

Awareness of food allergies among adolescents

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ABSTRACT

Food allergies are said to be a hostile reaction to food and are facilitated by an immunologic mechanism. Food allergy has been shown to lower general health perception, limits family activities and has a significant emotional as well as economic impact on the parent. Thus, with the increasing prevalence of food allergy and the absence of a cure, community awareness about the signs and treatments of allergic reactions is vital. The aim of the study was to assess the awareness about food allergies among adolescents.

KEY WORDS: Allergy, food, cure

INTRODUCTION

Food allergies are said to be a hostile reaction to food and are facilitated by an immunologic mechanism involving specific immunoglobulin E (IgE) mechanisms (IgE-mediated), cell-mediated mechanisms (non-IgE-mediated), or both IgE- and cell-mediated mechanisms (mixed IgE- and non-IgE-mediated).^[1] Early identification and diagnosis of food allergies are vital for a worthy prediction and should lead to proper management of the person's nutrition. Parents perceiving food allergies are common in early childhood, with up to one-third of parents reporting one or more adverse food reactions.^[2,3] Food allergies might affect 8% of children <3 years of age, while the occurrence in children having food allergies connected with eczema is approximated to be as great as 30%.^[4]

Food is omnipresent in our civilization and is a significant piece in social events, predominantly for children. Food allergy has recently been increasing in prevalence.^[5,6] The conclusion is grounded on the medical account and can be reinforced by testing using methods such as skin prick testing, specific IgE, and oral food challenges. IgE-mediated food allergy can lead to anaphylaxis.^[7] It is estimated that

150 Americans die each year due to food allergy, with most death occurring among adolescents and young adults.^[8,9] Establishments such as the Food Allergy and Anaphylaxis Network and other local parent support assemblies have been encouraging the increased spread of knowledge and awareness of food allergies throughout the society and the entire nation.^[10,11] However, earlier research demonstrates that misapprehensions about food allergy prevails among the general public^[12,13] and that knowledge of the doctors, health care workers, and physicians about food-induced anaphylaxis is deficient.^[14]

Food allergy has been shown to lower general health perception, limit family activities and has a significant emotional as well as economic impact on the parent.^[15,16] Late diagnosis by physicians or health care workers and communal stigmatization by the overall public may be issues leading to additional problems which parents of children with food allergies face in dealing with the daily distress of a fatal reaction. Thus, with the increasing prevalence of food allergy and the absence of a cure, community awareness about the signs and treatments of allergic reactions is vital.^[17] In this study, we are going to assess the knowledge and awareness of food allergies among adolescents.

MATERIALS AND METHODS

This was a questionnaire-based study using an online survey portal called "survey planet." Ane-form with

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17 questions was circulated among 102 adolescents from the age of 13–20 years which included questions regarding their awareness about food allergies, the diagnosis opinions and whether they experienced these food allergies and if they did, they were questioned about its reoccurrence. Results were obtained using proper statistical methods, and thus the awareness of food allergies among adolescents was studied.^[18,19]

RESULTS AND DISCUSSION

In this study, out of the 17 questions that we asked the participants, we have selected five vital questions. Since this study was targeted at adolescents having food allergies when asked whether they have food allergies? We found that 58% of the participants [Figure 1] possessed some sort of food allergy. Next we enquired about how the identified that they had food allergies. Although commonly self-diagnosed by the individual or the caregiver, in this study we found out that majority of the participants had their food allergies diagnosed by a physician or an allergist, which was followed by self-diagnosis. This may be due to the stigmatization and fear or paranoia surrounding the concept of food allergies. They were also asked whether their family members possessed food allergies in an attempt to find whether the etiology of food allergy could be linked at a genetic level and also whether it could be passed from one generation to the next generation. 60% of the participants mentioned that at least one of their family members had an allergy toward a food product. Although this link between genes and food allergy seems promising, further *in vitro* and *in vivo* studies are required to determine whether this could be a cause. Following that they were asked whether they take outside and processed food regularly to see whether that could be a cause of food allergy considering the fact that the modern population, especially the adolescents and young adults are drawn toward packed and processed food. Similar to the case of genes and food allergies, this also requires further study and testing to be determined as a cause of food allergies. Finally, we asked the participants what food product causes food allergies. Surprisingly 11% of them were allergic to vegetables and fruits which were followed by 11% to milk, 10% to fish and other seafood, 9% to gluten, 8% to eggs, 7% to nuts, and other and 5% to soybean. This increase in a population having an allergy toward fruits and vegetables could be regional and requires further study to confirm it. The adolescents possessed basic awareness about food allergies.

In a recent study conducted by Ruchi *et al.*, parents of children with food allergy had a solid foundation of knowledge towards food allergy, diagnosis, and treatment emphasized the significant impact that food allergy had on their lives.. Pediatricians, allergists,

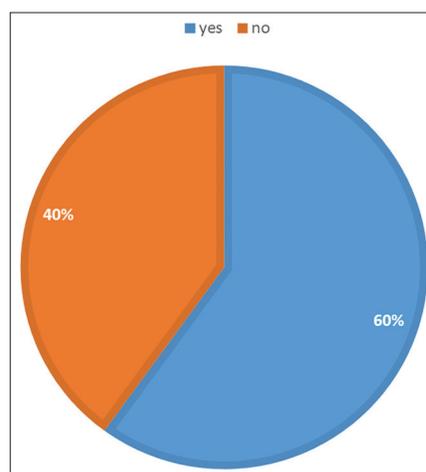


Figure 1: Percentage of people who suffer food allergy

physicians, and health care workers possessed an understanding of the definitions and general knowledge about food allergy and anaphylaxis. However, there were inconsistencies in their understanding of symptoms and diagnosis. The general public had significant variations in their knowledge about food allergies.^[17] In previously conducted studies parents felt that food allergy impacted not only their daily social lives but also their relationships with their spouses and extended family. Parents confirmed that food allergy affected their child psychologically and socially.^[20] Teenagers, adolescents or young adults having food allergies are at maximum risk for deadly allergic reactions, and this peril is superficially and partially linked to the increased risk-taking behaviors, poor awareness of potential dangers and lack of well-timed treatment with epinephrine.^[9,21] In another study conducted by Margaret *et al.*, more than half of the participants had knowledgeably in took at least a minute quantity of a food product which was known to possibly contain an allergen, and 17% of the participants did so a few times a month or more. The reasons for doing so included previous imprudence without any allergic reactions, a simple wish to eat the food, a consideration that “may contain” labeling was not a warning for them not to intake the food product, unwillingness to ask questions, curiosity, and peer pressure. Almost all of the respondents in a previously conducted study knew something about food allergies and most had personal contact with somebody with an allergy.^[22]

Through this study, we obtained valuable information regarding the awareness that adolescents possess about food allergies. The knowledge we gained from this study will be helpful to allow involvements to target the many misconceptions surrounding food allergies. It will also be helpful in educating parents, physicians, and the general public. Understanding how food allergy is stigmatized in our modern day society,

it could also help in devising methods to improve the quality of life of affected families.

CONCLUSION

It was found that the adolescents possess basic awareness about food allergies, but considering the prevalence of food allergy in the society and how it affects people's social and economic life, more awareness is required among adolescents to deal with this effectively in the near future.

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