

There are no specific guidelines for treatment of EHF allergy. However, most studies indicate substitution for an amino acid-based formula. A different protein hydrolysate form (whey vs. casein), is rarely effective in clinical practice and more research on this subject is required.

Safety of AABF in children with CMA was first reported by Sampson et al. in 1992. Nevertheless, it is not clear for how long should AABF diet be kept. Hill et al.⁸ reported the use of AABF for more than 6 months in 6 infants with multiple food allergy. In a long term follow-up evaluation of 52 children with CMA and allergy to EHF, AABF was used for 11.4 ± 8 months (3.5 to 41 months) and tolerance to CMP was achieved at a median age of 20.5 months.¹⁰

A recent European position statement has recommended that soy-based formula should not be used as first-line treatment for infants with CMA under 6 months of age, because few children had been studied and a high level of concurrent soy allergy was detected. Nevertheless, this substitute is nutritionally adequate, palatable and less expensive than CMP based formulas.⁶

Information on soy formula utilisation in children with allergy to EHF is scarce. Our experience demonstrates that soy products can be helpful, particularly in families with low financial resources.

However, SPT for soy should be performed before dietary introduction. High risk patients, as explained for CMA patients, should be given special precaution.

Allergy to EHF is a rare condition under rising awareness. A significant number of case-reports have been noticed in recent years.

Symptoms include immediate IgE mediated manifestations and/or chronic unspecific reactions, gastrointestinal in the first place. Although unspecific symptoms appear to be more frequent, the authors found a clear predominance of immediate reactions.

Early diagnosis is a good prognostic factor. When other food intolerance is associated with EHF allergy, tolerance acquisition appears to be more difficult.

Management of these patients requires complete CMP eviction and substitution for AABF. Soy formulas can also be useful, especially in low income families, and prescription should be established individually.

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A retrospective study of allergic diseases in children with food hypersensitivity

To the Editor:

Allergic disease is a common cause of morbidity, particularly in young children, and its prevalence has increased in the last 20 years in most countries; and food allergy is the most common cause of allergy in the first years of life. Apparently diet has an important influence in a lot of physiological functions during pregnancy and childhood. Infants are exposed to allergens which are being eaten by the mother and go across placenta,¹ and due to their intestinal immaturity can

absorb proteins with high molecular weight that have a lot of allergenicity. This early exposure has an effect in humoral response and can curb the development of tolerance.²

Food hypersensitivity is associated with the presence of atopic dermatitis, gastrointestinal diseases and asthma. Various authors have found a high prevalence of food sensitisation in infants with atopic dermatitis^{3,4} and Abou-diab et al. determined that cow's milk proteins suppression could improve the symptoms of children with asthma and cow's milk hypersensitivity.⁵

In a recent review by the Cochrane Group they concluded that the use of hydrolysed formulas and other measures in infants with a high risk of atopy could reduce the risk of asthma in the first year of life.⁶ Other studies have shown

Table 1 Symptoms of food hypersensitivity

	Skin symptoms	Gastrointestinal symptoms	Respiratory symptoms	Anaphylaxis	Other symptoms
Children challenged to cow's milk (n = 199)	154 (78.2%)	83 (42%)	5 (2.5%)	1 (0.5%)	26 (13.2%)
Children challenged to egg (n = 60)	46 (79.3%)	15 (25.9%)	6 (10.3%)	1 (1.7%)	5 (8.6%)

Table 2 Children who did not become tolerant or developed other allergy

	Children challenged to cow's milk (n = 56)	Children challenged to egg (n = 12)	p
Current allergy	14 (25%)	6 (50%)	>0.05
Asthma record	27 (48.2%)	7 (58.3%)	>0.05
Current asthma	7 (12.5%)	5 (41.7%)	>0.05
Dermatitis record	23 (44.2%)	6 (50%)	>0.05
Current dermatitis	9 (17.3%)	5 (41.7%)	>0.05
Current medicine allergy	1 (1.9%)	11 (91.7%)	>0.05

that food hypersensitivity in the first years of life can promote the development of allergy against inhalant allergens.^{7,8}

The aim of our retrospective descriptive and cases-controls study was to describe the characteristics of children with food allergy in Príncipe de Asturias Hospital, in Madrid, Spain and to determine the relationship between food allergy and the development of asthma and other signs of atopy.

Two hundred and fifty medical records of infants with cow's milk and egg challenge, between 1993 and 2003, were reviewed. The principal variables were sex; age at beginning of symptoms; symptoms of food allergy; skin prick test (SPT) and allergen-specific IgE antibody measurement; age at challenge and age of becoming tolerant. IgE-mediated hypersensitivity was determined by SPT and measurements of specific immunoglobulin E (IgE) in serum, taken at time of diagnosis of food hypersensitivity.

A telephone survey was done to 68 patient's parents. The rest of the patients were not located. All ages were between 3 and 17 (mean value 6.1). They were asked about persistence of allergy, development of asthma, atopy, medicine allergy, where they do the follow-up and how much they think allergy affects their quality of life (on a scale from 1–100, with one representing the smallest impact and 100 the highest impact). Parents of these 68 subjects agreed to participate in the study.

Results were compared to a group of healthy children, between 3 and 17 years old (mean value 7.1); 33 of whom were recruited from a school and 26 from three health care centres of the Area 3 in Madrid. Participation was voluntary, confidential and anonymous. The exclusion criterion was a record of food hypersensitivity. Data were obtained in accordance with the Data Protection Law (15/1999).

Numerical variables were expressed either as means and standard deviations (sd), or median and interquartile range

(IQR). Qualitative variables were presented as frequencies and percentages. For comparison of qualitative variables, Chi² analyses and Fisher's exact test were used. A p<0.05 significance level was chosen. The SPSS 15 software was used for statistical calculations.

One hundred and ninety-nine (77%) children were challenged to milk and 60 (23%) to egg. Symptoms of allergy started by the mean age of 5.4 months (± 5.56 sd); 3 (± 2 sd) months in children with cow's milk allergy (CMA) and 13.5 (± 7.1 sd) in children with egg allergy. Skin symptoms and gastrointestinal symptoms were the most common symptoms in these children (Table 1).

Diagnosis of food allergy was done by the median age of 6 months (IQR 6.63). By groups, children with CMA were diagnosed at the median age of 5 months and children with egg allergy at 16 months. The first challenge was carried out by the median age of 14 months (IQR 23).

At the median age of 13 months (IQR 16), 92% of the subjects challenged to milk became tolerant and at the median age of 46 months (IQR 32), 85% of the children challenged to egg also became tolerant.

Thirty-three (17%) of the children challenged to milk had egg hypersensitivity and 11 (6%) had other food hypersensitivity. Eighteen (30%) of the children challenged to egg had cow's milk hypersensitivity and 14 (23%) had other food hypersensitivity.

SPT was positive in 92 (43%) children with CMA and in 56 (12%) children with egg allergy. Specific IgE was >0.35 KU/L in 76 (36%) children with CMA and 57 (63%) children with egg allergy.

We determined the proportion of children who did not become tolerant or developed other allergy (Table 2). The proportion of children with asthma and symptoms of atopy is higher in children with egg hypersensitivity. We also found that 90% of the children with allergy had food hypersensitivity and 21% inhalant hypersensitivity.

Table 3 Allergic diseases in cases (children with food hypersensitivity) and controls (survey results)*

	Cases (n = 68)	Control (n = 59)	p
Current allergy	20 (29.4%)	3 (5.1%)	<0.05
Asthma record	34 (50%)	9 (15.3%)	<0.05
Current asthma	12 (17.6%)	2 (3.4%)	<0.05
Dermatitis record	29 (45.3%)	19 (32.2%)	>0.05
Current dermatitis	14 (21.9%)	8 (13.6%)	>0.05
Current medicine allergy	2 (3.1%)	0	>0.05

*2 cases not available (NA), 6 controls NA.

When we compared cases to controls, the proportion of persistent allergy and asthma was higher in cases than in controls (Table 3). Sixty-two percent and 32% of the children with food hypersensitivity and without food hypersensitivity respectively had relatives with allergic diseases.

We conclude that, in our hospital, the majority of the children with food hypersensitivity have CMA and skin symptoms. However children with cow's milk hypersensitivity become more tolerant than children with egg hypersensitivity.

We have shown that egg hypersensitivity is related to IgE-mediated allergy in more cases than CMA. Moreover this result could be related to a later development of atopic symptoms.

When we compared children with food hypersensitivity and children without it, we found that the first group can develop asthma and other allergies as inhalant allergy more frequently than the second group, and that their relatives have more allergic diseases.

Our beliefs regarding the burden of this disease have been confirmed with the data from the survey. Parents think allergy affects their child's quality of life in a proportion of 50% and we should, as paediatricians, try to detect these children and teach them different measures in order to improve their quality of life.

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Are we overtreating recurrent wheezing in infancy?

To the Editor:

Asthma diagnosis is difficult in infants with recurrent respiratory symptoms. Most children with asthma develop symptoms within the first three years of life. Clinically, these children are difficult to differentiate from those who

have recurrent symptoms due to different causes, particularly from those with transient wheezing. After ruling out possible causes of chronic respiratory symptoms, the next step is to assess severity and frequency of symptoms in order to initiate controller therapy. Inhaled corticosteroids (ICS) are the first line medication for asthma management in all age groups under an appropriate diagnosis. Failure to respond to a six-week trial of ICS should certainly prompt re-evaluation rather than increase in doses. If ICS are commenced and there is no beneficial effect, clinical