

Azathioprine Hypersensitivity Syndrome: A Complication to do Not Omit

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Abstract

Azathioprine is an immunosuppressor which can be used to treat inflammatory bowel disease. As any medicine; several side effects can result from it. they can be specific or not specific. Azathioprine hypersensitivity syndrome is one of rare unwanted effects of this treatment; which can be potentially grave if its diagnostic and the early and definitive stop of the azathioprine are delayed. We report the case of a patient followed for ulcerative colitis who presented this syndrome few time after starting azathioprine.

Keywords: Azathioprine; Chronic Inflammatory Bowel Diseases; Azathioprine Hypersensitivity Syndrome; Side Effect

Introduction

Azathioprine hypersensitivity syndrome is a rare clinical entity (02% of cases) which can be lethal. This syndrome has variable clinical symptoms including skin reaction [1,2], Hepatocellular or renal failure; hypotension or shock. Biological abnormalities can be seen: leukocytosis; anemia and inflammatory syndrome [2,3].

Presentation of the Case

We report the case of a 39-year-old patient treated with adalimumab (40 mg/2 weeks) for refractory distal ulcerative colitis since July 2017; in clinical remission and endoscopic healing after failure of aminosalicylates and corticosteroids. The patient was followed since 2016 for distal ulcerative colitis (UC).

For lack of means; the patient temporarily stopped adalimumab and was therefore put on azathioprine (2.5 mg/kg/day) in the end of December 2017.

Two weeks after the start of azathioprine; the patient consulted urgently for fever at 38°C and headache without respiratory or digestive signs. The patient, however, reported the notion of acute pain of both lower limbs in relation to the appearance of erythema nodosum objectified on clinical examination. Azathioprine was then stopped and the patient was hospitalized. There wasn't any infection. The rectosigmoidoscopy was without abnormalities. After a few days after stopping azathioprine; the patient again became asymptomatic. The diagnosis of azathioprine hypersensitivity syndrome was retained on the following arguments: the rapid onset of erythema with fever and headache a few days after the introduction of the drug, and the rapid regression of signs after stopping azathioprine.

Discussion

The ethiopathogeny of azathioprine hypersensitivity syndrome remains unknown but some studies have classified it as type III or IV immunoallergic reactions.

This syndrome can have three types of skin lesions: isolated aseptic pustules, superficial pustular lesions or erythema nodosum [4].

The clinical signs of this syndrome disappear after stopping Azathioprine.

The reintroduction of azathioprine or its metabolite, 6-mercapto-purine, causes the same symptoms which reappear more quickly (between four and 48 hours) and more intensely (a hypotensive shock state). Skin reaction of azathioprine hypersensitivity syndrome should be differentiated from other inflammatory dermatosis associated with Inflammatory bowel disease such as granulomatous specific lesions or so-called reactive dermatosis which include erythema nodosum and neutrophilic dermatosis [5,6] especially if they are. These lesions can be associated with fever and arthralgia [7]. Cutaneous histology is not always discriminating and the result should not be expected to stop the treatment. Only the clinical evolution at the end of the drug allows to definitively conclude between a reactive dermatosis to the digestive disease and an azathioprine hypersensitivity syndrome.

Conclusion

Azathioprine hypersensitivity syndrome has varied clinical and biological signs. Its occurrence has to stop azathioprine which will be definitely contraindicated for patients with this side effect.

Conflict of Interest

No conflicts of interest.

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