Letters in response to previously published articles

Intramatricial injections for nail psoriasis: An open-label comparative study of triamcinolone, methotrexate, and cyclosporine

Sir,

This letter pertains to the article by Mittal and Mahajan in the July–August 2018 issue of the *IJDVL*. It is with great interest and appreciation that we have read this experimental paper on "Intramatricial injections for nail psoriasis: An open-label comparative study of triamcinolone, methotrexate, and cyclosporine."[1] The concept of using a direct intramatricial delivery of antipsoriatic agents in nail psoriasis is indeed promising. However, there are some points we would like to highlight with regard to this study:

1. This study may have overlooked the fact that the formulations of antipsoriatic agents injected intramatricially in this study are not depot agents and the effect is not likely to last 24 weeks. With regards to drug kinetics, the elimination half-life of cyclosporine is 5–18 h.[2] Cyclosporine is extensively metabolized by the cytochrome P-450 3A4 (CYP3A4) enzyme system in the liver and is primarily excreted by way of the bile through feces, with only 6% of the dose (parent drug and metabolites) excreted in urine.[2] Further, the usually reported mean values for the elimination half-life and the total body clearance of methotrexate is 5–8 h.[3] Hence if the intramatricial drug worked like a depot agent and its action lasted for 24 weeks after two injections, it would be contradictory as to why we need to give systemic cyclosporine daily and methotrexate weekly to achieve desired therapeutic efficacy in psoriasis vulgaris.[2]
2. Reverse Koebner phenomenon, even though rare, was first described in a psoriasis patient. It is defined as the nonappearance or disappearance of the lesions of particular dermatoses at the site of injury.[4-6] Even though there are no reports of reverse Koebner phenomenon in nail psoriasis, we would like to clarify if the results in this study can be attributed to the same.
3. Beau's lines are transverse depressions in the nail plate that occur after a stressful event that temporarily interrupts nail formation.[7] The literature available on mechanism of action of antipsoriatic agents on nail psoriasis is relatively sparse. However, if there is an antiproliferative effect and immediate improvement as reported in this study, would the chances of finding Beau's lines as a sign of temporary arrest of growth of nails be likely?

In conclusion, even though we highly appreciate the effort taken by authors, it would be worthwhile if we could postulate the rationale of mechanism of action of these antipsoriatic agents on nail psoriasis to help us understand better.

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Conflicts of interest
There are no conflicts of interest.

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