Permitting Decisions- Bespoke Permit

We have decided to grant the permit for London 14 Data Centre operated by Virtus Holdco Limited.

The permit number is EPR/UP3624SW.

Permit Issue date: 04/03/2025

The application is for the operation of standby electricity generating plant at a data centre located in Hayes in the London Borough of Hillingdon at national grid reference TQ 08045 79594. The data centre will under normal operating conditions be powered by grid supplied electricity.

We consider in reaching that decision we have taken into account all relevant considerations and legal requirements and that the permit will ensure that the appropriate level of environmental protection is provided.

Purpose of this Document

This decision document provides a record of the decision-making process. It:

- summarises the decision making process in the decision considerations section to show how the main relevant factors have been taken into account
- highlights key issues in the determination
- shows how we have considered the consultation responses

Unless the decision document specifies otherwise, we have accepted the applicant's proposals.

Read the permitting decisions in conjunction with the environmental permit.

Key Issues of the Decision

1. The Installation

The permit authorises the operation of 16 standby gas oil fuelled generators serving a data centre. The generators will provide electrical power to the data centre in the event of failure in the electrical grid supply.

The standby power solution comprises 16 x 6.9 MWth gas oil fuelled generators with an aggregated thermal input of 110 MWth. It is integrated within the data centre design providing on-site electrical generating capacity to be used in the event of power outages to the data centre.

The permit does not allow the export of electricity to the National Grid.

The installation is subject to the Environmental Permitting Regulations (EPR) as it carries out an activity listed in Part 1 of Schedule 1 to the EPR:

- Section 1.1 Part A(1)(a): Burning any fuel in an appliance with a rated thermal input of 50 megawatts or more.

The activity falls under Chapter II of the Industrial Emissions Directive (IED). The liquid fuelled generators are classed as medium combustion plant (MCP) as part of a Chapter II installation. The Medium Combustion Plant Directive (MCPD) requirements are fulfilled through compliance with Chapter II of Directive 2010/75/EU.

The data centre is located within the London Borough of Hillingdon, within an Air Quality Management Area (AQMA) which is managed for nitrogen dioxide (NO_2- annual mean objective).

The applicant's assessment of the impact of air quality is set out in the following documents:

- Air Quality Assessment report, dated 27th September 2024 (Ref: 294760-EP-AQ)

2. Testing and Maintenance

Operation of the generators will occur via testing and maintenance and in the event of an outage of power at the facility. Operating scenarios are as follows:

Monthly

Every month (for eleven months) each generator will be tested for 15 minutes at 10% load. Each generator would be tested separately to minimise short-term impacts on local air quality.

Annually

Every year each generator will be tested for 20 minutes at 100% load followed by 75% load for 120 minutes. Again, generators would be tested separately to minimise the short-term impact on local air quality.

Operation During an Emergency Event

The generators would also run in the event of a loss of power supply, i.e. temporary grid blackout; the generators will be utilised to maintain the required power supply. The generators are designed to automatically activate and provide the required power to the plant pending restoration of mains power, at which time they shall automatically ramp down and switch back to utility supply.

The installation will initially be fed electricity directly from Virtus' existing Stockley Park Campus, housing London 5-8, via three separate circuits to provide resilience. The incoming power system to the site will consist of three substations on-site, three separate cables from National Grid's Iver Heath substation, and three electrical feeder breakers at Iver. Two new sub-stations are proposed to be constructed at London 14 which will be connected to Iver Heath, after which point the London 5-8 connection will be replaced. The proposed electrical design at London 14 mirrors that in other Virtus datacentres, whereby the system is set up in a ring main unit/circuit, such that if the site was to lose one board, the power can be supplied from the other side of the circuit.

The application states that National Grid National Electrical Transmission System Performance Report 2021/22 states that the overall reliability of supply during 2021-22 was: 99.999612%. The longest loss of supply incident lasted 300 mins (7.5 hours) in Elstree, Watford, with a total of 25.7 MWh not supplied. It is also reported that a portion of demand was restored within 3 minutes. Therefore, it is considered very unlikely that the generators would run for extended periods during a blackout event.

The Applicant has conservatively assessed the impact on air quality based on all 16 generators operating at 100% load for up to 72 hours to cover an emergency power outage scenario. This is in line with Environment Agency guidance.

3. Air Quality Assessment

The Applicant's assessment of the impact of air quality is set out in *Air Impact Assessment Rev C* dated 27th September 2024 of the Application. The assessment comprises:

- Dispersion modelling of emissions to air from the operation of the installation.
- A study of the impact of emissions on nearby sensitive conservation sites.

The air dispersion modelling carried out by the applicant used the ADMS 6 software which we consider an appropriate air quality modelling tool for regulatory purposes. The model used 5 years meteorological data (2018-2022) from the Heathrow airport meteorological station and included the potential effects of buildings in the modelling domain on the dispersion of the emitted pollutants. The assessment carried out by the Applicant also included a sensitivity analysis of the modelling set up and a statistical interpretation of short-term exceedances of air quality standards. The statistical analysis was based on the hypergeometric probability distribution and followed the methodology set out in our web guidance on dispersion modelling assessment for generators. The 3 operating scenarios detailed above were modelled.

Each generator has its own 14.45m exhaust stack.

Generator operating parameters and emission concentrations are based on the generator manufacturer's performance and emission data.

Each generator is fitted with Selective Catalytic Reduction (SCR) NOx abatement. It has been estimated by the Applicant that it will take 20 minutes for the SCR to warm-up before becoming effective. Once the SCR is effective, it is proposed that the NO_X emissions from the generators will be reduced by 95%. The use of SCR will therefore only be applicable to the annual testing scenario and the emergency scenario, as the running period of monthly testing scenario 1 is only 15 minutes, which is shorter than the required warm-up period.

The way in which the Applicant used dispersion models, its selection of input data, use of background data and the assumptions it made have been reviewed by the Environment Agency to establish the robustness of the Applicant's air impact assessment. The output from the model has then been used to inform further assessment of health impacts and impact on habitats and conservation sites.

Our review of the Applicant's assessment leads us to agree with the Applicant's conclusions.

The Applicant's modelling predictions are summarised in the following sections.

Air Quality Impacts (human health)

Predicted impacts Testing Scenario 1 – monthly testing (generators are tested consecutively for 15min each at 10% load, unabated. 11 months of the year):

The predicted pollutant concentrations for scenario 1, representing monthly standby generator testing, were below the relevant short-term environmental standards (ES) at all receptor locations and are not considered to be significant.

Predicted impacts for Testing Scenario 2 - annual testing (generators are tested consecutively for 2 hours and 20 min each at 75% load, abated after 20min warm-

up time. This is an annual test in the 12th month of the year):

The predicted pollutant concentrations for Scenario 2, representing annual standby generator testing, were below the relevant short-term ESs at all receptor locations with the exception of short-term NO_2 at one receptor located 30m east of the facility. The maximum short-term NO_2 process contribution at this receptor is predicted to be 124% of the ES and the predicted environmental concentration is 161% of the relevant ES. However, statistical analysis using the hypergeometric distribution was undertaken, which found that the probability of exceeding the NO_2 hourly mean Environmental Assessment Level (EAL) was <1% indicating the probability of an exceedance would be highly unlikely according to Environment Agency guidance.

Predicted impacts emergency scenario 3 – in the event of power grid outage (all generators running simultaneously for 72 hours at 100% load, abated):

The Applicant predicted no exceedances of any of the relevant ES and US Acute Exposure Guideline Levels (AEGL), with the exception of the short-term NO_2 ES at one receptor located 30m east of the facility. The maximum short-term NO_2 process contribution at this receptor is predicted to be 113% of the ES and the predicted environmental concentration is 150% of the relevant ES. The Applicant undertook statistical analysis using the hypergeometric distribution, which found that the probability of exceeding the NO_2 hourly mean Environmental Assessment Level (EAL) was <1% indicating the probability of an exceedance would be highly unlikely according to Environment Agency guidance. The Emergency Scenario was also compared against the AEGL for NO_2, where no exceedances were predicted. Additionally, the risk of the emergency scenario occurring is very unlikely based on electrical grid reliability for the area and inbuilt design resilience.

Air Quality Impacts (Habitats)

We identified the following European sites within the 10 km screening distance of the facility:

- The South West London Waterbodies Special Protection Area (SPA) & Ramsar.

The following non-statutory local wildlife and conservation sites are located within 2 Km of the installation:

Local Wildlife Sites (LWS):

- Carp Ponds and Broads Dock
- Stockley Road Rough
- London's Canals
- Stockley Business Park Lakes & Meadows
- Iron Bridge Road Railsides (The Piggeries) 1 & 2
- Bolingbroke Way Sunken Pasture

- Lake Farm Country Park
- Wall Garden Sand Heaps
- Cranford Countryside Park and Open Space
- Cranford Lane Gravel Workings 1 & 2
- Stockley Park Country Park

We have assessed the impact from the proposed Installation on the Habitat sites that are within the relevant screening distance. As required under the Habitats Regulations we have completed a Habitats Regulation Assessment (HRA). This is a two stage process. The Stage 1 HRA is where it is identified whether process contribution (PC) will have a likely significant effect on the integrity of the habitat site. For any habitat site where we are unable to conclude that there will be no likely significant effect on the integrity of the site a detailed 'appropriate assessment' of the impacts is carried out under the Stage 2 HRA to determine if the impacts will have an adverse effect on the habitat site.

The Applicant's assessment shows that for all 3 scenarios the process contributions of NOx, NH_3 nitrogen deposition and acid deposition at the South West London Waterbodies Special Protection Area (SPA) & Ramsar when compared to the relevant critical levels and loads are likely to be insignificant. We have therefore concluded no likely significant on the integrity of the habitat site. We have completed a stage 1 HRA detailing our assessment and this was sent to Natural England for information only.

Assessment of other conservation sites

Conservation sites are protected in law by legislation. The Habitats Directive provides the highest level of protection for SACs and SPAs and domestic legislation provides a lower but important level of protection for SSSIs. Finally the Environment Act provides more generalised protection for flora and fauna rather than for specifically named conservation designations. It is under the Environment Act that we assess other sites (such as local wildlife sites) which prevents us from permitting something that will result in significant pollution; and which offers levels of protection proportionate with other European and national legislation. However, it should not be assumed that because levels of protection are less stringent for these other sites that they are not of considerable importance. Local sites link and support EU and national nature conservation sites together and hence help to maintain the UK's biodiversity resilience.

For SACs SPAs, Ramsar and SSSIs we consider the PC and the background levels in making an assessment of impact. In assessing these other sites under the Environment Act we look at the impact from the Installation alone in order to determine whether it would cause significant pollution. This is a proportionate approach, in line with the levels of protection offered by the conservation legislation to protect these other sites (which are generally more numerous than Natura 2000 or SSSIs) whilst ensuring that we do not restrict development.

Critical levels and loads are set to protect the most vulnerable habitat types. Thresholds change in accordance with the levels of protection afforded by the legislation. Therefore, the thresholds for SAC SPA and SSSI features are more stringent than those for other nature conservation sites.

Therefore, we would generally conclude that the Installation is not causing significant pollution at these other sites if the PC is less than the relevant critical level or critical load, provided that the Operator is using BAT to control emissions.

The Operator's assessment shows that the PCs at the non-statutory local wildlife and conservation sites listed above will be below the relevant critical levels or loads. We are therefore satisfied that the Installation will not cause significant pollution at the sites. The Operator is required to prevent, minimise and control emissions using BAT, this is considered further in Section 5.

4. Noise and Vibration

The Application contained a noise impact assessment (NIA) which identified local noise-sensitive receptors, potential sources of noise at the proposed plant and noise attenuation measures. Measurements were taken of the prevailing ambient noise levels to produce a baseline noise survey and an assessment was carried out in accordance with BS4142:2014 to compare the predicted generator plant rating noise levels with the established background levels.

We have reviewed the Applicant's NIA and our review concluded that the noise impact from the installation is likely to be low and therefore we are satisfied that noise impact on nearby sensitive receptors will not be significant.

5. Best Available Techniques (BAT)

Technology and Fuel

The Applicant considered a range of technologies and fuels as part of the design and specification phase. At this time the latest generation of gas oil powered generators are optimally viable for operators based on availability, reliability, capital and operating costs. Alternatives, including natural gas engines, HVO engines, hydrogen engines, gas turbines and battery storage were considered but are not operationally viable for this installation.

We accept that gas oil powered generators are presently a commonly used technology for standby generators in data centres. We are satisfied that the applicant has provided sufficient justification to show that their proposal is BAT.

Engine Specification

Environment Agency guidance specifies the BAT emissions specifications for new diesel-fired reciprocating engines as 2g TA-Luft or US EPA Tier II (or equivalent standard) with NO_x emission levels in the range of 2000 mg/m^3 at

5% oxygen and reference conditions.

The generators proposed for this installation and included in the Air Quality assessment are Tier 2 certified and have NOx emission concentrations of 1938 mg/Nm^3 at 5% O_2 and reference conditions (100% load standby mode – nominal emissions) and therefore are in line with BAT. Furthermore, so as to minimise the potential impact of NO_x emissions at nearby sensitive receptors, the generators will be fitted with Selective Catalytic Reduction (SCR) emissions abatement with a minimum NOx emission reduction of 95% (<86mg/Nm^3 at 5% O2).

Fuel Storage

Each engine has its own dedicated above ground carbon steel fuel belly tank (30,868 litre capacity) which are integrally bunded to a capacity of 110% of the tank capacity. The tanks are fitted with leak detection alarms, such that if any fuel is released into the secondary containment and audible alarm will sound. The tanks will be visually checked daily for corrosion, together with 3rd party checks undertaken as part of routine maintenance of the generators. In addition a 5 yearly empty tank inspection will be undertaken. The Applicant confirmed that all tanks will comply with the Oil Storage Regulations (SI 2001/2954. The Control of Pollution (Oil Storage) (England) Regulations 2001).

Fuel Delivery

We are satisfied that the necessary controls will be in place to minimise the risk of pollution. Refuelling is expected to only occur twice a year. The fuel tanker will be parked on an area of impermeable slab that slopes towards drains which are connected to an oil separator. The integrity of the impermeable slab will be visually checked daily. The oil separator has been sized to accommodate one compartment of a fuel tanker i.e. capable of retaining the full loss of contents of one road tanker. Delivery & filling activities will be supervised by trained staff. Other pollution controls include permanent kerbing around the perimeter of the service yard, covering all drains within a 20-meter radius of delivery and filling activities; the oil separators have automatic closure devices that activate when oil is detected; localised spill kits; drip trays at fill point and high-level alarms on tanks.

Choice of Fuel

The applicant confirmed that the emergency generators will be operated on gas oil. We have specified in the permit that gas oil can have a maximum sulphur content of 0.001% (w/w).

6. Site Condition Report and Protection of Groundwater

A site condition report (SCR) is required for any facility regulated under the EPR, where there may be a significant risk to land or groundwater. Article 22(2) of the IED requires the applicant to provide a baseline report containing at least the information set out in paragraphs (a) and (b) of the Article before starting operation. The baseline report is an important reference document in the assessment of contamination that might arise during the operational lifetime of the installation and at cessation of activities at the installation.

At the definitive cessation of activities, the operator has to satisfy us that the necessary measures have been taken so that the site ceases to pose a risk to soil or groundwater, taking into account both the baseline conditions and the site's current or approved future use. To do this, the operator has to apply to us for surrender, which we will not grant unless and until we are satisfied that these requirements have been met.

The operator has provided a description of the condition of the site, which we consider is satisfactory. The decision was taken in accordance with our guidance on site condition reports and baseline reporting under the IED.

7. Emission Limits

Based on the operational requirements, we have not set any emission limits.

As there are no limits, permit condition 2.3.6 'The activities shall not operate for more than 500 hours per year' has been included to restrict the hours of operation. The operator will be required to record operating hours and the number of runs for each of the generators.

8. Monitoring Requirements

We have specified monitoring of emissions of carbon monoxide (CO) from emission points A1 to A16, with a minimum frequency of once every 1,500 hours of operation or every five years (whichever comes first). This monitoring has been included in the permit in order to comply with the requirements of the MCPD, which specifies the minimum requirements for monitoring of carbon monoxide emissions, regardless of the reduced operating hours of the plant.

We have also specified monitoring of emissions of oxides of nitrogen (NOx) from emission points A1 to A16, with the same frequency specified for the monitoring of carbon monoxide emissions. In setting out this requirement, we have applied our regulatory discretion, as we consider that this limited monitoring, to happen in concurrence with the carbon monoxide monitoring, is proportionate to the risk associated with the emissions of NOx from the installation.

Taking into account the limited hours of operation of the generators operating at the installation, and the fact that we are not setting emission limits for carbon

monoxide and NOx, we consider this monitoring can be carried out in line with web guide 'Monitoring stack emissions: low risk MCPs and specified generators' Published 16 February 2021 (formerly known as TGN M5).

9. Emissions to Sewer

There will be no emissions to sewer from the proposed installation.

10. Emissions to Water

There will be no emissions to surface water from the proposed installation.

11. Emissions to Land

There will be emissions of uncontaminated site surface water via oil interceptors to a soakaway at emission points S1 and S2. We have required visual checks for oil and grease via a weekly spot sample.

12. Waste

The facility will not generate significant quantities of waste. Each main engine lubricating oil is changed at 500 run hours or 3 yearly intervals, whichever is shorter. Any waste oil generated during testing/maintenance will be removed from site by an appointed third-party contractor and managed by a suitably regulated waste management contractor.

Based upon the information in the application, we are satisfied that the appropriate measures will be in place to prevent or where that is not practicable to minimise pollution from waste.

13. Operational hours

We set operational hour limits for data centres at 500 hours as they are permitted for emergency use only. The limit on the emergency use of 500 hours is for the installation as a whole i.e. as soon as one generator starts operating the hours count towards the 500 hours.

The operational hours on the site will be monitored and reported as follows:

Emergency operation limited to 500 hours for the installation via permit condition 2.3.6.

Maintenance and testing regime limited to <50 hours per generator, linked to operating techniques table S1.2

14. Permit Conditions

Permit condition 2.3.6
The permit includes a maximum 500-hour operational limit for the emergency standby generators. The 500 hours includes testing and maintenance.

Table S1.1 (Activities)

Includes some additional operational controls:

- Testing of the generators shall only take place during daytime periods.
- During monthly and annual testing, each generator shall be tested separately.
- Electricity produced at the installation cannot be exported to the National Grid.

The first bullet is to minimise the impact from noise, refer to the Noise and Vibration section of this document.

The second two bullets are based on the outcome of the Air Quality Assessment, refer to Air Quality Impacts section of this document.

Table S1.1 also places a limit on the activity to exclude voluntary 'elective power generation' such as Balancing Services, Demand Side Response operations including Frequency Control Demand Management (FCDM) or Triad Avoidance. This is primarily to differentiate data centres from 'diesel (gas oil) arrays' that voluntarily operate within the balancing market, and importantly a clear way to demonstrate minimisation of emissions to air as 'emergency plant'.

Table S1.2 (Operating techniques)

The testing and maintenance scenarios are detailed in this document and controlled though permitted operating techniques in table S1.2 of the permit.

Table S1.3 (Improvement programme)

IC1 - Air Quality Management Plan (AQMP)

Whilst we are satisfied that the maintenance and testing regime is appropriate, given the local issues regarding air quality, including the designation of the AQMA, we have included an improvement condition in the permit. This requires the operator to produce an Air Quality Management Plan.

IC2 - Performance of SCR systems

This condition has been included to ensure that the proposed SCR systems are fit for purpose and as described in the application.

Table S4.2 (Performance parameters)

Reporting of testing and maintenance run hours is required annually. Operation during an emergency scenario requires both notification within 24 hours and annual reporting.

Annex 1 - Decision Considerations

Confidential Information

A claim for commercial or industrial confidentiality has not been made.

Identifying Confidential Information

We have not identified information provided as part of the application that we consider to be confidential.

Consultation

The consultation requirements were identified in accordance with the Environmental Permitting (England and Wales) Regulations (2016) and our public participation statement.

The application was publicised on the GOV.UK website.

We consulted the following organisations:

Food Standards Agency (FSA)

Health & Safety Executive (HSE)

Brent Local Authority (planning and environmental health)

UK Health Security Agency (UKHSA) (formerly Public Health England (PHE))

National Grid (Cadent Gas)

The comments and our responses are summarised in the Consultation Responses section of this document.

Operator

We are satisfied that the applicant (now the operator) is the person who will have control over the operation of the facility after the grant of the permit. The decision was taken in accordance with our guidance on legal operator for environmental permits.

The Regulated Facility

We considered the extent and nature of the facility at the site in accordance with RGN2 ‘Understanding the meaning of regulated facility’, Appendix 2 of RGN2 ‘Defining the scope of the installation’ and Appendix 1 of RGN 2 ‘Interpretation of Schedule 1’.

The extent of the facility is defined in the site plan and in the permit. The activities are defined in table S1.1 of the permit.

The Site

The operator has provided plans which we consider to be satisfactory.

These show the extent of the site of the facility including the discharge points.

The plan is included in the permit.

Nature Conservation, Landscape, Heritage and Protected Species and Habitat Designations

We have checked the location of the application to assess if it is within the screening distances we consider relevant for impacts on nature conservation, landscape, heritage and protected species and habitat designations. The application is within our screening distances for these designations.

We have assessed the application and its potential to affect sites of nature conservation, landscape, heritage and protected species and habitat designations identified in the nature conservation screening report as part of the permitting process. Refer to Air Quality Impacts (Habitats) section of this document.

The decision was taken in accordance with our guidance.

Environmental Risk

We have reviewed the operator's assessment of the environmental risk from the facility.

The operator’s risk assessment is satisfactory.

Operating Techniques

The operating techniques that the applicant must use are specified in table S1.2 in the environmental permit.

National Air Pollution Control Programme

We have considered the National Air Pollution Control Programme as required by the National Emissions Ceilings Regulations 2018. By setting controls in the permit we are minimising emissions to air. This will aid the delivery of national air quality targets. We do not consider that we need to include any additional conditions in this permit.

Raw Materials

We have specified limits on the use of liquid fuel.

Pre-operational Conditions

Based on the information in the application, we consider that we need to include a pre-operational condition requiring submission of a commissioning plan.

Improvement Programme

Based on the information in the application, we consider that we need to include an improvement programme. See key decisions for details of the conditions include.

Emission Limits

We have decided that emission limits are not required in the permit, refer to Monitoring Requirements section of this document.

Reporting

We have specified reporting in the permit to gather information on emissions to air from A1 to A16 and performance parameters.

Management System

We are not aware of any reason to consider that the operator will not have the management system to enable them to comply with the permit conditions.

The decision was taken in accordance with the guidance on operator competence and how to develop a management system for environmental permits.

Growth Duty

We have considered our duty to have regard to the desirability of promoting economic growth set out in section 108(1) of the Deregulation Act 2015 and the guidance issued under section 110 of that Act in deciding whether to grant this permit.

Paragraph 1.3 of the guidance says:

“The primary role of regulators, in delivering regulation, is to achieve the regulatory outcomes for which they are responsible. For a number of regulators, these regulatory outcomes include an explicit reference to development or growth. The growth duty establishes economic growth as a factor that all specified regulators should have regard to, alongside the delivery of the protections set out in the relevant legislation.”

We have addressed the legislative requirements and environmental standards to be set for this operation in the body of the decision document above. The guidance is clear at paragraph 1.5 that the growth duty does not legitimise non-compliance and its purpose is not to achieve or pursue economic growth at the expense of necessary protections.

We consider the requirements and standards we have set in this permit are reasonable and necessary to avoid a risk of an unacceptable level of pollution. This also promotes growth amongst legitimate operators because the standards applied to the operator are consistent across businesses in this sector and have been set to achieve the required legislative standards.

Annex 2 - Consultation Responses

The following summarises the responses to consultation with other organisations, our notice on GOV.UK for the public, and the way in which we have considered these in the determination process.

Responses from organisations listed in the consultation section:

Responses received from:

1. **UK Health Security Agency (UKHSA)** (Environmental Public Health Scientist) – response received 09/08/2024

Brief summary of issues raised:

Based on the information contained in the application supplied to us, UKHSA has no significant concerns regarding the risk to the health of the local population from the installation.

Summary of actions taken:

None required.

2. **Hillingdon Council Planning Regeneration and Environment Dept** – response received 16/09/2024

Brief summary of issues raised:

a) There will be no protrusion of a flue and nothing visible. Is it appropriate for a stack to be contained within the building façade with nothing above building height?

b) Would there be any fugitive emissions (based on the volume and any dispersal modelling) that would cascade down from the flue thus potentially interfacing with the air transfer façade?

c) Concern that as the flues are located behind the building façade that black smoke will pour from the entire length of the building.

Summary of actions taken:

a) The Applicant's dispersion modelling accounts for the building height being the same height as the stacks. It is likely that stack clearance would lead to better dispersion, however, their predictions do not show significant impacts during testing.

b) Interference with the air transfer louvered façade could lead to changes to dispersion. However, we note the building is accounted for in the model and this impact is likely to be minimal.
c) We are satisfied that emissions to air from the generators are unlikely to be a significant risk to human health or the environment, as discussed earlier in this document. Visual impact is not a consideration for the permit determination.

3. **Member of the public –** response received 31/07/2024

Brief summary of issues raised:

a) Concern that the air quality impact assessment provided does not include an in-combination impact assessment with VIRTUS data centre permitted under EPR/AP3903PD.
b) Will the air quality management plan for this new facility also include the other 4 data centres for a co-ordinated response in case of emergency?

Summary of actions taken:

a. For testing and emergency scenarios, the Operator predicts insignificant short-term impacts for NO_2 at receptors to the west of London 14 Data Centre (in proximity to Virtus Data Centres Stockley Park campus). Therefore, an in-combination impacts assessment is not required.
b. The Air Quality Management Plan is required under improvement condition IC1. The condition includes a requirement for the Operator to consider how local conditions during a grid failure might influence the response required. This should include consideration of other nearby data centres that may also be affected by a grid failure.