers was established in Masoro to handle the increasing needs of mental illness and disorder and to improve the improvement of mental health of the people.

➤ *Health*

The concept of health relates to the general mental, physical and social well-being of an individual or population. In its entirety, health can be assessed based on an extensive range of factors that may include the prevalence of disability and injury, disease, death rates, and the point to which people's capacity to live an everyday life is affected by illness and disability (World Health Organization , n.d.)

Healthy people are considered more vibrant and energetic and have a more positive outlook on life, which positively influences social infrastructure and economic development. In Rwanda, the provision of health services is made available via a network of approximately 5,000 health facilities countrywide, with the public sector system accounting for about 52; percent of these facilities (Republic of Rwanda, 2011).

The Rwanda 2012-2030 Health Policy guides the sector of health to pinpoint and outline the necessary undertakings in attaining the health goals of the government which have been slowly implemented since the constitution's promulgation.

The Rwanda Health Policy 2012-2030 outlines the Ministry of Health (MOH) as the national health leader with several responsibilities. These include developing national policies, providing technical support, monitoring healthcare services' quality and standards, providing strategies on costs for health services, and providing administrative or management trainings. At the county government level, the policy recommends the creation of county health departments to manage and coordinate healthcare services delivery.

In terms of health facilities, the MOH controls and manages approximately 52% of them, while the remaining 48% are run by the private sector, mission organizations, and local county governments. The public sector, under the MOH's control, operates about 79% of the health centers, 92% of the sub-health centers, and 60% of the dispensaries. These measures are designed to develop the general value and convenience of services provided by healthcare facilities across Rwanda (Republic of Rwanda Highlights, 2021).

Other factors also inhibit Rwanda's ability to provide adequate healthcare for its citizens. These include inefficient utilization of resources, the increasing burden of diseases, and rapid population growth (Kanamugire, 2010).

The quality of a country's healthcare system can have a significant impact on health outcomes, and therefore government financial intervention is often necessary. In Rwanda, poverty reduction and healthcare provision are interconnected, and the government has made significant investments in various healthcare initiatives, such as primary healthcare systems, HIV/AIDS, oncology services, community-based health insurance, and medical education. The vaccination rates in Rwanda have improved drastically, with almost all infants now receiving vaccinations against ten different diseases, which is expected to contribute to an increase in life expectancy. This improvement in healthcare is particularly notable, considering that only a small percentage of children had been vaccinated against measles and polio after the genocide in 1994 (United Nations - World Population Prospects 2020).

The inadequate healthcare services in Rwanda are believed to be caused by a combination of insufficient knowledge and skills among healthcare providers, as well as

systemic shortcomings and a shortage of personnel (Republic of Rwanda Highlights, 2021).

➤ *Employment*

In general, the term "employment" refers to the condition of having a job for which one receives payment. To employ someone is to pay them to do a job. Employees in some sectors may receive tokens, additional payments, or typical options. In some types of employment, employees may receive benefits in addition to the amount. Other benefits may include health/medical insurance, accommodation, and disability coverage (Arpia, 2013).

Employment economically offers earnings to low-income families, recuperates domestic petition for goods and services, and stimulates overall growth. In addition, boost the homecoming of displaced persons, engagement can encourage social restorative, and improve social welfare in the long run (USIP).

As sub-Saharan African countries experience increases in income and economic development, employment outcomes for both young people and adults tend to improve. Achieving balanced economic growth and transformation can lead to better employment opportunities. Given the relatively high proportion of youth within the working-age population compared to other regions, much of the focus on employment in sub-Saharan Africa has been on addressing the challenges faced by young people and creating opportunities for them. Despite the difficulties they currently encounter when seeking to enter the workforce, African youth generally maintain a positive outlook regarding their future prospects (Fox. and Gandhi, 2021).

The working-age population in Rwanda, which comprises individuals aged 16 and above, is estimated at approximately 7.3 million. The majority of the population of working-age is part of the labor force. Since November of 2019, the unemployment rate for young people between the ages of 16 and 30 was 19.6 percent among those in the labor force, the National Institute of Statistics of Rwanda states that in 2020, considering the proportion of employment to population which was 46.3 percent, this was higher than in 2019 by one percentage and was also the highest rate since 2017. The employment to population ratio among males (55.2 percent) was higher than (38.5 percent) among females and was also higher among adults (49.5 percent) than among youth (42.6%) (Rwanda labor force survey, 2020).

As of May 2021, the unemployment rate in Kigali had risen to 23.5 percent, which represented a significant increase compared to previous Labor Force Survey rounds. The percentage of unemployment had risen by 6.5%, from 17.0 percent in February 2021. Females experienced a relatively higher unemployment rate, with 26.7 percent of females being unemployed, as compared to 19.9 percent of males (Labour statistical Research, 2021).

Over the years, Kigali has been one of the most populated cities in Rwanda, with an area population of 1,170,000 in 2021, a 3.36% increase from 2020 (United Nations - World Population Prospects, n.d.) As the population increases, so is the unemployment rate; consequently, it impacts the socioeconomic development, the mental health status of the unemployed, and the stress/burden of the employed. This is seminal in Masoro cell. Conversely, as the employment rate decreases, the financial burden on families and the community increase, and so does the mental health status of residents and the inability to access mental health facilities and treatments.

➤ *Health/Medical Insurance*

Medical or health insurance is an agreement between an individual and an insurance provider, where the insurer agrees to pay a portion or all of the individual's medical expenses in return for a regular payment, known as a premium. It usually covers medical, surgical, and prescription drug expenses, and sometimes dental costs, incurred by the insured. Employers often offer this as part of their employee benefits to attract and retain skilled workers. Typically, the premiums are shared between the employer and the employee, with the latter paying a portion from their salary (Bankrate Glossary, 2022).

When it comes to health insurance, the amount paid towards the premiums can be deducted by the payer from their taxes, and the benefits received from the insurance are usually tax-free. However, there are some exceptions for S corporation employees. Despite this, navigating health insurance can be complicated. For example, the insurance provider may deny payment for services received outside of the network (Akintunde, 2013).

Health insurance programs carried out a vital part in improving admittance to and effective use of affordable, high-quality medicines. In Sub-Saharan Africa, where most countries have limited resources dedicated to healthcare, health insurance is designed to reduce the financial burden of healthcare by pooling funds and sharing the risk of unexpected health events. Historically, most countries in the region have tried to implement social health insurance systems that cover mainly formal sector employees with joint contributions by the employee and employer. Health insurance coverage can increase access to care and protect households from the economic effects of ill-health. Insurance schemes can provide various inpatient care services to alleviate the financial burden of hospitalization. However, households in LMICs often spend a significant proportion of their out-of-pocket healthcare expenses on medicines (Carapinha et al., 2010).

At the beginning of the Fiscal Year 2019-2020, the Rwandan government restated its dedication to ensuring the long-term viability of the community-based health insurance (CBHI) program. This insurance scheme covers more than 90 percent of the population in Rwanda. The government not only chose to raise its financial support to the program but also identified and proposed additional subsidies to be allocated to the system. These developments were

highlighted in the Prime Minister's Order N° 034/01 of 13/01/2020 (Rwanda Ministry of Health, 2019).

Subsidies for the Community-Based Health Insurance Scheme in Rwanda. The subsidies are updated in terms of the amount and sources of funds directed to the CBHI. Health insurance entities operating in Rwanda must offer five percent of all annual contributions collected in their health insurance category. Public institutions with medical insurance schemes must provide ten percent of all yearly donations collected as subsidies. Moreover, telecommunication companies are also required to contribute subsidies to the community-based health insurance scheme. In the first and second year after the publication of the order, telecommunication companies must pay two point five percent of their annual turnover, and from the third year onwards, they must pay three percent of their annual turnover (Rwanda Ministry of Health, 2019).

Most health/medical insurance does not cover mental illness and disorders.

The average mental health expenditure per person in Rwanda is 84.08 Rwandan francs. Most citizens of Rwanda do not have the financial resources to afford mental healthcare. The government currently uses 10% of its healthcare budget on mental health services. Citizens cannot afford to pay for mental health resources (Drzewiecki, 2021).

A country can be considered developed from a socioeconomic point of view if its citizen can afford health insurance, especially insurance that covers all mental illnesses and disorders, especially in urban-rural communities and for people of all socioeconomic statuses.

➤ *Life Expectancy*

Life expectation/expectancy estimates averagely the additional years a person is projected to live. Assuming that the mortality rates for each age group for a particular year will remain constant for the entire lifespan of individuals birthed throughout that year. Life expectancy varies significantly in accordance to dynamics including race, sexual characteristics, age, and locality. Local conditions greatly influence life expectancy, with less-developed countries generally having lower life expectancy rates than more-developed countries. Additionally, in some less-developed countries, infant mortality rates are so high that life expectancy at birth is actually lower than life expectancy at age one (Akintunde, 2013).

The accuracy of estimated life expectancy depends on the quality of census and death data available for the population being studied. The United Nations produces national life tables for many countries, which provide information about life expectancy. Additional portion known as healthy life expectancy as combined to traditional life expectation (or disability-free life expectancy) can be calculated. This degree is taking into consideration death rates including proportions of disability and disease, and

estimates the average number of years a person is expected to live in good health (Amiri, 2013).

A study found that healthy life expectancy increased less than overall expectation of life in sub-Saharan Africa SSA. Many ages are lived in underprivileged health in this region, in sub-Saharan Africa, in 2017 life expectancy at birth was 63.9 years, but healthy life expectancy was only 55.2 years. Poor health accounts for 13.6% of life in the region. Djibouti had 11.9% and Botswana had 14.8% of its population living in poor health. Even though women live longer than men, they live in poorer health. Sub-Saharan Africa has increased its healthy life expectancy by 9.1 years since 1990, from 46.1 to 55.2 years. Southern Africa had a 0.9 year healthy life expectancy at birth and Eastern Africa had 12.4 years (Ayuba, 2014).

The life expectancy projections for Rwanda as reported by the United Nations. According to these projections, the life expectancy for Rwanda in the year 2022 is estimated to be 69.69 years, which represents a 0.45% increase from the previous year, 2021. This suggests that, overall, life expectancy in Rwanda is slowly improving. (Macrotrends.net, 2020). There is an extensive connection between Rwanda's efforts to increase its citizens' life expectancy and its efforts to pull them out of poverty, understanding that if people are sick but cannot access healthcare, they cannot contribute to the economy. Conversely, if people are living in poverty, they often cannot afford to access healthcare. Therefore, efforts are striving to improve poverty and life expectancy in Rwanda, which is linked to public health (Breier, 2020).

Mental illnesses tend to decrease the expectancy of life by ten to twenty years, mental illnesses, substance and alcohol abuse, dementia, childhood behavioral disorders, and other mental illnesses, the life expectancy of individuals diagnosed with bipolar disorder is approximately nine years shorter than the general population. For those with schizophrenia, the decrease is about ten years. People with drug and alcohol abuse disorders have a reduced life expectancy of roughly nine to twenty-four years, while those with recurrent depression and heavy smokers can lose up to eleven years. Although all of these conditions are associated with an increased risk of mortality, the extent of the threat depends significantly (Oxford, 2014).

➤ *Empirical Review*

In 2021, Carmen Bentué-Martíne, Marcos Rodrigues, Rafael García-Foncillas López, José María Llorente González, and María Zúñiga-Antón conducted a research on socio-economic development and mental health in the Spanish region of Aragon, the objective of the study was to explain the behavior of depression in a Mediterranean region of Northeastern Spain from an ecological and diachronic perspective a using correlation and multivariate logistic regression analysis and resulted to the findings that integration of data on diseases and territory must be considered when developing policies for the creation of healthier environments and for directing health services with

more specific resources to where they may be needed (Bentué-Martínez et al, 2022).

In 2010, Ardington and Case conducted a research study to explore the relationship between mental health and socioeconomic status in South Africa, focusing on the factors that contribute to symptoms of depression and how they change over the course of a person's life. They utilized a mixed methodology approach to describe their findings, and discovered that household expenditure per member, the number of assets owned by the household, and educational attainment were all negatively associated with symptoms of depression. Children who experienced hunger regularly were also found to have higher levels of depression. The study concluded that poor mental and physical health can impact a person's ability to earn money, through its effects on education and employment, and that poverty can lead to lower levels of education, poorer physical health, and depression (Ardington & Case, 2010).

In 2019 Hailemichael, Y., Hanlon, C., Tirfessa, K. et al conducted a research on Mental health problems and socioeconomic disadvantage: a controlled household study in rural Ethiopia, the goal of the study was to explore the socio-economic status of households with a person with severe mental disorder or depression compared to households without an affected person using a population-based, comparative, cross-sectional household method, the research findings were people with Severe Mental Disorder had higher disability and were more likely to have a poorer living standard, earn less, owned fewer assets, the study therefore concluded that mental illness/disorder is associated with poorer socio-economic disadvantage indicating that these people need support and evidenced-based mental health care (Hailemichael, Hanlon. et al, 2019)

Lawrence Rugema, Ingrid Mogren, Joseph Ntaganira, and Gunilla Krantz conducted a research in 2012 on the Traumatic episodes and mental health effects in young men and women in Rwanda, the research's objective was to investigate mental health effects associated with exposure to trauma in Rwanda during the 1994 genocide period, and over the lifetime, in Rwandan men and women, cross-sectional population-based method was employed and had therefore concluded with the findings that more women than men were exposed to traumatic episodes over their lifetime Depression, post-traumatic stress disorder, anxiety and suicidal attempts are prevalent in Rwanda, for women exposure to physical and sexual abuse was independently associated with all these disorders cross-sectional population-based method. If the findings of this research is given due relevance, there will be a mental health improvement and consequently socioeconomic development in Rwanda.

A study on the Governance Practices and Socio-economic development in Rwanda by (Ernesto & Oreste, 2021), with the object of assessing the impacts of government practices on socio-economic development and evaluating the challenges and opportunities by selected NGOs in Kigali city, considering the responsiveness to

public problems in health and education. The study adopted a descriptive design and mixed method approach, simple random sampling will be used to selected respondents, while purposive sampling was employ to conduct key informant’s interview. The finding proved various levels of implementation of government practices in which responsiveness, citizen participation and others were fully implemented while inclusiveness and rule of law were partially implemented.

➤ *Research Gap*

Considering the empirical review Rugema. L, Mogre,I, Joseph et al. (2012) employed a cross-sectional population-based method with a gap of missing the actual reality of the situation where researchers collected data to understand the effect of a situation 17 years after it occurred.

Safari Erneste & Mukiza Oreste, 2021 used a descriptive design and mixed method approach, Ardington, C and Case, in 2010 also used a descriptive design and mixed method, based on the methodology used, the gap was the limited population and research.

The research in 2019 of Hailemichael, Y., Hanlon, C., Tirfessa, K. et al additional used the population-based, comparative, cross-sectional household method in their research as opposed to Rugema, L., Krantz, G., Mogren, I. et al who employed a qualitative study design, using focus group discussions method. The researcher argues that once the current study considers a geographic and time scope not seminar to other research, this will help to breach the research gap especially with respect the methodology employed in previous studies, the researcher therefore seeks to use a qualitative and quantitative design as it enabled the researcher to describe and observe two or more variables at the point in time and will clearly enhance and unveil the research.

➤ *Conceptual frame work*

The conceptual framework intertwines dependent and Independent variables as depicted below: In this research the independent variable is mental health while the dependent variable is social-economic development.

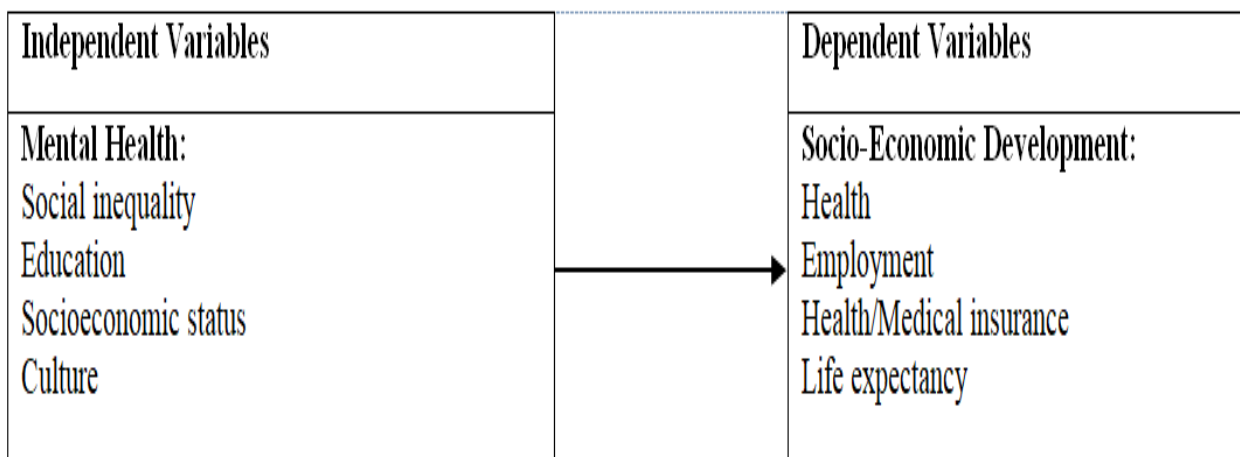


Fig 1 Conceptual Framework
Source: Researcher, 2022

III. RESEARCH DESIGN

The research design chosen for this study is descriptive research. This type of design is appropriate for exploratory studies aimed at discovering new ideas, insights, and techniques related to the impact of mental health on socioeconomic development. Regression research design was also mentioned as a possible option, which provides empirical evidence regarding the relationship between two or more variables.

However, the descriptive research design was ultimately chosen, as it allows the researcher to observe multiple variables simultaneously and describe the relationship between them. This design is particularly useful for identifying relationships between variables.

➤ *Sampling Design*

In this section, the segments that is considered is comprised of the population of the study, sample size and the sampling technique.

➤ *Population of the Study*

The Population for the current study consist of 6000 households across 6 villages of Masoro Cell, in the Ndera Sector of Gasabo District. (Kigali City, 2010).

However, the descriptive research design was ultimately chosen, as it allows the researcher to observe multiple variables simultaneously and describe the relationship between them. This design is particularly useful for identifying relationships between variables.

Table 1 Population of the Study

| Name of the Village | Respondents/ Households | Sampling Technique | Village Sampling Technique |
|---------------------|-------------------------|------------------------|----------------------------|
| Muvini Village | 16 | Simple Random Sampling | Stratified Sampling |
| Mubuga Village | 16 | Simple Random Sampling | Stratified Sampling |
| Byimana village | 16 | Simple Random Sampling | Stratified Sampling |
| Kabeza village | 16 | Simple Random Sampling | Stratified Sampling |
| Matwali village | 16 | Simple Random Sampling | Stratified Sampling |
| Masoro village | 18 | Simple Random Sampling | Stratified Sampling |
| Total | 98 | | |

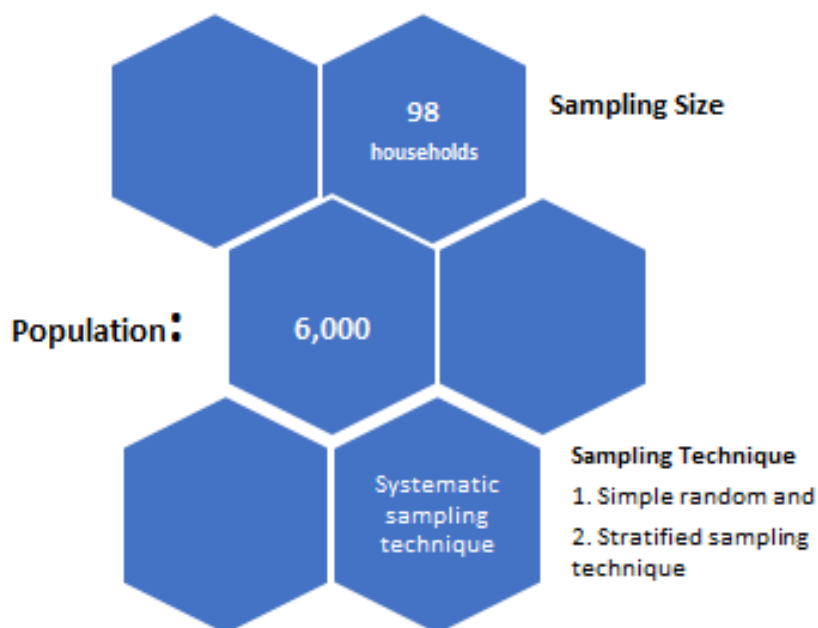


Fig 2 Population of the Study

➤ *Sampling Design*

In this section, the segments that is considered is comprised of the population of the study, sample size and the sampling technique.

Stratified techniques is used because Masoro cell has 6 villages and each village have up to 16 respondents/ households. The study is using a simple random sampling technique to select respondents in a particular village by chance and each resident has equal chance of being selected, free of bias so as to get a general and more realistic data.

➤ *Measurements and Scaling*

This research offers the types of data used in this research as well as the category of data. Using the primary data by means of the questionnaire, designing questionnaires, the researcher uses Likert scale to quantify the respondents’ views on the effect of mental health on socio-economic development in Masoro cell. Secondary data is collected by, desk review, analysis of documents like internet articles, text books, and journals relating to the subject matter.

➤ *Data Collection Instruments*

Data collection instruments in this study are questionnaire, interview and documentation.

➤ *Questionnaire*

A questionnaire is a pre-formulated written set of questions to which the respondents record the answers usually within rather closely delineated alternatives. Likert scale is an interval scale that specifically uses five anchors of strongly disagrees, disagree, neutral, agree and strongly agree. The Likert measures the level of agreement or disagreement. Likert scale is good in measuring perception, attitude, values and behavior. The Likert scale has scales that assist in converting the qualitative responses into quantitative values (Zikmund, Babin, Carr and Griffin, 2010). Primary information is gathered by use of a questionnaire.

➤ *Document Review*

The researcher reviews information, reports and data from the administrators of the Neuro-Psychiatric Hospital Caraes Ndera near Masoro and conduct a desk review that aids in analyzing and supporting this research.



Fig 3 Map of Masoro Cell, Ndera Sector, Gasabo District
Source: Retrieved from Nsanzumukiza Martin Vincent

The researcher is very particular about consecutive questions where category 'not applicable' exists, research supervisor and other professors is aiding in editing this research.

➤ *Coding of Data*

This is used to summarize data by classifying different responses which is put into categories for easy interpretation and analysis.

➤ *Tabulation*

The study utilized complex tabulation to display multiple interdependent characteristics (Babin, Carr & Griffin, 2010). The results of complex tabulation is presented in the form of two or three way tables that provide information on interdependent characteristics of the data. The construction of these tables is adhere to the following guidelines.

IV. DATA ANALYSIS

In order to facilitate the analysis of data from the questionnaires and documentary sources, findings are extracted and presented to answer the research questions. Descriptive statistical analysis procedures including tabulations, frequency distributions, means and standard deviation from the database template is used for objective 1 and 2 and regression analysis is used to determine the relation between two variables in objective 3.

Regression analysis is a statistical method that is used for the approximation of interactions between a dependent variable and one or more independent variables used to assess the relationship between the dependent and independent variables and modeling the future relationship between them.

➤ *Ethical Consideration*

The researcher takes all necessary measures to address ethical considerations and ensure the protection of all participants from physical, mental, emotional harm or financial loss that may arise during the study. The research project is guided by UNILAK's rules and guidelines to prevent potential ethical issues. The researcher is committed to respecting the privacy and rights of all participants by maintaining confidentiality and privacy in accordance with

the relevant laws and policies. The information collected from participants is only used for the purpose of this study and is kept confidential. Furthermore, the true purpose and aim of the research has been clearly communicated to all participants at the outset to avoid any deceptive practices.

➤ *Limitation of the Study*

In as much as the goal of this research is to attain the upmost validity and reliability, it is acknowledged that the research methods uses may have some limitations. These limitations could be because of low sample size used in collecting primary data.

Sometimes it is a little difficult getting more respondents involve in the study because of financial constraint and language barrier since researcher does not speak local language making it difficult to communicate directly without a translator, therefore the questionnaires are translated to Kinyarwanda and getting a translator therefore increasing the budgetary cost (printing materials, transportation, compensation for translator and others) is also a limitation.

The research analysis and results is measured in terms of these limitations and other potential limitations that may arise.

➤ *Personal Information*

The data on personal information aided in understanding the background of the respondents including their gender, age group, marital status, educational level, employment status among others. A total of 90 persons in Masoro Cell were interviewed for the study period. Of the total respondents, more than half (53.3%) were males and 46.7% were females. Most of the respondents (65.6%) were below the age of 40 years, and the rest 34.6% were 40 years and above. This probably means that most of Masoro cell population is within the middle age group. For educational level, more than half (60%) of the respondents completed only secondary school (O'Level S1-S6), and 22.2% had vocational training, 17.8% with a diploma or college education.

Most of the respondents (65%) are married, with 25.6% who are single and 8.8% widows/widowers. Those who have lived in Masoro for ten years or below were more

(66.7%) than those who have lived above ten years. For employment status, 36.7% of respondents are unemployed, followed by 32.2% who are self-employed/business people, and 17.8% are partly employed, 13.3% are fully employed.

Based on these findings the researcher is assured of the validity and knowledge reliability of the data because the study incorporated respondents who are esteemed as far as

providing reliable information is concerned, these findings are also in accordance with the study of Saunders et al. (2018) that when respondents are from diverse classes such as marital status, age, religion, and education background the research becomes more reliable and trusted. The data collected provides information for 90 respondents, which accounts for 92% (90/98) of total sample size. All researcher questionnaires were responded to.

➤ Gender

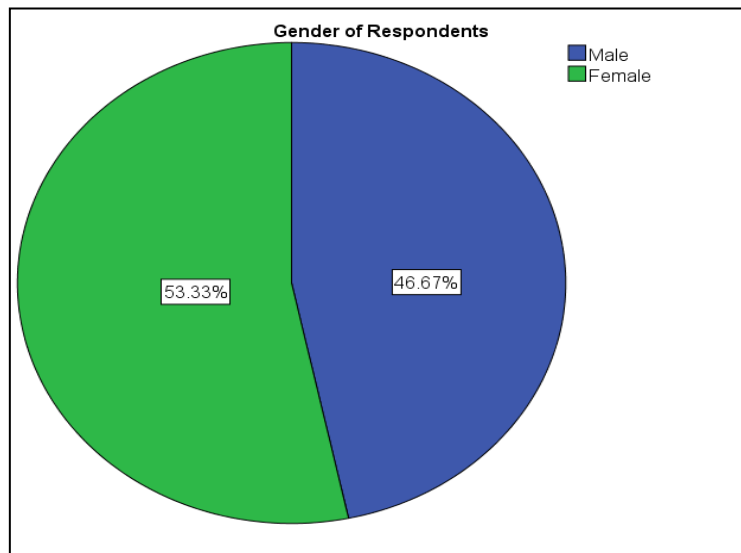


Fig 4 Frequency distribution of Respondents by Gender, Masoro Cell, Primary data, 2022

Figure 4 above indicates that 46.6% of the respondents were males and 53% were females. The researcher clearly observed from the findings that there were more female respondents than male. Therefore, the researcher balanced gender.

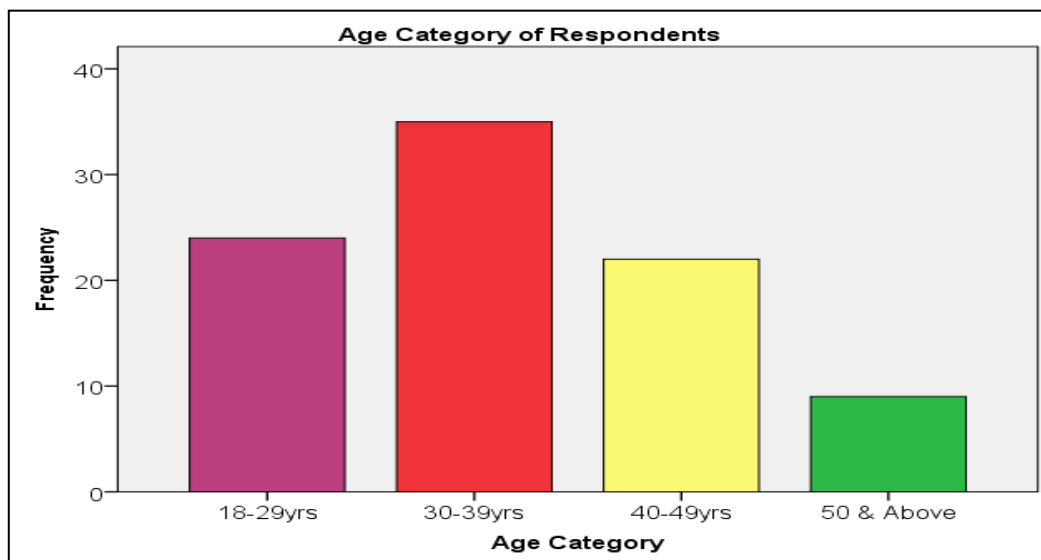


Fig 5 Showing the Age Category of Respondents Source: Primary Data, 2022

Fig. 5 above, it is clearly indicated that a very large number of the respondents that was represented by 38.9% were those that are ranging from the age of 30-39. This revealed that the research involved mature people that were old enough to provide unbiased information, followed by 18-29, 40 -50 and above 51 years old with 26.6%, 24.4% and 10% respectively. The ages of the respondents show that because they are in the working group from eighteen to forty forty-nine years old they are in a better position to respond to these questions regarding the effect of mental health status on socio-economic development.

➤ *Education Level*

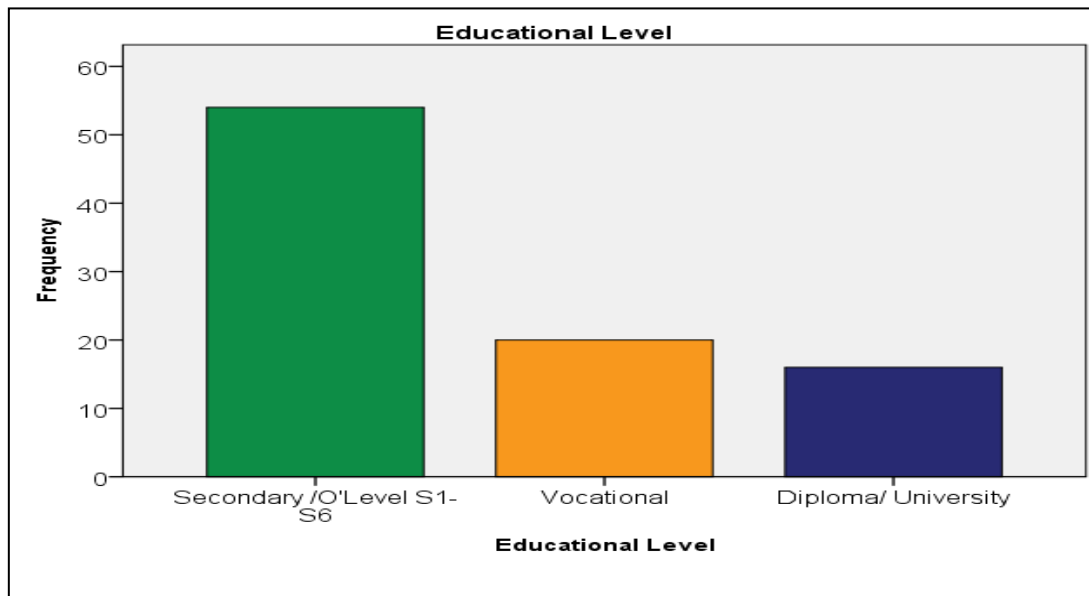


Fig 6 Bar Graph Showing the Education Level
Source: Primary Data, 2022

The findings presented in Figure 6 indicated that 60% equivalent to majority of the respondents had secondary school/O’Level (S1-S6) level, it also revealed that 22.2% of the respondents had vocational education, 17.8% had diploma/ University education, while 0 had masters’ education or above. These outcomes reveal that even though greater part of the respondents were literate, there is still an indication of 22.2 percent of the respondents had vocational education confirming the reliability of information regarding the effect of Mental Health status on Socioeconomic Development in Rwanda, Case of Masoro, Ndera Sector, Kigali City.

➤ *Marital Status*

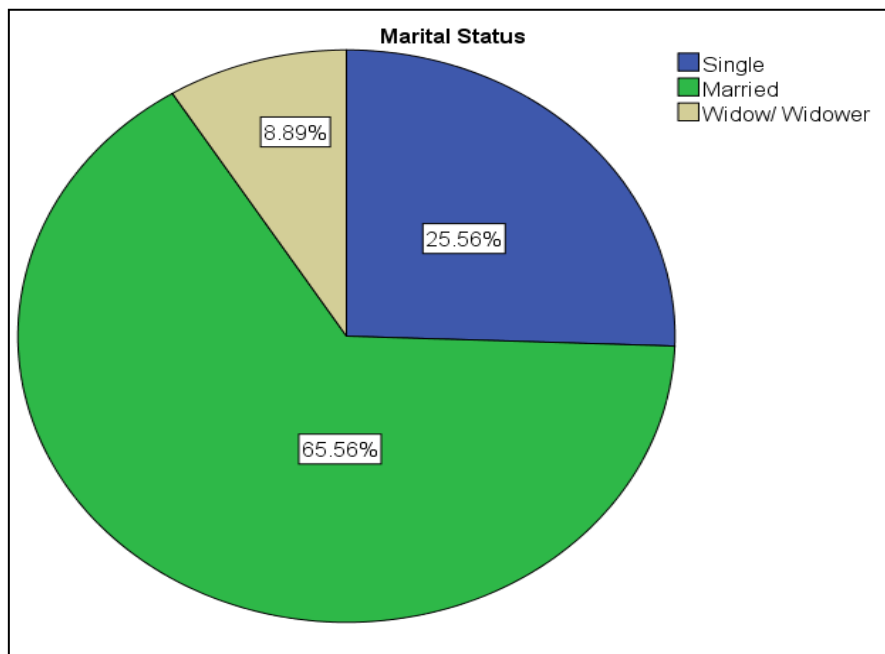


Fig 7 Pie Chart showing the Marital Status of the Respondents
Source: Primary Data, 2022

The Figure 7 above indicates that only 25.6% of the respondents were single and 7.8% were widow(er), while 66.7% were married. The researcher clearly observed from the findings that the number of single who participated in the research was less compared to married respondents represented by the majority. These findings mean that the respondents will respond as members or representatives of a household and not just as an individual, this data can definitely be trusted.

➤ *Length of Stay*

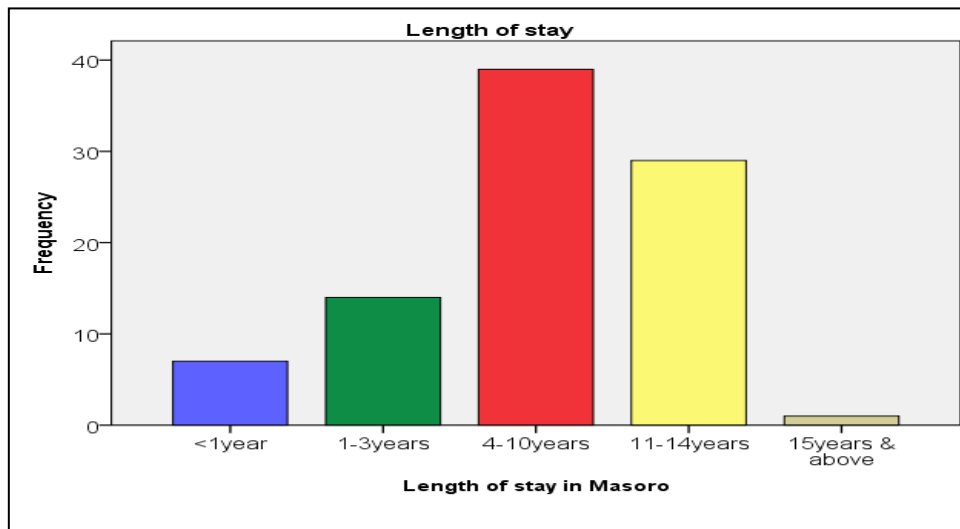


Fig 8 Pie Chart Showing the Length of Stay of respondents in Masoro cell.
Source: Primary data, 2022

The above Fig 8 indicates that 43.3% of the respondents were living in the environment between 4 to 10 years, 32.2% of the respondents were living in the environment above 15 years, while that 16.7% were living in the environment between 1 to 3 years and 7.8% were living in the environment less than 1 year. Based on these findings, the researcher clearly observed that more of the respondents lived in Masoro for a longer period therefore they can give reliable and factual information, on the basis that they may know far more information and understand the community well enough to provide this research with dependable information that will aid this research.

➤ *Employment Status*

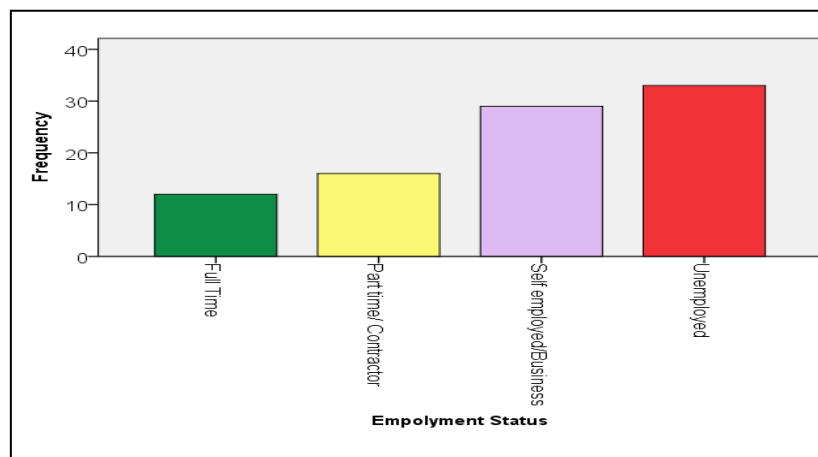


Fig 9 Distribution of Respondents by Employment Status, Masoro Cell.
Source: Primary data, 2022

Figure 9 representing the employment status of respondents in Masoro, which shows that a higher number of respondents were unemployed and self-employed while the minority of the respondents were employed part-time and full-time, these findings helped the researcher to gather data from diverse socio-economic backgrounds and assembling accurate information from distinct prospective economically that validates the data collected.

➤ *Section B: Questions on Health*

Objective 1: To evaluate Mental Health status in Masoro

Questionnaires in this section, regarding the assessment of mental health status, were responded to using the Likert scale in an ascending order. Where; 5 = Strongly Agree (SA), 4 = Agree (A), 3= Neutral (N), 2= Disagree (D) and 1 = Strongly Disagree (SD). The average score (mean) of the respondent’s perception and standard deviation were reported, given that they are categorical data. To find the perception score, the average of each section or indicator assessing mental health status, were summed and divided by number of questions in that section. The liker scale was used to describe respondents’ perception.

➤ *Respondent’s Perception of health in Masoro Cell, 2021*

The independent variable Mental Health was assessed with the following indicators: Social Inequality, Education, Socioeconomics status, and culture. They were assessed

➤ *Social Inequalities*

with two questions each and these questions have responses ranging from 1 to 5, with one as strongly disagree, two as disagree, three as neutral (neither agree nor disagree), four agree, and five strongly agree.

Table 2 Showing Responses on Social Inequalities

| Statement | Strongly Disagree | Disagree | Neutral | Agree | Strongly Agree | Mean | Standard Deviation |
|--|-------------------|----------|---------|-----------|----------------|------|--------------------|
| There is no social inequality in our community, everyone can equally access to mental health support | 17 (18.8) | 4 (4.4) | 19 (21) | 32 (35.6) | 18 (20) | 3.3 | 1.3657 |
| There is a need to improve access to mental health services for everyone regardless of their social class in the Masoro community. | 4 (4.4) | 4 (4.4) | 3 (3.3) | 2 (2.2) | 77 (85.6) | 4.6 | 1.057 |

Source: Primary data, 2022

As seen in table 2 majority 32 respondents of the respondents agree that there is no social inequality in the community of Masoro Cell. However, 17 respondents highly disagreed to infer that existing social inequality while 21% were neutral when asked the same question. Furthermore, as to whether everyone could equally access and have support to mental health, findings indicate that 35.6% of the respondents agreed.

Additionally, findings from Table 2 with regards to access to mental health support point out that a sum of 23.2% of the respondents did not agreed and this is in agreement with the study by (Michelle O'Relly, 2021) that social inequality clearly impacts access to mental health support.

Finally, with regards to the 2nd question on need to improve access to mental health services regardless to their social class which had a high mean of 4.6, findings from Table 2 indicate that 87.8% agreed that it is necessary to enhance the availability of mental health services regards to their social class. This further agrees with the aforesaid reference to the study done by Michelle O'Relly (2021).

➤ *Education*

Education is a subject that can be examined in various research areas, one of which is life satisfaction. It appears that the level of education can influence perceptive factors (Foverskov, 2018).

Table 3 Showing Responses on Education

| Statement | Strongly Disagree | Disagree | Neutral | Agree | Strongly Agree | Mean | Standard Deviation |
|--|-------------------|----------|---------|---------|----------------|------|--------------------|
| Mental health status contributes to education in the Masoro community. | 29 (32) | 4 (4.4) | 27 (30) | 7 (7.8) | 23 (25.6) | 3 | 1.82 |
| Uneducated people suffer more mental health issues than educated people in the Masoro community. | 35 (38.9) | 7 (7.8) | 8 (8.9) | 4 (4.4) | 36 (40) | 3 | 1.8206 |

Source: Primary data, 2022

According to Table 3, the data assembled it was discovered that 29 respondents disagree that mental health status contributes to education in the Masoro community, while 25.6% strongly agreed to this statement, this is in agreement with the study of (Jordi Alonso, 2013) who specifies that education is one of the most imperative domains in which mental disorder may have effect that extends across the life course, human capital lost from early termination of education can constrain economic development and impose higher health and social welfare cost. the mean perception score on education was 3. The scale for the neutral set at 3, shows that respondents could not tell whether mental health status contributes to

education, or whether uneducated people suffer more mental health issues than educated people in Masoro. This could be attributed to the possibility that mental health problems are either evenly distributed among the population of Masoro, or there is limited knowledge of mental health.

According to an examination carried out by Belo Pedro et al titled the correlation between educational attainment and mental health among elderly individuals, the anticipated arbitration model suggested that the link between education and well-being was moderated by a leisurely attitude (Pedro Belo, Navarro-Pardo, E et al, 2020).

Even though 46.7 percent of the respondents disagrees that educated people suffer more mental health issues than educated people in the Masoro community, yet 44.4 percent of the responders agrees with the same statement in agreement with study done by (Dr. Nicola Williams, 2021) who stated that having a higher level of education is associated with improved mental well-being even though

such link may be a little to establish, education according to her study is a clear indicator of the outcomes of life including income, employment and social position since remains a forecaster of upgraded health, welfare and mental health access. Also lower socioeconomic status may be associated with lower levels of educational attainment.

➤ Socioeconomic Status

Table 4 Showing Responses On Socio-Economic Status

| Statement | Strongly Disagree | Disagree | Neutral | Agree | Strongly Agree | Mean | Standard Deviation |
|--|-------------------|----------|---------|---------|----------------|------|--------------------|
| Poor people suffer more mental health issues the in Masoro community | 47 (52.2) | 8(8.9) | 5 (5.6) | 7 (7.8) | 23(25.6) | 2.5 | 1.736 |
| People who are making money may be able to take care of their family with mental health issues than some who is not. | 7 (7.8) | 8 (8.9) | 7 (7.8) | 8 (8.9) | 60(66.7) | 4.2 | 1.33 |

Source: Primary data, 2022

According to Table 4, 47 respondents agreed strongly that poor people suffer more mental health issues the in Masoro community, while 60 persons strongly agree that people who are making money may be able to take care of their family with mental health issues than some who is not, whereas considering the perception of socio-economic status, the mean respondent’s score was 3. This also shows that respondents could not tell whether poor people suffer more mental health issues, or those who make more money are able to take care of their family with mental health issues than those who do not. This also could likely be due to respondents’ limited knowledge of respondent’s health issues, or mental health issues being evenly distributed among Mossoro’s population.

contentment, and the perceptions of physicians regarding the necessary care and treatment for a patient (Victoria Bailey, 2022).

In as much as majority of the respondents disagree that poor people suffer more mental health issues the in Masoro community, more than 33% of the respondents agree to same statement and this is being supported by a study done by Philippa Watkins, stating that the social, economic and physical environments critically impacted by mental health, socio-economic status is highly associated with mental health status and poverty plays a main role, poor people faces endless stressful situations like struggling to survive or provide basic needs, unsafe accommodation or environment and many more can lead to more or less mental illnesses as well as depression including anxiety, Schizophrenia, drug/alcohol abuse among others (Watkins, 2022).

The level of socioeconomic status can pose an extensive control on the value of health outcomes, patient

➤ Culture

Table 5 Showing Responses on Culture

| Statement | Strongly Disagree | Disagree | Neutral | Agree | Strongly Agree | Mean | Standard Deviation |
|---|-------------------|----------|---------|---------|----------------|------|--------------------|
| It is commonly understood in Masoro that people who want to harm themselves are evil. | 13 (14.4) | 19 (21) | 8 (8.9) | 10 (11) | 40 (44.4) | 3.5 | 1.56 |
| People need to seek spiritual help if they seem to have mental health issues | 26 (28.9) | 19 (21) | 6 (6.7) | 8 (8.9) | 31 (34.4) | 3 | 1.69 |

Source: Primary data, 2022

Based on the given table 5, most of the participants strongly express their agreement with the given statement or question that it is commonly understood in Masoro that people who want to harm themselves are evil and people need to seek spiritual help if they seem to have mental health issues. Table 5, shows the evaluation of mental health status in Masoro based on perception of respondents on Culture was also 3. With score card set 3 as neutral, shows that the respondents could not also tell whether

people who tried to harm themselves are considered evil, or whether people should seek spiritual help when they have mental health issues.

Culture is a manner of existence that impacts individuals on a daily basis by providing them with guidelines and expectations. It also impacts people’s attitudes towards health and social connections. For instance, a cultural practice that places more importance on

family bonds can lead to strong social networks that promote the well-being of each other, both in terms of physical health and emotional support (Keiko Nakamura).

➤ *Section C: Socioeconomic Development*

Objective 2: To assess the social economic development in Masoro Cell

Respondent’s perception on Socioeconomic development, Masoro 2021

Questionnaires in this section, regarding the assessment of socioeconomic development, were responded to using the Likert scale in an ascending order. Where; 5 = Strongly Agree (SA), 4 = Agree (A), 3= Neutral (N), 2= Disagree (D) and 1 = Strongly Disagree (SD). The

frequency, average score (mean) of the respondent’s perception and standard deviation were reported, given that they are categorical data. To find the perception score, the average of each section or indicator assessing socioeconomic development, totaled and distributed according to amount of questions in each section. The liker scale was used to describe respondents’ perception. The dependent variable socioeconomic development was assessed by the following indicators: Health, Employment, Health/ medical insurance and Life expectancy. They were assessed with two questions each. The middling perception score of respondents for health was 4.7. With the numerical value of agree set as 4, shows that respondents agreed or think that good health contribute to socioeconomic development, and that you have less stress, which also enable you to be more productive.

• *Medical Insurance*

Table 6 Showing Reponses on Medical Insurance

| Statement | Strongly Disagree | Disagree | Neutral | Agree | Strongly Agree | Mean | Standard Deviation |
|---|-------------------|-----------|---------|-----------|----------------|------|--------------------|
| In Masoro, medical insurance covers all mental health expenses and makes it easy to save money for other purposes. | 20 (22.2) | 25 (27.8) | 10 (11) | 18 (20) | 37 (41.1) | 3.4 | 1.593 |
| Every member of my family is on medical insurance without difficulty enabling me to contribute to community projects. | 12 (13.3) | 8 (8.9) | 3 (3.3) | 13 (14.4) | 54 (60) | 4 | 1.487 |

Source: Primary data, 2022

In the above table, almost all respondents strongly agree to the statement that in Masoro, medical insurance covers all mental health expenses and makes it easy to save money for other purposes and every member of my family is on medical insurance without difficulty enabling me to contribute to community projects. For the perception of medical insurance, the mean score was 4. The scale card for agreement set as 4, shows that respondents agreed that when medical insurance covers all mental health expenses, it makes it easier to save money for other purposes, and also when family mental health expenses are covered with medical insurance without difficulty, it is easy to contribute to community projects in Masoro.

• *Life Expectancy*

Table 7 Showing Responses on Life Expectancy

| Statement | Strongly Disagree | Disagree | Neutral | Agree | Strongly Agree | Mean | Standard Deviation |
|--|-------------------|----------|---------|---------|----------------|------|--------------------|
| Access to quality mental health services promote long life and economic growth. | 7 (7.8) | 1 (1.1) | 2 (2.2) | 9 (10) | 71 (78.9) | 4.5 | 1.1441 |
| Poor mental health reduces life span, reducing healthy working conditions making it difficult to contribute towards community development programs | 6 (6.7) | 0 (0) | 5 (5.5) | 4 (4.4) | 75 (83.3) | 4.6 | 1.080 |

Source: Primary data, 2022

As comprehended in Table 7, most respondents strongly agree to the statements that access to quality mental health services promote long life and economic growth and poor mental health reduces life span, reducing healthy working conditions making it difficult to contribute towards community development programs. The mean perception score on Life Expectancy was 5, and with the score for strongly agree set as 5, shows that respondents think or agreed that access to quality mental health services promotes economic growth and that poor mental health

reduces life span, healthy workforce, which makes it difficult to contribute to community projects in Masoro.

The projected years that an individual from specific group or population is anticipated to live is life expectancy, which is determined by calculating the average age at which people in that group typically pass away (Ortiz-Ospina, 2017).

More than seventy percent of the respondents are in agreement with the statements that access to quality mental

health services promote long life and economic growth and that poor mental health reduces life span, reducing healthy working conditions making it difficult to contribute towards community development programs, this is in agreement with the research which state that people with severe mental

health disorder have a reduction in life expectation of between 10 to 25 years, people with depression have 1.8-time greater risk of untimely death according to World Health Organization (Hull, 2022).

- *Health*

Table 8 Showing Responses on Health

| Statement | Strongly Disagree | Disagree | Neutral | Agree | Strongly Agree | Mean | Standard Deviation |
|--|-------------------|----------|---------|---------|----------------|------|--------------------|
| Good health enable people to contribute to socioeconomic development in Masoro community. | 4 (4.4) | 0 (0) | 6 (6.7) | 1 (1.1) | 79 (87.8) | 4.7 | 0.9460 |
| If you are healthy, you will be less depress/stress and there will be improvement in your earnings | 4 (4.4) | 0 (0) | 2 (2.2) | 1 (1.1) | 83 (92.2) | 4.8 | 0.8747 |

Source: Primary data, 2022

A majority of the participants expressed a strong agreement with the notion that being in good health is crucial for individuals in making significant influences to the socioeconomic progress of the societal order especially in Masoro community and if you are healthy, you will be less depress/stress and there will be improvement in your earnings and this is in support of the research of Suchit Arora and Robert W. Fogel declaring that improved health has powered universal progress over the years by widening the labor force and increasing productivity, furthermore, it was estimated by historian economists that better health accounted for about one third of the overall Gross Domestic

Products GDP per capital growth in past years of developed economies (Fogel, 2001).

The average perception score of respondents for health was 5. With the numerical value of agree set as 5, shows that respondents strongly agreed or think that good health contribute to socioeconomic development, and that you have less stress, which also enable you to be more productive.

Health encompasses not only the absence of illness or physical weakness but also a holistic state of being as well as comprehensive comfort, which includes optimal social, physical, not excluding mental wellness (WHO, 2022).

- *Employment*

Table 9 Showing Responses of Employment

| Statement | Strongly Disagree | Disagree | Neutral | Agree | Strongly Agree | Mean | Standard Deviation |
|--|-------------------|----------|---------|---------|----------------|------|--------------------|
| Mental health care promotes wellbeing and permit you to work and make more financial and social contributions the in Masoro community. | 4 (4.4) | 1 (1.1) | 2 (2.2) | 6 (6.7) | 77 (85.6) | 4.7 | 0.9341 |
| If you are in good mental health you will have more job or business opportunities to support yourself and family. | 5 (5.5) | 2 (2.2) | 0 (0) | 0 (0) | 83 (92.2) | 4.7 | 1.0083 |

Source: Primary data, 2022

More than 80 percent of the respondents according to table 9 strongly agrees with the statements that Mental health care promotes wellbeing and permit you to work and make more financial and social contributions the in Masoro community and if you are in good mental health you will have more job or business opportunities to support yourself and family. The employment mean perception score was 5, this indicates that respondents strongly agreed that when you are mentally healthy you have opportunities for employment, which could mean being fully employed, or self-employed.

individual who is hired for a salary or compensation to initiate work or tasks for an organization. (peoplehum, 2022)

Objective 3: To Determine whether there is a significant effect of mental Health on socio-economic development

For objective 3, bivariate and multivariate ordinal logistics regression were used to determine the relationship between dependent variable (socioeconomic development), and independent variable (mental health).

Employment is a paid communal work arrangement between a recruiter and an employee, it also applies to an

➤ *Effect of Mental Health status on Socioeconomic development, simple binary regression, Masoro, 2021*

Table 10 Parameter Estimates

| Parameter Estimates | | | | | | | | |
|-----------------------|---------------------------|----------|------------|--------|----|------|-------------------------|-------------|
| | | Estimate | Std. Error | Wald | df | Sig. | 95% Confidence Interval | |
| | | | | | | | Lower Bound | Upper Bound |
| Dependent | [Socioeco Dev 2=Disagree] | 6.959 | 2.648 | 6.907 | 1 | .009 | 1.769 | 2.148 |
| | [ScioeconDev 3=Neutral] | 8.152 | 2.760 | 8.727 | 1 | .003 | 2.743 | 13.560 |
| Independent | Mental Health | 3.753 | 1.087 | 11.908 | 1 | .001 | 1.621 | 5.884 |
| Link function: Logit. | | | | | | | | |

Considering mental health in the parameters estimate we look at the estimate, Significance level and confidence intervals. In that same bivariate (Table 10), an increase in mental health was more likely associated with 3.75 or 3.8 increase in Socioeconomic development.

Table 11 Showing The Regression Analysis

| Pseudo R-Square | |
|-----------------------|------|
| Cox and Snell | .248 |
| Nagelkerke | .482 |
| McFadden | .395 |
| Link function: Logit. | |

The Pseudo R²- Represents/ or account for the impact or influence that alterations made to the dependent as well as independent variables. How much change is estimated, therefore for our model, the bivariate shows that the model can accounted for 48.2% change (Mental health) has on (Socioeconomic development).

Table 12 Showing The Coefficients Multivariate Ordinal Logistic Regression, Effect Of Mental Health On Socioeconomic Development, Masoro, 2021

| Test of Parallel Lines ^a | | | | |
|---|-------------------|------------|----|------|
| Model | -2 Log Likelihood | Chi-Square | df | Sig. |
| Null Hypothesis | 25.422 | | | |
| General | 25.413 | .009 | 1 | .924 |
| The null hypothesis states that the location parameters (slope coefficients) are the same across response categories. | | | | |
| Effect of Mental Health on Socioeconomic development, Adjusted for covariates, Masoro 2021 | | | | |
| Cox and Snell | | .338 | | |
| Nagelkerke | | .657 | | |
| McFadden | | .571 | | |
| Link function: Logit. | | | | |

The multivariate as seen Table 12. was adjusted for other factors, like the researcher added some demographics characteristics. To see whether the Pseudo R² will increase. Because a change of 48.2% was not strong enough to make a conclusion.

So after the researcher adjustment, which is multivariate analysis, the R² increased to 65.7%. Which is a significant effect. More than 50%. Also the effect of mental health increased from 3.8 to 7.5.

To determine the effect of mental health on socioeconomic development, bivariate and multivariate ordinal logistic regression analysis were done. Independent and dependent variables were recoded so as to fit the model for analysis. The bivariate ordinal logistic regression model fitting and goodness of fit were significant, showing a p-value of 0.00 for model fitting, and a p-value of 1, for the

goodness of fit. The model that was adjusted was responsible for explaining 48.2% of the variability in the dependent variable. It shows that an improvement in Mental Health status was linked with, a 3.8 increase in socioeconomic development.

After adjusting for other covariates, the fitted model was good at estimating 65.7% of the conversion of the dependent variable, p<0.05. The effect of mental health on socioeconomic development also increased from 3.8 to 7.5. The results show that improved mental health status is positively associated with socioeconomic development.

The analyses failed to accept the null hypothesis, there is no significant effect of mental health on socioeconomic development. The p-values were 0.92, and 0.4 respectively. The model favored the alternative analysis, mental health

status has a significant effect on socioeconomic development.

Table 13 Showing the Test of Parallel Lines

| Test of Parallel Lines ^a | | | | |
|--|---------------------|--------------------|----|------|
| Model | -2 Log Likelihood | Chi-Square | df | Sig. |
| Null Hypothesis | 27.925 | | | |
| General | 21.825 ^b | 6.099 ^c | 6 | .412 |
| The null hypothesis asserts that the slope coefficients, which represent the location parameters, are equivalent or equal across different categories of the response variable. | | | | |
| a. Link function: Logit. | | | | |
| b. Once the maximum number of step-halving iterations is reached, it is not possible to increase the log-likelihood value any further. | | | | |
| c. The Chi-Square test statistic is calculated using the log-likelihood value of the final iteration of the overall model. However, the reliability or accuracy of this test is not clear or definite. | | | | |

➤ *Desk Review*

In this section, the researcher endeavors to provide a response to the research query posed in the study that states, “How is mental health services conducted and implemented at Masoro Cell?”. The researcher visited the mental institution located in Ndera Sector and a desk review was carried out with the purpose of comprehending the systems and practices involved in providing mental health services. The researcher using the Document Review as an instrument of data collection reviewed the various reports with regards to implementation of the care of mental health from the year 2021, additionally, the reports did not provide record from the specific are of study as records were kept on the district level, but based on the report from the level of Gasabo district The following information was extracted from the reports.

Neuro-Psychiatric Hospital Caraes Ndera is the only psychiatric hospital that offers services such as mental health, occupational therapy, social services, HIV integration in mental health and psychosocial services among others to residents of Masoro cell and its surroundings. The government of Rwanda through Gasabo district pays cover up for venerable citizens residing in the district in 2021 according to the hospital is 178,855,360 rwf, while Nedra sector 11,923,690.66 Rwf and Masoro cell 1,987,281.8 as estimated. With millions more money payed by insurance companies and individuals. From Gasabo district 2021 the total number seen at this hospital was 64,906 patients. outpatient: 59116 patients, inpatient and admitted: 5790 patients. The severe mental health cases are patients with Schizophrenia equal to 8,655 patients from in and out patients and Epilepsy with 11,072 patients. unspecified mental disorder: 5 cases.

This desk review reveals that the government of Rwanda through Gasabo district spends minimum money on mental health and mental health related issues as compared to infrastructures, the review also indicates that numerous instances of mental health disorders or problems might have gone unreported at this medical facility.

V. SUMMARY, CONCLUSION AND RECOMMENDATIONS

➤ *To Evaluate Mental Health Status in Masoro Cell for 2021*

Primarily, the research’s objective was to evaluate mental health status and its effect on socioeconomic development in Masoro cell for the year 2021. The independent variable Mental Health was assessed with the following indicators according to table 4.3.3: Social Inequality, Education, Socioeconomics status, and culture. For the perception of mental health status, the total mean respondent’s score was 3 indicating that respondents could not give a straight answer as to whether they agree or disagree with statements that there is no social inequality in health, there is a need to enhance the availability of high-quality services related to mental health for all, whether mental health status contributes to education, or whether uneducated people suffer more mental health issues than educated people in Masoro, whether poor people suffer more mental health issues, or those who make more money are able to take care of their family with mental health issues than those who do not. This also could likely be due to respondents’ limited knowledge of respondent’s health issues, or mental health issues being evenly distributed among Masoro’s population and not also tell whether people who tried to harm themselves are considered evil, or whether people should seek spiritual help when they have mental health issues as stated in table 4.4.2, this also could likely be due to respondents’ limited knowledge of respondent’s health issues, or mental health issues being evenly distributed among Masoro’s population.

➤ *To Assess the Social Economic Development In Masoro Cell*

The secondary objective of this research is assessing the social economic development in Masoro Cell, the result shows the assessment of Socio economic development in Masoro based on perception of respondents. In table 4.3.1 medical Insurance mean score was 4, table 4.3.2 life Expectancy was 4.6, table 4.3.3 where Health was 4.75 and employment was 4.7 according to table 4.3.4. the general score was 4.423 strongly agreeing to statements that where majority of those who responded agreed to the statement when you are mentally healthy you have opportunities for employment, which could mean being fully employed, or

self-employed, when medical insurance covers all mental health expenses, it makes it easier to save money for other purposes, and also when family mental health expenses are covered with medical insurance without difficulty, it is easy to contribute to community projects in Masoro, that access to quality mental health services promotes economic growth and that poor mental health reduces life span, healthy workforce, which makes it difficult to contribute to community projects in Masoro. The average perception score of respondents for health was 5. With the numerical value of agree that as 5, shows that respondents strongly agreed or think that good health contribute to socioeconomic development, and that you have less stress, which also enable you to be more productive.

➤ *Determine whether there is A Significant Effect of Mental Health on Socio-Economic Development*

For objective 3, bivariate and multivariate ordinal logistics regression were used to disclose the connection between the dependent (socioeconomic development), and independent variable (mental health). That's why it was resolved, that there is a constructive correlation between Mental health and Socioeconomic development. Increase or Good mental health, will lead to good socioeconomic development. After adjusting for other covariates, the fitted model was good at estimating 65.7% of the change in the dependent variable, $p < 0.05$. The effect of mental health on socioeconomic development also increased from 3.8 to 7.5. The results show that improved mental health status is positively associated with socioeconomic development.

The analyses failed to consent the null hypothesis, there does not exist a significant effect of mental health on socioeconomic development. The p-values were 0.92, and 0.4 respectively. The model favored the alternative analysis, mental health status has a significant effect on socioeconomic development.

➤ *Conclusion*

After analyzing the gathered data and research the researcher arrived at the conclusion that there exists a favorable association between an individual's mental health status as well as socioeconomic development. An advanced stage of mental well-being is likely to contribute to improved socio-economic development, while poorer mental health status may have adverse impacts on socioeconomic development.

Based on the initial set of questions where participants neither agreed nor disagreed with some inquiries findings including table 4.7 displaying 21% neutral, table 4.8 30% neutral concerning mental health services, the investigator concluded that the inhabitants of Masoro cell possess inadequate consciousness as well as ideas of mental health and related issues.

Researcher also concludes that according to the research, when you are mentally healthy you have opportunities for employment, which could mean being fully employed, or self-employed, when medical insurance covers all mental health expenses, it makes it easier to save money for other purposes, and also when family mental

health expenses are covered with medical insurance without difficulty, it is easy to contribute to community projects in Masoro, also that access to quality mental health services promotes economic growth and that poor mental health reduces life span, healthy workforce, which makes it difficult to contribute to community projects in Masoro. The average perception score of respondents for health was 5. With the numerical value of agree that as 5, shows that respondents strongly agreed or think that good health contribute to socio-economic development, and that you have less stress, which also enable you to be more productive.

➤ *Recommendations*

Centered on the research conducted on the effect of mental health status on socioeconomic development, the researcher thereby makes these recommendations:

To the government of Rwanda including the leaders of Masoro cell

- The government of Rwanda through the leadership of Masoro cell to carry out a continual mental health education in all six villages so as to enlighten the dwellers on knowledge of mental healthiness and mental concerns.
- Said government should also invest more resources in establishing mental health facilities, and train community dwellers as mental health clinicians and care givers since people may feel more open to communicate their concerns with someone familiar in comparison to a stranger.
- To mitigate unemployment rates, enhance access to mental health services, and promote socio-economic development, it is recommended to create additional employment, business, and entrepreneurial prospects for the youth residing in Masoro cell. This strategy would also result in the advancement of the comprehensive socio-economic status of Masoro cell and surrounding villages.
- That every member of a household be covered on medical/health insurance and that it should cover all mental health issues as well.

➤ *To the Administration of Neuro-Psychiatric Hospital Caraes Ndera;*

- Neuro-Psychiatric Hospital Caraes Ndera as the only psychiatric hospital that offers among others mental health services to take into consideration reporting records on specific villages and cells instead of reporting on district alone this will give further researcher a more precise information to work with.

➤ *Suggestion for Further Research*

This research recommends for additional investigation; these are:

- Comparable research ought to be conducted in other cells and districts in Rwanda and other parts of the world.

- The researcher suggests that there be a more clinical research on mental health as this research was not totally focused on the medical/clinical aspects of mental healthiness.

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