LOFT CONVERSION PLANS

LOFT CONVERSION PLANS FROM £199

www.extension-design-plans.co.uk

LOFT CONVERSION BUILDING REGULATION GUIDANCE SPECIFICATION NOTES
LOFT CONVERSION SPECIFICATION – EXAMPLE SPECIFICATION

These notes do not comprise a full specification. They are for general guidance only and their primary function is to assist Local Authority officers in determining Building Regulation applications.

Where clarification is considered necessary, reference should be made to the Agents.

The developers will be responsible for ensuring that all building work carried out by them or under their instructions complies with the relevant current Regulations, British Standards and Codes of Practice, Bye-laws and manufacturers' instructions.

1.0 **FOUNDATIONS**

1.1a Existing foundations where subject to increased loads to be exposed for inspection to determine their suitability before the application is approved, and underpinned as and if necessary to sustain additional loads placed upon them. All subject to the approval of the Local Authority.

1.1b Existing foundations where subject to increased loads to be exposed and underpinned as and if necessary to prove suitability to sustain additional loads placed upon them. All to the approval of the Local Authority.

1.1c Foundation type and depth are to be appropriate to site conditions, and are to be designed in accordance with the "Approved Document" A1/2 Part E of Building Regulations Schedule 1 Pt. A or BS 8004: 1986. All to the approval of the Local Authority.

1.2 Where sulphates are found to be present in the ground dense, fully compacted concrete of low permeability must be used in accordance with the recommendations of Building Research Establishment Digest No. 363.

1.3a Concrete trench fill foundations (1:2:4 mix) to dimensions as shown on drawings to within 250mm below ground level and generally to a depth of 1000mm or to load bearing strata. All foundations to suit site conditions and to the Local Authority approval.

1.4 Foundations will be generally of 1:3.8:5.3 concrete with cement complying with B.S.12 1991 and aggregate complying with B.S.882 1983.

1.5 For other conditions where strip foundations are inappropriate, design will be by Structural Engineers and as set down in NHBC Requirement 5.

4.3 **FIRST FLOOR AND LOFT FLOOR**

Floor designed by structural engineer.

All joists to be tied at right angles with 30x5mm galvanised mild steel lateral restraint straps taken over 3No joists and fixed.

Straps not to exceed 2m max crs. Straps to be blocked out below with 50x50mm min timber. Provide 22mm flooring grade chipboard to meet the requirements of Building Regulations: Part E.

Double joists are required under bath (and similar) supports.

Provide strutting to floor joists at centre point for spans between 2.5 - 4.5m & 2 rows of equal spacing of strutting for spans over 4.5m.

First floor void and loft floor void to receive 1 layer of 100mm thickness of Rockwool Flexi (density better than 10kg/m3) between joists for sound proofing to achieve Rw 40dB.

5.0 **ROOFS**

5.14 All roof timbers to be double vacuum impregnated to BS5707.
Roof construction to consist of:
- Roof tiles / slates fixed in accordance with manufacturer's instructions, on;
- Tanalised tiling battens (size to suit tile & rafter spacings) with a min head of 75mm, on;
- 'Tyvek' breathable sarking membrane, on;
- Roof timbers as specified on section drawings.

Builder to ensure that the proposed roof tiles are compatible with the slope of roof and to be fixed in accordance with the manufactuer's instructions.

Builder to match tile as close as possible to original roof tiles.
Any difference to be agreed with Client before orders are placed and a sample sent to the Local Authority Planning Department for approval.

5.4 Pitched roof with insulation following rafters (U-Value 0.13) to consist of 100mm Celotex TB4000 (XR4120) between 150mm deep rafters with 60mm Celotex PL4000 fixed to internal face of rafters with 12.5mm plasterboard giving a total thickness of 172mm Celotex. Insulation to be fitted in strict accordance with the manufacturer's instructions and recommendations.

6.0 **WINDOWS AND DOORS**

6.1b Windows to match the existing house to BS 644 Pt 1 : 1989 double glazed and are to comply with Part L1 of the Building Regulations.

6.3 Glazing to be low 'E' glass with 16mm airgap carried out in accordance with BS 6262: 1982 and part N of Building Regulations and should not exceed 22.5% of total floor area without introduction of additional heat loss saving as a trade off from that lost by the equivalent area of excess glazing. 'U' value not to exceed 1.8 W/m²k.

6.4 All new windows to be double glazed.

6.5a All window glazing below 800mm and door glazing below 1500mm from ground level, and any glazing within 300mm from doors to be safety glass in accordance with BS 6206 and marked accordingly.

6.6 Existing Pitched roof construction U-Value 0.18w/Km²
Rafters the be battened out to a minimum thickness of 125mm.
Celotex GA4000 insulation or similar approved between rafters with a Min. 50mm air gap.
70mm GA4000 celotex insulation installed under
the joists to be taken down to eaves level.
25mm battens to keep 70mm insulation in place
fixed to existing rafters.
12.5mm plasterboard and skim.
Min. U-value of construction 0.18W/sq.mK.
Continuous vent required over fascia, tile vents
between each joist.

Velux flat roof light as agreed with client.
Installed in accordance with the manufacturer's written instructions and recommendations.
Provide joists and trimmers around the rooflight to the
structural engineers details and calculations.
All timbers to be bolted together.

Floor void between joists to be insulated
with a minimum thickness of 100mm of
10Kg/m³ proprietary sound insulation
quilt.

100mm Kingspan Kooltherm K12 (or similar) insulation between studs.

New rear dormer wall to sit on top of existing inner skin blockwork wall. Subject to engineers designs.

(Optional, if sloping ceiling insulation taken down to eaves)
350mm thick fiberglass quilt insulation laid between and over ceiling joists at 90°
(see specification notes).

The new floor to be separated from the remainder of the property by a 30 minute fire resisting construction e.g. a minimum of 12.5 mm (if existing or 15mm if renewed) plasterboard and skim to ceilings.

Mechanically fixed ridge tiles to be ventilated at 2.4m max crs.

Strip back & refix roof coverings with new roof covering & treated battens as necessary, dress flat roof membrane over plywood & tiling fillet to provide water a proof junction.

22mm moisture-resistant flooring. Type P5 chipboard screw fixed to joists.
(see specification notes).

6.9 External doors to have laminated or toughened safety glass to both internal and external panes where double glazed.

7.0 CEILINGS/FINISHES

7.1 Ceiling to be 12.5mm or 15mm plasterboard with joints taped and filled.
Plasterboard to be supported on all edges with noggins as necessary.

7.2b Plaster skim coat finish to ceilings.

7.4a New steel beams to be encased with 2 skims of 9.5mm plasterboard with staggered, taped and scrimmed joints to achieve minimum ½ hour fire resistance.

9.0 HEATING

9.1f Existing central heating system extended to new extension.

10.0 ELECTRICAL INSTALLATION

10.1a The existing electrical system is to be extended to provide an electrical installation to Institute of Electrical Engineers Regulations for the Electrical Equipment of Buildings. All joist notching and drilling and wall chasing to be in accordance with NHBC regulations.

10.3d All socket and switch locations to be marked on wall for clients approval prior to chasing.

10.6 All electrical work required to meet the requirements of Part P (Electrical safety) must be designed, installed and tested by a person competent to do so. An appropriate BS7671 electrical installation certificate is to be issued for the work on completion.

11.0 PLUMBING AND DRAINAGE

All existing manholes and drains within 3m of the property to be surveyed for position and invert levels prior to commencement on site. All to Local Authority approval.

11.4 All tanks and pipes situated in roof are to be lagged and installed on the warm side of ceiling insulation. Insulation to tank lagging is to be taped.

11.6c Rainwater pipes to be 63mm PVC with 100mm PVC gutters, to match existing, taken to new and existing soakaways.

11.6d Existing guttering to be extended to connect to new/existing uPVC downpipes and taken to existing termination point.

11.7a Drains passing beneath buildings are to be surrounded with 150mm lean mix concrete or shingle. Where passing through walls/foundations they are to be protected by concrete lintels or other approved construction.

11.8b All drainage to be carried out in flexible jointed vitreous clay pipes (100mm Ø) laid on and surrounded by 150mm granular pea shingle bedding to a fall of 1:60.

11.9 Where new soakaways are required to be constructed of concrete rings (or equivalent) to be positioned minimum 5m from buildings, 1.6m from boundary and 1.2m Æ, taken down to a suitable ballast.

12.0 VENTILATION

The ventilation requirements are to be in accordance with the Building Regulations with particular ref. to the following items:

12.1a Habitable rooms - An opening window of 1/20th (min) of floor area together with a trickle ventilation opening not less than 8000mm^2 in area to habitable rooms and 4000mm^2 elsewhere.

12.6 All new windows to be fitted with trickle ventilators to provide minimum background ventilation of 8000mm² ventilated free area.

12.7 Mechanical extract fans to give the extract rate:
Kitchen 30 l/s adjacent to hob or 60 l/s elsewhere
Utility 30 l/s
Bathroom 15 l/s
Toilet 6 l/s

13.0 INFILTRATION AND COLD BRIDGING

13.1 All openings to be detailed to ensure that cold bridges do not occur and that all windows and doors are fitted with suitable draught stripping as standard by the relevant manufacturers.

13.2 FIRE & SMOKE ALARM

Mains operated fire alarm system interlinked with battery backup to BS5446.
Self contained smoke alarm permanently wired up to a separate fixed circuit at the distribution board to be provided to all ground and first floor circulation areas.
Each smoke alarm to be fixed to the ceiling at least 300mm from any wall or light fitting (centrally preferred).
Units designed for wall mounting should be fixed between 150mm & 300mm below the ceiling level.
Smoke alarms required to all circulation areas (ie: Halls, Landings etc.) where not already in place and must be interlinked with each other.

14.0 **GENERAL**

14.2 The U-values quoted above assume that a calculation under the Governments Standard Assessment Procedure (SAP) has been carried out and that the rating is in excess of 60. Better values may be required should the rating be less than 60.

15.0 **FINISHES**

Builder to provide plaster finish to all internal walls suitable for decoration.

Perimeter of rooms to receive timber skirting board plugged & screwed to walls.
Sample of skirting board to be submitted to Client for approval.

Builder to agree with Client at tender stage the extent of finishes required (ie: Client to confirm if Builder is to decorate Walls, ceilings, woodwork etc and lay floor coverings).
Actual finishes to be determined by Client.

Electrical sockets, lighting positions and types together with radiator locations to be agreed between Builder and Client on site.

Finishes to external works (ie: special paving, landscaping etc) to be confirmed to the Builder by the Client.

Builder to include for removing all Builders rubbish from site at the end of the project (unless agreed otherwise).