### **FOUNDATIONS**

building control approval. Foundations to be level with or lower than invert of adjacent sewer pipe, Lintels to be provided in walls where drains pass through (no load to be transferred to drain)

## FLOOR CONSTRUCTION

Concrete blocks run around the edge with 3 layers of damp stopping plastic sheeting over the blocks and 450mm up the surrounding walls, add 90mm Celotex and 60mm screed on top.

New foundations to be a minimum of 600mm wide and 1000mm deep mass concrete trench fill footings unless noted otherwise. Formation level to be agreed on site with Building C O

#### **NEW WALL TO EXISTING**

The wall between the proposed extension and the existing house is to be upgraded by screwing 100mm tannolised wood beam studs to the wall @400mm centres and the space between the battens filled with 90mm Celotex insulation, with 10mm air gap. Fix 12.5mm plasterboard onto battens and finish with a skim coat of plaster.

## ELECTRICAL INSTALLATIONS (PART P REGS.)

Where electrical installation is to be carried out, compliance is necessary within the Electricity at Work Regulations 1989. Electrical installations should be enclosed and separated by appropriate distances to provide mechanical and thermal protection so that they incorporate measures that afford protection for persons against the risk of electric shock, burn or fire injuries. Electrical installations should be inspected and tested during, and at the end of installation, before they are taken into service to verify that they are reasonably safe; that is to say that they comply with BS7671:2001.

Provide energy efficient lighting in all living areas and kitchen in accordance with Part L1 B. Ensure that new fittings to habitable rooms have fittings that accept only lamps with a luminous greater than 40 lamp lumens per circuit-watt. Provide minimum 75% energy efficient lighting in all locations.

All light switches, plug sockets and electrical switches to be set between 450mm and 1200mm above finished floor level and comply with Part M of the Building Regs. All internal downlights and recessed spotlights are to be enclosed with minimum half hour fire resisting hoods, to comply with Part L of the Building Regs and the Domestic Building Services Compliance Guide.

### FIRE PRECAUTIONS

Means of escape to be via a protected stairway at all levels leading to a final exit, or give access to at least two escape routes at ground level. All habitable rooms with direct access to the protected stairway to be fitted with doors (##) giving 30 minutes fire resistance (FD30) marked with intumescent strips and fan lights within the stair enclosure to be fitted with 6mm Pilkington Pyroshield glass or Georgian wired glass. Any internal wall glazing within the stair enclosure to be changed to 15mm Pilkington Pyrostop glass.

# **GLAZING & VENTILATION**

Glazing in all doors to be fitted with safety toughened or laminated glass except fire doors. All external windows and doors to have double glazed units with a 16mm air gap and low-E glass on the inner pane. All new windows to achieve a minimum 'U' value of 1.6W/m and 1.8W/m k for all new doors with more than 50% glazing.

Habitable rooms to have a minimum opening of  $\frac{1}{20}$  of the internal floor area of the room with some part of that being at least 1750mm above finished floor level. Background ventiliation is to be provided by trickle ventilators within the window to give a minimum free area of 8000mm .

Safety glass to be used when lower than 800mm above the first floor level, all upper floor windows must be designed with means of escape. Shower/bathroom to have background ventilation of 4000mm and fitted with a mechanical extractor vented to outside air to achieve 15L/S extraction. Existing roof to be provided with proprietory ventilators to achieve the equivalent continuous ventilation of 25mm (eaves) and 5mm ridge.

## SMOKE DETECTION

Mains operated linked smoke alarm detection system to BS EN 14604 and

BS 5839 - 6:2004 to at least a Grade D category LD3 standard to be mains powered with back up shown thus Smoke alarms should be sited so that there are smoke alarms in the circulation space on the ground floor hallway, and all upper floor landings. Ceiling mounted alarms should be 300mm from the walls and light fittings.

