Ethylene Oxide: Technical Reviews and Outreach to Potentially Affected Communities

Status Report – Croda, New Castle, Delaware

First Quarter 2021 Update

As EPA pursues its mission to protect public health and the environment, addressing ethylene oxide remains a major priority for the Agency. EPA's National Air Toxics Assessment (NATA), released in August 2018, identified a number of areas of the country where risks of cancer were potentially elevated because of ethylene oxide emissions. NATA estimated risk based on emissions from 2014, which were the most recently available at the time.

Because NATA is a screening-level analysis, additional work is needed to better understand emissions in areas NATA identifies as potentially having elevated risk, and to identify opportunities for early reductions at individual facilities, while EPA reviews its regulations for industries. EPA is supporting its state air agency partners in that work.

In January 2021, EPA posted a status report describing the technical analysis and outreach work conducted for Croda in New Castle, Delaware. This document summarizes any additional work conducted in the first quarter of 2021.

Outreach updates:

The Delaware Department of Natural Resources and Environmental Control (DNREC) has been the lead in reducing emissions at Croda.

- In January 2021, Croda restarted the facility in order to conduct stack testing. While testing showed that the company was back in compliance with the EtO emissions, it revealed violations for nitrogen oxide (NOx) at the ethanol dehydration furnace (EDF). Further violations were detected at the catalytic combustion unit (CCU) for carbon monoxide (CO), volatile organic compounds (VOCs) and particulate matter (PM
- A virtual public information session was held March 3, 2021, by DNREC to answer questions and take community comments about Croda's operations and about the settlement agreement with DNREC.
- Region 3 will be reaching out to DNREC discuss potential options to mitigate emissions in the overburden communities nearby Croda and will also plan to engage those communities in the discussions.