



Stop EtO in Lake County

Are you a new member to our group? Welcome!

Here is what has happened since we found out about EtO emissions in Lake County:

- 1) We were made aware of Ethylene oxide (EtO) emissions in our air from Michael Hawthorne's Chicago Tribune article, published Nov 2, 2018:

<https://www.chicagotribune.com/news/breaking/ct-met-lake-county-cancer-risks-pollution-20181028-story.html>

Michael Hawthorne has since published many more articles on this environmental subject. You can find them here: www.stopeto.com

EtO is an odorless gas which is used to sterilize materials and produce some consumer products. It sterilizes by attacking and damaging the DNA of organisms, including humans. This makes it a dangerous Class 1A carcinogen.

Two facilities are releasing it in Lake County: Vantage Specialty Chemicals in Gurnee, IL and Medline Industries in Waukegan, IL. Medline uses EtO to sterilize medical supplies. Vantage uses it for non-medical products.

- 2) By mid-November 2018, the group **Stop EtO in Lake County** was formed. Today, our core team is comprised of working professionals: doctors, scientist, teacher, executives, IT, realtor, and attorneys. Above all we are parents and concerned neighbors. Our mission is to stop emissions of EtO near our homes and schools. Our group has 3 goals:
 1. Raise awareness of EtO emissions.
 2. Get air testing around Vantage and Medline.
 3. Influence legislation to eliminate EtO emissions.

- 3) From mid-Nov 2018 through end-Feb 2019, our group members:

1. Made numerous phone calls and emails to the US EPA and IL EPA demanding air testing. Both agencies kept directing us to each other; no commitments for testing were ever made.
 2. Attended bi-monthly village board meetings at the Village of Gurnee demanding independent air testing to be done. We were told 'NO'.
 3. Held monthly town meetings, either in Gurnee or Waukegan, to educate the public on EtO emissions and spread awareness.
 4. Started to crowdfund for the purpose of raising awareness. We purchased t-shirts, yard signs, buttons, magnetic car stickers for this purpose.
- 4) At end of Feb 2019, we attended a Waukegan City Council meeting and requested independent air testing from the aldermen and Waukegan Mayor. We were pleasantly surprised when the Waukegan leaders said "Yes, testing is the right thing to do".
- 5) On Feb 28th, 2019, the Waukegan leaders met with, IL EPA, Lake County Health Officials (LCHD), and the town of Gurnee to discuss air testing. They decided the air testing costs were going to be equally split between Waukegan, LCHD, and Gurnee.
- 6) At the end of March 2019, LCHD announced that independent air testing would commence in early June 2019.

On March 28th, 2019, one of our members, Diane Mundelein, traveled to Washington DC to testify in the Congressional hearing for the proposed amendment on the HCL regulation, pertaining to the risk assessment on ETO. (The current EPA administration was trying to slip and hide EtO regulations inside HCl regulations, hoping no one would pay attention. Unfortunately for them, we were paying attention. Our legal representatives also sent them a full letter regarding this hearing - the full letter is attached to Files folder on this page). This trip was sponsored by community crowdfunding - thank you to those who supported us!

- 7) In mid-April, the Vantage facility finished installation of emission controls (scrubbers), which are supposed to eliminate 99.9% of EtO from being released in the air.

8) Between March – June 2019, the *Stop EtO* team focused on influencing and supporting the passage of legislation to regulate EtO emissions. We worked closely with our elected Senators and Representatives. In June 2019, the following IL laws were passed by both chambers and signed into law from Gov Pritzker:

- SB1852 (The Matt Haller Bill) – This senate bill addresses EtO emissions from sterilization companies. The bill requires installation of equipment intended to control emissions of EtO and requires regular air monitoring and reporting of emissions to Illinois EPA. The bill was also intended to “prohibit the renewal of any permits for facilities that violate federal or state standards for ethylene oxide emissions. Furthermore, it prohibits the use of ethylene oxide by any facility that has had egregious violations requiring a seal order.” This bill was supported and influenced by our counterparts Stop Sterigenics team in Willowbrook, IL.

<http://ilga.gov/legislation/billstatus.asp?DocNum=1852&GAID=15&GA=101&DocTypeID=SB&LegID=119501&SessionID=108>

- SB1854 – This senate bill addresses EtO emissions from manufacturing companies and caps annual emissions from stacks at 150 pounds of ethylene oxide. This bill was supported and influenced by *Stop EtO* in Lake County, IL.

<http://ilga.gov/legislation/billstatus.asp?DocNum=1854&GAID=15&GA=101&DocTypeID=SB&LegID=119503&SessionID=108>

The passage of these bills was not an easy feat. It took countless hours of phone calls, letters, postcards, signing witness slips, and general community activism. Lawmakers in Springfield had over 900+ bills for this legislative session, each bill fighting for priority over all others. The EtO emission bills needed to be priority #1. This was our biggest challenge.

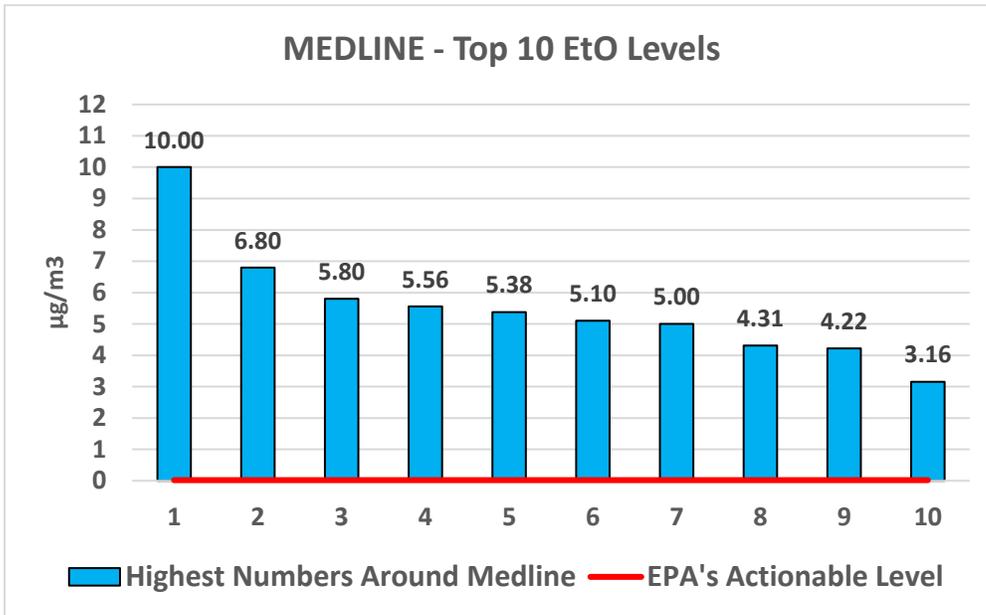
These bills make IL one of the strictest states to regulate EtO emissions. We were very fortunate to have the backing and full support **of all** our elected legislators during this time, most notably from **IL Senator Melinda Bush** and **Representative Joyce Mason**. Without their guidance, patience, and full support, these bills would have never become law.

However, there is still a whole lot more work to be done. We fully understand that this is a marathon, not a sprint. Change is incremental. Our interests for clean air were/are/will be in direct conflict with the interests of industries to keep polluting.

- 9) On June 2019, LCHD paid (Gurnee/Waukegan/LCHD 3-way split) for an independent contractor to perform air testing around Vantage and Medline. Testing lasted for the entire month of June 2019. Samples were collected on average 1-every-3 days, for a total of ~10 days).
- 10) On July 8th 2019, *Stop EtO* core members met with Directors and scientists from US EPA Region 5, along with LCHD, to discuss air testing in Lake County, IL. We discussed the number of canisters and canister locations, how we considered the testing inadequate, and discussed the initial observed air testing results. During this meeting, *Stop EtO* expressed concerns that the planned air monitoring was not adequate for several reasons including that the number of canisters and the canister locations were not sufficiently accurate to register the actual levels of EtO emissions, and that the very short duration and number of days of data collection were also insufficient for meaningful results.
- 11) The final air testing results were published on August 14, 2019, 40 days after the last testing was concluded.¹ The results are troubling. The full set of results can be found here:
 - US EPA considers EtO concentrations at 0.02 µg/m³ as the actionable level threshold¹.
 - **Medline:**
Canisters² placed near Medline recorded extremely high levels of EtO emissions. For example, on June 7, 2019, the level detected was 10 µg/m³. That is 50-times higher than the EPA's actionable level of 0.02µg/m³.² Other high readings near Medline included: 6.8 µg/m³ on June 6, 2019; 5.8 µg/m³ on June 17, 2019, 5.56 µg/m³ on June 21, 2019, 5.38 µg/m³ on June 17, 2019, 5.1 µg/m³ on June 21, 2019, and 5 µg/m³ on June 21,2019. *Stop EtO* in Lake County requested that Medline shut down its EtO operations until it can prove it no longer endangers public health.

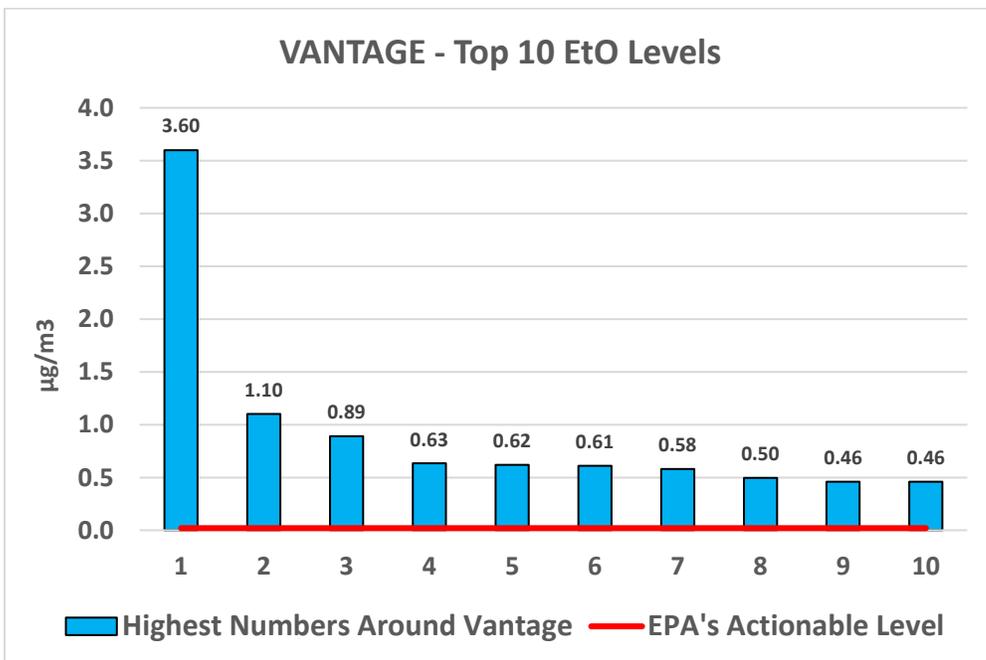
¹<https://www.epa.gov/il/ethylene-oxide-emissions-frequent-questions>

² <https://www.lakecountyil.gov/4188/EtO-Monitoring-Results>



- **Vantage:**

Dangerous emissions levels were also recorded near Vantage. For example, a canister near Vantage recorded emissions at 3.6 µg/m³, or 180-times higher than the EPA's actionable level of 0.02 µg/m³. Other readings near Vantage included: 1.1 µg/m³ on June 15, 2019, 0.89 µg/m³ on June 21, 2019, 0.633 µg/m³ on June 30, 2019, 0.62 µg/m³ on June 15, 2019, 0.61 µg/m³ on June 7, 2019, 0.58 µg/m³ on June 30, 2019. (Reminder: Vantage already had emission controls installed in April 2019, months prior to testing).



- A total of 201 data points were collected; of those, 48 data points or 40% were recorded as ND (non-detectable) or uninterpretable. In contrast, both Medline and Vantage conducted air monitoring on some of the same dates and locations as the LCHD testing. Out of 75 data points collected by Medline and Vantage themselves, only 2 data points, both from Vantage, or about 4% were ND. This strongly suggests a problem with the LCHD testing and makes it impossible to draw any meaningful conclusions about non-detects.
- Putting aside the questionable NDs and uninterpretable readings, all but six of the readings were higher than U.S. EPA's 0.02 µg/m³ actionable level. Further, the new control equipment was installed at Vantage in April 2019 and is clearly not protecting the public. Likewise, Medline apparently installed some control equipment in early June and the dangerous readings continued.

The recorded levels of EtO that were measured are alarming. These emissions are orders of magnitude higher than what the US EPA considers "actionable".

Stop EtO organized multiple rallies in Gurnee, Waukegan, and Libertyville, to demand Medline to immediately shut down EtO operations, until they no longer endanger public health. A similar request in light of the disturbing results was also made from **Congressman Brad Schneider**, immediately after the results were published from LCHD.

Stop EtO demanded from LCHD to continue testing longer for an additional 30-60 days. The request was denied.

12) August 8th, 2019, Medline requests a permit, from the City of Waukegan Planning and Zoning Commission, to increase its stack height from 60 feet to 85.3 feet. This will require a variance from Waukegan's zoning plan. The hearing was held at Waukegan City Hall. The purported purpose of increasing the stack height is to disperse Medline's EtO emissions farther away from its facility. The Waukegan Planning and Zoning Commission also heard the stern objections raised by Stop EtO and members of the community. After lengthy deliberation, the committee correctly voted to deny recommending the stack height increase. *Stop EtO* was very pleased with this decision.

An increased stack height would not reduce EtO emissions. It would only ensure emissions are dispersed farther out into the surrounding communities. And, in addition to possibly increasing

the number of people exposed to EtO, there is no guarantee that the emissions will be under the 0.02 ug/m³ actionable level. The increased stack height is untested. So, more people will be exposed with no assurance that the emissions will not be dangerous to their health. Maintaining the same stack height will ensure that any air testing performed after emission controls are installed by Medline, would make it possible to determine if the controls are efficient in reducing pollution or not. Adding another variable (taller stack) would make it harder to ascertain whether the control emissions worked or not.

A taller stack will not solve the emissions problem. Quite simply, the proposed stack height will have no effect on the volume of ethylene oxide emitted from the Medline facility. Instead, it will spread the EtO over a broader area, increasing exposure risks to more residential communities. Remember: **Dilution is not the solution to pollution.**

This vote was not a final decision on the permit request. The Waukegan Planning and Zoning Commission can only recommend/not recommend that the permit request be granted. The final decision will be voted on by Waukegan City Council on September 3, 2019 at 7:00 PM at the Waukegan City Council.

Stop EtO and members of the community will be urging the Waukegan City Council on September 3rd to uphold the decision of the Planning and Zoning Commission.

Please join our voices on September 3, 2019 at 7:00 PM at the Waukegan City Hall.

13) Stop EtO requested from LCHD to organize a Townhall public meeting in order to:

- Explain to Lake County residents what the air test results mean
- Notify residents of the next action steps

ATSDR is currently using the EtO air monitoring results as inputs to conduct a cancer study for Lake County. This study may take 8+ months to complete. Please contact LCHD and your Lake County Board Member and demand from them a public Townhall meeting to be scheduled *now*. We deserve it. Our taxes paid for this air testing. We need to know what these values mean and what our next step will be.

14) Looking back at these past 10 months, here is the status of our achievements thus far:

Goal 1: Raise awareness of EtO emissions

This effort is currently ongoing. We started with 30 people in our Facebook page in Nov 2018. Then, almost no one had ever heard the name 'ethylene oxide'. Now, there are currently 1500+ FB members.

From our non-scientific record keeping, about ~30% of Gurnee & Waukegan residents can now recognize the chemical name and associate it with the toxic gas they've heard from Sterigenics in Willowbrook, IL or can recognize our branding "Stop EtO". There is a whole lot of work yet to be done.

A side effect of spreading awareness to the community is that both Vantage and Medline have since been installing better emission controls. These would not have happened had we stayed quiet.

*****Change only happens when people show up*****

Goal 2: Get air testing around Vantage and Medline

This effort was successful, albeit not at the span and breadth we had advocated. The testing was a fraction of the testing done in Willowbrook. (We had low number of canisters around each facility, and a very short testing time).

Goal 3: Influence legislation to eliminate emissions

This effort was widely successful, considering a handful of parents were taking on a multi-billion-dollar industry. We have many more hills to climb, as far as legislation goes. And we cannot do it without the community's support.

Did we mention that Stop EtO is now a non-profit 501(c)4 organization?

100% of contributions go towards raising awareness (to purchase merchandise, yard signs, t-shirts, banners, etc.) and to funr children to breathe clean air, free of carcinogenic EtO gas.