



*Promoting and protecting the natural resources, rural economy,
history and beauty of the Virginia Piedmont*

January 09, 2022

Warrenton Town Council; Carter Neville, Mayor

c/o Town of Warrenton Community Development Department, 21 Main Street, Warrenton, VA 20186

Re: SUP 2022-03 Amazon Data Services

Dear Town Council,

As the Warrenton Town Council prepares for its scheduled public hearing on the special use permit (SUP) application for a proposed Amazon Web Services Data Center in Warrenton, the Piedmont Environmental Council respectfully submits the following comments. We are encouraged by the scrutiny given to the application by the Planning Commission, and with their recommendation for denial, and we hope this same diligent scrutiny is carried forward in your review.

This application has been met with an outpouring of opposition from the community, the planning commission recommendation for denial and noting a number of unresolved issues. On that basis alone, the application has earned a vote for denial. We have commented on this application throughout the process and include past comments to the Planning Commission alongside these. With no new information from Amazon since the hearing, the majority of these comments still stand unaddressed.

We hope that the Town Council, like the Planning Commission, will consider the numerous concerns that PEC, its partners and the community at large share.

Energy Infrastructure. There have been no new developments since Dominion introduced new plans to serve the site via distribution lines to one of two substations. The preferred routing option includes a substation at the old wire factory at 615 Falmouth Street with transmission lines connecting over Route 29 to the existing Warrenton Substation. Stakeholder outreach around these new plans has not even begun, Dominion has only just announced the first stakeholder meeting to discuss these new options will be held on January 19th. The 615 Falmouth Street site has been advertised for data center development by David Dobson raising concerns that a substation at this site would facilitate a second data center development there. This has raised concerns from a new group of residents who are facing prospects of transmission lines, a substation and another potential data center which should be addressed prior to approval of the Amazon data center on Blackwell Road. These residents are important stakeholders that are facing an uncertain future if the Amazon data center is approved and have had little chance to voice their concerns since these plans were introduced just two months ago last November.

Regardless of which option is chosen by Dominion or approved by the SCC, the distribution line proposed in both options could be a conduit through which to run fiber optic cables, and an additional substation in Town would make data center development more appealing for certain landowners and an industry whose common practice is to colocate data centers to share resources and infrastructure while substation on the old wire factory site would dramatically decrease the chances it's developed as anything else. A cluster of data centers in Town would undoubtedly have an impact on the historic downtown, property values and rural character that attracts residents and visitors to Warrenton and Fauquier County. In addition, Dominion has stated that multiple data centers in Town may require additional transmission lines through the County.

Dominion's letter to Fauquier County dated November 16 indicates that "should the County continue to seek development of high energy users, such as data centers, new transmission infrastructure will be required to reliably deliver the necessary electric service in a manner that enhances the local and regional grid that provides service to all throughout the area." This means that in large part, new energy infrastructure is triggered by the load demands of these bulk users, who are ultimately subject to the locality's approval authority. As Warrenton's elected officials you have a say in what energy load demands get serviced by issuing approvals or denying applications that do not meet that threshold.

Noise. After the Zoning Determination letter was released, research from Dr. John Lyver, a retired computational scientist from NASA whose help was enlisted by the community, found that the data center would exceed the applicable noise levels contained in the Town's Zoning Determination Letter along the entire property line, by substantial amounts, at the majority of Town-designated frequencies. Lyver's analysis indicates that although the compliance must be measured at the property line, the applicable noise levels would be exceeded as far as 1/2 mile away and the data center would continue to be audible at a distance as far as 2 miles away.

The current conditions offered by Amazon do not ensure compliance with the noise ordinance and require that Amazon merely to "diligently pursue mitigation" and lack any consequences for ongoing violations of the noise ordinance. Amazon's latest commitment to measure compliance when the building is 10%, 50%, 80%, 90%, and 100% operational and suspending certificates of occupancy for violating operations is also questionable. There is an undefined period of time to correct violations, during which residents will continue to suffer noise impacts, and the claims that occupancy certificates could be suspended for the portions of the building not in compliance are of questionable enforcement. Furthermore, the term "operational" may present an issue since a partially occupied data center could still be deemed "operational." Noise impacts would more accurately be measured at different stages of the data center's data processing capability.

Despite the clarity provided by the Zoning Determination, it did not specify a clear methodology for measuring noise. Without this clear methodology, a vote for approval, even if such conditions for mitigation were to become legally binding, would be of questionable enforcement. Because any noise meter can only measure total noise, which includes ambient noise, a baseline noise level needs to be established in order to subtract the noise levels of the proposed data center.

It is likely that significant reengineering of what's currently proposed is needed to even come close to complying with the applicable noise levels in the Zoning Determination letter. Any such efforts will need

to be vetted and have their noise impacts determined. The Tanner Way AWS facility in Prince William County has to reengineer their cooling system to reduce noise impacts on adjacent communities, but the reduction in noise has yet to be determined. Given the sheer number of residents impacted, the time to ensure compliance is now, not at site plan review, when an applicant has an approval in hand. Other types of cooling systems may be presented as an alternative to the currently proposed air chillers, but these alternatives require time to be evaluated because they could have their own noise impacts from cooling components that will need to be quantified or other impacts such as higher consumption of potable water.

Visual Impacts. The Applicant has also submitted a questionable balloon study that only analyzed visibility from 7 photo locations and did not accurately reflect the heights of balloons in those photos. The illustrative elevations Amazon offered are a best case scenario which would require years for the vegetation to reach maturity. It is likely that even after that vegetation has reached maturity that visitors and residents will still have views of a monolithic structure surrounded by security fencing at their Town's gateway. While nothing Amazon has provided has quantified the proposal's visual impact to the Town as a whole, PEC and citizens have both done GIS analyses that show that the data center would be visible from multiple vantage points in Town.

Inconsistency with the Comprehensive Plan. Deviating from the comprehensive plan in such a drastic way is not only disingenuous to the hundreds of residents who contributed to it, but also compromises a prime location for the Town that could generate revenues while contributing to the town's urban fabric. Sometimes a site and proposed use are simply incompatible. We believe that's the case here and that a data center of this scale would be difficult to incorporate into the compact urban environment that characterizes the Town. Approving a conversion of approximately $\frac{1}{3}$ of the New Town District to a data center use substantially decreases the likelihood that this vision for an area with a mix of uses including office, residential, green space, and public amenities, will be realized in the rest of the District. An industrial development of this scale will likely encourage more industrial development and discourage the type of vibrant walkable mixed use developments described in the plan.

Revenue and Technological Obsolescence. Given the uncertain pace of technological advancement, and the variability in depreciation and replacement of data center equipment, revenues from the data center are difficult to predict. Revenues are even more uncertain for the people for whom they are meant to serve, who have been stonewalled by non-disclosure agreements and proprietary exemptions.

Data centers have been cited as a way the Town can meet their financial needs. Given the Town's largely positive report from Brown Edwards' Fiscal Year 2022 Audit presented to the Town Council on Dec. 13 2022, the community would benefit from further explanation of what those needs are and how data center revenues could help meet them. It would also help to have clear information about how much revenue is actually projected from this project which has not been openly shared with the community.

With advancements such as virtualization, the conversion of hardware functions of a data center into software resources, the current technology employed in data centers could become obsolete in mere years. How might the needs and capacity of this proposed data center change with these developments? The long-term practicality and fiscal viability of this data center in its current configuration is still an unanswered question.

While it is the role of Amazon's representatives to get Applicants their approval by offering as little as possible, it is your duty to your constituents to verify their commitments and consider the many issues that have resulted in a planning commission recommendation of denial in issuing your ruling. Given the information presented by the applicant and the concerns raised by us and the community at large we encourage you to deny this application due to the impact it poses to surrounding communities and the Town as a whole. We would be happy to discuss any of these issues or provide any materials. Thank you for considering our concerns as you make your decision on this proposal.

Sincerely,

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