



The Chemours Company
Fayetteville Works
22828 NC Highway 87 W
Fayetteville, NC 28306

December 20, 2018

Michael Abraczinskas
Director, Division of Air Quality
1641 Mail Service Center
Raleigh, NC 27699-1641
michael.abraczinskas@ncdenr.gov

Re: Submission of Test Methods and Lab Standards for PFAS in Facility Air
Emissions Pursuant to Proposed Consent Order Paragraph 9

Dear Mr. Abraczinskas,

Pursuant to the requirements of paragraph 9 of the proposed Consent Order, Chemours is hereby providing the Division of Air Quality (“DAQ”) with all of the presently known analytical test methods and lab standards for PFAS compounds in air emissions from the Fayetteville Works. Although the proposed Consent Order has not yet been entered by the Court, Chemours is continuing to proceed on the schedule set forth in the proposed Consent Order with respect to these requirements. We are also providing notice as set forth in the proposed Consent Order.

Historically, we have identified specific PFAS compounds in our facility’s air emissions based on process, engineering, and chemistry knowledge. And, as you are aware, each year, in our Annual Emission Inventory report to DAQ, we have provided our estimated emissions calculations for all of these specific PFAS compounds on a compound-by-compound basis.

This year, newly developed analytical test methods and lab standards allowed us to quantify the actual amounts of three specific PFAS compounds in our facility’s air emissions—namely, HFPO Dimer Acid (CAS No. 13252-13-6), HFPO Monomer (CAS No. 428-59-1), and E1 (CAS No. 3330-15-2). As you know, we reported to DAQ on the emissions of these compounds measured during the several stack testing events conducted at our facility in 2018.

The enclosed documents, as detailed on the following page, provide the sample extraction protocol, preparation method, and analytical methods for HFPO Dimer Acid, HFPO Monomer, and E1, used to enable the measurement of these compounds in the samples collected during stack testing. The lab standards for these compounds were purchased from external vendors and are available online.¹

¹ See <http://synquestlabs.com/product/id/17276.html> (2-MTP), <http://synquestlabs.com/product/id/52427.html> (HFPO Monomer),

Finally, I would like to highlight that Chemours is also currently in the process of performing innovative non-targeted analysis on retained extracted stack sampling solutions in order to identify and potentially quantify additional PFAS compounds in air emissions from the Fayetteville Works. We are proceeding with this non-targeted analysis notwithstanding that the thermal oxidizer being installed at our facility in 2019 is expected to destroy 99.99% of the emissions of PFAS compounds routed to it. Once complete, we will share the results of our non-targeted analysis with DAQ.

If you have any questions, please contact me.

Sincerely,



Brian D. Long
Plant Manager
Chemours – Fayetteville Works

Enclosures

“Extraction of Perfluorooctanoic Acid (PFOA) and Perfluorooctanoic Sulfonate (PFOS) and other Perfluorinated Hydrocarbons (PFCs) in Water and Soil” (“Extraction Protocol.pdf”)

“Extraction of 2,3,3,3-tetrafluoro-2-(1,1,2,2,3,3,3-heptafluoropropoxy)propanoic acid (HFPO-DA) in Method 0010 Sampling Trains and Surface Wipe Samples” (“HFPO Dimer Acid Preparation Method.pdf”)

“Analysis of Perfluorooctanoic Acid (PFOA) and other Perfluorinated Hydrocarbons (PFCs) and Perfluorinated Hydrocarbon Sulfonates (PFSs) in Water and Soil by LC/MS/MS” (“HFPO Dimer Acid LCMSMS Method.pdf”)

“Determination of Volatile Organics by GC/MS Based on Method 8260B” (“GC Method for E1 and 2-MTP (HFPO Monomer).pdf”)

<http://synquestlabs.com/product/id/19306.html> (E1), and <http://synquestlabs.com/product/id/18551.html> (HFPO Dimer Acid). Note that 2-MTP is the compound formed and analyzed for when HFPO Monomer is sampled in methanol.

Cc:

Sheila Holman, DEQ

William F. Lane, DEQ

Francisco Benzoni, NC DOJ

Michael Scott, DWM

Linda Culpepper, DWR

David C. Shelton, Chemours

John F. Savarese, WLRK

Kemp Burdette, CFRW

Geoff Gisler, SELC