

BD Media Accuracy Alert: Including Scientific Data in EtO Coverage

When reporting on ethylene oxide (EtO) in Georgia, it is critical that media outlets present scientifically- based, balanced perspectives on the presence of EtO in ambient air across the United States.

Science should inform decision-making. A balanced story should share the science in full and let the people of the greater Atlanta area draw their own conclusions. In this case, the facts reported by the **U.S. EPA and the Georgia EPD** make clear that background EtO levels in Georgia, including near BD's sterilization facilities, are consistent with background EtO levels measured across Georgia and the U.S.

This is newsworthy. EPA and the Georgia EPD's own data show that people in Georgia are exposed to the same average levels of EtO typically found **across the country** based on U.S. EPA sampling.

Any coverage of the matter related to BD in Covington or Madison should include these facts:

1. In November 2019, updated in March 2020, the EPA released its findings from a comprehensive study it conducted across the U.S.ⁱ The findings:
 - In both urban and rural areas, ambient EtO levels – meaning background levels of EtO – were found to be between 0.2 and 0.4 micrograms per cubic meter ($\mu\text{g}/\text{m}^3$). This means that:
EtO levels in Covington and across Georgia are within range for what EPA has identified as typical background levels found throughout the U.S., including those areas not near industrial sources of EtO. Other areas in the state are also above EPA screening levels, despite their distance from medical sterilizers.
2. The GA EPD also regularly conducts air monitoring throughout metro Atlanta and other areas in Georgiaⁱⁱ. The data show that average levels of EtO in ambient air in Covington, Ga. are generally lower than the levels found in ambient air in the rural General Coffee State Park and levels observed at EPD's background monitoring station in South DeKalb.
 - As it relates to health data, an analysis by Georgia's State Epidemiologist and Chief Science Officer found, "Preliminary analysis of cancer incidence in the zipcode areas near the [sterilization] facilities did not show increased rates of cancer overall, nor for any of the cancers known to be associated with ethylene oxide."ⁱⁱⁱ
3. The EPA's IRIS value for EtO is used to evaluate certain potential risks associated with long-term exposure (defined as 70 years). The IRIS value is not a regulatory action level and not a set level of EtO that is allowed in outdoor air. Based on available materials, no area tested by EPA or the Georgia EPD—including communities without commercial sterilizers—tested below the IRIS screening levels.

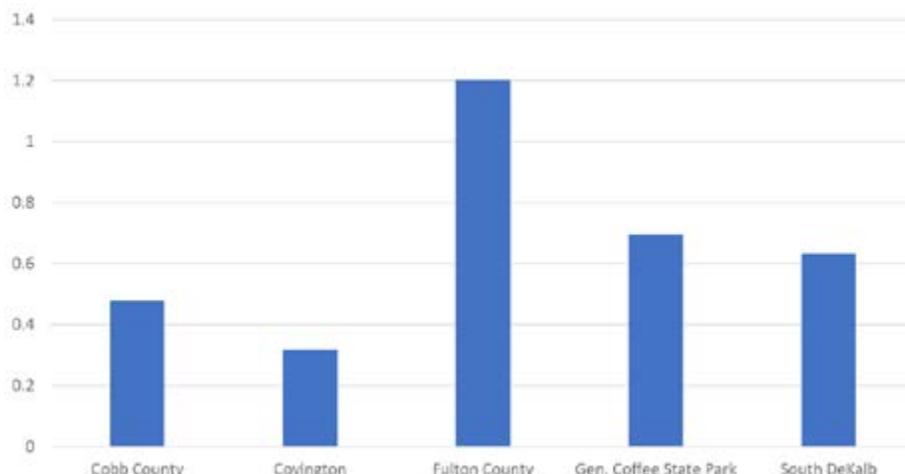
Without discussing these EPA and Georgia EPD results, media coverage of EtO is incomplete.

For your reporting: here are the most recent air monitoring updates

As of December 2020, the latest date for which data is available, average levels of EtO in Covington's ambient air are 0.317 $\mu\text{g}/\text{m}^3$ ^{iv}. They continue to be consistent with typical background levels documented by the **U.S. EPA** in their nationwide study (between 0.2 $\mu\text{g}/\text{m}^3$ to 0.4 $\mu\text{g}/\text{m}^3$). People who work in, live near, or drive by BD facilities in these communities every day are exposed to very ordinary, low levels of EtO.

In addition, the **Georgia EPD** has air monitoring stations in other parts of the State^v. The data show that average concentrations of EtO in Covington, Ga. are generally lower than the levels found in the rural General Coffee State Park and concentrations observed at EPD’s background monitoring station in South DeKalb. According to the Georgia EPD’s own data, average EtO concentrations across the greater Atlanta area are about the same in areas where there are EtO sterilization facilities and areas where there are not EtO sterilization facilities.

Average Background EtO ($\mu\text{g}/\text{m}^3$) – Georgia

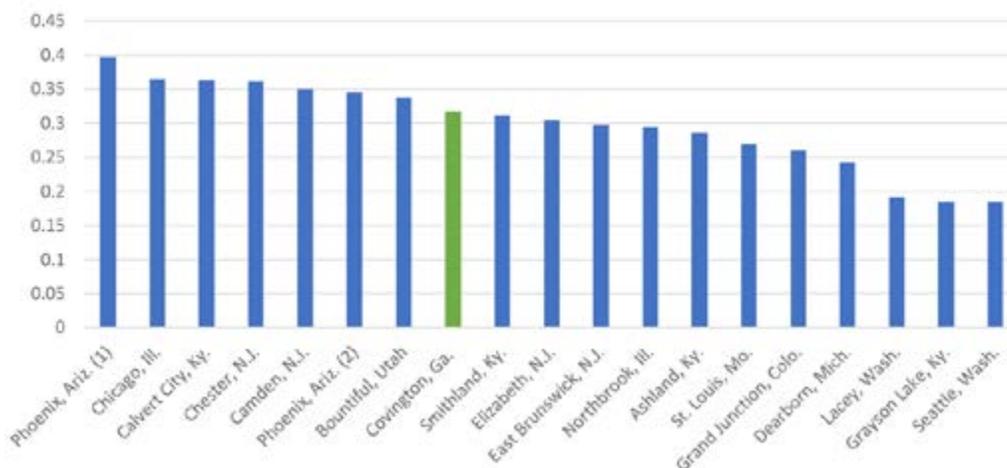


* The Covington, Ga. average is the average of both EPD monitoring data from areas near BD’s sterilization facility and data from a third-party engineering company performing air monitoring around BD’s GDC in Covington, as required by EPD. All raw data available at: <https://epd.georgia.gov/covington-monitoring-results>; <https://epd.georgia.gov/cobb-county-air-quality-monitoring>; <https://epd.georgia.gov/fulton-county-monitoring-results>; <https://epd.georgia.gov/south-dekalb-monitoring-results>; <https://epd.georgia.gov/general-coffee-monitoring-results>; <https://epd.georgia.gov/document/document/bd-gdcn-sampling-summary-results-05-feb-2021pdf/download>

How Does EtO in Covington Compare to The U.S.?

EtO levels measured in ambient air in Covington by the Georgia EPD and BD are consistent with the average background concentrations the EPA found nationwide in urban and rural areas that are not near sterilization facilities.

Average Background Levels of EtO Across the United States



* Green: Average air sampling results from a combination of data from Georgia Environmental Protection Division (EPD) and a third-party environmental consulting firm on behalf of BD. (October 2019 to December 2020)

See Nov. 6, 2019 update at <https://www.epa.gov/hazardous-air-pollutants-ethylene-oxide/ethylene-oxide-updates> and data summary at https://www.epa.gov/sites/production/files/2019-11/documents/data_summary_stations.pdf.

You can also visit etosafety.bd.com for additional information re: EtO and the most recent air monitoring results.

- i. See Nov. 6, 2019 [EPA update](#) and [data summary](#).
- ii. Georgia Environmental Protection Division, 2021. <https://epd.georgia.gov/ethylene-oxide-information>
- iii. Georgia Department of Public Health, 2019. Cancer Surveillance in Georgia. <https://www.epa.gov/smyrna-eto/presentations-community-meetings>
- iv. See [Georgia EPD Covington Monitoring Results](#) and [BD Covington Monitoring Results](#)
- v. See <https://epd.georgia.gov/ethylene-oxide-information>

