

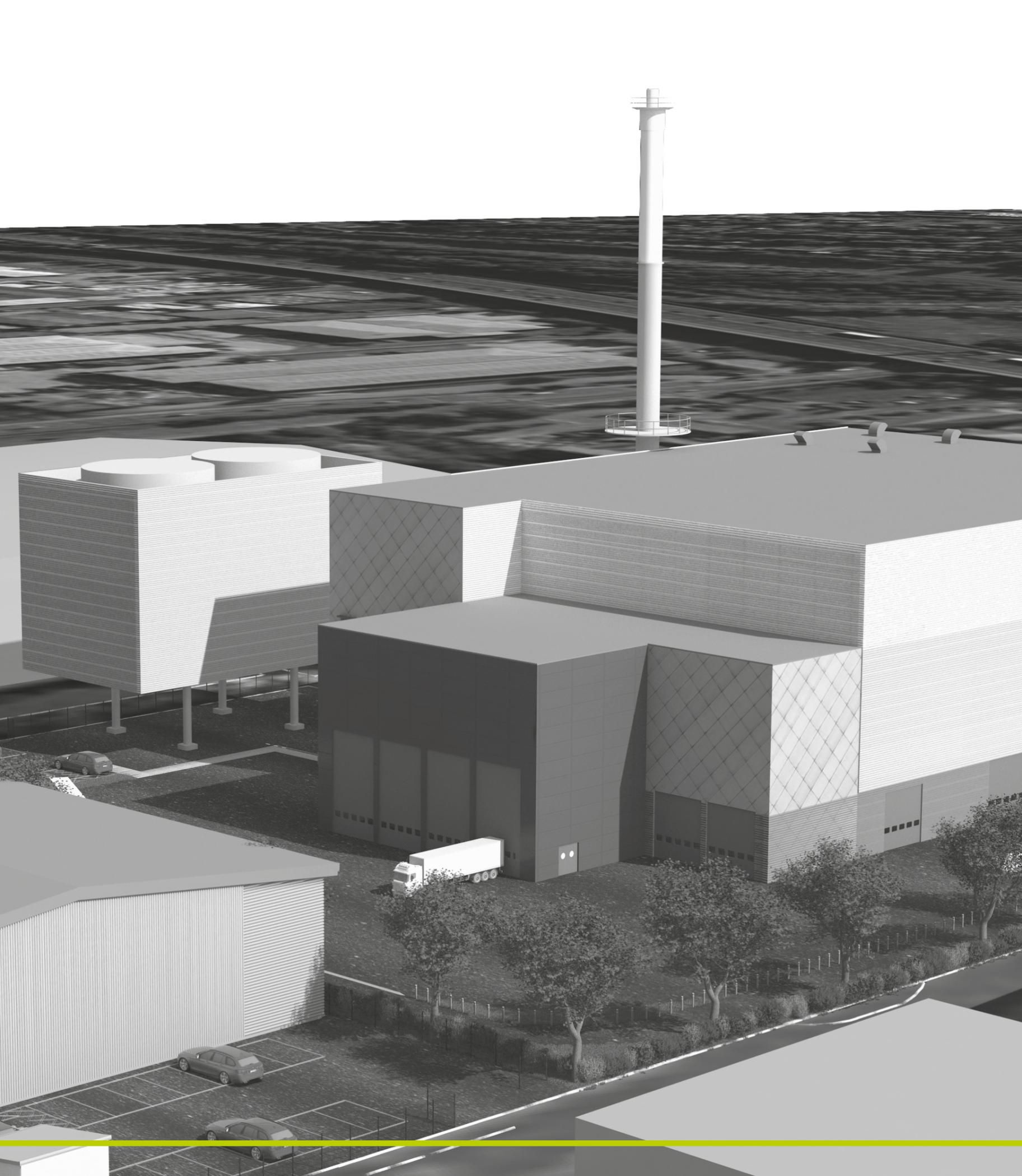
FORT PARKWAY ENERGY CASTLE BROMWICH

DESIGN AND ACCESS STATEMENT



Pegasus
Design

ROLTON KILBRIDE
POWERING THE FUTURE



“THE GOVERNMENT ATTACHES GREAT IMPORTANCE TO THE DESIGN OF THE BUILT ENVIRONMENT. GOOD DESIGN IS A KEY ASPECT OF SUSTAINABLE DEVELOPMENT, IS INDIVISIBLE FROM GOOD PLANNING, AND SHOULD CONTRIBUTE POSITIVELY TO MAKING PLACES BETTER FOR PEOPLE.”

(PARA. 56 & 57, NPPF 2012).

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NOTE: THIS DOCUMENT IS DESIGNED TO BE VIEWED AS A3 DOUBLE SIDED



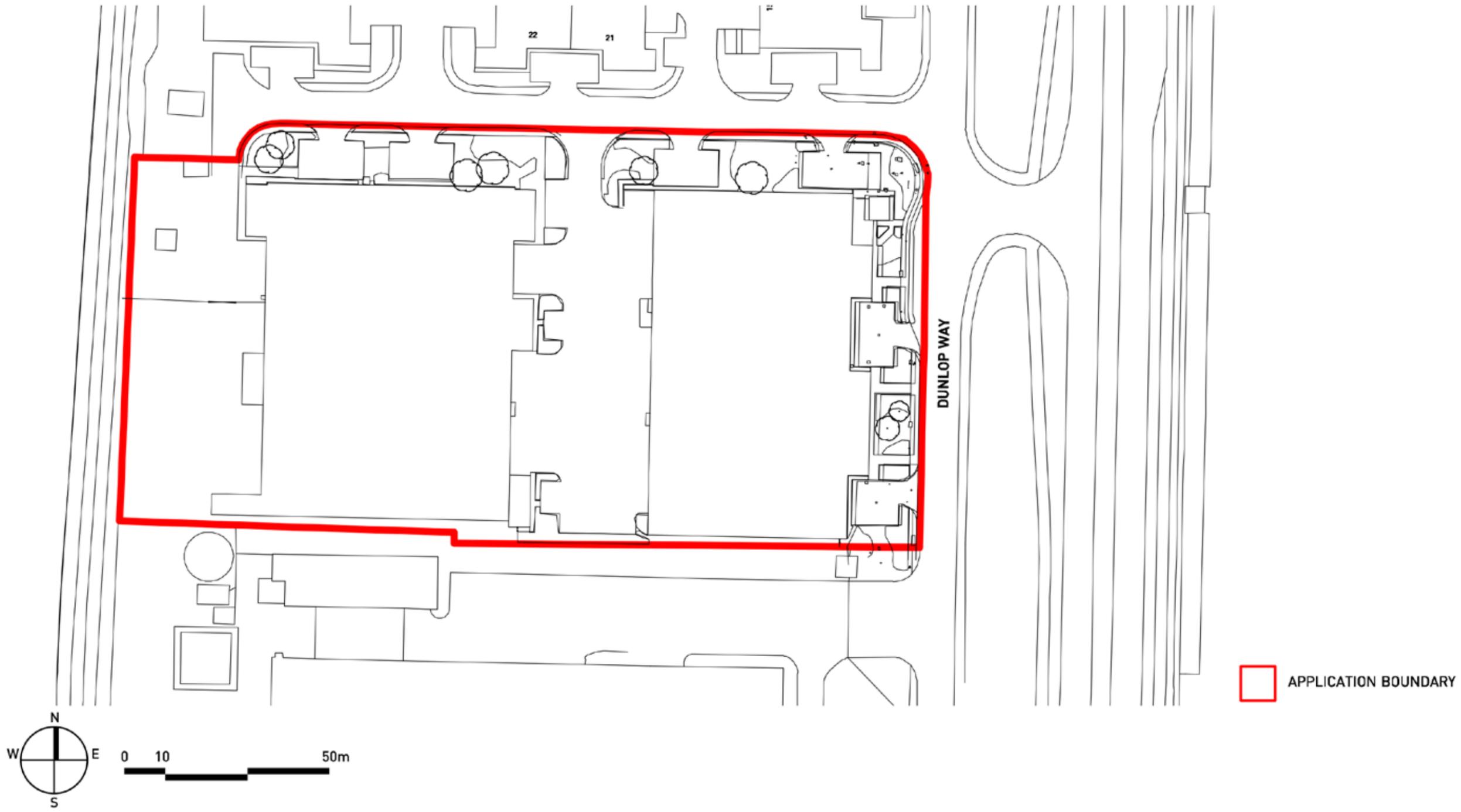
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Prepared on behalf of Industrial Property Investment Fund
November 2015 Project code K.0168
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SITE LOCATION PLAN

01 INTRODUCTION

INTRODUCTION

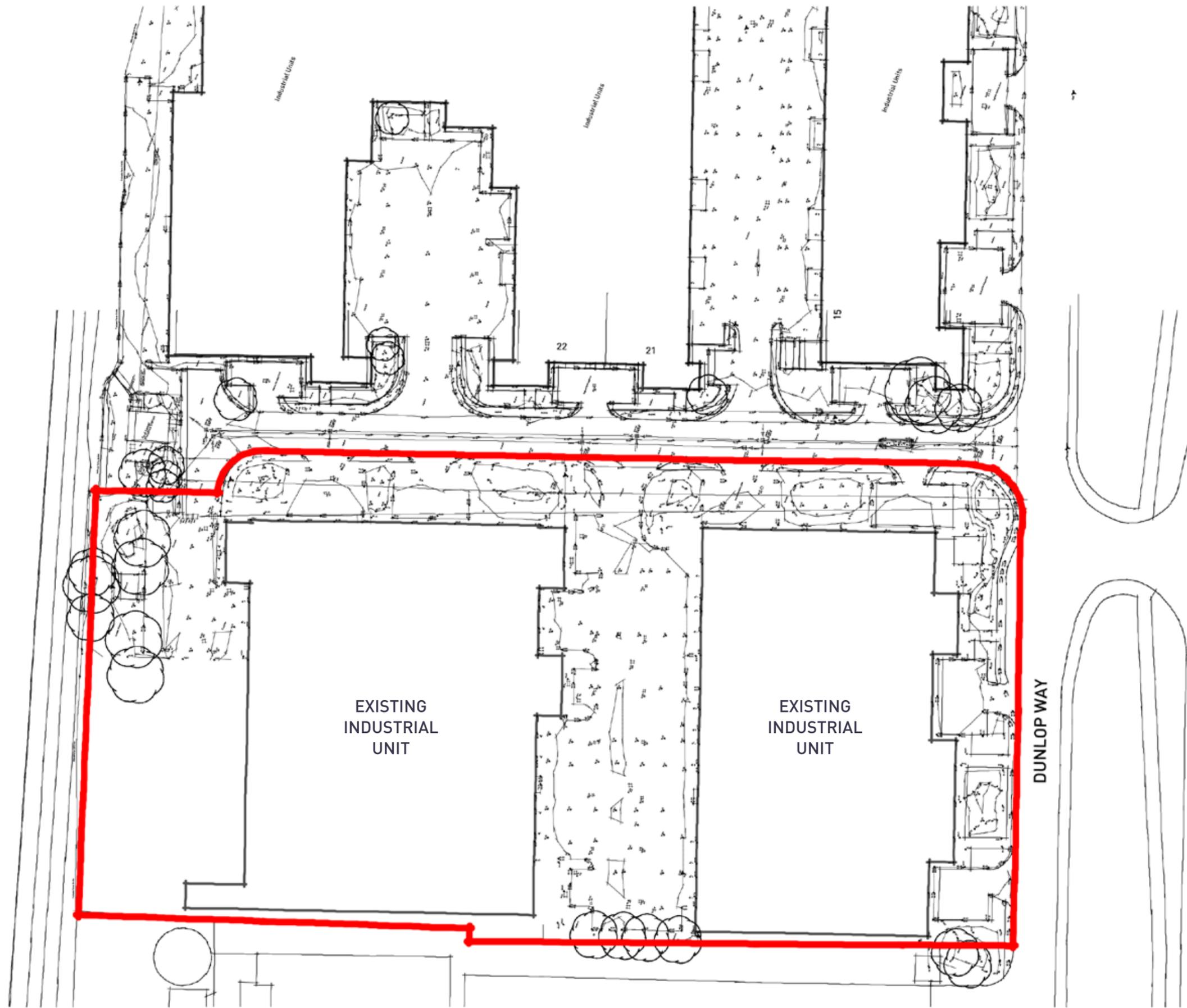
- 1.1 Rolton Kilbride is seeking to obtain full Planning Permission for a proposed Renewable Energy Centre (REC) using an Advanced Conversion Technology process called gasification to generate power and heat from Refuse Derived Fuel together with non-recyclable wastes, and the erection of an industrial/warehouse building on land at Fort Industrial Park, Castle Bromwich, Birmingham (“the application site”).
- 1.2 The Proposed Development would generate up to 8.6 megawatts (MW) gross of electricity - the equivalent of powering over 15,000 homes on a continual basis. The plant is capable of accepting 105,000 tonnes of waste per annum which would otherwise go to landfill.

PURPOSE OF THE STATEMENT

- 1.3 This statement has been prepared in accordance with Article 9 of the Town and Country Planning (Development Management Procedure) (England) Order 2015, which requires certain applications to be accompanied by a Design and Access Statement.
- 1.4 The purpose of this statement is to explain;
“how the proposed development is a suitable response to the site and its setting and demonstrate that it can be adequately accessed by prospective users” (para 30, Planning Policy Guidance, March 2014).

- 1.5 The Town and Country Planning (Development Management Procedure) (England) Order 2015 also states the following requirements:
“(2) An application for planning permission to which this paragraph applies must, except where paragraph (4) applies, be accompanied by a statement (“a design and access statement”) about:
- (a) the design principles and concepts that have been applied to the development; and
 - (b) how issues relating to access to the development have been dealt with.
- (3) A design and access statement must:
- (a) explain the design principles and concepts that have been applied to the development;
 - (b) demonstrate the steps taken to appraise the context of the development and how the design of the development takes that context into account;
 - (c) explain the policy adopted as to access, and how policies relating to access in relevant local development documents have been taken into account;
 - (d) state what, if any, consultation has been undertaken on issues relating to access to the development and what account has been taken of the outcome of any such consultation; and
 - (e) explain how and specific issues which might affect access to the development have been addressed.”

- 1.6 This document achieves this within the following sections:
- Section 1: Introduction** – outlines the purpose of the document;
- Section 2: Assessment** – considers the site and its surroundings in terms of the physical, social and planning context;
- Section 3: Involvement and Evolution** – outlines the stakeholder participation and consultation undertaken as well as its key findings;
- Section 4: Design Proposals** – presentation of the design proposals including uses and amount proposed, access arrangements, layout of the development, scale of buildings, landscaping treatments and appearance.
- 1.7 This statement should be read in conjunction with the full Planning Application and its accompanying documents including the Planning Statement, Transport Statement, Landscape Assessment, Flood Risk Assessment and Sustainability Assessment.



TOPOGRAPHICAL SURVEY

02 ASSESSMENT

2.1 This section provides a summary of the assessment of the site and its surroundings that has been undertaken

SITE CONTEXT AND LOCATION

2.2 The Application Site is located within Fort Industrial Park, off Dunlop Way in the Castle Bromwich area of Birmingham. The Fortway Industrial Park comprises 26 units that comprise single storey industrial / warehouse and trade counter buildings with offices, service yard and parking. Two of these warehouses occupy the site.

2.3 The Application Site is approximately 1.91ha and is surrounded by a network of motorways, main roads (dual and single carriageway) and other roads. To the north and west are extensive areas of large industrial units and car storage, including Jaguar Land Rover's Castle Bromwich manufacturing plant. To the east, beyond the A452 dual carriageway, is the residential area of Castle Vale, separated by the mainline railway from further industrial units to the south. To the south is the mainline railway line, a hotel (the Castle Bromwich Inn), an elevated section of the M6 motorway, and areas of residential development, including the parkland associated with Castle Bromwich Hall and a number of other areas of green space.

2.4 The site is owned by Industrial Property Investment Fund which is managed by Legal and General Property (LGP) who is seeking to redevelop part of the Fort Industrial Park to include the introduction of a Renewable Energy Centre that generates power in the form of electricity and / or heat.

2.5 The application site currently comprises business, industrial and storage units (use class B1, B2 and B8), these would be demolished and some industrial units rebuilt to the north of the site and the majority of the site would be replaced by the proposed Renewable Energy Centre.



- KEY**
- Site Boundary
 - Local Authority Boundary
 - ▲ Grade I Listed Building
 - ▲ Grade II* Listed Building
 - ▲ Grade II Listed Building
 - Sustrans National Route
 - Listed Buildings
 - EA Flood Zone 2
 - Country Park
 - Registered Park / Garden
 - Scheduled Monument
 - Local Nature Reserve (LNR)
 - Ancient Woodland
 - Site of Importance for Nature Conservation (SINC)
 - Green Belt

ENVIRONMENTAL DESIGNATIONS PLAN



LANDSCAPE & ECOLOGICAL CONTEXT

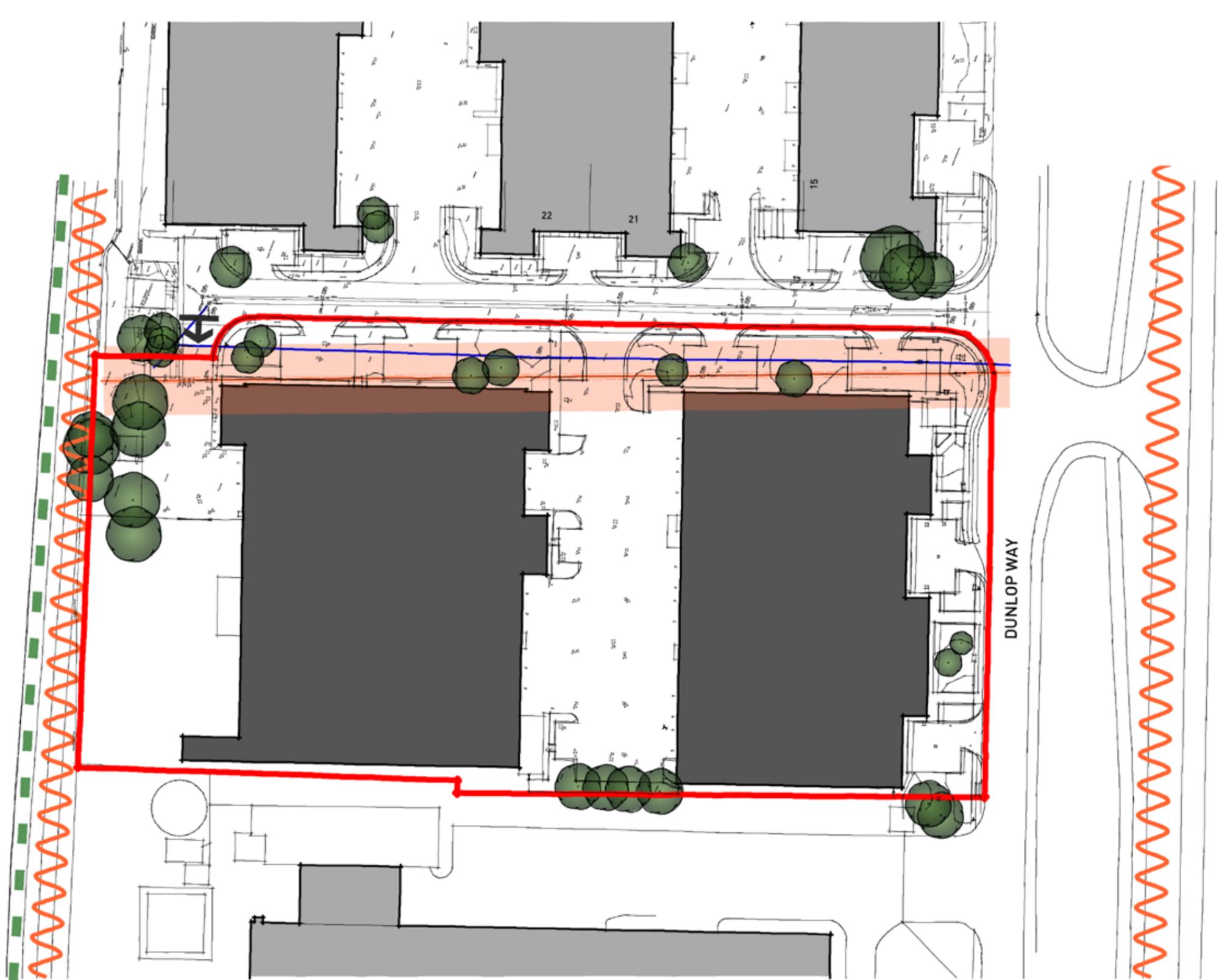
- 2.6 The Application Site is not subject to any statutory or non-statutory landscape designation. The Grade II* Registered Park and Garden at Castle Bromwich Hall lies approximately 600m to the south-south-east of the Application Site, but is separated by an elevated section of the M6.
- 2.7 The locally listed Fort Dunlop building lies approximately 750m to the west of the Application Site, and there are a number of other Listed Buildings in the local area, notably those in the vicinity of Castle Bromwich Hall and those to the north of the Jaguar plant.
- 2.8 There are no ancient woodlands in close proximity to the Application Site. There are a number of areas of deciduous woodland and woodpasture/parkland BAP in the vicinity of the Application Site, both of these being on the Priority Habitat Inventory.
- 2.9 The River Tame lies to the south of the Application Site, between the railway line and the M6 motorway.

CONNECTIONS AND PUBLIC TRANSPORT

- 2.10 The site is located off Dunlop Way and has good vehicular links to the centre of Birmingham, M6 and M42.
- 2.11 There are currently two main access locations into the site, one off Dunlop Way, the second is located on a distributor road just off Dunlop Way. This road runs along the eastern boundary of the site and provides a number of smaller access points into the site.
- 2.12 The development site is located on a key transport hub, with good links to the wider surrounding transport network, including the M6/M42 and further afield M5/M40/M1.

SURROUNDING CHARACTER ANALYSIS

- 2.13 The surrounding buildings are generally of an industrial nature. This consists of large brick built warehouses with a lightweight steel frame cladding structure above the ground floor. The roof-scape is shallow pitched over wide spans.



- KEY**
-  SITE LOCATION (1.91HA)
 -  EXISTING TREES
 -  SEWER EASEMENT
 -  UNKNOWN PIPE
 -  EXISTING BUILDINGS TO BE DEMOLISHED
 -  EXISTING BUILDINGS
 -  SITE ACCESS
 -  RAILWAY
 -  NOISE SOURCE

CONSTRAINTS AND OPPORTUNITIES PLAN

CONSTRAINTS AND OPPORTUNITIES

2.14 The constraints and opportunities presented by the site are utilised to inform and structure the development proposals. These are outlined below and illustrated, where appropriate, on the Constraints and Opportunities Plan shown opposite.

OPPORTUNITIES:

- THE SITE IS ALREADY WELL CONNECTED TO THE WIDER TRANSPORT NETWORK.
- THERE IS ALREADY A SIGNIFICANT LEVEL OF OPERATIONAL/BACKGROUND NOISE GENERATED FROM THE NEARBY TRAFFIC, RAILWAY AND BUSINESS OPERATIONS.
- VEHICLES ACCESSING THE SITE ARE OF A SIMILAR SIZE AND SPECIFICATION.
- THE CURRENT ACCESS ARRANGEMENT AND LOCATION WILL BE SUFFICIENT FOR THE PROPOSED DEVELOPMENT.
- THE SITE IS WELL SCREENED BY EXISTING BUILDINGS AND VEGETATION FROM LONG RANGE AND SHORT RANGE VIEWS.

CONSTRAINTS:

- THE EXISTING BUILDING ALREADY PROVIDES A SIGNIFICANT BUILDING MASS.
- THE PROPOSED NEW DEVELOPMENT AND ASSOCIATED STACK CONSTITUTES AS AN INCREASE IN OVERALL BUILDING MASS AND HEIGHT.
- THE SIZE OF THE SITE MEANS THERE IS A LIMITED AREA FOR THE PROPOSED FACILITY.
- THE SITE IS LOCATED WITHIN AN EXISTING INDUSTRIAL AREA ADJACENT TO OTHER B2/B8 BUSINESSES.
- EXISTING UNDERGROUND PIPES AND SEWERS LIMIT ANY DEVELOPMENT TO THE WESTERN EDGE OF THE SITE.

NATIONAL PLANNING POLICY AND GUIDANCE

National Planning Policy Framework (March 2012)

- 2.15 The National Planning Policy Framework (“the NPPF”) was published on 27th March 2012. The NPPF replaced much of the previous suite of National Planning Policy Statements, Planning Policy Guidance Notes and some Circulars with a single, streamlined document.
- 2.16 In terms of waste, Paragraph 5 advises that the NPPF does not contain specific waste policies, since national waste planning policy will be published as part of the National Waste Management Plan for England. However, it goes on to advise that local authorities when preparing waste plans and taking decisions on waste applications should have regard to policies in the Framework as far as relevant. Further discussion on the National Planning Policy for Waste is provided below between paragraphs 4.28 and 4.31 of this Statement.
- 2.17 Elsewhere in the document, the NPPF sets out the Government’s planning policies for England and how these are expected to be applied under the ‘presumption in favour of sustainable development’.
- 2.18 The NPPF states that the purpose of the planning system is to contribute to the achievement of sustainable development by balancing the economic, social and environmental roles of development. These roles should not be undertaken in isolation as they are mutually dependent. To achieve sustainable development the planning system should therefore play an active role in guiding development to sustainable solutions (paragraph 8).
- 2.19 The overarching policy objective of the NPPF is the presumption in favour of sustainable development. This is the ‘golden thread’ that should run through both plan-making and decision-taking. Paragraph 14 states that, for decision-taking, this means approving development proposals that accord with the development plan without delay. Where the development plan is absent or silent or where policies are out-of-date, planning permission should be granted unless any adverse impacts would significantly and demonstrably outweigh the benefits, or specific policies in the Framework indicate development should be restricted.
- 2.20 Section 4 relates to the promotion of sustainable transport wherein Paragraph 34 of the NPPF confirms that plans and decisions should ensure that developments that generate significant movements are located where the need to travel is minimised. Paragraph 35 goes on to advise that plans should protect and exploit opportunities for the use of sustainable transport modes for the movement of goods or people. Therefore, developments should be located and designed where practical to, inter alia, accommodate the efficient delivery of goods and supplies.
- 2.21 In respect of climate change the NPPF (at Section 10, paragraphs 93 to 98) identifies the key role the planning system has to play in supporting the delivery of renewable energy, which is central to the economic, social and environmental dimensions of sustainable development. In helping to increase the use and supply of renewable energy LPAs must recognise the responsibility on all communities to contribute to energy generation and have a positive strategy to promote renewable energy with policies designed to maximise renewable energy whilst ensuring that adverse impacts are addressed.
- Waste Management Plan for England (December 2013)**
- 2.22 The Waste Management Plan for England (“the WMPE”) was published in December 2013 and sets out where the Government is now in terms of the waste generated in England and how those materials can be managed. It supersedes and records progress made since the publication of the Waste Strategy for England 2007.
- 2.23 The introduction to the document sets out how the WMPE is a high level document which is non-site specific. It provides an analysis of the current waste management situation in England, and evaluates how it will support implementation of the objectives and provisions of the revised Waste Framework Directive (WFD). It goes on to say that:
- 2.24 “National planning policy on waste is currently set out in Planning Policy Statement 10 ‘Planning for Sustainable Waste Management’. It provides the planning framework to enable local authorities to put forward, through local waste management plans, strategies that identify sites and areas suitable for new or enhanced facilities to meet the waste management needs of their areas. This policy is currently being updated and has been subject to public consultation. Once it has been finalised, the updated policy will replace Planning Policy Statement 10 as the national planning policy for sustainable waste management.”
- National Planning Practice Guidance (March 2014, as amended)**
- 2.25 On the 6th March 2014 the Department for Communities and Local Government (DCLG) launched the web-based National Planning Practice Guidance (“the NPPG”). It follows a review of planning policy guidance undertaken by Lord Taylor of Goss Moor which began in October 2012 and replaces a raft of old guidance.
- 2.26 The most relevant guidance in the NPPG to the application is set out in the section entitled ‘Waste’ and in particular paragraphs 002, 009 and 046 .
- 2.27 Paragraph 002 sets out a list of matters which can be considered as waste operations. Whilst it indicates that it is a non-exhaustive list and though interpretation is ultimately a matter for the courts, it identifies energy from waste incineration and other waste incineration as “waste development”.
- 2.28 Paragraph 009 explains that national waste policy is capable of being a material consideration in decisions on planning applications for waste management facilities.

National Planning Policy for Waste (October 2014)

- 2.29 The National Planning Policy for Waste (“the NPPW”) was published in October 2014 and replaces the guidance previously saved following the publication of the NPPF which had been set out in Planning Policy Statement 10: Planning for Sustainable Waste Management (PPS10).
- 2.30 Paragraph 1 acknowledges that the WMPE sets out the Government’s ambition to work towards a more sustainable and efficient approach to resource use and management.

Overarching National Policy Statement for Energy (EN-1) (July 2011)

- 2.31 The National Policy Statement sets out how the energy sector can help deliver the Government’s climate change objectives by clearly setting out the need for new low carbon energy infrastructure to contribute to climate change mitigation.
- 2.32 In terms of Energy from Waste (EfW), paragraph 3.4.3 confirms that:
“...the principal purpose of the combustion of waste, or similar processes (for example pyrolysis or gasification) is to reduce the amount of waste going to landfill in accordance with the Waste Hierarchy and to recover energy from that waste as electricity or heat. Only waste that cannot be re-used or recycled with less environmental impact and would otherwise go to landfill should be used for energy recovery. The energy produced from the biomass fraction of waste is renewable and is in some circumstances eligible for Renewables Obligation Certificates, although the arrangements vary from plant to plant”

LOCAL PLANNING POLICY

Adopted Planning Policy

Birmingham Unitary Development Plan

- 2.33 The Birmingham Unitary Development Plan (UDP) was adopted by Birmingham City Council on 11th November 2005 and contains policies and proposals that currently guide development and land use across the City.
- 2.34 The principal saved policy in the adopted UDP applicable to an EfW facility is set out a Paragraph 3.67 (Energy from Waste Plants) which states:
“Waste incinerators can provide an efficient means of reducing the amount of waste for disposal, and an opportunity for energy recovery. At present (2004) more than 65% of the City’s household waste is processed at the energy from waste plant in Tyseley and this generates enough power to run a leisure centre and several blocks of flats. However, it is acknowledged that, where it is a practical and viable option, the re-use or recycling of waste products is preferable to incinerating waste. The City Council will therefore investigate alternative options for processing household waste which would reduce the need for it to be incinerated, such as expanding the kerbside collection of recyclable materials, and developing a new Materials Recycling Facility. Proposals for the expansion of the existing energy from waste facility at Tyseley or for new energy from waste plants will be considered in the light of the policy set out in paragraphs 3.65A – 3.65C above.”

EMERGING PLANNING POLICY

Birmingham Development Plan

- 2.35 The Birmingham Development Plan (BDP), formerly the Core Strategy, will set out the statutory framework to guide decisions on development and regeneration in Birmingham up to 2031. It will set out how and where new homes, jobs, services and infrastructure will be delivered and the type of places and environments that will be created. The Plan will cover the whole administrative area of the city.
- 2.36 Policy TP13 (Sustainable Management of the City’s Waste) seeks to prevent the production of waste wherever possible, and where this is not feasible will seek to move and manage Birmingham’s waste up the waste hierarchy. The key policy objectives of the City Council will be to minimise the amount of waste created, treat waste as a resource and encourage recycling, reuse and composting. The City Council will seek to ensure that the tonnage of waste treated and managed within Birmingham is equivalent to the tonnage of waste arising. There is currently a shortfall in the number of material recycling facilities within the City and more will need to be constructed during the plan period. The City Council will seek to reduce the proportion of the City’s waste which is sent to landfill. This will require an increase in alternative disposal capacity. The type of facilities needed and site location criteria are outlined in Policies TP14 and TP15.
- 2.37 Policy TP14 (New and existing waste facilities) sets out that the expansion of existing or the development of new waste management facilities will be supported, providing that proposals satisfy the locational criteria set out in Policy TP15



Renewable Energy Centre Fort Parkway Energy, Birmingham

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Site Selection and Location

The Renewable Energy Centre (REC) is located on the site of the former Fort Parkway Energy (FPE) power station, which was decommissioned in 2002. The site is situated in the Fort Parkway area of Birmingham, near the A454 road and the Birmingham Canal.

The site is well served by public transport, including the Birmingham Tramway and the Birmingham New Street railway station. The site is also well served by the M6 motorway, which is a major route for goods and services.

The site has been selected for a number of reasons, including:

- Its proximity to the Birmingham Canal and the M6 motorway.
- Its proximity to the Birmingham New Street railway station.
- Its proximity to the A454 road.
- Its proximity to the Birmingham Canal.
- Its proximity to the M6 motorway.

Proposed Development

The Renewable Energy Centre (REC) is a proposed development of a modern, energy-efficient building, which will be used as a Renewable Energy Centre. The building will be used to house the Renewable Energy Centre, which will be used to generate and distribute renewable energy.

The proposed development includes:

- A modern, energy-efficient building.
- A Renewable Energy Centre.

Site Plan

Existing Site

Next Steps

Following the successful completion of the planning process, the next steps for the Renewable Energy Centre (REC) are to secure the necessary funding and to commence construction. The project is expected to be completed by 2025.

Comments and Feedback Form

Your comments are important to us! We welcome feedback about any aspect of the project. Please use the form below to provide your comments. All comments will be treated in confidence and will be used to inform the development of the project.

visit www.fortparkwayenergy.co.uk or email info@fortparkwayenergy.co.uk for more information

Fort Parkway Energy Public Exhibition

Renewable Energy Centre Fort Parkway Energy, Birmingham

BOLTON KILSRIDE ADDRESSING THE FUTURE | **Pegasus Group**

Introduction to Fort Parkway Energy

The Renewable Energy Centre (REC) is a proposed development of a modern, energy-efficient building, which will be used as a Renewable Energy Centre. The building will be used to house the Renewable Energy Centre, which will be used to generate and distribute renewable energy.

The proposed development includes:

- A modern, energy-efficient building.
- A Renewable Energy Centre.

Scheme Benefits

The benefits of the Renewable Energy Centre include:

- A modern, energy-efficient building.
- A Renewable Energy Centre.

Site Location Map

Proposed Development

Managing Environmental Effects

The Renewable Energy Centre (REC) is a proposed development of a modern, energy-efficient building, which will be used as a Renewable Energy Centre. The building will be used to house the Renewable Energy Centre, which will be used to generate and distribute renewable energy.

The proposed development includes:

- A modern, energy-efficient building.
- A Renewable Energy Centre.

visit www.fortparkwayenergy.co.uk or email info@fortparkwayenergy.co.uk for more information

03 INVOLVEMENT & EVOLUTION

Stakeholder participation: The Consultation Process

- 4.1 A pre-application meeting with the local authority and various consultants took place on the 10th September 2015 to present and discuss plans.
- 4.2 On the 15th September 2015, Andrew Needham and Charlotte Ashby met with the Castle Vale Community Housing Association, to give an overview and presentation. The three Borough Councillors who would normally attend were not available. However, around 15 residents attended and asked questions, primarily around traffic and air quality. They also took leaflets away to share with the community.
- 4.3 A media alert on the 17th September 2015, by email was sent to local papers including the Birmingham Post and Mail and Tyburn Mail to invite them to attend the event. Tyburn Mail published an article on their website on 17th September inviting the public to attend.

Stakeholder Participation: Consultation Responses

- 4.4 A public consultation was advertised and took place on 24th September 2015. 6,000 homes were delivered a leaflet explaining the project and inviting people to attend the public consultation. Comments raised during the exhibition were recorded and discussed in subsequent pre-application meetings. There were 16 attendees, most being receptive to the proposed scheme. Residents expressed particular interest in finding out about how the project will affect air quality and transport, due to its location. All attendees were given an overview of the project as well as discussion with specialists.
- 4.5 When asked how supportive of the proposal they are (1 being least and 5 being most), results included:
 - Rating 5 – 3 Responses.
 - Rating 4 – 4 Responses.
 - Rating 3 – 2 Responses.
 - Rating 2- 1 Response.
 - Rating 1- 0 Response.

Summary of feedback forms:

“Castle Vale is the kind of community where you need to take everyone with you. They don’t like things done behind their back.” Sue Spicer, Chair of The Pioneer Group (previously CVCHA).

“After having more information on the centre my mind has been put at ease.”





Early Draft Layout (July 2015)

Initial Draft Proposal:

- Two access points
- New planting the western boundary
- New planting to soften proposals
- Separate staff and visitor parking
- Majority of Machinery located to the southern part of the site near the railway
- Central unit located to the rear of the site to allow access to all facades



Revised Layout (Sept 2015)

Design Development:

- Weighbridge Relocated
- Access reduced to a single point and HGV's and cars separated for safety
- Additional planting introduced
- Stack moved to the eastern side of the building to avoid any issues with railway
- Stack height increased from 45m to 55m to mitigate possible air quality issues
- Additional parking provided
- 2-unit Warehouse introduced with separate operational access



Revised Layout (Oct 2015)

Design Development:

- Warehouse/office revised- now a single larger unit
- Parking for warehouse separated for visitor and operational vehicles
- Introduction of a gatehouse
- Bicycle parking added near visitor car park



Final Proposal (Nov 2015)

Final Proposal:

- Planting buffer added to the southern boundary to help soften the proposals
- Reduced parking within the operational car park of the industrial warehouse to allow for vehicle turning

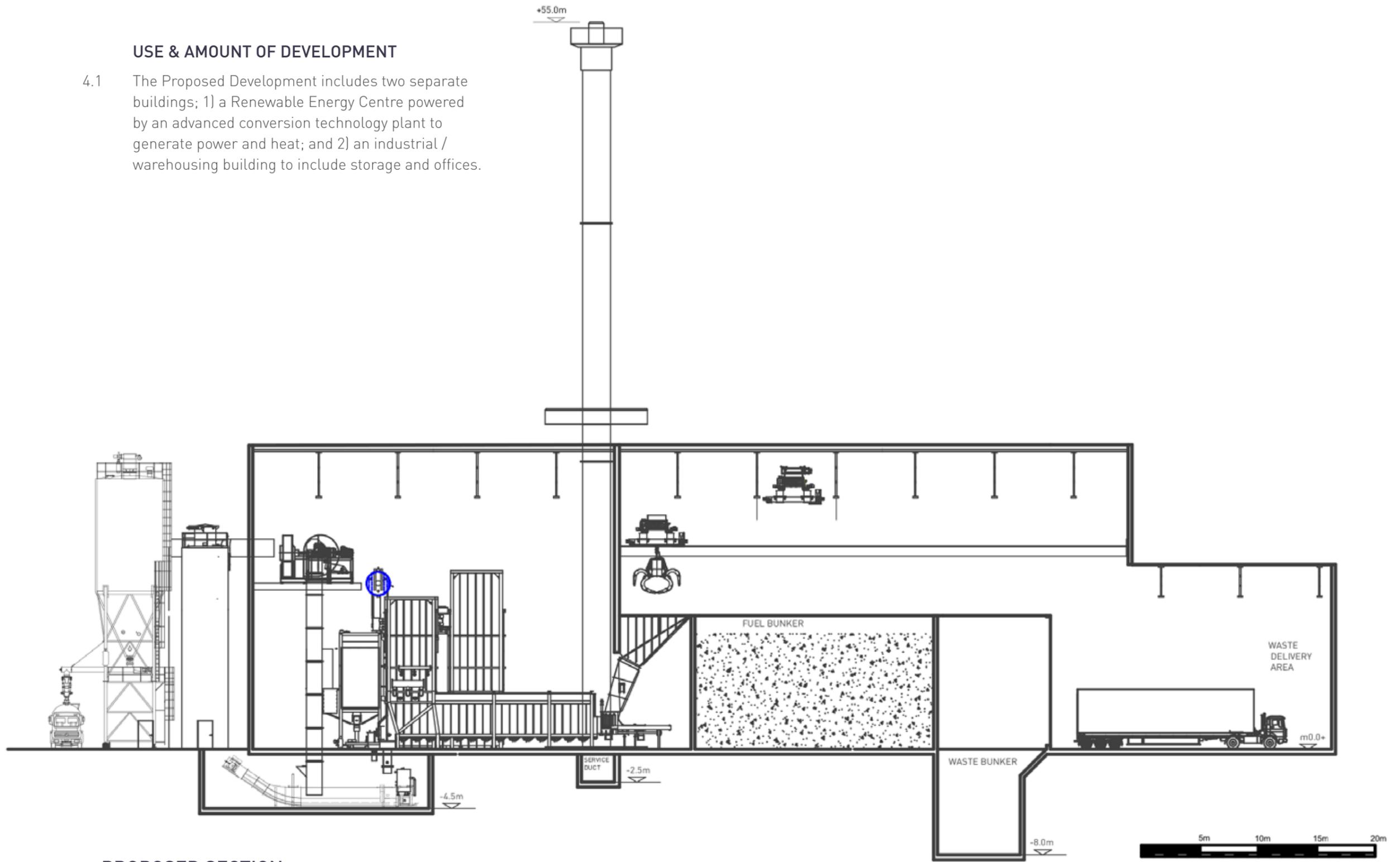


SITE LAYOUT PLAN

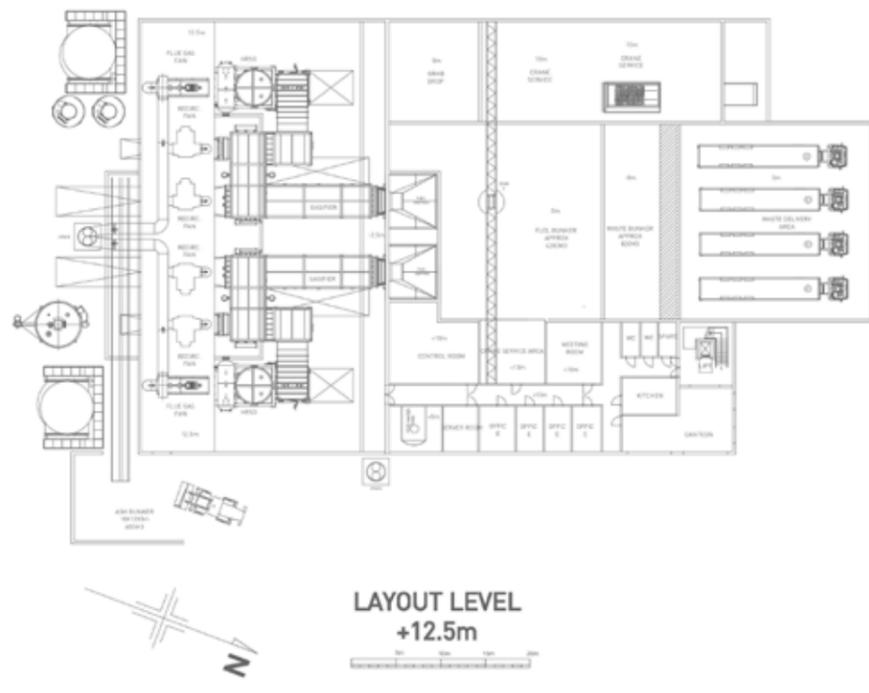
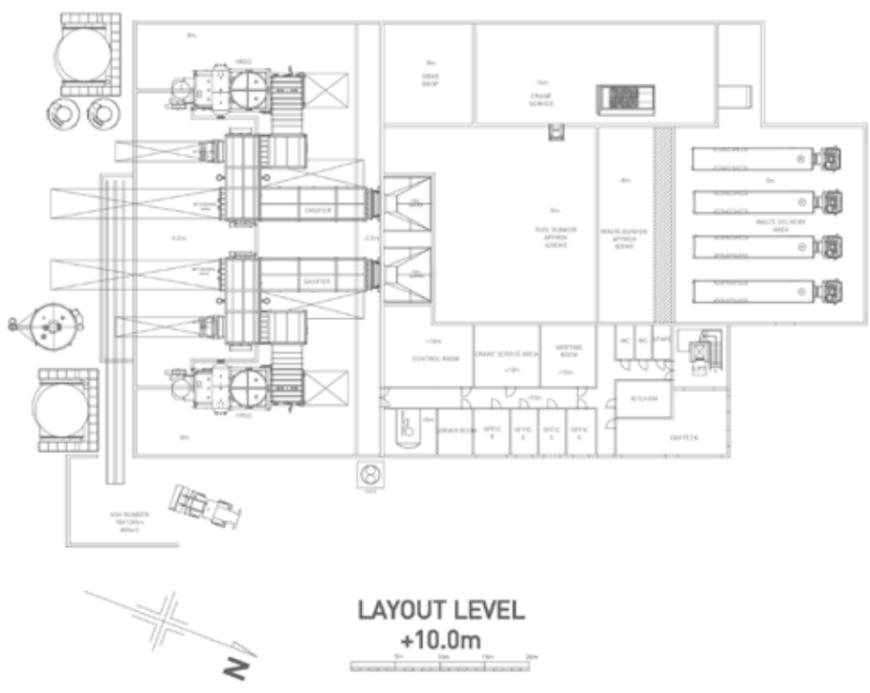
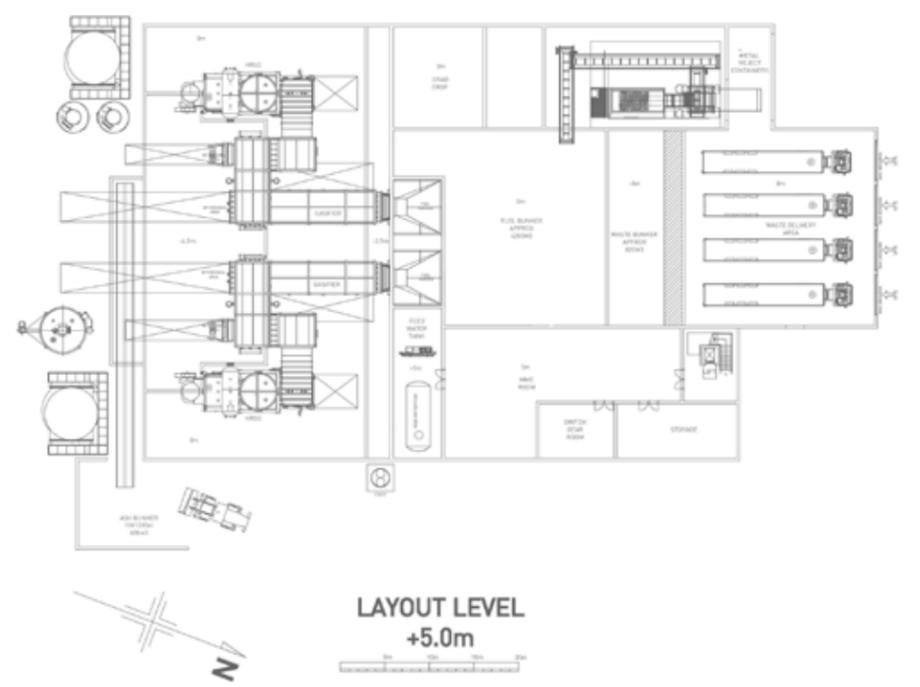
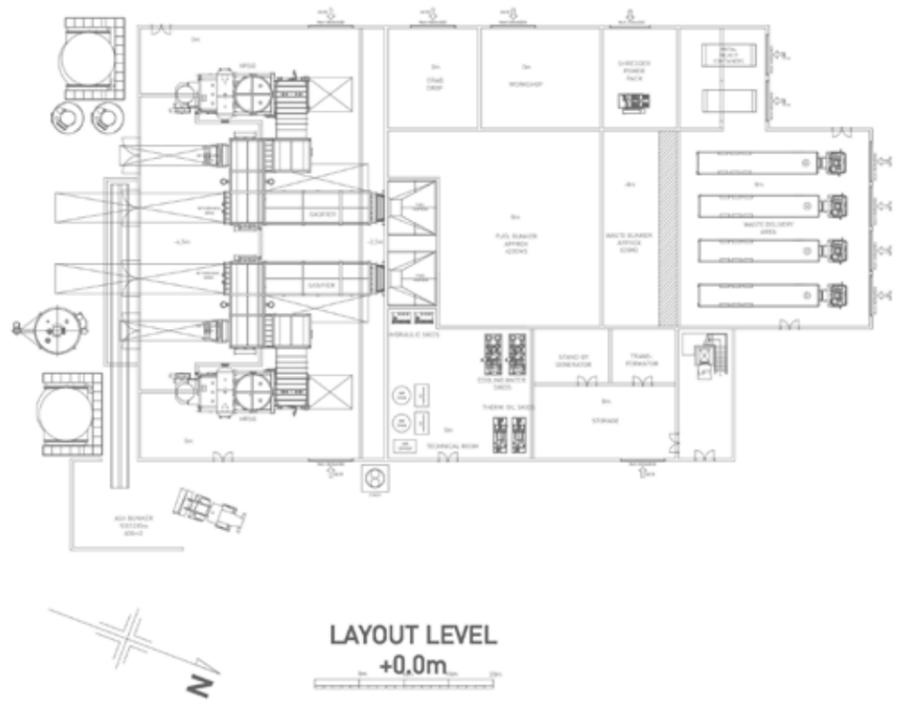
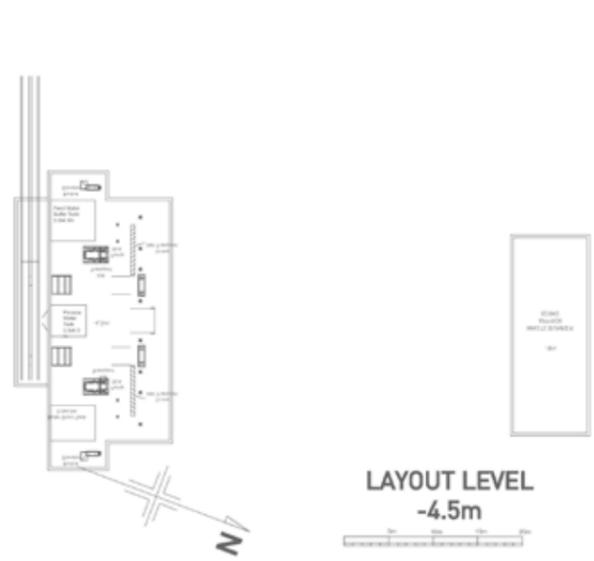
04 DESIGN PROPOSALS

USE & AMOUNT OF DEVELOPMENT

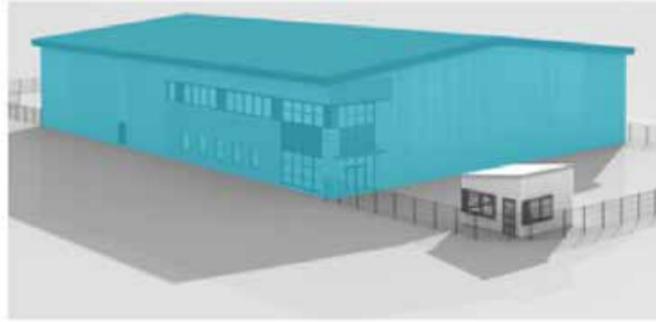
- 4.1 The Proposed Development includes two separate buildings; 1) a Renewable Energy Centre powered by an advanced conversion technology plant to generate power and heat; and 2) an industrial / warehousing building to include storage and offices.



PROPOSED SECTION THROUGH ENERGY PLANT



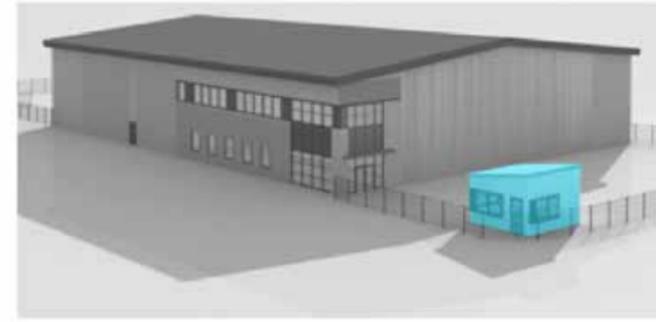
FLOOR PLANS



Warehouse Building

Height: 11.6
Width: 37.8m
Length: 49m

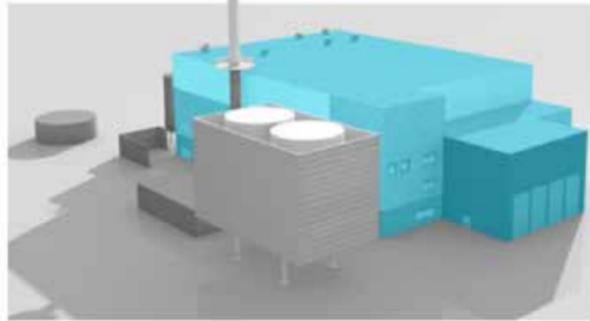
Floor Area: 1950m²



Gatehouse

Height: 4.3m
Width: 5.4m
Length: 5.4m

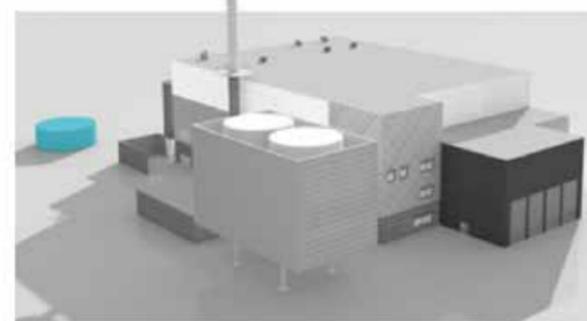
Floor Area: 29m²



Main Energy Plant Building

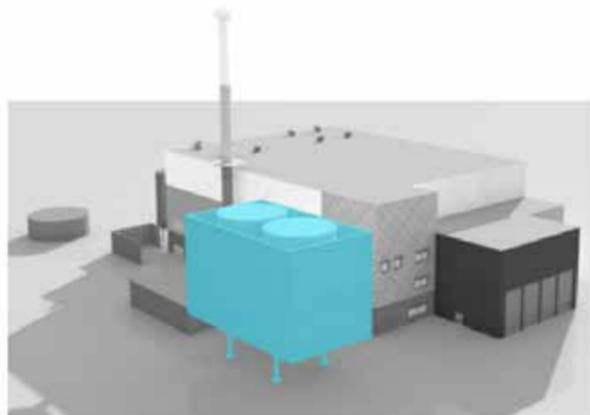
Height: 23m
Width: 48.8m
Length: 82.3m

Floor Area: 4855m²



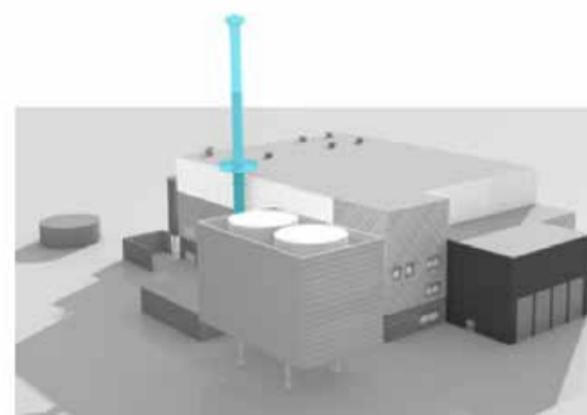
Fire Water Tank & Pump Room

Water Tank
Height: 6.75m
Diameter: 17m
Pump Room
Width: 4.6m
Length: 6.1m
Height: 3.2m



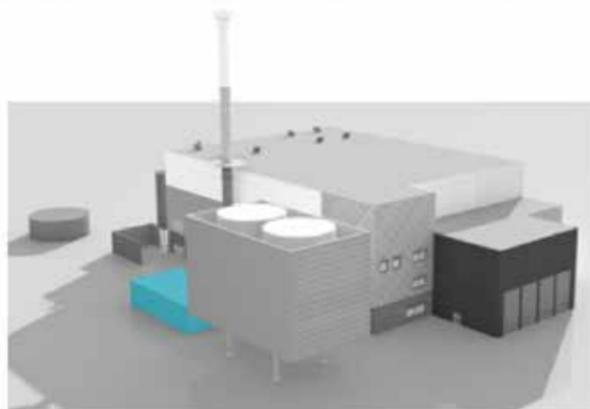
Air Cooled Condenser

Height: 23.5m
Width: 11m
Length: 27.4m



Stack

Height: 55m
Diameter: 2.1m



Turbine Room

Height: 15.6m
Width: 11m
Length: 20m



ILLUSTRATIVE 3D MODEL



ILLUSTRATIVE 3D MODEL



KEY

	ATT		ASH OUT		WEIGHBRIDGE
	WASTE RECEPTION		SUPPORT SPACES/PLANT		WAREHOUSE
	WATER TANKS/PUMP ROOM		STAFF/VISITOR/OFFICE		GATEHOUSE

ARRANGEMENT PLAN

Renewable Energy Centre and Associated Works

4.2 The proposed development consists of an energy plant and associated ancillary buildings comprising 5,636 sqm of floor space. This will include:

- An energy plant located within the centre of the site to allow good vehicular circulation around the building.
- Weighbridge & Gatehouse.
- Separate staff and visitor entrance with car parking facilities.
- Retained and enhanced perimeter landscaping and tree screening.
- Safe and protective staff and visitor footways to building entrances.

Office and Warehouse Building

4.3 Also forming part of the application is an office and warehouse element comprising 1,999 sqm of floor space. This will include:

- A warehouse with office element.
- A security hut.
- Separate operational vehicle and visitor/staff entrance.

Arrangement

4.4 The proposed Energy Plant will include a number of ancillary buildings located on the arrangement plan left. These will house the industrial processes associated with the waste management.

4.5 The plant employs a two stage system that first gasifies the waste to produce a synthetic gas which is then transferred to a second stage where it is oxidised. Changing the waste to a gas fuel, means the process can be finely controlled, dioxins thoroughly destroyed and Nitrogen Oxides (NOx) emissions minimised which can achieve emissions levels that are compliant with the Industrial Emissions Directive (IED).

The key stages of the process are as follows:

- Fuel bunker and transport system;
- Thermal conversion;
- Heat recovery steam generator
- Energy utilisation system;
- Flue gas cleaning system; and
- Control and monitoring system.

Proposed Movement & Access

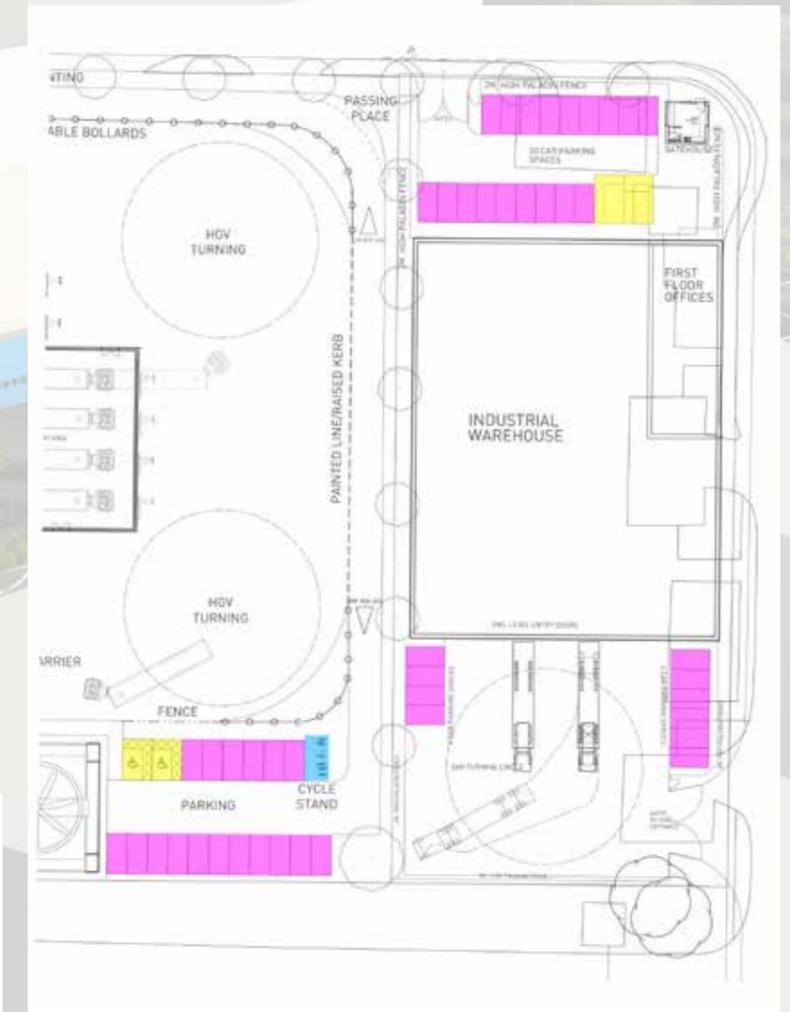
Vehicle Movements

- 4.6 The waste will be delivered to the site via refuse collection vehicles (RCVs) which will typically be 18 – 22 tonnes vehicle (gross weight), or in large articulated bulk haulage vehicles from nearby waste transfer stations.
- 4.7 It is anticipated that the proposed REC will generate a total of 66 heavy goods vehicles (HGVs) per day (33 In / 33 Out). The proposed REC will be operational for 24 hours a day, 7 days a week. The facility will be open for deliveries between the hours of 07:00 and 19:00 Monday to Friday including Bank and Public Holidays (excluding Christmas and New Year's Day) and 07:00 to 14:00 on Saturdays. There will be no waste received on Sundays. It is expected that HGVs importing and exporting materials from the site will do so evenly throughout the 12 hour period and there is unlikely to be a peak in movements associated with these operations.
- 4.8 It is also expected that 20 operational staff would be required to operate the plant on a 3 shift pattern, comprising of 13 full time employees directly on site with a further 7 people providing services from local specialist businesses. On a worst case basis, all staff would travel to the site by car giving rise to the generation of a total of 40 trips per day (20 In / 20 Out) by private motor vehicle.

- 4.9 A separate staff and visitor entrance is provided to keep a clear separation between the large heavy goods vehicles and cars. Barriers and fences will also ensure traffic moving through the site is kept to the intended areas.
- 4.10 There are two proposed access points that serve the industrial warehouse, one directly off Dunlop Way and the second located on the northern boundary. This allows for a separation between cars and operational vehicles.
- 4.11 During operational hours there will be unobstructed access to the site. This is to prevent large vehicles needing to queue on the adopted highway. Each lorry will need to be weighed once on site and once before it leaves. This will be controlled via the gatehouse.
- 4.12 Emergency vehicle access to the site will be via the operational access. This will allow access to all facades of the building.

Parking

- 4.13 The proposed level of car parking has been based upon the expected number of users at the site and in this regard, the REC will provide a total of 19 car parking spaces, inclusive of 2 disabled bays. Whilst the proposed industrial/warehouse building will accommodate a total of 29 car parking spaces, inclusive of 2 disabled bays.



PARKING PLAN



Metal Feature Cladding:

Key facades will be clad in a Sotech Optima Cladding which is a textured metal cladding that takes a diamond form. This cladding will be used on key facades to help break up the building mass, adding depth, shadow and texture.



Metal Cladding:

The remainder of the building will be clad in a coloured architectural wall panel similar to above. This will be arranged to create a strong base, with darker colours to the lower part of the building, becoming lighter towards the top.



Metal Tanks, Silos & Stack:

Due to a range of different processes, the energy plant requires ancillary silos, tanks & a stack. The silos and tanks will remain in their grey metal colour which will play down their part of the proposal, allowing the building to sit in the forefront.



Roller-shutter Doors:

Operational doors will be coloured in the same feature blue colour which runs through the proposals. This helps to highlight the operational entrances.



Brise Soleil:

Metal horizontal brise soleil will be located to the window heads to help control solar gain. This also gives the elevation some shadow relief.



Stack:

The energy plant stack will take a similar form as above. This will follow the same design principle as the main building, with the bottom of the stack faced in the blue feature colour, and a lighter grey colour towards the top.



Roof Ventilation:

Roof ventilation is required as part of the energy plant's functional process. These will take the form of metallic grain bins.



Gatehouse:

The Gatehouse will be a small lightweight structure that can be placed directly onto the ground without requiring dug foundations. This will be faced in the feature blue colour.



Weighbridges:

The weighbridges will be a 'surface' style bridge and will not require foundations.



Ventilation Louvres:

Ventilation louvres have been incorporated into the elevations as part of the functional requirements for the plant to run efficiently. These will be as discrete as possible, faced in the same colour panels adjacent.

Architectural Detailing and Materials

- 4.14 In terms of architectural detailing and materials, both will follow a similar palette, albeit simplified for the smaller warehouse unit. This will consist of mainly coloured cladding systems.
- 4.15 Due to the Energy Plant building being a large mass, it is important to use a cladding system that will achieve the functional needs, as well as aesthetic ones too. For the building base, a horizontal metal cladding is proposed in a dark grey colour. This is a common architectural technique and gives the building a strong base or plinth to sit on. Above that there will be a lighter grey and finally a white architectural panel to the top third of the building. The concept behind this allows the building to sit and almost blend into the typical overcast skyline of the UK. Key corners and frontages have been wrapped in an aluminium diamond shaped shingle, which helps to give the elevations their own hierarchy. These textured panels add some shadow relief to the elevations helping to break up the building mass. Operational doors, external machinery and part of the stack will be faced in a contrasting blue coated metal.
- 4.16 Metal Cladding - Sotech Optima Shingles: The Optima cladding system will be used in prominent locations on key facades. The textured Sotech panel will provide relief adding shadow and subtle variation to the building envelope.

SCALE AND MASSING

- 4.17 The height and massing of the proposed development varies across the site with the main Energy Plant block measuring 23m and the chimney stack 55m tall. The smaller warehouse, which will be located on the northern boundary, is of a smaller scale and measures 12m tall.
- 4.18 Due to the split use of the site, the office/warehouse has been located to the north of the site with the Energy Plant behind. This allows the warehouse to sit at a relative height to the neighbouring industrial units, whilst the Energy Plant stepped up behind.
- 4.19 The general massing of the building form is somewhat derived from the functional requirements of the Energy Plant. However, this has been carefully designed to ensure the building does not sit out of place within the surrounding context.



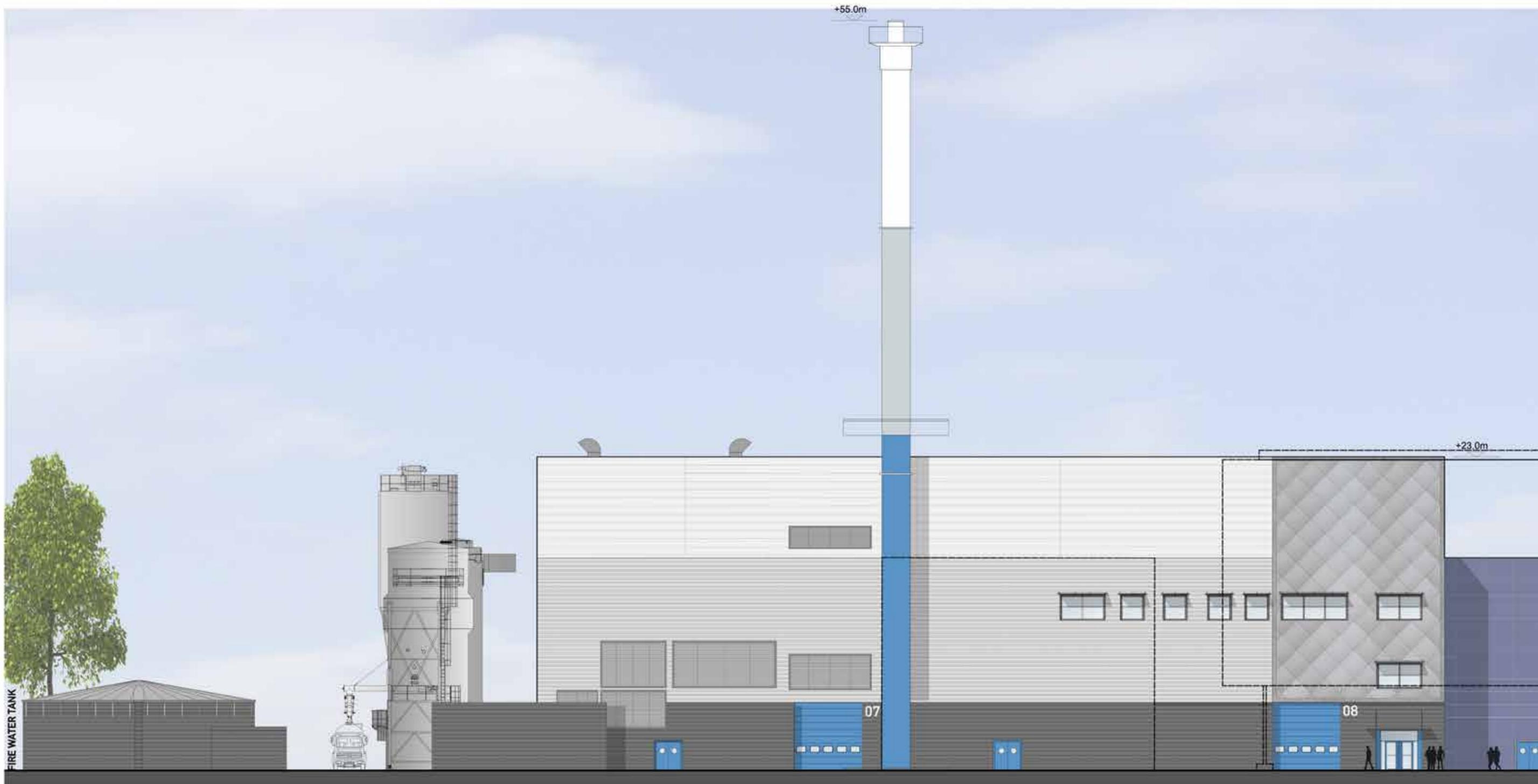


WEST ELEVATION



SOUTH ELEVATION

BUILDING ELEVATIONS

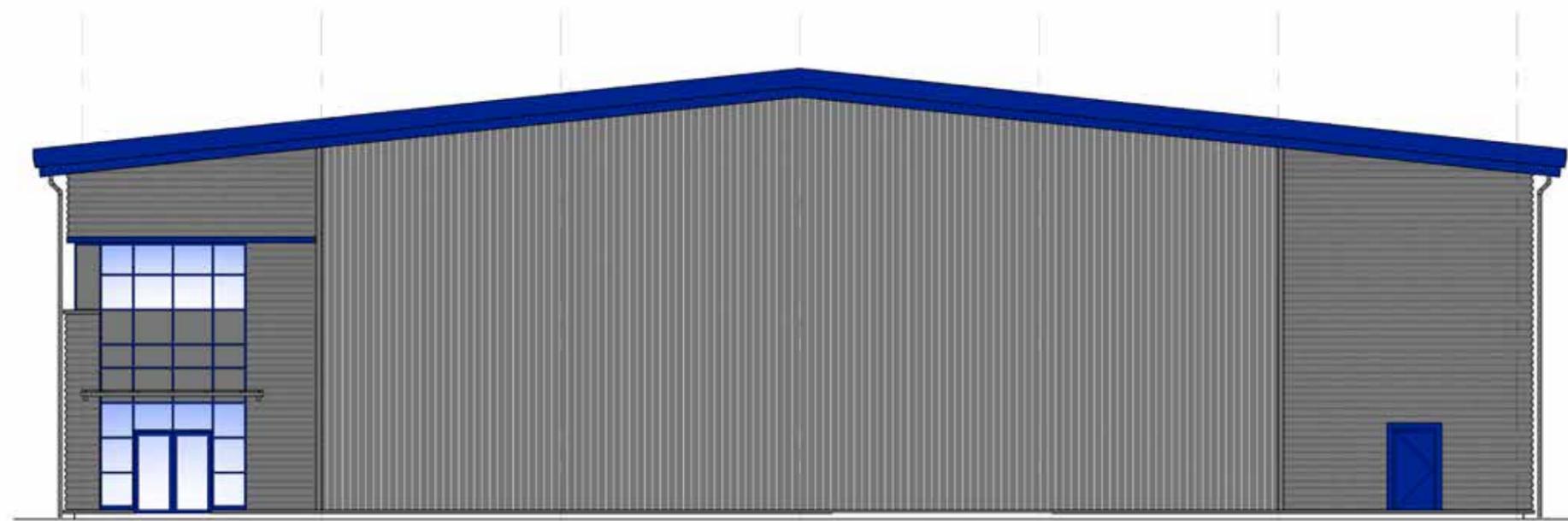


EAST ELEVATION



NORTH ELEVATION

BUILDING ELEVATIONS



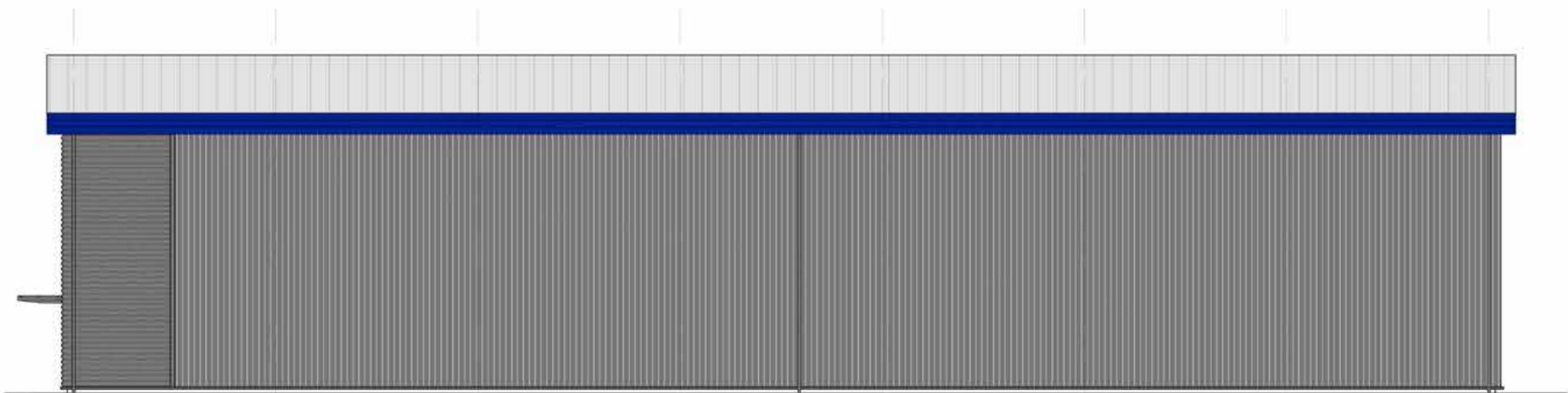
Front Elevation



Rear Elevation



Side Elevation on Dunlop Way



Side Elevation

BUILDING ELEVATIONS



Townscape & Visual

- 4.20 The townscape and visual impact assessment has assessed the likely effects of the Proposed Development on landscape/townscape character, landscape/townscape features and elements within and in the immediate vicinity of the Proposed Development, and on local visual amenity. The assessment has been undertaken with regard to best practice and the Guidelines for Landscape and Visual Impact Assessment, 3rd Edition (2013), as published by IEMA and the Landscape Institute.
- 4.21 The Application Site lies outside of any statutory or local/non-statutory landscape designations. The Application Site is currently occupied by a number of industrial/trade counter buildings, set within an industrial context including the Jaguar manufacturing plant on the north side of Fort Parkway, and the existing Fort Dunlop gas turbine power station to the west of the Application Site.
- 4.22 The Proposed Development would result in the replacement of the existing industrial buildings with a number of other, slightly larger industrial buildings, together with a 55m tall stack. The stack would be shorter than the existing stack at the Fort Dunlop power plant and the pylons which line the nearby elevated section of the M6 motorway, and would be seen in the context of a number of other nearby stacks such as those at the Jaguar plant.
- 4.23 The nature of the Proposed Development, together with the context provided by the land uses surrounding the Application Site, would mean that the Proposed Development is considered to be appropriate to the setting and townscape character of the site. The Proposed Development would not result in any significant effects on local landscape or townscape features or elements, and would not have any significant effects on visual amenity as experienced from locations within the local area.

Ecology and Nature

- 4.24 The Proposed Development will have no significant effects on Ecology or Nature Conservation either individually or in combination with other developments. Residual effects of the Proposed Development will be negligible and not significant in relation to all identified ecological receptors

Sustainable Design

- 4.25 The presumption in favour of sustainable development is at the heart of the planning system as Government drives legislative change through the Localism Act 2011 and subsequently through the National Planning Policy Framework (NPPF) and Local Policy Frameworks. Resolution 24/187 of the United Nations General Assembly define sustainable development as “development that meets the needs of the present without compromising the ability of future generations to meet their own needs” (WCED Report “Our Common Future” (1987)) and is captured within the NPPF. As set out within paragraph 6 of the NPPF, the policies in paragraphs 18 to 210, taken as a whole, constitute the Government’s view of what sustainable development in England means in practice for the planning system. The NPPF goes on to describe a presumption in favour of sustainable development should be seen as a golden thread running through both plan-making and decision-taking.

Adaptability

- 4.26 The development should be flexible enough to respond to future changes in use, lifestyle and demography. This means creating flexibility in the use of property, public spaces and service infrastructure and introducing new approaches to transportation, traffic management and parking. The development should therefore be flexible in order to accommodate future changes of use and circumstances through evolving social, technological and economic conditions.

Sustainable Building Techniques

- 4.27 Where appropriate, sustainable building construction techniques will be used in line with current building regulations. Sustainable construction measures typically comprise a combination of the following:
- Improved energy efficiency through siting, design and orientation;
 - Water conservation measures;
 - Considering fabric efficiency in the design of buildings;
 - Use of building materials capable of being recycled; and
 - An element of construction waste reduction or recycling.

Crime Prevention

- 4.28 One of the design objectives within item 58 of the National Planning Policy Framework (NPPF) states that developments should:
- “create safe and accessible environments where crime and disorder, and the fear of crime, do not undermine the quality of life or community cohesion;” (point 5, item 58, NPPF 2012)**
- 4.29 The design proposals for the Fort Parkway are based on an understanding of best practice guidance and reference has been made to the relevant documents including “Safer Places: the Planning System”.
- 4.30 When designing new developments, these should create areas that are attractive and contain clearly defined public and private areas that relate well with one another and create no ambiguity. In addition, the development should enable residents to take pride in their surroundings without the fear of crime, which in turn will create a sense of shared ownership and responsibility.

- 4.31 Landscape design is essential in achieving an environment that creates a sense of place and community safety. In this context, landscape design encompasses the planning, design and management of external, public spaces. Well-designed public lighting increases the opportunity for surveillance at night and will be integrated into future reserved matters applications.
- 4.32 Natural surveillance in the form of doors and windows overlooking streets, pedestrian routes and public open spaces will create activity throughout the day and evening and will be an essential element in creating a safe environment for all users, whilst discouraging criminal activity by increasing the risk of detection.
- 4.33 In forming the design proposals, the following key attributes have been included:
- The ownerships and responsibilities for external spaces will be clearly identified and the proposals facilitate ease of maintenance and management;
 - Natural surveillance is promoted wherever possible; and
 - CCTV and 24 hour on site surveillance will ensure the site is secure at all times.

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PLANNING | DESIGN | ENVIRONMENT | ECONOMICS

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