Comhairle Contae
Átha Cliath Theas
South Dublin County Council

An Rannóg Talamhúsáide, Pleanála agus Iompair
Land Use, Planning & Transportation Department
Telephone: 01 4149000 Fax: 01 4149104 Email: planning.dept@sdublincoco.ie

Brian Cuthbert
35, Seaview Avenue East
East Wall
Dublin 3

Date: 05-Oct-2021

Dear Sir/Madam,

Register Ref: SD21A/0241

Development: Demolition of the abandoned single storey dwelling and associated outbuilding (206sqm); construction of 2 two storey data centers with plant at roof level of each facility and associated ancillary development which will have a gross floor area of 40,589sq.m consisting of 1 two storey data center (Building 11) which will be located to the south of the site and will have a gross floor area of 24,667sq.m. including 22 emergency generators located at ground floor level within a compound to the western side of the data center with associated flues that will be 22.3m in height; 1 two storey data center (Building 12) which will be located to the north of the site, and to the immediate north of Building 11 and will have a gross floor area of 12,915sq.m including 11 emergency generators located at ground floor level within a compound to the western side of the data center with associated flues that will be 22.3m in height; each of the two data centers will include data storage rooms, associated electrical and mechanical plant rooms, loading bays, maintenance and storage spaces, office administration areas, and plant including PV panels at roof level as well as a separate house generator for each facility which will provide emergency power to the admin and ancillary spaces; each generator will include a diesel tank and there will be a refuelling area to serve the proposed emergency generators; the overall height of each data center apart from the flues and plant at roof level is c. 14.23m above the finished floor level; the overall height of each data center apart from the flues and plant at roof level is c. 14.23m above the finished floor level; single storey step-up substation (38sq.m) as well as 2 single storey switch substations (121sq.m); AGI Gas Regulator compound that include 3 single storey buildings (134sq.m); construction of a gas powered generation plant in the form of a 13m high single storey building with a gross floor area of 2,714sq.m that will contain 10 gas generators with associated flues that will be 25m in height, and grouped in pairs and threes; the Gas Plant will be located to the west of Building 11; ancillary site development works, that will include reorientation of the Baldonnel Stream, biodiversity management initiatives, attenuation ponds and the installation and connection to the underground foul and storm water drainage network, and installation of utility ducts and cables, that will include the drilling and laying of ducts and cables under the internal road network within Profile Park; other ancillary site development works will include hard and soft

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	sprinkler tanks and pump room; a temporary gas powered generation plant within a fenced yard containing 21 generator units in containers, each with associated flues (each 25m high), 12 transformers and 10 containers of controls to be located to the west of, and associated with the first phase of Building 11, and will be required for a period of up to 2 years if connection to the national grid is delayed; this temporary plant will not be built if the connection to the national grid is in place prior to the operation of Building 11 at this site that includes an abandoned single storey residential property on the New Nangor Road (R134), Dublin 22; and on land within the townlands of Ballybane and Kilbride within Profile Park, Clondalkin, Dublin 22 on an overall site of 8.7 hectares.
Location:	In the townlands of Ballybane & Kilbride within Profile Park, Clondalkin, Dublin 22
Applicant:	Vantage Data Centers Dub 11 Ltd.
Application Type:	Permission
Date Rec'd:	31-Aug-2021

I wish to acknowledge receipt of your submission in connection with the above planning application. The appropriate fee of €20.00 has been paid and your submission is in accordance with the appropriate provisions of the Planning and Development Regulations 2001(as amended). The contents of your submission will be brought to the attention of the Planning Officer during the course of consideration of this application.

This is an important document. You will be required to produce this document to An Bord Pleanala if you wish to appeal the decision of the Council when it is made. You will be informed of the decision in due course. Please be advised that all current applications are available for inspection at the public counter and on the Council's Website, www.sdublincoco.ie.

You may wish to avail of the Planning Departments email notification system on our website. When in the ***Planning Applications*** part of the Council website, www.sdublincoco.ie, and when viewing an application on which a decision has not been made, you can input your email address into the box named ***"Notify me of changes"*** and click on ***"Subscribe".*** You should automatically receive an email notification when the decision is made. Please ensure that you submit a valid email address.

Please note: If you make a submission in respect of a planning application, the Council is obliged to make that document publicly available for inspection as soon as possible after receipt. Submissions are made available on the planning file at the Planning Department's public counter and with the exception of those of a personal nature, are also published on the Council's website along with the full contents of a planning application.

Yours faithfully,

M. Furney
for **Senior Planner**

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For a fossil free future for Ireland

Planning Section,
South Dublin County Council
County Hall Tallaght,
Dublin 24, D24 A3XC

Planning Application Reference Number: SD21A/0241

Applicant: Vantage Data Centers Dub 11 Ltd.
Location: In the townlands of Ballybane & Kilbride within Profile Park, Clondalkin, Dublin 22

Description:
"Demolition of the abandoned single storey dwelling and associated outbuilding (206sqm); construction of 2 two storey data centers with plant at roof level of each facility and associated ancillary development which will have a gross floor area of 40,589sq.m consisting of 1 two storey data center (Building 11) which will be located to the south of the site and will have a gross floor area of 24,667sq.m. including 22 emergency generators located at ground floor level within a compound to the western side of the data center with associated flues that will be 22.3m in height; 1 two storey data center (Building 12) which will be located to the north of the site, and to the immediate north of Building 11 and will have a gross floor area of 12,915sq.m including 11 emergency generators located at ground floor level within a compound to the western side of the data center with associated flues that will be 22.3m in height; each of the two data centers will include data storage rooms, associated electrical and mechanical plant rooms, loading bays, maintenance and storage spaces, office administration areas, and plant including PV panels at roof level as well as a separate house generator for each facility which will provide emergency power to the admin and ancillary spaces; each generator will include a diesel tank and there will be a refuelling area to serve the proposed emergency generators; the overall height of each data center apart from the flues and plant at roof level is c. 14.23m above the finished floor level; the overall height of each data center apart from the flues and plant at roof level is c. 14.23m above the finished floor level; single storey step-up substation (38sq.m) as well as 2 single storey switch substations (121sq.m); AGI Gas Regulator compound that include 3 single storey buildings (134sq.m); construction of a gas powered generation plant in the form of a 13m high single storey building with a gross floor area of 2,714sq.m that will contain 10 gas generators with associated flues that will be 25m in height, and grouped in pairs and threes; the Gas Plant will be located to the west of Building 11; ancillary site development works, that will include reorientation of the Baldonnel Stream, biodiversity management initiatives, attenuation ponds and the installation and connection to the underground foul and storm water drainage network, and

installation of utility ducts and cables, that will include the drilling and laying of ducts and cables under the internal road network within Profile Park; other ancillary site development works will include hard and soft landscaping, lighting, fencing, signage, services road, entrance gates, sprinkler tanks and pump room; a temporary gas powered generation plant within a fenced yard containing 21 generator units in containers, each with associated flues (each 25m high), 12 transformers and 10 containers of controls to be located to the west of, and associated with the first phase of Building 11, and will be required for a period of up to 2 years if connection to the national grid is delayed; this temporary plant will not be built if the connection to the national grid is in place prior to the operation of Building 11 at this site that includes an abandoned single storey residential property on the New Nangor Road (R134), Dublin 22; and on land within the townlands of Ballybane and Kilbride within Profile Park, Clondalkin, Dublin 22 on an overall site of 8.7 hectares."

This submission is made on behalf of Not Here Not Anywhere (NHNA), a nationwide, grassroots, non-partisan group campaigning to end fossil fuel exploration and the development of new fossil fuel infrastructure in Ireland. To avoid the most severe impacts of climate change, global temperatures must be kept below 1.5°C above pre-industrialised levels, and we will need rapid and deep action to decarbonise our energy systems. Burning fossil fuels is the single biggest cause of climate change, and taking climate action means newly built infrastructure in Ireland must be fossil free. Planning is a key area of influence, and county councils have a major role in establishing the transition from fossil fuels to renewable energy. This encompasses processes for carbon-proofing major decisions, programmes and projects.

Regarding the application to South Dublin County Council spanning c.40,589 sqm, we make the following recommendations:

1. **New data centres must be powered entirely by onsite or new off site renewable energy in order to reduce, rather than increase, Ireland's CO_2 emissions, consistent with the Climate Action Plan and commitments under the Paris Agreement.**

This planning application features both gas engines generators and diesel fuel tanks, which will result in fossil fuels being used to both power the data centre and act as a back-up energy source. We observe no plans to provide for the generation of renewable energy to compensate for the increased energy demand which the data centre will place on the grid. The applicant should be required to either provide for its own renewable energy generation (on or off site) and/or use fuel from renewable sources for storage or back-up generation.

The government has acknowledged that "data centres pose considerable challenges to the future planning and operation of Ireland's power system" (Department of Business, Enterprise and Innovation, 2018). These challenges include higher electricity costs for consumers (Taylor, 2018). The Danish Council on Climate Change recommended in April 2019 that the Danish government legally binds data centre owners and developers to contribute to the infrastructure required to supply

the centres with renewable energy, such as wind and solar farms (Irish Examiner, 2019).

Currently, many companies claim to operate data centres powered by 100% renewable energy. However, the energy is largely sourced indirectly through Renewable Energy Certificates or Purchase Power Agreements (Chernicoff, 2016), which means that the energy is sourced from the grid, which in Ireland is 69% fossil fuel-powered (Sustainable Energy Authority of Ireland, 2019). If we continue to allow companies to virtually purchase clean energy where it is cheapest to create, while actually using and increasing demand for dirty energy in Ireland, we allow them to profit while our real emissions continue to rise. It is crucial therefore that data centres are powered directly by onsite renewable energy generation such as rooftop solar farms or genuinely new offsite generation such as offshore wind or solar farms.

On page 33 of the EIAR it states under section 8.8 Climate Change that: "*It is expected that general climate trends for Ireland, including extreme weather events (e.g. increased wind speeds, drought, intensity of precipitation events) will continue to occur irrespective of whether the development is built or not.*"

This statement would be laughable if it wasn't referring to events which will ruin the lives of people in this country. With this single development expecting to account for c.2% of Ireland's carbon budget (operational and construction emissions) it is far from negligible. That is 1/20th of the whole country's carbon budget coming from one site alone. Not to mention all of the existing and planned data centres. 1/20 is enormous.

As the plant will not be powered by renewable energy, it will lead to an increase in Ireland's greenhouse gas emissions between now and 2030, contravening the Climate Act, Climate Action Plan and National Planning Framework. Thus, in the event that powering the data centre with onsite or offsite renewable energy would not be feasible, permission for its development should be refused.

2. Due to the significant impact of data centres on energy consumption, we strongly urge that both EIAR and NIS assessments are comprehensively carried out before granting planning permission for any data centres, including the present application.

Eirgrid estimates that data centres could account for up to 27% of Ireland's electricity demand by 2028, and up to 50% of new electricity demand growth (Eirgrid, 2020). The Irish Academy of Engineering (2019) predicts that data centre development will add at least 1.5 million tonnes to Ireland's carbon emissions by 2030, a 13% increase on current electricity sector emissions, and will require an investment in energy generation and storage of €9 billion by 2027.

For example, if Amazon's eight centre project in Mulhuddart, Dublin 15, is realised, by 2026 it would use c. 4.4% per cent of the State's entire energy capacity, the equivalent of Galway city, but employ only 30 people post-construction, largely in facility maintenance (Lillington, 2018). The Apple data centre proposed for Athenry, Co. Galway, would have ultimately used "over 8% of the national capacity [...], more

than the daily entire usage of Dublin", and "would require 144 large diesel generators as back-up" (Climate Home News, 2017).

To meet the greenhouse gas emissions targets set out in the Paris Agreement, and in the recently published Climate Bill, it is paramount that South Dublin County Council examines the impact that energy supply of data centres will have on net emissions. Furthermore, it is crucial that South Dublin County Council takes into consideration the **cumulative impact of data centres' energy demand on a nationwide basis**, as opposed to examining impact solely on a case-by-case basis.

3. Where technically possible, heat generated from a data centre should be utilised for district heating systems.

We found no evidence in the application of technology provided for this purpose. Denmark's Ramboll Group (2019) recommends that the large quantities of waste heat generated by data centres should be utilised in district heating systems. Existing technology (such as heat pumps) to capture excess heat should be required and used to increase data centres' energy efficiency.

4. **Water usage**

Peak demand of water usage stands at around 1,000,000 litres of water per day. Cooling the data centre will divert a valuable resource away from the local community, a situation which is likely to get worse as water scarcity becomes more of a problem and population increases. This amounts to just less than a quarter of the total water demand for Clondalkin (4,681,300 litres per day based on a conservative estimate of 100 litres per person per day on average). Rainwater collection cannot be relied upon, due to uneven patterns of precipitation which will become even more erratic as the climate changes. A region with ample water today may become water-stressed in 10 to 30 years. We have recently witnessed that protracted periods of temperatures above 26°C with no precipitation are becoming more frequent in Ireland. The UN expects water demand to outpace supply by almost 40% as soon as 2030. Greater consideration needs to be given to how available resources are going to be used.

Thank you in advance for your consideration.

Regards,
Brian Cuthbert
35 Seaview Avenue East, East Wall, Dublin 3
0879958909

On behalf of
Not Here, Not Anywhere

References

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