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Atopic Dermatitis

By Doug Brunk
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San Diego — Parents of children newly diagnosed with atopic dermatitis may be riddled with angst. Some gravitate to guilt and self-blame, figuring “we did something wrong to our child.” In seeking answers, they are asking “what are we giving him?” that’s causing the atopic dermatitis, Dr. Magdalene A. Dohil, a meeting sponsor, told Rady Children’s Hospital.

Others believe that baths are bad for their child, and many are frightened to use topical steroids to treat the disease. “They may say things like, ‘there are so many creams, how do I remember what goes on and where it goes,’” said Dr. Dohil, a pediatric dermatologist at Rady Children’s Hospital in San Diego. “They probably want a simple and easy cure so they can control the disease.”

Many parents find it hard to accept the fact that there is no treatment that completely cures atopic dermatitis. That is why she practices “extreme parent education” from the get-go.

“We have to battle myths and misperceptions,” said Dr. Dohil, also of the University of California, San Diego. “We have some good safety data on atopic dermatitis treatments out there. It’s just not common knowledge, and they are not that easy to explain.”

**Patient Resources**

Web-based resources the points parents and patients to include The Eczema Center at Rady Children’s Hospital (www.radychildrens.org), the National Eczema Association (www.nationaleczema.org), and Under My Skin: A Kid’s Guide to Atopic Dermatitis (www.underrskin.com).

Management of atopic dermatitis is currently based on the number of lesions, presence of disease, frequency of flares, patient age, and quality of life and emotional issues. Dr. Dohil focused her discussion on topical corticosteroids and topical calcineurin inhibitors. “We have to stress for our patients that this is what it boils down to; this is our primary anti-inflammatory armamentarium right now,” she said.

**Topical Corticosteroids**

Corticosteroids have been a mainstay of inflammatory atopic dermatitis treatment for decades. They are also used to manage acute flares and as maintenance therapy.

“We can start as low potency as needed or start high, control, and go back to low potency as needed,” she said.

“This is my preference because I feel it gives you that initial trust and compliance if parents see their child getting better. It allows you to taper down and reassure parents that you are not at that very high potency level of a topical steroid,” Dr. Dohil added.

The choice of corticosteroid is influenced by what prior agents have been used, the age of the patient, severity and localization of dermatitis, formulations, and parental steroid phobia. The anti-inflammatory efficacy of topical corticosteroids continues to improve with price. Dr. Dohil said, including the potential for skin atrophy, telangiectasia, acne, perioral dermatitis, as well as hypothalamic-pituitary-adrenal axis suppression.

“This really scares parents. We need to take this parent fear factor into account at every step along the way because if you don’t, you set yourself up for noncompliance.”

The start-up period can be set to 3 months of use in nonimmune individuals. After the start-up period, the potential risk factors to look for.

Atopic Dermatitis at doses of 1.0, 1.5, and 2.5 mg/kg/day. For adults, the recommended starting dose is 2.5 mg/kg/day. If the patient does not respond within 10-15 days, a lower dose may be appropriate. For nonimmune patients, the recommended starting dose is 2 mg/kg/day. If the patient does not respond within 20-25 days, a lower dose may be appropriate.

**Pediatric Use**

Safety and effectiveness in children below the age of 12 have not been established.

**Contraindications**

Atopic Dermatitis

For more information, please visit www.steroid.com

**Topical Calcineurin Inhibitors**

The topical calcineurin inhibitors, tacrolimus (Protopic) and pimecrolimus (Elidel), are popular second-line treatment options for treatment of moderate to severe disease.

According to labeling information, these agents are indicated in nonimmunocompromised adults and children 2 years of age and older, who have failed to respond adequately to other topical prescription treatments, or when those treatments are not advisable.

After a Food and Drug Administration black box warning was issued in January 2006 related to concerns about skin malignancies and lymphoma from the use of topical calcineurin inhibitors, several case-control studies, long-term registries, ongoing clinical studies, and data safety monitoring boards were launched to continue to assess their safety.

A 10-year study, A Prospective Pediatric Longitudinal Evaluation Study, will examine 8,000 pediatric patients treated for at least 6 weeks.

Another 10-year trial, The Pediatric Eczema Efficacy Registry, is an observational parent-report registry designed to assess the risk of malignancies in 5,000 children aged 2-17 years who were treated with pimecrolimus for at least 6 weeks.

One recent study found no increase in patients with severe atopic dermatitis were 2.4 times more likely to develop lymphoma compared with controls. However, use of pimecrolimus and tacrolimus conferred a protective effect.

The odds ratio of association for nonmelanoma skin cancer decreased as the number of tubes used and the potency of the agent increased. “There was no clear explanation for this,” Dr. Dohil said.

“There’s still a lot of discussion going on.”

She added that studies of the blood levels of topical calcineurin inhibitors indicate that they “appear to be negligible when used appropriately.”

In clinical practice these agents are commonly used for the face and genital area and for other so-called hot spots with high risk of atrophy.

They are often used in patients with concerns about steroids due to quantity of use in delicate locations, need for quick or near constant therapy, or in those with an adverse event history such as striae or systemic effects.

Many people feel that topical calcineurin inhibitors can help patients experience a longer flare-free interval and then further transition from this maintenance treatment to maybe just a topical moisturizer or give enough time for the skin to settle down,” Dr. Dohil said.

Dr. Dohil disclosed that the department at Rady’s required financial and research support from Hill Pharmaceuticals. She has also received honoraria from Medicis and Dermik.