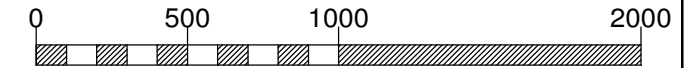


DO NOT SCALE - IF IN DOUBT ASK

NOTE.

PLEASE READ THIS DRAWING IN CONJUNCTION WITH GENERAL ARRANGEMENT PLAN 09:166/02 AND 'AS EXISTING' PLAN 09:166/01



scale in millimeters

DESIGN U VALUES:

EXTERNAL TIMBER FRAMED WALLS = 0.29 W/M2k

PITCHED VENTILATED 'COLD' ROOF (Insulation between and below rafters) = 0.18W/M2k

WINDOWS (double glazed 4/16/4 low E Argon filled) = 1.8W/M2k

White UPVC squareline gutturing and downpipes to match exist.

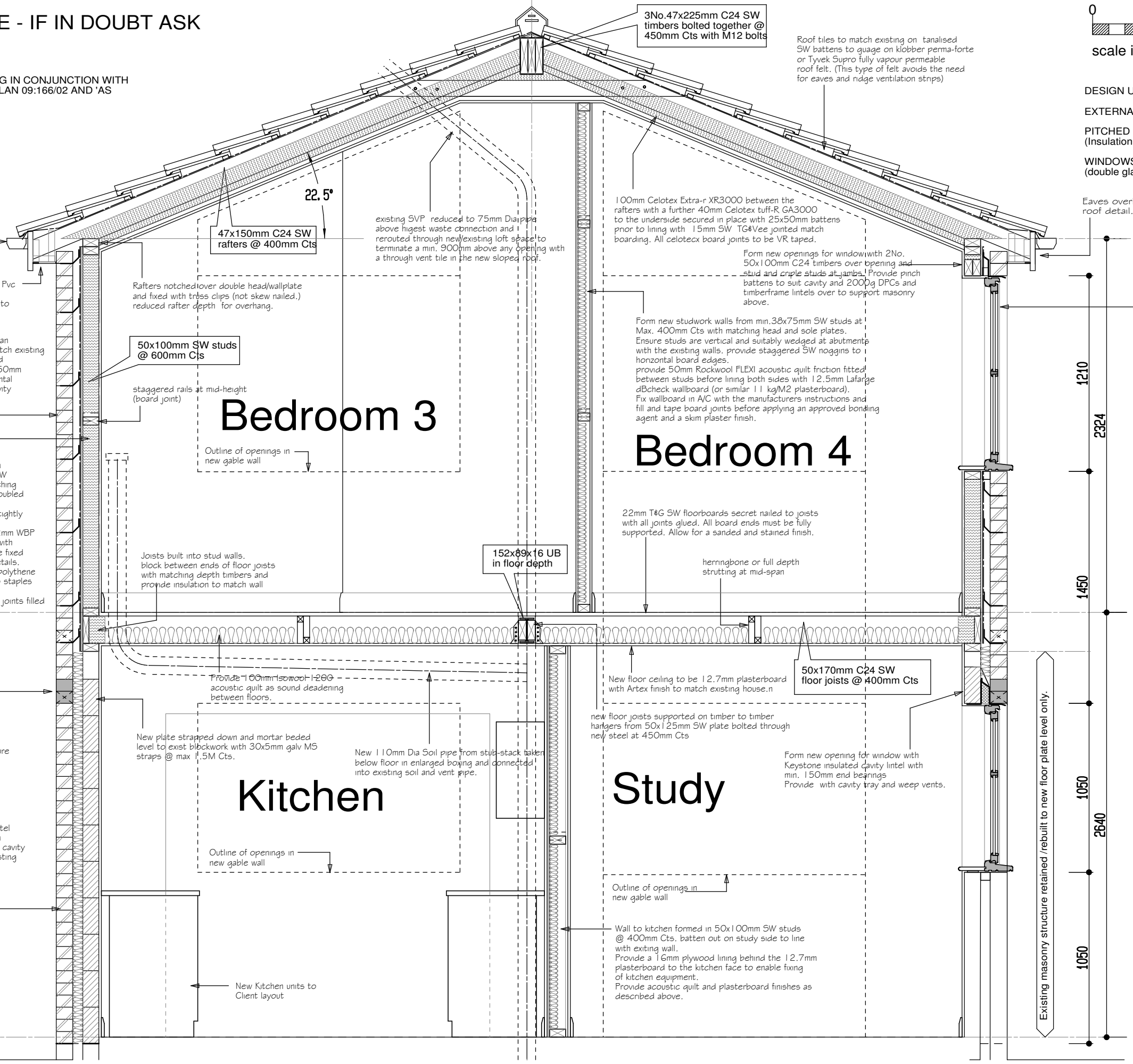
Nom. 225x25 Pvc fascia and 10mm Pvc Multi-board soffit to match existing. Provide proprietary eaves vent strip to provide additional ventilation.

New external wall constructed with an outer leaf of facing brickwork to match existing brickwork skin tied to timber framed wall with 55 timber frame ties at 450mm vertical centres and 750mm horizontal centres across a nominal 50mm cavity

Inner skin Timber frame formed from 50x100mm preservative treated SW studs at 600mm max Cts with matching head and sole plates (head plate doubled up to take rafters @ 400mm Cts) Provide 100mm Celotex insulation tightly fitted in between studs. Studs sheathed on outside with 12mm WBP exterior grade plywood and faced with Tyvek Reflex timber frame membrane fixed in full A/C with the manufacturers details. Studs lined internally with a 500g polythene Vapour control layer fixed with A55 staples with all laps sealed. 12.7mm plasterboard lining with all joints filled and taped and skim finish.

cavity ventilated with through weep vents above existing masonry wall with 25mm eaves vent to soffit. Provide a 2000g dpc cavity tray at junction with exist cavity wall to ensure any moisture is channelled in front of any exist cavity wall insulation.

Existing Kitchen door, frame and lintel removed and opening blocked up in construction to match existing with cavity insulation. plaster out to match existing plaster depth.



47x150mm C24 SW rafters @ 400mm Cts

3No. 47x225mm C24 SW timbers bolted together @ 450mm Cts with M12 bolts

Roof tiles to match existing on tanalised SW battens to gauge on klobber perma-forte or Tyvek Supro fully vapour permeable roof felt. (This type of felt avoids the need for eaves and ridge ventilation strips)

existing SVP reduced to 75mm Dia pipe above highest waste connection and rerouted through new/existing loft space to terminate a min. 900mm above any opening with a through vent tile in the new sloped roof.

100mm Celotex Extra-r XR3000 between the rafters with a further 40mm Celotex tuff-R GA3000 to the underside secured in place with 25x50mm battens prior to lining with 15mm SW TG+Vee jointed match boarding. All celotex board joints to be VR taped.

Form new openings for window with 2No. 50x100mm C24 timbers over opening and stud and cripple studs at jambs. Provide pinch battens to suit cavity and 2000g DPCs and timber frame lintels over to support masonry above.

Form new studwork walls from min. 38x75mm SW studs at Max. 400mm Cts with matching head and sole plates. Ensure studs are vertical and suitably wedged at abutments with the existing walls. provide staggered SW noggins to horizontal board edges. provide 50mm Rockwool FLEX1 acoustic quilt friction fitted between studs before lining both sides with 12.5mm Lafarge dBeck wallboard (or similar 11 kg/M2 plasterboard). Fix wallboard in A/C with the manufacturers instructions and fill and tape board joints before applying an approved bonding agent and a skim plaster finish.

22mm T&G SW floorboards secret nailed to joists with all joints glued. All board ends must be fully supported. Allow for a sanded and stained finish.

herringbone or full depth strutting at mid-span

50x170mm C24 SW floor joists @ 400mm Cts

new floor joists supported on timber to timber hangers from 50x125mm SW plate bolted through new steel at 450mm Cts

Form new opening for window with Keystone insulated cavity lintel with min. 150mm end bearings. Provide with cavity tray and weep vents.

Wall to kitchen formed in 50x100mm SW studs @ 400mm Cts. batten out on study side to line with existing wall. Provide a 16mm plywood lining behind the 12.7mm plasterboard to the kitchen face to enable fixing of kitchen equipment. Provide acoustic quilt and plasterboard finishes as described above.

Eaves overhang adjusted to match adjacent roof detail.

NEW WINDOWS

Provide new white upvc framed window factory fitted with 24mm (4/16/4) argon filled double glazed units with low emissivity glass.

provide a controllable background ventilators fitted to the head of the windows to provide min 5000sq.mm equivalent area or suitable approved partial opening/lockable arrangement.

All casements must be fully weather sealed

Window to provide means of escape to room and should have a clear opening for exit of 0.33sq.M with no opening less than 450mm wide. the opening section of the window must be between 600-1100mm above the finished floor level.

SMOKE DETECTION AND ALARM SYSTEM:

Provide and fit a fire detection and fire alarm system in A/C with BS 5839-G:2004 to comprise of mains-powered smoke alarms (with battery back-up) at each level, within the circulation spaces and interconnected using radio-links (standby duration must not be reduced below 72 hours or effect the lifetime of the alarm).

The smoke alarms may be connected to separate regularly used local lighting circuits, but must be capable of isolation from the lighting. Alternatively a single independent circuit from the dwelling distribution board can be used.

The alarm system should be designed and installed by a suitably qualified contractor and an installation and commissioning certificate provided and copied to the building inspector. Full operation details and manufacturers information must be provided to the occupants. Any electrical installation should comply with Approved Document P (electrical safety)

The alarms should be interlinked so that the detection of smoke or heat by one unit operates the alarm signal in all of them.

Alarms/Detectors should be sited within 7.5M of any door to a habitable room. They should be ceiling mounted and be a min. of 300mm from any wall or light fitting. The sensor must be between 25mm-60mm below the ceiling (25-150mm in the case of heat detectors/alarms).

Detectors must be sited so that routine maintenance can be carried out easily and safely. Alarms/detectors must not be positioned next to or above heaters or in overly hot or cold positions.

AS PROPOSED SECTION

Drawing No.	Rev No.	Date
09:166/05	---	June 2009

Scale 1:25 A3 size sheet.

CHRIS TODD M.C.I.A.T  
 CHARTERED ARCHITECTURAL TECHNOLOGIST  
 23 St. Audreys Close, Histon, Cambs. CB4 9JX  
 Tel: 01223 504199

SECTION B-B