Erythema nodosum treated by sulfasalazine in a pregnant patient

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Dear Editor,

Erythema nodosum is associated with many underlying conditions, one being pregnancy. The treatment of erythema nodosum can be challenging, with medications falling in the vague area between contraindicated and safe. Two common treatments for erythema nodosum, dapsone and colchicine, are considered by the Food and Drug Administration as category C in pregnancy. The sulfonamide sulfasalazine, on the other hand, is a pregnancy category B drug well known for its use as a disease modifying antirheumatic drug for rheumatoid arthritis during pregnancy. There has been no reports in the literature for its use for the treatment of erythema nodosum in pregnant patients.

A 28-year-old female with no history of autoimmune disease nor inflammatory bowel disease presented to dermatology clinic with 2 years of erythema nodosum that was biopsy proven. She was desiring pregnancy and undergoing fertility treatments for polycystic ovarian syndrome. Her erythema nodosum preceded the fertility treatments and did not show any temporal association with her hormonal treatments. Work up to exclude other causes including colonoscopy, chest x-ray, streptococcus titer, tuberculin skin test, and gonococcal/chlamydia screens were all within normal limits. Before presenting

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to our clinic, she had been maintained on oral prednisone and intramuscular triamcinolone acetonide. While this treatment had suppressed the erythema nodosum for a short time, they were leading to weight gain and increased blood glucose, potentially hindering her efforts to become pregnant. Non-steroidal anti-inflammatory drugs were not sufficient to control her pain.

At the clinic visit, the patient hand numerous tender contusiform purple subcutaneous nodules on her anterior lower legs, in various stages of development. The pain was rated as an "8 to 9 out of 10" at its worst and disabling.

Because of ongoing fertility treatments, the patient preferred medications for treatment with a good safety record in pregnancy and with the least theoretical risk. Hydroxychloroquine was initiated at 400 mg daily but had no impact after 3 months. Dapsone at 100 mg daily was initiated but not effective and stopped. Saturated solution of potassium iodide was a pregnancy category D and not attempted. Colchicine was discussed given its use in Familial Mediterranean Fever in pregnancy, but was decided against due to its mechanism of inhibiting mitosis.

Sulfasalazine, a sulfonamide disease modifying antirheumatic drug rated as a pregnancy category B and a recommended disease-modifying antirheumatic drug (DMARD) for rheumatoid arthritis during pregnancy was initiated at 500 mg twice daily with folic acid once daily.² The patient's erythema nodosum slowly started to improve to only 50% activity over 2 months, and then was nearly completely controlled on 1500 mg of sulfasalazine in a day, total. Her only adverse effect was loose stools. She was able to continue this during pregnancy.

The purpose of this letter is to demonstrate that, as an FDA category B medicine, sulfasalazine may be helpful to treating erythema nodosum as a safer alternative to category C medication in the population of patients who are hoping to become or are currently pregnant. This medication is currently generic and low cost for patients. Folic acid should be supplemented daily and a G6PD level should be checked

to rule out deficiency. Sulfasalazine is often initiated at a low dose such as 500 mg daily and titrated up over time to a maximum of 2000 mg daily. The most common side effect is diarrhea. However, druginduced hypersensitivity syndrome (DIHS/DRESS) may be associated with sulfasalazine and the patient should be warned about this.

CONFLICT OF INTEREST

The authors declare no conflict of interest.

AUTHOR CONTRIBUTIONS

Mr. Mohammed conceptualized the report, and reviewed and revised the manuscript. Dr. Rahnama-Moghadam conceptualized the report, and reviewed and revised the manuscript. All authors approved the final manuscript as submitted and agree to be accountable for all aspects of the work.

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