



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.

Elsevier hereby grants permission to make all its COVID-19-related research that is available on the COVID-19 resource centre - including this research content - immediately available in PubMed Central and other publicly funded repositories, such as the WHO COVID database with rights for unrestricted research re-use and analyses in any form or by any means with acknowledgement of the original source. These permissions are granted for free by Elsevier for as long as the COVID-19 resource centre remains active.

This Month in *JAAD International*: August 2022: Cutaneous reactions to COVID-19 messenger RNA booster dose vaccination



Jonathan Kantor, MD, MSCE^{a,b}

This month in *JAAD International*, Prasad et al¹ describe the range of cutaneous reactions to the third dose of messenger RNA SARS-CoV-2 vaccine using the American Academy of Dermatology or International League of Dermatologic Societies registry. The authors present their data as a follow-up to earlier registry-based results that highlighted a range of cutaneous reactions, none of which were considered life threatening. In this manuscript, the authors specifically address cutaneous reactions to third (booster) dose vaccination, noting that only 49 out of 1000 records in their dataset reflected information on booster dose vaccination. Of these 49, 73% had reactions to the booster dose, and 72% of those with reactions to the booster dose reacted only to the booster dose, after having no reaction to the first 2 doses of the vaccine.

Far more is unknown than known about the cutaneous reactions to SARS-CoV-2 vaccines, and although registry-based studies have many shortcomings, they may provide insights for future work. These data suggest 3 useful takeaway points for our patients and colleagues. First, although cutaneous reactions occur, they are rarely serious.² Second, cutaneous reactions are not a contraindication to future vaccination.³ Third, most patients in whom a

reaction to the booster dose developed reacted to the booster dose alone, suggesting that a history of no cutaneous reactions to vaccination is not a guarantee of no reactions in the future. More research is needed in this important area, particularly given the varied presentation of cutaneous reactions^{4,5} and the theoretical potential for such visually dramatic reactions to contribute to vaccine hesitancy.

Conflicts of interest

None disclosed.

REFERENCES

1. Prasad S, McMahon DE, Tyagi A, et al. Cutaneous reactions following booster dose administration of COVID-19 mRNA vaccine: a first look from the American Academy of Dermatology/International League of Dermatologic Societies registry. *JAAD Int.* 2022;8:49-51.
2. Tan SW, Tam YC, Pang SM. Cutaneous reactions to COVID-19 vaccines: a review. *JAAD Int.* 2022;7:178-186.
3. Blumenthal KG, Ahola C, Anvari S, Samarakoon U, Freeman EE. Delayed large local reactions to Moderna COVID-19 vaccine: a follow-up report after booster vaccination. *JAAD Int.* 2022;8:3-6.
4. Buckley JE, Landis LN, Rapini RP. Pityriasis rosea like rash after messenger RNA COVID-19 vaccination: A case report and review of the literature. *JAAD Int.* 2022;7:164-168.
5. Wu X, Lim JH, Lee JS, Chio MT. Recurrent erythema nodosum after the second dose of the Pfizer-BioNTech BNT162b2 COVID-19 messenger RNA vaccine. *JAAD Int.* 2022;6:107-108.

From the Department of Dermatology, Center for Global Health, and Center for Clinical Epidemiology and Biostatistics, Perelman School of Medicine at the University of Pennsylvania, Philadelphia, Pennsylvania^a; and Florida Center for Dermatology, St Augustine, Florida.^b

Funding sources: None.

IRB approval status: Not applicable.

Reprints not available from the author.

Correspondence to: Jonathan Kantor, MD, MSCE, Department of Dermatology, University of Pennsylvania School of Medicine, 1301 Plantation Island Dr S, St Augustine, FL 32080. E-mail: jonkantor@gmail.com.

J Am Acad Dermatol 2022;87:295.

0190-9622/\$36.00

© 2022 by the American Academy of Dermatology, Inc.

<https://doi.org/10.1016/j.jaad.2022.06.036>