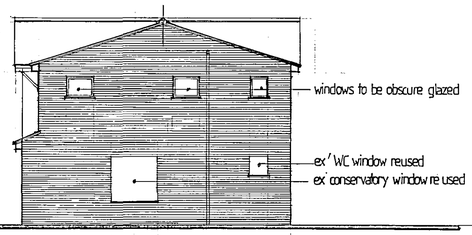
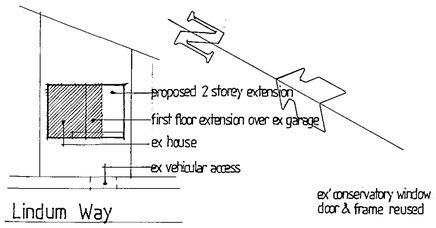


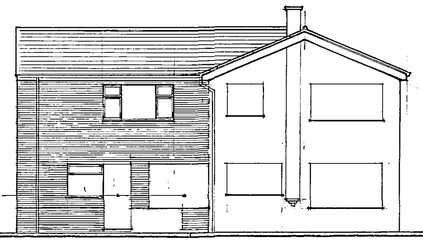
WESTERN ELEVATION



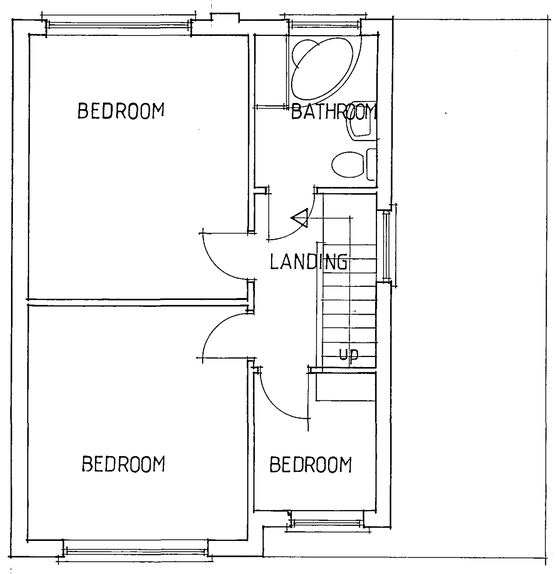
SOUTHERN ELEVATION



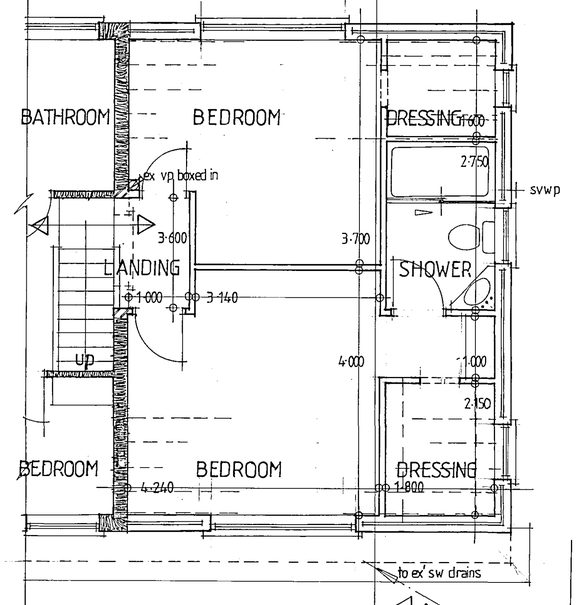
BLOCK PLAN



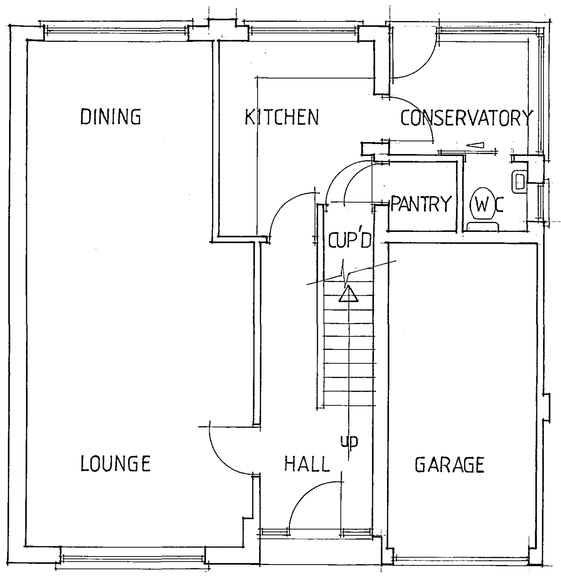
EASTERN ELEVATION



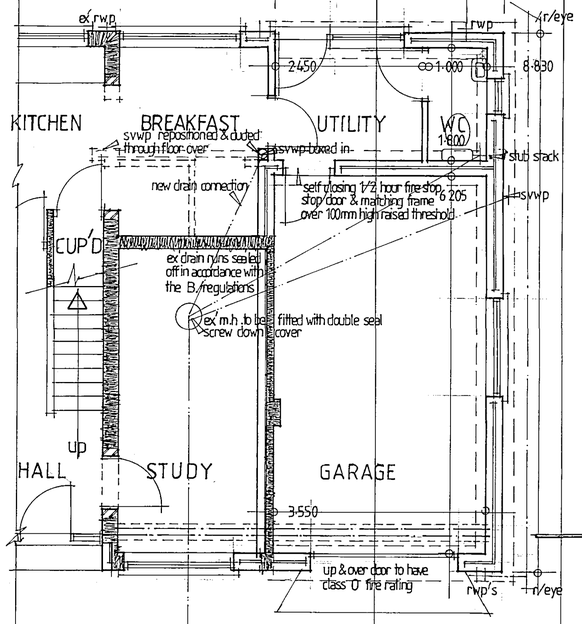
EXISTING FIRST FLOOR PLAN



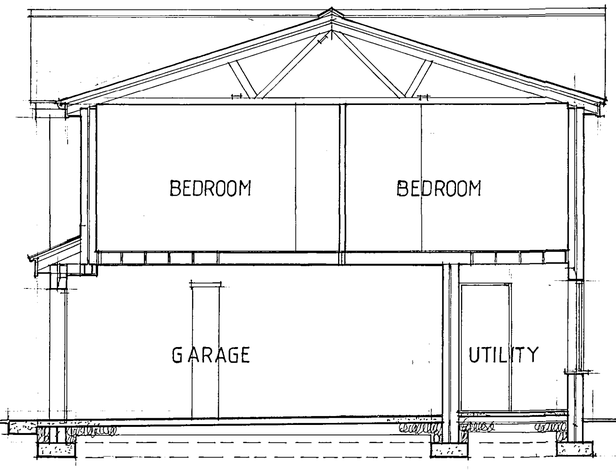
PROPOSED FIRST FLOOR PLAN



EXISTING GROUND FLOOR PLAN



PROPOSED FIRST FLOOR PLAN



SECTION A • A

SPECIFICATION

1. EXTERNAL FINISHES
A. To be built in red facing brickwork to match as near as possible the existing building.
B. Roof is to be covered in brown concrete interlocking tiles to match as near as possible the existing roof.

2. FOUNDATIONS
Provide concrete strip footings where shown dotted on the drawing in ST4 mix 610mm wide x 225mm thick. The existing footings to the garage & conservatory are to be exposed for examination by the Council's Building Inspector to ensure that these are a minimum of 225mm thick x 600mm & 450mm wide. All foundations are to be taken down to a suitable load bearing strata minimum 550mm deep increased to a minimum of 1.00m deep if shrinkable sub-soil is encountered.

3. WALLS
The 280mm cavity external walls forming the ground & first floor extensions are to comprise 115mm brick outer skin, 65mm cavity with 65mm 'Dritherm' insulation bops to the full height of the wall commencing as low as possible to the first floor extension & down to 150mm below the floor insulation to the two storey extension & carried through & linked with the roof insulation in both cases, 100mm lighweight insulation block inner skin in 'Thermalite' Turbo blocks or blocks having an equivalent 'U' value, 13mm dense or lightweight plaster finish internally to give 0.32W/m²K. Build in as the work proceeds twisted plastic wall ties to BS1243 spaced 900mm horizontally & 450mm vertically (max) with additional ties to all formed openings & vertical expansion joints. Provide mechanical fixings at the abutments of all new walls to the existing fixed strictly in accordance with the manufacturers instructions. Close cavities to external openings & reveals & at every cavity closure provide vertical & horizontal D.P.C's & cavity trays as appropriate. Build in as the work proceeds 'Catnic' or similar approved insulated combined lintels to all the external openings & standard 100mm corrugated lintels to the internal openings sized & fixed strictly in accordance with the manufacturers recommendations. The opening between the kitchen & breakfast area & between the 2 landings are to have 2No CN5XA lintels over Close cavities around all external openings with 'Thermalate' or similar approved insulated cavity closers. Provide pitch-polymer or bit-lead D.P.C's to any new walls at ground floor level. The ground floor partition forming the WC is to be built in 100mm lightweight insulation blocks off a thickened site slab minimum 450mm wide plus splays x 225mm thick. The first floor walls are to be formed with 100mmx50mm studding at 600mm centres with noggins at 800mm centres covered both sides with 13mm Gyproc wallboard TEN supported to all edges which may involve additional noggins as necessary. Incorporate within the partition cavity 25mm Isowool accoustic partition roll (1200) to give a Rw of 40dB. The walls are to be finished with a 5mm skim coat of plaster. Line the existing outer wall to the existing garage (Study) with 100x50mm studding at 600mm centres & fix between the studs 100mm Polyfoam Plus & cover with 12.5mm foil backed wallboard with all edges supported & finish with 5mm plaster skim coat.

4. SOLID FLOORS
The solid floors to the extension are to comprise of 150mm of mechanically compacted hardcore with 50mm compacted sand levelling covered with 1200mm polythene membrane brought up the sides of the site slab & tucked into the DPC 50mm. 100mm oversite concrete laid on 100mm Polyfoam Plus Floor board 220 with a 65mm cement and sand screed over to give 0.22W/m²K. The insulation & screed are to be omitted from the garage floor and same is to be laid to a fall to the doorway & be finished with a toe beam to the front edge. The existing garage floor is to be covered with a 'floating floor ' comprising 18mm flooring grade T&G jointed chipboard with all edges glued on Polyfoam Plus insulation to make up the difference between the existing floor level and the existing floor level to the hall.

5. SUSPENDED FLOOR
Form the suspended floor to the area of the first floor extension out of 170x50mm joists to be at not more than 400mm centres & include all necessary herringbone strutting & beam straps as reuired under the Building Regulations & cover with 19mm flooring grade T&G jointed decking. Note:- the joists are to be doubled up & bolted together beloww the first floor walls. Include in the floor 200mm glassfibre insulation over the garage which will involve packing down below the floor joists and cover the underside of the floor with 2 layers of 13mm plasterboard with joints staggered to give 1/2 hour fire resistance. Clad the steel supporting beams in a similar fashion. Incorporate within the remaining new floors Isowool general purpose roll within the cavities between the joists to provide sound insulation to give a minimum Rw of 40 dB.

5. WINDOW FRAMES
The window frames to the extension are to be PVCu units by an approved specialist manufacturer. All windows are to be double glazed with 24mm units with low 'E' glass to the inner skin of the DG units to give 2.0Wm²K. Safety glass complying with BS6206 is to be used in any doors, any glazing within 300mm of door edges & any glazing within 800mm of floor level. All windows to incorporate controlsple trickle ventilators giving 8000mm² free air space for habitable rooms & 4000mm² for non-habitable rooms & each to have fitted fly screens & in addition the window frames are to have openable areas equivalent to 1/20th of the floor area of the room they serve & each bedroom is to be provided with an escape opening light as defined in the BUilding Regulations.. The window frames are to be recessed in the openings to ensure a minimumm of 30mm overlap of the frame with the insulated cavity closer.

6. ROOF
The roof covering is to comprise of concrete interlocking tiles to match as near as possible those on the existing roof & suitable for a 17.5° pitch & fixed strictly in accordance with the manufacturers instructions laid on treated battens complying with BS4471 on 'Tyvek' Supro-Plus breather underlay laid with 150mm laps & to be fully supported at eaves level with proprietory over fascia ventilation units giving an equivalent airspace to a continuous 25mm gap to the roof perimeter. All vent units are to be fitted with fly screens It will be necessary to provide 2 No tile face vents at high level to the lean to roof in order to maintain the through flow of air. The roof is to be fabricated with 'Fink' type prefabricated gang nailed roof trusses by a specialist manufacturer complying fully with BS5268 pt3, 1985 & fixed strictly in accordance with the manufacturers instructions at 600mm centres (max). Additional strengthening timbers are to be incorporated in the roof structure in accordance with TRDA tech' bulletin No1 comprising 2No 100x25mm ceiling binders, 100x25mm ridge binder, 100x25mm bracings on internal members and diagonal ceiling ties, 100x50mm continuous wall plate bedded in cement sand mortar (1:3) with 5mm MS anchor straps at not more than 1.800m centres. Provide and fix 5mm gable straps to the spars & ceiling joists in accordance with the Building Regulations. If water storage tanks are to be positioned in the roof then additional supporting timbers are to be provided in accordance with BS5268 pt3. Provide and fix 5mm MS gable straps as appropriate at not more than 2.00m centres to span 3 trusses and provide & fix packing between the wall & the first truss. All structural timbers are to be SC3 grade timber and any timbers which are to be concealed or built in are to be pressure treated with an approved preservative. The roof space is to be insulated throughout with 100mm Crown Wool insulation laid between the ceiling joists with 150mm Crown wool insulation laid over in the opposite direction to give 0.16W/m²K. The insulation is to be well tucked in at the eaves to give continuity with the wall insulation and baffle boards are to be provided at eaves level to maintain the 25mm air gap. Provide 25mm deal fascias & exterior quality soffit boards all to match those on the existing roof & provide & fix PVC gutters and downpipes in the positions indicated to match those on the existing roof and connect to the existing SW drains. The ceilings to the extensions are to be formed with 13mm foil backed plasterboard which is to be fixed and supported on all edges with additional noggins as appropriate and finished with either a 5mm plaster skim coat or Artex compound as directed by the client. An insulated access hatch is to be incorporated into the new roof spaces on the landing and to be weatherstripped as per the Building Regulations.

SPECIFICATION cont'

7. FIRE DETECTION
Provide mains operated smoke detector to the new utility room & to the hall & landing (if not already fitted) with their own dedicated electrical supply. The units are to be interconnected and comply fully with BS5446.

8. VENTILATION
Provide mechanical extraction to the new shower room & toilet to give 15 litres per sec' extraction rate (min') and to the utility room to give 30 litres per sec' extraction rate.

9. DRAINS
All drain fittings are to be in UPVC ware complying fully with & installed in accordance with approved Document H (2002) edition of the Building Regulations 2000. All sanitary fittings are to have 32mm int' dia wastes (min') & 75mm deep seal traps & all pipe runs are to have rodding access points at each change of direction. All above ground drains are to comply with BS5572. The shower & WC & basin are to be connected to the new SVWP where shown & a new back inlet gully & connection are to be provided to pick up the watse water from the utility room & the new drain runs are to discharge to the existing MH where shown. The new RWP's are to be connected into the existing SW drains.

10.CENTRAL HEATING & WATER HEATING
The heating for the extensions is to be from the existing gas fired combi boiler with balanced flue situated in the bathroom & connected to the radiator system serving the existing dwelling. The additional rooms are to be heated by radiators, each having individual thermostatic controls. The hot water supply to the new sanitary fittings are to be fed from the existing HW system & the pipework is to be insulated where passing through concealed or unheated areas & up to 1.000m from the cylinder. Pipe insulation is to have a thermal rating of 0.45W/m²K and a thickness equal to the outside diameter of the pipe up to a maximum thickness of 40mm.

11. STRUCTURAL CALCULATIONS.
Manufacturers calculations for the roof trusses are to be submitted to and approved by the Local Authorities prior to any works relating to these items is put in hand. The design calculations for the supporting steelwok over the study & garage are to be submitted to & approved by the LA prior to this work being put in hand.

12. FLASHINGS
Flashings, soakers and secret gutters as appropriate are to be provided at all intersections in code 4 lead in accordance with the BS code of practice. Provide & fix pre-formed cavity trays above the window/door openings on the gable ends with weep holes spaced in accordance with the manufacturers instructions. The valley gunters are to comprise pre formed glassfibre units by a specialist manufacturer fixed in accordance with their specification.

MR & MRS P ROBINSON
22 LINDUM WAY
DONINGTON SPALDING
LINCOLNSHIRE PE11 4TX

PROPOSED EXTENSIONS

Note:- The Contractor is to be responsible for checking all dimensions on site prior to works being put in hand and will also be responsible for setting out the works and determining levels.

WORKING DRAWING

DRAWING NO	03 : 38 : 02
DATE	OCTOBER 03
SCALES	1:50 1:100 & 1:500
AMENDMENTS	

BARNHAY DESIGN SERVICES
ARCHITECTURAL TECHNOLOGISTS
THE LIMES' COWBRIDGE BOSTON
LINCOLNSHIRE PE 22 7 AY
TELEPHONE / FAX 01205 : 367185

SHDC
PLANNING & DEVELOPMENT
27 OCT 2003
Ref 1284/03
DETERMINED
PLAN