

## To supplement final background ventilation figures consider Rytons Through-wall Background Ventilation Sets - Acoustic AirCore and AirLiner Sets

**Table 1.7 Minimum equivalent area of background ventilators for natural ventilation<sup>(1)</sup>**

Room	Minimum equivalent area of background ventilators for dwellings with multiple floors	Minimum equivalent area of background ventilators for single-storey dwellings
Habitable rooms <sup>(2)(3)</sup>	8000mm <sup>2</sup>	10,000mm <sup>2</sup>
Kitchen <sup>(2)(3)</sup>	8000mm <sup>2</sup>	10,000mm <sup>2</sup>
Utility room	No minimum	No minimum
Bathroom <sup>(4)</sup>	4000mm <sup>2</sup>	4000mm <sup>2</sup>
Sanitary accommodation	No minimum	No minimum

**NOTES:**

- The use of this table is not appropriate in any of the following situations and expert advice should be sought.
  - If the dwelling has only one exposed façade.
  - If the dwelling has at least 70% of its openings on the same façade.
  - If a kitchen has no windows or external façade through which a ventilator can be installed.
- Where a kitchen and living room accommodation are not separate rooms (i.e. open plan), no fewer than three ventilators of the same equivalent area as for other habitable rooms should be provided within the open-plan space.
- The total number of ventilators installed in a dwelling's habitable rooms and kitchens should be no fewer than five, except in one-bedroom properties, where there should be no fewer than four.
- If a bathroom has no window or external façade through which a ventilator can be installed, the minimum equivalent area specified should be added to the ventilator sizes specified in other rooms.

### Approved Document L1: Work in existing dwellings

#### Extensions

Table 2 gives the maximum U-values applicable to new thermal elements installed in an existing dwelling and to thermal elements constructed as a replacement for existing thermal elements.

**Table 2: Limiting U-values for new fabric elements in existing dwellings**

Element	Maximum U-value <sup>1</sup>
External Walls	0.18 W/m <sup>2</sup> K
Floor <sup>2</sup>	0.18 W/m <sup>2</sup> K
Roof	0.15 W/m <sup>2</sup> K
Swimming pool basin	0.25 W/m <sup>2</sup> K
Windows and doors <sup>3</sup>	1.40 W/m <sup>2</sup> K
Rooflights	2.20 W/m <sup>2</sup> K

- Area weighted average U-values
- The U-value of the floor of an extension can be calculated using the exposed perimeter and floor area of the whole enlarged dwelling
- The total area of windows, roof windows and doors in extensions should not exceed the sum of:
  - 25 percent of the floor area of the extension; plus
  - the total area of any windows and doors which no longer exist or exposed due to the extension.

ALL WORKS TO BE UNDERTAKEN TO LATEST BUILDING REGULATIONS, BRITISH STANDARDS AND MANUFACTURERS RECOMMENDATIONS.

TOWN AND COUNTRY PLANNING ACT 1990 - Advice to be taken from the Local Authority by Client. Planning permission should be applied for and obtained by the owners prior to work commencing.

BUILDING REGULATIONS APPROVAL - Building control approval is required for this project. The contractor must provide the appointed Building control body with plans for assessment and all statutory notices for inspections and must liaise with the statutory undertakers and comply with their requirements.

- Full plans approval building control approval to be obtained by the owners prior to work commencing. or
- Building Notice for domestic extension projects only, additional inspections and notifications will be needed to ensure compliance throughout the build.

PARTY WALL ACT - Prior to commencing work the builder/owners shall ensure that neighbors have been given notice under the Party Wall Act 1996.

CDM REGULATIONS 2015 - The contractor/builder shall be fully aware of the latest Construction (Design and Management) Regulations 2015. The contractor shall notify the Health and Safety Executive where required. Client is responsible for the appointment of a competent contractor/builder.

GENERAL - All dimensions given whether figured or scaled are to be checked and verified on site by the contractor prior to commencement of work. Figured dimensions are to take preference over scaled dimensions.

<b>PURPOSE</b> Planning and Building Regulations Only	<b>SITE ADDRESS</b> 24 New Rd Rufford, Ormskirk L40 1SR	
<b>WORK</b> Dormer loft conversion to dwelling house	<b>Number</b> 5	<b>REVISION</b> A
<b>DRAWING</b> Proposed Ventilation	<b>SCALE 1 - A3</b>	