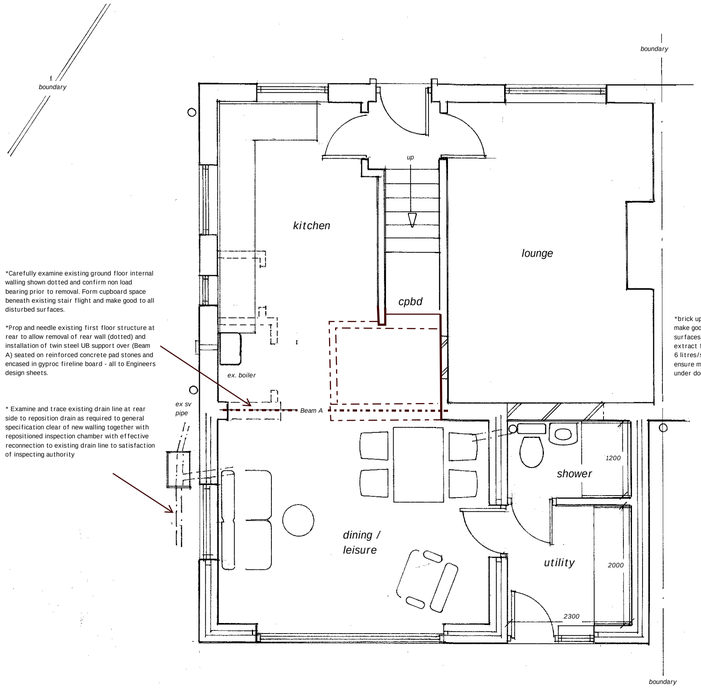
Proposed Extensions and Alteration at 5, Stonehouse Crescent, Werrington, Staffs. - *Scale 1-50 ref SC1b August 2016*

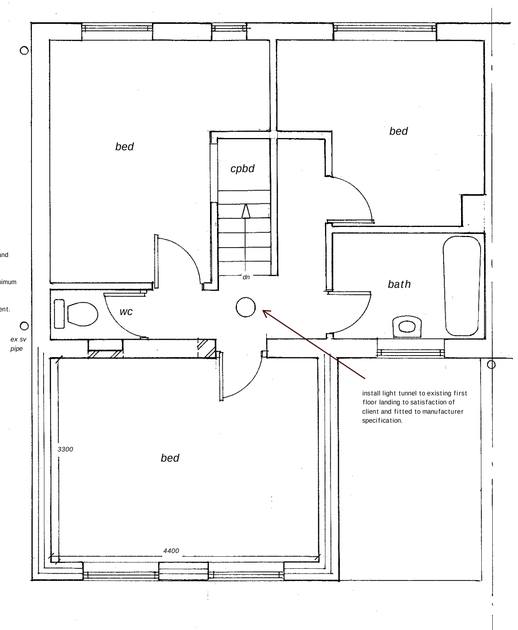


*Carefully examine existing ground floor internal walling shown dotted and confirm non load bearing prior to removal. Form cupboard space beneath existing stair flight and make good to all disturbed surfaces.

*Prop and needle existing first floor structure at rear to allow removal of rear wall (dotted) and installation of twin steel UB support over (Beam A) seated on reinforced concrete pad stones and encased in gyproc fireline board - all to Engineers design sheets.

* Examine and trace existing drain line at rear side to reposition drain as required to general specification clear of new walling together with repositioned inspection chamber with effective reconnection to existing drain line to satisfaction of inspecting authority

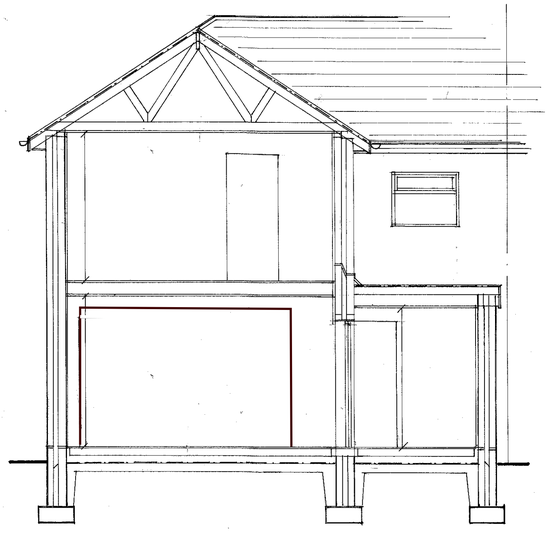
proposed ground floor



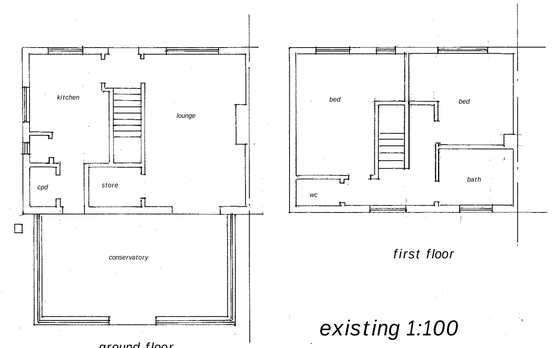
*brick up existing wc window and make good to all disturbed surfaces. Install mechanical extract fan set to achieve minimum 6 litres/sec extract rate and ensure minimum 12mm air gap under door for air replenishment.

install light tunnel to existing first floor landing to satisfaction of client and fitted to manufacturer specification.

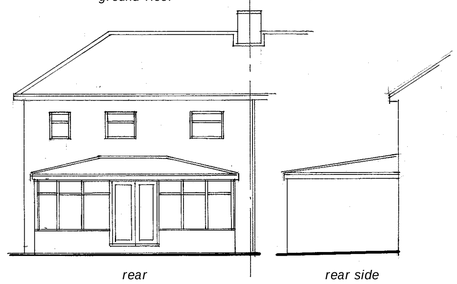
proposed first floor



section view at A

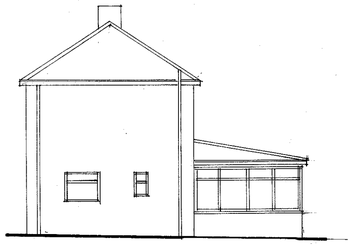


existing 1:100



rear

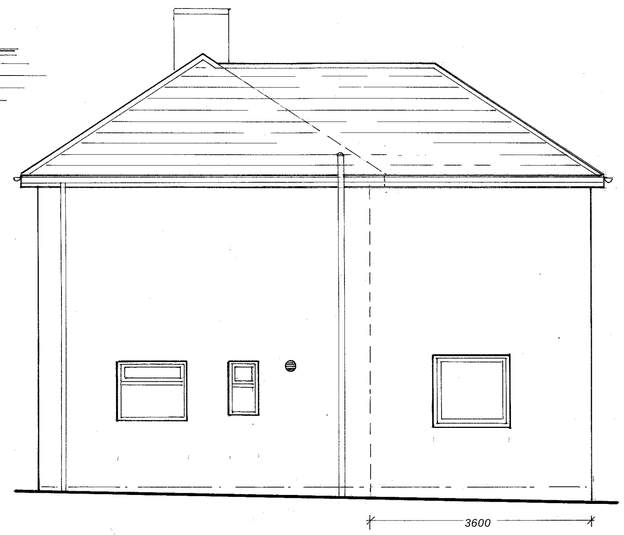
rear side



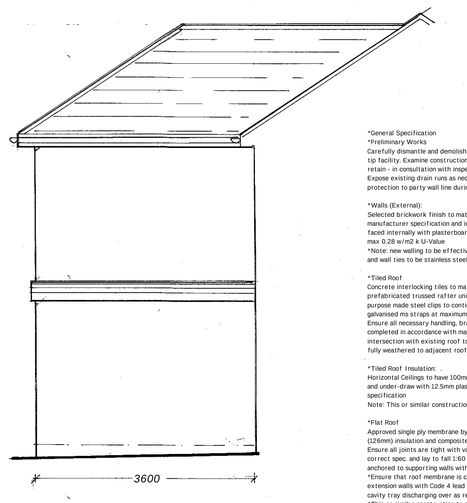
side



proposed elevation to rear



proposed elevation to side



proposed side elevation to rear

*General Specification
*Preliminary Works
Carefully dismantle and demolish existing conservatory at rear and remove all rubble from site to approved tip facility. Examine construction, level and general condition of existing floor to assess if fit for purpose to retain - in consultation with inspecting authority.
Expose existing drain runs as necessary to establish all pipes clear of proposed works. . Ensure full protection to party wall line during construction with mutual consent of adjoining neighbour.

*Walls (External):
Selected brickwork finish to match existing, min 100mm cavity enclosing Dritherm 32 insulation fill to manufacturer specification and internal leaf of 100mm load bearing thermal blockwork (eg: Celcon Solar) faced internally with plasterboard on treated battens or cement dabs.This or similar construction to achieve max 0.28 w/m2 k U-Value
*Note: new walling to be effectively bonded to existing structure to satisfaction of local authority surveyor and wall ties to be stainless steel suitable for 100mm cavity width and compliant with DD140.

*Tiled Roof
Concrete interlocking tiles to match existing on treated battens on approved breathable membrane over prefabricated trussed rafter units by specialist design and supply compliant with BS5268 secured with purpose made steel clips to continuous 100x75mm sw wall plate anchored to supporting walls by approved galvanised ms straps at maximum 2000mm centres.
Ensure all necessary handling, bracing and lateral restraint strapping to roof frame and adjacent structure is completed in accordance with manufacturer specification and compliant with BS5268. Form valley intersection with existing roof to truss manufacturer specification with approved pre-formed valley units fully weathered to adjacent roof frames.

*Tiled Roof Insulation: .
Horizontal Ceilings to have 100mm rock wool between joists and a further 200mm thickness laid across joists and under-draw with 12.5mm plasterboard incorporating vapour check membrane all to manufacturer specification
Note: This or similar construction to achieve max 0.16 w/m2k U-Value.

*Flat Roof
Approved single ply membrane by specialist contractor on min 18mm ext ply deck over Celotex TD4000 (126mm) insulation and composite deck incorporating vapour control layer and bonded 5mm deck ply face. Ensure all joints are tight with vapour sealant to manufacturer spec. Secure Td 4000 with helical fixingsto correct spec. and lay to fall 1:60 across 170 x 47mm sw C16 joists at 450mm max centres . Joists to be anchored to supporting walls with galv ms straps at 1000mm max centres.
*Ensure that roof membrane is carried up minimum 150mm at abutment with existing house and new extension walls with Code 4 lead cover flashing dressed into brick coursing and made good with 2000g dpc cavity tray discharging over as required subject to requirements of inspecting authority surveyor.
*This or similar construction to achieve max 0.18 w/m2K U-Value
*Note install built up fascia shown in v-joint lapped pvc cladding or reduce fascia depth with shortened joist noggins as required.

*General Drainage specification: .
UPVC rainwater goods to match existing carried to existing system as required. Any alteration to existing internal plumbing to satisfy BS5572 with 75mm deep seal traps as required. New Shower Room wastes to discharge to new 100mm pvc stub stack fitted with Durgo or similar approved air admittance valve set above flood level of appliances. *Shower to discharge to 100mm accessible running trap with double seal air tight cover or set on plinth to allow falls to stub stack.
*Lay new 100mm pvc drains on granular bed at 1:40 falls to discgharge to existing IC shown. Ensure full protection and support to all drains passing beneath building.

* Internal Walls (non load bearing)
100x47 sw timber stud faced on 100x75mm sole plate and dpc. and faced with plasterboard incorporating vapour check and enclosing 100mm rockwool insulation.

*Foundation Detail:
Lay new 600mm wide trench filled concrete strip to abut adjacent foundations reinforced with 2 no layers BS03 steel fabric at depth to suitable bearing strata and also carried to agreed depth with inspecting authorities to ensure no surcharge to invert of existing drainage lines.

*Lintels
Install Catnic or similar combined steel lintels over new openings with minimum 150mm end bearings to manufacturer spec. Ensure heavy duty lintel over rear doors designed to allow for top hung door track.

*Floor - Ground ;
* If retained in situ:-
Thoroughly examine existing ground floor to ensure free from signs of rising or penetrating dampness. Make good any necessary repairs throughout.
* If replacement floor:-
Floor finish to client requirement on min 60mm screed or power float finish to 100mm concrete slab reinforced with A142 steel fabric on 1200g dpm over Celotex GA 4000 (70mm) insulation board turned up in 25mm thickness at floor perimeter to dpc to avoid cold bridge. Lay further dpm linked to dpc over well blinded natural stone, sulphate free hardcore compacted in maximum 150mm layers.
U-Value max 0.22 w/m2k - P/A ratio 0.76

*Floor - First:
21mm t&g boarding across 195x47mm sw C16 joists at max 400mm centres supported off heavy duty galvanised ms joist hangers fixed to comply with manufacturer specification. Provide suitable strutting at mid span with end wedges as necessary. Under draw joists with plasterboard to achieve min 30 minutes fire resistance incorporating vapour control membrane where required and enclosing 120mm Rockwool between joists. *Note any notching of floor joists for services to be minimal and compliant with BS5268 part 2-1991.

*Fenestration:
Install high performance double glazed upvc units to match existing style using Pilkington Low E 'k' glass and min 25mm cavity – max 1.60 w/m2 k U-Value
Opening casements to represent minimum 5% of adjacent floor as natural vent plus min 10000mm2 trickle ventilators to head of frame.
*Escape Window: Where required provide opening casements to habitable rooms capable of safe egress in emergency i.e. min 0.33m2 clear opening (say 800x450mm) set within 1100mm of internal floor level.
Ensure that all doors and critical window areas are fitted with laminated or toughened safety glazing compliant with current BS:EN:12150.

*Ventilation:
Natural vent as above plus install mechanical ventilation set to the following rates as required:-
Utility - 30 litres sec
Shower/wc - 15 litres/sec
First Floor WC -6 litres/sec

*Electrical Work:
All notifiable electrical work to be carried out by a suitably qualified contractor registered with an approved national body. A formal completion certificate to be issued in compliance with current Part P building regulations and to satisfaction of local authority surveyor
Note: all lighting to be low energy type
* Install a mains operated inter-linked smoke alarm system with battery back up to circulation areas and critical locations in compliance with BS5839 and to satisfaction of local authority surveyor.

Note This drawing has been prepared for submission to the local authority for necessary statutory approvals. Nominated contractor to verify all dimensions either written or scaled together with drainage lines and inverts etc. prior to commencement of formal construction work on this site. All works to be carried out with full agreement of adjoining neighbours and any disturbance to boundary line to be made good to satisfaction of all parties.

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