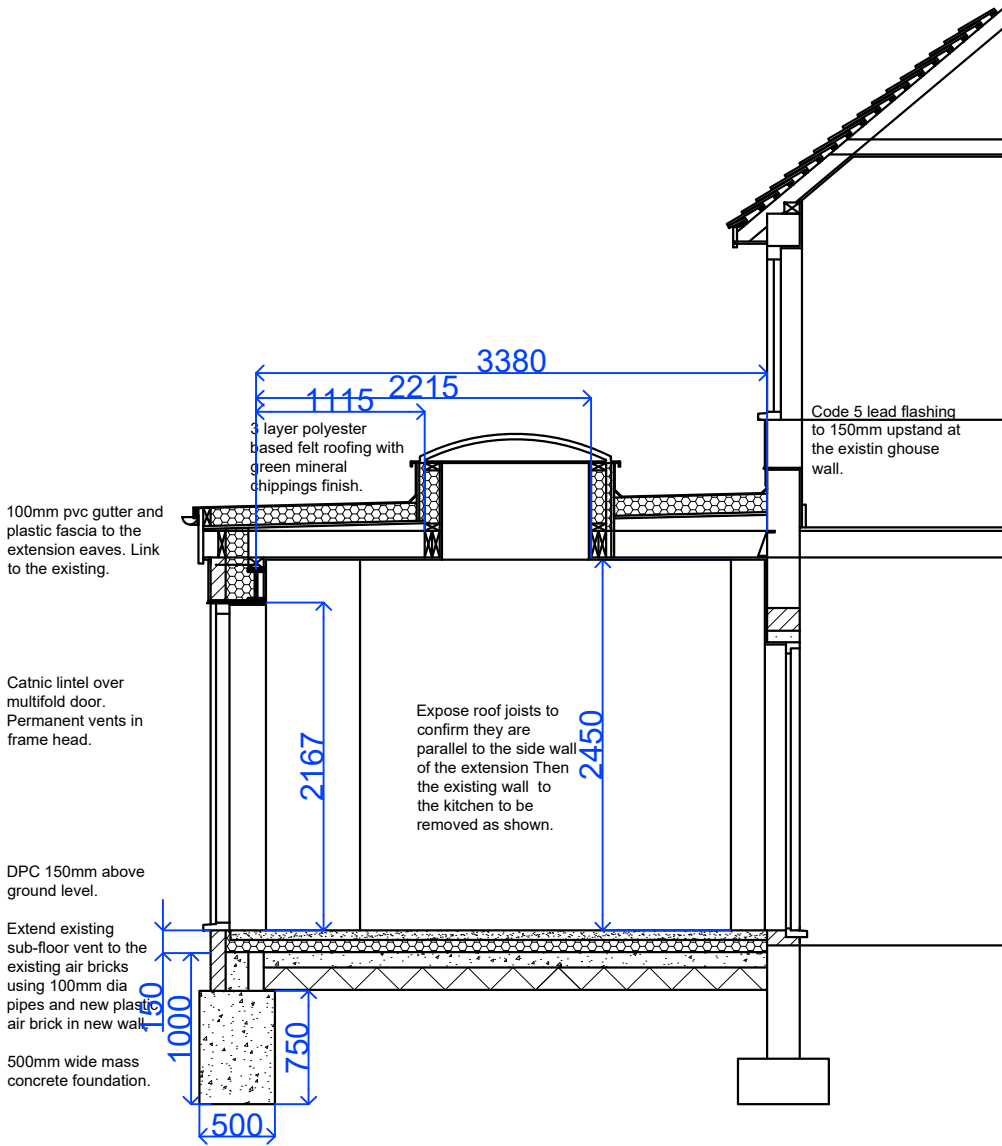




Building Control Queries Response.

Part B - Fire safety - Volume 1 - Dwellings (2022)

Existing personal door from the garage into the new extension to be a 30 minute fire door with smoke seals and self-closing device. Existing step down into the garage is 100mm as per AD.B 5.7 and diagram 5.1.

Part C - Resistance to contaminants and moisture (2013)

where the new wall is attached to the existing the cavity is to be maintained by cutting the outer skin of brickwork and inserting a vertical DPC to avoid dampness and heat transmission across the cavity.

Insert a Cavity Trays Ltd horizontal DPC into the outer skin of the existing cavity wall at 150mm above the extension roof level. The DPC to be lapped to the roof upstand and flashing detail.

The existing house has a suspended floor so ensure 100mm dia ducts are laid in the new floor to extend underfloor ventilation to the new external wall. Fit new air bricks in the external skin of the wall.

Part F - Ventilation - Volume 1: Dwellings (2021)

Provide the existing ground floor shower room with a mechanical ventilation fan to provide 30 litres per second ventilation. The ducting to be taken through the roof between the roof joists and turned up to discharge above the new flat roof. Include a mushroom vent terminal to weather protect it.

Part H - Drainage and waste disposal (2015)

Rainwater to be disposed to existing storm sewer if available. If not then dispose to soakaway as shown on the drawing.

Part L - Conservation of fuel and power - Volume 1: Dwellings (2023)
See Calculation

Specification Notes.

Foundations.To be deep strip foundations in mass concrete 1:2:4 mix. Minimum 1.00m deep into alluvial flint subsoil or to depth of the existing foundation which ever is the deepest. Notify the designer if ground conditions are not as anticipated.

External Walls. Join new walls to the existing by cutting outer skin to maintain cavity. New skins of the wall to be connected using stainless steel crocodile ties. The new walls to be in cavity blockwork rendered externally with cement /sand 1:4 with waterproof additive. Bell cove stainless steel trim to head of opening and at DPC. Render not to bridge the DPC. Finish to match the existing walls. Construct the new walls as a cavity construction with 150mm cavity near full filled with 115mm mm Kingspan Kooltherm K106 polypropylene fleece (grey facing to face outwards). The outer skin to be in dense concrete blocks. The inner skin to be in 100mm dense concrete blockwork to DPC then medium density blockwork above - Celcon standard blocks or similar approved. Skins tied at 5 ties per m² and at each course to reveals with Catnic Stainless steel ties. 30X5mm mild steel lateral restraint strap to the side wall mid span.

Close reveals of the cavity with Thermabate twin flange insulated closers. Hyload Plastic DPC to walls generally at 150mm above external ground level.

Catnic Extreme Load Steel Lintel code CLX350/3300 over the multifold door opening with 150mm bearings each side of the 3.00m (max) opening .

Internal walls.The kitchen wall made internal is non loadbearing as the roof joists span perpendicular to the rear wall of the house. The wall is to be taken down as shown on the drawing. Remove door and window and clear away.

The shower room window is to be removed. The opening to be blocked up with 100mm medium density blockwork and plaster finished.

The wall to the garage and play room is to be similarly treated - removing the window and door with the frame. Raise the door opening to accord with the extension floor level. Provide a new 63mm pre-cast pre-stressed concrete lintel over with 100mm bearing each side of the opening. Supply and fit a new half hour fire resisting $\frac{30}{80}$ door and frame. Opening to be reversed to open into the garage / play room. Threshold to be 100mm.

Roof Structure - Form the extension roof using a traditional form of cut roof joists fixed in galvanised steel joist hangers at the existing house wall. New 75 x 100 softwood wall plate bedded onto the new cavity walls. C16 structural grade timber joists 47x195mm at 600mm centres. Herringbone strutting mid span, pitch or roof to be created with 1:40 firrings min. 12mm thickness. 18mm OSB decking with all edges supported on ex 75x50mm noggins. Lay over the decking a continuous vapour check compatible with the Kingspan insulation and bitumen finish. Overlay with 140mm Thermaroof TR27 Kingspan insulation.

Roof Covering . The new flat roof to be finished in torch on polyester based torch on felt in three layers with a green mineral finish. Laps to be made with the slope of the roof finish which is to be 1:40 gradient. Double angle fillet at the house wall and the joint between the new roof and the kitchen roof which will be at different levels. At the house wall cut the render finish 150mm above the roof level and fit a Code 5 lead flashing. 150mm felt upstand lapped with a 100mm flashing. Wedge and point into the masonry 25mm using lead wedges at 400mm centres. All lead to be cleaned and dressed with patination oil on completion.

Eaves - Finish eaves with Swish White PVC fascia system close to the wall face.
Rainwater Goods - 100mm white gutters Connect to the existing gutter and to the existing down pipe. To be Marley or similar approved.

Ceiling. Form the new ceiling with 12mm foil backed plasterboard. Skim finish.

Storm Drainage. Connect to existing system via the existing kitchen extension gutter.

Foul Drainage - Remove the existing manhole from its current position that would be inside the extension. Re-lay the drains to connect to a new externally positioned manhole. The expectation is that the drain can be reconnected to the existing to a drain to the rear of the kitchen extension. Where drains pass through walls support walls over on 00x65mm PCC lintel over the drain for each wall skin 100mm bearings each side. Pipes to be Marley PVC or similar approved underground drainage system with 100mm dia. pipes laid to fall 1:40 in bed and surround of pea shingle. Connect at invert of the existing drain run.

Multifold Doors.

To be grey finished aluminium thermally broken multi leaf door set. Double glazed sealed units in frames. Glaze with self cleaning laminated Pilkington gas filled low e 24mm overall gas filled sealed glazing units. Frame to have permanent ventilation slots fitted with insect guards. 10,000mm2 min opening ventilation for the frame in multiple slots.

Ground Floor Construction.

Break up the existing oversite paving. Excavate for new ground floors to reduce level to allow construction of the new floor. Lay 150mm type 1 hardcore. Sand blind. Lay over this a Visqueen DPM lapped to all DPC's. Lay 100mm concrete 1:2:4 mix. Lay over this 80mm Kingspan Kooltherm K103 insulation on polythene vapour barrier. Perimeter insulation to be provided in same material but 20mm thickness turned up at walls. 65mm cement/sand 1:4 screed with anti shrinkage cracking reinforcement. Floor to be finished level with the kitchen floor. Check clients flooring selection to ensure that allowance is made for differing floor finish thickness.

Heating - To be a steel panel radiator with TRV. Connect to the existing radiator circuit.

Lighting - The new lighting to be LED eyeball downlighters in the extension ceiling. Two way switch and allow for dimmable circuits.

External lighting to the rear with three No LED wall flooding fitting to the wall. A further 3 no. wall light to the front wall. Operate by motion sensors separately at front and rear with override switch.

Mechanical Ventilation - Provide and install a 100mm Unity CV 100 Greenwood Airvac or similar approved mechanical ventilation wall mounted extract fan to the shower room. Extract rate to be minimum of 30 ltrs. per sec. Kitchen to retain hood extraction to the external air through the roof. 60/litres per hour.

Rev A Building Regulations queries notes added 6th August 2024

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PROJECT Proposed Single Storey Rear Extension and
Internal Alterations

DRAWING Section A - A

Scale
1:50 at A3

Drawn by
Keith Walker

Date
May 2024

Drawing No
202404/07A