

### Ecwool CondenShield HVAC Plus Blanket

Ecwool CondenShield Plus HVAC blanket is a flexible insulating layer intended for use as an external lagging for sheet metal ducting, industrial appliances, and equipment with low to medium temperatures. If preferred, it can also be utilized as a general insulating roofing blanket for residential or commercial buildings. Ecwool CondenShield HVAC Plus is commonly utilized in applications such as hot water tanks, air conditioning ductwork, and as a useful material for energy conservation on process vessels that operate at temperatures up to 300°C.



## KEY PERFORMANCE

THERMAL INSULATION	Greatly reduces heat gains or losses through the duct walls so that energy costs are reduced and conditioned air reaches the outlet at the required temperature.
ACOUSTIC INSULATION	Reduces the transmission of HVAC noises such as air turbulence, popping and cracking.
FIRE PROTECTION	Made from non-combustible glass mineral wool and complies with the National Construction Code of Australia (NCC).

## ADVANTAGES



### SensiTouch TECHNOLOGY

Ecwool utilizes SensiTouch Technology, this innovative new binder incorporates a natural anti formaldehyde ingredient and is ultra low in volatile organic compounds (VOC) and formaldehyde emissions, providing a safer and more pleasant installation process. Tested in accordance with ISO 16000-9:2006.

**Less dusty and less itchy.** Specifically engineered to produce a comfortable and less dusty insulation. The insulation creates a pleasant work experience by reducing the tingling feeling during installation.

**Better fibre network.** Fine, longer and evenly distributed fibre network helps in creating better tensile strength allowing the insulation to demonstrate superior durability, flexibility and feeling much softer.

**Absorbs disturbing sound.** Exceptional sound-absorbing properties, specially designed to reduce transmission of reduces the transmission of HVAC noises such as air turbulence, popping and cracking

**Optimal fibre diameter.** Optimal fibre diameter ranging produces more air chamber which enables the insulation to provide a better and enhanced performance.

**Corrosiveness.** Chemically inert. Hydrogen on concentration at pH9. Will not cause or accelerate corrosion of steel, stainless steel, copper or aluminum. Tested in accordance with ASTM C665-12.

**Water vapor absorption.** When tested in accordance with ASTM C1104, this product has been determined to be <0.02% by volume.

**Maximum service temperature.** Maximum service temperature of 350°C.

**Mould growth.** Does not encourage growth of mould, fungus, bacteria or rodents. Tested in accordance with ASTM C1338-08.

### AS/NZS 4859.1:2018 COMPLIANT

All Ecowool products have received Third Party Product Certification that they comply with AS/NZS 4859.1. 2018 This independent assurance gives you peace of mind that you are fulfilling all your obligations as required under the National Construction Code of Australia (NCC).

### SUSTAINABLE PRODUCT

Ecowool CondenShield HVAC Plus blanket is made from nearly 80% recycled glass and locally sourced raw materials, the insulation blanket is perfectly in tune with sustainability and environmental concerns.

### THERMAL PERFORMANCE

The thermal resistance value was determined at mean temperature of 23°C as per AS/NZS 4859.1:2018. This assures users the products deliver the specified thermal resistance which contribute to the operational efficiencies of the building. Please refer to the table on 'Product Available' for more information on the thermal resistance value.

R-value (m <sup>2</sup> K/W)	Density (kg/m <sup>3</sup> )	Thickness (mm)	Width (mm)	Length (mm)	Area Per Pack (m <sup>2</sup> )
R 2.0	18	75	1200	10,000	12
R 1.5	18	55	1200	10,000	12

### Health and Safety

Ecowool is manufactured with bio-soluble fibers creating a low allergen product that is safe to use in any residential, commercial or industrial application.

### Product Limitations of Use

- Not to be used/exposed to weather in any condition including prior, during and after installation.
- Product must be kept dry at all times.
- Not suitable for applications where high humidity is present within building (wet climates for a long period).
- This product can not be classified to AS 1530.1 as an assembly, and is not suitable where non-combustible material is required.
- This product does not have a group number in accordance with AS 5637.1 and is not suitable for exposed applications where a group number is required.
- Product needs to be allowed to fully recover before installation.
- The facing is a vapour barrier, not to be used where vapour permeable product is required.

### FIRE HAZARD PROPERTIES

Ecowool CondenShield HVAC Plus blanket achieved the following Early Fire Hazard Performance Indices of; Ignitability 0, Spread of Flame 0, Heat Evolved 0, Smoke Developed 0-1, in accordance with AS/NZS 1530.3 : 1999.

### SURFACE BURNING CHARACTERISTICS

Meets the surface burning characteristics and limited combustibility of the following standard:

- ASTM E84

### ACOUSTICAL PERFORMANCE

The National Construction Code (NCC) has adopted the Weighted Sound Reduction Index (R<sub>w</sub>) as a measure of the sound isolating properties of building elements. A building system with a higher R<sub>w</sub> rating isolates sound better than a system with a lower R<sub>w</sub> rating. Ecowool CondenShield HVAC Plus blanket acts as a natural and effective sound barrier. It minimizes sound transfer and achieves excellent R<sub>w</sub> ratings. Please contact one of our PGF Insulation representatives for further information relating to the acoustic performance.

### Biosolubility

Ecowool is manufactured with bio-soluble fibers creating a low allergen product that is safe to use in any residential, commercial or industrial application. Bio-soluble fibres have been extensively researched and shown to pose no long term health risks.



### Specification Notes

Insulation material shown on drawings or specified herein shall be of Ecowool CondenShield HVAC Plus blanket, Material R-value of R \_\_\_\_\_ m<sup>2</sup>K/W (specify Material R-value) at a nominal thickness of \_\_\_\_\_mm (specify nominal thickness).