



INCIDENCE OF SUICIDE IN MALAWI.

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Background

Introduction

- Suicide is increasing public health concern & one of the leading causes of death in many countries (1, 2).
- Suicide rates are quite many countries, but there is a lack of such prevalence studies to in most parts of Africa including Malawi (3-5).
- Explanation for lack of attention given to this issue is that historically African societies have been assumed to have very low rates of suicide, which is not true and based on colonial assumptions (6).
- Few studies completed in Africa, have shown an increasing trend of suicide by hangings from 5.2 per 100,000 to in South Africa alone (7), and 7.4 suicidal people per 100,000 in Zambia.
- Risk factors that have been reported for suicide include famine gender, young age, low education, being single and psychiatric conditions especially mood disorders, degree of acculturation high levels of family conflicts (8, 9).
- There are no studies that have looked at the Incidence of suicide in Malawi which can give insights on the burden of the problem, areas for suicide prevention, and inform development of interventions for reducing suicide cases.
- This study aimed at determining Incidence of suicide, its correlates and methods used in Malawi.

Objectives

- To determine an annual characteristics of suicide in Malawi.
- To establish social demographic correlates of suicide in Malawi.
- To identify common methods used for dying by suicide in Malawi.

Methods

- **Design:** Cross-sectional design using secondary data.
- **Study population and setting:** Data from case files for individuals who died by suicide whose records are kept at police stations and health facilities from six randomly chosen districts in Malawi (Karonga, Nkhatabay, Mchinji, Nkhotakota, Balaka and Machinga).
- **Sampling and Sample Size:** A proportional to size sampling used to sample two districts from each of the three regions of Malawi. All case files for individuals who committed suicide in 2017 were included in the study- no sample was calculated. Names of individuals identified from these two sources were crosschecked to avoid double reporting
- **Data Collection:** 24 trained research assistants collected quantitative data. Adapted data extraction sheets were used for collecting data for the identified people's case files/notes by the trained research assistants. The data extraction sheets also had components on the deceased's demographic information, methods used to die of suicide other risk factors that have been associated with suicide.
- **Ethics:** The study's ethical clearance, institutional authorization and consent were sought from National Health sciences Research and Ethics Committee and from the commissioners of police, and the District Health Officers to access the information from the chosen districts respectively.
- **Data Management and Analysis:** Data was coded on a computer, cleaned and analyzed using STATA. The prevalence of suicide was calculated by dividing the total population of the six districts with the number of suicide cases identified from the six districts. Crude and adjusted Risk ratios were computed to test risk factors associated with suicide.

Findings

Prevalence: There were 190 suicide cases in all 6 sampled districts in the year of 2017, representing a rate of 7 people per 100,000 population.

Findings continued..

Social demographic correlates of suicide:

- 80.3% (151) of the cases were males
- Majority cases were in the age group of 21-30 years 51 (28.5%)
- Majority cases (43.2%) had not attended any education,
- 97.3% (182 cases) were from the rural areas & in informal employment

Methods used to die by suicide:

Many people committed suicide by hanging or strangulation followed by self poisoning (cf Table 1 below)

Method used	n	%
Hanging/Strangulation/Suffocation	106	57.9
Poisoning by alcohol	24	13.1
Self-poisoning by drugs	15	8.2
Self-poisoning by unspecified chemicals	14	7.7
Self-poisoning by antiepileptic drugs	5	2.7
Self-poisoning by others	26	13.6

Discussion & Conclusion

Discussion

The incidence of suicide is higher compared to other African studies- 5.2 per 100,000 in South Africa alone and 7.4 suicidal people per 100,000 in Zambia. Could be due to lack of psychosocial therapists and interventions in Malawi than in these countries.

Study limitation:

1. Incidence may be low due to non-inclusion of under age in the total population used to calculate this prevalence.
2. Causal inference difficult to establish in such a cross-sectional study.

Recommendations

These study findings confirm the importance for care providers to:

- Educate communities about suicide as a mental health problem and services seeking behaviors
- Research & design culturally appropriate & specific psychosocial interventions for managing suicide
- Do community education to promote inclusiveness of people who attempt suicides, & correct myths associated with suicide.
- Intensify individual & group counseling services for people with suicide thoughts.
- Enhance psychosocial and pastoral accompaniment of people with suicide thoughts.

REFERENCES

1. Krug EG, Mercy JA, Dahlberg LL, Zwi AB. The world report on violence and health. The lancet. 2002;360(9339):1083-8.
2. WHO. Public health action for the prevention of suicide: a framework. 2012.
3. Weissman MM, Bland RC, Canino GJ, Greenwald S, Hwu H-G, Joyce PR, et al. Prevalence of suicide ideation and suicide attempts in nine countries. Psychological medicine. 1999;29(1):9-17.
4. Fortuna LR, Perez DJ, Canino G, Sribney W, Alegria M. Prevalence and correlates of lifetime suicidal ideation and attempts among Latino subgroups in the United States. The Journal of clinical psychiatry. 2007;68(4):572.
5. Evans E, Hawton K, Rodham K, Deeks J. The prevalence of suicidal phenomena in adolescents: a systematic review of population-based studies. Suicide and Life-Threatening Behavior. 2005;35(3):239-50.
6. Vaughan M. Suicide in late colonial Africa: The evidence of inquests from Nyasaland. The American historical review. 2010;115(2):385-404.
7. Meel B. Epidemiology of suicide by hanging in Transkei, South Africa. The American journal of forensic medicine and pathology. 2006;27(1):75-8.
8. Borges G, Nock MK, Abad JMH, Hwang I, Sampson NA, Alonso J, et al. Twelve month prevalence of and risk factors for suicide attempts in the WHO World Mental Health Surveys. The Journal of clinical psychiatry. 2010;71(12):1617.
9. Kessler RC, Borges G, Walters EE. Prevalence of and risk factors for lifetime suicide attempts in the National Comorbidity Survey. Archives of general psychiatry. 1999;56(7):617-26.

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