

22/02771/OUT – LAND NORTH OF CAMBRIDGE NORTH STATION, MILTON AVENUE, CAMBRIDGE STATEMENT IN RESPONSE TO COMMENTS OF CAMBRIDGESHIRE COUNTY COUNCIL IN ITS ROLE AS THE MINERALS AND WASTE AUTHORITY (MWPA).

1.0 Introduction

This Statement provides a response to the comments of Cambridgeshire County Council in its role as the Minerals and Waste Authority (MWPA) to application 22/02771/OUT.

The comments of the MWPA were provided on 28 July 2022 with an objection to the proposal requesting further information demonstrating the compatibility of the development with the safeguarded aggregates railhead (TIA), and the Cowley Road Waste Management Area (WMA).

To determine whether the MWPA's objection can be overcome, the MWPA requested the Applicant to prepare a statement, and, if required, assessments prepared by suitably qualified experts, that includes the following:

- A description of the operations conducted at each of the safeguarded sites, highlighting locations of specific operations, where appropriate. The Applicant may also wish to review and detail whether there are any conditions restricting these operations.
- 2. A description and/or plan showing the different uses within the proposed development, the distances between those proposed uses and the safeguarded sites. This should also detail if there are any barriers between the proposed uses and the safeguarded sites.
- 3. Details of the potential interactions or conflicts that may occur between the safeguarded sites and the different uses within the proposed development. This should consider potential effects in both directions, i.e., how a safeguarded site may affect a proposed use, and how a proposed use may affect a safeguarded site. Issues that arise regarding safeguarded facilities often relate to dust, noise, light, odour, traffic, and general amenity. Where instances of Use Class E are proposed, the assessment should consider the most sensitive relevant use that falls within that Use Class.
- 4. Where there are potential interactions or conflict, an assessment of the likely impact on the relevant receptor; whether this impact is considered acceptable without mitigation, or where mitigation is possible, with mitigation; and any mitigation being proposed to overcome the issues identified.

The above statement will need to directly address the requirements of both Policy 16 of the Cambridgeshire and Peterborough Minerals and Waste Local Plan (2021) and the 'agent of change' as set out in paragraph 187 of the NPPF.

This Statement provides a response on the above matters in respect of the safeguarded aggregates railhead (TIA), and the Cowley Road Waste Management Area (WMA).

2.0 Statement

Aggregates Railhead (TIA)

1. A description of the operations conducted at the site

Aggregates, primarily hard stone/rock, are imported to the site by rail and occasionally sand is exported by rail. Operations involve the unloading of railway wagons and the storage of aggregates for sale into the local market. The wagons are offloaded and loaded by an elevated wheeled 360° mechanical excavator, material is stored on site and loaded by a mechanical loading shovel into vehicles for sale and distribution. Storage bays of different aggregates are provided close to the site access for smaller collections. The bays are constructed of concrete Legioblocks approximately 1.8m height which ensures that materials can be stored separately where necessary and to avoid wastage. Currently all material is weighed using the on-board weighing system fitted to the loading shovel. However it may be necessary to install a weighbridge to ensure weights can be accurately recorded at all times. A welfare cabin is also provided for site staff.

There is no processing of materials on site and measures are taken to control dust from the handling and movement of aggregates. All plant and machinery working on site is maintained regularly in accordance with manufacturer's instructions and is fitted with appropriate silencers and 'white noise' reversing alarms.

The operations at the aggregates railhead have scaled down considerably following the closure of the Tarmac asphalt plant. Great British Rail Freight currently uses the TIA on a very limited basis for freight traffic, with one train per week accessing the site, while Tarmac have vacated the site and relocated their asphalt operations to Higham.

It should be noted that the extant planning permission at the site (ref: S/0467/13/CM) governs the activities that can take place. For example, Conditions 12 and 13 of the planning permission limit the operating hours of the Tarmac operation:

- Condition 12: With the exception of routine maintenance, the coated roadstone plant and mineral transfer facility shall not be operated and no heavy commercial vehicles shall enter or leave the site except during the hours of 0630 to 1700 Mondays to Fridays and 0630 to 1300 on Saturdays.
- Condition 13: No delivery of materials by train to the site shall take place outside the hours of 0700 to 2200, Mondays to Fridays. No such deliveries shall take place at any time on Saturdays, Sundays, Bank Holidays and Public Holidays.

Please see a copy of planning permission ref: S/0467/13/CM at Appendix A of this Statement.

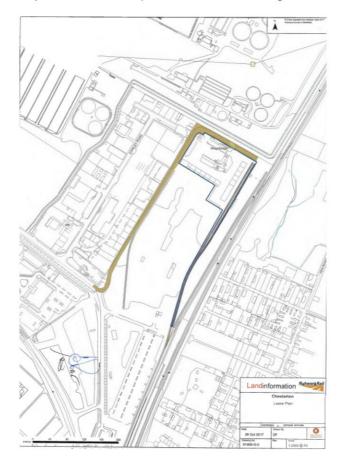
These restrictions formed a factor in the relocation of Tarmac's asphalt operation from the site to an alternative facility in Higham, where time limitations on operating hours do not apply.

Land North of Cambridge North Station, Milton Avenue, Cambridge

Below is the Lease demise (Blue line) for the Great British Rail Freight operation with access rights over the road shaded brown:



Below is the lease demise (Blue line) for the Tarmac operation, with access rights over the road shaded brown:



2. A description and/or plan showing the different uses within the proposed development, the distances between those proposed uses and the safeguarded sites. This should also detail if there are any barriers between the proposed uses and the safeguarded sites.

Please see the Wild Park and Aggregates Yard Interface plan (ref: 630_01(MP)021), which has been prepared to demonstrate the relationship between the proposed development and the safeguarded sites. This plan also details the proposed haul road linkage between the proposed development and the safeguarded sites, to maintain access to these elements as part of the proposed development.

Please also see the Proximity to Mineral Safeguarded Sites plan (ref: 630.01(MP)020), which clearly demonstrates the distances between the proposed development and the safeguarded sites.

These plans are available at Appendices B and C of this Statement.

3. Details of the potential interactions or conflicts that may occur between the safeguarded sites and the different uses within the proposed development. This should consider potential effects in both directions, i.e., how a safeguarded site may affect a proposed use, and how a proposed use may affect a safeguarded site. Issues that arise regarding safeguarded facilities often relate to dust, noise, light, odour, traffic, and general amenity. Where instances of Use Class E are proposed, the assessment should consider the most sensitive relevant use that falls within that Use Class.

Noise

Noise from the railhead was not obvious when the noise survey was undertaken in support of the planning application. Furthermore, no freight trains are scheduled to unload at the site for the next few months following the closure of the asphalt plant.

In response to comments from the Minerals and Waste Authority, a further desk-based acoustic assessment has been undertaken. This assessment, available at Appendix D of this Statement, calculates the rating noise level of noise emissions from the aggregates railhead and the waste transfer station, and the potential effects on future residents of the Proposed Development have been assessed in line with the relevant guidance and national standards.

For the aggregates railhead, the assessment indicates that the predicted rating noise level will be equal to typical background for daytime, and 5dB above the representative background sound level for night-time, at the nearest residential parts of the Proposed Development. Although the night-time impact is predicted to be adverse, it is not considered to amount to a significant adverse effect, as detailed at Appendix D of this Statement.

It should be noted that there are existing residential receptors (Southgates/ Grange Park / Sandy Lane) substantially closer to the loading and unloading of freight at the railway sidings, circa 60mat closest point, than the Residential Quarter of the Proposed Development, circa 280m, so are likely to be more exposed to AR operational noise than the nearest residential properties at the Proposed Development.

Air Quality/Dust

A dust assessment has been prepared to assess the effects of dust from the Roadstone Coatings facility (Tarmac Plant), Railhead and Cowley Road Waste Management Area, which should be read in conjunction with this response (available at Appendix E of this Statement).

It was found that the Roadstone Coatings Facility has existing dust suppression infrastructure embedded into the design of the site that acts to minimise any offsite dust emissions. The Facility has a number of boreholes around the site, from which groundwater is drawn to use in a sprinkler system that dampens dusty materials and stockpiles.

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The sprinklers can be adjusted and rotated 360° to aim at specific areas, and when the sprinkler system is used and water levels drop below a certain level, more water is automatically pumped from the borehole to ensure the storage tank is kept full. Other mitigation was also recommended in the air quality assessment accompanying its planning submission (reference: S/0467/13/CM).

It is considered that the measures currently in place at the Facility and Railhead are sufficient to reduce the risk of fugitive dust emissions affecting future site users to a not significant level when considered alongside local meteorological conditions and in the absence of sensitive receptors within the vicinity of the boundaries of this Site.

The risk of dust blowing from these stockpiles has been assessed as having a 'negligible' effect of causing nuisance dust problems or human health impacts at proposed sensitive receptors within the Cambridge North development once operational

Traffic

The impact of traffic movements to/from the TIA site have been factored into baseline traffic flows so, given the low usage of the TIA and Roadstone Coatings site, it is not anticipated that traffic accessing these sites via the proposed haul road access would generate any adverse impacts upon the proposed residential properties.

4. Where there are potential interactions or conflict, an assessment of the likely impact on the relevant receptor; whether this impact is considered acceptable without mitigation, or where mitigation is possible, with mitigation; and any mitigation being proposed to overcome the issues identified.

As detailed above, no adverse odour, noise or traffic impacts are anticipated to arise from the occasional operation of the TIA, so no further mitigation is considered necessary in relation to these aspects. The measures currently in place at the Roadstone Coatings Facility and TIA are considered appropriate to minimise the risk of fugitive dust emissions arising from the development.

3.0 Cowley Road Waste Management Area (WMA)

1. A description of the operations conducted at the site

Description of the operations

Veolia provide a service collecting waste from commercial customers in and around Cambridge. This principally involves refuse collection vehicles (RCVs) bringing dry recyclable waste materials to the site and tipping it into designated bays inside the waste transfer building, except glass which is tipped into an external bay. The waste materials are stored on site for a short period of time before being loaded onto larger vehicles for onward transport to other waste management facilities for recycling or recovery. The site is effectively a 'drop-off point' that enables commercial waste generated in and around Cambridge to be managed higher up the waste hierarchy. The depot allows the RCVs to be parked overnight and repaired in the workshop.

It should also be noted that the Veolia site has planning permission to enable 24 hour operation of the site, including the vehicle maintenance depot (ref: C/5000/19/CW).

The Veolia site is subject to an Environmental Permit. The Environment Agency's latest inspection (March 2022) confirmed that the site is fully compliant with the conditions of the Permit, which includes management of odour and dust.

Veolia have advised that they have received no complaints re: odour, noise or dust.

2. A description and/or plan showing the different uses within the proposed development, the distances between those proposed uses and the safeguarded sites. This should also detail if there are any barriers between the proposed uses and the safeguarded sites.

Please see the Wild Park and Aggregates Yard Interface plan (ref: 630_01(MP)021), which has been prepared to demonstrate the relationship between the proposed development and the safeguarded sites. This plan also details the proposed haul road linkage between the proposed development and the safeguarded sites, to maintain access to these elements as part of the proposed development.

Please also see the Proximity to Mineral Safeguarded Sites plan (ref: 630.01(MP)020), which clearly demonstrates the distances between the proposed development and the safeguarded sites.

These plans are available at Appendix B and C of this Statement.

3. Details of the potential interactions or conflicts that may occur between the safeguarded sites and the different uses within the proposed development. This should consider potential effects in both directions, i.e., how a safeguarded site may affect a proposed use, and how a proposed use may affect a safeguarded site. Issues that arise regarding safeguarded facilities often relate to dust, noise, light, odour, traffic, and general amenity. Where instances of Use Class E are proposed, the assessment should consider the most sensitive relevant use that falls within that Use Class.

Noise/Air Quality/Dust

<u>Noise</u>

The rating noise level of noise emissions from the aggregates railhead and the waste transfer station have been calculated, and the potential effects on future residents of the Proposed Development have been assessed in line with the relevant guidance and national standards (please see the Acoustic Assessment at Appendix D of this Statement).

For the waste transfer station, the assessment indicates that the predicted rating noise level will be 11dB (daytime) and 6dB (night time) below the representative background sound level at the nearest residential parts of the Proposed Development, which complies with the relevant requirements.

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Dust

After liasing with Veolia, Temple were informed that no dust complaints have ever been made against the site.

After liaising with Veolia regarding processes undertaken at the Waste Transfer Station, Temple's dust risk assessment has identified that the site would generate negligible levels of dust, as processes are undertaken in covered areas, the materials and activities carried out on site do not generate excessive levels of dust and no materials are transported off site to be treated externally.

The dust assessment at Appendix E of this Statement considers this in further detail.

Odour

Odour was scoped out of the EIA, primarily in relation to any potential effects associated with the Cambridge Water Recycling Centre. It has now been raised as a potential concern in relation to the waste transfer station. A Post Submission Odour Response has been prepared by the technical specialist and is attached as Appendix F.

The waste transfer station is not considered to be a source of significant odour emissions that would affect residential amenity at the Proposed Development. No odour assessment of the potential impact of the waste transfer station on the Proposed Development is therefore considered necessary. This is based on the Environment Agency permit, which considers the operations to be "free from odour at levels likely to cause pollution outside the site", and confirms that there have been no odour complaints in the last 2 years

Since the waste transfer station is not predicted to affect the Proposed Development, the latter is unlikely to restrict or prejudice the operation of this safeguarded site and therefore complies with Policy 16 of the Cambridgeshire and Peterborough Minerals and Waste Local Plan and the NPPF.

Traffic

The impact of traffic movements to/from the Veolia site have been factored into baseline traffic flows. It is not anticipated that traffic accessing these sites via the proposed haul road access would generate any adverse impacts upon the proposed residential properties.

4. Where there are potential interactions or conflict, an assessment of the likely impact on the relevant receptor; whether this impact is considered acceptable without mitigation, or where mitigation is possible, with mitigation; and any mitigation being proposed to overcome the issues identified.

As detailed above, no adverse odour, noise or traffic impacts are anticipated to arise from the operation of the Veolia site, so no further mitigation is considered necessary in relation to this aspect. The measures currently in place at the Veolia site are considered appropriate to minimise the risk of fugitive dust emissions arising from the development.

APPENDIX A

Decision Notice ref: S/0467/13/CM



Town and Country Planning Act 1990

Notification of the decision on a planning application

To Bidwells
Trumpington Road
Trumpington
CAMBRIDGE
CB2 9LD

Cambridgeshire County Council, in pursuance of powers under the above Act; hereby **GRANT** planning permission subject to the conditions set out below:

For Proposed reconfiguration and consolidation of the existing minerals processing and transfer operation including the installation of covered mineral storage bays, alterations and extensions to existing feeder unit. New office, welfare and workshop buildings, reconfiguration of site circulation and parking area, new boundary fencing and other works associated with relocating rail sidings to serve the mineral processing site.

At Chesterton Rail Freight Sidings, Chesterton Junction, Cowley Road, Cambridge, CB4 0DL

In accordance with your application dated 01-Nov-2013 and the plans, drawings and documents which form part of the application.



Tanya Sheridan Head of Service, Growth & Economy

Cambridgeshire County Council, Shire Hall, Castle Hill, Cambridge, CB3 0AP

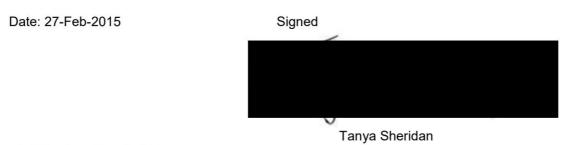
1. The development hereby permitted shall be commenced within three years from the date of this permission.

Reason: To comply with the requirements of Section 91 of the Town and Country Planning Act, 1990 as amended by Section 51 of the Planning and Compulsory Purchase Act 2004.

2. This permission only relates to land edged red as shown on the submitted plan ref. MMD-318305-C-DR-00-XX-1010, received by the Mineral Planning Authority on 4 November 2013.

Reason: To define the site and terms within this planning permission.

- 3. The development hereby permitted shall not be carried out other than in accordance with the details submitted by way of the planning application dated 1 November 2013 and accompanying information and the following drawings:
 - Planning and Design and Access Statement (dated November 2013)
 - Drawing no. MMD-318305-C-DR-00-XX-1010 Rev. P2 Planning Drawing (Red Line Boundary) (Existing Site Layout) (dated 30.10.13)
 - Drawing no. MMD-318305-C-DR-00-XX-1011 Rev. P4 Planning Drawing (Proposed Site Layout) (dated 30.10.13)
 - Drawing no. MMD-318305-C-DR-00-XX-1012 Rev. P1 Site Location Plan (dated 18.10.13)
 - Drawing no. A110 New office facility indicative elevations (dated 31/10/13)
 - Drawing no. A111 Shovel Shed elevations (dated 31/10/13)
 - Drawing no. A112 Workshop elevations (dated 31/10/13)
 - Drawing no. A113 Elevations of main plant (dated 31/10/13)
 - Drawing no. A114 Elevations of cold feeder (dated 31/10/13)
 - Transport Statement (dated October 2013)
 - Noise assessment (dated October 2013),



- Flood risk assessment (dated October 2013)
- Preliminary Ecological Assessment (dated October 2013)
- Phase I Geo-environmental Study (dated October 2013)
- Air Quality Assessment (dated October 2013)
- External Lighting Strategy (dated October 2013)

as amplified and amended by the e-mail dated 14 March 2014 from Brookgate Ltd. with attached Noise Impact Assessment (Addendum) (dated March 2014) and further amended by the Noise Impact Assessment – Addendum II (dated December 2014) (submitted on 18 December 2014) and drawing no MMD-318305-C-DR-00-XX-1013 Rev. P3 (Lafarge and Freightliner Locomotive Locations) (submitted on 6 February 2015).

Reason: To define the permission and to ensure that the development is carried out in compliance with Cambridgeshire and Peterborough Minerals and Waste Development Plan Core Strategy DPD Policies CS24 and CS34.

4. Notwithstanding the provisions of the Town and Country Planning (General Permitted Development Order) 1995 (as amended) (or any order revoking or re-enacting that Order with or without modifications) and with the exception of routine maintenance, no fixed plant, buildings structures and erections shall be erected on the site without the prior written approval of the Mineral Planning Authority.

Reason: To secure control over site operations in the interests of visual and residential amenity. (Cambridgeshire and Peterborough Minerals and Waste Development Plan Core Strategy DPD Policy CS34)

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5. A copy of the planning application and this planning permission, together with all documents hereby approved and any other documents subsequently approved in accordance with this permission (or amendments approved pursuant to this permission) shall be kept available for inspection in the site office and shall be made known to any person given responsibility for the management or control of operations on the site.

Reason: For the avoidance of doubt and to ensure the development is carried out in accordance with the permission and in a satisfactory manner in the interests of the amenity of the area. (Cambridgeshire and Peterborough Minerals and Waste Development Plan Core Strategy DPD Policy CS34)

- 6. The development hereby permitted shall not commence until a construction traffic management plan has been submitted to and approved in writing by the Mineral Planning Authority. The construction management plan shall include the following information:
 - Details of access to the site for construction vehicles
 - Approved routes to and from the site for construction vehicles
 - Details of how construction vehicles will be managed throughout the construction period.

The approved plan shall be implemented throughout the construction period.

Reason: To minimise the impact of construction traffic on the local highway network, and to minimise disruption to local residents, businesses and the general public. (Cambridgeshire and Peterborough Minerals and Waste Development Plan Core Strategy DPD Policies CS32 and CS34)

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7. In the event that any construction works for building foundations require piling, no construction work shall take place until a report/method statement detailing the type of piling and mitigation measures to be taken to protect local residents from noise and vibration has been submitted to the Mineral Planning Authority for approval. Such method statement shall predict the potential noise and vibration levels at the nearest noise and vibration sensitive locations in accordance with the provisions of BS 5228-1:2009+A1:2014 Code of Practice for Noise and Vibration Control on Construction and open Sites. The construction of the development shall thereafter be carried out in accordance with the approved details.

Reason: To protect the amenities of occupiers of nearby properties. (Cambridgeshire and Peterborough Minerals and Waste Development Plan Core Strategy DPD Policies CS24 and CS34)

8. No deliveries of rail-borne aggregate to the unloading area within the eastern boundary of the site shall take place until the layout of the site has been re-configured and the environmental screen along the southern site boundary constructed in accordance with the submitted drawing no. MMD-318305-C-DR-00-XX-1011 Rev. P4 – Planning Drawing (Proposed Site Layout) (dated 30.10.13) received by the Mineral Planning Authority on 1 November 2013. The materials and colour of the environmental screen shall match those of the existing cold feeder canopy at the site and shall be maintained as such for the duration of operations on the site.

Reason: To retain control over the site layout in the interests of residential amenity. (Cambridgeshire and Peterborough Minerals and Waste Development Plan Core Strategy DPD Policies CS24 and CS34)

9. No deliveries of rail-borne aggregate to the unloading area within the eastern boundary of the site shall take place until the noise attenuation barrier described in Section 8.1 of the Mott MacDonald Noise Impact Assessment – Addendum II (dated December 2014) has been constructed in accordance with the submitted specification in the location shown on

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drawing no. MMD-318305-C-DR-00-XX-1013 Rev. P3. The noise attenuation barrier shall thereafter be maintained in accordance with the submitted specification for the duration of operations on the site.

Reason: In the interests of residential and visual amenity. (Cambridgeshire and Peterborough Minerals and Waste Development Plan Core Strategy DPD Policy CS34)

10. The construction of the noise attenuation barrier referred to in Condition 9 above shall not take place outside the hours of 0800 to 1800 Mondays to Fridays and 0800 to 1300 on Saturdays. There shall be no construction operations on Saturday afternoons or on Sundays, Bank Holidays or Public Holidays.

Reason: In the interests of residential amenity. (Cambridgeshire and Peterborough Minerals and Waste Development Plan Core Strategy DPD Policy CS34)

11. No delivery of rail-borne aggregate to the unloading area on the eastern side of the site shall take place until the construction of the noise attenuation barrier referred to in Condition 9 above has been completed to the satisfaction of the Mineral Planning Authority.

Reason: In the interests of residential and visual amenity. (Cambridgeshire and Peterborough Minerals and Waste Development Plan Core Strategy DPD Policy CS34)

12. With the exception of routine maintenance, the coated roadstone plant and mineral transfer facility shall not be operated and no heavy commercial vehicles shall enter or leave the site except during the hours of 0630 to 1700 Mondays to Fridays and 0630 to 1300 on Saturdays. No operations shall take place on the site at any time on Sundays, Bank Holidays and Public Holidays.

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Reason: In the interests of residential amenity. (Cambridgeshire and Peterborough Minerals and Waste Development Plan Core Strategy DPD Policies CS24 and CS34)

13. No delivery of materials by train to the site shall take place outside the hours of 0700 to 2200, Mondays to Fridays. No such deliveries shall take place at any time on Saturdays, Sundays, Bank Holidays and Public Holidays.

Reason: In the interests of residential amenity. (Cambridgeshire and Peterborough Minerals and Waste Development Plan Core Strategy DPD Policies CS32 and CS34)

14. Vehicles shall not enter or leave the site by any other way than via the existing site access at the eastern end of Cowley Road, Chesterton.

Reason: In the interests of highway safety. (Cambridgeshire and Peterborough Minerals and Waste Development Plan Core Strategy DPD Policies CS24, CS32 and CS34)

15. All laden vehicles entering or leaving the site shall be sheeted or carry their load in an otherwise enclosed loadspace.

Reason: In the interests of highway safety. (Cambridgeshire and Peterborough Minerals and Waste Development Plan Core Strategy DPD Policies CS32 and CS34)

16. Noise attributable to the delivery of materials by train to the site shall not exceed a Rating Level, determined according to the requirements of BS4142:2014 or equivalent superseding standard, of 58dB LAeq, 1 hour at the boundary of any residential property. Levels may be determined by direct measurement or derived from a combination of measurement and calculation using propagation corrections. For the avoidance of doubt, where noise levels are determined at facades, they should be expressed

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as free field levels.

Reason: To minimise disturbance to neighbours and the surrounding area. (Cambridgeshire and Peterborough Minerals and Waste Development Plan Core Strategy DPD Policies CS24 and CS34)

17. Within six months from the date of this permission, the locations for the monitoring of noise generated by the development shall be agreed in writing with the Mineral Planning Authority. Thereafter, noise levels shall be monitored at the previously agreed locations at six-monthly intervals during the first two years following the reconfiguration of the site and annually thereafter. The results of the monitoring shall include LAeq noise levels, the prevailing weather conditions, details and calibration of the equipment used for measurement and comments on other sources of noise which affect the noise climate. The monitoring shall be carried out for at least 2 separate 1 hour periods during the working day and the results shall be submitted to the Mineral Planning Authority within 1 month of the monitoring being carried out.

Reason: In the interests of amenity. (Cambridgeshire and Peterborough Minerals and Waste Development Plan Core Strategy DPD Policies CS24 and CS34)

- 18. No aggregate shall be delivered to the site by rail to the unloading area within the eastern boundary of the site until dust suppression equipment has been installed within the materials handling and stockpile area in accordance with a scheme previously submitted to and agreed in writing by the Mineral Planning Authority. Such a scheme shall include:
 - · details of dust suppression equipment to be used;
 - a regime for the monitoring of dust generated by operation at the site;
 and
 - monitoring locations and intervals.
 The results of the dust monitoring shall be submitted to the Mineral
 Planning Authority within 1 month of the monitoring being carried out and

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shall include the prevailing weather conditions, details and calibration of the equipment used for measurement and comments on other sources of dust which affect the dust climate.

Reason: In the interests of amenity for the occupiers of adjacent land. (Cambridgeshire and Peterborough Minerals and Waste Development Plan Core Strategy DPD Policy CS34)

19. The coated roadstone plant including associated bag houses, bitumen tanks and fuel tanks, the cold feeder building and the environmental screen running along the southern site boundary shall be maintained in an external colour finish of BS 4800 12 B 21 Moorland Green for the duration of operations on the site.

Reason: In the interests of residential and visual amenity. (Cambridgeshire and Peterborough Minerals and Waste Development Plan Core Strategy DPD Policies CS24 and CS34)

20. All vehicles, plant and machinery operated within the site shall be maintained in accordance with the manufacturers' specifications at all times and shall be fitted with and use effective silencers. Any breakdown or malfunctioning of silencing equipment shall be treated as an emergency and shall be dealt with immediately. Where a repair cannot be effected within a reasonable period, the equipment affected shall be taken out of service and replaced with equipment which functions to an equivalent standard.

Reason: To ensure minimum disturbance from operations and avoidance of nuisance to the local community. (Cambridgeshire and Peterborough Minerals and Waste Development Plan Core Strategy DPD Policy CS34)

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21. All audible warning devices fitted to mobile plant, vehicles and fixed plant and machinery (with the exception of rail vehicles), whilst affording suitable safety, shall as far as is reasonably practicable be of a design that does not cause unreasonable noise intrusion to residential properties.

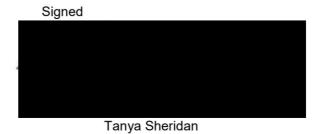
Reason: To mitigate to an acceptable level adverse impacts associated with the operation of audible warning devices on non rail-borne equipment in the interests of the amenity of local residents. (Cambridgeshire and Peterborough Minerals and Waste Development Plan Core Strategy DPD Policy CS34)

22. The development hereby permitted shall be carried out in accordance with the External Lighting Strategy submitted dated October 2013 and submitted with the application. No additional site lighting shall be installed without the prior written approval of the Mineral Planning Authority.

Reason: In the interests of visual amenity. (Cambridgeshire and Peterborough Minerals and Waste Development Plan Core Strategy DPD Policy CS34)

23. Any facilities, above ground, for the storage of oils, fuels or chemicals shall be sited on impervious bases and surrounded by impervious bund walls. The volume of the bunded compound shall be at least equivalent to the capacity of the tank plus 10%. All filling points, vents, gauges and sight glasses shall be located within the bund. The drainage system of the bund shall be sealed with no discharge to any watercourse, land or underground strata. The associated pipework shall be located above ground and protected from accidental damage. All filling points and tank overflow pipe outlets shall be directed to discharge into the bund. For chemicals, including oil and bitumen, all containers shall be sited within a suitably secure and leak proof containment system to prevent any loss to the environment. In both cases, any pollution prevention measures employed shall be shown to continue to function properly during a 1 in 100 year flooding event as a minimum.

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Reason: To prevent pollution of the water environment. (Cambridgeshire and Peterborough Minerals and Waste Development Plan Core Strategy DPD Policy CS24)

24. The development hereby permitted shall not commence until a scheme for the provision and implementation of surface and foul water drainage and pollution control measures has been submitted to and agreed in writing by the Mineral Planning Authority. The works/scheme shall be constructed and completed in accordance with the approved plans/specification at such time(s) as may be specified in the approved scheme and thereafter maintained for the duration of the development.

Reason: To ensure a satisfactory method of foul water drainage to prevent pollution in the interests of amenity. (Cambridgeshire and Peterborough Minerals and Waste Development Plan Core Strategy DPD Policy CS24)

- 25. The development hereby permitted shall not commence until a remediation strategy which includes the following components to deal with the risks associated with contamination of the site has been submitted to and approved in writing by the Mineral Planning Authority:
 - a) A Preliminary Risk Assessment (PRA) including a Conceptual Site Model (CSM) of the site indicating potential sources, pathways and receptors, including those off site;
 - b) The results of a site investigation based on (a) above and a detailed risk assessment, including a revised CSM;
 - c) Based on the risk assessment in (b) above, an options appraisal and remediation strategy giving full details of the remediation measures required and how they are to be undertaken. The strategy shall include a plan providing details of how the remediation works shall be judged to be complete and arrangements for contingency actions. The plan shall also detail a long term monitoring and maintenance plan as necessary;

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d) No part of the proposed development shall take place until a verification report demonstrating completion of works set out in the remediation strategy in (c) above shall be submitted to and approved in writing by the Mineral Planning Authority. The long term monitoring and maintenance plan in (c) above shall be updated and be implemented as approved.

Reason: To protect controlled waters from pollution associated with previous land uses at the site, in the interests of amenity. (Cambridgeshire and Peterborough Minerals and Waste Development Plan Core Strategy DPD Policy CS24)

26. If, during development, contamination not previously identified is found to be present at the site, no further development (unless otherwise agreed in writing by the Mineral Planning Authority) shall be carried out until a remediation strategy detailing how the unsuspected contamination shall be dealt with has been submitted to and agreed in writing by the Mineral Planning Authority. The remediation strategy shall be thereafter be implemented as approved.

Reason: To protect controlled waters from pollution associated with previous land uses at the site, in the interests of amenity. (Cambridgeshire and Peterborough Minerals and Waste Development Plan Core Strategy DPD Policy CS24)

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Tanya Sheridan

Compliance with paragraphs 186 & 187 of the National Planning Policy Framework

The Mineral Planning Authority has worked proactively with the applicant to ensure that the proposed development is acceptable in planning terms. All land use planning matters have been given full consideration and the applicant has responded positive to the advice and recommendations provided by consultees. Proactive consultation took place with statutory consultees, which resulted in overall support for the development proposal.

Notes

- 1. If the applicant is aggrieved by the decision of the Local Planning Authority to refuse permission or approval for the proposed development, or to grant permission or approval subject to conditions, he may appeal to the Secretary of State for Communities and Local Government in accordance with Section 78 of the Town and Country Planning Act 1990 within six months of this notice. Appeals must be made on a form which is available from The Planning Inspectorate, Temple Quay House, 2 The Square, Temple Quay, Bristol, BS1 6PN. The Secretary of State has power to allow a longer period for a notice of appeal but he will not normally be prepared to exercise this power unless there are special circumstances, which excuse the delay in giving notice of appeal. The Secretary of State is not required to entertain an appeal if it appears to him that permission for the proposed development could not have been granted by the Local Planning Authority, or could not have been granted otherwise than subject to the conditions imposed by them, having regard to the statutory requirements, to the provisions of the development order, and to any directions given under the development order.
- 2. If permission to develop land is refused or granted subject to conditions, whether by the Local Planning Authority or by the Secretary of State for Communities and Local Government and the owner of the land claims that the land has become incapable of reasonably beneficial use in its existing state and cannot be rendered capable of reasonably beneficial use by the carrying out of any development which has been or would be permitted, he may serve on the County/District Council in which the land is situated a purchase notice requiring that Council to purchase his interest in the land in accordance with the provisions of Part VI of the Town and Country Planning Act 1990.
- 3. In certain circumstances, a claim may be made against the Local Planning Authority for

Date: 27-Feb-2015 Signed

Tanya Sheridan

compensation, where permission is refused or granted subject to conditions by the Secretary of State on appeal or on a reference of the application to him. The circumstances in which such compensation is payable are set out in Section 114 of the Town and Country Planning Act 1990.

Date: 27-Feb-2015 Signed

Tanya Sheridan

Head of Service, Growth & Economy

Cambridgeshire County Council, Shire Hall, Castle Hill, Cambridge, CB3 0AP

APPENDIX B

630_01 (MP) 021 WILD PARK AND AGGREGATES YARD INTERFACE P1



Proposed seeded grassland Traffic calming ramp, block paved 2m width tarmacpedestrian pavement 50mm width concrete pinkerb 125mm upstand concrete kerb Ulticolour tarmac-Temporary logisticscompound Native hedgerow-900mm band of concrete kerbs laid flush Haul Road Materials - detail plan D-1

Scale 1:2000 @ A3

Scale 1:200 @ A3

Precedent image of Fencing interface: woven willow acoustic fencing at Cambridge North Station

Precedent image: National Rail approved

fencing

NOTES

DO NOT SCALE FROM THIS DRAWING

TO BE READ IN COLOUR

Contractors, sub-contractors and suppliers are to verify any critical dimensions on site prior to commencing work, fabrication or construction of any elements.

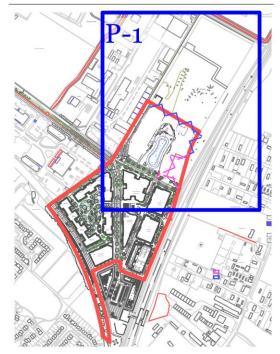
Any discrepancies or errors must be brought to the attention of Robert Myers Associates.

All structural elements are shown indicatively. For all elements of structure, refer to structural engineers' and specialist sub-contractor/fabricators' design, detail and specification.

The drawings are to be read in conjunction with all relevant landscape architect, consultant and specialist drawings. This drawing is to be read specifically in conjunction with: 630_01(MP)006 Hard Landscape Strategy (Wild park).



LOCATION PLAN SCALE: NTS



PURPOSE OF ISSUE

Rev:	Date:	Drawing Status:	
I2	25.08.22	For Information	
P1	21.09.22	For Planning	

REVISIONS

KE VISIONS			
Rev:	Date:	Description:	
I2	25.08.22	updated	
P1	21.09.22	Fencing types specified	

CAMBRIDGE NORTH

Client: Brookgate

Drawing: Wild Park and Aggregates Yard Interface

DRAFT Project No: 630_01

Drawing No: 630_01(MP)021

Scale: 1:200/2000 @A3 Rev: P₁ Date: August 2022 Drawn: EL Checked: JB PM Checked:



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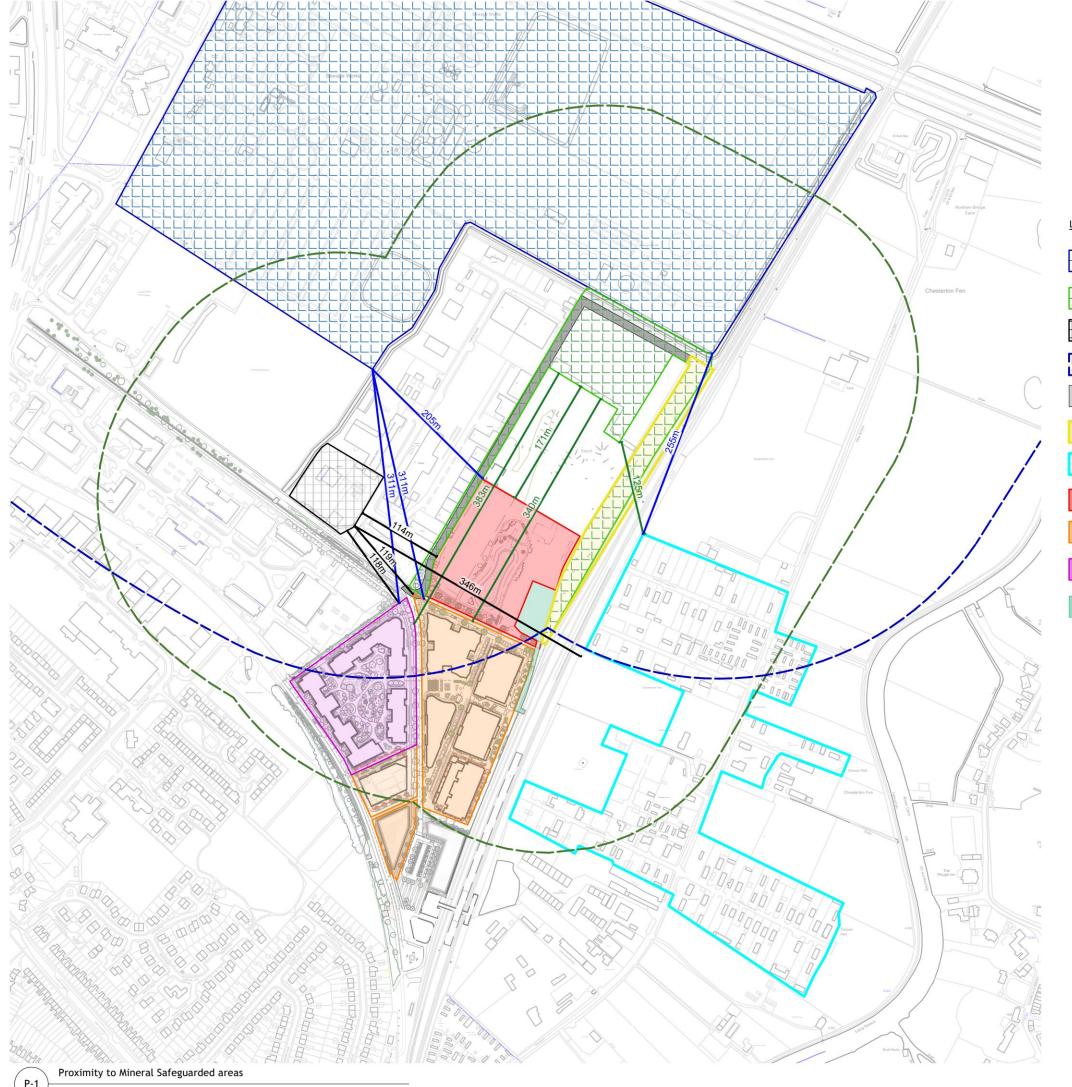
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APPENDIX C

630_01 (MP) 020 PROXIMITY TO MINERAL SAFEGUARDED AREAS P1



NOTES

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Contractors, sub-contractors and suppliers are to verify any critical dimensions on site prior to commencing work, fabrication or construction of any elements. Any discrepancies or errors must be brought to the

attention of Robert Myers Associates. All structural elements are shown indicatively. For all elements of structure, refer to structural engineers' and specialist sub-contractor/fabricators' design, detail and specification.

The drawings are to be read in conjunction with all relevant landscape architect, consultant and specialist

LEGEND

Cambridge Water Recycling Centre

Cambridge Northern Fringe Aggregates Railheads (Transport Infrastructure Area)

Cowley Road Waste Management Area

Consultation Areas

Access Rights

Lease Demise

Existing Residential Edge

Naturalistic Park / Informal recreation

Commercial Area

Residential Area

Rail Infrastructure

PURPOSE OF ISSUE

Rev:	Date:	Drawing Status:
I1	12.08.22	For information
I2	20.09.22	For information
P1	21.09.22	For planning

REVISIONS

Rev:	Date:	Description:
I2	20.09.22	Existing residential edge added
P1	21.09.22	To client comments

CAMBRIDGE NORTH

Client: Brookgate Proximity to Mineral Safeguarded areas Drawing: 630.01 Project No: 630.01(MP)020 Drawing No:

Scale: 1:5000 @ A3 August 2022 Drawn: Date:

PM Checked: RM Checked: JB

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APPENDIX D

CAMBRIDGE NORTH INDUSTRIAL NOISE ASSESSMENT

Brookgate Plc

Industrial and Commercial Noise Desktop Assessment

Cambridge North Development



FURTHER ACOUSTIC CONSULTANCY SUPPORT FOR CAMBRIDGE NORTH DEVELOPMENT IN RESPONSE TO OBJECTIONS – INDUSTRIAL AND COMMERCIAL NOISE DESKTOP ASSESSMENT

Prepared for: Brookgate Plc

Two Station Place Cambridge CB1 2FP

www.brookgate.eu

Prepared by: Norbert Skopinski

Principal Consultant - Acoustics

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Document Control

Version No.	Date	Author	Reviewed	Approved
1.0	28/09/2022	Norbert Skopinski	John Fisk	John Fisk
2.0	05/10/2022	Norbert Skopinski	John Fisk	John Fisk

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1 Introduction

- 1.1.1 Temple Group Limited (Temple) has completed the noise and vibration assessment as part of the Environmental Statement (ES) Noise and Vibration Chapter for the Cambridge North development (22/02771/OUT) 'the Proposed Development'. The assessment has been based on environmental surveys, prediction and calculation undertaken for the Site. The assessment established that the main sources of noise incident on the Site and surrounding receptors are road traffic noise (including the Cambridgeshire Guided Busway) and rail noise. The Site could potentially experience industrial noise from the Aggregates Railhead (AR) facility, and Cowley Road Industrial estate including the Waste Transfer Station (WTS). The noise from these facilities was not prevalent during the attended survey however, it has been concluded that sound insulation measures which will be implemented to control road and rail traffic noise at the Proposed Development, would also have the effect of minimising the impact of the industrial noise. Further surveys and assessment related to these sources were not deemed necessary.
- 1.1.2 On the 8th August 2022, Temple were provided with a document containing objections for the Cambridge North development from Cambridgeshire County Council (CCC) in its role as Minerals and Waste Planning Authority (MWPA). There are three main topics on which the objections have been made relating to the nearby Waste Management Area and Safeguarded Aggregates Railhead. These are noise and vibration from both sites, odour from the Waste Management area and dust risk from the Aggregates Railhead.
- 1.1.3 The Aggregates Railhead is protected under Policy 16 (Consultation Areas) of the Cambridgeshire and Peterborough Minerals and Waste Local Plan (2021) which states that "development within a Consultation Area (CA) will only be permitted where it is demonstrated that the development will: c) not prejudice the existing or future use of the area [...] for which the CA has been designated; and d) not result in unacceptable amenity issues or adverse impacts to human health for the occupiers or users of such new development, due to the ongoing or future use of the area for which the CA has been designated."
- 1.1.4 Due to the proximity of both the AR and the WTS to the Proposed Development, there is concern that the future users of the Site could be at risk of noise and vibration impacts from these sites, which could give rise to complaints, which could then lead to further constraints on the operation of these facilities. This assessment provides further detail on noise incident on the Site when these sites operate, in support of discharging of the above objections placed on the Proposed Development.

- 1.1.5 To address the concerns, Temple has undertaken an assessment of noise emissions from both sites to assess the risk they pose to future users of the Proposed Development and, where required, to provide outline mitigation measures for further noise attenuation. Further noise monitoring of noise emissions from these sites was considered; however, due to constraints imposed by unknown AR delivery dates/times it was not possible to carry out. However, sufficient information is available on operational noise from these facilities in reports by others (see section 4 for details).
- 1.1.6 In addition, the suitability of the use of outdoor amenity spaces within the Proposed Development has been assessed when these sites operate.
- 1.1.7 The assessment has been carried out in line with relevant guidance and national standards.
- 1.1.8 Heavy road traffic would only be expected to lead to significant vibration levels if it is within a 5 to 10m distance from the sensitive receptor and the roads are in poor condition. The roads surrounding the Site are in good condition. Therefore, road traffic is not expected to give rise to significant vibration effects due to the propagation distances and road surface conditions required to maintain significant levels of vibration at the receptor. Vibration exposure was also measured during an attended survey at the Proposed Development in February 2022. The resultant vibration levels indicate that adverse comments are not expected and the risk of disturbance from environmental vibration is considered to be sufficiently low so as to omit the need for a further assessment. The detailed survey methodology, equipment used, and vibration assessment can be found in the ES Noise and Vibration Chapter for the Cambridge North Development (22/02771/OUT).
- 1.1.9 The following sections of the report describe criteria for industrial and commercial sound and outdoor amenity spaces, assessment methodology along with results of the assessment from the AR and WTS site operations.
- 1.1.10 The acoustic terminology used in this report is explained in **Appendix A**.

2 Policy Standards and Guidance

2.1 Standards and Guidance

British Standard 4142:2014+A1:2019 - Methods for rating and assessing industrial and commercial sound

- 2.1.1 British Standard 4142 (BS 4142)¹ describes methods for rating and assessing sound of an industrial and/or commercial nature. The method uses outdoor sound levels to assess the likely effects of sound on people who might be inside or outside a dwelling or premises used for residential purposes upon which sound is incident. The method is suitable for the purpose of assessing sound at proposed new dwellings or premises used for residential purposes.
- 2.1.2 The standard requires determination of the following:
 - Rating level $L_{Aeq,Tr}$ sound level produced by the specific sound source at the assessment location with any adjustment added to the specific sound level if a tone, impulse or other acoustic characteristic occurs, or is expected to be present.
 - Background sound level, $L_{A90,T}$ A-weighted sound pressure level that is exceeded by the residual sound at the assessment location for 90% of a given time interval, T.
 - T_r is the reference time interval over which the specific sound level is determined. This is 1-hour for daytime (07:00-23:00 h) and 15-minutes for night-time (23:00-07:00 h).
- 2.1.3 An estimate of the impact of the specific sound generated can be obtained by subtracting the measured background sound level from the rating level, and the following is considered:
 - a) Typically, the greater this difference, the greater the magnitude of the impact.
 - b) A difference of around +10dB or more is likely to be an indication of a significant adverse impact, depending on the context.
 - c) A difference of around +5dB is likely to be an indication of an adverse impact, depending on the context.
 - d) The lower the rating level is relative to the measured background sound level, the less likely it is that the specific sound source will have an adverse impact

¹ British Standards Institute (BSI), (2014+A1:2019): 'BS 4142 – Methods for rating and assessing industrial and commercial sound

- or a significant adverse impact. Where the rating level does not exceed the background sound level, this is an indication of the specific sound source having a low impact, depending on the context.
- 2.1.4 The assessment methodology considers the Specific Sound Level, as measured or calculated at a potential noise sensitive receptor, due to the sound under investigation. A correction factor is added to this level to account for the acoustic character of the sound as follows:
 - Tonality A correction of up to 6dB depending on the prominence of tones;
 - Impulsivity A correction of up to 9dB depending on the prominence of impulsivity;
 - Other sound characteristics A 3dB correction may be applied where a distinctive acoustic character is present that is neither tonal nor impulsive;
 - Intermittency A 3dB correction may be applied where the specific sound has identifiable on-off conditions.
- 2.1.5 All pertinent factors should be taken into consideration when assessing the impact, including the following:
 - Where background sound levels and rating levels are low, absolute levels might be as, or more, relevant than the margin by which the rating level exceeds the background. This is especially true at night.
 - The character and level of the residual sound compared to the character and level of the specific sound.
 - The sensitivity of the receptor

British Standard 8233:2014 - Guidance on sound insulation and noise reduction for buildings

2.1.6 The suitability of the use of outdoor amenity spaces within the Proposed Development has been assessed using British Standard 8233:2014 (BS 8233)² criteria. BS 8233 states:

"For traditional external areas that are used for amenity space, such as gardens and patios, it is desirable that the external noise level does not exceed 50 dB LAeq,T with an upper guideline value of 55 dB LAeq,T which would be acceptable in noisier environments. However, it is also recognised that these guideline values are not achievable in all circumstances where development might be desirable. In higher noise areas, such as city centres or urban areas adjoining the strategic transport network, a compromise between elevated noise levels and other factors, such as the

² British Standard BS 8233:2014 'Guidance on sound insulation and noise reduction for buildings'. BSI, London

convenience of living in these locations or making efficient use of land resources to ensure development needs can be met, might be warranted. In such a situation, development should be designed to achieve the lowest practicable levels in these external amenity spaces but should not be prohibited."

"Other locations, such as balconies, roof gardens and terraces, are also important in residential buildings where normal external amenity space might be limited or not available, i.e. in flats, apartment blocks, etc. In these locations, specification of noise limits is not necessarily appropriate. Small balconies may be included for uses such as drying washing or growing pot plants, and noise limits should not be necessary for these uses. However, the general guidance on noise in amenity space is still appropriate for larger balconies, roof gardens and terraces, which might be intended to be used for relaxation. In high-noise areas, consideration should be given to protecting these areas by screening or building design to achieve the lowest practicable levels. Achieving levels of 55 dB LAeq,T or less might not be possible at the outer edge of these areas but should be achievable in some areas of the space."

3 The Site and its Surroundings

- 3.1.1 The Proposed Development plot lies on the land to the north of Cambridge North Station, to the west of the railway, off Milton Avenue & Cowley Road.
- 1.1.1 The proposal is to develop 6 new buildings intended for business use and 3 new buildings, consisting of 10 blocks, for residential use.
- 1.1.2 The AR is located to the northeast of the Proposed Development. The closest existing residential receptors are beyond the main railway line to the east and south (Sunningdale Caravan Park, Dwellings in Southgates and Dwellings on Grange Park / Sandy Lane, circa 60 300m). To the southwest are the future residents of the Residential Quarter of the Proposed Development, circa 280m. It should be noted that the Proposed Development would not introduce residential receptors any closer to the AR site than the existing residential receptors.
- 3.1.2 The WTS is located to the north of the Proposed Development. The closest existing residential receptors are dwellings on Discovery Way to the west of the site, circa 280m and future residents of the Residential Quarter of the Proposed Development to the south circa 120m.
- 3.1.3 The existing and future receptors and type of receptor as well as the sites of industrial noise are presented in **Table 1**; their locations are shown in **Figure 1**.

Table 1 Noise Sensitive Receptors and Industrial Noise Sources

Receptor/ Source ID	Receptor / Source	Туре
R1	Dwellings on Discovery Way	Residential Receptor
R2	Dwellings on Long Reach / Bourne / Fairbairn Road	Residential Receptor
R3	Sunningdale Caravan Park	Residential Receptor
R4	Dwellings in Southgates	Residential Receptor
R5	Dwellings on Grange Park / Sandy Lane	Residential Receptor
R6	Future residents of the Residential Quarter of the Proposed Development	Residential Receptor
R7	Novotel Hotel	Commercial Receptor
R8	Cambridge Commercial Park	Commercial Receptor
R9	Cambridge Business Park	Commercial Receptor
R10	One Cambridge Square	Commercial Receptor
S1	Waste Transfer Station	Commercial Noise Source
S2	Aggregates Railhead	Commercial Noise Source

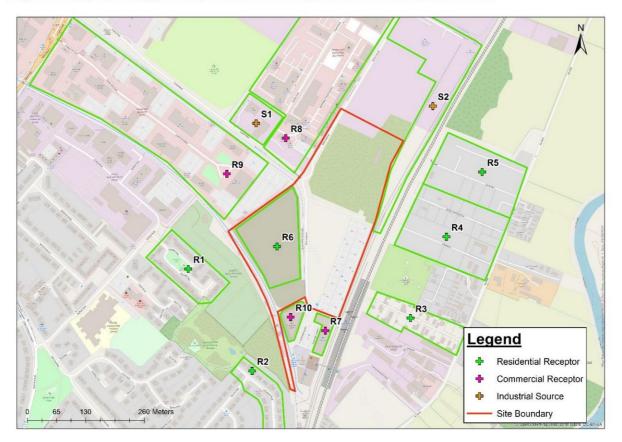


Figure 1 Map Showing Nearby Sensitive Receptors and Industrial Sources

3.2 Baseline Survey and Results

3.2.1 **Table 2** presents a summary of the results from the long-term unattended noise measurements captured at the Proposed Development during the February 2022 survey undertaken by Temple, their locations are shown in **Figure 2.** The noise levels presented are representative of free field conditions. The detailed survey methodology, weather conditions, and equipment used can be found in the ES Noise and Vibration Chapter for the Cambridge North Development (22/02771/OUT).

Table 2 Summary of Noise Levels Derived for each Receptor from Unattended Survey Results

Receptor IDs represented	Relevant Monitori ng Position	Ambient Noise Level L _{Aeq,T} dB		10 th Highest L _{Amax} dB		Typical Lowest L _{A90} dB	
n		Day	Night	Day	Night	Day	Night
		07:00- 23:00	23:00- 07:00	07:00- 23:00	23:00- 07:00	07:00- 23:00	23:00- 07:00
R3, R4, R5, R7, R12	UN1	52	48	79	74	42	37
R1, R2, R6, R8, R9, R10, R11	UN2	51	44	73	64	42	37

Figure 2 Map Showing Unattended Noise Survey Locations



4 Methodology

- 4.1.1 The level of noise impact on future occupiers of the Proposed Development has been assessed based on the predicted noise levels from the Safeguarded Aggregates Railhead presented in *Chesterton Sidings Noise Impact Assessment Addendum II* (December 2014)³ and the noise limits set by CCC Joint Development Control Committee for the Cambridge Fringes on Veolia ES (UK) Ltd, Cowley Road Waste Transfer Station Site (December 2019)⁴.
- 4.1.2 The AR is operated by the Tarmac Roadstone Coatings Facility / Freightliner / DB Cargo / Network Rail. The Tarmac operations located to the northeast of the AR site are restricted by the operating hours set out in the planning consent Condition 12 and 13 of the CCC Joint Development Control Committee Report Ref. No. S/0467/13/CM³. These conditions limit the operating hours of the Tarmac site to daytime only, with the exception of routine maintenance.
- 4.1.3 Condition 12 states that:

"With the exception of routine maintenance, the coated roadstone plant and mineral transfer facility shall not be operated and no heavy commercial vehicles shall enter or leave the site except during the hours of 0630 to 1700 Mondays to Fridays and 0630 to 1300 on Saturdays."

4.1.4 And Condition 13 states that:

"No delivery of materials by train to the site shall take place outside the hours of 0700 to 2200, Mondays to Fridays. No such deliveries shall take place at any time on Saturdays, Sundays, Bank Holidays and Public Holidays."

- 4.1.5 The AR Freightliner operations (operated by DB Cargo) located adjacent to the mainline Fen Line are not included within this planning consent and are not impacted by any planning-related restrictions in relation to the operating hours.
- 4.1.6 It should be noted however, that the DB Cargo are responsible for land to the north of the Proposed Development area, which contains freight aggregate operations. Based on recent communications, it is understood that Freightliner site is no longer moving any freight traffic into the site, and the traffic is being

³ S/0467/13/CM | Proposed reconfiguration and consolidation of the existing minerals processing and transfer operation including the installation of covered mineral storage bays, alterations and extensions to existing feeder unit. New office, welfare and workshop buildings, reconfiguration of site circulation and parking area, new boundary fencing and other works associated with relocating rail sidings to serve the mineral processing site. | Chesterton Rail Freight Sidings Chesterton Junction Cowley Road Cambridge CB4 0DL (cambridgeshire.gov.uk)

⁴ C/5000/19/CW | Erection of pre-fabricated building for use as a waste transfer station; new weighbridge and storage bays; alterations to existing vehicular access and 8 no. additional vehicle parking spaces. Informative: Section 73 planning application to continue the development without compliance with conditions 5 (hours) and 7 (noise limit) of planning permission reference C/05004/12/CC to enable 24 hour operation of the Waste Transfer Station (WTS) including maintenance depot. | Veolia Es (UK) Limited Cowley Road Cambridge CB4 0DN (cambridgeshire.gov.uk)

- moved by the Great British Rail Freight instead, circa one train delivery per week. The layout of the AR Tarmac and Freightliner sites relative to the Proposed Development are shown in **Appendix B**.
- 4.1.7 The WTS is operated by the Veolia ES (UK) Ltd. The WTS operations are restricted by the operating hours and noise limits set out in the planning consent Condition 5 and 7 of the CCC Joint Development Control Committee Report Ref. No. C/5000/19/CW⁴. The permitted hours of operation except unloading, loading and despatch of glass are Monday 05:00 to 00:00 (midnight), Tuesday to Friday unrestricted, Saturday 00:00 to 23:00 and Sunday 07:00 to 23;00. The permitted hours of operation for the receipt, unloading, loading and despatch of glass are Monday to Friday 07:00 to 18:00 (except bank or public holidays).

4.2 AR Calculation Methodology

- 4.2.1 To calculate the level of impact from the AR operations on the nearest residential properties of the Proposed Development, a noise model was developed within the Datakustik CadnaA software with calculations carried out in accordance with the international standard ISO 9613-2:1996 based on the reference noise levels for each noise emitting item during the train delivery during Tarmac operations.
- 4.2.2 A summary of delivery train noise levels derived from the Chesterton Sidings Noise Impact Assessment Addendum II (December 2014)³ are shown in **Table 3.**

Table 3 Summary of Delivery Train Noise derived from the Chesterton Sidings Noise Impact Assessment – Addendum II (December 2014) Table 6.2

Description	Distance from source (m)	Measurement duration (minutes)	L _{Aeq,T} dB
Static conveyor (discharge unit)	5m	1:00	87
Wagon-mounted conveyor engine	4m	1:00	86
Moving conveyor under waggons	6m	1:00	81
Rail locomotive idling	5m	1:00	79

4.2.3 A scenario of a typical rail delivery was modelled based on the Chesterton Sidings Noise Impact Assessment – Addendum II (December 2014)³ assumptions, as follows:

- Deliveries will take place 40 wagons at a time;
- Deliveries last 3 to 4 hours, with a frequency of 2 to 3 per week depending on demand;
- The train is split into two with half the train stabled in the eastern siding while the other half is unloaded;
- The locomotive is situated at the southern end of the train and reverses into the siding adjacent to the AR site;
- The discharge unit is located at the northern end of the train adjacent to the proposed storage bays on the AR site;
- A delivery train with 20 wagons would be 204m long from end-to-end, including a 20m long locomotive and 20m long discharge unit; and
- The static conveyor (the discharge unit) at the far end of the train, the locomotive engine, and the waggon- mounted conveyor motors have been modelled as point sources. The moving conveyor (under the entire length of the train) has been modelled as a line source.

4.3 WTS Calculation Methodology

- 4.3.1 To calculate the level of impact from the WTS operations on the nearest residential properties of the Proposed Development the noise limits set out in the planning consent CCC Joint Development Control Committee for the Cambridge Fringes on Veolia ES (UK) Ltd, Cowley Road Waste Transfer Station Site (December 2019) Ref. No. C/5000/19/CW⁴ has been used in noise model.
- 4.3.2 The following WTS site boundary noise limit condition was modelled:
- 4.3.3 "The free-field equivalent continuous noise level, measured as a LAeq_{1hr}, (dBA Equivalent Continuous Sound Level, 1 hour) from operations carried out at the site shall not exceed 60dB when measured at the boundary of the site. Measurements shall be taken from a position 1.2 1.5 metres above ground and at least 3.5 metres away from any façade."

5 Assessment

5.1.1 This assessment has considered the impact of the AR and WTS operations and the effect it may have on existing background noise levels. The assessment has predicted the noise levels at the nearest residential properties of the Proposed Development and compared the results with the existing representative background noise levels. Screenshots from the model are shown in **Appendix C.**

5.2 AR Operations Noise Assessment

5.2.1 The total noise level from a typical rail delivery at AR was calculated at 1m from the facades of the nearest residential properties of the Proposed Development.

The results are summarised in **Table 1**.

Table 1 BS 4142 assessment of the AR operations on the nearest residential properties of the Proposed Development based on representative baseline noise levels.

Results		dB (day)	dB (night)	
Background Sound Level	L _{A90,15mins}	42	37	A-weighted sound pressure level that is exceeded by the residual sound at the assessment location for 90% of a given time interval, 15 minutes.
Distance Attenuation	N/A			Considered in noise modelling software
On Time Correction	N/A			Considered in noise modelling software
Specific Sound Level	LAeq,T	39	39	Specific sound level at the nearest residential properties of the Proposed Development calculated in CadnaA.
Acoustic feature correction	Tonality			Based on the assessment in the Chesterton Sidings Noise Impact Assessment – Addendum II (December 2014) the level differences between adjacent 1/3 rd Octave bands that identify a tone are not exceeded, therefore no tonal correction applied.
	Intermittency	0	0	In line with the Chesterton Sidings Noise Impact Assessment – Addendum II (December 2014) it is assumed that correction is not required.
	Impulsivity	0	0	In line with the Chesterton Sidings Noise Impact Assessment – Addendum II (December 2014) it is assumed that correction is not required.
	Other Sound Characteristics	3	3	In line with the Chesterton Sidings Noise Impact Assessment – Addendum II (December 2014), where the specific sound features characteristics that are neither tonal nor impulsive, though are otherwise readily distinctive against the residual acoustic environment, a 3dB has been applied.

Results	dB (day)	dB (night)	
Rating Level	42	42	Rating level including acoustic feature corrections
Excess of rating level over background sound level	0	5	The rating level is at the background sound level during the day and 5dB above the night background sound level. The assessment indicates that the specific sound source is likely to have a low impact, depending on the context during the day and an adverse impact depending on the context during the night.

- 5.2.2 The assessment indicates a rating level equal to background for day and 5dB above the background sound level $L_{A90,15mins}$ for night. Therefore, a difference of 5dB is likely to be an indication of an adverse impact when the AR operate at night.
- 5.2.3 Based on the above, the specific sound source is likely to have a low impact, in the context of prevailing road and rail noise at the Proposed Development site during daytime operations but is likely to have adverse impact depending on the context (described below) during the night. Although the night impact is predicted to be adverse, it is not considered to be a significant adverse impact.
- 5.2.4 The AR Freightliner site is no longer moving any freight traffic into the site, and the traffic is being moved by the Great British Rail Freight instead, circa one train delivery per week. This indicates that the night impact will be limited to circa one train delivery per week.
- 5.2.5 It should be noted that there are existing residential receptors (Southgates / Grange Park / Sandy Lane) substantially closer to the loading and unloading of freight at the railway sidings, circa 60m at closest point, than the Residential Quarter of the Proposed Development, circa 280m, so are likely to be more exposed to AR operational noise than the nearest residential properties at the Proposed Development.
- 5.2.6 The typical lowest background level was used in the assessment and the impact is likely to be less for the majority of the time; and therefore, background noise levels may be marginally higher than indicated in the assessment when the AR is operating, given it wouldn't operate through the whole night time period. Where the predicted noise levels from the noise model are compared against the measured survey L_{Aeq} noise levels, the predicted levels are below the existing noise levels at the nearest residential properties of the Proposed Development.
- 5.2.7 In addition, the ES chapter states that "windows would need to be closed to achieve the guideline indoor noise levels" for the facades exposed to the

- prevailing road and rail noise. Therefore, if the noise from the AR Freightliner night operations is prevalent at times, the mitigation proposed to minimise the road and rail noise, as stated in the ES chapter, will also reduce impact when the AR operate.
- 5.2.8 Based on the above-described context, the assessment indicates that the operations of the AR are likely to have a low impact on the nearest residential properties of the Proposed Development and no further mitigation is likely to be required.

5.3 WTS Operations Noise Assessment

5.3.1 The total noise level based on the permitted noise limit on WTS site was calculated at 1m from the facades of the nearest residential properties of the Proposed Development. The results are summarised in **Table 5**.

Table 5 BS 4142 assessment of the WTS operations on the nearest residential properties of the Proposed Development based on representative baseline noise levels.

Results		dB (day)	dB (night)	
Background Sound Level	L _{A90,15mins}	42	37	A-weighted sound pressure level that is exceeded by the residual sound at the assessment location for 90% of a given time interval, 15 minutes.
Distance Attenuation	N/A			Considered in noise modelling software
On Time Correction	N/A			Considered in noise modelling software
Specific Sound Level	LAeq,T	31	31	Specific sound level at the nearest residential properties of the Proposed Development calculated in CadnaA.
Acoustic feature	Tonality			1/3 rd Octave band data not available.
correction	Intermittency	0	0	No intermittency sound features are known at this stage of the assessment It is assumed that correction is not required.
	Impulsivity	0	0	No impulsive sound features are known at this stage of the assessment. It is assumed that correction is not required.
	Other Sound Characteristics	0	0	No other sound characteristics are known at this stage of the assessment.
Rating Level		31	31	Rating level including acoustic feature corrections
Excess of rating level over background sound level		-11	-6	The rating level is 11dB and 6dB below the day and night background sound levels respectively. The assessment indicates that the specific sound source is likely to have a low impact depending on the context during the day and night.

It should be noted that the above assessment assumes no correction for tonality, impulsivity, other distinctive acoustic character, or intermittency. Consequently, all sources should be controlled so that these issues are not present at noise sensitive locations or else corrections will need to be applied.

5.3.2 The assessment indicates a rating level of 11dB for day and 6dB for night below the background sound level L_{A90,15mins}. The lower the rating level is relative to the measured background sound level, the less likely that it is that the specific sound source will have an adverse impact or a significant adverse impact. Where the rating level does not exceed the background sound level, this is an indication of the specific sound source having a low impact, depending on the

- context. In this case, in context of prevalent road and rail noise sources at the Proposed Development site.
- 5.3.3 Based on the permitted noise limit on WTS site operations, the assessment indicates the specific sound source having a low impact, in context of prevailing road and rail noise, on the nearest residential properties of the Proposed Development, and no further mitigation is likely to be required.

5.4 External Amenity Areas Noise Levels

5.4.1 It is desirable that the external noise level in amenity spaces such as private gardens does not exceed 50dB L_{Aeq,16hr}, with an upper guideline value of 55dB L_{Aeq,16hr}, which would be acceptable in noisier environments. **Figure 3** shows the modelled daytime noise levels including the AR, WTS and local road and rail noise sources for external amenity areas at a height of 1.5m.



Figure 3 Noise Levels in External Amenity Areas

- 5.4.2 The assessment of external noise levels to BS 8233 indicates that the guideline level of 50dB L_{Aeq,16hr} would be achieved for the majority of the Residential Quarter, with the spaces between the blocks facing Milton Avenue and facades facing Cambridgeshire guided busway achieving the upper guideline value, as they have a direct line of sight to Milton Avenue and the busway, and do not benefit from any screening. External facing facades on Milton Avenue are unlikely to achieve guideline noise levels for external amenity areas.
- 5.4.3 The proposed Wild Park amenity space, to the northeast of the Proposed Development is likely to be exposed to the noise levels below the guideline levels of 50dB L_{Aeq,16hr} in the majority of the area. However, the northeast and northwest area of the park will be above this guideline level but below the upper guideline value of 55dB L_{Aeq,16hr}, as it has a direct line of sight to the AR access road and to the sidings where train deliveries are taking place. The park does not benefit from any acoustic screening. The small area of the park in within approximately 25m of the AR access road is likely to exceed the upper guideline noise level for external amenity spaces.

- 5.4.4 However, it should be noted that these levels are only expected when the AR is operational; otherwise, the guideline level of 50dB L_{Aeq,16hr} would be achieved in the majority of the park.
- 5.4.5 As described above, while some facades and amenity areas are likely to be exposed to noise levels above the 55dB L_{Aeq,16hr} upper guideline limit, BS 8233 recognises that although these are ideal target levels, they are not always achievable in noisier areas (such as built-up urban areas adjoining the strategic transport network) where development is desirable. Higher noise levels need to be balanced against other considerations such as the benefit of living in these central areas.
- 5.4.6 Furthermore, the Planning Practice Guidance advises that noise impacts may be partially off-set if the residents of those dwellings affected by high noise levels have access to:
 - a relatively quiet, protected, nearby external amenity space for sole use by a limited group of residents as part of the amenity of their dwellings, and/or;
 - a relatively quiet, protected, external publicly accessible amenity space (e.g. a public park or a local green space designated because of its tranquillity) that is nearby (e.g. within a 5 minutes walking distance).
- 5.4.7 There are relatively quieter outdoor amenity spaces within the Proposed Development in the courtyards which are screened from the road, rail noise, other operations and are available to all residents.

6 Conclusion

- 6.1.1 On the 8th August 2022, Temple were provided with a document containing objections for the Cambridge North development from CCC in its role as MWPA. There are three main topics on which the objections have been made relating to the nearby WTS and Safeguarded AR. Due to the proximity of both the AR and the WTS to the Proposed Development, there is concern that the future users of the Proposed Development could be at risk of noise and vibration impacts.
- 6.1.2 Further to above, Temple has been appointed by Brookgate to undertake a desktop assessment of noise emissions from both sites to assess the risk they pose to future users of the Proposed Development, and where required, to provide outline mitigation measures for further noise attenuation.
- 6.1.3 Temple has undertaken calculations of the rating noise level of noise emissions from AR and WTS sites and assessed the effects of the operations of these sites on the future residential users of the Proposed Development. This has been assessed in line with the relevant guidance and national standards.
- 6.1.4 For the WTS operations, the assessment indicates that the predicted rating noise level will be 11dB and 6dB below the representative background sound level at the nearest residential properties of the Proposed Development. This complies with the relevant requirements during the day and at night.
- 6.1.5 For the AR operations, the assessment indicates that the predicted rating noise level will be equal to typical background for day and 5dB above the representative background sound level for night at the nearest residential properties of the Proposed Development. Although the night impact is predicted to be adverse, it is not considered to be a significant adverse impact. The typical lowest background level was used in the assessment and the impact is likely to be less for the majority of the time. Also, if the noise from the AR night operations is prevalent at times, the mitigation proposed to minimise the road and rail noise, as stated in the ES chapter, will also reduce impact when the AR site operate at night. It may therefore be concluded that the AR operations are likely to have a low impact on the nearest residential properties of the Proposed Development and no further mitigation is likely to be required.
- 6.1.6 Guideline external noise levels are likely to be met for most of residential amenity areas within the Proposed Development such as Courtyards. External balconies and Wild Park amenity space overlooking the access roads will be exposed to noise levels above the upper guideline of 55dB L_{Aeq,T}. Where the noise level requirements are not met, suitable alternative quieter areas are available.

Appendix A Acoustic Glossary

Noise/Sound

Noise and sound need to be carefully distinguished. Sound is a term used to describe wave-like variations in air pressure that occur at frequencies that can stimulate receptors in the inner ear and, if sufficiently powerful, be appreciated at a conscious level. Noise implies the presence of sound but also implies a response to sound: noise is often defined as unwanted sound.

Decibel, dB

The unit used to describe the magnitude of sound is the decibel (dB) and the quantity measured is the sound pressure level. The decibel scale is logarithmic, and it ascribes equal values to proportional changes in sound pressure, which is a characteristic of the ear. Use of a logarithmic scale has the added advantage that it compresses the very wide range of sound pressures to which the ear may typically be exposed to a more manageable range of numbers. The threshold of hearing occurs at approximately 0dB (which corresponds to a reference sound pressure of 20 μ Pa) and the threshold of pain is around 120dB.

Frequency, Hz

Frequency is the number of occurrences of a repeating event per unit second or Hertz (Hz). The human ear is sensitive to sound in the range 20 Hz to 20,000 Hz (20 kHz). For acoustic engineering purposes, the frequency range is usually divided up into octave bands, in which the upper limiting frequency for any band is twice the lower limiting frequency. The bands are described by their centre frequency value. In environmental acoustics the ranges typically used are from 63 Hz to 8 kHz.

A-weighting

The sensitivity of the ear is frequency dependent. Sound level meters are fitted with a weighting network which approximates to this response and allows sound levels to be expressed as an overall single figure value, in dB(A).

Ambient sound

Totally encompassing sound in a given situation at a given time, usually composed of sound from many sources near and far.

Ambient sound level (LAeq,T)

Equivalent continuous A-weighted sound pressure level of the totally encompassing sound in a given situation at a given time, usually from many sources near and far, at the assessment location over a given time interval, T.

Background sound level (LA90,T)