Mental Health Status during COVID-19 Pandemic and its Relationship with Economic Hardship and Financial Threat among Rural Population in Sarawak, Malaysia

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ABSTRACT

Background

During the COVID-19 pandemic, job and income loss, social isolation may aggravate mental health, particularly among the most vulnerable groups.

Objective

To assess the current mental health situation among the rural population in Samarahan district and determine the relationship between economic hardships, financial threats, and mental health status.

Method

This study was a cross-sectional study conducted among the 530 households in the Samarahan district. A multistage cluster sampling technique was used to select the participants in this study. Data were collected by face-to-face interview using a structured questionnaire. The mental health status was assessed by using a validated and translated DASS-21 scale. Data analysis was done by SPSS version 27.0. A p-value of ≤ .05 was considered statistically significant.

Result

Analysis showed that two-thirds of the respondents (66.6%) had no mental health problem. Meanwhile, 22.4% had anxiety, 1% had depression, and 0.19% had stress. Anxiety and depression accounted for 5.8% and stress and anxiety 1.3%. However, 2.64% had stress, anxiety, and depression. In bivariate analysis, age, monthly income, type of job, economic hardship, and expenditure difference appeared to be significant predictors of mental health problems (p < .05).

Conclusion

Depression, anxiety, and stress pose a significant threat to the rural population's health. Therefore, public health practitioners and policymakers need to address this to minimise the pandemic's impact on mental health and provide psychological support, particularly among the most affected group.

KEY WORDS

Economic hardship, Financial threat, Mental health, Sarawak

INTRODUCTION

In March 2020, World Health Organization (WHO) declared the outbreak of 2019-nCov as a pandemic.[1] The newly identified coronavirus originated from Wuhan, China, in late December 2019 and is now known as Coronavirus disease 2019 (COVID-19).[2] Likewise, Malaysia is the 5th Asian country that have recorded the highest cases.[3] Following the rise of COVID-19 cases in Malaysia, national restriction movement control order was implemented on 18 March.[4] The global public health crisis during COVID-19 may trigger feelings of fear and uncertainty and result in adverse mental health outcomes.[5] A study in the UK showed that mental health prevalence had increased following the emergence of COVID-19.[6] Among the most affected people who experience mental health problems are those living in the rural areas.[7] The reduced sources of income, termination from work, and debts have created economic hardship and financial threats.[8] Multiple studies proved that the increase in financial threat and economic hardship is associated with poor mental health outcomes.[9-11] Despite many problems that may arise due to COVID-19, the intensive study has been conducted particularly among the vulnerable population in rural areas. Therefore, this study aims to determine the relationship between sociodemographic factors, economic hardship, and the financial threat to mental health among the rural population in Samarahan, Sarawak, during the COVID-19 pandemic. It is assumed that the prolonged pandemic impact might cause a more significant effect on the economy and mental health of the rural population.

METHODS

This cross-sectional study was conducted among the 530 households within the Samarahan district from February until May 2021. All the permanent residents in the Samarahan district aged 18 years and above, irrespective of gender and ethnicity, were included in the study population. However, only consented participants and either one of the main family breadwinners was chosen from each household. A single proportion with a finite population correction formula was considered to estimate the mental health status. All households in the Samarahan district were considered as the target population in this research. To attain the precise estimate of mental health, a percentage of 35.8% was considered as the base prevalence of Sarawak's mental health status for sample size calculation.[12] The required sample size would be 353, multiplied by the design effect (here considered as 1.5), which amounted to 530. A multistage cluster sampling technique was used to select the participants in this study. Using systematic random sampling method, a total of 18 villages in Samarahan district and the participants in each village were selected. Data were collected by face-to-face interview in Malay language using a structured questionnaire. The questionnaire was translated from English, the original version, to Malay. The questionnaire consists of four parts, and each respondent completed part one to part four.

Sociodemographic characteristics: This part consists of 10 questions. The information collected from this section includes age, gender, race, religion, education level, family size, income, employment status, type of job, and whether he or she is the sole breadwinner for the household.

Economic Hardship Questionnaire: Economic hardship can be due to income loss, loss of a job, or cumulative debts calculated 10. The questionnaire consists of 12 questions based on a four-point scale ranging from 1= never to 4= very often to determine the respondent's limitation degree on their lifestyle due to their economic hardship for the past six months. The last two questions asked on their economic hardship level in the current and past six months. The higher score reflects economic deterioration.

Household expenditure: The household expenditures were assessed based on the 18 items expenditure during and before the Movement Control Order (MCO). In this study, the item for household expenditure is calculated during and before the MCO. The items are categorised into two components; 1= with hardship, 2= no hardship. If the expenditure decrease, there is a hardship. If it remains the same or increases, there is no hardship.

Financial Threat Scale: The financial threat is the feeling of fear, uncertainty, stability, adequacy, and security of own financial resources that can be mediated by economic hardship due to income loss, loss of job, or depts 10. The financial threat was assessed based on five questions with a 4-point scale covering the uncertainty, risk, perceived threat, worry, and cognitive preoccupation with one's current personal finances. A four-point Likert scale ranging from 'never' to 'very often' determined the degree of financial threat. For interpretation, the score was converted into a percentage. Then it was classified into quartiles with the 25th percentile in each group.

Depression, Anxiety, Stress Scale: The depression, anxiety, and stress were assessed separately based on the DASS-21 scale. It consists of 21 items with three self-reported scales to measure the depression, anxiety, and stress range from 0 scores 'does not apply to me' and 'applied to me very much time' scored 3.[13] The 21 items cover three symptoms groups. The sum of the items was calculated based on the respondent's answer. Then, the symptom severity was calculated and further categorised into normal, mild, moderate, severe, and extremely severe.

Data received from the respondents were keyed into Microsoft Excel with a validation check. The data were then imported to an SPSS worksheet. An exploratory data analysis was done to determine any inconsistency or missing data. Upon validation, a descriptive analysis was conducted and presented in frequency tables. Pearson's chi-square test of