Hypopigmented Seborrheic Dermatitis Masquerading as Vitiligo in Skin of Color

Case Presentation

A 63-year-old African-American with a past medical history of renal cell carcinoma s/p nephrectomy and currently undergoing adjuvant immunotherapy with Nivolumab who presented to dermatology for evaluation of facial hypopigmentation. The patient reported the development of "white spots" involving the nose, chin, and cheeks shortly after receiving his first dose of Nivolumab. He was applying cocoa butter intermittently with improvement in skin pigmentation, per the patient. Lesions were asymptomatic and not photosensitive. He had no past dermatologic history and denied personal or family history of autoimmune conditions.

Based on the patient's history and physical examination, the diagnosis of Nivolumab-induced vitiligo was made. No treatment was started by the evaluating physician due to patient's self-reported improvement in color with OTC topicals alone and the fact that the patient was no longer on Nivolumab (discontinued due to unrelated reasons). However when the patient returned to clinic in 3 months, his condition had significantly worsened. Upon physical examination, he now had well-circumscribed hypopigmented patches of glabella, perinasal region, and perioral/beard regions with underlying erythema. Of note, there was no scale present. He also had lesions of the scalp with a similar appearance. Wood's lamp examination was negative for true depigmentation.

The patient was then prescribed a therapeutic topical regimen including daily ketoconazole shampoo with a 10-minute resting period, clobetasol solution BID to the scalp, and ketoconazole cream plus hydrocortisone 2.5% cream BID to the face. Upon return one month later, the patient had dramatic improvement which confirmed the diagnosis of hypopigmented seborrheic dermatitis.

Summary:

Seborrheic dermatitis (SD) is a chronic, inflammatory skin condition common in skin of color populations, particularly African Americans. It affects areas with high sebum production and is often exacerbated by factors such as excessive use of hair oil, infrequent shampooing, and certain diseases like HIV, Parkinson's disease, or alcoholic pancreatitis. The pathogenesis of SD involves the proliferation of commensal yeast genus, Malassezia, the host immune response, and the composition of sebaceous gland secretions. The condition is often diagnosed based on the typical location and morphology of lesions. However, SD can present differently in skin of color, including hypopigmentation with minimal scale as was demonstrated in this case. In fact the term "petaloid seborrheic dermatitis" has been described as a distinct variant of seborrheic dermatitis affected patients with skin of color. This entity is described as arcuate, or "petaloid", coalescing lesions that expand symmetrically in a seborrheic distribution. While the differential diagnosis of SD typically includes psoriasis, atopic and contact dermatitis, and rosacea; we present a case masquerading as vitiligo. Recognition of hypopigmented, or petaloid, SD in skin of color will prevent misdiagnosis, unnecessary biopsies, and improper treatment of this common condition.

Treatment of SD in skin of color patients is nuanced, owing to differences in hair type, hair washing frequency, and tendency for hypopigmentation. Certain treatments can be too drying or irritating for

individuals, particularly African-Americans. Moreover, treatment regimens requiring less frequent hair washing are likely to be more effective in groups who do not wash their hair as often.

Additionally, the associated hypopigmentation seen in this case may lead to similar social and psychological implications, including decreased self-esteem and quality of life, as can be seen in vitiligo patients. Our case highlights the need for providers to understand the unique presentations and treatment considerations of SD in skin of color patients, and to provide culturally competent care to improve patient outcomes.