

Project Summary Brief:

Adaptation of community members and health workers to COVID-19 in Schistosomiasis endemic communities in the greater Accra region of Ghana

Background

The COVID-19 pandemic has revealed shortfalls in the health service delivery and health research of countries including Ghana. Currently, almost 250 million cases of the disease have been confirmed worldwide, with about 5 million deaths recorded in 223 countries. In Ghana, more than 130,000 cases have been confirmed, with over 1,182 deaths (GHS,2021). In response to the pandemic, health facilities adopted preventive protocols to help reduce the spread of the disease among patients and staff. Implementation of social distancing, hand washing, wearing of face mask and provision of hand sanitizers some of the measures instituted to reduce the risk of infection.

Response and intervention programs for public health programs such as Neglected Tropical Disease (NTDs) programs in various endemic regions have been affected by the global impact of COVID-19. With the diversion of attention and resources to COVID-19, experts have warned that the prevalence of NTDs may increase in regions which previously had very low cases prior to the pandemic. However, it should be noted that COVID-19 has also presented some opportunities to strengthen NTD control.



Fig 1: Health promotion officer providing health education on ANC days

The water sanitation and hygiene (WASH) practices which directly aids NTD control and prevention has been globally adopted as an effective COVID-19 preventive measure (Motto,2020). Notwithstanding, it has become evident that cost of carrying out NTDs programs in the COVID-19 era will increase considerably. Here, we explore COVID-19 related adaptation measures by both community and health workers in some schistosomiasis endemic communities in Ghana.

Aim: To assess adaptation of health workers and community members within the Greater Accra Region of Ghana to COVID-19 and associated impacts on schistosomiasis preventive behavior health education.



Fig 2: Field Officer administering electronic questionnaire to respondent

Methods

A semi-structured questionnaire adopting a mixed methods approach of quantitative and qualitative variables was administered to elicit responses from patients on their knowledge level of COVID-19 and Schistosomiasis, impact of COVID-19 on livelihoods and schistosomiasis preventive behaviour. Health staff were interviewed with a similar questionnaire to gather information on changes to schistosomiasis health education and changes in routine of health staff as a result of COVID-19.

The interviews were useful in assessing adaption to COVID-19 by both health staff and community members and observations will be used to assess physical manifestation of adaption. 60 Health staff and 340 community members were sampled for this. The questionnaires were coded for use tablets to expedite data collection and reduce the risk of spreading COVID-19. COVID-19 preventive protocols were observed.

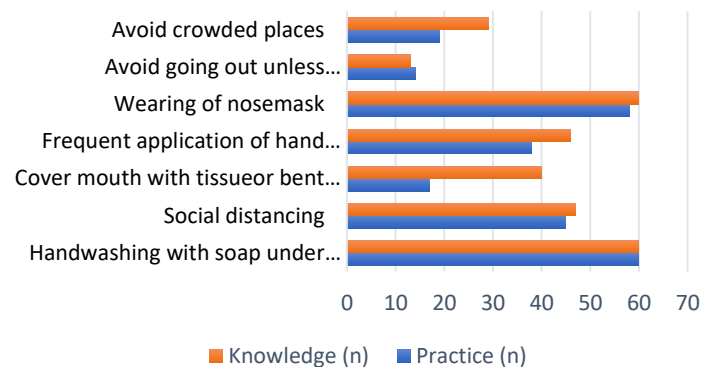
Results and Findings

The majority of health workers observed that schistosomiasis health education had decreased with the advent of COVID-19 and related restrictions and guidelines. All communication strategies had been modified which resulted in reduced frequency, content and time allocated for health education. Less than half of the health workers were involved in schistosomiasis related activities at the health facilities. Among these, knowledge of schistosomiasis symptoms and prevention was high. The level of education had a significant relationship with knowledge of schistosomiasis symptoms among respondents (KWH-test statistic=14.581, (4), p=0.006)). There was a statistically significant association between knowledge and practice of COVID-19 preventive measures ($\chi^2(49) = 290.534$, $p > 0.000$). The highest educational level also presented a significant relationship with knowledge of COVID-19 preventive measures ($\chi^2(4) = 10.206$, $p = 0.037$).

"COVID-19 has had a negative impact on MDA and community health education on schistosomiasis preventive behaviors because all attention has gone to COVID-19 at the detriment of other diseases" (midwife, Female).

"We hear a lot about schistosomiasis from nurses and researchers who come around from time to time. For some time, they have not been here. I think its because of COVID-19" (Community member, Female)

Comparison of Adopted COVID-19 Preventive Behavior and Knowledge of COVID-19 Preventive Behavior among health workers



With regard to community members, knowledge on schistosomiasis was high. Community members minimized contact with water body as a schistosomiasis preventive measure. They had also avoided defecating and urinating in the waterbody as secondary precautions. Community members' knowledge on COVID-19 prevention and symptoms was high with frequent hand washing and wearing facemask as the most preferred preventive COVID-19 measure. Analyses of open ended questions revealed that COVID-19 had not affected preferred schistosomiasis preventive measure. It was also observed that community members in schistosomiasis endemic community scored higher marks for COVID-19 prevention and symptoms than those who were from non-endemic communities. Lastly, community members lamented the halt of outreach services to endemic communities. They added that these visits helped to promote health education in the communities.

Impacts

- ✓ The study recommends the integration of schistosomiasis health education, diagnosis and treatment into routine health activities. This integration will ensure that operational aspects of schistosomiasis control does not halt or reduce in the advent of a public health crises like COVID-19.
- ✓ The study recommends the simplification of schistosomiasis training for all health staff to ensure easy understanding and promotion by all health workers.
- ✓ The study recommends refresher training of all health workers in schistosomiasis endemic areas on basic knowledge of schistosomiasis; its prevention and symptoms.
- ✓ The study highlights interest of community members on COVID-19 that can be leveraged to promote prevention of other endemic diseases such as schistosomiasis.
- ✓ The study highlights the increased adoption of COVID-19 preventive measures by community members even though this did not affect their schistosomiasis preventive efforts.