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## Multidisciplinary research priorities for the COVID-19 pandemic

In their Position Paper<sup>1</sup> in *The Lancet Psychiatry*, Emily Holmes and colleagues have laid out a comprehensive outline for mental health research, with a focus on a multidisciplinary approach to guide policy and practice using a biopsychosocial approach, and have suggested research areas making use of existing research infrastructure and aligning ongoing research with COVID-19 priorities.

The authors have provided a nearly exhaustive list of issues within the psychological and social domains; however, the biological domain needs expansion. They have addressed a need to look at altered brain physiology, but not the psychotropic response in the context of infection with severe acute respiratory syndrome coronavirus 2 (SARS CoV-2).

Psychopharmacology is particularly important in acutely distressed patients,<sup>2</sup> especially when staffpatient interactions are restricted by protective equipment and physical distancing. As Holmes and colleagues point out, evidence on the safety and efficacy of psychotropic drugs is likely to become available and be published in an uncoordinated way.

Much of the prescribing guidance has been based on knowledge published before the COVID-19 pandemic.<sup>3</sup> Holmes and colleagues have looked at redeployment of medications, but this will not suffice. The safety of psychotropic drugs in patients is a major area of consultation liaison psychiatry. Laporte and Healy<sup>4</sup> have highlighted that treatment of patients infected with SARS CoV-2 should avoid medicines that can increase the risk of pneumonia by depressing levels of consciousness, respiration, immunity, and other protective mechanisms, which includes antipsychotics, opioid

analgesics, and additive effects of polypharmacy.

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One way of tackling this potential problem would be to keep an electronic linked database of safety and efficacy of psychotropic drugs in various national and international centres, funded by private and public health agencies, in line with research on COVID-19 therapeutics in other specialties. At the hospital level, data can be retrieved through electronic health records. Song and colleagues<sup>5</sup> have also described the role of hospital pharmacists in monitoring prescribed drugs in patients with SARS-CoV-2 infection. Previously unrecognised side-effects can be accounted for in retrospective case studies. The emerging data can then be used to test evidence in multicentre, blinded, pragmatic controlled trials, comparing it with pre-COVID-19 evidence on safety and efficacy, thereby increasing the sample size and gathering evidence in a relatively short timeframe.

The COVID-19 pandemic will last a long time. A concerted effort is needed to guide policy on the emerging effects of COVID-19 on the safety and efficacy of psychotropic drugs.

I declare no competing interests.

## Shireen Najam shireen.najam@aku.edu

Department of Psychiatry, Aga Khan University Medical College, Karachi 74800, Pakistan

- Holmes EA, O'Connor RC, Perry VH, et al. Multidisciplinary research priorities for the COVID-19 pandemic: a call for action for mental health science. *Lancet Psychiatry* 2020; 7: 547–60.
- 2 British Geriatrics Society EDA, Old Age Psychiatry Faculty (Royal College of Psychiatrists). Coronavirus: managing delirium in confirmed and suspected cases. March 19, 2020. https://www.bgs.org.uk/ resources/coronavirus-managing-delirium-inconfirmed-and-suspected-cases (accessed April 19, 2020).
- 3 Zhang K, Zhou X, Liu H, Hashimoto K. Treatment concerns for psychiatric symptoms in COVID-19-infected patients with or without psychiatric disorders. Br J Psychiatry 2020; published online April 9. DOI:10.1192/ bip.2020.84.
- Laporte J-R, Healy D. Medications compromising Covid infections. April 2, 2020. https://xisk.org/medications-compromisingcovid-infections (accessed April 27, 2020).

Song Z, Hu Y, Zheng S, Yang L, Zhao R. Hospital pharmacists' pharmaceutical care for hospitalized patients with COVID-19: recommendations and guidance from clinical experience. *Res Social Adm Pharm* 2020; published online April 3. DOI:10.1016/ j.sapharm.2020.03.027.