VERMONT

Vermont Department of Environmental Conservation *Agency of Natural Resources*
Drinking Water and Groundwater Protection Division
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Montpelier, VT 05620-3521
http://dec.vermont.gov/water

Date: July 18, 2019

SUBJECT: **Required statewide sampling for perfluoroalkyl and polyfluoroalkyl substances (PFAS)**

Dear Public Water System Contact:

You are receiving this letter because you are listed as a contact of at least one non-transient non-community (NTNC) or public community water system (PCWS) and under recent legislation, all PCWS and NTNC systems in Vermont are required to sample for perfluoroalkyl and polyfluoroalkyl substances (collectively referred to as PFAS) by **December 1, 2019**. Senate Bill 49, passed by the General Assembly this year and signed by the Governor in May (and now known as Act 21), requires all PCWS and NTNC public water systems to sample for PFAS, issue public notice including a "Do Not Drink" notice to users if levels above 20 parts per trillion (ppt) are confirmed, and remedy the situation. This letter provides information necessary to comply with these requirements.

The Drinking Water Program is providing training in conjunction with Vermont Rural Water Association (VRWA) in late July and August 2019 on why this legislation was passed, how to properly take a PFAS sample, what labs are available for analysis, and what to do about it if results exceed 20 ppt. We are also providing this and other information on our website, which can be found at: https://dec.vermont.gov/water/drinking-water/water-quality-monitoring/pfas. In addition, the State of Vermont is providing municipalities and municipally-owned schools an opportunity for purchasing the services of a contractor who is skilled in the correct sampling of PFAS; these services are estimated to become available on or before August 1, 2019. Once the contract is awarded the list of selected contractors will be published to the web address listed above.

Background

Three years ago, widespread contamination of PFAS in private wells (primarily PFOA, one of 4000+ PFAS compounds) in North Bennington and Bennington was discovered. While extensions of public water systems provided safe water to those citizens, the State of Vermont realized that other parts of the state could be impacted and began a monitoring program to assess the extent of PFAS contamination in Vermont. These efforts are continuing. So far, we have learned that significant fire foam use (known as AFFF) can contaminate the environment, as well as certain manufacturing processes (an example is wire coating). Because consumer products containing PFAS are widely used, PFAS has also been found in leachfields and larger wastewater treatment plants.

An EPA study of PFAS, conducted in 2013 through 2015 at a dozen Vermont public water systems, did not find PFAS. However, there are approximately 650 PCWS and NTNC systems that we do not have information for the majority to say whether they are safe or not. Laboratory detection levels have improved, and we are now able to consistently and reliably determine if levels exceed the 20 ppt interim standard required by the General Assembly. Because of the lack of information on public water systems, the legislature thought it was important to sample at PCWS and NTNCs to ensure safety.

In addition to the requirement for PCWS and NTNC systems to test for PFAS by December 1st of this year, Act 21 requires the Agency of Natural Resources to establish a Maximum Contaminant Level (MCL) in the Water Supply Rule. As part of the formal rulemaking process the Drinking Water Program anticipates that a draft rule will be available in October on our website, identified above, for public comment.

Interim Standard PFAS monitoring - further details

The list below outlines specific information you should use to meet the December 1, 2019 PFAS sampling requirement:

- Monitoring is required representing treated water at each point of entry to distribution. This is the same sampling location for IOCs, VOCs, SOCs, and Radionuclides. A revised 2019 monitoring schedule will be posted online and available on the Vermont Drinking Water Database Search page at **https://anrweb.vt.gov/DEC/DWGWP**. All public water system data, including PFAS, can be found on this website. If you are unable to access your monitoring schedule, have questions about your monitoring locations, or would like a paper copy of your schedule mailed, contact Janelle Wilbur at janelle.wilbur@vermont.gov or (802) 585-4898. A state email to the water system contacts with information contained in this letter, will follow shortly.
- 1 part per trillion (ppt) is equal to 1 nanogram per liter (ng/L).
- If you choose to sample yourself, and not purchase the services of the State's sampling contractor, it is important that you use good sampling technique. Given the low concentration of the standard, and the widespread presence of PFAS in the environment, it is quite possible to contaminate the sample ("false positive"). You will find proper sampling technique guidance enclosed. You can also locate and register for classroom training through VRWA on their website at http://vtruralwater.org/training/schedule.php.
- Samples must be analyzed using EPA Method 537.1 by a laboratory with NELAP certification to perform that method. The list of acceptable labs can be found on the NELAP website at https://lams.nelac-institute.org/ and search by selecting method EPA 537.1. A current list of certified labs is also enclosed. Labs must have a reporting level no higher than 2 ng/l for these 5 PFAS compounds: **PFOA** (perfluorooctanoic acid), **PFOS** (perfluorooctane sulfonic acid), **PFHxS** (perfluorohexane sulfonic acid), **PFHpA** (perfluoroheptanoic acid), **PFNA** (perfluorononanoic acid).
- Samples will be rejected if they do not meet the 2 ng/L reporting level. The reporting level needs to be this low to assure that quantification to 10 ng/l (half the value of the 20 ng/L standard) can be done.
- All 18 of the analytes, including the 5 PFAS listed above, under EPA Method 537.1 must be analyzed by the certified lab and reported to the Drinking Water Program. PFAS lab reports can be emailed to **ANR.DWpfasdata@vermont.gov**. Lab reports should be submitted within 10 days of receiving sample results. Please note that only PFAS data can be submitted through email to this address. All other data must be submitted to the Drinking Water Program through US mail or fax.
- Proper sampling protocol requires both a "trip blank" and "field blank" to determine if potential detections are due to sampling error or handling. When the analytical lab sends your sampling bottles, the trip blank will be delivered at the same time (much like a VOC sample). The lab will also include a bottle of reagent water and extra sample bottles to prepare the field blank at each entry point sampling location. You will find instructions for proper preparation of field blanks in the enclosed guidance.
- The required sampling is considered initial monitoring for PFAS. Future monitoring frequencies will be determined based on the sample results and prior PFAS sampling data not analyzed by Method 537.1 will not be accepted.
- If sample results for the 5 PFAS identified above are at or exceed 20 ng/l (or ppt) either individually or cumulatively, please contact Janelle Wilbur at 802-585-4898 or janelle.wilbur@vermont.gov.

If you have any questions on the requirements contained in this letter, please contact Jeff Girard at (802) 585-0314 or jeff.girard@vermont.gov.

Sincerely,

Bryan J. Redmond

Bryan Redmond, Director
Drinking Water and Groundwater Protection Division

Enclosures: PFAS Sample Collection Guidance, PFAS Laboratory and Reporting Guidance, Current EPA 537.1 NELAP Certified Labs List