Center for Food Allergy & Asthma Research (CFAAR)

Finding answers for children, adults, and families.







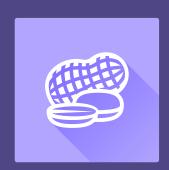












M Northwestern Medicine[®] Feinberg School of Medicine

Ann & Robert H. Lurie Children's Hospital of Chicago



Finding Answers, Shaping Policies

With the leadership of Ruchi Gupta, MD, MPH, the Center for Food Allergy & Asthma Research (CFAAR) is working each day to find answers surrounding food allergy, asthma, and other allergic conditions.

CFAAR is a joint endeavor between the Institute for Public Health and Medicine (IPHAM) at Northwestern University Feinberg School of Medicine and Ann & Robert H. Lurie Children's Hospital of Chicago. CFAAR—created in 2019 and the only center of its kind in the Midwest—is a leading hub for investigators whose high-impact research is internationally recognized.

CFAAR's mission is to lead innovative research that improves the lives of communities with food allergy and asthma through epidemiological, clinical, and community-engaged research. Through our three research cores, CFAAR collects data to improve the understanding of the population health burden of allergic conditions; conducts groundbreaking research to prevent, manage, and treat these conditions; and provides accessible resources and education to schools, communities, and individuals around the world.

With multiple faculty investigators and dozens of staff members conducting as many as 20 active studies at any one time, collaboration is the key to our success, enabling us to develop impactful studies to investigate and improve human health, and serve as a resource for patients seeking support and treatment. Our urgent work is funded by a mix of private philanthropy and support from the National Institutes of Health, Illinois Department of Public Health, Chicago Public Schools, and community and industry partners. We are incredibly grateful to the passionate philanthropists who have made our work at CFAAR possible and stand beside us as we build on our success to make important plans for the future.

"As a center, we're asking, 'Can we eliminate the burden of allergies for the next generation?' It's a long shot, but it's what keeps us going."

RUCHI GUPTA, MD, MPH

Director of CFAAR, Professor of Pediatrics and Medicine at Feinberg, Clinical Attending at Lurie Children's



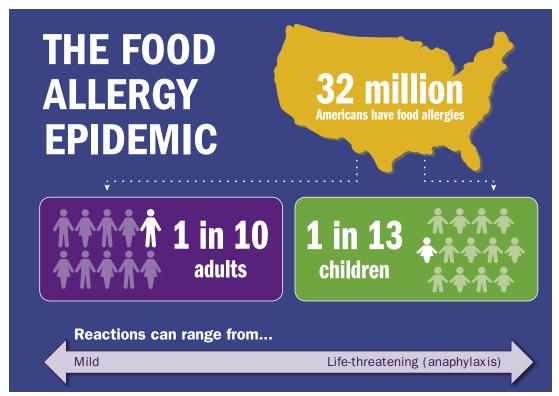
Three Research Cores in CFAAR Public Health Data Repository Core

Over the past decade, our team has made tremendous strides in improving the understanding of US food allergy prevalence, severity, and its impacts on the healthcare system, as well as its effects on patient and caregiver quality of life. CFAAR has become the **go-to source** within the scientific and public health communities for epidemiological data about food allergies in the US.

Our Impact

The Public Health Data Repository Core will:

- Disseminate public health data around food allergy and related conditions, including their prevalence, severity, distribution, predictors, disparities, psychosocial burdens, and economic impacts
- Develop large public data repositories to advance research and understand the population-level burden of immunemediated disease









"Now more than ever, CFAAR is working hand-in-hand with our growing global network of research collaborators to build and deploy data systems that can build understanding of the determinants and distribution of immunemediated disease, and systematically advance efforts to reduce its burden."

CHRISTOPHER WARREN, PHD

Assistant Professor of Preventive Medicine



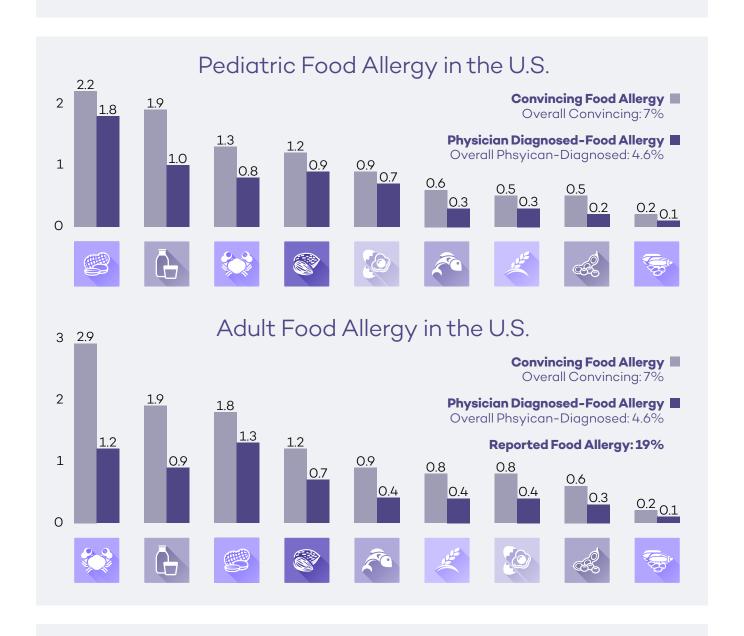
Policy Change





Our work characterizing the prevalence and severity of sesame allergy in the US led to the passing of the Food Allergy Safety, Treatment, Education and Research (FASTER) Act in 2021.

The FASTER Act will update current labeling laws to include sesame, and study the prevalence and economic costs of food allergies.



Clinical Research Core

We are deploying rigorous clinical research, particularly longitudinal studies, to get answers to major questions such as:

- Why is the number of children developing food allergies around the world rapidly increasing?
- How can we prevent food allergies?

Our portfolio of interventional and observational studies positions us as the world's preeminent food allergy and asthma research center with the unique infrastructure to support longitudinal investigations and lead multi-site consortia.

Our Impact

The Clinical Research Core will:



- Improve implementation of allergy guidelines among pediatric clinicians
- Learn how to prevent multiple food allergies through early introduction
- Understand differences in food allergy conditions among diverse populations and address health disparities
- Become a leader in longitudinal food allergy and asthma research studies

Clinical Research Core Spotlight Studies

Intervention to Reduce Early Peanut Allergy in Children (iREACH) - A Clinical Decision Support Tool for the Prevention of Peanut Allergy (NIH U01)

Through the iREACH study, our center is partnering with 35 clinics in Illinois to implement a clinical decision support tool in clinicians' electronic health records to assist them in determining best practices surrounding early peanut introduction.



Overall, the iREACH study aims to:

- Improve clinician adherence to early introduction of peanut guidelines
- · Decrease the incidence of peanut allergy in children

Childhood Activities, Nutrition, and Development Oversight (CANDO) Study

This prevention study explores early infant introduction of peanut and other common food allergens (milk, egg, cashew, walnut, sesame, almond, and soy) in the US and the impact of early introduction on food allergy development in young children. Data from over 1,800 infants will be collected and will help us assess the efficacy, safety, and feasibility of early allergen introduction, assess impact on growth, nutrition, and microbiome, and better understand prevalence of other comorbid conditions. This has the potential to be a landmark prevention study and yield a tremendous impact on infant feeding and allergy introduction for future generations.

Food Allergy Outcomes Related to White and African American Racial Differences (FORWARD) (NIH R01)



The FORWARD study aims to develop a prospective longitudinal cohort to systematically investigate differences among Black, White, and Latinx children in food allergy clinical and psychosocial outcomes, food allergy phenotypes and endotypes, and food allergy management practices. A total of 1,000 families will be recruited from allergy clinics in four academic medical centers located in three cities (Chicago, IL; Cincinnati, OH; and Washington, DC). This study has been extended for five more years by the NIH, making us the first research group to longitudinally track a diverse cohort of patients to understand racial disparities in allergic disease.

"Implementing evidenced-based clinical guidelines is always important. It is rare that implementation of guidelines can prevent disease. The iREACH trial is an incredible opportunity to show how this can be done."

LUCY BILAVER, PHD *Associate Professor of Pediatrics*



Community/School Outreach Core

We aim to spread public health awareness surrounding allergic conditions through our educational programming, family-centered conferences, advisory boards, and our extensive library of accessible resources. Through empowering and supporting students and families, we are able to **improve daily life** with allergic conditions and **influence policies that result in better health outcomes**.

Our Impact

The Community/School Outreach Core will:

- Train hundreds of students each year through our CFAAR Scholars, Ambassadors, and Student Health Leaders programs to shape the future generation of change makers
- Become a national resource for families, clinicians, scientists, and researchers to connect and share the latest in food allergy diagnosis, treatment, management, and prevention through our annual FACES Conference
- Develop an extensive library of educational videos, tools, and resources that are free and accessible to the community
- Build a Community Advisory Board comprised of individuals with food allergy, advocates, and experts in the field who help assist with CFAAR community engagement efforts, research priorities, and event planning

"My internship with CFAAR applied directly to my desired future career in medicine. It helped me gain hands-on exposure to research, and I now understand the basics for writing manuscripts, including collecting and analyzing data. I'm sure I will use these skills frequently in my academic and professional futures. This was a 10/10 experience."





Visit <u>cfaar.northwestern.edu</u> to learn more about our educational programming, conferences, and our extensive library of videos and resources.







Please Join Us!

Dr. Gupta, the Center for Food Allergy & Asthma Research, and Northwestern are world leaders in answering questions that will improve the day-to-day lives for those impacted by life-threatening food allergies. We have been widely recognized leaders in this field for over a decade, and we have proven that we utilize donor funds to maximize our impact on patients and their loved ones.

With generous and inspiring support from longtime donors and new friends, CFAAR is energized to continue its trajectory in developing more effective and impactful methods to investigate and improve the health of those living with allergic conditions. Please join us by providing funds to support research projects, faculty recruitment, community outreach and education programs, and more.

"Ensuring that ALL families dealing with life-threatening food allergies, regardless of where they live or the color of their skin, have access to quality care, treatment plans, and safe food is the goal. We are excited to help support Dr. Gupta and CFAAR's efforts and hope others will commit to providing support to fund answers to the many questions created by this relatively recent bizarre interaction between the immune system and common foods that affects so many millions."



DENISE BUNNING

CFAAR Donor and Co-founder of Mothers of Children Having Allergies (MOCHA)





Connect With Us



To learn more about CFAAR and how to become involved, please visit <u>cfaar.northwestern.edu</u>
To help support the research efforts of CFAAR, please contact:

MaryPat Mauro
Director, Major Gifts
Northwestern University Feinberg School of Medicine
Email: marypat.mauro@northwestern.edu; Phone: 312.503.1090