



10 days after the onset of systemic symptoms, however, 14.7% of patients had skin lesions as their first symptom. Interestingly, our patient's cutaneous findings were the only manifestation of this viral illness. He had no history of allergy or any similar hands or feet manifestations in the past, and his RT-PCR became negative concomitantly with the resolution of the dermatological manifestations. All in all, these findings are in favor of a viral-induced skin eruption associated with COVID-19. While recognition of COVID-19 in asymptomatic or minimally symptomatic patients is challenging, it is mandatory to public health.^{3,5} Therefore, dermatologists should be conscious of their role during this pandemic as skin findings can be the first and sometimes only manifestation of COVID-19.

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Thrombosis of the palmar digital vein after Oxford-AstraZeneca COVID-19 vaccination

Dear Editor,

In the era of COVID-19, the distribution and administration of approved vaccines is a fundamental step to control the pandemic. Although studies of the vaccination show safety and effectiveness, concerns over possible side effects affect people's willingness to accept the immunization and the extent of coverage. Oxford-AstraZeneca vaccine, a chimpanzee adenoviral vector (ChAdOx1) encoding the SARS-CoV-2 spike protein DNA, is available worldwide but notable for the rare associated thrombotic events.¹ Clarifying the plausible relationships among the adverse reaction helps to understand more about the vaccine. Herein, we encountered a 38-year-old woman who had sudden-onset intermittent swelling pain over her right index finger 8 days after receiving her first dose of ChAdOx1 nCov-19 (Oxford-AstraZeneca) vaccine on the other arm. The symptom aggravated when the hand stayed in a dependent position. Mild headache and retro-orbital pain were reported simultaneously. She denied fever, shortness of breath, chest or abdominal pain, or visual disturbance. Physical examination revealed swelling of the right index finger with a cord-like bluish engorged vessel over the palmar side (Fig. 1). Laboratory data for



Figure 1 Cord-like bluish change of the palmar digital vein over the right index finger, which was more swelling compared with the left side, 8 days after ChAdOx1 nCov-19 vaccination

complete blood count, activated partial thromboplastin time, prothrombin time, D-dimer, and fibrinogen demonstrated no abnormalities. Tracing back her history, she had an episode of joint stiffness years ago, and blood test showed normal platelet count, ANA, lupus anticoagulant, and anticardiolipin, but a trace amount of anti-RNP was noted. She was diagnosed with superficial venous thrombosis of the palmar digital vein. Low dose anticoagulation with Rivaroxaban 25 mg followed by 15 mg per day was started due to concerns for vaccine-induced immune thrombotic thrombocytopenia (VITT) and potential concurrent thrombosis in other organs. The condition improved dramatically soon after treatment (Fig. 2).

There are various reasons to explain a prothrombotic state post vaccination. VITT has been reported after the ChAdOx1 nCov-19 vaccine²; however, our patient did not fulfill the definition due to the lack of thrombocytopenia. Other reasons include hypercoagulability due to subclinical autoimmunity and vessel damage secondary to abnormal immunological activation with vaccine antigens. A similar process is also seen with the influenza vaccine and COVID-19 infection.^{3,4} Our patient had a rapid response with Rivaroxaban, which was faster than the gradual improvement one might



Figure 2 Rapid improvement of swelling pain and less engorged vessel soon after Rivaroxaban was given

expect with conservative therapy such as with massage and compression.^{2,3}

Among the constitutional symptoms which commonly appear after ChAdOx1 nCov-19 vaccination, alertness of the thrombosis and awareness of its severity are crucial. The delayed onset around 4 to 20 days in our patient could be a hint. The more decisive findings were the bluish cord-like engorgement of the vessel, being more prominent when the hand stayed in a dependent position and less pronounced after prolonged raising, which was typically reported in cases with thrombosis of the palmar digital vein.² The diagnosis was straightforward based on clinical symptoms, although there was a lack of histological or radiological confirmation. Although temporally related to the vaccine, the causality cannot be established. Nevertheless, a similar presentation of digital vein thrombosis in a patient with COVID-19 recently might imply the possible hypercoagulable state related to viral antigen.³ Ramesur et al. presented a case of cutaneous thrombosis associated with blister and subsequent skin necrosis after Oxford-AstraZeneca vaccination.⁵ The entirely different clinical manifestation in our patient extended the range of atypically located thromboses associated with vaccination.

In conclusion, this is the first published case of superficial vein thrombosis after ChAdOx1 nCov-19 vaccine. Identifying the thrombotic event and prompt intervention are important for both health care providers and patients.

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Written consent was obtained from the patient for the publication of images and case details in all formats. All authors had full access to all the data in the study and accept the responsibility to submit it for publication.

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An infant with COVID-19 presenting with acute urticaria and angioedema

Dear Editor,

Various skin manifestations associated with COVID-19 have been reported in recent publications. In cases earlier reported in children, it has been reported that exanthema and mucocutaneous findings which are a criterion of Kawasaki-like or multisystem inflammatory syndrome in children (MIS-C), have been detected.¹ Papular, urticarial rashes, and purpuric lesions have been associated with COVID-19 infection as uncommon symptoms.² Acute urticaria/angioedema characterized by epidermal and/or subdermal swelling lasting less than 6 weeks can often be triggered by upper respiratory infections during childhood. Until recently, urticarial rash associated with COVID-19 has been described in especially adult patients, but the number reported in children is very few. As a result of three meta-analyses published, in the pediatric population, symptoms such as runny nose and nasal congestion are observed at a rate of 7–20%, while skin rash has been reported as less than 1%.^{3–5} Here, we want to present an infant who presented with acute urticarial rash with angioedema who was diagnosed with COVID-19, which has been reported much less frequently.

A 12-month-old healthy girl presented to the outside hospital 3 days prior because of itchy skin rash (urticaria) and eye edema (angioedema) that started on the trunk and spread to the whole body (Figs. 1 and 2). She was admitted to our hospital when her skin rash continued despite oral antihistaminic treatments and intramuscular methylprednisolone treatment given at an external center for 3 days. In the physical examination of the patient who was hospitalized with the prediagnosis of acute urticaria, resistant to therapy, there was no additional positive physical examination finding, except for erythematous and edematous rashes on the skin that lasted for 3 days. In her



Figure 1 Angioedema is observed over the eyes of the patient



Figure 2 Urticarial plaque is seen over the dorsum of the patient

history, it was learned that there was a fever of 38°C for 1 day in the beginning of the rash but had disappeared with an antipyretic therapy. It was learned that there was no diarrhea, fatigue, anorexia, cough, or respiratory distress. The patient had no contact with a known COVID-19 patient. There was no previous drug or food allergy or urticaria in her medical history. There was no history of allergy or atopy in the medical history of the family. When the laboratory examinations of the patient were performed, the COVID-19 PCR result was positive, and the patient was then followed up in the COVID-19 inpatient service. D-dimer and C-reactive protein elevation was present (Table 1). Twenty-five OH vitamin D3 was found to be low. During the SARS-CoV-2 infection, we also checked a panel including respiratory tract viruses, 18 viruses from 9 virus groups (Influenza, Parainfluenza, Rhinovirus, Coronavirus, human