EFFECTS OF MENTAL HEALTH ILLNESSES TO THE ECONOMY OF KENYA DURING THE COVID 19 PANDEMIC

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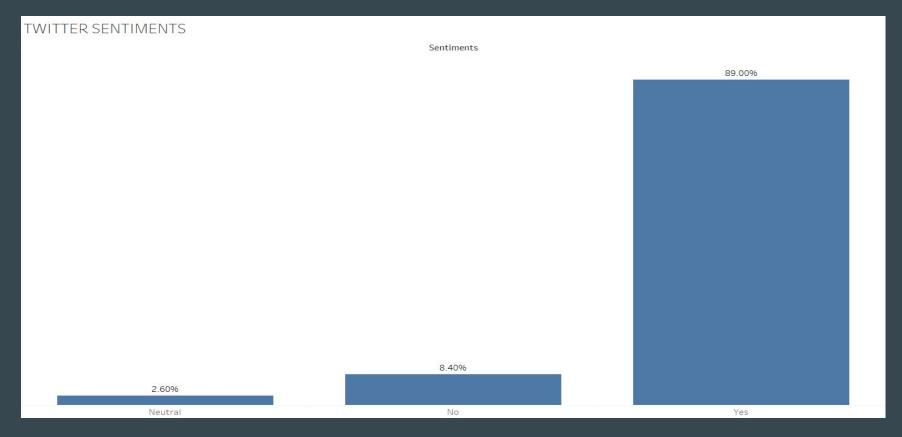
December 13, 2021

Overview

Mental health not only has an impact at the individual level but at the economic level. Research study has found that poor mental health can result in billions of dollars of less total income for the economy. Tending to mental health can have a major impact for employers and the economy. A 2016 WHO study found that for every dollar investing in treatment for depression and anxiety resulted in a return of \$4, as well as better health and productivity.

The Emergence of COVID 19 in early 2020 in Kenya catalysed the already existing problem of Mental Health illness and stigma in the country. COVID 19 has affected many Kenyans' mental health negatively. This is clearly indicated in the Twitter Sentiments graph below where out of 1000 tweets collected globally on the week between 5th to 11th December 2021 and that were related to COVID 19 and Mental Health, close to 90% twitter users strongly agree that COVID 19 had and is continuing to take a toll on their Mental health.

We arrived to this conclusion by carrying out sentiment analysis on the tweets using a pre-trained Machine learning algorithm called the BERT (Bidirectional Encoder Representations from Transformers) that determines the Sentiment behind a tweet i.e whether Negative, Positive or Neutral.



COVID 19 has therefore affected the Mental health of majority of the world's population negatively which has translated to the economy of different countries like Kenya. We have therefore set out to prove that our hypothesis is true as shown in the following slides.

Data Collection and Analysis

Mental Health illness refers to a wide range of mental health conditions that affects a person's mood, thinking and behavior. They include depression, anxiety disorders, schizophrenia, eating disorders, addictive behaviors, suicidal thoughts and suicide.

We used the following parameters/indicators for our analysis;

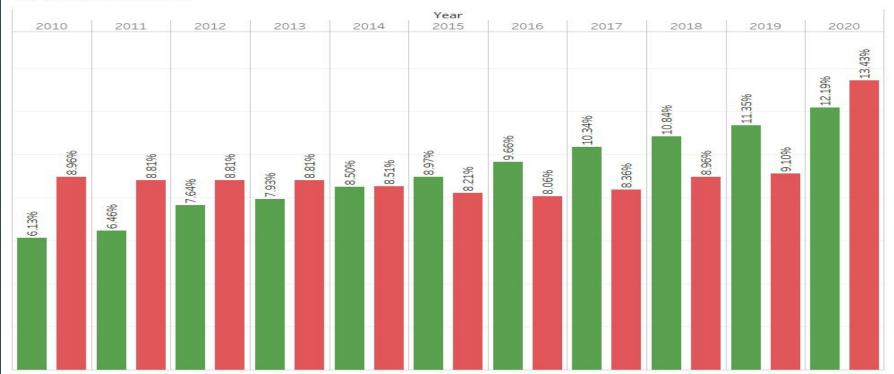
- Suicide Mortality Rate
- Consumer Price Index (CPI)
- Employment-to-Population Ratio
- Sentiments

Our data sources include;

- Kenya National Bureau of Statistics
- The World Bank
- Twitter

CPI and Suicide

CPI AND SUICIDE



Measure Names

- % of Total CPI along Table (Across)
- % of Total SUICIDE RATE (per 100000 population) along Table (Across)

Analysis

Changes in the CPI are used to assess price changes associated with the cost of living.

A higher CPI index shows a higher rate of inflation which indicates a frailing economy.

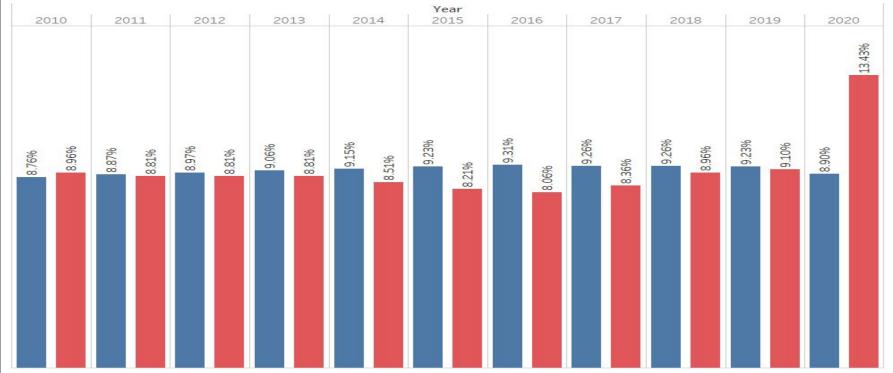
Implication:

• The year 2020 saw a rise in the CPI. This could be accredited to the pandemic as compared to the other years, this led to an unrest by the citizens of the country as majority of the people could not sustain themselves economically. Due to this some ended up falling into depression and into other Mental disorders and Suicide hence the spike in suicide rate as compared to the previous years.

Reference Paper: Consumer Price Index

Suicide and Employment-to-Population Ratio





Measure Names

■ % of Total E to P Ratio along Table (Across)

■ % of Total SUICIDE RATE (per 100000 population) along Table (Across)

Analysis

Lows in the employment-to-population ratio corresponds with economic downturns.

A higher ratio means that an important proportion of the population in working age is employed which in general has a positive effect on the GDP per capita.

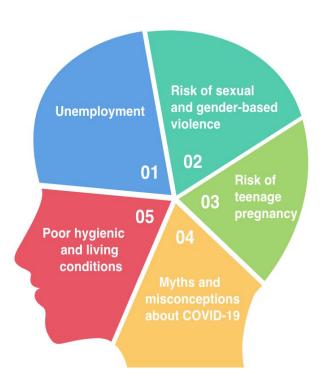
Implication:

• The year 2020 saw a significant decrease in Employment-to-population ratio which indicates that some of the population in the working age were laid off, fell into depression and a few ended up committing suicide hence the sharp increase in Suicide cases as compared to the previous years.

Reference paper: <u>Employment-to-Population Ratio</u>

Factors contributing to the increase in mental health and suicide cases during the covid 19 pandemic:

Mental Health & Wellness



Covid 19 and the resulting economic recession have negatively affected many people's mental health and created new barriers for people already suffering from mental health illness.

The Covid 19 pandemic has also disrupted critical mental health services in majority of counties in Kenya. This shows the devastating impact of covid-19 on the access to mental health and underscores the urgent need for increased funding.

Lockdown and isolation during this pandemic has affected personal freedom to engage in behaviours that are consistent with subjectively held values beyond health, for instance, visiting loved ones, engaging in recreational activities and spending time outdoors.

Stigmatization of people suspected to be having Covid-19 has also contributed to the increase in mental health cases.

Measures that the Kenyan Government can take to caution the Economy against Mental Health Illnesses affected by COVID19 or subsequent Pandemics

- Increasing awareness of advancement and importance of mental health prevention and promotion by incorporating it in the curriculum of Primary, High School and University Education.
- Promote healthy lifestyles including nutrition and exercise e.g. Investing in equipped stadiums and gyms in public Institutions and establishments.
- Allocating more funds to mental health institutions.
- The Ministry of Health in conjunction with the Ministry of Education should encourage more Kenyans to train as Certified Psychologists who are best suited to tackle cases of Mental Health illness and stigma.
- Creation of policies that protect green spaces should also be implemented and enforced strongly especially in Urban areas like Nairobi e.g. Urban Parks like Uhuru Park which increases social cohesion, reduce feeling of isolation and provide a setting for social interaction for many Nairobians.

By adhering to this proposals and many more, the government will not only be able to protect its economy from the impact of COVID-19 or any other subsequent pandemic but also the achieve the SDG 3.4 which aims at reducing premature mortality from non-communicable diseases by one third through prevention and treatment and promote mental health and well-being by 2030.



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