



The Mount Vernon Council of Citizens Associations, Inc.

P.O. Box 203, Mount Vernon, VA 22121-9998

<http://www.mvcca.org>

Ms. Karen G. Sabasteanski
Office of Air Data Analysis and Planning
Department of Environmental Quality
P.O. Box 1105
Richmond, VA 23218
Sent by email to karen.sabasteanski@deq.virginia.gov

RE: Comment on order and local variance for data centers

March 5, 2023

Dear Ms. Sabasteanski,

I am writing to you on behalf of the Mount Vernon Council of Citizens Associations (MVCCA). The MVCCA is a 501c4 organization, which was established in 1969. We represent the citizen communities within Mount Vernon District of Fairfax County and are a member of the Fairfax Federation of Citizens Associations.

Our members have major concerns with the Virginia Department of Environmental Quality (VDEQ) regarding your draft order and variance.

1. Neither the notice nor order provide information necessary for VDEQ to make an informed decision regarding the issuance of the order.
2. VDEQ has not provided information on alternatives to address expected overhead transmission line transmission constraints.
3. The operation of diesel generators at data centers and other generators at other locations will contribute to local noise and elevated nitrogen dioxide levels, which could pose health risks. These emissions will also contribute to the formation of ozone, which poses risks to health and the environment. The Washington Metropolitan Area is designated as a nonattainment area for ozone.
4. Fairfax County businesses, residents, hospitals, and others should not be impacted by the failure of Dominion Energy and data centers to adequately research and ensure that sufficient electricity would be available at all times.

We understand the VDEQ would allow data centers to operate diesel generators “when transmission constraints and strain on the electric grid nevertheless would be acute.”

We appreciate the fact that VDEQ would constrain diesel generator use to specific times for short durations under the order. However, given our concerns for the huge power demands and the health impacts due to emissions, we ask VDEQ to require solar panels on the data centers and their parking lots. In order to reduce the impacts from backup power, the use of alternative fuels, such as hydrogen¹, should be explored. Moreover, energy storage should be employed to the extent reasonable. If alternative fuels and energy storage are not possible/sufficient, then use of natural gas as the fuel for backup power generation would be both cleaner and quieter than diesel power². We understand that Washington Gas is planning to combine hydrogen with natural gas, which would further reduce the carbon footprint of natural gas.

This difficult situation is exacerbated by the recently announced Amazon plans to invest \$35 billion in data centers in Virginia. Given the shortfall in electricity and facility expansions we recommend that permits should not be granted until electrical needs can be met by Dominion Energy and diesel backup power generation is replaced with alternative fuel(s) and energy storage.

We thank you for your consideration and welcome any questions. Dr. Larry Zaragoza is our point person on this matter. He can be reached at larry.zaragoza@yahoo.com

Respectfully,

Katherine Ward

Katherine Ward

Cochair

MVCCA

cc: Dan Storck
Scott Surovell
Paul Krizek
Adam Ebbin
Fairfax Federation of Citizens Associations

¹ Delbert, Caroline. 2020. Microsoft Kept Servers Running on Nothing but Hydrogen for 2 Days. The company is ditching Diesel within a decade. Enter the fuel cell generators. *Popular Mechanics*.

<https://www.popularmechanics.com/science/a33499249/microsoft-hydrogen-generator-test/>

² Ansett, Ed. 2021. Will natural gas replace diesel as a data center power source? *Data Center Dynamics*:

<https://www.datacenterdynamics.com/en/opinions/will-natural-gas-replace-diesel-as-a-data-center-power-source/>

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