Since January 2020 Elsevier has created a COVID-19 resource centre with free information in English and Mandarin on the novel coronavirus COVID-19. The COVID-19 resource centre is hosted on Elsevier Connect, the company's public news and information website.

Authors' reply

Since the publication of our Viewpoint,[1] results of studies in the USA have continued to indicate high effectiveness of vaccination against severe disease.[2] Recent data also indicate that booster vaccination can protect against COVID-19, and several countries have developed policies in favour of booster dosing. WHO's Strategic Advisory Group of Experts on Immunization has since updated its roadmap for COVID-19 vaccines prioritisation, emphasising the greater benefit of primary vaccination over boosting, and the relative importance of targeting boosters towards high priority groups.[3]

With regard to the suggestion by Douglas Nixon and colleagues, we know of no data supporting further vaccination of fully vaccinated individuals who subsequently get symptomatic COVID-19. It seems probable that the infection (presumably with a currently circulating variant) would itself boost immunity to a level where additional vaccination would be unlikely to confer substantial additional benefit. Indeed, recent data show that the combination of previous vaccination plus infection provides strong protection against future infection with the delta (B.1.617.2) variant.[4] Thus, except in immunocompromised individuals who would be less likely to mount protective immune responses to their original vaccination plus COVID-19 infection, we would not recommend an additional vaccination. Depending on their level of immunocompromise, these individuals also might be less likely to respond to an additional antigen exposure.

Recommendations for boosting individuals when it is not necessary interferes with control of the pandemic and accentuates inequity in distribution of vaccines. Until circulation of the SARS-CoV-2 virus can be blunted everywhere, the risk that dangerous variants evolve is increased. We continue to call for emphasis on following the science and doing whatever is possible to make vaccines available around the world.

We declare no competing interests.

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1 Krause PR, Fleming TR, Peto R, et al. Considerations in boosting COVID-19 vaccine immune responses. *Lancet* 2021; **398:** 1377–80.
2 Krause PR, Gruber MF, Offit PA. We don't need universal booster shots. We need to reach the unvaccinated. Nov 29, 2021. https://www.washingtonpost.com/outlook/2021/11/29/booster-shots-universal-opinion/ (accessed Jan 25, 2022).
3 WHO. WHO SAGE Roadmap for prioritizing use of COVID-19 vaccines. Jan 21, 2022. https://www.who.int/publications/i/item/who-sage-roadmap-for-prioritizing-uses-of-covid-19-vaccines (accessed Jan 25, 2022).
4 León TM, Dorabawila V, Nelson L, et al. COVID-19 cases and hospitalizations by COVID-19 vaccination status and previous COVID-19 diagnosis—California and New York, May–November 2021. *MMWR Morb Mortal Wkly Rep* 2022; **71:** 125–131

WHO's surveillance system for attacks on health care is failing Ethiopia

An increased disregard for international law in armed conflicts and humanitarian crises endangers health-care facilities and the health workers prompted global institutions to develop systematic monitoring mechanisms. In response, the World Health Assembly adopted WHA65.20,[1] a resolution calling on WHO's director-general to "Provide leadership at the global level in developing methods for systematic collection and dissemination of data on attacks on health facilities, health workers, health transports, and patients in complex humanitarian emergencies, in coordination with other relevant UN bodies, other relevant actors, and intergovernmental and non-governmental organizations."[1]

Following the WHA65.20 resolution in 2015, WHO established the Attacks on Health Care initiative as a priority of WHO's Health Emergencies Programme. Provision of essential, life-saving health services to emergency-affected populations unhindered by any form of violence or obstruction is the vision of the initiative. The Surveillance System for Attacks on Health Care (SSA) is one of the primary outputs of this initiative. Advocacy against attacks on health care, and providing evidence on the effectiveness of practices to minimise attacks and mitigate the consequences of attacks are the two initiatives of the surveillance system. The SSA is supposed to systematically collect data on attacks on health care, and produce and release the report online immediately after the event. This surveillance system would facilitate accountability through global health governance, improve the visibility of the SSA within WHO and throughout the UN, analyse data to support engagement with perpetrators, and strengthen the SSA as an effective mechanism to safeguard health and human rights. However, the incompetence of WHO in fulfilling its mandate on the issue potentially undermines efforts to engage with those who attack health-care facilities, and weakens efforts to prevent future attacks.[2]


J. Countess/Getty Images

A war has been going on in northern Ethiopia since the Tigray People Liberation Front attacked the Ethiopian federal army bases in the Tigray region on Nov 4, 2021. The war led to the damage and looting of more than 40 hospitals, 453 health centres, 1850 health posts, four blood banks, one oxygen bank, and the displacement of more than 10 000 health workers in Amhara regional state, serving over 30 million people.[3,4] In Afar regional state, one hospital, 17 health centres, and 42 health posts were attacked—