METHODS. Parents and children were surveyed by using the Revised Olweus Bully/Victim Questionnaire with additional questions specifically addressing bullying about food allergy. Children and parents were also given validated questionnaires on anxiety and food allergy–related quality of life.

RESULTS. Slightly more than 45% of children and 36% of parents reported bullying for any reason, which is higher than that previously reported in the general population (17%–35%). Food allergy–related bullying was reported by 31.5% of children and 24.7% of parents. More than one-half the time, parents were unaware of child-reported bullying. The most common form of bullying was teasing (42%), followed by waving food near the child (30%); 15% of children reported being threatened. Parents were most often the person children notified when bullied (71% of children). Greater anxiety was noted in the children who were bullied, with decreased quality of life compared with children with no history of being bullied. However, children’s quality of life was significantly improved when parents were aware of bullying. Parental distress and quality of life were worse with knowledge of bullying of any type.

CONCLUSIONS. The results of this study demonstrate that bullying is common in food-allergic children and that parents are often unaware of the bullying. Bullying is associated with increased distress and decreased quality of life in both children and parents. However, quality of life in children was better when parents were aware of bullying.

REVIEWER COMMENTS. This study confirms the perception that children with food allergy are often victims of bullying and that this finding correlates with increased anxiety and decreased quality of life. An attempt should be made at clinical visits to investigate whether the child is being subjected to bullying. Given that quality of life was improved when parents were aware of bullying, parents should also be encouraged to initiate conversations about bullying with their children.


Jessica Rajan, MD
Susan Laubach, MD
San Diego, CA

Behavioral Feeding Problems and Parenting Stress in Eosinophilic Gastrointestinal Disorders in Children


PURPOSE OF THE STUDY. This study evaluated the psychosocial effects associated with dietary restriction in children with eosinophilic gastrointestinal disorders (EGID) and their families. It assessed behavioral feeding problems among children with EGID compared with healthy children, determining if behavioral feeding problems among children with EGID affect adherence to dietary restrictions and if these behavioral feeding problems are associated with parenting stress.

STUDY POPULATION. Patients between the ages of 2.5 and 18 years who had a primary diagnosis of EGID, including eosinophilic esophagitis or eosinophilic gastroenteritis. Healthy comparison children were gender- and age-matched (±2 years) to children with EGID. Ninety-two subjects with EGID and 89 healthy comparison subjects were included in the analyses.

METHODS. Parents completed validated questionnaires to identify behavioral feeding problems, parenting stress, and adherence to dietary restrictions. Statistical analyses were performed to compare these parameters in children with EGID and healthy children.

RESULTS. Children with EGID had significantly higher levels of behavioral feeding problems than healthy controls (P < .001), with younger children demonstrating higher levels of behavioral feeding problems than older children. Behavioral feeding problems were not predictive of adherence to dietary restriction recommendations but were associated with parenting stress.

CONCLUSIONS. Behavior feeding problems are an important consideration in children with EGID and are associated with higher parenting stress.

REVIEWER COMMENTS. This study is unique in that it systematically examines behavioral feeding problems among a large sample of children with EGID and the impact on caregivers, highlighting the relationship between behavioral feeding difficulties and parenting stress in this pediatric population. The presence of a control group of healthy children is a strength of this study. Providers involved in the care of children with EGID should recognize the relationship between feeding difficulties associated with restrictive diets and caregiver stress. A multidisciplinary treatment approach including psychologists and speech providers may be useful in providing support to these families.

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Saira Z. Sheikh, MD
A. Wesley Burks, MD
Chapel Hill, NC

Comparative Dietary Therapy Effectiveness in Remission of Pediatric Eosinophilic Esophagitis


PURPOSE OF THE STUDY. Eosinophilic esophagitis is an inflammatory disorder that clearly responds to dietary therapy. Current food hypersensitivity testing tools have been of unclear value in guiding dietary management.
This study compared the effectiveness of 3 frequently prescribed dietary therapies (elemental, arbitrary 6-food elimination [SFED], and skin prick and atopy patch test-directed elimination diets).

**STUDY POPULATION.** Subjects were recruited from the Cincinnati Center for Eosinophilic Disorders database as a retrospective cohort with the following eligibility criteria: (1) diagnosis of eosinophilic esophagitis based on at least 15 eosinophils/high-power field (eos/HPF) in at least 1 esophageal biopsy specimen with no response to high-dose proton-pump inhibitor, or normal pH probe results, along with exclusion of other causes of esophageal eosinophilia; (2) at least 2 upper endoscopies to monitor dietary therapy; (3) no oral or topical corticosteroids for at least 2 months before and during the study; and (4) being aged ≤21 years throughout the study.

**METHODS.** Patients were treated with 1 of 3 food-elimination therapies as the sole intervention (except for acid suppression) between the 2 endoscopic assessments. The specific dietary therapy chosen for each patient was not randomly assigned but negotiated between physician and patient based on multiple factors, including past responses to dietary intervention and an assessment of the child’s and family’s ability and willingness to implement the recommended diet. The elemental diet provided all nutrition in the form of crystalline amino acids, such as Neocate (Nutricia, Liverpool, United Kingdom). The SFED empirically avoided milk, soy, wheat, egg, peanut/tree nuts, and fish/shellfish, along with restricting foods eliciting positive skin prick test and allergy patch test results, the “modified SFED.” The third group (“directed”) eliminated only foods that elicited positive results on skin prick testing and/or allergy patch testing. Remission status was defined as follows: complete remission, ≤1 eos/HPF; partial remission, 2 to 5 eos/HPF; partial resolution, 6 to 14 eos/HPF; and active disease, ≥15 eos/HPF. Food reintroductions were initiated only when eosinophil levels after diet therapy were <15 eos/HPF and were deemed successful if subsequent eosinophil levels after diet therapy were ≤15 eos/HPF and no symptoms were reported.

**RESULTS.** Ninety-eight of 513 patients met eligibility criteria. Fifty percent received elemental diet, 27% SFED, and 23% directed diet. Remission rates were as follows: elemental, 96%; SFED, 81%; and directed, 65%. Odds of postdiet remission versus nonremission were 5.6-fold higher on an elemental diet versus a 6-food diet and 12.5-fold higher on an elemental diet versus a directed diet, but there was no significant difference between 6-food elimination and directed diets. After single-food reintroductions, the negative predictive values of skin testing for remission were as follows: milk, 40%; egg, 56%; soy, 64%; and wheat, 67%.

**CONCLUSIONS.** All 3 dietary therapies were effective, but the elemental diet was superior at inducing histologic remission. The empirical 6-food elimination was at least as effective as a food skin test–directed diet. The negative predictive values of foods most commonly reintroduced in single food challenges were not sufficient to allow dietary advancement based solely on skin test results.

**REVIEWER COMMENTS.** The authors point out that dietary adherence is inversely related to the number of foods eliminated. With that in mind, the directed diet might be preferable to the 6-food elimination diet if substantially fewer foods need be eliminated.

**Evolution of In Vitro Cow’s Milk Protein–Specific Inflammatory and Regulatory Cytokine Responses in Preterm Infants With Necrotizing Enterocolitis**


**PURPOSE OF THE STUDY.** To determine the cytokine responses to milk protein in preterm infants from initial presentation with necrotizing enterocolitis (NEC) to full enteral feedings.

**STUDY POPULATION.** This study followed up a cohort of 14 preterm infants in a large UK NICU who presented with acute NEC.

**METHODS.** Blood was collected at 3 time points: acute NEC presentation, feeding reinitiation, and full feeding. Various laboratory techniques were used to assess cytokine responses after cells were incubated with differing amounts of cow’s milk protein; cohort results were compared with those of healthy controls.

**RESULTS.** Twelve neonates (median postconceptional age: 27 weeks; range: 24–35 weeks) who survived acute NEC completed the study. All subjects had ingested cow’s milk before acute NEC presentation. Th1 (interferon-γ), Th2 (interleukin-4), and regulatory (interleukin-10 and transforming growth factor-β1) cytokine responses to milk proteins were elevated at presentation and increased further at time of feeding reinitiation (P < .005). However, at full feeding, only transforming growth factor-β1 increased further compared with feeding reinitiation (P < .005).

**CONCLUSIONS.** Milk protein–induced lymphocyte and mucosal barrier responses play a key role in local immunologic disruption in the preterm infant. The shift from proinflammatory to regulatory cytokines coincided with clinical recovery.
Comparative Dietary Therapy Effectiveness in Remission of Pediatric Eosinophilic Esophagitis
James R. Banks and Timothy Andrews
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