SHORT COMMUNICATIONS

Secukinumab and Latex Allergies: Don't Trust Your EMR

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Latex allergies are frequently encountered in the clinical setting and reactions can be observed following exposure to a variety of medical supplies.[1] There have been relatively few reports of allergic reactions to injectable biologics, although the removable caps of autoinjectors and prefilled syringes often contain latex.[1,2] Herein, we report a systemic reaction in a latex-allergic psoriasis patient treated with secukinumab that highlights potential pitfalls in electronic prescription systems.

A 24-year-old man was under our care for severe (PASI 13) plaque psoriasis. He was previously treated with several topical agents with no improvement, and the decision was made to begin systemic therapy with secukinumab. Prior to starting therapy, we documented a history of latex allergy. He completed his loading dose of five injections over five weeks, with initial improvement of his psoriasis and no reported adverse effects. Approximately 48 hours after the patient's sixth injection, he developed an eczematous eruption over his face, trunk, and extremities. This was accompanied by bilateral periorbital and lower extremity edema. He denied any fevers, oral mucosal changes, wheezing, and dyspnea. The patient presented to our clinic three days following the onset of his symptoms, at which time he had mildly improved. Physical examination revealed residual periorbital edema and diffusely distributed eczematous dermatitis overlying a background of post-inflammatory changes from previously treated psoriasis. Additional investigation did not reveal any other precipitants that could account for his symptoms. Secukinumab was discontinued and the patient was started on a short oral prednisone taper and antihistamines while transitioning him to an alternative biologic agent. His rash and swelling subsequently resolved without issue.

Our patient's presentation had features consistent with a severe systemic allergic contact dermatitis and an immediate-type hypersensitivity. Although difficult to definitively identify a cause, we believe this was due to the latex from the injection pen's removable cap. The latency period observed in our case could be due to a variable amount of allergen that was leached from each cap, or sensitization to another allergen within the device or medication.[3] To date, there have only been a few reported cases of similar allergic reactions to latex in patients treated with biologic agents.[1,2]

Most importantly, while latex allergy is mentioned in secukinumab's drug monograph, our electronic medical record

failed to flag it as a potential allergen. Computerized decision support systems, which can alert physicians to potential medication-related adverse effects, have significantly improved patient safety.[4,5] However, these systems may not always incorporate potential allergens that are specific to the route of administration. This may due to the to the separation between the bioactive drug and the delivery mechanism. As new therapies and delivery systems are developed, it is imperative that electronic medical systems are updated to reflect potential reactions resulting from the delivery system itself. Furthermore, physicians cannot simply rely on decision support systems to identify potential safety issues. We must continue to stay abreast of newly developed therapies and have firm understanding of their potential adverse effects of both medications and delivery systems prior to prescribing.

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Figure 1. Periorbital edema and eczematous eruption 5 days after secukinumab injection

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