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immunosuppression. Nevertheless, as with other vaccinations, the benefit of immune protection, most probably, outweighs the risk of relapse.

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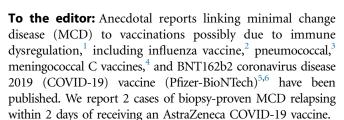
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Kidney International (2021) **100,** 458–459; https://doi.org/10.1016/

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Relapse of minimal change disease following the AstraZeneca COVID-19 vaccine



A 30-year-old man had received 1 g of rituximab in August 2020, having experienced annual relapses on tacrolimus. His prednisolone had been weaned to 1 mg/day by January and discontinued altogether by February 2021. Two days after his COVID-19 vaccine, he developed a headache and frothy urine. Urine protein-to-creatinine ratio 1 week later was 213 mg/mmol; albumin was preserved at 47 g/l; creatinine was stable at 82 μmol/l. At that time, lymphocyte subsets showed complete B-cell depletion; CD19 was 0.00. He did not seek medical attention until 2 months after receiving the vaccine when his urine protein-to-creatinine ratio was 142 mg/mmol. Repeat lymphocyte subsets then revealed B-cell return; CD19 was 0.06. Complete remission was achieved with 10 days of starting prednisolone 20 mg daily.

A 40-year-old woman was maintained on prednisolone 5 mg daily and tacrolimus (Adoport); trough level was 4.6 μ g/l before vaccination. One day after receiving her first COVID-19 vaccine, she developed a headache, frothy urine, and ankle swelling. After 1 week, her general practitioner recorded 3+dipstick proteinuria. Unfortunately, no laboratory samples were sent. Prednisolone was increased to 30 mg daily, and

complete remission was achieved within 2 weeks. Creatinine was unchanged at $105 \mu mol/l$.

The association with various vaccines has been described, occurring between 4 days to several weeks later. ^{1,5,6,7} The timing of COVID-19 vaccination and the very early development of relapse of MCD in our cases raises questions as to the mechanisms involved. At 2 days after vaccination, one would assume the vaccine triggered a more generalized cytokine-mediated response. ⁷ Others have postulated that symptoms after 4 days represent a rapid T cell–mediated response to viral mRNA. ^{2,5,6}

We administered the second dose of a different COVID vaccine, and neither patient suffered an adverse effect. However, both patients were taking 15 mg prednisolone daily at the time. This may prove a useful strategy in similar cases.

We await further reports to evaluate the true incidence.

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Kidney International (2021) **100,** 459; https://doi.org/10.1016/j.kint.2021.06.005 Copyright © 2021, International Society of Nephrology. Published by Elsevier Inc. All rights reserved.

Post-vaccinal minimal change disease



To the editor: Previous reports have described the onset of minimal change disease after the administration of certain vaccines.¹

Recently a 61-year-old woman was admitted to our hospital 8 days after her first coronavirus disease 2019 (COVID-19) vaccination (BioNTech/Pfizer SARS-CoV-2 COMIRNATY) because of edema and weight gain (6 kg). Medical