



ROOF : MARLEY MODERN CONCRETE ROOF TILES WITH CLOAKED VERGE TO MATCH EXISTING ON 38x25mm TIMBER BATTENS ON BREATHABLE ROOFING FELT TO BS 747 GIVING THE NECESSARY VENTILATION WITH MINIMUM OVERLAP OF 600mm ALSO WITH MARLEY 25mm EAVES VENT SYSTEM FOR THROUGH VENTILATION. TRUSSED RAFTERS TO BE DESIGNED AND MANUFACTURED BY SPECIALIST SUPPLIER AND FITTED WITH 100x25mm LATERAL WIND BRACING AND SECURED TO 50x100mm TIMBER WALL PLATE WITH GALVANISED TRUSS CLIPS. ROOF INSULATION TO BE 300mm ROCKWOOL BATTS LAID BETWEEN JOISTS GIVING A U-VALUE 0.15W/m²K OR LESS.

HIGH LEVEL ROOF VENTS AND ASSOCIATED FLASHINGS

EXISTING ROOF: EXISTING ROOF COVERING TO REMAIN AND EXISTING TRUSSED ROOF CONSTRUCTION TO BE SUPPLEMENTED WITH NEW STRUCTURAL MEMBERS TO ENABLE REMOVAL OF TRUSSED RAFTER CROSS MEMBERS AS PART OF THIS CONVERSION. CONSTRUCTION TO CONSIST OF ADDITIONAL CLASS C24 TIMBER 47x150mm JACK RAFTERS AT 600mm CENTRES INSTALLED ALONG SIDE THE EXISTING TRUSSES SUPPORTED AT THE APEX AND IMMEDIATELY BY PURLINS (DESIGNED BY OTHERS) BETWEEN EXISTING GABLE WALLS WITH ENDS BUILT IN. RAFTERS TO BE SECURED TO EXISTING TIMBER WALL PLATE. ROOF INSULATION TO BE 2No LAYERS OF 50mm KINGSPAN KOOL THERM K107 OR EQUIVALENT FIXED BETWEEN JOISTS AND 1 No LAYER 70mm OVER JOISTS GIVING A TOTAL OF 170mm THICK INSULATION AND PROVIDING A U-VALUE 0.15W/m²K OR LESS. ALLOW 50mm MIN CLEAR VOID BETWEEN INSULATION AND ROOF COVERINGS FOR VENTILATION. THROUGH VENTILATION TO BE ACHIEVED BY VENT TILES IN EACH FACE OF THE ROOF AND ALSO WITH MARLEY 25mm EAVES VENT SYSTEM.

WALLS ABOVE GROUND LEVEL TO BE 100mm THICK FACING BRICKWORK TO MATCH EXISTING EXTERNAL SKIN. 65mm CLEAR CAVITY WITH STAINLESS STEEL WALL TIES AS CATNIC BT24 OR EQUIVALENT. 140x38mm CLS SOFTWOOD, VAC-VAC PRESERVATIVE TREATED AT 600mm CENTRES GENERALLY. 9mm BBA STERLING BOARD. 2 No. 220x45mm GRADE C24 SOFTWOOD OVER OPENINGS IN LOAD-BEARING WALLS. LINTOLS SUPPORTED ON CRIPPLE STUDS TO STRUCTURAL ENGINEERS RECOMMENDATIONS. TYVEK BREATHER PAPER FACTORY FITTED TO EXTERNAL FACE OF PANELS. USING POLYPROPYLENE TAPE AND STAPLES. OVERLAPS ARE ALLOWED TO COVER THE JUNCTION WITH ADJOINING PANEL OR FLOOR CONSTRUCTION. THE VERTICAL POLYPROPYLENE TAPE DESIGNATED VERTICAL STUD POSITIONS. THE STAINLESS STEEL WALL TIES SECURING THE MASONRY TO THE TIMBER FRAME SHOULD ONLY BE LOCATED AT A VERTICAL STUD POSITION. DETAILED DESIGN BY SUPPLIER. INSULATED WITH KINGSPAN KOOKTHERM K8 OR EQUIVALENT 140mm THICK BETWEEN STUDS AND WITH INSULATED VERTICAL DAMP PROOFING AT OPENING REVEALS TO ACHIEVE A U-VALUE OF 0.15 W/m²K MIN. CAVITY TO BE CLOSED AT HIGHEST POINT AND WINDOWS AND DOORS WITH 65x65mm TIMBER BATTEN AS FIRE STOP.

WINDOWS TO BE UPVC ARGON FILLED DOUBLE GLAZED UNITS WITH PLYKINGTON 'K' GLASS WITH A U VALUE OF 1.40 W/m²K. ALSO TO PROVIDE MIN 10% FLOOR AREA DAYLIGHT. 5% FLOOR AREA RAPID VENTILATION. PERMABIT 60' VERT DPC TO BE INCORPORATED AROUND ALL NEW OPENINGS WITH CATNIC LINTOLS TYPE CGE90/100 OR EQUIVALENT TO SUIT OPENING SIZES. UNITS TO INCLUDE BACKGROUND VENTILATION INCORPORATED IN WINDOW FRAMES IN THE FORM OF SLOTTED VERTS MIN AREA 8000mm². WINDOWS SHOWN AS MOE ON PROPOSED FLOOR PLANS TO BE ESCAPE WINDOWS.

WALL CONSTRUCTION: BELOW DPC - 100mm THICK 7N DENSE CONCRETE BLOCKWORK EXTERNAL SKIN WITH FACING BRICK BAND COURSE TO MATCH EXISTING INC. WEEP HOLES AT GROUND LEVEL. 65mm CAVITY FILLED TO GROUND LEVEL WITH LEAN MIX CONCRETE AND 150mm THICK 7N DENSE CONCRETE BLOCKWORK INTERNAL SKIN.

600x300mm STRIP FOUNDATION SET MINIMUM 600mm BELOW FINISH EXTERIOR GROUND LEVEL. CONCRETE GRADE C30/20.

FLOOR TO CONSIST OF 18mm T&G WATER RESISTANT CHIPBOARD ON CLASS C16 MIN 38x170mm FLOOR JOISTS OR DEPTH TO MATCH EXISTING FLOOR DEPTH. DOUBLED UP UNDER PARTITION AT 400mm CENTRES INC CATNIC GALVANISED STEEL HERRINGBONE STRUTTING AT MID POINTS AND TO INCLUDE SOUND INSULATION AS PART OF THE BUILDING REGS. ENDS OF JOISTS TO BE BUILT INTO TIMBER FRAME WALLS OR SUPPORTED BY GALVANISED HANGERS AND SPORTED BY UNIVERSAL BEAM DESIGNED BY OTHER.

FLOOR TO CONSIST OF 18mm T&G WATER RESISTANT CHIPBOARD ON CLASS C16 MIN 38x195mm FLOOR JOISTS INSTALLED AT 400mm CENTRES AND RUNNING ALONG SIDE EXISTING CEILING JOISTS INC TIMBER NOGGINGS AS STRUTTING AT MID POINTS AND TO INCLUDE SOUND INSULATION AS PART OF THE BUILDING REGULATIONS AND 300mm ROCKWOOL INSULATION BATTS TO UNOCCUPIED ROOF SPACES. ENDS OF JOISTS FIXED TO EXISTING WALL PLATES AND SUPPORTED BY GALVANISED HANGERS FROM UNIVERSAL BEAM DESIGNED BY OTHER.

GROUND FLOOR: 65mm FIBRE REINFORCED PROPRIETARY FLOOR SCREED ON 150mm THICK FLOOR SLAB CONCRETE GRADE C30/20 WITH 120mm THICK KINGSPAN THERMAFLOOR K3 OR EQUIVALENT THERMO INSULATION INCLUDING A 50mm THICK PERIMETER LAYER ON 1200 GAUGE POLYTHENE DAMP PROOF MEMBRANE WITH TAPED JOINTS ON 150mm THICK TYPE 1 GRANULAR SUB-BASE WELL COMPACTED, ACHIEVING A U-VALUE OF 0.18 W/m²K OR LESS.

NOTE: ALL DIMENSIONS IN MILLIMETRES UNLESS SHOWN OTHERWISE.

project title	drawing title	scale	date	drawn	checked
PROPOSED EXTENSION & LOFT CONVERSION AT 34 DRUM TOWER VIEW, CAERPHILLY.	CROSS SECTION A - A	1:50" A3	Nov'23		
		project ref.	drawing no.	rev.	
			106		