



Installation Instructions and
Maintenance Manual for:
* AL200 Continuous Rooflight

Need help? Call us on 0116 2610 710



ROOFLIGHT OVERVIEW

Duplus AL200 fixed continuous rooflights are glazed with either two panes of 4mm toughened glass or two panes of 6mm toughened glass, subject to the specific rooflight design. 28mm double glazed units incorporating the latest Low E coating, warm edge spacer bar and argon filled cavity achieving a centre pane U-value of 1.1 W/m²K.

Our rooflights are suitable (as defined in BS5516-2:2004) up to a maximum height of 13 metres above floor level.

For further clarification on any technical issues, please do not hesitate to contact Duplus.

Need help? Call us on 0116 2610 710



CONTENTS

1.0	Product Inspection	Page 4
2.0	Installation Hardware	Page 4
3.0	Kerb Suitability Check	Page 4
4.0	Installation	Page 6
5.0	Standard Glass Specification	Page 8
6.0	Glass Information	Page 9
7.0	Glass Breakage	Page 10
8.0	General Cleaning & Maintenance	Page 10
9.0	Emergency Contact Information	Page 11
10.0	Drawings	Page 12

Need help? Call us on 0116 2610 710



1.0 Product Inspection

- 1.1 Upon receipt of your product firstly carry out an inspection of the packaging, if there are any signs of impact damage this should be reported to Duplus Architectural Systems (DAS) with suitable photographs within 24hrs of delivery. If no damage is found carefully remove the packaging and fully inspect the product, again reporting any damage within 24hrs of delivery.
- 1.2 Do not use a knife when removing packaging; this may result in damage to the product.
- 1.3 The following items should be included:- 4 No. corner glass clips, additional edge glass clips (if width greater than 1100mm), pop rivets for fixing glass clips and Dow Corning 791 weathering sealant.

2.0 Standard Installation Hardware

- 2.1 60mm long stainless steel wood screws.
- 2.2 Pop rivets
- 2.3 Dow Corning 791 silicone weathering sealant.

3.0 Kerb Suitability Check

- 3.0 A full inspection of the kerb should be undertaken before the installation begins. Please ensure there is sufficient unobstructed space around the immediate area, ensure all necessary safety systems are in place to enable safe working at height procedures. The kerbs should be surveyed to ensure dimensional accuracy.

Please Note:

- 3.2 Water ponding is more likely to occur where our product has been fitted to a shallow sloping kerb or where the builders curb has no fall or slope. However, it is not a sign of any failure within our product. Water will pond where there is an insufficient fall to make it drain away naturally. Easy clean coatings can improve the situation as they tend to smooth out any surface imperfections of the glass.
- 3.3 Our fixed and opening rooflights are designed to accommodate a 10 degree fall where water is less likely to pond. Maximum pitch 30 degrees.

Cont'd

Need help? Call us on 0116 2610 710



Important note.

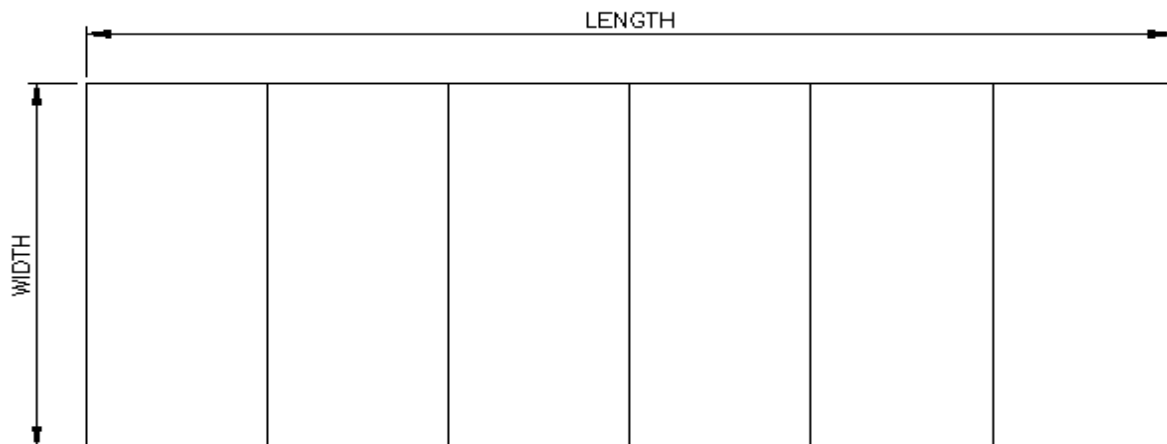
- 3.4 Kerb must be fully weather tight before installation, external finishes should lap up and on to the top of the kerb before seating the skylight in position. The top of the kerb should be flat with no pronounced level changes particularly at the corners.
- 3.5 To ensure water does not pond on the AL200 rooflight it is vital the kerb is built in accordance with the parameters set on drawings attached. Please note the kerb should always be formed as a flat annulus at the same pitch as the skylight.

Need help? Call us on 0116 2610 710



4.0 Installation

Duplus AL200 Continuous Rooflight Installation Guide



Step 1. Inspect The Builders Kerb

Inspect the builder's kerb.

There must be a fall between the top and the bottom of the rooflight. Duplus suggest a slope angle of 5 degrees which equates to a height of 87mm per 1000mm of width.

The opening must be square. Check this by measuring the distance between the external corners of the builder's kerb diagonally and compare both measurements. These should be within 10mm of each other.

Measure the external kerb width and length between their extremes and check that the dimensions are within +/- 20mm of those provided on the Duplus information details .

Ensure that there are no projections along the top of the kerb or on the outer vertical face of the kerb within 75mm from the top edge of the kerb.

If there are any areas of concern please check with Duplus (Tel 0116 2610 710) before starting to install.

Step 2. Check Along The Length of The Builders Kerb.

In the length, it is vital to fit to the top of a LEVEL builder's kerb.

Pull a string line tight across the top of the builder's kerb in the length (between the external edge and 75mm in from the external edge) and review the line for level. Ensure both kerbs in the length are checked. In the width, any kerb variations can be accommodated by placing packers internally under the end frame rooflight framework after its installation.

Cont'd

Need help? Call us on 0116 2610 710



Step 3. Create A Level Kerb

It is important that the rooflight is fitted to a level kerb with no high points. Hence where the kerb and string line do not come into contact, using silicone, adhere packers to the kerb at 150mm intervals (between the external edge and 75mm in from the external edge) in order to build the kerb height to the level of the string line. Do not attempt to move onto step 4 until you are sure that the kerb or kerb with packers will provide a level base, along the kerb length, for the rooflight to sit onto.

Step 4. Installing The Rooflight

Apply the silicone bedding to the top surface of the kerb/upstand around the perimeter as indicated on the attached drawing.

Place the unglazed rooflight frame onto the kerb/upstand, making sure that a watertight seal is formed underneath. Fill any gaps with additional silicone sealant.

Fix the rooflight down onto the kerb/upstand through the inner frame according to the detail shown on attached drawing using the supplied fixings. NOTE: This must be done prior to glazing the rooflight.

Fix the rafters (if applicable) into position using the appropriate fixings supplied. NOTE: This must be done prior to glazing the rooflight.

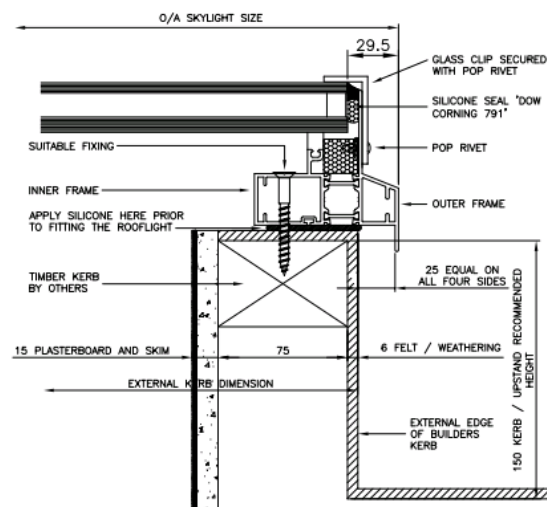
Fit the gaskets into the channels in the framework as shown on attached drawing so that it forms a level rubber platform for the glass units to sit on.

Place the glass onto the gaskets, ensuring an equal space is maintained between the outer rooflight frame and the glass on all four sides.

Apply silicone seal between the rooflight frame and glazing (with backing rod) and tool off neatly ensuring adequate seal has been achieved.

Fix the four corner glass clips to the rooflight as shown on attached drawings using pop rivets provided. If additional glass clips are provided, these should be fixed along the two sides (outer frame) that are parallel to the rafter bars. NOTE: For spans greater than 1100mm a further glass clip will be required.

IMPORTANT: We do not recommend screws be used in lieu of pop rivets as this may compromise security.



Need help? Call us on 0116 2610 710



5.0 Standard Glass Specification

Standard glass double glazed unit description (subject to rooflight design)

Outer Pane	4mm toughened
Cavity	20mm argon with warm edge spacer
Inner Pane	4mm low E coated Toughened
Light transmission	80%
Solar Gain	0.63
Centre Pane U-value	1.1Wm ² K
Weight	20Kg/m ²

Outer Pane	6mm toughened
Cavity	16mm argon with warm edge spacer
Inner Pane	6mm low E coated Toughened
Light transmission	78%
Solar Gain	0.61
Centre Pane U-value	1.1Wm ² K
Weight	30Kg/m ²

Need help? Call us on 0116 2610 710



6.0 Glass Information

Glass Type	Light Transmission (LT)	Total Solar Energy Transmittance (g value)	Centre Pane U-value
4mm Toughened / Argon / 4mm Toughened Soft Coat Low E	80%	63%	1.1 W/m ² K
4mm Toughened Grey Tint / Argon / 4mm Toughened Soft Coat Low E	50%	49%	1.1 W/m ² K
4mm Toughened Blue Tint / Argon / 4mm Toughened Soft Coat Low E	57%	41%	1.1 W/m ² K
6mm Toughened / Argon / 6mm Toughened Soft Coat Low E	78%	61%	1.1 W/m ² K
6mm Toughened Grey Tint / Argon / 6mm Toughened Soft Coat Low E	38%	35%	1.1 W/m ² K
6mm Toughened Blue Tint / Argon / 6mm Toughened Soft Coat Low E	47%	33%	1.1 W/m ² K
6mm Toughened HP Solar Control (Neutral) / Argon / 6mm Toughened	70%	40%	1.1 W/m ² K

Light Transmission (LT) is the proportion of visible light at near normal incidence that is transmitted through the glass.

Total Solar Energy Transmittance (g-value) is the fraction of solar radiation at near normal incidence that is transferred through the glazing by all means.

U-Value is the rate of loss of heat per square metre, under steady state conditions, for a temperature difference of one Kelvin between the inner and outer environments separated by the glass.

HP Solar Control is Guardian Sunguard high selective super neutral coating that gives an excellent solar control performance and also a high light transmission.

Tint is a glass that has a coloured tint which gives excellent solar control, but has reduced light transmission.

Need help? Call us on 0116 2610 710



7.0 Glass Breakage

- 7.1 Glass breakages are not covered under warranty. Should you experience a glass break please contact Duplus Architectural Systems Head office to order a replacement rooflight.

8.0 General Cleaning & Maintenance

- 8.1 The appearance, durability and performance of Duplus products, regardless of the material from which they are made, are always dependent on regular cleaning and maintenance. Cleaning therefore contributes considerably to the effective life of the system. All Duplus products should be cleaned regularly and at time intervals depending upon the accumulation of dirt. We should expect a minimum regime of 6 monthly clean and maintenance checks.
- 8.2 Those engaged on maintenance or cleaning work should use suitable equipment (see BS8213). Experienced operatives should be employed particularly in respect to rooflight/high level cleaning.
- 8.3 **Note under no circumstance should you attempt to walk on or load Duplus rooflight products regardless of their fragility status.**
- 8.4 The cleaning process is generally uncomplicated, consisting of washing down with warm water and mild detergent. Abrasive, caustic and chemical treatments are unnecessary, and may actually cause damage to the exposed surfaces of our products. A soft cloth or brush may be used to remove persistent contamination. However, care should be taken to avoid rubbing dirt into the system components. In the case of paint or bitumen splashes, white spirit applied with a soft cloth may be used with care, we would recommend a small area is tested first but do not allow white spirit to run onto unaffected areas. A final rinse with clean water will complete the process.
- 8.5 The product should be checked for movement on the kerb, if movement is found check tightness of screws (remove glazing if necessary).

Important Note:

- 8.6 An annual review of perimeter silicone should be made to confirm that the perimeter seal between the glass and frame is intact. If the seal is not intact i.e., if this seal has been removed or degraded, the area should be cleaned and dried and re-sealed with Dow Corning 791 silicone sealant at the earliest opportunity. If water sits against the edge of a double glazed unit because the outer seal is no longer intact, Duplus will accept no responsibility of the glass unit breakdown as a result. Please be aware, although rare, it has been known for birds to peck away at silicone.
- 8.7 An annual review of the glass should be made and in the very rare event there appears to be any signs of glass movement, please contact Duplus at the earliest opportunity.

Need help? Call us on 0116 2610 710



9.0 Emergency Contact Information

Office Hours

Monday – Thursday: 8am – 12.45pm 1.30pm – 5pm

Friday: 8.30am – 1pm

Telephone

0116 2610710

Fax

0116 2610539

Email

sales@duplus.co.uk

Need help? Call us on 0116 2610 710