

A1

A

B

C

D

E

F

G

H

I

J

K

L

M

N

Main Roof Vaulted

Roof structure to comprise of C16 - 50mm x 175mm softwood rafters @ 400mm ctrs. Rafters to be doubled up around roof windows. All rafter feet birds-mouthed over and nailed to or fixed via expamet truss clips onto 100mm x 75mm softwood wall plates provided at eaves. Wall plates where located onto steel beams, to be fixed using Hilti SWD screws at 150mm C/C Alternative Stagger. All rafter heads, birds-mouthed over and nailed to or fixed via expamet truss clips onto 100mm x 75mm softwood wall plates. Valley boards - should be fitted of sufficient width to provide support for the roofing battens, either: min.12mm ply lay boards set between rafters, or 6mm continuous ply boards laid over the rafters. Wall plate strapped to blockwork with galvanised straps at maximum 2m centres. Lateral restraint to rafters parallel to gable wall by 30 x 5mm galvanised MS straps to first three timbers parallel to wall, screw fixed @ maximum 2000mm centres fixed to inner leaf of cavity wall. **Hip & Ridge Steel/Timber Beam to Structural Engineers Detail.** Sloping section of ceilings to incorporate 2 layers of 60mm Kingspan K107 rigid phenolic insulation

between rafters, positioned level with base, with 37.5mm Kingspan K118 insulated drylining board to underside of rafters, to achieve maximum "U" value of 0.18W/m²K, all fixed in accordance with manufactures instructions. Rafters overlaid with DuPont™ Tyvek® Supro breather membrane with joints lapped and taped. Ceilings formed by fixing 12.5mm plasterboard to underside of each joist complete with skim finish. Roof to be finally covered with Marley Mendip Minimum Pitch 15° Smooth (100mm headlap), laid to gauge and laid on 50mm x 25mm tanalised softwood battens. Marley to advise on fixing requirement, contactor to contact and obtain correct detail for location. Ridge Detail :- Marley or equivalent Universal RidgeFast System Provides 5mm continuous ventilation along the ridge installed in line with manufacturers recommendation. Hip Detail :- Marley or equivalent Universal HipFast System - 5000mm2 of ventilation when used with LR underlay. Valley Detail :- Marley or equivalent Universal GRP Dry Valley - Providing up to 10,000mm2 free area of ventilation - The GRP valley trough should be fitted with care taken to ensure it is centrally located between the valley boards; the sides should be nailed to the counter battens at max: 500mm centres. Eaves Detail :- Marley or equivalent Universal Eaves Vent System 25mm continuous ventilation at eaves12.5°-55° pitched roofs

Heating

Supply pressed steel radiators; all with thermostatic valve controls in accordance with Part L1B of Building Regulations (2013 edition with 2016 amendments). Pipe work to be insulated in accordance with Part L1B of Building Regulations (2013 edition with 2016 amendments) Heating and Hot & Cold water system to be issued with a commissioning certificate in accordance with Part L1 part 1.50 & 1.51 Building Regulations 2013 with 2016 amendments.

Electrical Fittings

All sockets to be positioned above 450mm from floor level, and all switches to be positioned below 1200mm from finished floor level to comply with Part M of the Building Regulations. Minimum 2No light fittings to incorporate only fitting with compact fluorescent lamps - luminous efficiency greater than 40 lumens/circuit-watt, in accordance with Part L1B paragraphs 43-46 Building Regulations (2013 Edition with 2016 amendments) Electrical installation to be designed and installed and tested on completion by a NICEIC registered contractor in accordance with BS 7671:2001 to comply with Part P of the Building Regulations.

Smoke Detectors

Install independent Smoke detectors in positions shown (heat detector in kitchen), units to be mains powered and interconnected when triggered. Units to be mounted at ceiling level, 300mm from any wall and light fitting. Smoke alarms to BS EN 14604 Heat alarms to BS 5446 - 2

Drainage

110mm SVP's to terminate min 900mm above nearest opening with plastic balloon cage or with Air admittance valves (AAV) as shown. Bath, sink, shower and wash hand basins 40mm pipework, pipework in combined situations 50mmø all with 75mm deep seal traps. All drains beneath floor slabs to be encased in minimum 150mm of concrete and all drains within 1000mm of walls to be encased in concrete to full width of trench up to top of foundation of that wall, with movement joints formed in concrete at each pipe socket face. Pipework with less than 0.9m of cover beneath driveway to incorporate reinforced concrete cover slab to bear minimum 300mm onto original ground either side of drain excavation, with minimum 25mm compressible board between concrete and minimum 75mm granular bed and surround to pipework. Inspection chambers less than 1.0m deep to be preformed 500mm diameter PVC chambers on concrete bases, with Grade C2 cast iron cover and frame. Inspection chambers greater than 1.0m deep or under drive area to be in 225mm Class B engineering brickwork, with 150mm concrete base, benching to falls, complete with medium duty Suparsteel cover or cast iron covers and frame to drive area. All foul drainage to finally connect to existing foul system. All RWP's 68mm dia and gutters 112mm to be black round PVC to connect to back inlet gullies with access gratings; underground details similar to that of foul drainage and to discharge to existing surface water system. All drainage works to comply with BS8301. Surface water drains - to be either connected to main drain or soakaway. Pipework to discharge to 1000mm diameter x 1500mm deep builders rubble filled soakaways minimum 5m from building in position shown, subject to suitable ground conditions. and All drainage works to comply with BS EN 752 Parts 1-4

Foundations

Existing foundations to be exposed for inspection via structural engineer/building control to establish suitability to cast adjacent to/acceptability to build additional storey.

First Floor

22mm moisture resistant tongue and groove chipboard flooring (minimum mass per unit area 15kg/m²), or C24 - 50mm x 200mm tanalised softwood joists at 400mm centres, to new first floor level of house. Joists doubled up and spiked together beneath all first floor partitions. Joists built into new wall, with pockets cut into the existing walls, cut ends treated and packed as necessary. Lateral restraint provided by 30mm x 5mm galvanised mild steel restraint straps at maximum 2000mm centres, in accordance with Building Regulations. Catnic Herringbone joist struts at spans between 2.5m and 4.5m, one at mid span and greater than 4.5m, 2 No. at 1/3 span positions. notches should be no deeper than 0.125 the depth of the joist and not closer than 0.07 of the span nor further away than 0.25 times the span. Holes should have a diameter not greater than 0.25 the depth of the joist, should be drilled along the centre line and should not be closer than 3 diameters c/c and located between 0.25 & 0.4 times the span from the support. Herringbone struts min 38 x 38mm Solid blocking minimum 38mm thick Strutting and blocking at least 3/4 of the joist depth. Floor void between joists to incorporate minimum 100mm of Rockwool Flexi quilt (minimum density 10kg/m³). 1 layer of 12.5mm plasterboard, with 3-5mm skim coat. Achieving minimum 30 minute fire resistance.

DPCs

New sections of cavity wall to incorporate PVC type dpc at finished ground floor level. Vertical dpc to be fixed to the rear of the wall connector. Polypropylene cavity trays to be installed in cavity walls above all openings. All cavity trays complete with weepholes @ maximum 1000mm ctrs to BS5628 Part 3. Cavity tray to be installed where mono pitch roof abuts side house wall.

Cavity Walls

New sections of cavity wall to be 250mm (to be confirmed on site) overall construction to comprise of 102mm outer skin of facing brickwork to match existing precisely and inner skin of 7N/mm² medium dense block-work.

Both skins laid on 1:6 mortar mix with plasticiser, struck flush joints and bonded together with stainless steel cavity wall ties spaced 750m horizontally and 450mm vertically, staggered in alternate rows. Cavity ties to be installed at all door and widow reveals every 225mm in height and within 225mm of any opening. Cavity ties cavity width:- 50 to 75mm tie length 200mm 76 to 100mm tie length 225mm 101 to 125mm tie length 250mm 126 to 150mm tie length 275mm wall tie to BS EN 845-1, type 1, type 2 (cavity up to 100mm), type 3, type 4 (cavity up to 100mm) All cavities closed at eaves, door and window openings with Thermabate or similar insulated cavity closer's 100mm cavity partially in-filled with 50mm Kingspan Kooltherm K108 Cavity Board (thermal conductivity 0.018W/mK), to provide a maximum "U" value of 0.28 W/m²K, or Internally lined with Kingspan K118 - 67.5mm insulated plasterboard - (thermal conductivity 0.018W/mK), to provide a maximum "U" value of 0.28 W/m²K. Internal block wall to be jointed and dry-lined with 12.5mm plaster board with a 3-5mm skim coat. New brick/block work to be tied to existing via stainless steel strongwall connectors fixed directly to existing brickwork as per manufacturers recommendations. Vertical dpc to be fixed to the rear of the wall connector.

Non-loadbearing partitions

135mm Comprising of 75mm x 50mm regularized timber studs @ 400mm centers, with 75mm timber continuous header and sole plates, intermediate noggins at spacing's not greater than 900mm and with 12 mm plywood & 12.5mm plasterboard and skim both sides. All stud partitions to have 65mm thick isover acoustic partition insulation quilt between studs, partitions within bathrooms/en-suite to incorporate foil-backed plasterboard internally.

Lintels

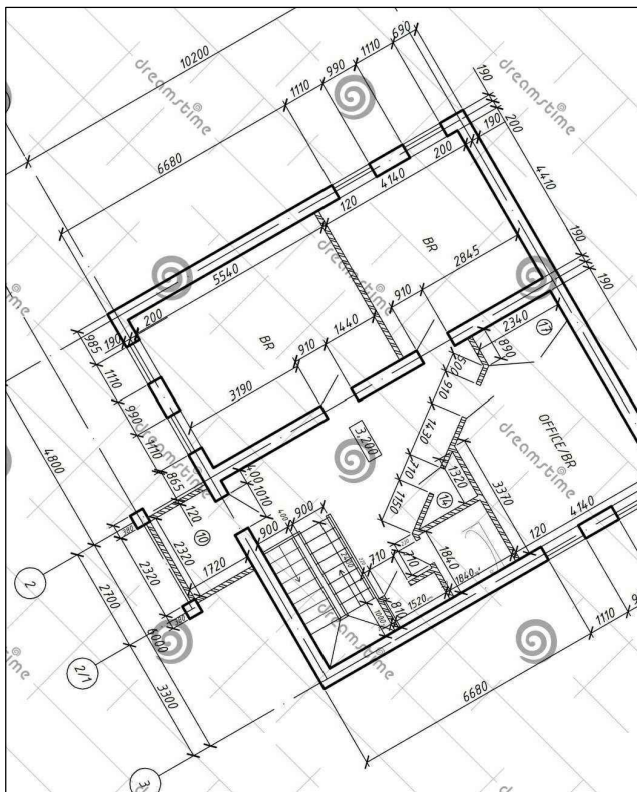
New steel beam arrangement, design to structural engineers details, supported off pre-cast concrete pad stones. (details to be forwarded and included) All structural steelwork to be provided with half hour fire resistance either by proprietary painting or by encasement or a combination of both.

Structural supports to new openings within existing and proposed walls to be provided by IG or similar lintels as follows:-

Openings 600mm - 1200mm in cavity walls: IG L1/SD TBC 88mm high minimum 150mm end bearing. Openings 1350mm - 1500mm in cavity walls: IG L1/SD TBC 85mm high minimum 150mm end bearing. Openings 1650mm - 1800mm in cavity walls: IG L1/SD TBC 107mm high minimum 150mm end bearing. Openings 1950mm - 2100mm in cavity walls: IG L1/SD TBC 125mm high minimum 150mm end bearing. Openings 2250mm - 2400mm in cavity walls: IG L1/SD TBC 150mm high minimum 150mm end bearing. Openings 2550mm - 2700mm in cavity walls: IG L1/SD TBC 162mm high minimum 150mm end bearing. Openings 2850mm - 3000mm in cavity walls: IG L1/SD TBC 171mm high minimum 150mm end bearing. Openings 3150mm - 3600mm in cavity walls: IG L1/SD TBC 200mm high minimum 150mm end bearing. Openings 3750mm - 4050mm in cavity walls: IG L1/SD TBC 200mm high minimum 150mm end bearing. Openings 4200mm - 4800mm in cavity walls: IG L1/SD TBC 200mm high minimum 150mm end bearing. **All to be approved by Structural Engineer**

Precast concrete lintels Naylor S4 to be laid over openings in walls for Drainage Services New openings Lintels to be laid level and have min. end bearing of 150mm, and cased internally to give ½hr fire protection.

1. TO BE READ IN CONJUNCTION WITH ALL OTHER CONSULTANTS / SPECIALISTS DRAWINGS. REPORT ANY DISCREPANCIES BEFORE AFFECTED WORK COMMENCES
2. ALL SETTING OUT DIMENSIONS TO BE CHECKED ON SITE BY CONTRACTOR BEFORE WORK COMMENCES
3. CONTRACTORS ATTENTION IS DRAWN TO THEIR RESPONSIBILITY UNDER THE 2015 CDM REGULATIONS
4. BEFORE YOU PROCEED WITH YOUR LOFT CONVERSION PROJECT, YOU MAY NEED TO DRAW UP A PARTY WALL AGREEMENT. HENCE THE NEED FOR A PARTY WALL AGREEMENT LOFT CONVERSION AGREEMENT. THIS IS A LEGAL AGREEMENT WHICH HELPS MINIMISE THE IMPACT THAT THE WORK MAY HAVE ON YOUR NEIGHBOURS AND HELP PROTECT THE INTERESTS OF ALL PARTIES INVOLVED.



RJ DESIGN (NW) LTD
07734-911-515
robjones@rjdesignsnw.co.uk

John Holness
07811-973-281
j.holness@hotmail.co.uk

client 2a Alder Road
Prescot
Liverpool
L34 2SQ

project PROPOSED FIRST FLOOR
EXTENSION, FRONT ELEVATION
AMENDMENT TO APPROVED
APPLICATION 19/00625/FUL -
Proposed First Floor Extension
23.5m²
SECTION A-A & BUILDING
REGULATION NOTES.

drawing title
drawing number 0001-03a

revision *

drawing status Planning - Building

scale 1:25 - @ A1

date Nov 2019 - Jan 2022

drawn by RJ

checked by RJ

Windows & Doors

New windows to be UPVC & Aluminum with minimum 20mm krypton filled gap double glazing, soft coated to achieve maximum "U" value of 1.5 W/m²C with fully draught stripped operable light equivalent to minimum 1/20th floor area for purge ventilation and including minimum 5,000mm² trickle vents per habitable rooms for background ventilation. Frame to be lapped minimum 30mm across cavity closer in accordance with Part L1A paragraph 52 and Robust detail 4.12 of Limiting Thermal Bridging and air leakage Robust Construction details for dwellings similar buildings amendment 1 TSO 2002. Safety glazing is required in all critical locations i.e. between finished floor level and 800 mm above that level in internal and external walls and partitions and between finished floor level and 1500 mm above that level in a door or in a side panel within 300 mm to either edge of the door, safety glass to comply with BS6206. All new windows to incorporate unobstructed clear opening of 0.33m² and at least 450mm high and 450mm wide, with bottom of open-able area no more than 1100mm above floor level.

Ventilation Generally

Provide mechanical ventilation, extract ventilation rates:- intermittent extract

- Kitchen - 30Ltr/s at the hob within 650mm to 750mm above the hob surface or 60Ltr/s elsewhere
- Utility room - 30Ltr/s with 15 minute minimum over run
- Bathroom - 15Ltr/s with 15 minute minimum over run
- All vents to external atmosphere, via wall or roof vent.

New windows to habitable rooms to provide a minimum of 5000mm² equivalent background ventilation New windows to bathrooms & utilities to provide a minimum of 2500mm² equivalent background ventilation rooms with no operable windows, i.e. and internal room, all fans to have a 15 minute minimum over run. Purge ventilation to be a minimum of 1/20th or 5% of the floor area of the room. Doors to be undercut by 10mm from finished floor level

Leadwork

Typical abutment detail to include Code 3 lead soakers, minimum upstanding 75mm, lapping minimum 100mm under each tile, overlaid with Code 4 lead flashing (stepped). Code 4 Apron flashing to be installed at abutment of new roof with external wall, lapped minimum 75mm up brickwork minimum 150mm down slates. Mortar to be removed to a minimum depth of 25mm, minimum 6mm wide joint to allow installation of Hall Clips to hold the lead flashing. Hall clips to be installed minimum 1 clip per stepped flashing or maximum 450mm centres where flashing's overlap and when fitting linear flashings. Joint to be pointed with BLM lead pointing sealant. All leadwork formed and installed in accordance with best practice and the BLM British Lead basic fitting guides complying with BS EN 12588

Existing foundations to be exposed and confirmed as acceptable by Building Control or Structural Engineer.

(A-A) Section A-A
Scale: 1:25 @ A1

