

BUILDING REGULATIONS COVERING REPLACEMENT WINDOWS & DOORS

Replacement Windows and Doors

As from 1 April 2002, Building Regulations request that building owners installing replacement windows or doors must obtain Building Regulations consent and have the installation inspected to ensure compliance with relevant regulations. The relevant regulations are:

- L1** Conservation of fuel and power
- N1** Glazing protection against impact

In addition, you must also ensure that replacement windows and doors are no less suitable than the existing windows and doors in relation to the following regulations:

- A1** Structure
- B1** Means of escape in fire
- F1** Means of ventilation
- J2** Combustion appliances and fuel storage systems
- K2** Protection from falling
- M2** Access and facilities for disabled people

Repair work, such as replacement glazing or repair of rotten or damaged frame members is not subject to Building Regulation approval.

Guidance on how to satisfy the requirements

Requirement A1-structure.

When installing new windows or doors an assessment should be undertaken by the contractor as to the suitability of the support of lintel above the replacement window or door.

Requirement B1- means of escape in fire

All windows to habitable rooms (but not kitchens, utility rooms, dressing rooms, bathrooms, wc's or shower rooms) at floors above ground level are required to be suitable for escape in fire. In addition, rooms at ground floor level whose only escape route is via another room must be provided with suitable escape windows.

A suitable escape window is defined as 'a window whose unobstructed openable area is at least 0.33m² and at least 450mm high and 450mm wide (a 450mm wide opening will need to be 735mm high). The bottom of the openable area should be no more than 1100mm above the floor. Any key required to open the window should be readily available.

F1-means of ventilation

See table 1 below for current requirements. If your original windows have trickle ventilators any replacement frames should also be provided with such. The area of opening windows should not be less than that which was originally provided. As an alternative approach to the ventilation provisions listed in table 1 below, the

overall provisions for background ventilations for the dwelling should be equivalent to an average of 6000mm² per room for the rooms listed, with a minimum provision of 4000mm² in each room.

Table 1 Ventilation: current requirements for various rooms

Room	Rapid ventilation	Background ventilation
Habitable room	1/20th of the floor area of the room served	8000mm ²
Kitchen and utility	Opening window (No minimum size)	4000mm ²
Bathroom/Shower rooms	Opening window (No minimum size)	4000mm ²
Sanitary accommodation	1/20th of the floor area of the room served	4000mm ²

J2 Combustion appliances and fuel storage systems

Certain fires and heating appliances rely on air infiltration for them to function correctly. They may require purpose made ventilators, or may have relied on air infiltration through existing ill-fitting windows and doors, If you have an open flued appliance in the house that does not have separate provision of combustion air, a check should be made by a suitably qualified person (CORGI, HETAS, NACE, NACS, etc) to ensure that adequate permanent combustion ventilation is provided.

The boiler or fire manufacturers manufacturer's advice should be followed with regard to proximity of opening windows and doors.

K2 - protection for falling

Where a first floor window cill height is less than 800 mm above the floor level suitable guarding should be provided to prevent a person falling through an open window.

This requirement may conflict with Regulation B1 and provision of escape windows. One way of achieving the requirement may be to provide a restricted opening device that can be easily overridden in the event of an emergency.

L1- conservation of fuel and power

All UPVC and wood replacement windows should attain a U value of 2.0W/m²K. One way of achieving this requirement is by providing a UPVC or timber double glazed window system incorporating a 16mm air gap between panes and an approved low emissivity coating such as Pilkington K. This is not the only option, but if another system is used, substantiation may be required to prove that a U value of 2.0W/m² is attained.

M2 - access and facilities for disabled people

Where the property was subject to the Disabled Regulations, any new principal entrance door should have a minimum 775mm clear opening with a low threshold.

N1- glazing protection against impact

Glazing should either:

- Break safely as defined in BS 6206:1981 Specification for impact performance requirements for flat safety glass and safety plastics for use in buildings, clause 5.3
- Be inherently robust, i.e. annealed glass, glass blocks, polycarbonate or glass that gains strength through thickness.
- Be in small panes (a maximum area of 0.5m² with a maximum width of 250mm is acceptable). Annealed glass should be not less than 6mm thick, except where it is in traditional leaded- or copper- lights in which 4mm glass is considered acceptable when fire resistance is not a factor.
- Be permanently protected by a suitable screen which has a minimum height of 800mm and which incorporates a gap no greater than 75mm.

Diagram 1

Glazing in Windows, Partitions Glazing in Doors and Side Panels and Walls

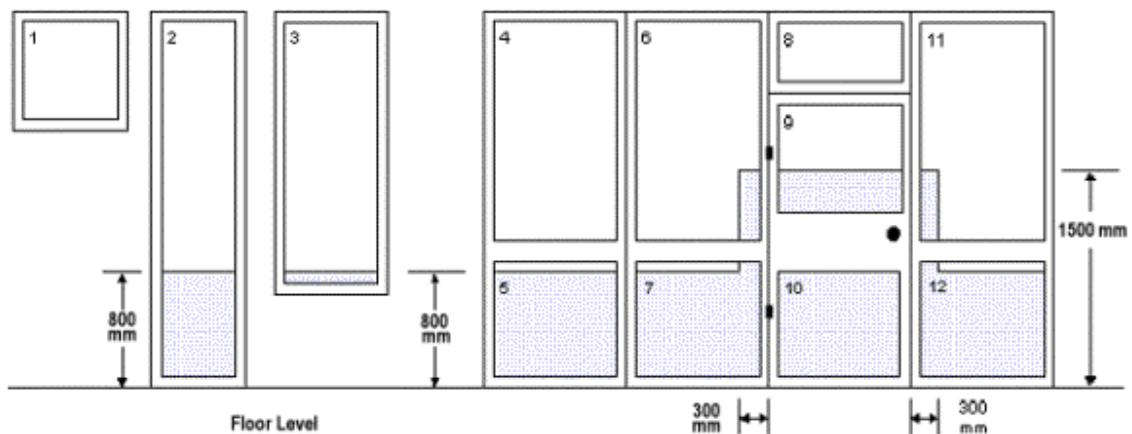


Diagram 1 gives examples of glazing in windows, partitions, walls, doors and side panels. 'Critical locations' are shaded grey. Any glazing within a shaded area must comply with BS 6206.

In Diagram 1, glazing unit No. 10 falls wholly within a 'critical location' and so the glazing must comply with BS 6206.

Where only part of a glazing unit falls within a 'critical location' the whole of that unit must comply with BS 6206. In Diagram 1 this applies to units Nos. 2, 3, 5, 6, 7, 9, 11 and 12.

In Diagram 1 only glazing units Nos. 1, 4 and 8 fall wholly outside the 'critical location' and need not comply with BS 6206.

