

Matthew Mehalik, Ph.D.
Executive Director
Breathe Project
Energy Innovation Center
1435 Bedford Ave. Suite 140
Pittsburgh, PA 15219
412-514-5008
mmehalik@breatheproject.org
breatheproject.org

June 9, 2021

Remarks for Public Comment

Allegheny County Health Department
Air Quality Program
Re: Regulation Comment
301 39th Street, Bldg. 7
Pittsburgh, PA 15201-1811

Submitted via email to: aqcomments@alleghenycounty.us

Ref. Comments on Proposed Amendments to Article XXI, Air Pollution Controls, County Ordinance 16782, §2106.06, “Mon Valley Air Pollution Episode” and §2105.50, “Open Burning.”

Dear ACHD Board of Health Members and Staff:

Thank you for holding this hearing. The Breathe Project wants to thank ACHD for the opportunity to share our assessment of the updates to the Air Pollution Episode and Open Burning regulations.¹ In Allegheny County, we should feel confident knowing that the air we breathe will not make us sick or cause cancer, asthma, or other diseases. We have the right to live and work in clean, safe-and healthy environments. Everyone knows that air pollution is bad for your health. No one wants to breathe dirty air, get sick, or to see our children, our parents, our friends, neighbors, or our colleagues get sick or die before their time.

Thank you for your commitment to improving communications with our community about ongoing, periodic, health-threatening air pollution episodes. We support ACHD’s efforts to respond to the large number of times our community’s air quality frequently ranks among the worst in the US by communicating more effectively with residents when bad air episodes are forecasted and/or are occurring and by requiring polluting entities responsible for these episodes to modify their operations to mitigate these events. We know that these events frequently occur in the overnight or early morning hours when

¹ Proposed Revision to: Allegheny County’s portion of the Pennsylvania State Implementation Plan for the Attainment and Maintenance of the National Ambient Air Quality Standards (Revision Tracking No. 97), Allegheny County Health Department Rules and Regulations Article XXI, Air Pollution Control §2106.06, Mon Valley Air Pollution Episode (new) and a related change to §2105.50, Open Burning, as published on the ACHD website: https://www.alleghenycounty.us/uploadedFiles/Allegheny_Home/Health_Department/Programs/Air_Quality/20210505-Mon-Valley-Air-Pollution-Episode-Rule.pdf, viewed June 9, 2021.

atmospheric conditions, in the form of temperature inversions and low wind velocity conditions trap pollution emitted overnight by industrial operators.

Based on EPA's Highest-10 NowCast AQI Locations data, which tracks which regions of the country rank in the top-10 worst airsheds, based on Air Quality Index information on an hourly basis, our county has appeared on this top-10 worst list over 40 times since March 21, 2021, the beginning of spring.² That is half of the number of days since the beginning of spring. When people want to go outside and take a walk in the morning, about half of the time they are confronted with terrible air quality compared with the rest of the country. Hopefully these updates to the regulations can help mitigate this frequent situation.

Our county regularly sees exceedances of the state's 24-hour H2S standard specifically at the liberty monitor in proximity to the Clairton Coke Works and integrated Mon Valley Works facilities, all of which use coke oven gas generated at the Clairton Coke Works. According to ACHD's own report, our region has experienced nearly 50 days per year on average over the past 20 years (1999 – 2019) where the liberty monitor recorded exceedances of the 24-hour H2S standard. More notably, there have been no noticeable improvements in meeting this standard over this 20-year period of time. The average number of days with exceedances over the past five years is 51 days. The range spans between 35 and 85 days per year over this five-year period. This is nearly identical to the range over the past 20 years.³ This alone tells us that something about the existing regulatory, enforcement, and inspection framework requires modifications to prevent these ongoing events.

For the 2020 period, during which there was a pandemic and during which the Clairton Coke Works had been apparently operating at reduced levels beginning in November 2019,⁴ the state's 24-hour H2S standard was still exceeded at least 26 days, based on preliminary data.⁵

To date in 2021, there have been at least 24 exceedances of the 24-hour H2S standard based on preliminary data. At mid-year, it appears that the region is reverting to its long-term mean performance.

The SmellPGH app recorded over 19,000 smell complaints in 2020 despite notable reductions in traffic pollution. The vast majority of these complaints attach the descriptors, "rotten egg," "sulfur," and "industrial."

It is clear that our county's air pollution regulations, inspections, and enforcement all need to become more robust, strident, and effective. For these reasons the Breathe Project encourages ACHD to maximize its efforts to protect the health of Mon Valley and Allegheny County residents by finalizing moving forward with these episodic regulations with the following suggestions to strengthen them:

² EPA Highest NowCast AQI Locations, Available online: <https://www.airnow.gov/national-maps/>, viewed June 9, 2021.

³ ACHD, "2019 Air Quality Annual Report. Available Online: https://www.alleghenycounty.us/uploadedFiles/Allegheny_Home/Health_Department/Resources/Data_and_Reporting/Air_Quality_Reports/2019-Air-Quality-Annual-Report.pdf, accessed January 20, 2021.

⁴ "U.S. Steel hot idling a battery at Clairton Coke Works," WPXI.com. Available Online: <https://www.wpxi.com/news/top-stories/clairton-coke-works-us-steel-hot-idling-a-battery-at-clairton-coke-works/1004111989/>, accessed January 20, 2021.

⁵ "Mon Valley Residents Suffer Another Bout of Bad Air as Allegheny County Sees 3 More Air Quality Exceedances," GASP Blog, December 14, 2020. Available Online: <https://gasp-pgh.org/2020/12/14/mon-valley-residents-suffer-another-bout-of-bad-air-as-allegheny-county-sees-3-more-air-quality-exceedances/>, accessed January 20, 2021.

1. The communications aspect of the regulations has its geographic scope set too narrowly on the Mon Valley. It should be expanded to include communications that are directed county-wide.

The conditions during which the early-morning high pollution episodes occur most often feature low-velocity southerly winds. These winds frequently move the pollution, trapped near the surface by inversions, directly into some of the most densely populated portions of Allegheny County, including the heart of the City of Pittsburgh, as documented on Plumepgh.org.⁶ This means that watch and warning notices should go out to all people in Allegheny County so that everyone can prepare to protect themselves. This sort of notice mirrors the message of ozone action days, which are broadcasted region-wide. The effect will be to protect people affected by pollution that may start in the Mon Valley, but migrates into the city and across the county.

2. The regulations should provide more public transparency on how the pollution mitigation plans, which emitters are required to submit, will be evaluated in terms of their predicted effectiveness at reducing PM 2.5 pollution.

The current draft provides too little specificity about what emitters should prioritize in terms of mitigating their emissions during the watch and warning events in terms of predicted effectiveness. ACHD should consider the information that is provided in each facility's permit to evaluate each facility's sources of emissions in terms of the scale of the source of emissions and the feasibility for short-term operational changes to mitigate those sources. ACHD should consider making available to the public an assessment of the scale and feasibility of each of these plans, with proprietary information protected, but a scaled overall score in the form of a percentage, of predicted effectiveness as public information. A floor of at least a predicted 10 percent reduction during forecasted/watch events and a 20 percent reduction during warning events should be required.

3. The regulations should provide more public transparency on how the mitigation plans will be evaluated as to their actual effectiveness in terms of verification of execution as well as impacts on reduction of pollution.

Similarly, ACHD should specify how it will review data that it receives from polluting facilities as part of these facilities' permit requirements will be used to evaluate whether these sources deployed their plans to achieve the predicted reductions as specified in the plans. ACHD should consider providing a publicly-available score of performance in terms of predicted versus actual reductions. This score should be a percentage of actual reduction achieved as compared with the predicted reduction in the plans.

4. The regulations should provide more public transparency as to how they will be revised once they are determined to require revision.

ACHD should also provide information about how different effectiveness achievement scores mentioned in the prior suggestions (#2 and #3) will be used to communicate with polluting facilities that either their predicted plan and/or actual mitigation performance requires revisions and improvements in their plans. This information should be made available to the public to review. A floor of a minimum of an 80 percent achievement of actual reductions versus predicted should be required.

5. The regulations should expand the mitigation requirements to a larger geographic region in Allegheny County to cover the region's second most polluting airshed, the Neville Island area,

⁶ Plume Pgh., Available Online: <https://plumepgh.org/?date=2021-04-08>, viewed June 9, 2021.

because of the frequent, documented air pollution problems that occur in that geographic sub-region.

Even though the bulk of the episodes show the highest impacts at the Liberty, Braddock, and Parkway monitors, the Lawrenceville and Avalon monitors also records high levels of PM 2.5 that drives the Air Quality index for the region enough times to consider the need to revise the regulations to make them applicable to the Neville Island airshed sub-region, including during night-time inversions. The Lawrenceville monitor drove the regional AQI , based on PM 2.5, 216 days out of 1096 days (20% of the time) over the 3-year period of 2016 – 2018. Similarly, the Avalon monitor drive the AQI, based on PM 2.5, 41 days (5% of the time) over the same period. This information points to the need to expand the program to the region’s second most polluted airshed in the region.

The Breathe Project encourages ACHD to move forward aggressively with these episodic pollution regulations based on the recommended improvements documented in these comments. Let’s save lives, reduce burdens on vulnerable people, preserve future generations’ rights to clean air and a healthy climate, and take action that makes everyone proud.

Thank you for your time and consideration.

Sincerely,

Matthew M. Mehalik, Ph.D.
Executive Director
Breathe Project