

OMEGA[®] Stealth Rooflight Building Product Compliance Document

Product name:

OMEGA[®] Stealth Rooflights

Product line: (the product line from which the product is customised)

OMEGA[®] Stealth Rooflights

Product description and intended use: (measurements, materials, usage)

- Stealth Rooflights are for use on roofs of buildings to provide natural light into interior spaces.
- Stealth Rooflights are available in a range of sizes or can be custom made to order and feature thermally-broken aluminium frames suitable for use with profiled metal, metal tile and low slope membrane roofing.
- Stealth Rooflights are designed to be installed in raised (curb) mount applications and are factory glazed using sealed double-glazed insulated glass units (IGU's).
- Stealth Rooflights are available as a fixed rooflight or as an opening rooflight, which can be used to provide ventilation.

Product identifier: (if applicable)

OMEGA[®] Stealth Rooflights

Place of manufacture:

New Zealand

Legal and trading name of the manufacturer(s):

Omega Window Systems Limited

Legal and trading name of the importer: (if applicable)

N/A

Address for service:

36 Paraitē Road, Bell Block

New Plymouth 4312, New Zealand

Website: (if applicable)

www.omegawindows.co.nz

Phone number: (if applicable)

0800 500 141

Email address:

info@omegawindows.co.nz

NZBN: (if applicable)

9429030117785

Relevant Building Code clauses:

New Zealand Building Code (NZBC) Stealth Rooflights, if designed, used, installed, and maintained in accordance with the statements and conditions of the OMEGA Technical Literature and the BRANZ Appraisal #986, will meet or contribute to meeting the following provisions of the NZBC:

Clause B1 STRUCTURE: Performance B1.3.1, B1.3.2 and B1.3.3. Stealth Rooflights meet the requirements for loads arising from snow, wind and impact.

Clause B2 DURABILITY: Performance B2.3.1 (b) 15 years. Stealth Rooflights meet this requirement.

Clause E2 EXTERNAL MOISTURE: Performance E2.3.1 and E2.3.2. Stealth Rooflights meet these requirements.

Clause F2 HAZARDOUS BUILDING MATERIALS: Performance F2.3.1 and F2.3.3 (a). Stealth Rooflights meet these requirements.

Clause G4 VENTILATION: Performance G4.3.1 and G4.3.3. Stealth Rooflights will contribute to meeting these requirements.

Clause G7 NATURAL LIGHT: Performance G7.3.1 and G7.3.2. Stealth Rooflights will contribute to meeting these requirements.

Clause G9 ELECTRICITY: Performance G9.3.1. Stealth Rooflights meets this requirement.

Clause H1 ENERGY EFFICIENCY: Performance H1.3.1 and H1.3.2E. Stealth Rooflights will contribute to meeting these requirements.

Statement on how the building product is expected to contribute to compliance:

B1 - Structure

Wind:

- Stealth Rooflights are suitable for use in NZS 3604 Wind Zones up to, and including, Extra High. Snow 8.2 Stealth Rooflights are suitable for use in areas where buildings are designed for a 1 kPa snow loading.

Point Loads:

- Stealth Rooflights have not been tested for point loads from AS/NZS 1170 because the relatively small surface area of the rooflights should never require a point load to be applied.

B2 - Durability:

Serviceable Life:

- Stealth Rooflights are expected to have a serviceable life of at least 15 years, provided they are maintained in accordance with this Appraisal and the Technical Literature.
- On exposure to the weather, the coated aluminium may gradually lose the original surface finish. A faster reduction in both surface finish and overall serviceable life can be anticipated in severe industrial, geothermal and marine exposures. Maintenance

F2: Prevention of Fire Occurring:

- Separation or protection must be provided to the Stealth Rooflights from heat sources such as fireplaces, heating appliances and chimneys.
- Part 7 of NZBC Verification Method C/VM1 and Acceptable Solution C/AS1, and Acceptable Solution C/AS2 provide methods for separation and protection of combustible materials from heat sources.

E2: External Moisture:

- Stealth Rooflights when installed in accordance with BRANZ Appraisal #986 and OMEGA Technical Literature will prevent the penetration of moisture that could cause undue dampness or damage to building elements.
- The responsibility for design of flashings for individual installations is that of the designer.
- The design must give regard to roof cladding type and profile, roof pitch, catchment area, wind exposure and other similar considerations.
- Specific flashing solutions and detailing have not been assessed by BRANZ and are outside the scope of the Appraisal.

Internal Moisture:

- Experience with double-glazed rooflights has shown that in normal domestic or similar applications, the rooflights do not pose a significant risk of condensation when correctly installed.

Glazing:

- Stealth Rooflights are factory glazed using sealed double-glazed IGU's.
- The IGU's can be fabricated from either toughened or laminated safety glass as specified when placing the order with OMEGA Windows and Doors. In some instances, laminated safety glass to the bottom pane is required.
- All IGU's feature a 70 mm wide black edge banding that conceals the inner portions of the rooflight frame when viewed from the exterior.
- The IGU's carry markings to identify the glazing materials used in accordance with the requirements of NZS 4223.3.

G4: Ventilation:

- Stealth Rooflights that contain an openable aperture will contribute to the compliance of a building with NZBC Clause G4.
- Consideration must be given to the 'net openable area' required for a particular space by the designer. NZBC Acceptable Solution G4/AS1 provides guidance on required ventilation.

G7: Natural Light:

- Stealth Rooflights all contain transparent apertures which can contribute to the compliance of a building with NZBC Clause G7.
- Consideration of the amount of illuminance provided by the rooflight for a particular space will depend on a wide range of factors unique to each installation – e.g. room size, position, sun orientation, angle, etc.
- The use of Stealth Rooflights to supplement natural light from other sources is an Alternative Solution to NZBC Clause G7.

G9: Electricity:

- Where a new electrical supply is required for Stealth Rooflights, the installation must be completed by a Registered Electrician in accordance with New Zealand Electrical Code of Practice NZECP 51.
- Electrical safety of the electric rooflight operator complies with IEC 60335.

H1: Energy Efficiency:

- Stealth Rooflights can be specified with R-values that satisfy the minimum requirements for rooflights, all exceeding R0.31 m²K/W as specified in NZBC Verification Method H1/VM1 and NZBC Acceptable Solution H1/AS1.
- Where the total area of rooflights exceeds 1.5 m² or 1.5% of the total roof area (whichever is the greater) the calculation or modelling methods of NZS 4218 must be used for building designs.

Limitations on the use of the building product:

OMEGA[®] Stealth Rooflights cannot provide a fire resistance rating.

OMEGA[®] Stealth Rooflights are not suitable for use where recommended maintenance cannot be achieved, including use in buildings taller than three storeys or 10 m in height or buildings where access could be limited due to location or the surrounding environment.

Design requirements that would support the use of the building product:

OMEGA[®] Stealth Rooflights are designed for, but is not limited to, use in projects within the following scope:

- The scope limitations of NZBC Acceptable Solution E2/AS1, Paragraph 1.1 with respect to building height and maximum floor plan area; and,
- With roof structures designed and constructed to meet the requirements of the NZBC; and,
- With pitched roof cladding types, profiles and roof pitches specified in NZBC Acceptable Solution E2/AS1; and,
- With roof penetrations and flashings detailed by way of specific design in accordance with the requirements of NZBC Acceptable Solution E2/AS1 or the New Zealand Metal Roof and Wall Cladding Code of Practice; or,
- With low slope membrane roofing types and pitches specified in NZBC Acceptable Solution E2/AS1; and,
- With roof penetrations and flashings detailed by way of specific design in accordance with NZBC Acceptable Solution E2/AS1; and,
- Situated in NZS 3604 Wind Zones up to, and including, Extra High. 2.2 Stealth Rooflights must be installed in accordance with the Technical Literature supplied by OMEGA Windows and Doors (available at www.omegawindows.co.nz)

The Stealth Rooflight models covered by BRANZ Appraisal #986 are:

- Fixed Rooflight - Maximum size: 1,200 mm wide x 2,400 mm high
- Opening Rooflight - Maximum size: 780 mm wide x 1,380 mm high

Installation requirements:

- Ensure that the joinery is protected from dust, debris, and moisture if stored prior to installation.
- Inspect joinery thoroughly before beginning installation to ensure it is free from any defects and damage, including damage caused during transit and delivery.
- Check the dimensions and fit of each unit against the rough opening.
- Check and adjust all seals and operating hardware to ensure good fit and proper operation and function without jamming or gaps.
- Installation in accordance with the Stealth Rooflights BRANZ Appraisal #986 2018 and OMEGA technical literature.

Installation Skill Level Requirements:

- The installation of Stealth Rooflights must be completed by installers trained by OMEGA Windows and Doors or by competent, experienced tradespersons with an understanding of roof window installation and weathertightness details.
- The installation must be in accordance with the OMEGA Technical Literature and this Appraisal.

System Installation:

- Installation must be completed in accordance with instructions given in the Stealth Rooflights Technical Literature and this Appraisal.

Health and Safety:

- There are no particular health and safety issues relating to the installation or use of Stealth Rooflights.
- Installers must however observe safe working practices for working on roofs and at heights.

Maintenance requirements:

DURING THE BUILDING PROCESS:

The builder must follow and adhere to the following cleaning instructions during the construction process:

1. It is recommended that windows and doors be covered with tarpaulins, plastic or with approved "paint on finish" as soon as window installation has taken place.
2. Removal of all mortar, paint, adhesives or any substance must take place from the joinery and glass before that substance dries, set or discolour the joinery, gaskets or glazing panel. This includes the cleaning of gaskets, hinges, stays, drainage holes, sills and tracks.
3. Joinery and glass should never be cleaned with a scraper or hard object as it will damage the visual surface areas.
4. Joinery should never be cleaned with solvent based cleaners as it may damage the glass coating or surface coat finish of the windows and doors. Products such as methylated spirits, white spirits, Fuellite, ammonia based cleaners, or petroleum based products should never be used in cleaning.
5. The following are known contributing causes of glass damage when protective screens are not being used:
 - Sandblasting near glass
 - Floor grinding near glass
 - Welding near glass
 - Cement splashes
 - Paint and other chemicals such as polymer sealants, PVC glue etc.

AFTER OCCUPATION BY THE HOMEOWNER:

1. Regular maintenance is required to retain the film and colour integrity of the aluminium windows and doors. This includes washing the windows and doors with a clean cloth using a warm water and mild detergent mix and then thoroughly rinsing with clean water. This will assist in the removal of salt spray, environmental pollution and other organic material.
2. Windows and doors should never be cleaned with solvent based cleaners as it may damage the glass coating or powder coat finish of the windows and doors. Products such as methylated spirits, ammonia based cleaners, or petroleum based products should never be used in cleaning.
3. Cleaning frequency is determined by the distance from the ocean and as a rule of thumb the following applies:
 - 150m from the water: Cleaning every month.
 - 500m from the water: Cleaning every 3 months.
 - 500m from the water: Cleaning every 6 months.
4. Some clear gaskets may discolour as time passes. This is considered normal and will not affect the durability or functionality of the goods.
5. Windows should never be scrubbed with brushes or abrasive hard sponges.
6. Windows should never be cleaned using products such as abrasive pot cleaner, stainless steel cleaner, Jiff, oven cleaner, etc, as it will damage the glass and surface powder coat finish.
7. The following maintenance procedures should be followed:
 - Inspect the glass for cracks, chips or other damage.
 - Rinse the windows with running water. Water from a hose is preferred but care should be taken that no pressure is applied on the stream of water flowing from the hose.
 - Never use a water blaster to clean windows as the water pressure in combination with the dirt may damage the glass permanently and penetrate past flashings.
 - Make a mild, warm water/detergent mixture. Wash off windows with a soft clean cloth. Ensure the window and door frames are also washed.
 - Rinse the windows and doors after washing.
 - Use a clean squeegee to remove remaining water.

This document is based on and must be read in conjunction with the latest version of the Stealth Rooflights BRANZ Appraisal #986 available at www.omegawindows.co.nz.

Is the building product/building product line subject to warning or ban under section 26?:

No

Date: