

The AERD Center

at Brigham and Women's Hospital

Information for patients with aspirin-exacerbated respiratory disease (AERD) / Samter's Triad

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MESSAGE FROM OUR DIRECTORS

This year has brought both exciting progress in AERD research and the challenges of a changing scientific funding landscape. At the Brigham and Women's Hospital AERD Center, we remain committed to advancing research and improving care, thanks to your participation and support. We are grateful for your partnership and look forward to another year of discovery together.

Dr. Tanya Laidlaw,
Dr. Kathleen Buchheit
& Jillian Bensko, PA-C

AERD Awareness Day
September 26th, 2025

Show your support by spreading awareness and learning more at www.samterssociety.org!

Note: We are now in Foxboro! Jillian Bensko, PA-C, now also sees AERD patients Mondays and Tuesdays at the MGB Health Care Center. Prefer this location? Just request Foxboro when you schedule!

BY THE NUMBERS

We now have over 2,600 patients enrolled in our AERD Registry, from all around the world! Having sent out several surveys to participants in 2024 and 2025, we received a lot of new information that we were able to learn from and publish for others to learn about as well.

Take a look at *Page 3* to see what AERD patients told us about their experiences with alcohol-induced reactions that can occur after even just a few sips of an alcoholic beverage. *Page 3* also includes new information on the symptoms AERD patients often notice first if their nasal polyps begin to recur after sinus surgery.

As the future of medical research faces increasing uncertainty in funding and priorities, our commitment to advancing patient care has remained steadfast. Your continued participation in our AERD Registry, and your willingness to share your experiences, make this work possible. THANK YOU!



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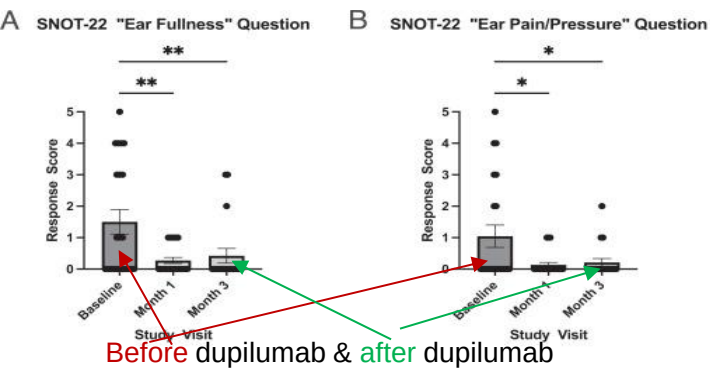
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AERD CENTER PUBLICATION #1

Dupilumab rapidly improves eustachian tube dysfunction and otologic symptoms in AERD.

This study showed that dupilumab treatment significantly improved eustachian tube dysfunction and otologic (ear) symptoms in patients with AERD. Data was derived from a prospective study of patients with AERD treated with dupilumab and assessed responses to the SNOT-22 ear/facial questions. We suspect that the reason dupilumab works so well as a treatment for eustachian tube symptoms in AERD is because it decreases the type 2 inflammation that is central to causing the disease. PMID: 11572941



AERD CENTER PUBLICATION #2:

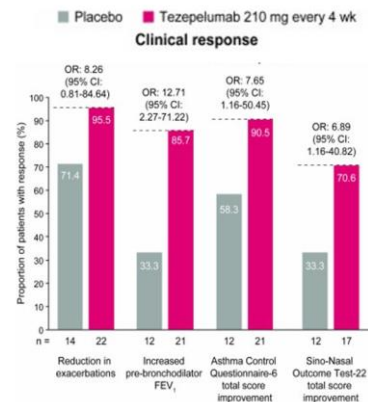
Dupilumab treatment for AERD in a real-world setting: Impact on quality-of-life and healthcare utilization.

This study employed a longitudinal survey of 98 patients with AERD over the course of two years. Participants completed questionnaires on their medication history, healthcare utilization, and quality of life. Of note, this study found that patients who were either on dupilumab at the start of the study or who started dupilumab during the two years had fewer reported "poor health days" in the preceding month compared to patients not on dupilumab. These participants also had better overall SNOT-22 and Asthma Control Test scores than those not on dupilumab over the course of the study. PMID: 39574218

AERD CENTER PUBLICATION #3:

Efficacy of tezepelumab in patients with severe, uncontrolled asthma and AERD in NAVIGATOR.

In this study, researchers took a closer look at the NAVIGATOR trial through a post-hoc analysis to better understand the safety and efficacy of tezepelumab in adults and adolescents with severe, uncontrolled asthma. A post-hoc analysis means re-examining study results to find additional insights for specific patient groups. Specifically, this analysis only focusing on patients with AERD found that tezepelumab reduced asthma exacerbations and improved lung function, asthma control, sinus symptoms, and overall health-related quality of life when compared to placebo. PMID: 7550847



PUBLICATION FROM MAYO CLINIC:

Incidence and mortality indicate sex differences in chronic rhinosinusitis with nasal polyposis.

This study found that new cases of chronic sinus inflammation with nasal polyps (CRSwNP) have been decreasing in men but staying steady in women over the past 15 years. Surprisingly, men with CRSwNP lived longer than men without it, while women with CRSwNP had similar survival rates to women without the condition. These findings suggest that sex-related factors may influence both how often CRSwNP develops and how it affects long-term health. Further research could help uncover why these differences exist and whether they point to opportunities for more tailored treatment approaches. PMID: 40505858

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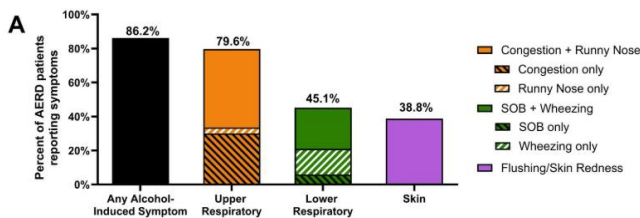
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NEW DATA!

RESPIRATORY SYMPTOMS IN AERD PATIENTS FOLLOWING ALCOHOL CONSUMPTION

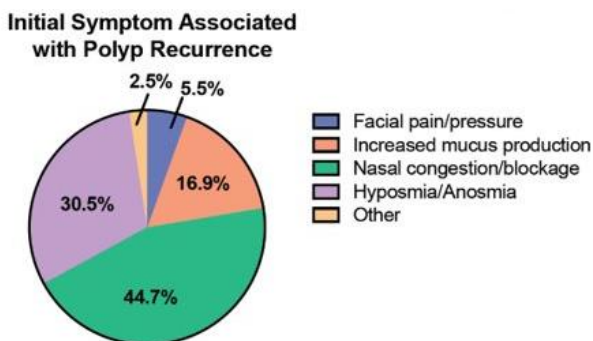
>600 AERD patients completed a survey to assess alcohol-induced symptoms and disease severity. Alcohol-induced upper respiratory, lower respiratory, and skin flushing were reported by 79.6%, 45.1%, and 38.8% of AERD patients. Patients who experienced alcohol-induced respiratory reactions had faster post-operative polyp regrowth, worse baseline sinus disease, and worse asthma control than did alcohol non-reactors.

We are now working hard to figure out exactly WHY patients with AERD get these alcohol reactions!



CLINICAL SYMPTOMS ASSOCIATED WITH POLYP RECURRENCE

Through our AERD registry surveys, we asked patients how quickly they thought their nasal polyps and associated symptoms returned after sinus surgery and what symptoms they noticed first. About 50% of patients reported symptom return within 6 months of surgery, with impaired sense of smell (*hyposmia/anosmia*) and *nasal congestion/blockage* as the two most commonly reported initial signs of polyp recurrence.



DUPIXENT AS A TREATMENT FOR ASPIRIN SENSITIVITY?

CAN DUPILUMAB CHANGE HOW AERD PATIENTS REACT TO ASPIRIN OR OTHER NSAIDS?

Many patients with AERD who are now on Dupixent (dupilumab) have asked whether it might be safe for them to try aspirin or NSAIDs again. While some early research suggests that dupilumab may reduce the severity of these reactions, we do not recommend trying aspirin or NSAIDs on your own. Always speak with your specialist to see if a medically supervised aspirin challenge might be appropriate for you. The AERD team at **Scripps Clinic** in California is currently studying whether dupilumab can change aspirin reactions. They are looking for AERD patients who have been on dupilumab for at least 6 months and are willing to undergo a one-day aspirin challenge. You can learn more about the study and how to get in touch with their team by visiting:

<https://clinicaltrials.gov/study/NCT05031455?Cond=dupilumab&term=aspirin&rank=1>

CURRENT AND ONGOING RESEARCH STUDIES

ONGOING STUDY 1: Mechanisms of benefit of IL-4R α inhibition in AERD ("MARINER" study)

The aim of this study is to determine how the biologic medication dupilumab (anti-IL-4 α) decreases nasal polyps and improves sense of smell in patients with nasal polyps or AERD. We followed 17 adults with nasal polyps who started dupilumab. Clinical data and samples from nasal fluid, nasal polyp biopsy, blood, and urine were collected at baseline, and after 2 weeks and 8 weeks of treatment with dupilumab. All specimens have been collected, and we are now in the process of analyzing the samples to learn as much as we can in the coming year, so more information to come next year!

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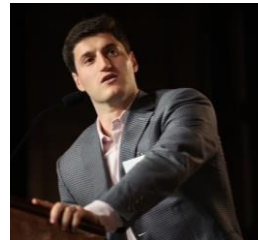
ONGOING STUDY 2: PREDICTING POST-SINUS SURGERY NASAL POLYP RECURRENCE

We are working to identify biomarkers associated with nasal polyp recurrence after sinus surgery in AERD. Nasal polyps can rapidly recur after sinus surgery in some patients with AERD, even if they are on high-dose daily aspirin therapy or using intranasal steroids. We are collecting nasal polyp tissue and nasal mucus samples from patients who undergo sinus surgery at BWH, and we will measure levels of certain proteins, lipids/fats, and cells in these samples to identify factors that predict nasal polyp recurrence. We hope to shed light on the causes of severe nasal polyposis and AERD and (ideally!) to identify new ways to treat AERD and prevent polyps from growing back.

ONGOING STUDY 3: Nasal fluid proteomics for Asthma EndoTyping (NASCENT)

Asthma is a disease with many different causes and many different types of symptoms, but the current approach to figuring out which 'type' of asthma a patient has relies on a limited set of blood biomarkers: IgE levels and eosinophils numbers in the blood. These markers miss many types of asthma and do not help us figure out which treatment could be best for each patient. In this NASCENT study we are evaluating whether or not biomarker levels within the nasal fluid will be more useful to identify and monitor asthma types, compared to the traditional biomarkers in the blood. We will be comparing levels of certain proteins in the blood vs the nasal fluid of patients with asthma. We have enrolled 48 participants thus far (out of a total of 125 planned) and will start to analyze these initial samples soon. Many thanks to any of you who have been part of the NASCENT study already!

NEW STAFF/MEMBERS



Noah Braunstein, BA, MA

Noah graduated from Wesleyan University in 2023 with a BA in neuroscience. He then graduated with an MA from Wesleyan in 2024 in Environmental and Planetary sciences. He is now a clinical research coordinator in the Division of Allergy and Clinical Immunology and the Division of Otolaryngology. Before joining the team, he was a research fellow at the Food and Drug Administration. In his free time, Noah enjoys running and supporting Chicago sports teams.



Carter Segal, BA

Carter graduated in May 2025 from Hamilton College where he majored in Biology. He now works as a clinical research coordinator in the Division of Allergy and Clinical Immunology and is planning to go to medical school in the future. In his free time, he enjoys playing and watching basketball.

WHERE ARE THEY NOW?

After a wonderful two years, Laura Bailey and Rose Corcoran have moved on to medical school.

Laura is attending Tufts University School of Medicine and Rose is attending the University of Maryland School of Medicine.

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