VIEWPOINT

Updated Guidelines for Atopic Dermatitis—AAAAI/ACAAI Joint Task Force

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The American Academy of Allergy, Asthma, and Immunology (AAAAI)/American College of Allergy, Asthma and Immunology (ACAAI) Joint Task Force (JTF) updated guidelines addressing new evidence and treatment options for atopic dermatitis (AD, eczema) management.[1] AD affects 13% of the pediatric population and is associated with allergic and nonallergic comorbidities and complications.

The JTF AD guideline panel included patients, caregivers, primary care physicians, AD experts (allergy-immunology, dermatology), and allied health professionals (nursing, psychology, pharmacy). The panel used the GRADE approach to produce evidence-based recommendations and fulfilled Institute of Medicine criteria for trustworthy guidelines.[1] Systematic reviews and meta-analyses informed each recommendation addressing optimal use of (1) topical treatments,[2] (2) dilute bleach baths,[3] (3) elimination diets,[4] (4) allergen immunotherapy,[5] and (5) systemic treatments including phototherapy.[6] The guidelines include patient values and preferences.[7] The JTF panel also considered the benefits and harms of each therapy, practical implications, contextual factors (accessibility, feasibility, equity, resource use), key considerations for or against specific treatment, and implementation issues. The guidelines include a focus on equity, diversity and inclusiveness, and health care disparities. The **Figure** presents a summary tailored for pediatricians (see full graphic and guideline for details).[1]

The guideline's overarching recommendation for Good Clinical Practice is, before initiating any new treatment, "ensuring the correct diagnosis and identifying complicating diagnoses, providing education (information guide, action plan), addressing trigger avoidance, ensuring proper medication use and adherence, and encouraging application of a bland moisturizer at least once, often multiple times, per day." The panel suggests against prescription moisturizers compared to similarly effective and more accessible over-the-counter bland ones.

When AD is not controlled with moisturizer alone, topical anti-inflammatories are indicated. The panel strongly recommends adding a topical corticosteroid (TCS) or topical calcineurin inhibitor (TCI). Which topical depends on the patient's previous treatment, application site, accessibility, values, and preferences. Avoid high-potency TCS for prolonged periods (>4 consecutive weeks) and limit use on face and skin folds. TCIs (pimecrolimus or tacrolimus) are recommended for patients older than 3 months. Addressing a previous warning on TCIs, new evidence shows regular use is not associated with an increase in cancer.[1] Once-daily application of mid-potency TCS or TCI is suggested over more frequent application, but patients with severe symptoms or who prefer faster resolution may prefer twice-daily dosing. A trial of low- to mid-potency TCS occlusive therapy (wet wraps) is suggested for patients with localized AD uncontrolled by mid- to high-potency topical treatment. The topical PDE4 inhibitor crisaborole is suggested for patients who wish to avoid TCS or TCI. The JTF suggests against use of the topical JAK inhibitor ruxolitinib as first-line therapy in adolescents and adults with mild to moderate AD due to potential modest benefits and uncertain, possibly small, risk of serious harms (boxed warning) in the absence of long-term RCTs. Topical antimicrobials are suggested against for patients without overt signs of skin infection. Proactive therapy with TCS or TCI applied 2 to 3 consecutive days per week is recommended for patients with a relapsing course, rather than only treating flares.

Dilute bleach baths added to topical therapy provide modest symptom improvement and minimal harms.[3] They are suggested for patients with moderate to severe AD when patients are given explicit written instructions and suggested against for mild AD.

Elimination diets, with or without allergy skin or blood testing, are suggested against for treating AD due to their minimal improvements to AD that are outweighed by increased risk of harm.[4] Prolonged avoidance of specific foods may increase the risk of developing IgE-mediated food allergy in infants and young children and risk malnutrition in all ages.

Allergen immunotherapy to dust mite and inhaled allergens improved AD severity and quality of life. It is suggested for patients with moderate to severe disease and those with other allergies (allergic rhinitis, asthma) that may improve with immunotherapy.[5]

Systemic treatment options for pediatric patients with moderate to severe AD, include biologics, small molecule immunosuppressants, phototherapy, and systemic corticosteroids. These are typically prescribed by AD specialists.

The available biologics are monoclonal antibodies targeting IL-4 and/or IL-13 signaling. They improved patient-important outcomes without an important increase in adverse events.[6] The panel recommends adding dupilumab for patients 6 months or older and tralokinumab for patients 12 years and older, refractory or unable to use mid- to high-potency topical therapy.

Oral JAK inhibitors are immunosuppressants that are suggested for patients refractory to or unable to use topical therapy and other systemic medications. The indicated patient age and regulatory approval vary. Upadacitinib and abrocitinib are approved for patients 12 years and older in the US and Canada. Baricitinib is not approved for AD in North America, but is approved in Europe for patients 2 years and older. The US Food and Drug

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Figure. Summary of Recommendations for the Treatment of Pediatric Atopic Dermatitis From the AAAAI/ACAAI Joint Task Force Guidelines

INTERVENTION Treatment or category of treatments considered	SEVERITY Severity of dermatitis that recommendation applies to	RECOMMENDATION Text summary of recommendation, strength of recommendation, and GRADE certainty of evidence Conditional (suggest), different choice appropriate per patient. Strong (recommend), most should follow action.	
Topical treatments Topical treatments network meta-analysis[2]	Mild Moderate Severe	We suggest against using **prescription moisturizers** rather than a fragrance-free over-the-counter moisturizer	Conditional against *Low certainty evidence*
	Mild Moderate Severe	We recommend adding a **topical corticosteroid** for patients aged 3 mo and older	Strong in favor *High certainty evidence*
	Mild Moderate Severe	We recommend adding a **topical calcineurin inhibitor** for patients aged 3 mo and older	Strong in favor *High certainty evidence*
	Mild Moderate	We suggest adding a **topical PDE4 inhibitor (crisaborole)** for patients aged 3 mo and older	Conditional in favor *Moderate certainty evidence*
	Mild Moderate Severe	We recommend use of **proactive therapy** to areas that flare with a topical cacineurin inhibitor or mid-potency topical steroid	Strong in favor *Moderate certainty evidence*
Bleach baths Bleach baths meta-analysis[3]	Moderate Severe	We suggest adding **dilute bleach bathing**	Conditional in favor *Low certainty evidence*
	Mild	We suggest against adding **dilute bleach bathing**	Conditional against *Low certainty evidence*
Elimination diets Diet meta-analysis[4]	Mild Moderate Severe	We suggest against the use of **elimination diets**	Conditional against *Low certainty evidence*
Allergen immunotherapy (prescribed by AD specialist) Immunotherapy meta-analysis[5]	Moderate Severe	We suggest adding **allergen immunotherapy** if refractory, intolerant, or unable to use mid-potency topical treatment	Conditional in favor *Moderate certainty evidence*
	Mild	We suggest against adding **allergen immunotherapy**	Conditional against *Moderate certainty evidence*
Systemic treatments (prescribed by AD specialist) Systemic treatments network meta-analysis[6]	Moderate Severe	We recommend adding **dupilumab** for patients aged 6 mo and older unable to use mid-potency topical treatment	Strong in favor *High certainty evidence*
	Moderate Severe	We recommend adding **tralokinumab** for patients aged 12 y and older unable to use mid-potency topical treatment	Strong in favor *High certainty evidence*

Read the full guideline for conditions to consider, practical issues, remarks, rationales, and more

Administration's boxed warning on JAK inhibitors is due to increased serious harms seen in a randomized clinical trial of adult patients with rheumatoid arthritis taking another JAK inhibitor, tofacitinib. Although those serious harms were not reported in the short studies (up to 16 weeks) of patients with AD, the risks should be discussed with each patient and monitored.

Systemic corticosteroids are suggested against due to their short-lived reduction in symptoms, frequent rebound flare upon discontinuation, and harms with recurrent or chronic use.

The guidelines emphasize shared decision-making and include informative supplemental materials that can be shared with patients and caregivers. Each "suggest" statement represents conditional recommendations. Read the full guideline for key conditions to consider regarding whether patients may or may not wish to pursue the suggestion, additional recommendations, and key information.[1] Committed to providing robust and current guidance for optimal AD care, the JTF will continue to review new evidence and periodically update the recommendations as living guidelines.

ARTICLE INFORMATION

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REFERENCES

1. Chu DK, Schneider L, Asiniwasis RN, et al. Atopic dermatitis (eczema) guidelines: 2023 American Academy of Allergy, Asthma and Immunology/American College of Allergy, Asthma and Immunology Joint Task Force on Practice Parameters GRADE- and Institute of Medicine-based recommendations. *Ann Allergy Asthma Immunol*. 2023. doi:10.1016/j.anai.2023.11.009

2. Chu DK, Chu AWL, Rayner DG, et al. Topical treatments for atopic dermatitis (eczema). *J Allergy Clin Immunol*. 2023;152(6):1493-1519. doi:10.1016/j.jaci.2023.08.030

3. Bakaa L, Pernica JM, Couban RJ, et al. Bleach baths for atopic dermatitis. *Ann Allergy Asthma Immunol*. 2022;128(6):660-668.e9.

4. Oykhman P, Dookie J, Al-Rammahy H, et al. Dietary elimination for the treatment of atopic dermatitis. *J Allergy Clin Immunol Pract*. 2022;10(10):2657-2666.e8.

5. Yepes-Nuñez JJ, Guyatt GH, Gómez-Escobar LG, et al. Allergen immunotherapy for atopic dermatitis. *J Allergy Clin Immunol*. 2023;151(1):147-158. doi:10.1016/j.jaci.2022.09.020

6. Chu AWL, Wong MM, Rayner DG, et al. Systemic treatments for atopic dermatitis (eczema). *J Allergy Clin Immunol*. 2023;152(6):1470-1492. doi:10.1016/j.jaci.2023.08.029

7. Maleki-Yazdi KA, Heen AF, Zhao IX, et al. Values and preferences of patients and caregivers regarding treatment of atopic dermatitis (eczema). *JAMA Dermatol*. 2023;159(3):320-330. doi:10.1001/jamadermatol.2022.6045