1.5 RESIDUAL HAZARDS & PROVISION FOR SAFE ACCESS

Introduction

All the residual hazards noted below are considered high risk. In all cases the End User is responsible for managing any health and safety risks associated with the hazards. People whose health and safety can be adversely affected by the hazards include members of the workforce and visitors to the facility.

The End User must ensure the following:

1. All members of the workforce must be fully trained, competent, and qualified for all cleaning and maintenance activities on the building. Appropriate reference must have been made to the Building Manuals and all personnel must have received an induction prior to commencing any works on site. The User of the building must ensure written method statements are prepared for specific activities and incorporated into the induction procedure.
2. Undertake risk assessments for activities, as noted above, in accordance with the Management at Work Regulations 1999 (the Management Regs).
    a. Every employer shall make a suitable and sufficient assessment of – the risks to the health and safety of his employees to which they are exposed whilst they are at work; and
    b. the risks to the health and safety of persons not in his employment arising out of or in connection with the conduct by him of his undertaking,
3. Undertake COSHH assessments for activities, as noted above, in accordance with the Control of Substances Hazardous to Health Regulations 2002 (COSHH). End Users should note:

    Using chemicals or other hazardous substances at work can put people's health at risk, so the law requires employers to control exposure to hazardous substances to prevent ill health. They have to protect both employees and others who may be exposed by complying with the Control of Substances Hazardous to Health Regulations 2002 (COSHH) (as amended).

Ensure that you are familiar with the whole of sections 1.3 and 1.8 of this manual prior to any maintenance work being carried out.

1.5.1 Structure and Fabric

Information provided by Burrows Graham the Civil and Structural Engineers

The structure is as described in section 1.3. With access designed by the Architect (UMC).

The cladding system is lightweight cladding/curtain walling and is as designed by the Architect (UMC).

Information provided by Hormann UK Ltd relating to the Industrial Doors

Any residual hazards relating to the doors are highlighted within the information sent in from the Architects and Engineers.

Information provided by Hormann UK Ltd relating to the Windows and Doors

Any residual hazards relating to the doors are highlighted within the information sent in from the Architects.

1.5.2 Building Services

Information provided by WM Building Services Ltd, the Mechanical Services

Mechanical Services

All floors

1. Cleaning of grilles & diffusers
2. Fall from height
3. All step ladders used to be in good condition and prolonged use to be avoided where possible.

Plant Area

1. Removal of AHU & VRF Condensing Units
2. Back injury
3. Specialist contractor to be employed with access equipment & lifting gear to move and lift equipment
4. Skates to be used to move plant from rear of plant deck
5. Specialist crane lifting company to be used to survey site, and provide mobile crane to remove to equipment
6. Ventilation ductwork & pipework etc to be dismantled & removed by competent persons prior to lift.

General

1. Domestic water services
2. Legionella exposure
3. Cleaning & maintenance regime & frequencies to be followed as detailed in operation & maintenance manual
4. Regular checks to be carried out on water temperatures throughout system to ensure a minimum circulation of 55 degree Celsius
5. Ensure hot water secondary pump is properly maintained & out of operation for a minimum period of time only
6. Sterilisation of water services to be carried out annually to move and lift equipment

SECTION 1.5: RESIDUAL HAZARDS & PROVISION FOR SAFE ACCESS

Subcontractor	Activity clement	Significant potential hazards	Population at risk	Design action to be taken to reduce risk
WMBS	Servicing of VRF fan coils.	Fall from height	All	All step ladders used to be in good condition and prolonged use to be avoided where possible. **Notes:** Filters removed from access panels, two ceiling tiles require removal.
WMBS	Cleaning of grilles & diffusers	Fall from height	All	All step ladders used to be in good condition and prolonged use to be avoided where possible.
WMBS	Removal of AHUs	Back injury	Plant decks	Specialist contractor to be employed with access equipment & lifting gear to move and lift equipment. Skates to be used to move plant from rear of plant deck. **Notes:** Specialist lifting company to be used to survey site and provide mobile telescopic forklift/Hiab to remove the equipment. Ventilation ductwork & pipework etc to be dismantled & removed by competent persons prior to lift.
WMBS	Removal of cylinders, pumps, fans, condensers etc	Refrigerant leaks, Electrocution, Back injury.	Plant decks	Specialist contractors only to be used to pump down refrigeration system & confirm safe to work on. Registered electrician to ensure items to be removed are isolated and locked off & marked accordingly. Telescopic crane to be used to move plant from installed location.

Subcontractor	Activity clement	Significant potential hazards	Population at risk	Design action to be taken to reduce risk
				Notes: Specialist crane lifting company to be used to survey site and provide mobile crane/Hiab to remove the equipment. Ventilation ductwork & pipework etc to be dismantled & removed by competent persons prior to lift. Refrigeration engineer on site to degas & decommission system.
WMBS	Domestic water services	Legionella exposure	General	Cleaning & maintenance regime & frequencies to be followed as detailed in operation & maintenance manual. Regular checks to be carried out on water temperatures throughout system to ensure a minimum circulation of 55 degree Celsius. Ensure hot water secondary pump is properly maintained & out of operation for a minimum period of time only. Sterilisation of water services to be carried out annually to move and lift equipment.

SECTION 1.5: RESIDUAL HAZARDS & PROVISION FOR SAFE ACCESS

Information provided by Walter Miles Electrical Engineers Ltd, the Electrical Services

Activity clement	Significant potential hazards	Population at risk	Design action to be taken to reduce risk
Cable tray/basket installation	Falling Injury	Contractors operatives	Operatives advised to use safe and correct working platforms to reflect area being worked in and working height required.
Installation of high level build mounted external lighting.	Lifting Injury	Contractors operatives	Operatives advised to follow lifting regulations & utilise mechanical lifting devices and safe working platforms where necessary. Do not allow persons to work or stand below the access equipment.
Roof Void Services installation	Falling equipment and building components	Contractors operatives	Contractor advised to program works to ensure areas below working spaces are restricted to prevent access by others. Roof void working platforms to be utilised.
Installation of wall supported switchgear	Lifting Injury	Contractors operatives	Operatives advised to follow lifting regulations & utilise mechanical lifting devices to aid in support and lifting of switch panel whilst being secured.
Installation of external lighting column mounted	Lifting Injury/falling injury	Contractors operatives	Operatives advised to follow lifting regulations & utilise mechanical lifting devices when fitting lighting due to possible weight of items. Correct access equipment to be used to gain access to working area. Ensure the ground around the powered access equipment is firm and suitable for the weight of the machine
Testing electrical installation	Electric shocks	Contractors operatives	Only suitably qualified and competent operatives to be used for these activities with the correct test equipment and tooling.
Working near edges	Falling Injury	Maintenance Operatives	Safety rails to be provided near open edges.
Maintenance of Ceiling Void mounted equipment	Falling Injury and tools and equipment falling on occupants below	Maintenance Operatives	Operatives advised to use safe working platforms. The area below the maintenance operations must be sealed off with suitable barriers and warning notices posted

1.5.3 Site Works and Infrastructure

Information provided by Burrows Graham, the Civil and Structural Engineers

N/A

Information provided by WM Building Services Ltd, the Mechanical Services

SITE WIDE

NATURAL GAS INSTALLATION

Within the base build works a new low pressure gas supply has been extended to within the site boundary. From this point the gas supply connects to a new gas meter & governor externally.

From the outlet of the meter steel pipework is extended through the gas meter kiosk floor slab and into the ground where it adapts to MDPE. A low-pressure site wide MDPE main is installed to the building, MDPE pipework is extended to the building entry locations where it adapts to steel below ground rises above ground into the building.

At the Incoming entry the point into the building the gas incoming locations has been fitted with purge valve, additional emergency control valve and de-commissioning valve.

WAREHOUSE

At the entry point to the main office's entry point on gridline B1/3 the gas is fitted with 40mm purge valve, 80mm additional emergency control valve & 40mm purge de-commissioning valve.

The 80mm gas is blanked and valved at low level for future fit out extension.

DOMESTIC MAINS COLD WATER SERVICES

A new blue protectaline water main has been installed to the site from the main road to the site boundary. This main terminates with water meter and isolating valve provided by the water authority on the boundary.

From the outlet of the meter Blue protectaline pipework is installed to all the incoming locations around the building all pipework being laid below 750mm from the finished ground level and surrounded by sand for protection.

At each entry point of entry to the building a stopcock, double check valve and draincock are fitted, a leak detection meter linked to the leak detection panel and pulsed output water meter linked to BMS is provided to the areas detailed below:

The following locations are served from the site wide domestic water main:

- Main Office Riser – Leak detection meter & alarm fitted.

1.5.4 Demolition

Information provided by Burrows Graham, the Civil and Structural Engineers

Record drawings of the structure to be kept to assist future dismantling/demolition. Frame is bolted to aid this process.

POYLE 80, HORTON ROAD

TECHNICAL NOTE

Civil & Structural Design Statement

DOCUMENT CONTROL SHEET

Issued by: Burrows Graham Limited
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Client: Panattoni

Project: Horton Road, Poyle

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Checked By: RM

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C01	02.09.2024	Issued for Health & Safety File

STRUCTURAL ENGINEERING DESIGN STATEMENT FOR HEALTH AND SAFETY FILE

Burrows Graham Ltd were appointed as civil and structural design engineers for a new Industrial development comprising 1no. warehouse building at Factory Lane, Croydon.

Design Philosophy

Steelwork

The structural frame was designed by Severfield on behalf of the main Contractor Winvic, in accordance with BS5950-1.

Imposed roof loading was calculated using BS6399-3.

Wind loads were determined in accordance with BS6399-2.

A loading of 0.25kN/m^2 has been adopted for roof services generally. Specific loads applied by Siphonic drainage pipes are also catered for. An Additional imposed loading of 0.15kN/m2 has been applied to account for PV panels to the roof.

The warehouse superstructure is designed as a two-span portal frame.

Internal valley columns are arranged on a hit/miss basis. Longitudinal frame stability is achieved using wind girders in the plane of the roof structure, located at both ends of the warehouse. The wind girders transfer forces to vertical bracing systems within the side elevations. Portal frame action provides transverse stability.

The offices, are of simple beam and column construction.

Upper Floor Slabs

The upper floor concrete slabs were designed by Severfield and are comprised of 150mm mesh reinforced concrete slabs cast upon profiled metal decking which spans between steel floor beams. The beams are designed to act compositely with the concrete floor construction and the steel beam sizes benefitting from composite action.

The intermediate office floor areas have been designed for dead weight and a general office imposed loading of 4kN/m^2 + 1kN/m^2 for partitions.

Plant areas have been designed for dead weight and an imposed loading of 7.5kN/m^2.

Ground Floor Slabs

The warehouse floor was designed by ABS Brymar. Whilst the core and entrance area floors have been designed by Burrows Graham. All internal slabs are ground bearing concrete slabs reinforced with steel fabric and cast on a continuous polyethylene membrane.

The warehouse floor is designed for the following imposed loads:

50 kN/m^2 or

70 kN racking leg loads (minimum 300mm back to back spacing) or

25 kN/m line load

Design was completed following the recommendations given in Concrete Society Technical Report No. 34 – 4th Edition.

Foundations

Foundations are designed by Burrows Graham to carry the loads from the steel frame.

Stanchion bases are traditional reinforced concrete (grade C32/40 generally) pads and are sized to limit the net bearing pressure under working loads to a maximum of 150kN/m^2 in accordance with the work carried out by Menard to provide ground improvement of the building footprint.

Foundations are designed as a mixture of pinned bases and constrado bases to suit to fire boundary condtions determined by the architect and fire consultant. The Superstructure frame has received Intumescent finishes as part of the fire design strategy.

Precast concrete retaining walls are supported on fabric reinforced concrete strip footings. Refer to specialist Sub-contractor drawings for details of precast walls.

Drainage

Foul water drainage discharges into existing outfalls that connect into a Thames Water owned sewer in Horton Road.

The surface water drainage network consists of gravity pipe system which connect to infiltration/attenuation tanks prior to discharging to the same FW sewer in Horton Road. Agreement for this discharge has been approved with Thames Water and the LLFA.

The surface water from the service yards pass through petrol interceptors prior to entering the soakaways. Interceptors are fitted to surface water drainage systems to protect the environment from pollution by oils. They separate the oil from the water, and then retain the oil safely until it is removed. They are installed to contain oil leaks from vehicles and plant and accidental spillages. The interceptors have been specified in accordance with BS EN 858-1:2002.

Residual Risk Assessment

Any unusual risks associated with the engineering design are recorded on the Final-Construction drawings.

Any proposed future structural alterations should be reviewed by a Structural Engineer prior to commencement of site works. This includes any holes to be formed through ground floor slabs or upper floor slabs/ plant decks.

Demolition Statement

The building structure is a conventional steel portal frame and no special or unusual requirements for future demolition are envisaged.

The demolition contractor should consult the Final Construction steelwork drawings and pay particular attention to the location of bracing systems which should be maintained during demolition to provide stability.

Maintenance Notes

Internal Floor Slabs

Joint sealants should be inspected periodically by the building user. Any damaged sealants should be replaced where necessary.

The upper floor slabs are suspended and cracking may therefore occur due to load induced stresses. In addition, both the upper floor slabs and the ground bearing slabs will potentially crack due to concrete shrinkage. Any cracks up to 0.9mm width should be repaired by an experienced specialist contractor using an appropriate epoxy resin injection system. If any cracks open by more than 0.9mm, a Structural Engineer should be consulted prior to determining an appropriate repair strategy.

The floor should be cleaned regularly to prevent dirt and dust from building up. Operation of mechanical handling equipment on dirty/dusty floors can cause increased wear on the floor.

The floor is treated with a spray-applied curing/sealing/hardening membrane. This surface sealer should be re-applied periodically (approximately 5 year intervals) by a specialist contractor.

External Concrete Pavements

Joint sealants should be inspected periodically by the building user. Any damaged sealants should be replaced where necessary.

Minor local repairs to the concrete pavements may be required periodically. The pavements should be inspected at regular intervals and any repairs required should be carried out by a specialist contractor.

Foul and Surface Water Sewers

In general, sewers, manholes and drainage channels are unlikely to require maintenance other than periodic inspections, unless a blockage occurs. Silt pits are likely to require cleaning out at approximately 12 month intervals. In all instances, inspection and cleaning is to be carried out only by an experienced specialist contractor, following the guidelines given in "Safe Working in Sewers and at Sewage Works", published by National Joint Health and Safety Committee for the Water Services.

Surface Water Interceptors

For maintenance instructions for surface water interceptors refer to the interceptor manufacturer's information. Inspection and cleaning shall be carried out by specialist contractor following guidelines given in the latest edition of "Safe Working in Sewers and at Sewage Works", published by National Joint Health and Safety Committee for the water services.

1.5.5 Access Statement

Information provided by UMC, the Architects

22400-UMC-RP-CR1-Access Statement

PLEASE NOTE THAT THE ROOFLIGHTS SHOULD NOT BE WALKED ON

POYLE 80 ACCESS STATEMENT

PANATTONI 80, HORTON ROAD, POYLE

Document Prepared for:

WINVIC CONSTRUCTION

Report Title - Access Statement
Revision - CR1
Date - 23.08.2024

ACCESS STATEMENT

CONTROL SHEET

CLIENT:	Winvic Construction
PROJECT TITLE:	Poyle 80, Horton Road, Poyle
REPORT TITLE:	Access and Maintenance Statement
PROJECT REFERENCE:	22400
STATUS:	Construction Record

	NAME	DATE
CR1 - PREPARED BY	Lewis King	23.08.2024
CR1 - CHECKED BY	Sam Willis	23.08.2024

	NAME	DATE
CLIENT CHECK		
SIGNED		

ACCESS STATEMENT

CONTENTS

ACCESS STATEMENT

01 BACKGROUND

1.01 BACKGROUND

This Access Statement has been produced to demonstrate the compliance of the unit in accordance with Approved Document Part M2 (2015), Approved Document Part K (2013) and the Equality Act (2010).

This Access Statement is relevant to the scope of works and involvement of the Architectural Appointment and does not cover the process operations or specialist design packages conducted by others.

This document does not deal with specific operational maintenance access requirements.

This statement may not cover detailed design elements that are the sole responsibility of the design sub-contractors.

All works to the building, including fixtures, fittings and finishes, have where possible, been designed in accordance with the current British Standards, Building Regulations, Workplace regulations, CDM Regulations and all other relevant legislation.

02 THE KEY ISSUES OF ACCESS TO AND INTO THE DEVELOPMENT

The key issues of the development and their compliance with Section 1 & 2 of the Building Regulations Approved Document Part M are detailed in the following chapter:

2.01 PEDESTRIAN, VISITOR AND STAFF ACCESS ONTO SITE

Pedestrian access, from the site boundary along Horton Road and onto the site, is provided via the Southern site entrance point by means of a level approach footpath with a gentle sloping gradient where required, whether over its full length or in part, not steeper than 1:20. All pedestrian access footpaths are to be finished with block paved or tarmacadam surfacing with tactile paving to pedestrian crossing points as necessary. Footpaths and designated routes are designed to provide a minimum clear surface width of 1500mm, which is sufficient for pedestrian passing, the clear surface width of footpaths that are combined with cyclist routes are increased accordingly.

Designated visitor accessible parking bays have been provided within the Car Park located adjacent to the main Building entrance, with direct and unhindered access available to the principle building entrance. 1200mm clear access / safety zones, tactile paving and drop kerbs are installed all in accordance with Approved Document Part M Section 1.18 Diagram 2 and guidance within BS 8300.

2.02 GENERAL UNIT ACCESS

The main entry point to the Unit will be via the main reception core, which will have a level approach which removes the need for a stepped threshold of any significant change in level.

The main entry point for office staff and visitors will be via the main reception of the Unit. Any differential in level change, from the external paving falling away from the building, and the barrier matting internally forming the floor finish through the transition into the building, will be accommodated within a level threshold through these main entrance doors. Where unavoidable, the height of any raised thresholds required will be a maximum of 15mm high and otherwise conform to the design guidance set out in Approved Document Part M Section 1.18 Diagram 2

The principal entrance doors are to be manually operated (power assisted). The floors within the principal entrance area are to feature firm and flush entrance matting system leading into a ceramic floor tile with the installation of level threshold strips across the full width of any entrance door.

The clear width of all principle and alternative entrance doors will be a minimum of 800mm to comply with the requirement for approach at right angles to the access route at least 1500mm wide.

The main entrance to the building reception does not currently comply with Part M 1.11 which states 1200mm clear width is needed, due to the constraints and location of car park to the main entrance we currently only achieve 1035mm clear width (between door barrier and retaining wall) as shown in the diagram below.

The 1200mm clear cannot be achieved due to the widening of the car park entrance road to allow for cars to manoeuvre the car park safely when entering and leaving.

ACCESS STATEMENT

02 THE KEY ISSUES OF ACCESS TO AND INTO THE DEVELOPMENT

To maximise the clear width of the entrance we have moved the handrail from being fixed on the entrance surface giving a figure of 908mm, which will now be fixed on the retaining wall giving an overall width of 1035mm clear.

Whilst at Ground Floor level, full height curtain walling is present, all cill heights to First Floor windows have been positioned above 800mm with all opening windows fitted with restrictors to prevent the possibility of falling out.

Any glazing present below 800mm, is toughened in accordance with UK Building Regulations AD K, BS EN 12600 and BS 6206.

Fire escape personnel doors will have a level approach which removes the need for a stepped threshold of any significant change in level.

Access to the first-floor level, is either via open stair or personnel lift located in the main reception area of the Unit.

The first floor, whilst initially delivered as a single, open plan room, has been constructed with the flexibility to also be internally subdivided; again, dependent on the occupational status and use requirements of the building tenant.

It will be the End User/Tenant's responsibility to ensure that any internal subdivision, construction of partitioning and adjusted routes to/locations of final means of escape will need to be reviewed and agreed with Building Control prior to implementation.

03 HORIZONTAL AND VERTICAL CIRCULATION WITHIN THE UNIT

Compliance with Section 3 of the Building Regulations Approved Document Part M is detailed in the following chapter:

3.01 INTERNAL DOORS

Where opened manually an opening force at the leading edge of the door is not more than 30N (for the first 30° of opening) and 22.5N (for the remainder of the swing).

All circulation or primary doors will have a minimum clear opening of 800mm as identified within Table 2 and Diagram 9 of Building Regulations Section 2. Internal doors are to be provided generally with adequate unobstructed space to the pull side and easily operable, visually contrasting door furniture.

Door furniture will contrast visually with the background surface colour of the door leaf and be of either lever type, at 1000mm above floor level, or pull handles commencing at 1000mm above floor level.

Doors in corridors will be fitted with vision panels towards the leading edge of the door with the minimum zones of visibility between 500mm and 1500mm above floor level.

Internal doors are to be visually contrasting with the surrounding wall.

The design and installation of manifestation to internal/curtain wall glazing is to meet the guidance given within Approved Document K2.5 Diagram 7.2 although the site End User is to manage any additional branding aspirations that could see more extensive graphics applied to large, uninterrupted areas of glazing identified within the AD as requiring of manifestation.

3.02 CORRIDORS

Internal corridors have a level or predominantly level floor with an unobstructed minimum width along their length of 1200mm at any given pinch point and where less than 1800mm passing places are provided at reasonable intervals to allow wheelchair users to pass each other.

All floor finishes are to be of a non-slip type with carpets being of a shallow dense pile allowing easy passage for wheelchairs users.

3.03 VERTICAL CIRCULATION

A single 8 person lift / 630kg capacity lift is to be situated within the main circulation core, adjacent to the primary circulation stairwell, which meets the requirements of Approved Document Part M: Access to and Use of Building Section 3 paragraph 3.34 with an unobstructed manoeuvring space of 1500mm x 1500mm in front of the lift. A disabled refuge space has been provided, within both the main circulation stair core as well as the wing egress stair route, with a 2-way communication link to the fire panel located within the central circulation core at Ground Floor level.

All internal stairs are designed and dimensioned to allow for users who are ambulant disabled or have visual

03 HORIZONTAL AND VERTICAL CIRCULATION WITHIN THE UNIT

impairment as detailed within Building Regulations Approved Document Part K – Section 1 and therefore incorporate a maximum 12 risers per flight to suit the floor-to-floor level. The rise of each step is between 150mm and 170mm with a minimum going of at least 250mm. Colour contrasting nosing's, a minimum of 55mm deep and spanning the full width of the stair flight, are applied to both the tread and the riser of each stair.

The handrail to the main staircase is of stainless-steel construction, contrasting with the surrounding surface colours. All wing stair handrails will be of a ball and post safety handrail type, painted black, to ensure the same. On stairs the handrail has been provided to a height of 900mm with all level exposed edges. Any minimum changes in levels of 600mm have been enclosed with an 1100mm high handrail.

3.04 FINISHES

All floor finishes are to be of a non-slip type with carpets being of a shallow dense pile permitting easy passage for wheelchairs users.

Wall coverings and paint finishes are to be suitably contrasting with the joinery of the doors and low surrounds. Where wall tiles are used these are to have a satin finish to reduce glare.

Polyester powder coated accessible grab rails will be provided to the wheelchair accessible WC, shower and within ambulant accessible cubicles with the surface finish providing enough visual contrast against the background finishes to meet the requirements of Building Regulations Section 5.4 (k).

3.05 ROOF ACCESS

Maintenance and cleaning access to the roof is to be via means of companion ladder one located in the fire escape core and other located in the plantroom. Where cleaning of roof lights is intended the use of extendable cleaning poles are to be used.

It is recommended that a permit to work system is used to control roof access.

3.06 SYPHONIC MAINTENANCE

Internal symphonic maintenance is to be via means of companion ladder one located in the fire escape core and other located in the plantroom. It is recommended that a permit to work system is used to control roof access

3.07 MEANS OF ESCAPE

The needs of individual members of staff will be assessed using Personal Emergency Egress Plans and management arrangements introduced as necessary following appropriate risk assessments.

Under a fire scenario, within either the first-floor office or warehouse area, the use of intelligent illuminated fire signage directs occupants to a place of safety; either by means of the permanent stairs leading to ground level from the first-floor, or directly from that ground level to a final means of escape through the numerous personnel doors located within the external building fabric.

ACCESS STATEMENT

03 HORIZONTAL AND VERTICAL CIRCULATION WITHIN THE UNIT

Given a fire scenario within the First-Floor office, requiring the evacuation of that compartment, then the main stair core and wing stair are intended as protected routes by which to carry merging flows of staff to a point of final exit at Ground Floor level.

Whilst access control has been included for on those doors leading from the open plan office areas, into the wing stair located at one end of the building, it falls within the End User building management plan to ensure that use of these stairs is only for means of egress under a fire scenario, and that these routes are not to be used for general vertical circulation through the building under normal operating conditions.

Given a fire scenario within the Second floor plant room, requiring the evacuation of that compartment, then the second means of escape is a CAT ladder located in the corner of the compartment behind a 60min fire rated door is to be used to gain access to the first floor office compartment and into either the fire escape core or main core intended as protected routes by which to carry merging flows of staff to a point of final exit at Ground Floor level.

This approach is in line with the UMC prepared Fire Strategy and in accordance with Clarke Banks fire report,
It will be the End User/Tenant's responsibility to ensure that any alterations to the fire strategy, layout, method of escape is agreed with the fire officer and Building Control prior to implementation of any changes.

04 FACILITIES WITHIN THE UNIT

Compliance with Section 4 of the Building Regulations Approved Document Part M is detailed in the following chapter:

4.01 REFRESHMENT FACILITIES

The occupier will be required to assess the individual needs of each employee by undertaking a workplace needs assessment. Should adaptations to existing facilities be required they will need to be provided in accordance with the guidance provisions noted under Building Regulations Section 4.16 and Diagram 16.

4.02 SWITCHES, OUTLETS AND CONTROLS

Switches, outlets and controls have been located in accordance with the provisions stated within Building Regulations Section 4.30.

Pull cords for emergency alarm systems are coloured red and installed in accordance with the provisions stated within Building Regulations Section 4.30, Diagram's 19 and where appropriate Diagram 24 within Building Regulations Section 5.10.

05 SANITARY ACCOMMODATION WITHIN THE UNIT

Compliance with Section 5 of the Building Regulations Approved Document Part M is detailed in the following chapter: Sanitary accommodation generally is provided in accordance with the provisions noted within Building Regulations Section 5.4 and 5.7.

5.01 WHEELCHAIR ACCESSIBLE UNISEX TOILETS AND SHOWER FACILITIES

A fully accessible unisex toilet and shower facility has been located as close as possible to the main entrance of the offices and in a way that doesn't compromise the privacy of users. The minimum overall dimensions and design of this space is observant to the design guidance outlined within Diagram 24 within Building Regulation Section 5.18 which includes the provision of accessible shower facilities. The arrangement of shower controls and ancillary fittings accord with Diagram 23 within Building Regulations Section 5.18. Wheelchair accessible facilities have been provided in accordance with the provisions noted under Section 5.10 and 5.18.

Further fully accessible unisex toilet is available on the First floor of the offices, located on accessible routes which are direct and obstruction free and ensure that wheelchair users do not have to travel a distance more than 40m on the same floor to access such facilities. Doors are outward opening and fitted with a horizontal closing bar fixed to the inside face.

The fully accessible unisex toilet and shower facilities are generally designed, dimensioned, and fitted out in accordance with the guidance principles of Diagram 18, 19 and where appropriate Diagram 20 within Building Regulations Section 5.10, taking the provision of the full Doc M package of assisted furniture as the critical intention.

Shower controls installed at 1200mm above floor level, which although in excess of the design guidance offered by AD M, falls within the range of movement required for a detachable shower head and is therefore considered as appropriate for operation by users of these spaces.

5.02 TOILETS IN SEPARATE SEX WASHROOMS

Whilst the Accessible WC provision within the Unit is designed to operate as a unisex facility, ambulant disabled users also have the opportunity to use the standard separate sex toilet facilities provided throughout the main offices which are generally designed, dimensioned and fitted out in accordance with Diagram 21 and the provisions noted within Building Regulations Section 5.14.

Doors to compartments for ambulant disabled persons are outward opening and fitted with a horizontal closing bar to the inside face. The swing of inward opening doors to standard WC compartments is such that a 450mm diameter manoeuvring space is maintained between the swing of the door, the WC pan and the side of the compartment. All WC compartment doors are capable of being opened if a person has collapsed against them while inside.

The WC pan within compartments for ambulant disabled persons conforms to the key dimensions within BS EN 997:2012 and can therefore accommodate the use of a variable height toilet seat riser.

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1.5.6 Any Hazards Associated with Materials Used

GENERAL

THE HAZARDOUS WASTE (ENGLAND & WALES) REGULATIONS 2005, AS AMENDED

If the premises produces 500kg or more of hazardous waste each year it must register with the Environment Agency. Registration is annual so every 12 months the premises must renew its registration if it expects to produce that amount of hazardous waste.

Examples of the wastes now classified as hazardous include:

- Fluorescent tubes and Energy Saving Lamps (compact fluorescents)
- Sodium & Mercury Lamps
- Televisions/Computer Monitors/Laptops
- Batteries

The Environment Agency provides a 'Guidance for Small Business – HWR01A' which details the assessment procedure for determining special waste and disposal procedures, and information on relevant legislation.

THE WASTE ELECTRICAL & ELECTRONIC EQUIPMENT (WEEE) REGULATIONS 2013

The Waste Electrical & Electronic Equipment (WEEE) Regulations aim to reduce the environmental impacts of electrical and electronic equipment (EEE) when it reaches the end of its life.

If equipment was bought after 13 August 2005, the waste is known as 'non-historic WEE'. A bar underneath the crossed-out wheeled bin symbol indicates that the WEEE is non-historic. The EEE producer is responsible for financing the treatment, reprocessing and disposal of the equipment unless both parties agree to an alternative arrangement. If the premises agrees with a producer to make its own arrangements to deal with WEEE, the premises must make sure it is treated, recycled, recovered and disposed of correctly. If the premises rents or leases EEE, the organisation that provides the equipment will normally be responsible for disposing of it.

When new EEE is purchased, the WEEE registration number of the equipment producer should be kept. This is then used to contact the producer when the premises needs to dispose of the products. The producer's compliance scheme is responsible for the WEEE. The original producer can provide the information on the take-back system available. The EEE suppliers and retailers can dispose of business WEEE, but they may charge for this service.

The following items should be noted:

Chemical Water Treatment

Chemical treatment to the water systems has been provided. Reference to the relevant COSHH data sheets (contained in the building Health & Safety File) should be made before commencing any work on treated systems. When draining down treated systems, the water/chemical mix should never be disposed of by tipping away into drains etc. Under the Environmental Protection Act 1990, all water treatment chemical waste must only be transferred to someone authorised to carry or manage waste – known as an authorised person. Authorised persons include:

- Registered or exempt waste carriers – these must be registered with the Environmental Agency as a waste carrier under the Controlled Waste (Registration of Carriers and Seizure of Vehicles) Regulations 1991.
- Local Authorities – the Local Authority may or may not have facilities for waste chemical disposal. Please contact the Local Authority for further details.
- Licensed waste managers – these must have a Waste Management License. Failure to comply with this requirement can result in a fine and/or imprisonment.

Batteries

Many batteries are now categorised as hazardous waste and must not be disposed of in the general waste skips and bins. These include lead-acid, Ni-Cd batteries and batteries containing mercury. Spent batteries must either be returned to the stockist, handed in separately at a Local Authority Amenity Site or taken to a licensed 'spent battery' dealer.

Capacitors

Capacitors for power factor correction may be of two types:

Dry Film, using metallised polypropylene film. These contain no materials likely to be of harm to the environment.

Impregnated Type, using paper as a dielectric, and having chlorinated diphenol impregnate (i.e. Aroclor). Chlorinated diphenols constitute a serious environmental hazard and special precautions must be taken when disposing of capacitors in which this substance is to be used. The law required that only officially approved plant may be employed. Disposal by any other method is a punishable offence.

Lighting Products

WARNING: lamp disposal can damage your health & should comply with COSHH regulations. fluorescent tubes contain mercury, cadmium & lead, all recognised as very toxic metals. They can be very harmful to health, even in small quantities that can hardly be measured. They also easily & rapidly pollute water courses & the environment in general unless disposed of correctly.

Hazardous substances can be released when some lamp types are broken, the following general recommendations are made for dealing with broken lamps.

Lamps and control gear heat up when they operate and can become too hot to touch. Switch off and allow time to cool down.

Contact your local authority to determine how and where fluorescent tubes and batteries can be disposed of carefully, safely and within the COSHH Regulations. Fluorescent or sodium lighting is now considered a producer of hazardous waste and must be disposed of by a specialist company.

Accidental Breakage of a Lamp

In the event of an accidental breakage of a lamp, normal good housekeeping is required; care being necessary to prevent injury from broken glass. For fluorescent lamps the generation and inhalation of airborne dust should be avoided, when cleaning up for low-pressure sodium lamps avoid skin and eye contamination with debris and prevent exposure to moisture.

Prevent rain, snow, water or moisture coming into contact with lamps as this may cause the lamp to shatter. Quartz jacketed lamps (e.g. tungsten halogen, MBIL, SON-TD) touched by bare hands may shatter in service. If touched, wipe the lamp with a clean cloth soaked in surgical or methylated spirit. Lamps sometimes shatter on failure, therefore, ensure that luminaire enclosures are always in place and in good order.

Controlled Lamp Breakage

When lamps have been removed from service the principal physical hazard is broken glass. Placing them in the packaging provided with the new lamps is one way of protecting them from accidental breakage or scratching, which could lead to glass fracture and possible flying fragments.

Crushing of lamps is considered by the Environmental Agency to be a waste management activity and will require the appropriate permit and compliance with the pertinent health and safety legislation.

Fire Risk

There is sufficient sodium in Low Pressure Sodium (SOX) lamps to burst into flames when the sodium comes into contact with water. Also, the lamps are easily shattered and can expose the sodium unintentionally.

The ballasts in fluorescent luminaires with faulty starter switches or failed lamps can run very hot. Disconnect any faulty luminaires immediately and follow up with corrective action.

Ensure that the wattage of all replacement lamps does not exceed that of the lamps first installed under this contract (to prevent over heating of the luminaires and overloading of the associated electrical circuits).

Ultra-Violet Radiation

Mercury and metal halide lamps emit UV radiation; special glass is used in enclosed luminaires and the lamp envelope to shield the UV radiation. The radiation level increases if the lamp glass envelope is punctured. Any such lamps must not be operated and must be replaced immediately. Any luminaires with damaged or broken glass enclosures must be immediately taken out of service and the glass replaced (with glass of the correct type).

Information provided by UMC, the Architect

No hazardous materials have been specified for the project

If any contaminated materials have been found, please refer to the site team for what and where this was capped/sealed or removed from site.

Information provided by Burrows Graham, the Civil and Structural Engineers

No deleterious materials have been specified by Burrows Graham.

Standard procedures should be followed during construction in respect to concrete/paints etc and any materials that may cause harm.

Intumescent Paint Recommendation.

Note to any future contractor to alert to the presence of intumescent paint on columns, beams and bracing (as indicated on UMC's drawing); should this be damaged or hit then it could become detached leaving a bare section of steel at risk in a fire. In these circumstances the repairing of the coating is essential to maintain fire integrity.