Theme Editorial

Food Allergy: Unmet Needs and New Perspectives

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This issue of the *Journal of Allergy and Clinical Immunology: In Practice* includes a collection of review articles and a rostrum covering a spectrum of food allergy topics that are relevant to the practicing clinician.

The rostrum by Eigenmann et al[1] discusses 2 common clinical concerns regarding diagnosis and management of tree nut allergy. They review the challenges of accurate diagnosis given the issues of cross-reactivity and co-sensitization as well as the complexities of management, which ranges from broad avoidance of all nuts to minimize reactions, to selective avoidance that allows for more diversity in the diet but requires extra vigilance to avoid cross-contamination with avoided tree nuts. The insights in this rostrum are sure to contribute to in-office decision making.

The grand rounds case-based review by Dr. Feldweg[2] provides a summary of the diagnosis and management of food-dependent, exercise-induced anaphylaxis (FDEIA). FDEIA can be a confusing and frightening experience for patients. Often reactions occur in individuals who have already tolerated the trigger food and separately tolerate exercise; thus the thought of allergy is a surprise and confirmation of the diagnosis can be difficult. Without a clear understanding of this entity, patients can become anxious about both the food allergen(s) and exercise, potentially leading to significant restrictions in both diet and activity that can negatively impact quality of life. Thus, awareness of FDEIA and educating the patient of this less common disorder is important to minimize the risk of reactions without being overly restrictive.

Both the tree nut allergy rostrum and the FDEIA grand rounds review highlight some of the diagnostic challenges that still remain in the field of food allergy. As Santos et al[3] discuss in a clinical management review, the limitations of current *in vitro* diagnostic tools point to the need for advancements in this area. The current gold standard of food challenge is time and resource intensive and carries real risks of allergic reactions, which often deter health care providers and/or patients and their families. This review discusses alternative test options that are currently available to clinicians as well as the role that novel tools such as the basophil activation test may play to potentially reduce the number of food challenges needed to make accurate diagnoses.

In addition to improvements in diagnostic tests, advancements in the treatment of food allergy have brought new excitement in the arena of proactive interventions to decrease the risks for severe, potentially life-threatening reactions and to improve quality of life. In a clinical commentary review, Nowak-Wegrzyn and Gernez[4] present an overview of the history of immunotherapeutic approaches for food allergy and provide a comprehensive summary of the safety and efficacy data related to different routes of food immunotherapy trials to date. There is also emerging evidence to suggest that different patient characteristics or food allergy phenotypes may influence decision making to pursue specific treatment options in the future.

Because approved therapies for food allergy remain elusive, a focus on prevention strategies is also necessary. In a clinical commentary review, Bahnson et al[5] discuss the challenges of designing clinical trials to study the effectiveness of prevention strategies related to food allergy, highlighting the unique issues that are not concerns within allergy treatment trials. One example of such a challenge is how to identify the target population for prevention.

Clearly, there are many unmet needs in the field of food allergy that continue to merit attention. The review articles provided in this issue not only summarize the current understanding of food allergy, but also raise the awareness for knowledge gaps in this field and encourage efforts to fill them. Increased understanding and thoughtful study designs will lead to improved diagnostic approaches and management plans as well as allow proactive measures for prevention and treatment.

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