**Title:** Progressive Facial Erythema Diagnosed as Cutaneous Sarcoidosis

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## **Abstract:**

A 32-year-old male welder presented with a two-year history of non-tender, erythematous facial plagues that extended to the lateral upper neck (Figure 1 and 2). His medical history was notable for rheumatoid arthritis, managed with oral methotrexate and avascular necrosis of both hips. The patient reported recently discontinuing methotrexate in preparation for a total hip arthroplasty. Following discontinuation, he noted an enlargement of the plaques, along with the onset of a "burning" sensation. This was most apparent with welding activities. Prior to seeking medical attention, the patient had used topical hydrocortisone 2.5% cream twice daily without improvement. Laboratory tests, including a complete blood count and complete metabolic panel, were unremarkable. A 4-mm punch biopsy of the neck revealed a granulomatous dermatitis, sarcoidal subtype (Figure 3). Serum angiotensin-converting enzyme (ACE) levels were normal at 63 U/L, and a chest x-ray showed no evidence of acute airspace disease. Based on the histological findings, a diagnosis of sarcoidosis was made. Treatment options were discussed with the patient, and due to his history of avascular necrosis, he was not considered a candidate for systemic glucocorticoid therapy. Instead, he was prescribed pimecrolimus 1% cream to be applied twice daily to the affected areas. Following his surgery he resumed methotrexate and experienced improvement in both plaque size as well as erythema.

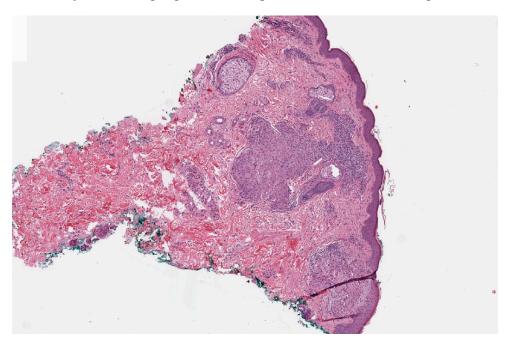
## Figures:



1. Erythematous papules coalescing into plaques on the anterior face with relative sparing of the periorbital region



2. Erythematous plaques extending to the lateral face and superior neck



3. 4-mm punch biopsy of the lateral neck

## **References:**

Studdy, P. R., & Bird, R. (1989). Serum angiotensin converting enzyme in sarcoidosis--its value in present clinical practice. Annals of clinical biochemistry, 26 (Pt. 1), 13–18. https://doi.org/10.1177/000456328902600102

Tana, C., Donatiello, I., Caputo, A., Tana, M., Naccarelli, T., Mantini, C., Ricci, F., Ticinesi, A., Meschi, T., Cipollone, F., & Giamberardino, M. A. (2021). Clinical Features, Histopathology and Differential Diagnosis of Sarcoidosis. Cells, 11(1), 59. https://doi.org/10.3390/cells1101005