

WINDOW VENTILATOR RANGE

REQUIREMENTS UNDER PART F: MEANS OF VENTILATION FOR WINDOW MANUFACTURERS AND INSTALLERS SUPPLYING REPLACEMENT WINDOWS

Greenwood offers a range of window ventilators for varying application requirements including through frame, glazed in and overframe. All products have been tested in conjunction with BS EN 13141-1 Clause 4 Ventilation for Buildings at third party accredited test houses. All information is available on request.

Product Code	Configuration	Equivalent Area (mm ²)	Dimensions (mm) (length x height x deep)	Slot Height (mm)	Slot Sizes (mm) Length Central Gap Length
A Vent					
3000A.12	Inner Unit & Outer Canopy	1813	Inner: 280 x 18 x 6.5 Outer: 280 x 26 x 24	12	250
4000A.12	Inner Unit & Outer Canopy	2623	Inner: 375 x 18 x 6.5 Outer: 375 x 26 x 24	12	334
6000A.12	Inner Unit & Outer Canopy	3935	Inner: 555 x 18 x 6.5 Outer: 555 x 26 x 24	12	250 15 250
8000A.12	Inner Unit & Outer Canopy	5013	Inner: 725 x 18 x 6.5 Outer: 725 x 26 x 24	12	334 15 334
3000A.16	Inner Unit & Outer Canopy	1644	Inner: 230 x 18 x 6.5 Outer: 230 x 26 x 24	16	188
4000A.16	Inner Unit & Outer Canopy	2393	Inner: 290 x 18 x 6.5 Outer: 290 x 26 x 24	16	250
6000A.16	Inner Unit & Outer Canopy	3397	Inner: 415 x 18 x 6.5 Outer: 415 x 26 x 24	16	375
8000A.16	Inner Unit & Outer Canopy	3935	Inner: 555 x 18 x 6.5 Outer: 555 x 26 x 24	16	250 15 250
D Vent					
2000DF	Inner Unit & External Grille	1396	Inner: 219 x 26.5 x 11	13	165
4000DF	Inner Unit & External Grille	2770	Inner: 414 x 26.5 x 11	13	165 30 165
2000DWB	Inner Unit & Recessed Flyscreen	1540	Inner: 219 x 26.5 x 11 Outer: 183 x 20 x 14	13	165
4000DWB	Inner Unit & Recessed Flyscreen	3156	Inner: 414 x 26.5 x 11 Outer: 2 x 183 x 20 x 14	13	165 30 165
New F Vent					
1250F	Inner Unit & Outer Canopy	1250	238 x 16.5 x 21	10/12	198
2500F	Inner Unit & Outer Canopy	2500	383 x 16.5 x 21	10/12	167 10 167
HD Vent					
4000HDF	Inner Unit & External Grille	2697	286 x 28.5 x 13	18	235
4000HDF	Inner Unit & Recessed Flyscreen	2559	Inner: 286 x 28.5 x 13 Outer: 290 x 26 x 24	18	Inner: 235 Outer: 257
8000HDF	Inner Unit & External Grille	5605	540 x 28.5 x 13	18	235 20 235
8000HDF	Inner Unit & Recessed Flyscreen	6009	Inner: 540 x 28.5 x 13 Outer: 2 x 290 x 26 x 24	18	Inner: 235 20 235 Outer: 257 20 257
L Vent					
2000LB	Inner Unit & Outer Canopy	1278	263 x 15 x 18	10	203
4000LB	Inner Unit & Outer Canopy	2779	485 x 15 x 18	10	203 20 203
S Vent					
3000S	Inner Unit & Outer Canopy	1753	305 x 22 x 23	12.5	243
4000S	Inner Unit & Outer Canopy	2671	400 x 22 x 23	12.5	163 15.5 163
6000S	Inner Unit & Outer Canopy	3362	550 x 22 x 23	12.5	243 15.5 243
T Vent					
4000TS	Inner Unit & Outer Canopy	3030	Inner: 348 x 27 x 7.8 Outer: 400 x 22 x 23	16	165 15 165
6000TS	Inner Unit & Outer Canopy	3986	Inner: 462 x 27 x 7.8 Outer: 550 x 22 x 23	16	188 15 188
4000TF	Inner Unit & Recessed Flyscreen	3283	Inner: 348 x 27 x 7.8 Outer: 184 x 20 x 15	16	165 15 165
6000TF	Inner Unit & Recessed Flyscreen	4085	Inner: 462 x 27 x 7.8 Outer: 184 x 20 x 15	16	Inner: 188 15 188 Outer: 152 15 152
Glazed In Ventilators					
GVC	Linear metre	9668	Bespoke cut to size	N/A	N/A
PC	Linear metre	14766	Bespoke cut to size	N/A	N/A
Bar Carriers	Slotvent chosen	Slotvent	Bespoke cut to size	N/A	N/A
Overframe Ventilators					
Referb 4000HD	Inner Unit & Recessed Flyscreen	2559	Bespoke cut to size	N/A	N/A
Referb 8000HD	Inner Unit & Recessed Flyscreen	6009	Bespoke cut to size	N/A	N/A
Nubuild 2000D	Inner Unit & Recessed Flyscreen	1540	Bespoke cut to size	N/A	N/A
Nubuild 4000D	Inner Unit & Recessed Flyscreen	3156	Bespoke cut to size	N/A	N/A
Nubuild 4000T	Inner Unit & Recessed Flyscreen	3283	Bespoke cut to size	N/A	N/A
Nubuild 8000T	Inner Unit & Recessed Flyscreen	6566	Bespoke cut to size	N/A	N/A

A range of control and colour options are available for each product range. Please call for further information.



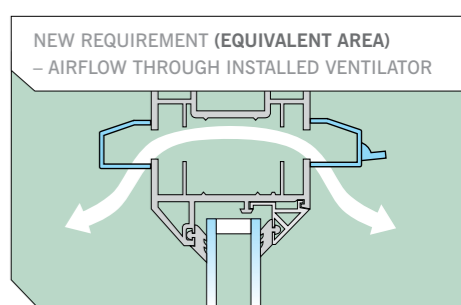
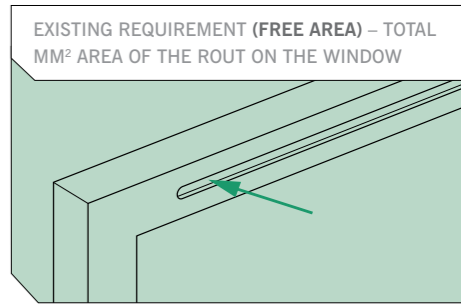
INDOOR AIR QUALITY

Condensation and mould have been issues in housing for a number of years and the need to safeguard against them has not been diminished. They have potentially been made worse by better performing heating and insulation in addition to new airborne particles that have been introduced into dwellings as a result of new types of flooring materials, furnishings and cleaning products. Good indoor air quality and effective ventilation is more important now than ever, not only for buildings but for occupants.

ADF 2006
The revision of Part F has effectively re-positioned ventilation in the construction industry as energy efficiency and modern construction methods have improved. The new requirements, based on a whole house approach now take indoor air quality and building performance into consideration as ventilation systems are bespoke to dwelling size. Mechanical and passive ventilation provisions are also now integrated to ensure whole building ventilation rates and effective airflow within the dwelling.

EQUIVALENT AREA

The performance measurement for background (trickle) ventilators referenced in the new document has been changed to move in line with the new performance approach. **Equivalent Area** now replaces **Free Area** for the measurement of vents installed in new build and refurbishment. This change represents a more logical step in achieving the air changes in dwellings with products tested in situ.



BS EN 13141-1: 2004 VENTILATION FOR BUILDINGS

Trickle vents should be tested to the above standard and the performance at 1Pa permanently and visibly marked on the ventilator for inspection by building control.

WINDOWS

WORK ON EXISTING BUILDINGS

From **October 1st 2006**, Building Regulation ADF will extend scope to include replacement windows.

Extracts from Approved Document F1 Section 3 Work on existing buildings:

'To comply with the requirement F1, unless the room is ventilated adequately by other installed provisions, all replacement windows should include trickle ventilators. Alternatively, an equivalent background ventilation opening should be provided in the same room. In all cases, the ventilation opening should not be smaller than was originally provided and should be controllable'. Where there was no ventilation opening, or where the size of the original ventilation opening is unknown, the following minimum sizes should be adopted;

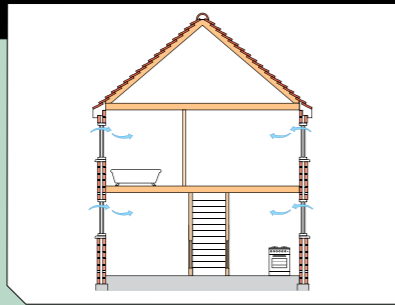
DWELLINGS

Equivalent Area

Habitable Rooms	5000mm ²
Non Habitable Rooms	2500mm ²

Purge Ventilation

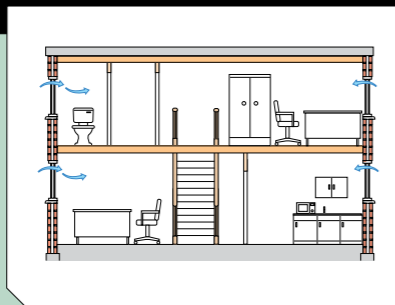
Purge ventilation is required in all habitable rooms in addition to background ventilation. The traditional purge method is via an openable windows (sized to min 1/20th of floor area of space served). Where this is not possible, extract provision capable of providing 4ach (air changed per hour) is required.



BUILDINGS OTHER THAN DWELLINGS

Equivalent Area

Acceptable Rooms	
Floor areas up to 10m ²	2500mm ²
Greater than 10m ²	250mm ² per m ² of floor area
Kitchen (domestic type)	2500mm ²
Bathroom and shower rooms	2500mm ² per bath or shower
Sanitary accommodation (and or washing facilities)	2500mm ² per WC



ADDITION OF A HABITABLE ROOM (NOT INCLUDING A CONSERVATORY) TO AN EXISTING BUILDING

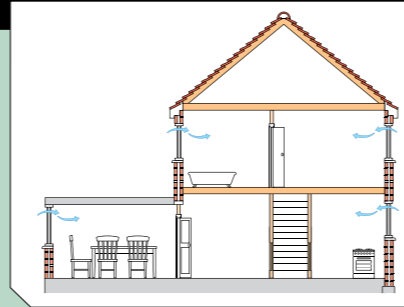
1. If the additional room is connected to an existing habitable room which now has no external openable windows, the two habitable rooms can be treated as a single room for ventilation purposes.

A permanent opening between the two rooms and provision for purge ventilation based on the combined floor area is required (refer to Appendix B in ADF) 8000mm² Equivalent Area background ventilation provision is also required from the habitable room to the outside.

2. If the additional room is connected to an existing habitable room with an openable window and background ventilator less than 5000mm², requirement is as 1 above.

3. If the additional room is connected to an existing habitable room which still has openable windows opening to the outside and with a background ventilator of equivalent area at least 5000mm².

Provision of background ventilation should be at least 8000mm² equivalent area between the two rooms and at least 8000mm² equivalent area between the additional room and outside. Both openings should provide purge ventilation based on the combined floor area (refer to Appendix B in ADF).



ADDITION OF A WET ROOM TO AN EXISTING BUILDING

Mechanical and Passive ventilation are required.

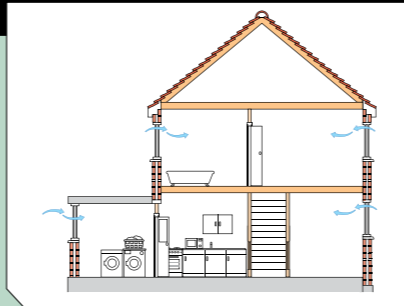
Equivalent Area

Mechanical Intermittent Extract Fan	15l/s
Background Ventilator	2500mm ²

Alternative extract methods can also be used and the passive ventilation requirements added according to each system (detailed in ADF 2006) –

- Single Room Heat Recovery
- Passive Stack Ventilation
- Continuous Extract Ventilation

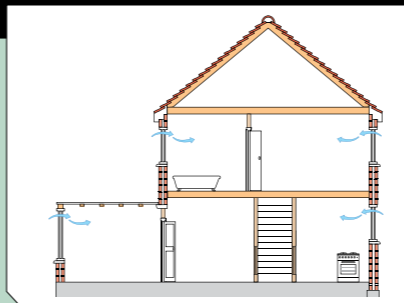
In addition there should be an undercut of minimum area 7,600mm² in any internal doors between the new wet room and the existing building (equivalent to 10mm above the floor finish for a standard 760mm width door).



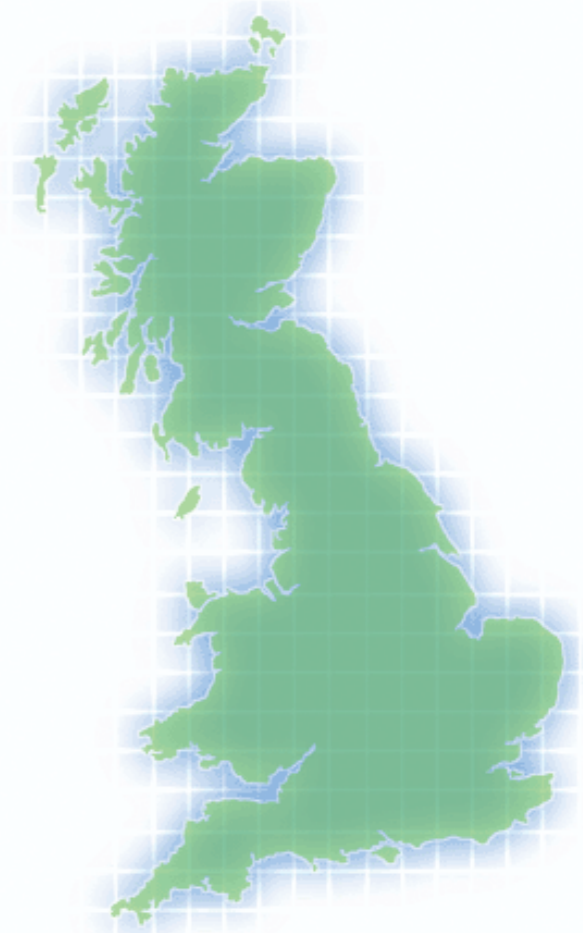
ADDITION OF A CONSERVATORY TO AN EXISTING BUILDING

Guidance applies only to conservatories with a floor area over 30m².

Refer to ADF 2006 for requirements.



Greenwood window ventilators are available through a network of UK distributors. For information on your local stockist, please contact Greenwood Sales on 0870 900 1880.



Please contact us for further information.

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