Problems in using WhatsApp groups for survey research

Sir,

Links to online surveys and requests to participate in them are now a common sight in WhatsApp groups. Although earlier such messages used to be apparently for small-scale studies intended for conference presentations, off late, the requests often say that the research is part of some thesis or dissertation. Following the recent outbreak of COVID-19, numerous organizations and researchers have chosen the WhatsApp route to conduct surveys exploring its psychosocial impact. However, such use of WhatsApp groups as a data collection avenue for survey research is fraught with the following problems:

1. Surveys help us infer the rates in the population from the responses provided by the sample. For the findings to be generalizable, the sample has to be selected from a clearly defined population through random sampling. However, when you are forwarding the link to as many groups as possible and requesting the members to forward the same to as many other groups as possible, your population will not be clearly defined. Consequently, one cannot know the population to which the survey results would be applicable.

2. Such samples will be convenience ones, with their inherent problems. For example, they would not be suitable for testing hypotheses using inferential statistics. They can, at best, be used for descriptive purposes and generating hypotheses.

3. The response rate – the number of people who responded to the survey questions, divided by the total number of people approached to participate – is a crucial measure in survey research. A low response rate would suggest that the sample is not representative of the population. However, in these WhatsApp surveys, one can never know the response rate.

4. Information about the nonresponders is essential because if it is demonstrated that their sociodemographic profile matches that of the responders, then we can conclude that the responders are indeed representative of the population. This, too, is not possible in WhatsApp surveys, and hence, there is no way to assess the magnitude of selection bias. A large sample does not solve this issue.

5. It is unethical to study a sample larger than what is suggested by appropriate sample size calculations. However, as the links get forwarded from groups to groups, an unnecessarily large number of people may participate in the survey, with no gains from the time and effort they sacrifice.

6. Considering the privacy issues with open-source software, collecting sensitive data may not be ethical, even after taking consent, as most participants will not be aware of the implications – i.e., it is no longer an informed consent.

One solution would be to randomly select the sample from a list (e.g., membership directory of an organization or a list of the entire staff of a hospital), ring them up to request consent, collect basic sociodemographic information from those who refuse, and then send the link to only those who consented, with a request to not forward it further. Forwarding of the link to inappropriate groups or persons may be prevented to some extent by mentioning the inclusion and exclusion criteria in the request message.

Two other issues, not restricted to the use of WhatsApp groups, too deserve the consideration of the researchers: (i) As in any survey, sufficient attention has to be paid to the reliability and validity of the questionnaire, so as to reduce the measurement error. (ii) Using a different browser or a second SIM card, the same person may participate in a survey more than once; it may not be possible to detect this with Internet Protocol tracking.

The ethics committees that approve these surveys should include experts on data privacy. If the researchers mention, in the message accompanying the link, about such precautions in place, it may improve the response rate. Furthermore, all steps involved should be accurately described in the manuscript (e.g., what instructions were given, any reminders sent, etc.) to increase the transparency of the findings.

Financial support and sponsorship
Nil.

Conflicts of interest
There are no conflicts of interest.

Shahul Ameen, Samir Kumar Praharaj
Department of Psychiatry, St. Thomas Hospital, Changanacherry, Kerala, 1Department of Psychiatry,
Sir,

The COVID-19 outbreak since December 2019 and its subsequent transformation into a pandemic had affected persons from every age group, and children and adolescents are not immune to it. Although the mortality rate and severity of COVID-19 are relatively low in young people, all the infection control measures and preventive strategies are equally important to this special population of "teenagers" like all other age groups. Moreover, teenagers and children are considered to be hidden carriers of COVID-19 in recent Chinese studies conducted on COVID-19 close contacts. Therefore, more precautions have to be taken by this special population.

As the COVID-19 infection speeded to spread to >200 countries in <3 months of its outbreak, the World Health Organization (WHO) and the National authorities across the world had taken several multiple steps for containment of the spread of infection. Some of these strategies include the closure of schools, colleges and other educational institutions, shopping malls, promotion of hand hygiene, and social distancing. Some of the countries, including India, have adapted "lockdown" across the country to contain the spread of infection. While these measures are of the utmost necessity to tackle the spread of infection, these measures have created a sense of "panic" in the general public.

Further, several messages/videos are being circulated in the social media platforms regarding several modes of transmission of COVID-19 infection. Further, the news agencies/newspapers/some real-time COVID-19 tracker websites repeatedly provide real-time updates about the number of cases infected and died due to COVID-19. Teenagers and children are special groups of the population who have different "psyche." More specifically, the adolescents/teenagers tend to experience emotions more intensely. Having teenagers confined to their homes with 24/7 parental attention/supervision can create a great degree of irritation as they are not used to such situations. Moreover, teenagers find it quite difficult to practice social distancing. Children and adolescents are finding it quite difficult to make sense of what's happening in the world, and they have their inherent suggestibility to follow the rumors/myths being forwarded in social media platforms related to COVID-19 transmission/precautions measures. All these can also lead to excessive worrying, fear, and anxiety about contracting the infection and can create a sense of panic among teenagers. In this regard, various health organizations/institutes have laid down tips/advice to manage stress and anxiety in children and adolescents.

In this report, we present an 18-year-old girl who presented with severe symptoms of anxiety-related to COVID-19 infection and highlight the issues related to teenagers in COVID-19 Pandemic.

An 18-year-old-female, from the urban background with no past or family history of mental illness presented to emergency services with symptoms of anxiety for 1 week. Exploration of history revealed that after the Nationwide "lockdown" was declared since March 24, 2020, she was confined to her home, would mostly be hooked up to the news channels about COVID-19 updates throughout the day. She would be following up various news channels and videos in the social media platforms about how the lives of people have been affected in different Western countries and in China, how the infected persons were dying and family members were unable to help their infected relatives/near