COVID-19 and Skin (A New Chapter in Dermatology)

Daniel Henry¹, David Henry¹

Usha Memorial Skin and Eye Hospital, Bilaspur, Chhattisgarh India

Abstract

Skin manifestations in COVID-19 can be associated with the infection itself, immunological, due to use of protective equipments like PPE kits or use of hand sanitizers. With the knowledge about COVID-19 and association of skin conditions, we can make early diagnosis and provide better treatment to our patients. In this paper we have described various association of Cutaneous manifestations of COVID-19.

Key words: COVID-19; Dermatology; Global pandemic

Dear editor,
As far as we have understood about skin conditions associated with COVID-19 by seeing dermatological cases in outpatient department (OPD), we have divided these conditions in three parts: i. Infections ii. Immunological iii. Mechanical

Infectious conditions associated with COVID-19 are varicella and varicella like exanthem of COVID-19. Typical features are frequent trunk involvement, scattered distribution, and mild/absent pruritus, the latter being in line with the most viral exanthems but unlike true varicella. Lesions generally appear three days after systemic symptoms and disappear by eight days, without leaving scarring.¹ Secondly, bacterial skin infections are frequently associated with COVID-19. We observed that those who had aggravated bacterial skin infection were associated with pneumonitis. Also, increase in scabies cases has been observed during the pandemic due to lockdown.²

Immunological condition are urticarial eruption in patients with COVID-19 is the presenting complaint or appear preceding other classical symptoms in several patients.³ Chilblain like lesion (COVID toes), livedo reticularis, and vasculitic lesions were not observed in our OPD patients. Maculopapular rash is also a common finding of COVID-19. Itch can be due to COVID associated infection, reaction to drugs or due to protective equipment. Telogen effluvium has also been found to be associated with COVID-19.⁴

Skin conditions in health care workers due to mechanical factors are use of PPE kits. Some other conditions are maskne, acneiform eruptions, glove allergic contact dermatitis, tinea infections, pruritus, folliculitis, seborrheic dermatitis, miliaria, erythema, papules, maceration, and scaling, facial pruritus, and dermatitis due to N95 mask.

In a study done by Recalcati in Lombardy, Italy among 88 COVID-19 positive patients, 18 (20.4%) developed cutaneous manifestations.⁵ In another study of registry of 716 cases from 31 countries, 716 cases of new-onset dermatologic symptoms in patients with confirmed/ suspected COVID-19. Of the 171 patients in the registry with laboratory-confirmed COVID-19, the most common morphologies were morbilliform
(22%), pernio-like (18%), urticarial (16%), macular erythema (13%), vesicular (11%), papulosquamous (9.9%), and retiform purpura (6.4%). Pernio-like lesions were common in patients with mild disease, whereas retiform purpura presented exclusively in ill, hospitalized patients. Skin lesions developed before the onset of respiratory symptoms or COVID-19 diagnosis in 9(12.5%) of the patients, and lesions spontaneously healed in all patients within 10 days. Majority of the studies reported no correlation between COVID-19 severity and skin lesions. COVID-19 cases with urticaria may have a better prognosis, according to Dastoli et al. Maculopapular eruptions accounted for 47% of all cutaneous manifestations in a study done by Galván Casas et al. Classic herpes zoster has been reported to complicate the course of COVID-19. Henry D et al. reported a case of erythematous inguinal rash and COVID-19. Cutaneous manifestations can give an important clue for diagnosis and prognosis of COVID-19.

References