

Take charge of your health today. Be informed. Be involved.

This month, the "Take Charge of Your Health Today" page focuses on asthma and poverty. The Urban League of Greater Pittsburgh's Erricka Hager, health advocate, and Esther L. Bush, president and CEO, spoke about this topic with Bee Schindler, community engagement coordinator with CTSI.

EB: I'm excited that we're revisiting the topic of asthma, Erricka and Bee. Previously, I learned about the large racial disparities with regards to asthma in African American women in Allegheny County. It's upsetting to hear that childhood asthma rates are still frighteningly high in Allegheny County, especially for minority children.

EH: Like you, Ms. Bush, I'm also upset that socioeconomic and racial asthma disparities exist and are negatively impacting minority children. Proper asthma management can be very difficult for families living in poverty. Sally Wenzel, MD, director of the University of Pittsburgh Asthma Institute at UPMC, mentions that asthma management can be overwhelming for families living in poverty because of structural, environmental or physical

Asthma and poverty

barriers. That's why our work is important because it teaches our readers to advocate for themselves by bringing attention to their overall lived experiences.

EB: Absolutely. It's also critical to educate health care professionals to engage in meaningful, holistic conversations with their patients—dialogue that not only captures medical information but also covers information like environmental stressors or limited resources.

BS: Dr. Wenzel mentions that folks in Black and Latinx communities are three times more likely than white people to die from asthma; this pushes us to also challenge the system—racism and oppression have long held disparate outcomes for people who are not white. Think about barriers like access to health care in the community and often living close to toxic industries that pump out air pollutants: These adversely affect people's lives in their homes, outside during play and work



ESTHER BUSH

and at schools.

EH: We've encouraged our readers to discuss their barriers to asthma management. We also want to provide actions that will reduce asthma symptoms in the home. Did you know that washing your bedding in

hot water once a week, vacuuming weekly and reducing clutter can reduce dust mites, which can set off asthma symptoms? Websites like the Environmental Protection Agency (www.epa.gov) offer checklists for identifying asthma irritants in your home.

BS: That's a great resource, Erricka. Although these might seem like regularly practiced housekeeping activities, we want to bring to our readers' attention that these common chores can affect whether or not you experience an asthma attack.

EB: Thanks, Erricka and Bee, for providing our readers with great actionable steps to manage asthma symptoms and to take charge of their own health. I hope our readers will join us at our Dinner & Dialogue series to have the hard discussions and commit to working together to examine the underlying reasons for disproportionate rates of asthma in communities of color and in lower socioeconomic communities and to think about how to make change. I look forward to talking about another important health issue next month—pre-diabetes.

Join us for Dinner & Dialogue in Homewood

Who: The Urban League of Greater Pittsburgh, New Pittsburgh Courier, UPMC Center for Engagement & Inclusion, University of Pittsburgh's Clinical and Translational Science Institute (CTSI), and YOU!

What: The free and open-to-the-public Dinner & Dialogue series will discuss Allegheny County-specific health disparities, current research and resource opportunities. Researchers and community leaders will be on hand to present findings and explore solutions, and the floor will be open to dialogue. Dinner and child care will be provided. There will be panelists and breakout sessions to engage in deeper conversation about disproportionate rates of asthma in communities of color and communities of low-economic status. The event will highlight opportunities for all voices to be heard in the space.

Where: Community Engagement Center in Homewood at 622 North Homewood Avenue, Pittsburgh, PA 15208

When: March 21, 2019, from 5:30-7:00 p.m.

Why: This unique event seeks to boost community health education and advocacy, increase diverse participation in clinical and translational research and encourage individuals to become empowered and actively engaged in their own health and well-being.

RSVP to bos23@pitt.edu with your name, number in your party and whether you have any food allergies. Please let us know if you will require child care. Attendees need not work or live in Homewood to attend this event.



CATHY VITARI, nurse practitioner with the Asthma Institute, performs a breathing test called spirometry at a community event. (Courier File Photo)

Asthma can be managed with medicine and the help of an asthma specialist

Asthma is a chronic disease that causes inflammation and narrowing of the passageways (bronchial tubes) that allow air to enter and leave the lungs. Its symptoms include difficulty breathing, wheezing, shortness of breath and coughing. Because asthma affects nearly 20 million people in the United States—10 percent of adults and 12 percent of children in Allegheny County, according to the Allegheny County Health Department—chances are the disease affects you, a loved one or someone you know.

While asthma has no cure, it can be managed with medicine and the help of an asthma specialist. But the first step is being diagnosed with the disease. Researchers are finding out that there is a wide spectrum of experiences with asthma. Some people have it in childhood and never again as an adult. Some people develop it as an adult. Other people experience significant symptoms multiple times a week. Yet others have symptoms only when exposed to an allergen or have a virus or respiratory infection. As is the case with many other diseases, each person diagnosed with asthma may have different experiences with it.

"Asthma" is a umbrella term—a bunch of clinical conditions get lumped under this term but can bear little resemblance to each other. For instance, some people wheeze and other people are more short of breath with not as much wheezing," says Sally E. Wenzel, MD, professor of medicine and of immunology at the University of Pittsburgh School of Medicine and director of the University of Pittsburgh Asthma Institute at UPMC. "One of the reasons it can be so hard to treat is because, in the past, we tended to classify people as having one disease called 'asthma.'"

Certain groups bear the burden of asthma more than others. The Asthma and Allergy Foundation of America reports that Latinxs and African Americans have the highest rates of asthma in the United States and the highest rates of death from the disease.



SALLY E. WENZEL, MD

African Americans and Puerto Ricans are three times more likely to die from asthma than whites. The Centers for Disease Control and Prevention notes that families that make less than 100 percent of the federal poverty line have an asthma rate of 11.8 percent. Families with incomes more than 200 percent to under 450 percent of the federal poverty line have an asthma rate of 7.4 percent.

Researchers are not certain why asthma disparities and imbalances exist, but they do have ideas. Asthma can be very hard on families living in poverty. They may not have health insurance or be able to afford medicine. Health care providers may not be close to where they live, and transportation can be unreliable and/or expensive. Asthma is the kind of disease that can get worse if it goes untreated or undiagnosed for a long time. Often people with asthma get treatment only when they have symp-

toms bad enough to send them to emergency care. The treatment they receive may be to alleviate symptoms—not to treat asthma in the long-term, says Dr. Wenzel, who is also chair of Pitt Graduate School of Public Health's Department of Environmental and Occupational Health.

Dr. Wenzel also points out that asthma—or even wheezing and coughing—is so common in some communities that people do not always seek help for it, especially when access to health care is also a problem. They get used to the symptoms.

"Some people may not know that asthma can kill you or that there are ways to prevent most kinds of asthma," she says. "When you have limited access to health care and no expectation of feeling better, you don't always demand to see a specialist who's trained to help you manage the disease."

Coupled with living in a region with a legacy of industrial commerce, communities with high rates of poverty often are located near coke or coal-fired power plants, railroad tracks or high-density intersections, which are all contributors to significant air pollution.

One of Dr. Wenzel's aims is to involve representatives of the asthma community in Western Pennsylvania in getting a snapshot of the asthma population in the region. For more than a decade, she has run an asthma registry—Volunteer for AIR (Asthma Institute Research Registry) [<https://pittplusme.org/studyarms/public-details?Guid=4e4179a7-abe1-4998-aab5-ccf69a93208e>—that has more than 2,000 people. People who have been diagnosed with asthma can be a part of the registry, which involves answering health- and asthma-related questions and doing breathing tests.

Overall, Dr. Wenzel urges people with asthma—or people who think they have asthma—to push for referrals to specialists. Specialists can help people avoid asthma triggers and create personal asthma action plans.

Poverty and Asthma Research Opportunities

In addition to the Volunteer for Asthma—AIR study, Dr. Wenzel is also conducting several other asthma studies in which readers can be involved. These studies include one about asthma and sleep—"SIESTA: Solving Insomnia Electronically: Sleep Treatment for Asthma"—and one about severe asthma—"Immune Interactions in Severe Asthma."

Over the years, Dr. Wenzel has observed that people with asthma often have difficulty sleeping. Coughing, wheezing or difficulty breathing disrupts sleep. Sleepiness during the day can lead to being less productive and engaged. The SIESTA study is investigating whether cognitive behavioral therapy can improve people's sleep and asthma symptoms.

The second study examines severe asthma, one of Dr. Wenzel's research passions. She notes that people have severe asthma for different reasons—ranging from lack of access to health care to the fact that traditional asthma medicines are not always effective in treating severe asthma. Dr. Wenzel and colleagues are trying to understand the immune and inflammatory systems in patients with severe asthma. Participants in the "Immune Interactions in Severe Asthma" study are followed for one year and compared with people who have milder forms of the disease.

Interested in learning more about either study? Search for "Pitt+Me" or "University of Pittsburgh Asthma Institute" on your web browser.