

Wilmslow Road, Manchester

BREEAM Pre-assessment Report
April 2021

Ensphere Group Ltd on behalf of
Watkin Jones



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Wilmslow Road, Manchester

BREEAM Pre-assessment Report – April 2021

Client Name: Watkin Jones

Document Reference: 20-E161-005

Project Number: 20-E161

Quality Assurance Approval Status

This document has been prepared and checked in accordance with Ensphere Group Ltd's Quality Management System.

Issue:	Version:	Prepared by:	Reviewed by:	Date:
Final	V1	Joanne Taylor	Pete Jeavons	April 2021

Sustainability

Energy

Climate Change

Socio-Economic

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1. Executive Summary

1.1 The following presents an overview of progress to date:

BREEAM Target

1.2 The target rating for the development is BREEAM “Excellent”. This equates to a score of $\geq 70\%$.

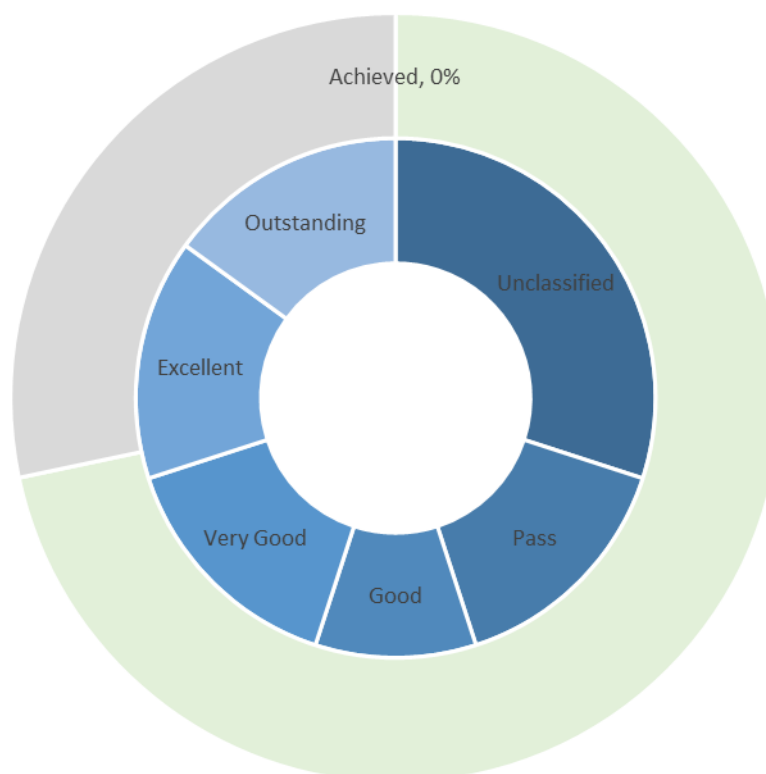
BREEAM Standard

1.3 The appropriate assessment type for this development is:

- BREEAM New Construction 2018 (Non-Domestic Buildings) with consideration given to the “Fully Fitted” “Multi-residential” criteria.

Progress Summary

Figure 1.1 BREEAM Score Overview (Design Stage)



1.4 Achievement of all currently targeted credits would result in a score of 72.28%.

2. Introduction

2.1 Ensphere Group Ltd (“Ensphere”) was commissioned by Watkin Jones to undertake a BREEAM rating review for the redevelopment of the managed Student Accommodation at Wilmslow Road, Manchester.

2.2 This report considers the credit options for an “Excellent” rating.

BREEAM Assessor & BREEAM AP

2.3 The BREEAM Assessor and BREEAM AP on this project is:

- Pete Jeavons, Ensphere Group Ltd, 52 Grosvenor Gardens, London, SW1W 0AU, pjeavons@enspheregroup.com; 020 7846 9041 (Assessor No. ENSP-PJ06 & AP No. BREEAMAP0356).

2.4 Support is also provided by:

- Joanne Taylor, Ensphere Group Ltd, 52 Grosvenor Gardens, London, SW1W 0AU, jtaylor@enspheregroup.com; 020 7960 6897.

BREEAM Tracker Key

2.5 Red text to indicate early RIBA stage actions.

3. Minimum Standards

Minimum Standards for an “Excellent” BREEAM rating level

Table 3.1 Minimum Standards

BREEAM Issue	Minimum Standards
Man03: Responsible construction practices	One credit (responsible construction management)
Man 04: Commissioning and handover	One credit (commissioning-test schedule and responsibilities)
Man 04: Commissioning and handover	Criterion 11 (Building User Guide)
Ene 01: Reduction of energy use and carbon emissions	Four credits (Energy performance or Prediction of operational energy consumption)
Ene 02: Energy monitoring	One credit (first sub-metering credit)
Wat 01: Water consumption	One credit
Wat 02: Water monitoring	Criterion 1 only (water meter on mains water supply)
Mat 03: Responsible sourcing of construction products	Criterion 1 only (responsibly sourced timber)
Wst 03: Operational waste	One credit

4. BREEAM Tracker

Issue ID	Issue ID/ Description/Aim	Credit Requirements	Available Credits	Predicted Credits	Contingency Credits	Available Score	Predicted Score	Contingency Credits	RIBA Stage - Critical	Responsibilities/Comments
Man01	Project brief and design Encouraging an integrated design process and considering BREEAM performance targets early to influence decision-making and optimise building performance, while avoiding unnecessary costs.	Project Delivery Planning (1 Credit) 1. Responsibilities Matrix 2. Project directory and project brief 3. Design and Access Statement 4. Key meeting minutes Stakeholder Consultation (interested parties) (1 Credit) 1. Copy of the consultation plan 2. Meeting Minutes/Consultation report summary 3. List of design changes as a result of consultation BREEAM AP (concept design) (1 Credit) 1. BREEAM pre-assessment + any additional sustainability targets and requirements 2. Meeting minutes BREEAM AP demonstrating regular attendance to DTM (monthly) BREEAM AP (developed design) (1 Credit) As above	4	4	0	2.10%	2.10%	0.00%	Early Action RIBA Stage 2	Responsibilities Client Project Manager Architect BREEAM AP Comments Early actions required Ensphere to provide letter template
Man02	Life cycle cost and service life planning Promoting the business case for sustainable buildings through the enhanced understanding of capital cost. Improving design, specification, maintenance and operation, by encouraging the use of life cycle costing.	Elemental Life Cycle Cost (LCC) (2 Credits) 1. A copy of Elemental Life Cycle Cost Report 2. List of design changes as a result of the LCC Component Level LLC Option Appraisal (1 Credit) 1. A copy of component Life Cycle Cost Report 2. List of design changes as a result of the LCC Capital Cost Reporting (1 Credit) 1. Predicted Capital Cost report	4	4	0	2.10%	2.10%	0.00%	Early Action RIBA Stage 2	Responsibilities Client Contractor Comments Early actions required
Man03	Responsible Construction Practices Encouraging construction sites to be managed in an environmentally and socially considerate and responsible manner. Monitoring to encourage continuous improvements and utility consumption reduction.	Pre-requisite 1. All specification containing timber products to have the relevant timber requirements Environmental Management (1 Credit) 1. Copy of EMS certificates from Principal contractor and completed PPG6 BREEAM AP Site (1 Credit) 1. Appointment of AP for construction and a copy of agreed targets during construction Responsible Construction Management (Up to 2 credits) 1. A copy of Environmental Management Plan 2. Template of environment site inspection that will be used during construction Monitoring of Construction Site Impacts (1 Credit) 1. Commitment to monitor, record energy and water consumption Monitoring of Construction Site Impacts - Transport of construction materials & waste (1 Credit) 1. Target and commitment to monitor, record CO2e emissions associated with material and waste transport	6	6	0	3.14%	3.14%	0.00%		Responsibilities Contractor Comments Ensphere to provide letter templates

Man04	Commissioning and handover Encouraging a well-managed handover and commissioning process, which will ensure building services and fabric defects are identified and rectified. Ensuring that the building responds to the needs of the occupants.	Pre-Requisite 1. Commitment letter from client to produce two BUGs. Commissioning - Testing Schedule and Responsibilities (1 Credit) 1. Appointment letter for commissioning manager. Commissioning - Design and Preparation (1 Credit) 1. Appointment letter for commissioning manager at RIBA stage 2/3. 2. Meeting minutes from commissioning manager showing input during design stage. Evidence the commissioning manager has the relevant qualification Testing and Inspecting Building Fabric (1 Credit) 1. Commitment letter from client to undertake thermographic survey and rectify any issues Handover (1 Credit) Commitment letter from client to undertake two BUGs and corresponding trainings.	4	3	1	2.10%	1.57%	0.52%		Responsibilities Commissioning Manager M&E Client Comments Ensphere to provide letter templates
Man05	Aftercare Encouraging aftercare support during the first year of the building operation, to ensure the building operates in accordance with the design intent and in response to the building occupants' needs.	Aftercare Support (1 Credit) 1. Commitment letter from client to provide appropriate aftercare support Commissioning Implementation (1 Credit) 1. Commitment letter from client to provide the following seasonal commissioning activities Post Occupancy Evaluation (1 Credit) 1. Commitment letter from client/building occupier to undertake POE	3	3	0	1.57%	1.57%	0.00%		Responsibilities Client Building Occupier Comments Ensphere to provide letter templates
Hea01	Visual comfort Providing occupants with the conditions that facilitate good visual comfort by designing out the potential for glare, achieving good practice daylight factors and having an adequate view out. Designing internal and external lighting systems to provide appropriate illuminance (lux) levels, thereby giving a more comfortable environment for occupants. Internal lighting is zoned to allow for occupant control.	Glare Control (1 Credit) 1. Copy of the glare strategy covering areas deemed at risk and measures to minimise/avoid glare. Daylighting (building type dependent) (Up to 2 Credits) 1. Report from specialist confirming the targeted daylight ratio View Out (1 Credit) 1. Drawings confirming view out calculations. Internal Lighting, External Lighting and Zoning and Occupant Control (1 Credit) 1. Internal lighting strategy and modelling demonstrating compliance with the different standards 1. Light fittings schedule 2. Product datasheet confirming luminance of light fittings install 1. Zoning and control strategy - drawing showing it	5	5	0	3.68%	3.68%	0.00%		Responsibilities Daylight Consultant Architect M&E Comments Ensphere to provide letter template M&E have confirmed the lighting to be installed, specifications also required
Hea02	Indoor air quality Facilitating good indoor air quality by considering indoor air pollution early in the design process so that a mitigation strategy can be put in place. Managing harmful emissions from construction products by specifying finishes and products that have been tested in accordance with the appropriate standards. Specifying an appropriate ventilation strategy that maintains good indoor air quality.	Pre-requisite - Indoor Air Quality (IAQ) plan 1. Indoor Air Quality Plan Ventilation (1 Credit) 1. Drawings confirming calculations Emissions from Construction Products (Up to 2 Credits) 1. Relevant specifications Post-construction Indoor Air Quality Measurement (1 Credit) 1. Commitment letter from client to undertake post-construction air quality test	4	3	1	2.95%	2.21%	0.74%	Early Action RIBA Stage 2	Responsibilities Air Quality Consultant M&E Architect Contractor Comments Ensphere to provide letter template
Hea03	Safe containment in laboratories This is no longer assessed as a separate issue within BREEAM UK New Construction 2018.	N/A	0	0	0	0.00%	0.00%	0.00%		
Hea04	Thermal comfort Thermal modelling informs the building design to provide a comfortable thermal environment that considers current climatic conditions, and projected climate change scenario conditions. Giving occupants control over their environment through appropriate temperature control strategies and thermal zoning.	Thermal Modelling (1 Credit) 1. Thermal Modelling and full dynamic thermal analysis Design for Future Thermal Comfort (1 Credit) 1. Thermal Modelling and full dynamic thermal analysis Thermal Zoning and Controls (1 Credit) 1. Thermal Modelling and full dynamic thermal analysis	3	3	0	2.21%	2.21%	0.00%		Responsibilities M&E

Hea05	Acoustic performance Enabling occupants to experience best practice acoustic performance levels appropriate to the functional activities in occupied spaces.	Acoustic Performance (Up to 4 Credits) 1. Acoustic report	4	1	0	2.95%	0.74%	0.00%		Responsibilities Acoustician
Hea06	Security Designing the building to consider and take into account security needs to ensure occupants safety and wellbeing.	Security of Site and Building (1 Credit) 1. Meeting minutes with SQSS 2. Drawings, technical memos showing that the recommendations have been incorporated	1	0	1	0.74%	0.00%	0.74%	Early Action RIBA Stage 2	Responsibilities Security Specialist Architect Comments Early actions required
Hea07	Safe and healthy surroundings Providing external site areas that are safe for occupant use. Enhancing the wellbeing of building users by giving access to an outdoor space.	Safe Access (1 Credit) 1. Construction drawings showing cycle and pedestrian paths Outside Space (1 Credit) 1. Construction drawings showing external spaces and amenities	2	1	1	1.47%	0.74%	0.74%		Responsibilities Security Specialist Architect
Ene 01	Reduction of energy use and carbon emissions Encouraging the design of energy efficient buildings with energy performance above national building regulations. Encouraging the accurate modelling of operational energy consumption.	Energy Performance (Up to 9 Credits) 1. RIBA stage 4 BRUKL 2. Energy statement Prediction of Operational Energy Consumption (4 Credits) 1. RIBA stage 4 BRUKL 2. Energy statement	13	4	0	9.04%	2.78%	0.00%	Early Action RIBA Stage 2	Responsibilities Energy Specialist Comments Early actions required
Ene02	Energy monitoring Helping to identify and reduce high energy demands where possible by accurate measurement of the energy consumption of the building by end use.	Sub-metering of End Use Categories (1 Credit) 1. Schematics showing metering of space heating, cooling, ventilation, lighting, small power etc. 2. Table Ene 02 filled out Sub-metering of High Energy Load and Tenancy Areas (1 Credit) 1. Schematics showing metering of space heating, cooling, ventilation, lighting, small power etc. 2. Table Ene 02 filled out	2	2	0	1.39%	1.39%	0.00%		Responsibilities M&E
Ene03	External lighting Reducing the building's energy consumption through the specification of energy efficient external lighting.	External Lighting (1 Credit) 1. Product datasheet confirming that the product specified achieves 70 luminaire lumens per circuit Watt 2. Specification confirming control (e.g. daylight, movement etc..) installed for external lighting	1	1	0	0.70%	0.70%	0.00%		Responsibilities M&E
Ene04	Low carbon design Reducing the building's energy consumption through the adoption of passive design solutions, free cooling and low or zero carbon (LZC) energy sources.	Passive Design Analysis (PDA) (1 Credit) 1. Passive design analysis (PDA) 2. Thermal modelling and BRUKL with passive design measures 3. Evidence that a suitably qualified energy specialist has quantified the CO2e reduction Free Cooling (1 Credit) 1. Passive design analysis with cooling analysis 2. Evidence for suitably qualified energy specialist 3. Dynamic simulation model demonstrating that the cooling demand can be met by free cooling Low and Zero Carbon Technologies (1 Credit) 1. LZC analysis and BRUKL Report 2. Evidence for suitably qualified energy specialist	3	1	1	2.09%	0.70%	0.70%	Early Action RIBA Stage 2	Responsibilities M&E Comments Early actions required

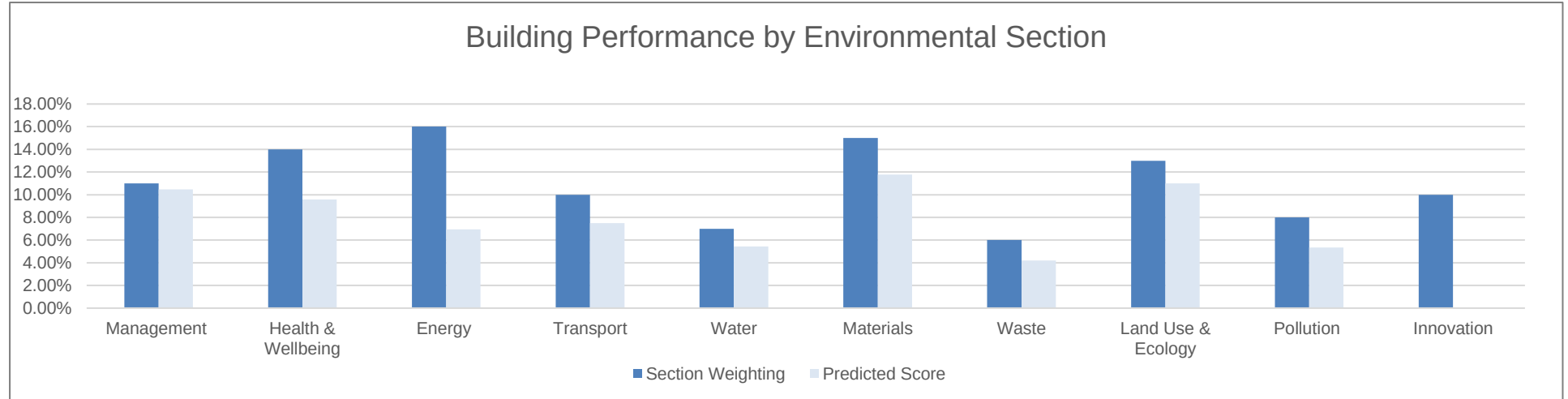
Ene05	Energy efficient cold storage Reducing the building's operational greenhouse gas emissions (CO ₂ -eq) through the design, installation and commissioning of energy efficient refrigeration systems.	Refrigeration Energy Consumption (1 Credit) 1. Product data sheets for the refrigeration system 2. Written commitment that Commissioning of the refrigeration system will take place Indirect Greenhouse Gas Emissions (1 Credit) 1. Demonstration of savings in indirect greenhouse gas emissions	0	0	0	0.00%	0.00%	0.00%		Responsibilities M&E
Ene06	Energy efficient transportation systems Reducing the building's energy consumption by specifying the optimum number and size of energy efficient transportation systems.	Energy Consumption (1 Credit) 1. Lift analysis that meet BREEAM requirements Energy Efficient Features (1 Credit) 1. Lift specification with corresponding datasheet that confirm the requirements are met	2	2	0	1.39%	1.39%	0.00%		Responsibilities Lift Consultant
Ene07	Energy efficient laboratory systems Reducing the building's operational greenhouse gas emissions (CO ₂ -eq) by specifying best practice energy efficient laboratory equipment.	Design Specification (1 Credit) 1. Minutes of meetings to confirm consultation with relevant stakeholders 2. Project brief that includes laboratory performance criteria Best Practice Energy Efficient Features (Up to 4 Credits) 1. Energy Demand Assessment 2. Laboratory system specification and drawings	0	0	0	0.00%	0.00%	0.00%		Responsibilities M&E
Ene08	Energy efficient equipment Demonstrating a meaningful reduction in the total unregulated energy demand of the building by using energy efficient equipment.	Energy Efficient Equipment (2 Credits) 1. Fill in energy 08 table 2. Specification confirming targeted requirements.	2	0	0	1.39%	0.00%	0.00%		Responsibilities M&E
Tra01	Transport assessment and travel plan Recognising developments in proximity to good public transport networks, thereby helping to reduce transport-related pollution and congestion	Travel Plan (2 Credits) 1. Travel Plan 2. Drawings showing travel plan proposals	2	2	0	1.67%	1.67%	0.00%		Responsibilities Transport Consultant
Tra02	Sustainable transport measures Recognising developments in close proximity of, and accessible to, local amenities which are likely to be frequently required and used by building occupants.	Sustainable Transport Measures (Up to 10 Credits) 1. Evidence to demonstrate the measures targeted	10	7	3	8.33%	5.83%	2.50%		Responsibilities Transport Consultant
Wat01	Water consumption Reducing the demand for potable water through the provision of efficient sanitary fittings, rainwater collection and water recycling systems.	Water Consumption (Up to 5 Credits) 1. Water 01 Calculator 2. Specifications 3. Product data sheet confirming flow rates	5	3	2	3.89%	2.33%	1.56%		Responsibilities BREEAM Assessor Architect
Wat02	Water monitoring Specification of water meters to allow for management and monitoring of water use in the building. This encourages reductions in water use by identifying areas of high usage and investigating potential causes.	Pre-requisite 1. Drawing showing location of water meter Water Monitoring (1 Credit) 1. Schematics showing submetering 2. Specification and corresponding product datasheet of the product 3. Specification highlighting connection to BMS or ability to be connected	1	1	0	0.78%	0.78%	0.00%		Responsibilities M&E
Wat03	Water leak detection Reducing the unintended water consumption due to leaks by installing leak detection systems and flow control devices.	Leak Detection System (1 Credit) 1. Specification detailing leak detection system 2. Product datasheet for the leak detection system Flow Control Devices (1 Credit) 1. Mechanical Specification 2. Drawings to show the location if the flow control systems	2	2	0	1.56%	1.56%	0.00%		Responsibilities M&E

Mat04	Water efficient equipment Reducing water consumption for non-domestic scale, non-sanitary water uses by specifying efficient systems and improving the design efficiency of any water-using processes.	Unregulated Water Demand (1 Credit) 1. Letter template	1	1	0	0.78%	0.78%	0.00%		Responsibilities Contractor Comments Ensphere to provide a letter template
Mat01	Environmental impacts from construction products - Building life cycle assessment (LCA) Reducing buildings' environmental life cycle impacts through conducting Life Cycle Assessment and integrating its outcomes in the design decision-making process.	Life Cycle Impacts 1. Specifications 2. Allocation to undertake the material assessment 3. Cost plan Substructure and Hard Landscaping Options Appraisal during Concept Design (Up to 6 Credits) 1. Specifications 2. Allocation to undertake the material assessment Core Building Services Options Appraisal during Concept Design (1 Credit) 1. Specifications 2. Allocation to undertake the material assessment	7	7	0	7.50%	7.50%	0.00%	Early Action RIBA Stage 2	Responsibilities Architect Structural Engineer LCA modeller Comments Early actions required
Mat02	Environmental impacts from construction products - Environmental Product Declarations (EPD) To encourage availability of robust and comparable data on the impacts of construction products by rewarding the specification of products with environmental products declarations.	Specification of Products with a Recognised Environmental Product Declaration (EPD) (1 Credit) 1. Specification 2. EDPs 3. Allocation to undertake the material assessment	1	0	1	1.07%	0.00%	1.07%		Responsibilities Architect Structural Engineer Building Services
Mat03	Responsible sourcing of construction products Recognising and encouraging responsible sourcing of construction products. This includes the source of products and the intermediary companies processing and transporting the product to site.	Pre-requisite 1. All relevant specification susceptible to contain timber products to have the relevant timber requirements. Sustainable Procurement Plan (1 Credit) 1. Procurement plan in place by RIBA stage 2 Measuring Responsible Sourcing (Up to 3 Credits) 2. Responsible Sourcing of materials	4	2	0	4.29%	2.14%	0.00%	Early Action RIBA Stage 2	Responsibilities Architect Structural Engineer M&E Comments Early actions required
Mat04	Insulation This is no longer assessed as a separate issue within BREEAM UK New Construction 2018.	N/A	0	0	0	0.00%	0.00%	0.00%		
Mat05	Designing for durability and resilience Increasing the lifespan of the building through designing for durability and protection from degradation and specifying appropriate construction products.	Protecting Vulnerable Parts of the Building from Damage (0.5 Credit) 1. Marked up drawings Protecting Exposed Parts of the Building from Material Degradation (0.5 Credit) 1. Completed Mat 05 spreadsheet and supporting drawings	1	1	0	1.07%	1.07%	0.00%		Responsibilities Architect
Mat 06	Material efficiency Encouraging the reduction of environmental impacts through optimising the use of materials during all stages of the project.	Material Efficiency (1 Credit) 1. Material efficiency technical memo/report (must include quantities of materials saved)	1	1	0	1.07%	1.07%	0.00%	Early Action RIBA Stage 1/2	Responsibilities Architect Structural Engineer M&E Comments Early actions required

Wst01	Construction waste management Improving resource efficiency through developing a pre-demolition audit and a Resource Management Plan, maximising the recovery of material during demolition and diverting non-hazardous waste from landfill.	Pre-demolition Audit (1 Credit) 1. Pre-demolition Audit Construction Resource Efficiency (Up to 3 Credits) 1. Site Waste Management Plan Diversion of Resources from Landfill (1 Credit) 1. Site Waste Management Plan	5	3	3.00%	1.80%	Early Action RIBA Stage 2	Responsibilities Contractor
Wst02	Use of recycled and sustainably sourced aggregates Encouraging the use of recycled or secondary aggregate or aggregate types with lower environmental impact to reduce waste and optimise material efficiency.	Recycled Aggregate (1 Credit) 1. Recycled content calculator 2. Specification 3. Letter of commitment from Contractor	1	0	0.60%	0.00%		Responsibilities Structural Engineer Contractor
Wst03	Operational Waste Encouraging the diversion of operational waste from landfill through the provision of space and facilities allowing the segregation and storage of recyclable waste.	Operational Waste (1 Credit) 1. Drawings/Specifications to demonstrate the location of the operational waste facility 2. Confirmation for the likely waste streams for the site.	1	1	0.60%	0.60%		Responsibilities Architect Contractor
Wst04	Speculative finishes (Offices only) Specification of floor and ceiling finishes only where agreed with the occupant or, for tenanted areas where the future occupant is unknown, installation in a show area only, to reduce wastage.	N/A	0	0	0.00%	0.00%		Responsibilities Architect
Wst05	Adaptation to climate change Encouraging consideration and implementation of measures to mitigate the impact of more extreme weather conditions arising from climate change over the lifespan of the building.	Resilience of Structure, Fabric, Building Services and Renewables Installation (1 Credit) 1. Climate Change Adaptation Strategy 2. Appraisal or Structural and fabric resilience 3. Systematic risk assessment	1	1	0.60%	0.60%	Early Action RIBA Stage 2	Responsibilities Architect Structural Engineer M&E
Wst06	Design for disassembly and adaptability Encouraging consideration and implementation of measures design options related to adaptability and disassembly, which can accommodate future changes to the use of the building and its systems over its lifespan.	Design for Disassembly and Functional Adaptability - Recommendations (1 Credit) 1. Building-specific functional adaptation strategy study Disassembly and Functional Adaptability – Implementation (1 Credit) 1. Building-specific functional adaptation strategy study	2	2	1.20%	1.20%	Early Action RIBA Stage 2	Responsibilities Architect Structural Engineer M&E

LE01	Site selection Recognising the reuse of previously developed and contaminated land where appropriate remediation has taken place.	Previously Occupied Land (1 Credit) 1. Photograph/Exiting site plan of the site or Design and Access Statement describing the previous use Contaminated Land (1 Credit) 1. Contaminated site investigation and risk assessment/report 2. Commitment letter from the contractor that the remediation strategy will be implemented	2	1	1	2.00%	1.00%	1.00%		Responsibilities Client Contractor Contaminated land consultant
LE02	Identifying and understanding the risks and opportunities for the project Identifying and understanding the ecological risks and opportunities associated with the site to inform the determination of the strategic outcome for the site.	Pre-requisite - Ecological Value of Site 1. Risk evaluation checklist completed 2. Appointment of ecologist if going through Route 2 3. EMP detailing the processes in place during construction to monitor ecology Route 1 - Low Risk and Opportunities Defined in GN34 (1 Credit) Completed Assessment using GN35 OR Route 2 - Complex Ecological Systems (2 Credits) Ecologist's Survey and recommendation following hierarchy	2	2	0	2.00%	2.00%	0.00%	Early Action RIBA Stage 1	Responsibilities Ecologist Selected team member Comments Early actions required
LE03	Managing negative impacts on ecology Recognition of steps taken to avoid impacts on existing site ecology as far as possible.	Identification and Understanding the Risks and Opportunities for the Site (1 Credit) 1. Ecologists report 2. Confirmation that the Ecologist is suitably Qualified Managing Negative Impacts of the Project (Up to 2 Credits) 1. Ecologists report 2. Confirmation that the features of value will be protected in line with the Ecologist's recommendations	3	3	0	3.00%	3.00%	0.00%	Early Action RIBA Stage 1	Responsibilities Ecologist Selected team member Comments Early actions required
LE04	Change and enhancement of ecological value Recognition of steps taken to enhance site ecology.	Identification and Understanding the Risks and Opportunities for the Site 1. Ecology Report Change and Enhancement of Ecology - Route 1 ONLY (1 Credit) 1. Confirmation that the project team have implemented local ecological solutions and measures to enhance the site Change and Enhancement of Ecology - Route 2 ONLY (Up to 3 Credits) 1. Calculation of the Ecological value	4	3	1	4.00%	3.00%	1.00%		Responsibilities Ecologist Selected team member
LE05	Long term ecology management and maintenance Encouraging the long term maintenance and management of ecology on site to ensure both new and existing ecological features continue to thrive.	Long Term Impact on Biodiversity 1. As above Planning Liason, Data, Monitoring and Review Management and Maintenance (1 Credit) 1. Ecology report 2. Confirmation of additional measures 3. Confirm Ecology and Biodiversity section in Building User Guide Landscape and Ecology Plan (1 Credit) 1. Landscape and Ecology Plan	2	2	0	2.00%	2.00%	0.00%		Responsibilities Ecologist Selected team member Client
Pol01	Impact of refrigerants Rewarding buildings that reduce the impact of refrigerant gas emissions.	Impact of Refrigerants (2 Credits) 1. Specification and/or manufacturer's literature to confirm the design/type of system to be installed 2. Drawings to show the positioning of the units Leak Detection (1 Credit) 1. Specification and/or manufacturer's literature to confirm the design/type of system to be installed 2. Drawings to show the positioning of the units	3	1	0	2.00%	0.67%	0.00%		Responsibilities M&E

Pol02	Local air quality Recognising buildings which limit their impact on local air quality, by consideration of the combustion plant and fuel used on site.	Local Air Quality (Up to 2 Credits) 1. Data sheets and/or manufacturer emails confirming NOx emissions for each piece of equipment 2. Boiler/CHP/Heat Emitter/Cooling/Heater schedules	2	2	0	1.33%	1.33%	0.00%		Responsibilities M&E
Pol03	Flood and surface water management Rewarding buildings and their sites that limit on-site and off-site local flooding and hence the damage this can cause.	Flood Resilience (Up to 2 Credits) 1. Site Specific Flood Risk Assessment Pre-requisite - Surface Water Run-off 1. Calculations and Drainage Plan Surface Water Run-off Rates (1 Credit) 1. Calculations and Drainage Plan Surface Water Run-off Volume (1 Credit) 1. Calculations and Drainage Plan Minimising Water Course Pollution (1 Credit) 1. Drainage Plan	5	3	0	3.33%	2.00%	0.00%		Responsibilities Flood Risk Consultant Drainage Engineer
Pol04	Reduction of night time light pollution Avoiding or reducing the impact of night time light pollution, through careful design and specification of light sources.	Night Time Light Pollution (1 Credit) 1. Completed letter template 2. Drawings to show the location of the external lighting, time switches and photo-cells	1	1	0	0.67%	0.67%	0.00%		Responsibilities M&E
Pol05	Reduction of noise pollution Avoiding or reducing the impact of external noise from the building.	Reduction of Noise Pollution (1 Credit) 1. Noise Impact Assessment	1	1	0	0.67%	0.67%	0.00%		Responsibilities Acoustician
Inn01	Innovation Test out new ideas which, if successful, could change the status quo of the industry. Allow the industry to explore new opportunities and evolve its processes.	Up to 10 Credits	10	0	0	10.00%	0.00%			
Total							72.28%	11.76%		



Appendices

A. General Notes

The report is based on information available at the time of the writing and discussions with the client during any project meetings. Where any data supplied by the client or from other sources have been used it has been assumed that the information is correct. No responsibility can be accepted by Ensphere Group Ltd for inaccuracies in the data supplied by any other party.

The review of planning policy and other requirements does not constitute a detailed review. Its purpose is as a guide to provide the context for the development and to determine the likely requirements of the Local Authority.

No site visits have been carried out, unless otherwise specified.

This report is prepared and written in the context of an agreed scope of work and should not be used in a different context. Furthermore, new information, improved practices and changes in guidance may necessitate a re-interpretation of the report in whole or in part after its original submission.

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These terms apply in addition to the Ensphere Group Ltd "Standard Terms of Business" (or in addition to another written contract which may be in place instead thereof) unless specifically agreed in writing. (In the event of a conflict between these terms and the said Standard Terms of Business the said Standard Terms of Business shall prevail.). In the absence of such a written contract the Standard Terms of Business will apply.



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