



Critical Performance Criteria

Quality Standards

The quality standard of Tor is that of a premium office development in Maidenhead. The project complied with all current British or European Standard Statutory Regulations, and good practice. However these are considered as the minimum requirements as set out in all relevant legislation and any statutory instrument, Building Regulation, by-law, European Standard or Code of Practice.

The existing building was stripped back to its structure and had additional new construction.

The Building was designed to accord with sustainable criteria as embodied in BREEAM 2008 for an 'Excellent' rating. The building was also designed to comply with the energy performance requirements of current Building Regulations Approved Document Part L.

The Developer and the Contractor, in the selection of natural or manufactured materials, components and systems, as far as practicable, ascertain the anticipated production or product life cycle to avoid the selection of materials, components or systems with built in obsolescence. Whenever possible the selection of materials, components or systems was standardised throughout the building.

Accommodation

Accommodation and Car Parking

-Refer to floor areas schedule.
-206 Car parking spaces including disabled spaces as existing.

Occupancy Density

One person per 10 m² of net lettable office area for design of lifts and building services. WC accommodation is based on 1 person per 14m² net lettable office based upon 120% of

the population on a 50:50 male/female ratio.

Office Depths

13.0M.

Central Columns

Refer to schematic layouts.

Office Division Module

1500 mm module.

False Ceiling Heights

Office areas on ground and upper floors have clear floor to suspended ceiling height of not less than 2700mm. Clear floor to ceiling heights in toilets are not less than 2500mm.

Sectional Letting Requirements

The building was designed to be utilised by the tenant or to be let in a number of configurations, namely as a single unit, on a floor by floor basis or on a part floor basis.

Planning Grid

The planning grid is based on a module that gives flexibility for partition layouts. The ceiling systems, lighting fittings and modules are all designed to permit future space planning and be compatible with the planning grid. Internal walls are positioned to maintain the planning partition module. The number of rows of columns have been minimised.

Raised Floor

An allowance has been made on the office floors for a 150mm floor zone (overall raised access floor) for the distribution of power, voice and data cabling and other tenant services. No mechanical or electrical services other than the small power distribution system are located in the floor zone without specific tenant approval.

Specific small power provision has been made for cleaning purposes and for meeting rooms at all levels and the entrance reception area.

Structure

Foundations

Columns and external stair cores are supported on a series of mass filled concrete pad foundations.

Building + Roof Structure

The existing building was an in-situ reinforced concrete structure constructed in the mid 1980's. The floors are formed using one way spanning ribbed slabs supported on a series of concrete column sections. The columns are supported on reinforced concrete pad foundations.

The new core is a steel framed structure with composite concrete metal deck floors.

The new roof is lightweight metal cladding on a structural liner spanning between steel beams supported on a series of steel columns. The new steel columns are supported on the existing structure.

The new plant enclosure at roof level is steel framed with a composite concrete roof and lightweight cladding panels supported on secondary cold formed rails.

Floor Imposed Loadings

-3.5KN per m² for office floors and reception.
-2.5KN per m² for toilets and car park.
-5.0KN per m² for roof plant rooms/areas.
-1.5KN per m² for lightweight roof.

Raised Floors, Building Services, Suspended Ceiling Loading

1.00 KN/m² for raised floors, building services and suspended ceilings in addition to the above loadings.

Demountable Partitions

1.0KN per m² for demountable partitions in addition to the above loadings.

Fire Standards

Comply with current Building Regulations.

Services Holes, Ducts and Plant Area

The design accommodates sufficient riser ducts to facilitate the future installation of tenants' power and data communication systems at each floor level and to suit the sub-divisibility of floors.

10% of the roof plant areas is for future tenant plant.

Building Enclosure

External Walls

External envelope comprises of glazing, brise soleil, opaque glazed and metal cladding panels. Metal cladding is polyester powder coated. Full height glazing to main entrance. Perforated metal panels to external escape stairs. Curtain walling system is generally capped, aluminium self-draining, thermally broken frames with a polyester powder coat finish. Windows are non-openable.

A glass lidded circle slide barrel door is provided to the entrance façade. All entrance, exit, fire and pass doors is provided with a notional 38mm diameter full height tubular handrail or appropriate fire release door furniture.

Provision is made for illuminating those exterior elevations overlooking the roundabout and the main entrance.

Window Types

Aluminium window systems is a polyester powder coated thermally broken frames.

Windows are double glazed with low E inner leaf, and high performance solar rejection coating to outer leaf, with an air gap and low energy spacers.

U value

Refer to 'Sustainability' section.

All curtain walling and windows are 'Centre for Windows and Cladding Technology Performance Standards'.

Insulated glazed 'look-alike' panels provided where shown on drawings.

Windows to be externally cleaned as per the method set out in the window cleaning strategy document.

Insulation Value

Refer to 'Sustainability' section

Note: all the insulation used in External walls, Ground floor, Roof should achieve an 'A/A+' rating under the Green Guide: www.thegreenguide.org.uk.

Glazing Types

Double glazed sealed clear or solar performance treated glass. Thickness and lamination to depend on noise survey information and Building Regulations – Part L. Refer to 'Sustainability' section for U-values.

Blinds

To be provided by tenant and to be included within the developer/tenant agreement.

Entrance Door

Fully glazed lidded circle slide barrel door.

Roof Plant Enclosure

Steel frame and polyester powder coated panel and louvre enclosure, with reinforced protected designated walkways.

Single ply membrane suitably flashed to plant upstands for weather tightness.

An external area on the roof is allocated for future tenant equipment.

Main Roof

-Single-ply insulated roofing system.
-Metal cladding to parapets.
-Metal cladding is polyester powder coated.

Plant Roof

Composite concrete metal deck slab with single-ply insulated roofing system to 3rd floor internal plant. The top level plant is open air.

Roof Access

Lower level via internal plant room at 3rd floor level.

Upper level via independent internal staircase plus emergency access hatch from reception stairs.

Cleaning + Safety

A safety latchway system is provided at roof level.

All internal areas are accessed via lightweight cherry picker.

Noise and Vibration Levels

Acoustic readings have been taken from the existing site prior to development to provide a benchmark ambient noise level and to develop an acoustic strategy.

The facades of the building, in particular the glazing, have been designed so as to reduce traffic noise intrusion (L10) to the office areas to NR35.

All plant in the building is designed as a minimum to comply with BS6472 and the criteria shall be the threshold of imperceptible vibration to people within the building.

An acoustic specialist was instructed to review the design for compliance with the desired criteria. The anticipated NR levels may be provided upon request.

The building is designed to the following desired internal noise criteria:

- Office areas generally NR 38 (open plan).
- Entrance halls, corridors and circulation stairs NR 40.
- Lavatories NR 40-45.
- Conference room and meeting rooms by tenant – suggested levels NR 35.

Internal Walls

Core Walls

New internal partitions are in dry lining system generally to core and principle duct riser shafts. 140 mm block work wall is provided to lift shaft walls. Subject to acoustic study.

Skirtings

Painted skirting 100mm high to carpeted areas. 100mm high skirting to match either stone or tiled areas elsewhere.

Internal Doors

Demountable Walls

By tenant.

Door Frame Types

Black American Walnut to circulation doors. Service doors to achieve white paint finish.

Door Types

The internal doors are full height solid core - veneered Black American Walnut doors with hardwood lippings.

Doors are provided from all core areas into office areas, with closer devices to comply with the Part B and Part M of the Building Regulations.

Duct access doors are painted flush timber fire resisting door panels.

Full height clear glass vision panels are provided to escape route/lobby doors where required by Statutory Authorities.

Plant room doors and other 'non-public' doors are paint finished solid core.

Glazed Panels

Doors to cores and staircases have glazed vision panels.

Architraves

Match doors.

Ironmongery including Locking Facility Satin stainless steel ironmongery. Sub-mastering per floor with single grand master.

Ironmongery is matt stainless steel finish from John Plank Fusion range.

External doors have no external ironmongery and internal doors where applicable to have 3 lever locks.

Ironmongery includes door closers, back plated door furniture and signage as appropriate, with kick and finger plates on push side only.

Fire exit and statutory signage is provided.

Staircases

Main Staircase

The main spiral internal access stair in the reception area is of steel construction, treads to receive carpet finish.

The stairs will have a balustrade system comprising a stainless steel handrail with structural glazing balustrade.

Gallery balustrade at first floor level matches staircase.

Escape Staircases

External escape stairs shall be galvanised steel construction.

Rise and Going

In accordance with layout and Building Regulations.

Wall + Skirting Finishes

Internal walls are plastered and paint finished with Black American Walnut architraves and painted skirting.

Ceiling + Soffit Finishes

Plastered soffits with emulsion paint.

Floor Finishes

Internal staircases are screeded and carpeted.

Exposed Strings

Paint finished.

Wall Rails

Stainless steel on stainless steel brackets.

Balustrading

Polyester Powder Coated steel balustrade uprights with stainless steel handrail.

False Ceilings

Plasterboard ceiling at floor levels only.

Lifts

Size

Two energy efficient 13 No. person lifts serving ground to upper floors inclusive. One 13 No. person lift serving basement to upper floors inclusive.

Door + Frames

Stainless steel door coverings with stainless steel frames. 1000mm wide openings.

Internal Finishes

Illuminated ceiling. Stainless steel trims, panels and rails, with stone floor finish matching reception. Feature acid-etched white glass cladding to lift interior. The basement to upper lift is fitted with the facility to fix protective blankets and a 'top hat' roof in order that it may be also used as a goods lift.

Call System + Control

Duplex computerised control with floor read out at ground floor level and up and down arrows on other floors. Floor by floor door locking.

Emergency System

Automatic system within the car.

Telephone Facilities

Provision is made for emergency telephone.

Performance

The performance of lift installations (excluding any good lifts) will have a maximum waiting time of 30 seconds with cars assumed to be loaded at 80% occupancy. A passenger handling capacity of 15% of the total building population in a five minute period will be allowed. Performance is in line with BREEAM requirements.

Office Areas

Floor Finishes

An allowance is available for good quality commercial grade carpet tiles on raised floor system to third floor only in line with BREEAM requirements.

Wall + Skirting Finishes

Matt emulsion paint to walls and ceilings. Acrylic paint with satin finish to skirtings.

Ceiling Finishes

Ceilings are fully accessible, 600 x 600 rectangular micro dot metal ceiling tiles on white metal T slim-line support grid with plaster board margins housing flush, low brightness luminaires and air conditioning diffusers.

Fire barriers are provided in the ceiling cavity where required.

Provision is made for blind fixings. (Tenant fit out for blinds.)

Ceiling Access Requirement

Fully accessible.

Window Boards

Part of the curtain walling system, Polyester Powder Coated aluminium, colour: standard white.

Raised Floor

PSA MOB medium grade to provide generally a minimum nominal zone of 110mm average clear void, with exception of indicated zone on 2nd floor where the clear void is minimised due to existing conditions, using 600 x 600 fully encapsulated panels on an adjustable steel pedestal system.

The raised floor system is designed to accommodate the following loadings:

- Superimposed 3.5 kN/m²
- Partitions 1 kN/m²

The raised floor system shall allow tenants for full flexibility with setting and wiring connections to services as detailed in the M&E specification.

It accommodates all fire barriers required in the void to comply with all statutory, and other, requirements.

The system is earth bonded in accordance with current regulations.

Lighting

Lighting design philosophy will include:

- Group lamp change after 6000 hours.
- Luminaires cleaned every two years.
- Room surfaces cleaned every four years.
- An intelligent lighting control system with area controllers is provided.

Internal Lighting Levels

All lighting has high frequency control gear where possible. Lighting to office areas will achieve 400 lux maintained average in open plan, with a uniformity ratio of 0.8 at desk height or the defined task area.

The maximum illuminance limit for luminaires in the office space is 1500cd/m² at an angle of 60° and above.

Lighting to core and toilet areas will be 150 lux average.

Lighting levels in plant rooms will be 200 lux.

Light Switching Flexibility

Office floors will be switched via PIR and daylight controlled movement detectors.

A flexible office lighting control system is used which can be adapted by the tenant for future alteration.

Special Lighting

Some feature lighting will be provided within the Ground floor reception area.

Emergency Lighting

Emergency lighting will be provided in accordance with BS5266 via integral emergency inverter packs within general luminaires.

Office Lighting

Office luminaires consist of low brightness 600 x 600 fluorescent fittings suitable for commercial office use, supplemented by wall-washing, perimeter down lights to kitchenette areas and around internal atrium.

Luminaires have a maximum cut off angle of 60° to reduce glare and light spill from the building.

The lighting design complies with the recommendations set out in the CIBSE Guide LG7 for speculative office spaces.

Cores

Generally compact fluorescent down lighters but to main reception area where rectangular 'slot' lights

supplemented by LV down lights are used.

Rectangular slot lights within WC's supplemented by LV down lights.

Plant and bin stores

Surface mounted, impact resistant, suitably IP rated fluorescent luminaires will be used in plant areas and bin stores.

External Lighting

External car park areas achieve a lighting level of 10 lux average, and luminaires have been selected to reduce the possibility of light pollution and light spill. The external lighting will be controlled via photocell and time clock where the luminaires will be switched on at dusk via the photocell and switched off at a preset time by the time clock.

All external column mounted luminaires are mounted below the building height, and in sensitive areas where light spill is an issue luminaire height will be kept to a minimum while still conforming to British Standards.

The installation will be designed in accordance with British Standards and local planning guidance.

Steel hoop column protectors are to be allowed in front of each car parking space where applicable.

Accessory Plates

All accessories to be installed at heights recommended in Part M of the Building Regulations.

White PVC or metal clad accessories in maintenance and ancillary areas as appropriate.

Toilets

Size + Accommodation

As core layouts.

Wall

Painted plasterboard walls, full height glazed ceramic wall tiles to disabled WC and shower and basin wall of WC.

Floor Finishes

Floor screed with glazed porcelain

non-slip floor tiles and half tile skirtings.

Ceiling Finishes

Painted plasterboard. Access to M&E services via metal panel access ceiling.

False Ceiling Heights

2.500 minimum.

Vanity Units

'Leadenhall' wall mounted ceramic basins with coloured glazed splash-back housing tap fittings.

Backlit mirrors are provided behind washbasins on tiled wall.

Sanitary Type

White glazed.

Hand Dryers

Provision for hand dryers. Hand dryers by tenant.

Mirror

Wall mirrors above vanity unit. Backlit WC Cubicle Design.

Internal Doors + Frames

Plasterboard fully enclosed cubicles with veneered Black American Walnut screen and doors.

Backs of cubicles are in melamine faced 'UPS' panelling to provide access to ducts. Panels are fully fitted, lipped and balanced on easy release systems.

Each toilet have door stops, coat hooks and toilet roll holders in polished stainless steel.

Grab rails provided to disabled and ambulant toilets and disabled showers.

Internal circulation door frames and architraves are Black American Walnut.

Doors within toilet areas match other internal doors.

Appropriate designation signage is included.

Disabled Toilets

Disabled toilet facilities provided on all floors.

Cleaner Store

Size + Location

1 No. at each floor level.

Sink Facilities

1 No. Belfast sink.

Power Facilities

Twin power sockets are provided.

Wall + Skirting Finishes

Plasterboard walls half tiled skirtings.

Floor Finishes

Floor screed with easy maintenance rubber floor.

Ceiling Finishes

Plaster painted.

Shower

Shower

Facilities are provided suitable for disabled at each floor. Full shower facilities at basement level.

Plants

Wall + Skirting Finishes

Walls fair faced block work to service cupboards in basement, appropriate drylining system to internal plant at upper level, no skirtings.

Floor Finishes

Internal plant areas to basement are waterproof float finish to concrete (with floor seal paint) and localised bunding. Single membrane resistant roof finish to internal plant at upper level. Bridging steps provided as necessary with handrails.

All areas provided with drainage provision.

Ceiling Finishes

–Fairfaced soffits.
–Exposed soffit to service cupboards.
–Soffit lining is provided if insulation is exposed.

Doors

–PPC metal doors and frames.
–Consideration is to be given to the future removal and replacement of plant.

Tea Point

Capped off services are provided at each floor.

The waste pipes are capped at low level whilst the cold water supply is capped at high level within the ceiling void to the kitchen area.

Entrance Hall

The proposal has been designed to be fully accessible to the disabled. Primary access into the building from the hard landscaped platform is through a powered glazed lidded circle slide barrel door.

The primary access provision places the user within the reception area. Access from here into the office floor-plate is by one of two compliant access doors with compliant vision panels. Three (minimum 13 person) disabled accessible passenger lifts provide access to all office floor levels.

An adjacent main access stair provides alternative access to each floor level, and a spiral staircase runs from the lower ground entrance to ground floor reception area.

A set of WC facilities are provided either side of the central core to each of the 3 floors which incorporate a unisex wheelchair accessible WC and shower. An additional accessible WC has been provided at the south end of the office wing.

A 'trend' BMS system is employed in the building with a visual readout being clearly visible in the seating area via a LCD TV screen.

Mat Well

Mat is provided in stainless steel well.

Floor Finish

Stone tile flooring with matching skirting laid on solid screed floor.

Wall Finish

Plasterboard wall finishes with paint finish.

Provision is made for 2 No. feature wall constructed out of layers of cut veneer slats.

2 No. Plasma screens are installed to feature wall alongside the seating area.

Ceiling Finishes

Solid plasterboard with feature lights.

Phones + Power Facilities

Provision of floor boxes complete with containment for power, switched lighting, telecoms and data outlets adjoining designated future seating/ reception desk position areas. Wiring by tenant.

Control Panels

Fire alarm control panel are incorporated into reception wall cladding.

Building Services

Comfort Air Conditioning, Heating and Ventilation

3-pipe VRF air conditioning system serving offices floors. Minimum 2 systems per floor, 1 ceiling concealed fan coil per 27m² (perimeter zone) or 50m² (internal zone), each with valve box to achieve flexibility for future tenant sub-division.

Ventilation via central air handling unit(s) at roof level.

Separate Landlord's 3-pipe VRF / split systems to serve Reception.

Electric panels heating to staircases, toilets and showers.

Heating requirements to air handling units be achieved by gas fired boilers to meet BREEAM requirements with the hot water being generated by electric water heaters at each level.

General ventilation and frost protection heating to plant rooms.

Control Module

Perimeter and internal zones maximum control module size to suit British Council for Offices 2005 Best Practice In The Specification For Offices.

Grilles

Perimeter zones served by linear slot

supply air grilles with return air via passive grille sections and air handling luminaires. Central zones served by 4 way louver face diffusers for supply with return air via passive return air via passive return air diffusers and air handling luminaires.

Design Temperatures

Internal Office Conditions:
 –Winter 22 °C +/- 2°C (no humidity control) at or above -4 °C external temperature. 100% wet bulb.
 –Summer: 22°C +/- 2°C (no humidity control) at 30° external temperature.
 –Fresh Air: 12L/sec/person
 –Lavatories: Winter 19°C min
 –Lavatories: Air changes/hr: 8
 –Staircases : Winter 19°C min
 –Entrance hall: Winter 22°C +/- 2°C (no humidity control) at or above -4°C external temperature. 100% wet bulb.
 –Entrance hall: Summer: 22°C +/- 2°C (no humidity control) at 30°C external temperature.

Ventilation

Fresh air supply to office areas in accordance with the guidelines of the British Council for Offices 2005 Best Practice In The Specification For Offices.

Cooling Loads

The basis of the small power loading will be 25W/m², and occupancy loading 1 person/10m².

The basis of heat gain for lighting will be a maximum of 12W/m².

The systems will accommodate an average of 90W per person sensible heat gains and 50W per person latent heat gains based upon the design occupancy for building and engineering services.

Additional Ventilation Systems

Plant space is allowed at roof level in order for the tenant to provide supplementary systems.

Toilets

System Type

Central system for toilet core.

8 air changes per hour (extract only).

Air make up is via transfer fan coil unit from the adjoining office area ceiling voids.

Noise Level

NR40

Lighting

System type

Local individual systems for WC cores controlled via PIR.

Plumbing

Storage Tanks

Storage tank and booster set mounted at car park level.

Soil + Waste System

A two pipe soil and vent system within each toilet core.

Pipe Materials

UPVC or cast iron/copper pipework throughout.

Water Meters

Provide statutory and building regulation metering.

Hot Water System

Hot water heater providing hot water to wash hand basins, showers and sinks.

Drainage

Rainwater Goods

All rainwater goods are routed down internal risers.

Rainwater system is designed to Class 4 and to avoid standing water, utilising a conventional system.

System Design

To Local Authority's requirements.

Standards of Materials

Cast iron stacks to basement, uPVC risers and laterals

Manhole Covers

If in building or hard landscaped areas infill tray type covers. Standard metal covers to plant, car park, driving lanes (except forecourt) and soft landscaped areas.

Surface water

All surface water from the roofs and access roads will be discharged into

the services provider's sewerage system via a sump pump.

Electrical Systems

Design Loads

25 watts per square meter tenants' small power requirement to office floors.

Power circuit Locations

Tenants risers per floor terminating at each level in a distribution board serving lighting, fan coil units and future tenant power installations. Lighting and power within each core served from landlord's distribution board.

Underfloor Power Distribution

The building is designed to accommodate a power distribution system to be installed by the tenant, which is flexible, capable of integration with furniture system, and the voice and data cabling systems and shall permit easy and cost effective adjustment of desk layouts.

Wiring + Flexibility

Core areas are fully wired. Small power wiring, outlet boxes and containment for under floor services to office floors to be by the tenant.

Power Outlets

General cleaning points are wall mounted and installed to the cores only.

Three Phase Supply

To plantrooms and available at tenant risers.

Switch Gear Location

Main LV switch panel in LV switchroom adjacent to site sub-station.

Distribution Board Locations

In distribution riser at each floor level.

Earthing Requirements

To the current IEE regulation.

Fire Alarm + Fire Protection System

To current British and European Standards.

Security Systems

Containment to reception desk and

to all external door locations for intruder detection.

CCTV

Buried duct system installed externally for future CCTV installation by tenant.

Lighting

Lighting Levels to All Areas

Lighting to have high frequency control gear. Lighting to office areas to be 400 lux maintained average in open plan, with a uniformity ratio of 0.8 at desk height or the defined task area. Lighting to core and toilet areas to be 150 lux maintained (min). External car parks 10 lux. Lighting levels in plantrooms to be 200 lux.

Type of Light Fittings

Office luminaires to be low brightness recessed 600 x 600 fluorescent fittings suitable for computer office use. (LG7 compliant for speculative offices.) Subject to detail design.

Fittings in core and stair areas are low energy type and/or recessed downlighters.

Special Lighting

Specialist fittings in entrance hall areas. Ceiling down lights and floor uplights.

Emergency Lighting

Local packs to feed light fittings in office and core areas to provide emergency lighting to the Local Authority's standard and British Standards.

Light Switching Flexibility

Office floors are switched via PIR & daylight controlled movement detectors. Staircase and toilet areas are switched by PIR movement detectors.

Lighting Design

Lighting design philosophy:
 –Group lamp change after circa 6000 hours.
 –Luminaires cleaned every two years.
 –Room surfaces cleaned every four years.

An intelligent automatic lighting control system with area controllers, head end etc, is provided.

Meters

Meter Locations

Statutory Authority metering is located

in main LV switchroom adjacent to sub-station.

A provision is allowed for the metering of usage in the Landlord's areas.

Check meters are installed on other services as required, complying with Part L of the Building Regulations.

Sub-metering Facilities

Sub-metering is installed to allow floor by floor and split floor sub-letting.

Telephone and Broadband Capability

As detailed in the M&E specification.

Fire Systems

Smoke Detectors

Installation to BS5839 and local authority requirements.

Fire Alarm System

Installation to BS5839 and local authority requirements.

Disabled Refuge Alarm

A Disabled Refuge alarm is provided to all refuge areas incorporating 2-way speech with a main panel located adjacent the main fire alarm panel in the ground floor reception.

Hand Appliances

By tenant.

Lightning Protection System

Facility + Type

Concealed tape is used as down conductors for the lightning system. (Where earth continuity is not available through structure).

Waste Disposal

Collection of Rubbish

Central refuse store is provided.

Signs

Internal Building Signs

Fire escape requirements and normal toilet signage only stainless steel.

Road Signs

Circulation 'white lining' signage is provided throughout car park area.

Key Suiting

Internal Key Suiting

–Master key for building.
–Sub master for cleaning.
–Sub master for each floor level.

External Works

Forecourt:

Hard Landscape Areas

Modular paving sets with contrasting colour/texture.

Pedestrian Walkways and Kerbs

Are precast paving slabs.

Soft Landscaping

To landscape architects design and ecologists recommendations.

Car Parking Areas

All driving lanes and circulation roads for surface car parking are tarmac finishes. Surface laid to falls to drainage gullies. The covered basement parking area will re-use existing concrete floors.

Car charging Points

2 number car charging points serving 4 number cars are installed in the forecourt.

Lanscaping

The landscape masterplan and supporting design statement illustrate how the detail design has used the existing landscape context to provide a framework for the integration of the new development and how the use of hard landscape form and appropriate planting species, in a range of sizes, have enhanced both the existing landscape structure and the proposed development whilst maintaining the overall landscape context.

For details refer to the 'Pearson Landscape Design' drawings and specifications.

The soft and hard landscaping are in accordance with the landscape consultants' and engineers' details, these works include topsoiling.

Watering point is provided to soft landscaping areas.

Refuse Store

A refuse store and suitable recycling store is provided.

Cycle Store

A BREEAM compliant cycle store is provided.

Cleaning

Access will be provided for a hydraulic access platform for maintenance and window cleaning.

Energy Conservation + Special Requirements

The building and its services were designed to be energy efficient in accordance with the latest Building Regulations which stipulate strict limits on carbon dioxide emissions.

Thermal elements are highly insulated and high performance glazing is employed. The fabric is constructed to minimise air leakage. Environmental conditioning systems are highly efficiency and incorporate the latest energy recovery technology.

The proposed drainage solution for the car park and roads will discharge into services provider's sewerage system via a sump pump.

Sustainability

The building meets BREEAM 'Excellent'. The principle credit-related criteria are as follows (subject to final assessment):

U-Values (W/m²oC)

–Walls: 0.22
–Roof: 0.16
–Windows: 1.22 (average)
–Floor: 0.11

Note: all the insulation used in External walls, Ground floor, Roof achieve an 'A/A+' rating under the Green Guide www.thegreenguide.org.uk.

Windows

–Light transmittance: 0.62
–Solar transmittance: 0.34

HVAC Systems

–Local system: VRF systems, with perimeter and inner control zones
–Specific Fan Power: AHU's 1.8W/(L/s)
–Heat Recovery efficiency: 66%

Lighting Efficiency (office areas) & controls: 2.6W/m²-100 lux with individual lights having daylight dimming & PIR control. Efficient timeswitch / daylight controlled external lighting.

–EPC: Band B (45).
–Building Regulations Part L 2010.
–Lighting Load: less than 12W/m².

Lighting controls: zoned to allow separate user control, and fitted with daylight linking dimming and PIR control.

Water conservation: consumption limited to 1.5-4.4m³ per person per year. Pulsed output mains water meter. Major leak detection. Sanitary supply shut-off.

Lifts: to include stand-by mode; driver controllers for variable speed, voltage and frequency motor control; energy efficient car lighting.

Low Carbon/Renewable energy contribution: at least 20%.

Low carbon and Renewable energy technologies: air source heat pumps (refer to 13.2) plus 240m² PV's, plus solar hot water panels.

Sub-metering: tenanted area metering per floor per riser and between systems i.e. heating cooling and lighting, plus substantial energy use metering for major fans and lifts.

Electric car charging points is provided.

Trend building management/energy usage system is installed.

Cycle provisions: compliant covered cycle storage spaces plus compliant shower/changing & locker.

Timber from sustainable sources: is provided.

Ecology: to meet requirements.

Innovation credits: (subject to BRE confirmation).

Electrical car charging points.

Tenant's Plant

Provision made for future tenants plant at roof level.

Tenant riser to allow routing of tenant services through building.

Misrepresentation Act 1967. Whilst all the information in these particulars is believed to be correct, neither the agent nor their client guarantee its accuracy nor is it intended to form part of any contract. All areas quoted are approximate.