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PERSPECTIVES

Allergies and Adaptations: A Perspective on the Need for Culturally Responsive Care to Medically Indicated Dietary Restrictions

Anita Vasudevan*

Yale Primary Care Internal Medicine Residency Program, Yale New Haven Hospital, New Haven, CT

In medicine, we tend to think of food as being equivalent to nutrition, and food allergies are understood primarily as a biomedical process. In this piece, I explore how my experience with food allergies intersects with my cultural identity as a second-generation Indian-American. I also offer insights from my experiences in medical training and practice and reflect on the responsibility of health providers to understand the social and cultural context of food allergies.

Porichu kottal is a three-step process. First, a tablespoon or two of oil is heated in a small pan over low heat. When it shimmers, a half teaspoon of mustard seeds are added. They sizzle gently, and when ready, without warning, the first one will pop. This cues the rest into sputtering and popping joyfully around the pan, sometimes onto the stove range, occasionally onto your arm if you're not watching. As they quiet down, a fistful of fresh curry leaves are added, and just as the oil hisses with the sound of meeting something wet, a pinch of *perungayam* (asafoetida) is shaken in. These tempered spices are poured in to finish a *sambar, rasam,* the batter for *rava dosa*, and countless other South Indian staple dishes. Growing up, the sound and smell of *porichu kottal* was my cue that dinner was ready.

When I move through these steps to complete a dish in my own adaptations of age-old recipes, I feel connected to my childhood and to my Indian heritage. These foods and flavors are a vessel across generations and oceans for the inheritance of traditions, memories, and celebrations. As a second-generation Indian-American, I'm thankful for this way of engaging with my history and identity.

My mother immigrated to the United States from India some thirty-odd years ago, joining my father in a small apartment in the suburbs of Detroit. It was an era where international calling minutes could run up a formidable bill, and where paper mail took weeks to reach its final destination. In this time, food was perhaps the most profound connection my parents had to their homeland. My mother had brought with her a hard-bound lime-green ruled datebook, in which she and my grandma had carefully transcribed the recipes for a variety of essential

*To whom all correspondence should be addressed: Anita Vasudevan, M.D., Yale Primary Care Internal Medicine Residency Program, Yale New Haven Hospital, 20 York St, New Haven, CT 06510; Email: anita.vasudevan@yale.edu.

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dishes before her big move.

When I was born a few short years later, I was raised with the usual customs of early infancy for the first eighteen months of my life, such as baths with a homemade paste that uses chickpea flour, and baby food made with overcooked rice kneaded into plain *moong dal*. But suddenly, precipitously, there was an evening in which I was fed a lentil-rich meal for dinner, and a little while later, I broke out in hives and was having difficulty breathing, a textbook presentation of anaphylaxis [1].

My parents got me to a hospital quickly, and I was subsequently diagnosed with an allergy to the entire legume family. This includes chickpeas, lentils, beans, peas, soy, and peanuts. Incidentally, this family of foods is a ubiquitous ingredient in Indian fare.[1] *Besan* (split chickpea flour) is mixed into the most basic of South Indian spice blends, ground peanuts are used to thicken many chutneys, *uluttam paruppu* (urad dal) is in fact often added along with the curry leaves in the aforementioned *porichu kottal*...the list goes on.

In medicine, we tend to think of food as being equivalent to nutrition [2]. As a resident physician working on inpatient medical floors, when I document what my patients will eat while admitted to the hospital, I diligently list under the heading of "Nutrition" whether they will receive a regular diet, cardiac diet, a renal diet, or remain nil per os (NPO). On the outpatient side of care, I have learned to counsel my patients to understand food by teaching them to read a nutrition label, to redact their meals into a black and white breakdown of precise servings and calculated nutrients.

For those who are adherent to a vegetarian diet, legumes pack a reliable source of protein, and beyond that, they are filling, easy to prepare, and economical [3]. My family's culinary roots are steeped in a tradition of vegetarianism, and this is an essential component of many of our cultural practices. When I received my food allergy diagnosis, doctors told my parents that there was absolutely no way I could be raised on a vegetarian diet.[2] Furthermore, foods containing the offending agents should not be cooked in the household, since the smell was enough to trigger an allergic reaction [4].

While the most fundamental role of food as nutrition, as sustenance, cannot be understated, it certainly is not the totality of our gastronomical experience, either. As individuals, communities, and cultures, we come together over food, to create traditions, celebrate milestones, and share in each other's company.

With this in mind, I reflect back on the interactions my parents had with my doctors so many years ago, applying the lens of "patient-centered care" that I have learned in my own medical training. Would my providers have considered how challenging it was for my parents to accept and implement the proposition of raising their child on non-vegetarian fare? Could they have known how their directives would mean that my dad would only get to eat his favorite dish, *chole bhature*, when he went out to a restaurant? Did they wonder about how my mom would labor over developing alternative methods in dishes where legumes are traditionally added for consistency, flavor, or texture?[3]

It is probably true that even if these providers had the insight to understand these cultural nuances, their recommendations would have been the same. There is, after all, the danger of a life-threatening allergic reaction, and these social ramifications are the cost to avoiding that. I know that, in my most logical headspace. But when I transcend that, there are also many layers of emotions.

There is grief, for the cultural traditions in which I can't ever fully participate because I can't share the meal. There is exhaustion, for all the times I have to launch into an explanation of why I'm not eating something. There is anxiety, for the instances when I take a bite of something and worry that I didn't vet out my full list of allergies, that there was a misunderstanding, and that I will find out the hard way in the next couple hours when my body reacts.[4] There is some guilt, but also immense gratitude, for all the occasions in which my friends and family have accommodated my restrictions and prepared a legume-free version of a dish just for me.

There is also a story of hope and empowerment. I never had the option of ignoring what ingredients went into a given dish, and subsequently developed a deep curiosity about how a meal is made, where it comes from, and what goes in it. It is from this curiosity that I developed my own keen interest in cooking, nutrition, and health. I have also learned that the culinary traditions of my heritage foods are not as static as the word "tradition" might suggest. I become a part of these traditions by learning about them, understanding them, and eventually adapting them to fit my needs. It is not perfect, but it is a process, and within this particular process, there is almost always the promise of a delicious meal at the end.

I know from my own experience that there are layers of complexity to allergies that go far beyond the IgE-mediated release of histamine from mast cells, and the ensuing cascade of inflammatory cells and cytokines [5]. And yet, this is the primary language I have learned in my medical training to explain and understand allergies. This language is essential: allergies are intrinsically a biological process. But as much as food is not solely nutrition, food allergies are not solely biomedical.

If we, as clinicians and researchers, aim to offer truly patient-centered care, we must take the step to de-medicalize the diagnosis by acknowledging and validating the social and cultural consequences of allergies, and other medically indicated dietary restrictions, on the lived experience of those individuals who contend with them. In

my own practice as a primary care physician in training, I have begun to explore this by broaching the conversation with a simple question: What foods bring you joy?

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Footnotes

[1]In a 2013 review of legume allergies, Verma, *et al*. describe how prevalence of allergies to specific legumes have a regional variance on basis of how common they are in the diet. Peanut allergy is the more common legume allergy in the Americas and parts of Europe, including the UK, France, and Switzerland. However, soybean allergy is more prevalent in Japan. Chickpea and lentils are found to be an allergic leguminous crop in India and Spain, where they are more common in the diet. Symptoms at the extreme may present with life-threatening anaphylaxis, but also include oral allergies, angioedema, urticaria, rhinitis, and asthma [6].

[2]It has now been over two decades since my diagnosis, and the standard of care for management of allergies continues to emphasize strict avoidance and emergency action plans to recognize and treat an allergic reaction [7].

[3]Research that examines the impact of a child's food allergies on caregivers has shown that allergies have a significant impact on daily life, from meal preparation to social activities, especially when planning for an event where the caregiver may not be present [8]. Parental quality of life as it relates to food allergy is also impacted by the severity of reaction and the exact foods to which their child is allergic, with foods that are more difficult to avoid causing a greater negative impact on quality of life [9]. More research is needed to fully understand the impact of food allergies on ethnic minorities and immigrants, although one study involving Canadians newly immigrated from select Asian countries spoke to the challenges of understanding, explaining, and coping with food allergies when the diagnosis is uncommon in their country of origin [10,11].

[4]While there is no greater incidence of a diagnosable anxiety disorder among children with food allergies compared to the general population, there is some evidence to suggest greater levels of distress among children with food allergies, most specifically related to vigilance for avoiding allergen exposures [11]. A study of young adults found that individuals with allergies had significantly higher levels of anxiety compared to their non-allergic counterparts, and more so when they considered themselves to be health-competent [12]. There is also some debate as to whether a certain level of anxiety may be an adaptive mechanism that enables individuals with allergies to exercise appropriate vigilance and avoidance of allergens, although this also has the potential to become a maladaptive mechanism if it causes an individual to take unrealistic measures of avoidance [13].

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