FILLING IN THE GAPS

NASA’s Earth-observing satellites, airborne instruments, and ground monitors are used around the world to help assess air quality and potential impacts on human health.

The estimated burden of disease from ambient air pollution using satellite data has focused on mortality from heart disease and lung cancer, but as of 2018, the global impact of these pollutants on asthma risk had not yet been quantified.

Scientists supported by NASA HAQAST (Health and Air Quality Applied Sciences Team) used satellite-observed air quality data, and estimated that ground-level ozone, nitrogen dioxide, and fine particulate matter led to 33 million annual emergency room visits worldwide.

By quantifying this global asthma burden, data can be used to inform public health interventions, especially in areas which lack surface monitors.

Learn more at: go.nasa.gov/3s1Mq2b