# 7.0 Underground Drainage:

# 7.1

It is believed that all existing pipes are 100mm diameter. These are to be checked by contractor for soundness where they are to be used in the new scheme. All inverts are to be taken by the contractor prior to starting the works and this information given to architect. It is our understanding the the existing foul sewer and manhole are located under the existing, extended kitchen, but access has not been given. Drainage layout and inverts therefore needs to be checked prior to the works being completed. Any discrepancies or problems with the layout as indicated here, to be brought to the attention of the Architect as soon as they are known.

Where existing drains are to become redundant they are either to be fully removed or to have concrete fill at both ends to prevent the possible passage of vermin.

All new underground drainage to be 100mm diameter laid to falls of 1:40, unless otherwise stated on the drawings. Drainage must be vitrified clay designed for this purpose. Contractor to ensure drains are clear and fully functional at the end of the construction period, free from any builders rubble or debris.

All new drainage to comply fully with part H of the Building Regulations and to be installed to the full approval of the Building Control Officer on site.

All pipes are to be laid and jointed in accordance with the manufacturers instructions and details. Bedding to, and surrounding pipes to be as detailed for particular depths of pipes. Where pipes pass through walls or foundations form a installed opening which allows a minimum of 50mm clear space all round pipe. Hole around pipe to be covered by rigid sheet material to local authority approval to prevent fill and vermin from entering any void.

Any new drain that is less than 450mm to top of pipe under soft landscaping or less than 600mm under drives or hard landscape areas to have 600x500x50mm paving slabs over, set a minimum of 100mm above top of pipe.

## 7.6

New rainwater pipes, stub stacks and soil & vent pipes are to be connected to underground drainage using proprietary neoprene adaptors. Stub stacks and soil & vent pipes to be 100mm UPVC to BS.5414 as produced by osma. All to have rodding eye positions to enable drains to be cleared if required. Provide access panels to rodding eye positions. Rainwater Pipes are generally to be black UPVC where exposed on the outside of the building, with RWP's being a minimum of 80mm diameter.

to existing system as shown. Surface water at this stage to flow to 2 new 2.75m3 soakaways in the rear gardens or join to the SUDS system under the driveway if designed to accommodate this additional capacity. Gully's, channel drains and rwp's to have rodding access points in all instances.

detailed here, built using 150mm concrete base, 215mm engineering brick walls with flush pointing, 100mm top concrete slab reinforced with a142 mesh, to reduce opening to suit frame and lid. Frame and lid to be set on engineering bricks as shown. All manholes to be 1200x750mm, with step irons set into brickwork at 300mm centres. All manholes in hard surfaces and those that will be internal to have inset type lids and have particular finish laid in. Internal manhole covers are also to have double seal and have mechanical fixing.





# Scale Bar



1.1

Throughout the works the contractor must maintain the drainage from the surrounding properties in full working order, with any disruption kept to a minimum.

# 7.10

7.9

Contractor to assist client obtain the required build-over permissions from the Water Authority for the rear sewer, if not already completed. In line with the normal practice for these type of agreements, remove existing manhole and connect all new drains with easy bends as shown. Build new external rodding eye position at head of run so that the whole system can be rodded from this location. As stated above, provide rodding access at the base of all new soil pipes / stub stacks to assist with any future blockages.

## 7.11

The drainage runs shown here are indicative as we have not been able to lift the manholes to check connections and depths. Contractor to provide detailed information on drainage system once appointed to enable final drawings to be prepared. The layout assumes combined drain to the rear and Rainwater to the front.

Contractor to adjust railings and entrance landing to suit new staircase leading down to the Lower Ground Floor. This stair is to be installed to provide a secondary means of escape from the Lower Ground floor as the upper floor is designed as open plan living.



# 1.2

1.3

1.4

1.5

1.6

prior to the work commencing. 2.0 External walls: 2.1 All new external walls are to be constructed using cavity walls. The new walls are to be 102mm facing brick outer leaf, colour to match the existing building (as specified by Architect elsewhere) Form 150mm cavity, and form inner leaf using 100mm Thermalite turbo insulating blocks. The cavity is to

# 1.0 Sub-structure:

New foundations are to be in accordance with the foundation described on the engineers information and sketches (if contact the Architect.

otherwise stated here or on the engineers information. site following excavations. Generally foundations under external walls to be 600mm wide, whilst those under internal are to be 450mm.

Where drains pass through foundations form opening either with larger pipe or with polystyrene blocks and provide lintels over. There is to be movement allowed between the main drain and the foundation / sub-structure wall.

Where new foundations join to existing contractor to include for 300mm toe under existing if substantially higher than those being poured for the extensions.

New foundations to work with existing and have doweled connection if required by engineer, or have the existing underpinned if specified by the engineer where new and existing walls are to be continuous.

Please note permissions must be gained from neighbours to build as indicated, particularly on 284 side as wall appears to be on party wall / central line for existing extension being replaced. Great care must be taken to not affect the finishes within the adjoining gardens and contractor to take all necessary precautions, or agree to lift and replace any finishes

Contractor to build-in movement joints into wall 6.0m and maximum lengths of brickwork to be 12.0m. plan below. Note that some elements may differ to that Joints in cavity wall construction must not be in line, with minimum offset of 450mm. Plans indicate provided), and should clarification be required, contractor to provisional positions for joints. Use Grace Aerofil 1 low 2.6 density, compressible, closed cell polyethylene filler for Use Ryton Rytweep weepholes at 900mm centres over the joint, installed in accordance with the manufacturers instruction. Outer waterproofing of joint to be through New foundations to be trench fill mass concrete type, to a using Grace Vertiseal two part cold applied minimum depth of 1000mm below ground level, unless polysulphide sealant as recommended by the manufacturer. Colour to be agreed. Use Ancon PPS, 2.7 Depths may vary if required by the building control officer on 225mm wall tie with debonding sleeve on one side at Build in all windows and doors as works progress. Types 450mm centres vertically.

2.3

2.4 Contractor to use Ancon ST1 Wall Tie Type 1 Tie to PD 6697 (Masonry Heavy Duty). The section that spans the cavity has a series of holes to provide water drips. This allows the same tie to be used in insulated cavities as well as open cavities. Use the 275mm long tie which is suitable for 126-150mm cavities (130mm here).

2.5 Contractor to use steel lintels from IG Lintels or as constructions with maximum lengths of blockwork to be directed by the Structural Engineer for each location. Each will vary due to size of opening and load over. Dress dpc / cavity tray over all lintels in cavity walls.

lintels, cavity trays and dpcs where linked to trays. Colour to be agreed and to have 10x10mm outlet and not a full perp.

to comply with Building Regs and necessary U-Values for specified. To include all necessary vapour checks and dpcs to prevent ingress of water and to ensure air leakage for the new dwelling complies with the current Building Regulations. Works to include the replacement windows and Lower Ground floor to the front of the apartment as well as the altered and new openings to the rear. Include a replacement window for that serving the staircase within the apartment.



Front Elevation from Street

# Section BB

# Flat 1, 286 Grays Inn Road, London, WC1X 8EB

# **Proposed Works**

Working Drawing

### Internal Walls: 3.0

## 31 Generally use 70mm steel studwork walls where shown. Studs to be at max. 400mm centres. To have 70mm Rockwool sound deadening quilt between studs as shown. Either side of wall, clad with 12mm WBP plywood and 12.5mm wall board (moisture resistant on any 'wet' room side) and 2.5mm skim coat Thistle Multi Finish. Where wall is to be tiled, the skim coat will not be required. (Note contractor may use timber studs if preferred, but to note this may affect the setting out

dimensions, assuming 75x50mm studs being used).

The party wall of the main living space and kitchen on the upper floor level is to have brick slips applied in accordance with the manufacturers instructions, with mortar pointing. For the purposes of the tender the contractor to use Wienerberger Con Mossa as supplied by Taylor Maxwell, but final choice will be made by Client prior to works starting on site. Pointing and bricks to look aged and 'industrial' when finished as elsewhere specified.



# 3.3

The new Hall to the front door is to be formed using Optima Technishield 54 fire screen with their 30/30 4.1 glass to provide a 30 minute fire and smoke resisting enclosure. The door is to use their Microflush frame with timber door, which is to have a maximum height of 2350mm to comply with the fire certificate. All to be installed structly in accordance with the manufacturers instructions.

Door to be self closing with factory fitted closer, but held open in general use via an electromagnetic device that releases the door when the smoke, heat or fire alarms are sounded, to protect the communal escape route.

Magnetic blackboard to be fixed to door as illustrated **4.3** and strictly inaccordance with the door manufacturers instructions to prevent any reduction the the fire performance of the door.







### 4.0 Joinery and Fit Out items

All internal doors are to be solid core, finish to be agreed with client. Doors to habitable rooms and leading to stairs or hall are to be 30/30 fire doors.

4.2

All new rooms are to be finished with 89x15mm skirtings with small pencil round edge. Door architraves are to be 15x44mm with the same profile. Exceptions will be in wet rooms where floors are tiled or have polished cement as these should have a tiled skirting or nothing. Window boards generally to be 22mm softwood, but to be tiled in bathrooms. Rooms affected by the works are to have all joinery items to match existing, with adjustments made to existing where required.

Built in wardrobes to Bedroom 02 are to be built either side and over the bed as shown here. These can be bespoke white units or the clients may use off the shelf units such as produced by Ikea. Final solution to be agreed with client, but allow for two standing wardrobes, linked over the bed with high level cupboards. If possible to be fitted floor to ceiling with hat and shoe shelf plus hanging rail in one wardrobe and half hanging with fitted drawers in the other.

Build ducting and false walls as shown on the plans, mainly in Bathrooms. In Bathrooms, ducts to be finished to match walls. Tops on half height ducts to be tiled. Allow for access to WC cisterns and rodding points etc.

All bathroom appliances / sanitaryware to be installed in accordance with the manufacturers instructions. Choice of items all as agreed with client, or as elsewhere specified.

Build in kitchens and appliances in accordance with the manufacturers instructions. Choice of items and final kitchen designs are to be as agreed with client.

# 4.7

Adjust timber stairs as detailed on the plans here and in the more detailed information on the detailed information. Stairs to comply with the building regulations and to be formed in softwood including all necessary guarding, handrails and structure. Note that most of guarding formed with shelving / furniture.

### Miscellaneous Specification items 5.0

# 5.1

At flush threshold of front and rear doors, build in 75x75mm steel angle painted in 3 coats of RIW. Dress the DPM and build in additional DPC between angle and internal screed. Build paving or tiled finish up to other side of angle as drawn. For door to Bedroom 02, build in Cambridge Sealmaster flush threshold strip, with the door component, type to suit final choice of door. For rear Bi-Fold doors build in low threshold option all as detailed.

# 5.2

Contractor to adjust the existing entrance platform and form a new metal stair down to the Lower Ground Floor to provide a safe means of escape from the lower floor should there be a fire at the upper ground floor. This is to be constructed to match the style and detailing of the metal railings as far as is possible.

# 5.4

The under pavement stores are to be upgraded to provide the threshold as shown elsewhere, new weather sealed doors (with shielded ventilation) and a complete tanking to all surfaces. As discussed in demolitions, these are old coal bunkers, originally with access from the pavement above. Contractor to agree with tanking company how to seal this hole, prior to tanking being applied.

Contractor to apply Sika - 1 to render and new floor screed in accordance with the manufacturers instructions and install as directed by them, including all preparation of the surfaces. Waterproofing to be continuous between all surfaces and reinforced at junctions / corners in accordance with the manufacturers instructions. To be applied by specialist if required as a minimum 15 year guarantee is required for finished product.

### 6.0 Roof / Terrace

# 6.1

Flat roof area to be formed using Striate warm roof system as produced by Kepler Systems. Main roof to be formed using Kemperol V210 Liquid Waterproofing membrane with Resin Saturated Fleece laid using their wet-on-wet process, strictly in accordance with the manufacturers instructions. Kemperol laid on Kempertherm-T Tapered Insulation with 1:80 falls towards roof outlets. Min depth of Kempertherm to be 60mm. System to include Kempersheild Vapour Barrier and Kempersheild Primer painted onto plywood deck.

Gutter behind parapet to be formed using Kempertherm\_T insulation laid at 1:120 falls towards hopper outlets - min depth 25mm.

# 6.2

Flat roof to be formed using 220x63mm C3 joists at max 400mm centres spanning across the new extension, in line with the proposed new roof light to the Lower Ground Floor. To have 22mm WBP Plywood decking on top to form decking, with all voids between joists filled with Kooltherm insulation to form Warm Roof. Fix Tyvec Vapour check to the underside of the joists and fix 12.5mm plasterboard with skim coat finish.

# 6.3

New terrace to be formed using non slip hardwood decking boards, fixed in accordance with the manufacturer's instructions to impregnated softwood joists at max 400mm c/c. Joist supported on adjustable feet laid on roof finish, spaced to suit joist size used. Decking to receive stained finish, to match screen & handrail

