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Acute Urticaria in a Patient with COVID-19: Obstacle of Treatment

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1. INTRODUCTION

A 48-year-old female patient with relevant past medical history for diabetes mellitus, hypertension, hypothyroidism. There is neither any history for allergy nor a family history of hereditary allergy. She was on metformin with vildagliptin and a combination of bisoprolol and hydrochlorothiazide for a considerable length of time. In March 2021, she admitted with manifestations of dry cough, fever, with rapid onset of deterioration. After an itemized examination including chest CT and testing for Coronavirus, she was diagnosed with SARS-CoV-2 infection. Days after, her state became worsened. She was treated with Ceftriaxone injection, Gemifloxacin, Rivaroxaban, and salbutamol. She goes forward adequately, with 4 days of fever and dry cough, followed by 5 days of anosmia and ageusia from which she wholly improved. On day +13 of disease progression, afterward resolution of the previous symptoms, quickly diffusion Pinkish urticarial plaques developed in numerous positions on her body: face, trunk, abdomen, and limbs (Figure. 1). She has not received any non-steroidal anti-inflammatory drugs or ACE inhibitors. As a symptomatic treatment, only an antihistaminic drug was taken Cetirizine 10 mg tablet twice a day. The cutaneous manifestation was partially controlled within forty-eight hours. She well-ordered to keep the guidelines of home isolation concerning SARS-CoV-2. Overall, her condition is good in this respect.

The novel coronavirus, otherwise known as COVID-19, has fast developed a major health concern [1]. It has been told that along with the predictable respiratory symptoms, patients likewise show cutaneous manifestations for instance Urticaria and angioedema[2]. Pathophysiology of urticaria in SARS-CoV-2 infection is assumed to be controlled by several factors or causes especially about a condition or disease resulting from the interaction of many genes. While drug-induced urticaria may be an apparent clarification, urticaria preceded drug therapy or exhibited spontaneous diminution notwithstanding prolongation of treatment for COVID-19, signifying drugs only may not constitute numerous cases[3]. the manifestation of antigen-antibody complexes are considered to be the main chief to complement activation and

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mast cell degranulation, along with bradykinin association have been proposed as mechanisms of virus-induced urticaria or urticarial vasculitis[4]. Together acute and chronic urticaria have been revealed to be linked with emotional anxiety. Whether such emotional reasons are at play in triggering urticaria in COVID-19 remnants a subject of upcoming exploration. To conclude, we suggest oral 2nd generation antihistamines seem to be an initial practical choice concerning urticaria in patients with COVID-19 infection.



Fig. 1: Reddish pink urticarial over right thigh

2. REFERENCES

1. Zhang, J. J., Dong, X. & Cao, Y.-Y. Clinical characteristics of 140 patients infected with SARS-CoV-2 in Wuhan, China [published online February 19, 2020]. Allergy, https://doi. org/10 **1111**,.
2. Najafzadeh, M. et al. Urticaria (angioedema) and COVID-19 infection. J. Eur. Acad. Dermatology Venereol. (2020).
3. Kaushik, A., Parsad, D. & Kumaran, M. S. Urticaria in the times of COVID-19.
4. Dermatol. Ther. (2020).
5. Ye, M. et al. Treatment with convalescent plasma for COVID-19 patients in Wuhan, China. J. Med. Virol. (2020)

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