

PROPOSED MARKET HALL REFURBISHMENT & ALTERATIONS

AT: KNUTSFORD MARKET HALL, SILK MILL STREET, KNUTSFORD, WA16 6DF.

TO BE READ IN CONJUNCTION WITH

DRAWINGS & ENGINEERS INFO

REVISION A: 30/07/2024

NOTES AND SPECIFICATIONS

A. GENERAL

1. Specification and notes to be read in conjunction with all drawings. Do not scale from drawings, the contractor and his subcontractors are to verify all dimensions levels, roof slopes, door and window sizes on site and work from local authority approved plans only before making workshop drawings, commencing manufacture of bespoke items and steel beams or putting work in hand.
2. The contractor is to bring to the attention of the Architect any discrepancies in the drawings prior to work commencement. Both Client and builder are to study and understand the contents of all drawings, notes, specifications and approvals before commencement of work. Should there be any conditions in the approvals it is imperative that the contractor and owner satisfies and responds to all conditions to the approval of the local authority especially in respect of presentation of samples of bricks, roof materials etc to the planning department. Planning approval notice and conditions are available and should be read and adhered to.
3. Building inspector to be contacted by builder at all relevant stages of work.
4. Site access to be kept clear at all times, and obstruction to be kept to a minimum.
5. **Contractor should adhere to the dust management plan and demolition/site management plans. Any variations required to these must be agreed with the LA.**
6. Existing external surfaces and finishes i.e. existing pavements / road access to be protected by builder and the site must be left clean and tidy and made good on completion.
7. All work to be carried out in accordance with the requirements of the relevant statutory authorities, regulations and BS 8000 "Code of Practice for Workmanship on Building Sites."
8. All work + materials to be in accordance with the current Building Regulations and to the satisfaction of the building inspector including both demolition and new build.
9. Dimensions are in metric & imperial and should all be checked on site prior to ordering materials. All materials to be used in accordance with manufacturer's instructions.
10. An R&D Asbestos Survey will be undertaken on the property and all identified asbestos removed prior to project commencement in preparation of the works. A copy of a letter relating to an historic survey is included as part of the pack for review by the Contractor, see PCI info within CDM pack. Asbestos was not located within the property at that point however some areas were not accessed and in any case it is out of date. All works regarding asbestos is to be undertaken by a suitably qualified and licensed asbestos contractor.

11. Provision of samples of any facing or roofing materials are to be coordinated with the Client and Architect for submission to the Local Planning Authority for approval.
12. Note: A pre-completion air test should be undertaken and remedial work undertaken if the permeability does not meet the target. Contractor to include cost of this.
13. **IMPORTANT NOTE: Builder is to be appointed as *Principal Contractor* as defined and as required under CDM 2015 and under the Building Safety Act. Contractor is to plan and act accordingly meeting all required provisions of legislation. The role of *Principal Designer* as defined and as required under CDM 2015 and BSA is to be Hive Architects.**

B. SITE PREPARATION

1. Existing fences and gates to be maintained where possible during construction.
2. All debris to be removed and all unsuitable material carted off site.
3. Where redundant existing foundation positions conflict with new ones or new drains and service trenches, they should be removed and carted off site.
4. Completely remove any trees, vegetation and roots within the construction boundary that do not have Tree Preservation Orders placed upon them.
5. Combined sewer, 3 phase electric, telephone and water connections exist on site. We understand there is no gas connection. Contractor to include for temporary disconnection & reconnection/relocation of water, electric and comms to new location in ground floor store room as required.
6. Main contractor to make provision for the protection of underground services.
7. Excavation works to be in strict accordance with Structural Engineers pack and recommendations.
8. Note to Contractor: The Client expects to vacate the site for all of the works,
9. Note to Client & Contractor: All works are to only be undertaken in full accordance with The Party Wall etc. Act 1996

C. FOUNDATIONS

Attention is drawn to the presence of basement area under front of existing building and also to the adjacent building.

1. Proposed foundations to Structural Engineer's design and specification and to BCO's approval.
2. The Architect is not responsible for sizing appropriate foundations or assessing the existing foundations for any additional loading. The following are general notes in addition to engineers' information and any instruction by engineer or Building Inspector in regard to the following will override the following notes from the Architect.
3. Excavate for foundation trenches, backfill and compact for internal + external wall footing, all to be checked by building inspector before casting concrete, or adding more load to existing footings, and in accordance with British Standard CP 2004:1972.
4. Excavations for foundation to be as directed by Structural Engineers and Building Inspector.
5. Concrete foundations as engineers specification.
6. Foundation and sub-wall to be lintelled over drains as per Structural Engineer's design and to BCO's approval.
7. All concrete work is to be in accordance with BS 8110 "Structural Use of Concrete."
8. It will be the responsibility of the Main Contractor to report any condition on site during excavation which may adversely affect the design. I.e. existing drains, pits, unsuitable founding conditions, damaged services etc. Drawings have been based on limited information and care should be taken to check for any variations upon opening up.
9. Block work in foundations below ground level to be standard dense concrete masonry units and cavity in filled with concrete where applicable all as per sections.

10. Foundations in proximity to existing building and any nearby structures to be strictly to engineer's design and process to avoid undermining.

D. EXTERNAL WALLS: NEW FRONT WALL

1. Walls to be carefully removed to below ground level and re-built as indicated on drawings maintaining structural integrity to the remaining and adjoining buildings providing any necessary temporary works to ensure lateral stability to existing constructions in line with Structural Engineers spec and advice. Note sections of retained roof slab require temporary propping.
Existing bricks suitable for re-use in construction in raising side and rear walls to be retained and cleaned up in preparation.
2. New external wall to be built from 'Special Blend 1507' from Imperial Bricks Ltd. Note bricks are imperial height brick, coursing to tie in with existing adjoining facing brick outer leaf. Inner leaf 100mm thick Airtec Seven aerated concrete block from Thomas Armstrong with a crushing strength of 7N/mm sq to meet Engineer's spec. Overall cavity depth of 150mm.
150mm Full Fill Knauf DriTherm® Cavity Slab 32 to be installed in accordance with manufacturer's instructions. Inner face of new front wall to be 15mm wet plaster lining with skim finish. Use moisture resistant plaster in w/c and ground floor store.
3. Facing brick mortar colour to match existing mortar on side wall of adjacent uphill building, sand source to be considered to achieve desired colour or possible requirement for additives. Final colour to be agreed, sample panel to be provided for approval by Architect.
4. Provide course of 65mm high x 100mm thick wide Marmox Thermoblock to inner leaf below DPC at junction of the masonry cavity wall with the floor to prevent thermal bridging, fitted in accordance with manufacturer's guidance. See attached manufacturer's specification notes provided by Marmox for installation of the Marmox Thermoblock (standard type). Run cavity wall insulation down adjacent to Marmox block to create continuous line of insulation to prevent cold bridging.
5. New wall construction to achieve a minimum 'U'-Value of 0.18W/M²K.
6. Wall ties and spacing to be in accordance with BS 8000-3 max. 450 vertically and 900mm horizontally with staggered layers, and max 300mm vertically inset by max. 225mm horizontally around openings, or as specified by engineer. Due to differential between coursing heights to inner and outer leafs ensure ties point down towards outer leaf or use a proprietary system such as Ancon Fastrack Channel & Ties.
7. Provide DPC cloaks/trays and weepholes above openings and as noted further on drawings.
8. Cavities to be closed at wall plates generally, with Standard Firesock 1 hour fire rated/fire stop manufactured by Dacatie
<https://www.quantumprofilesystems.com/en/brands/dacatie>. Cavity closers to be installed in strict accordance with the manufacturer's instructions all to be in accordance with Approved Doc B achieving min 60mins fire resistance.
9. Insulated cavity closers to be provided to all new window and door openings inc. Cavity closers to be XFR2000 1 hour fire rated cavity closer/fire cavity barrier manufactured by Dacatie <https://www.quantumprofilesystems.com/en/brands/dacatie>. Cavity closers to be installed in strict accordance with the manufacturer's instructions all to be in accordance with Approved Doc B achieving min 60mins fire resistance.
10. Continuity of Insulation and Air tightness generally: The building fabric should be constructed so that there are no reasonably avoidable thermal bridges in the insulation layers caused by gaps within the various elements, at the joints between elements, and at the edges of elements such as those around window + door openings. Reasonable

provision should also be made to reduce unwanted air leakage through the envelope parts.

11. Services to be face fixed in steel conduit generally. Do not run services through insulation or behind VCL.
12. Beneath entrance doors, provide 2 layers of 25mm thick Bosig Phonotherm 200 structural insulation board as indicated on detail drawings to prevent thermal bridging. Ensure the full depth of the door track is supported in accordance with best practice and manufacturer's recommendations.
<https://www.ecologicalbuildingsystems.com/product/phonotherm-200>
13. Provide 25mm thick pistol brick slips in matching brick to feature soldier course along pitched roof abutment. Support on proprietary brick slip support system from Wincro Metal Industries Ltd. www.wincro.com
14. Provide illuminated projecting signs to front elevation as indicated on drawings and as quote ref: 4676/2 from Signs Base Ltd. www.signsbase.co.uk securely fixed back to masonry structure to signage suppliers specification.

D. NEW LIGHTWEIGHT EXTERNAL WALLS BETWEEN FLAT AND PITCHED ROOF

15. New external walls, outer leaf of 25mm metric brick slips securely fixed on proprietary non-combustible tracking panel such as 9mm fibre cement board from Brick Bond Solutions Ltd <https://www.brickbondsolutions.com/products/brick-slip-tracking-systems/cement-board-backed-brick-slip-tracking-panel-1-2m-x-2-4m/> or similar approved, on 38 x 50mm vertical battens to provide 50mm ventilated cavity followed by low emissivity breathable membrane such as TF200 Thermo stapled/nailed to the sheathing and extending over the flat roof membrane upstand in accordance with roof membrane supplier recommendations and good practice. On 10mm OSB3 followed by 140x38mm C16 studs at 450 c/c or as per Structural Engineer's design and specification. External wall panels to be full fill insulated between studs with 140mm Knauf Frametherm Roll32 mineral wool insulation. Line inner face with visqueen vapour control layer stapled to the inner face of studs before fixing the 50x50mm transverse SW battens fully filled with 50mm Rocksilks Building Slab RS45 insulation before final layer of 15mm fireline plasterboard and skim. To achieve 30mins. fire resistance and U Value of 0.18W/M²K.
16. Wall ties to be stainless steel timber frame ties at 450mm c/c vertically and 750mm c/c horizontally. Ties doubled up around doors and windows.
17. Cills and jambs to be closed with insulated cavity closures inc. DPC cloaks/trays and weephole to new openings.
18. Refer to note D10 which also applies.

D. UPGRADE TO RETAINED EXISTING EXTERNAL WALLS

19. Existing solid masonry walls to rear and sides to be retained as indicated on drawings. Thickness varies as shown and also refer to historic building technical drawings. Inner face of wall (except against adjacent party wall to SE corner) to be exposed and all linings removed and made good. Wall to be inspected for condition and damp readings taken to check moisture content. Once satisfied to receive new lining of 140x38 treated SW studs at 450c/c fully filled with 140mm of Rockwool Nyrock Frame 32 insulation. Where existing masonry piers project instead wrap all 3 sides in 15mm Spacetherm aerogel insulation from A Proctor or similar approved, fixed in place to manufacturer's recommendations. Inner face to receive Pro Clima Intello Plus intelligent hydrosafe vapour control membrane.
To walls onto market hall / stalls provide SW battens to create service void (final size tbc to cater for waste pipes once assessed by plumber but assume 65mm) and finish with 18mm grade B Birch ply lining.

To walls onto w/c provide lining of 12mm Hardie tile backer board or similar approved for tile finish, choice of tile tbc.

To walls onto front stores at ground and mezzanine level (not above stalls) provide Keim Optil masonry paint finish. Check moisture content of substrates in below 19% before application.

20. Note: All facing brickwork to be cleaned and made good, any existing defective bricks should be replaced with matching brick. Existing retained external walls to be assessed, wall to be repointed in mortar to match existing where brick mortar joints are damaged or deteriorating.
21. Walls to be raised as indicated on drawings. Parapet raised in matching masonry, imperial size PreWar Common brick from Imperial Brick Ltd.
Sections of raised wall to front west side as indicated on drawings to be in cavity wall construction generally as new external walls clauses except; outer leaf to be PreWar Commons brick as above where visible externally. Provide DPC cavity tray and weep holes above existing masonry. Carry insulated wall lining past top of existing masonry where external.
Section of raised wall to front east side to be in medium density concrete block where concealed against neighbouring building.

E. INTERNAL WALLS

1. Internal walls to be removed where indicated on plans in strict accordance with engineers design and process, maintaining structural integrity to the rest of the building. Any temporary lateral or other structural support to existing building to be assessed as temporary works package by suitably qualified persons.
2. All new internal load bearing walls to be 100mm medium density blockwork or reclaimed and cleaned up bricks from demolition areas (if approved by engineer) with a crushing strength 7N/mm sq as structural engineers details. Provide masonry paint finish as D19 to exposed faces sides unless stated otherwise.
3. New internal stud walls to be 50 x 75mm stud framework at 450 centres with horizontal noggins at 900 staggered centres with min 25mm thick mineral wool insulation of min 10kg/m3 between studs, with 12.5mm Gyproc Wallboard plasterboard lining of min 10kg/m2 to both sides to achieve sound reduction level Rw42dB in accordance with Approved Document part E and achieve 30mins fire resistance.
4. New internal stud walls between stalls to be as E3 except linings each side to be 18mm lacquered B grade birch ply.
5. New internal stud walls between loft spaces above stalls to be as E3 except linings to each side to be 10mm OSB.
6. New internal stud walls at high level above stall heads to be as E3 except lining to outer face to be 18mm lacquered B grade birch ply, and lining to loft side to be 10mm OSB.

G. NEW GROUND FLOOR TO FRONT OF BUILDING

1. Existing RC floor slab to be carefully removed and made good and fill to cellar voids excavated to level with base of existing footings but not beyond to avoid undermining walls, all to Structural Engineers details.
IMPORTANT NOTE: Under no circumstances may the excavation be carried out below the base of the existing footings without express approval by the Structural Engineer.
2. New Ground Floor to consist of new 200mm thick RC suspended floor slab to engineer's design laid over 500gauge polythene separating layer on 90mm Celotex GA4000 sub floor insulation fitted fully in accordance with manufacturer's guidance, on 1200 gauge visqueen DPM on 50mm sand blinding layer over compacted layers of hardcore to engineer's design, slab surface to be set level with top of levelled finish of adjacent retained existing slab. Provide 18mm overlay underfloor heating system from Polypipe

as order ref: Q37799600 project ref: T35851-2-UFH, and overlay with 12mm layer of Hardie Board. Final layer of nominal levelling screed to provide seamless finish between retained and new floor areas. Floor finish refer to finishes clause T.

3. The above build up achieves the target 'U'-Value of 0.18W/M²K.
4. The surface of the floor should be level and smooth before fixing skirtings.

G. ALTERATIONS TO RETAINED GROUND FLOOR

5. Existing conc. floor to building (except front section) to be retained and thoroughly cleaned to remove all debris and fittings. Surface level varies as shown on historic plans and indicated on drawings. Central area falls from middle to sides to line of two gully's running front to back. Level to top point with layers of Sikafloor 440. Each layer application max. 30mm thick and laid in accordance with manufacturer's guidelines. Screed permits heavy traffic so can be laid early in process to permit drying out (contractor to check full requirements with manufacturer). Overlay finished screed with Polypipe underfloor heating overlay system, Hardie board and final levelling screed layer and finish as set out in G2.
6. Existing conc. floor retained to higher level around long sides and across rear to be cleaned back and debris removed and made good ready for nominal levelling screed and new floor finish.

H. MEZZANINE FLOORS

1. Remove existing roof finishes and other fittings and carefully cut existing flat roof slab following propping and remove central section retaining areas at each end as mezzanine floors over store and w/c as indicated on drawings. Provide structural support below as engineers design. Ensure surface is clean and debris removed, fill any gaps with epoxy filler and seal surface with new epoxy floor sealing costing. Check moisture content is less than 19% then paint underside and exposed faces with Keim Optil masonry paint.
2. Mezzanine floors above perimeter market stalls to be min. 200 x 50mm C24 SW joists at 400c/c as specified by structural engineer. Provide double joists and trimmers to access openings and double joists below stud walls (where not supported by beams). Overlay with 22mm T&G chipboard flooring screw fixed and under draw ceiling with 15mm fireline plasterboard fixed fully in accordance with manufacturer's guidance and skim finish.

I. STAIRS

1. Approach to main entrance doors to be ramped by adjustment to graded area at side of highway and new conc. paving set at grade up to level threshold at door. Max. 1 in 12 approach. All to be compliant with A.D.M.
2. Works to highway to be agreed with Cheshire East Highways and completed to their details and satisfaction by sub contractor authorised for working in the highway.
3. Steps up to bi-folding secondary entrance doors to be ambulant disabled standard as shown on drawings but regardless min 250mm goings and max rise of 170mm and compliant with AD K.
4. Balustrade to maintenance landing above ground floor store to be factory painted steel with handrail at 1100mm high. This is a barrier for occasional maintenance staff only not public use and so railings can be spaced accordingly. Provide horizontal bars at equal intervals. Provide access gate with sprung closer and latch.
5. Provide retractable loft ladders to loft spaces above stall bays, trim out openings with doubled up joists. Stall bays 1, 3 to be 30min. fire rated versions from Keylite KYL02. Stall bays 4, 5, 6, 8, 9, 11 to receive standard versions of KYL02.

https://www.keyliteroofwindows.com/products/loft-ladders/?ppc_keyword=keylite%20loft%20ladder&gad_source=1&gclid=EAIaIQobChMI1uLimf7YhgMVI5JQBh1P7QK8EAAAYASAAEgKO-fD_BwE

6. Provide retractable roof access ladder to flat roof as indicated on drawings above main hall, trim out openings as directed by engineer. To receive fire rated Columbus Flat Roof Electric Concertina Access Ladder. General info from <https://www.loftcentre.co.uk/columbus-flat-roof-electric-concertina-access-ladder> however refer to quote ref: Q200825 Provide fused spur and data point for remote electric control. Seal around underside with intumescent caulk and around kerb upstand by roofing system installer to roofing manufacturer's details and spec.

J. LINTELS AND STRUCTURAL STEELWORK GENERALLY

1. All structural works to be designed and specified by Structural Engineer.
2. Lintels over new openings and other structural members to be sized by Structural Engineer OR by IG Hi-Therm+ lintels sized as appropriate.
3. All lintels to suit structural openings with a minimum end bearing of 150mm or as specified by Structural Engineer. Lintels to external walls to have proprietary IG cavity trays built in, including proprietary plastic weep holes by Cavity trays.
4. Fire protection to all structural steelwork (including existing retained beams) to be provided by Envirograf Intumescent systems Ltd Tel: 01304 84255 www.envirograf.com, product ref: 83 – Envirograf EP/FS/P primer to untreated steel + Envirograf EP/FS/IN Intumescent Coat, with surface prepared and applied in strict accordance with manufactures instructions, providing min. 1Hrs Fire Protection.

K. ROOFS AND CEILINGS: NEW PITCHED ROOF

1. Provide new slate roof covering of 500x380x5mm CUPA Pizarras Cupa 4 anthracite colour in smooth finish ref S MA35580, with all slates laid strictly in accordance with manufacturers recommendations on treated SW battens and counter battens sized to manufacturers recommendations and at correct gauge /headlap for size of slates selected with appropriate matching ridge tiles. Battens fixed through breathable membrane complying with BS 5534 for site location, lapped and taped at high points and ridge + lapped over fascia/angle fillet and draped into gutter over eaves protector cloak.
2. All structural timber sizes to structural engineers or to specialist design and specification. New rafters to be 200 x 50 at 450c/c. Rafters will be exposed and timbers suitable and finished for visible grade should be used.
3. Walls to receive new 75 x 100mm treated SW wall plate securely fixed to wall to structural engineers design and specification.
4. Rafters to receive 18mm BB grade Birch ply sheathing board over, overlaid with VCL air barrier fixed in place with joints lapped and taped to provide continuous air and vapour barrier
5. Exposed structural timber and deck to receive factory applied fire retardant coating such as HR-Prof in accordance with manufacturers recommendations.
6. Roof to be insulated with 150mm Rockwool Hardrock Multi-fix DD underlay slab and further layer of 85mm Rockwool Hardrock Multi-fix DD insulation, stagger joints between layers and fit in accordance with manufacturer's guidance. Ensure there is a tight fit, insulation should be butt jointed and continuous with the wall insulation to avoid thermal bridging. Fill all gaps with expanding urethane sealant. Extend insulation down to eaves.
7. Roof build up achieves the target 'U'-Value of **0.16W/M²K**.
8. Tightly pack flexible insulation material into eaves and verges to prevent cold bridge and retard air infiltration.

9. All new lead work to have patination oil wiped over surface immediately after fixing, prior to any weathering to prevent formation of lead carbonate. All leadwork to be approved and carried out by specialist lead worker.
10. Provide slate undercloak and pointed verge as details to verges.

K. ROOFS AND CEILINGS cont.d :REPLACEMENT LOW PITCH FLAT ROOF

11. Existing flat roof to be stripped back and removed. Existing steel roof deck to be inspected by engineer for suitability to remain but it is anticipated to require replacement and contractor should price accordingly. Provide new steel roof deck to structural engineers design and specification of Tata Roofdek D100 perforated trapezoidal 1.2mm gauge deck. Fill recess voids to top surface with acoustic infills acoustic insulation from Rockwool [Acoustic Infill - Sound-absorbing trough fillers for perforated steel decks \(rockwool.com\)](https://www.rockwool.com/en/Products/Infill/Acoustic-Infill-Sound-absorbing-trough-fillers-for-perforated-steel-decks) sized to match steel deck.
12. Overlay roof with following Warm Roof Construction of VCL taped and sealed over deck to provide continuous vapour and air barrier, to receive 150mm Rockwool Hardrock Multi-fix DD underlay slab insulation with further layer of 50mm Rockwool Hardrock Multi-fix DD insulation, stagger joints between layers and fit in accordance with manufacturer's guidance. Ensure there is a tight fit, insulation should be butt jointed and continuous with the wall insulation to avoid thermal bridging. Fill all gaps with expanding urethane sealant.
13. Roof covering to be Bauder flat roofing membrane overlaid in areas shown on drawings with Bauder Green roof system and solar PV laid and with fall restraint system all installed by specialist roofing Contractor in accordance with full Bauder specification Ref: B242928 and as NBS J41 & Q37 in Appendix B. Including all associated trims and flashings. All up stands to be a minimum 150mm. Details and specification to be in full accordance with manufacturers recommendation and guidance. Roof to be guaranteed for minimum of 20 years covering materials and workmanship.
14. Provide upstands and gutter linings on suitable external grade ply backboard with flashings over as required and details to edges to be installed in accordance with manufacturers recommendations. Provide aluminium drip edge to top of parapet around flat roof and seal membrane to top as Bauder spec.
15. Provide lining to secret gutter, valley, gutter and box gutters as part of the flat roof package.
16. All new lead work to have patination oil wiped over surface immediately after fixing prior to any weathering to prevent formation of lead carbonate. All lead work to be approved and carried out by specialist lead worker.
17. Flat roof to achieve a minimum 'U'-Value of 0.18 W/M²K. Roof covering to achieve Class AA, AB or AC / B_{ROOF}(t₄).

L. ROOFLIGHTS

1. Remove existing rooflights and kerbs. Provide new kerbs of 10mm OSB3 sheathing board on 140x38mm C16 studs at 450 c/c or as per Structural Engineer's design and specification. Fill between studs with 140mm Knauf Frametherm Roll32 mineral wool insulation. Line inner face with visqueen vapour control layer stapled to the inner face of studs before fixing the 50x50mm transverse SW battens fully filled with 50mm Rocksilk Building Slab RS45 insulation before final layer of 15mm fireline plasterboard and skim. To achieve 30mins. fire resistance and U Value of 0.18W/M²K. Use tapered SW packers below sole plate and tapered head plate as required to create falls required by rooflight suppliers guidance. Rooflights to fall across short section in accordance with manufacturer guidelines but regardless minimum pitch of 3 degrees installed (beware of allowing for settlement of timber kerbs). Kerb upstand the be waterproofed as per

roofing membrane specification. Rooflight to be sealed to kerb to manufacturer's recommendation and installed by an approved specialist contractor.

Rooflights in strict accordance with manufacturer's recommendations and details and with flashing kits suitable for installation. See drawings & window schedule for Roof Light locations. Rooflights to be provided by Glazing Vision as quote ref: Q148726-N, item 3 include easy clean protection for glass, solar control glazing upgrade and kerb top trim for multipart Flushglaze.

Rooflights to be include electrically remotely operated motorised ventilation panels. Final dimensions to be confirmed on site prior to order confirmation and fabrication.

2. Rooflight to achieve min. 'U' value of 1.2W/m²K.
3. Glazing to be installed in strict accordance to manufacturer's instructions. Glazing is to be Approved Document Part Q / PAS 24 compliant.

M. WINDOWS, DOORS AND VENTILATION

1. All dimensions of windows and doors to be checked on site before manufacture, all windows to open outwards unless noted otherwise.
2. All glazing to comply with approved doc. Q / PAS 24.
3. New entrance doors (DG01) to be Doc M compliant level threshold. DPC to be stepped up and around these areas in accordance with best practice and maintain DPC continuity (refer to threshold detail).
4. New main entrance door to be GEZE UK Ltd. Powerturn Electro-mechanical swing door thermally broken aluminium framed automatic electric sliding doorset. Doorset to be compliant as means of escape with connection to alarm system and fire service over-ride function. Finish to be PPC in RAL 7044.
5. New secondary entrance door (DG02) to be manually operated aluminium framed bi-folding Schueco ASS 70 FD thermally broken doorset system. Finish to be PPC in RAL 7044.
6. Both entrance doors to be supplied with manifestation, design pattern to be confirmed. Door furniture to compliant with Doc M. and equality/accessibility regulations.
7. Automatic door to have emergency manual over-ride.
8. Doors DG01 and DG02 to have electrically operated internal security shutters. Door control to be fob operated with remote rocker switches in corner store. Shutters to have safety sensors. Shutters to be supplied and installed by UK Roller Shutters Ltd www.ukrollershutters.com quote ref: 47148 (perforated non fire rated option x 2), or similar approved. Note contractor to provide vertical steels to frame shutter opening to support guide rails, steel size as required by shutter provider, fixed back to head beam and to slab.
9. New windows to w/c and store be Schueco AWS 65 thermally broken aluminium framed glazing units or similar approved. Finish to be PPC in Pavilion Grey with obscure glazing. Opening restrictors and anti-finger trap fittings to be included.
10. Glazed curtain walling to be 60mins. fire rated Schueco FW50+ thermally broken curtain walling system of aluminium framed units with PPC finish in Pavilion Grey. Aluminium faced insulated panels required to curtain wall head and spandrel panel between entrance doors and glazing. These to be supplied as part of the glazing package by specialist cladding team.
11. Contractor to include for pre completion water testing of curtain walling to CWCT standards by CWCT approved specialist.
12. Windows and external doors to achieve U value of min. 1.2W/m²K.
13. Curtain walling (x 2) to each receive proprietary solar shading aluminium framed with timber shading fins system from Schueco. Frame supported off curtain walling via specialist brackets and back to masonry at jambs, all as manufacturer's design and specification. Position off curtain walling as indicated on drawings. Horizontal timber

louvres in Western Red Cedar No. 2 Clear and Better Cladding Grade to be supplied as part of package sized to match profile of Schueco aluminium louvres. Timber components to be factory fire treated with proprietary retardant coating for spread of flame to achieve class B-s3 d2(2) See appendix E FW50+ H11.

14. Glazing, doors, curtain walling and solar shading generally fabricated and installed by Schueco approved fabricator and installer.
15. All new internal doors to be Climadoor Flush White Primed Paint Grade Premium timber Fire Door as per door schedule, or similar approved. Doors to be fire rated doors as indicated on schedules in full accordance with Approved Doc B. Ironmongery to be as Appendix L or other similar products/supplier to be approved prior to purchase. Samples available from Carlisle Brass, t: 01228 511770.
16. All external openings to be Secure Door sets and Secure Windows to PAS 24:2012 to satisfy A.D.Q.
17. Windows within 800mm of FFL to have safety glass and doors within 1500mm of FFL to have safety glass.
18. All to be double glazed sealed units with cills to match.
19. Ironmongery to doors to be as Carlisle Brass schedule Ref: 34786 in Appendix V. Products can be sourced from Lloyd Worrell (or others)
matthew.jones@lloydworrell.co.uk
20. Replacement rooflights as schedule to be Double glazed multi part Flushglaze with integrated vision vent from Glazing Vision quote ref: Q148726 RL01c or similar approved. Include upgrades for easy clean glass coating, solar control glass, and kerb top trims.
21. MVHR ventilation system with flow rate of 270m³/hr to be designed by Nuenta Group, contact details as item P3 below, utilising Comfort 450 MVHR unit. To meet both purge ventilation and background ventilation requirements within Part F Vol 2 of building regulations. See Appendix C.
22. Ventilation outlets to ventilation system to be directed through high level loft area above w/c and discharged through rear facing wall below pitched roof to outside air via proprietary fitting via insulated & lined duct as per manufacturers recommendation.
23. Input and output feeds to MVHR unit to be thermally insulated continuously with closed-cell rigid foam insulation such as Armaflex or similar to be approved.
<https://local.armacell.com/fileadmin/cms/uk/products/en/AFArmaFlexClassORangeUKROI.pdf> Provide fire protection by proprietary fire collars where ducts pass through compartments.
24. Perimeter stall units to receive electrically operated PVC commercial roller blinds. 12no. units in total required. Each unit to be provided with key locking points at base (suited) provided by supplier. Blinds to be printed on outer face with client's choice of full colour image. Units to be fitted by specialist supplier. All as set out in quotation for 'Elite' Full Cassette external grade roller blinds with Somfy electric motors and iO remote control units, ref: DL01453-24 V.01 from www.jamesrobertshaw.co.uk or similar approved. Refer to Appendix V for further information.

Please Note: SBEM calculations are required to satisfy Building Regulation, Part L and are included in Appendix K.

IMPORTANT NOTE: Penetrations through a fire separating element to receive a proprietary seal that will maintain the fire resistance of the fire separating element in strict accordance with Approved Doc B. Ducts should not help transfer fire or smoke through the building, where ducts pass through fire separating elements methods to combat potential fire should be adhered in strict accordance with Approved Doc B, ducts

that pass through protected escape routes to be enclosed in fire resisting construction in strict accordance with Approved Doc B & BS EN 13501.

P. HEATING AND HOT WATER ETC

1. New systems designed by engineer within specialist manufacturer, installed and commissioned by a reputable Heating Engineer. A certificate should be issued to the owner by a Part P registered and qualified electrician on completion.
 2. Peak heat load requirement approx. 10KW.
 3. New hot water (general use except stalls which are supplied separately see below) and heating system powered by EcoAir EVI air source heat pump calculated and recommended by Nuenta Group quote contact; Bertie Beanland, 01543 466642, bertie.beanland@nuenta.com, www.nuenta.com. ASHP located as indicated on drawings, final location tbc with supplier. Ducting back to plant to be as designed by specialist supplier, see Appendix C. Provide specialist frame to raise off roof level and feet connections for flat roof system to roof membrane/system specialists design. See Appendix B.
 4. New 300L hot water cylinder, buffer tanks and ancillary equipment to be located in plant as indicated on drawings. Include immersion heater in buffer tank for heating boost capability. To be designed and specified by specialist manufacturers by 'Nuenta Group'. To be installed in strict accordance with manufacturer's instructions and by appropriately qualified and certified subcontractor. Additional loading to be taken into consideration by Structural Engineer.
 5. Heating delivery to be by overlay wet underfloor heating system designed and supplied by Polypipe Building Products, order ref: Q37799600 project ref: T35851-2-UFH, design@polypipe.com. Installation to be by trained specialists and fully in accordance with manufacturers recommendations.
 6. All hot water pipes to be insulated to commercial standard in accordance with BS 5422:2009.
 7. Fixed market stalls requiring hot water (but not for mixer taps) to receive as follows: Stall 1, 2, 3, 7, 8 & 11 to each receive electrically powered 7kW multipoint instantaneous hot water system from Heatrae Sadia <https://www.heatraesadia.com/products/cylinders-and-hot-water/instantaneous-electric/multipoint-instantaneous>
Fixed market stalls requiring hot water with mixer tap to receive as follows: Stall 4 to receive unvented Multipoint 10 3KW unit from Heatraesadia <https://www.heatraesadia.com/products/cylinders-and-hot-water/electric-unvented-storage/multipoint/multipoint-10-and-15-litre> Ref 95050143 with Pack U1 Pressure Reducing Valve Ref 95970352, and U2 Expansion Vessel and Check Valve Ref 95970351.
PLEASE NOTE: all electrical controls to be included and installed by builders electrical subcontractor unless Nuenta advise otherwise.
- a) Water Pressure - It is assumed that there will be sufficient water pressure to meet the system demands. Contractor to check pressure and flow rates on site before temporary disconnection and advise Nuenta rep and architect. Consideration of potential future drop to minimum legally required pressure by statutory undertaker to be allowed for in design.

R. ELECTRICAL INSTALLATIONS + LIGHTING

1. Positions of all new Electrical Installations are indicative and any changes made are subject to Client's approval.
2. A schedule of general provision is included in Appendix A.
3. Contractor will be responsible for provision and installation of all electrical supplies. As fittings are not specified a provisional sum can be allotted but this should be clearly set out. Electrical Contractor (person who shall be carrying out electrical work) to carry out

and commission the installations in compliance with IEE Wiring Regulations (Current Edition).

4. Note: All new electrical work is to be designed, installed, inspected and tested in accordance with BS 7671:2001 or an equivalent standard. These installation works are to be undertaken by a person registered with an electrical self-certification scheme, or alternatively by a suitably qualified person, with a certificate of compliance produced by that person to Building Control upon completion of the works.
5. Contractor to arrange and include for reinstatement of 3 phase electrical supply and any temporary works and supply provisions with utilities undertaker. Contractor to include for providing sub metering for each stall bay and also for landlords supply for common areas.
6. A service void is provided around the wall behind stall bays. Where cabling runs across exposed walls or ceilings provide and install face fixed galvanised steel conduit to house new electrical and data feeds, sample to be approved by Client and Architect, final locations tbc by Client.
7. Sockets not to reduce fire integrity. Where recessed sockets are required in fire rated walls use fire rated back boxes to min. fire rating of wall.
8. All light fittings to be energy efficient light fittings.
9. Electrician to be registered with NICEIC, to be responsible for all wiring and commissioning of circuits, and to issue a completion certificate in accordance with Part P.
10. Electrical contractor to include and provide all new fused spurs to all relevant appliances and extracts.
11. High speed broadband data connection to be relocated via duct under new slab to meter cupboard.
12. Security Alarm system to be provided and installed by Client. Sufficient electrical supply to be accounted for by Main Contractor to permit installation of security system.
13. See sections S for fire alarm.
14. Provide emergency lighting to be designed by competent person in accordance with BS 5266.
15. Provide illuminated fire exit signage above final exit doors in accordance with note 14 above.
16. Provide armoured conduit for electrical supply to floor mounted sockets in centre of hall for temporary stalls. Sockets to be lift up steel faced protective flaps that do not hinder access by any building user (when not plugged in). Location of sockets and conduit to be coordinated with UFH designer before final instruction to UFH is placed.
17. Provide supply for surface mounted Thermoscreen C2000E NT electrically (18kW 3ph) heated air curtain above main entrance doors.
file:///C:/Users/Admin/Downloads/New_Thermoscreens_C-Series_Product-Brochure-UK_Web-4-2021.pdf
Unit will require mounting brackets to cantilever past shutter box. These will need designing, assume for tendering 3no. 90degree 500mm x 280mm x 50mm steel brackets.
18. Contractor to commission lightning protection inc. conductor to BS EN 62308:2011 installed by competent specialist contractor.
19. **IMPORTANT NOTE:** where cables are being placed in proximity to insulation, care should be taken and good practice followed so cables are not covered by insulation to avoid risk of fire from overheating.

S. FIRE DETECTION AND ALARM

1. Provide fire detection and alarm system conforming to BS 5839-1:2017. Include mains wired interlinked smoke detection in all cellular spaces including loft areas above stalls

and in open plan space, except provide heat detection to store rooms and to stall bays 1, 2, & 3 (as these are likely include cooking facilities).

2. Note: All new electrical work is to be designed, installed, inspected and tested in accordance with BS 7671:2001 or an equivalent standard. These installation works are to be undertaken by a person registered with an electrical self-certification scheme, or alternatively by a suitably qualified person, with a certificate of compliance produced by that person to Building Control upon completion of the works.
3. Detection alarms to be mounted in locations determined by alarm designer and in accordance with relevant regulations.
4. Provide manual call points at suitable locations as determined by specialist designer including by exit doors.

T. FLOOR FINISHES

1. Floor finish to all ground floor area (except entrance matt) to be 9mm thick R11/47.70 PTV rated Timberland porcelain tiling Ref 3RON103 from Solus Ceramics in Curle colour, www.solusceramics.com. Refer to Appendix U NBS clause M40 for full specification.
2. Provide painted MDF 100x19mm square edged skirting to abutment with walls.
3. Entrance matting to be provided to area immediately within entrance area (approx. first 2.5m) to full width of glazed opening (to both doorsets). Matting to be Forbo Coral. Colour and pattern to be branded design, full design tbc at later date, assume provide Coral Classic for pricing purposes. <https://www.forbo.com/flooring/en-uk/commercial-products/coral-nuway-entrance-matting-and-flooring/coral-entrance-matting/byyu6h>
4. All flooring to be laid in accordance with manufacturer's recommendations. Flooring to be laid by trained specialist installers.

U. KITCHENS

1. Kitchen units to be provided to stalls 1, 2, 3. Installation details and cost to be confirmed at later date.

V. BATHROOMS

1. W/C to be fitted with Doc. M compliant suite installed in accordance with guidance. Choice of suite to be approved.
2. Include for providing hot air hand dryer.
3. Ceramic tiles to external walls to be installed by Contractor. Full height tiling to up to ceiling level. Tile selection tbc. Remainder of room to be painted with Keim Optil masonry paint, colour tbc.

W. DECORATION

1. Contractor to include decorating all elements part of building work including internal walls and soffits described in drawings and specification.
2. Contractor to include for satin finish white paint finish to all plastered ceilings. Use moisture resistant paint in stalls with water/drainage connections (1, 2, 3, 4, 7, 8, 10, 11).
3. All existing plaster and paint to walls and ceiling is to be removed, Contractor to make good all defects i.e. basic preparation for decoration and damaged surfaces made good ready for new wall linings and finishes.
4. Further decorating package to be confirmed and priced at later stage.

X. DRAINAGE & WATER SUPPLY

1. Builder's specialist registered plumber to install all above ground water supply and drainage and be responsible for a correct watertight installation of all appliances and fittings. A written guarantee for 12 months to be included.
2. Builder to be responsible for all new and amended drainage. It is expected that all above and below ground drainage is to be replaced/new, back to the point of connection. It is understood that the existing outfall pipe is damaged and needs to be replaced and so will require excavation of the highway (by licenced sub-contractors). An existing drainage survey is included in PCI file of CDM pack.
3. Existing mains water connection to be relocated from existing intake point to new location in meter cupboard where stop cock is to be located. Provide new duct below RC slab to UU standards to allow pipe connection. Seal penetration through slab to ensure airtight and waterproof fit. Contractors plumber to review connection capacity and check adequacy for load of refurbished building.
4. All drainage below ground to be Hepworths Supersleeve or equal + approved 100dia and 150mm dia V.Clay pipework and matching fittings, minimum gradient 1 in 40, unless manufacturers recommendations permit otherwise.
5. All pipe work with less than 900mm cover to be encased in 150mm concrete. This applies to all drainage passing under paths, drives, roads, buildings or within 1m of external load bearing walls.
6. Pipes passing under non-load bearing strata i.e., garden/planting with less than 600mm cover should have at least 1000mm granular backfill encased with concrete and paving slabs positioned over prior to backfill.
7. All pipes to be bedded 100mm granular backfill (max agg. 10mm) with 100mm selected backfill above pipe (max agg. 40mm) and 2 further layers of selected backfill, as above, hand rammed in layers to give a min' 300mm above crown of pipe before normal backfill.
8. Provide rodding eyes at head of drain runs where necessary. Terminate drain with a slow bend up to a suitable cast iron cover.
9. Inspection chambers to be B125 standard sealed cover set to top of slab level (to be concealed below entrance matting). Chamber to be constructed from PCC units designed by drainage designer or engineer. Inspection chambers required at changes in drain connection/gradient. Inspection chambers to BS EN 752 and sizes to be in accordance with L.A schedule of manhole sizes.
10. Gully Traps to RWP's to discharge onto gullies with black cast iron grate with surround and removable trap (roddable). Gullies set on a concrete pad/base. Yard gullies to be trapped, with removable traps to permit rodding.
11. All existing RW goods to be replaced. New RW goods are not exposed and so to be PVC.
12. All internal SVP's to be acoustically insulated with min. 25mm mineral wool. Terminal for SVP to be proprietary slate vent, colour black or matched to slate.

IMPORTANT NOTE: Penetrations through a fire separating element to receive a proprietary seal that will maintain the fire resistance of the fire separating element in accordance with Approved Doc B.