Specification Sheet

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PRODUCT NAME

INSULOCK REMOVABLE THERMOCOVERS

MANUFACTURER

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PRODUCT DESCRIPTION

Insulock manufacturers a complete range of high quality removable and reusable insulation enclosures to suit most industrial, commercial and manufacturing requirements.

Thermocovers are the cost effective way to insulate valves, flanges, strainers, pumps, tanks, flexible hoses, boilers, headers etc., which are typically left un-insulated for maintenance purposes. These items can now be insulated with the benefit of the insulation being able to be removed and reinstalled in a matter of minutes.

THERMOCOVER OUTER MATERIALS

HYBRID™ 7.0

This CrossFilm™ laminated is designed for the most challenging insulation jacketing applications. It contains 75% PTFE. Last more than three times longer than typical PTFE dipped products in high temperature and industrial applications. Flame resistant and greater wear resistance. Excellent flexibility

Upper Use Temperature	316°C (600°F) Continuous Service
Thickness	0.216mm (0.0085 inches)
Weight	237 g/m2 (7.0oz/yd2)
Tensile Strength (Warp)	657 N/50mm (75lbs/inch)
Trapezoidal Tear (Warp)	53 N (12 lbs)

Hybrid™ 7.0 complies with the requirements for use in direct contact with food.

FDA Requirements:
CFR 177.1550
CFR 178.3297

European Regulations
RoHS 2002/95/EC
2003/11/EC
2005/59/EC
1935/2004
Global RoHS
REACH SVHC

35 years

AUSTRALIAN MADE

TEFLON® EJ1650 PTFE

PTFE/fibreglass composite is designed for challenging insulation jacketing applications. Single sided. Severe chemical and temperature exposure capabilities. Flame resistant.

Upper Use Temperature	316°C (600°F) Continuous Service
Thickness	0.38mm (0.015 inches)
Weight	560 g/m2 (16.05oz/yd2)
Tensile Strength (Warp)	3503 N/50mm (400lbs/inch)
Tensile Strength (Fill)	2627 N/50mm (300 lbs/inch)

INSULATION MATERIALS

Various insulation materials are used within covers and are dependant on service temperature and environment where covers are used. Refer to Insulock recommendations.

SUPERWOOL 607 BLANKET

Superwool 607 Blanket is made from high temperature insulation glass fibres and has a classification temperature of 1100°C.

Superwool 607 Blanket is made from long bio soluble Superwool Fibres. It is needled from both sides and does not contain any lubricant or binder. It has excellent tensile strength prior to and after heating and does not emit any fume or smell. The thermal stability of Superwool fibres (Grade 607) the excellent strength and flexibility prior to and after heating.

SUPERWOOL 607 PROPERTIES

MAXIMUM TEMPERATURE RATING (°C)	1100
COLOUR	White
SPECIFIC HEAT @ 540°C (kcal/kg°C)	1.05
PERMANENT LINEAR SHRINKAGE (%)	
Heating for 24hrs @ 800°C	0.5
Heating for 24hrs @ 900°C	1.5
Heating for 24hrs @ 1100°C	2.5
TENSILE STRENGTH (kPa)	
@ 96 kg/m3 density	44
@ 128 kg/m3 density	58
NOISE REDUCTION COEFFICIENT	0.72
CHEMICAL ANALYSIS %	
SiO2	60 - 70
Al2O3	< 0.8
CaO + MgO	25 - 40

AUSTRALIAN MADE

POLYURETHANE AA23-130

General purpose medium harness foam. Incorporating Ultrafresh™ for antimicrobial protection.

Upper Use Temperature	135°C (275°F) Continuous Service
Weight	23kg/m3 to 24kg/m3
Tensile Strength	100kPa Minimum
Tear Resistance	400 N/m Minimum

FI32 GLASSWOOL BLANKET

FI32 Semi-Rigid Insulation is manufactured from up to 80% recycled glass using a thermoset resin, producing fine non-combustible fibres which form either a Medium Density Insulation blanket.

MAXIMUM SERVICE TEMPERATURE

The maximum service temperature for Glasswool FI32 is 340ºC.

ENVIRONMENTAL PROPERTIES

Material R-value m2 K/W	Nominal Thickness mm	Density kg/m3
R0.76	25mm	32
R1.2	38mm	32
R1.5	50mm	32

FI32 Semi-Rigid Glasswool is manufactured from up to 80% recycled glass which would otherwise go into landfill and be unsuitable for alternative manufacturing processes.

Fletcher Insulation avoids the use of Ozone Depleting Potential (ODP) substances in the manufacture or composition of its FBS-1 Glasswool Bio-Soluble Insulation. The use of FI32 Semi-Rigid Glasswool guarantees the use of Zero ODP insulation while also ensuring that no harmful levels of Volatile Organic Compounds (VOCs) are released. This allows the incorporation of environmentally preferable insulation whilst also maintaining indoor air quality.

AS1530.3 EARLY FIRE HAZARD PROPERTIES OF MATERIALS

Glasswool 32KG exhibits the following characteristics when tested in accordance with AS1530.3-1999:

Ignitability Index	0
Spread of Flame Index	0
Heat Evolved Index	0
Smoke Developed Index	0-1

AUSTRALIAN MADE

POLYWOOL POLYESTER INSULATION

Polywool is a thermally bonded polyester blanket having excellent thermal control and acoustic absorption properties. It is completely safe, non toxic, non-irritant, non allergenic and is easy to work with and is environmentally friendly.

Polywool has a thermal conductivity of 0.038W/mK at 23°C when tested in accordance with ASTM C117.

EARLY FIRE HAZARD TEST RESULTS

Polywool is a Self Extinguishing product. Conforms to requirements of Aust/NZ Building Code requirements as tested in accordance with AS1530 part 3, results as follows:

Ignitability	(0-20)	0
Spread of Flame	(0-20)	0
Heat Evolved Index	(0-10)	0
Smoke Developed Index	(0-10)	0-3

MISCELLANEOUS PROPERTIES

Upper Use Temperature	160°C (320°F) Continuous Service
Weight	32kg/m3
Ingredients	Organic, Long Chain Synthetic Polymenr
Chemical Entity	Composed of Carbon-Hydrogen-Oxygen
Alkalinity	pH 7.8
Corrosiveness	Not classified as corrosive when tested in accordance with NZS4222

STITCHING

Insulock Thermocovers are machine stitched with Tri-filament pure PTFE thread. Insulock's standard stitch length is 4.5mm to ensure maximum tension on seams without bruising the fabric and reducing the chance of water ingression.

Thermocovers have concealed internal stitching as well as external stitching to extend the life, water resistance and durability of each cover.

PTFE thread is inert to chemical attack both directly through spillage and indirectly through airborne contaminants.

PTFE is suitable for applications both indoor and outdoor and is not affect by UV light.

Insulock *High Temperature Thermocovers* are machine stitched with a S2 Fibreglass twisted with Inconel steel sewing thread. These are capable to resist temperatures over 815°C (1500°F).

CLOSURES

Insulock removable Thermocovers always use a toggle closure system for ease of installation and removal where possible. Toggles are manufactured from 316 Stainless Steel.

DESIGN

Insulock removable Thermocovers are custom designed to ensure optimum fit for thermal integrity.

Items are modelled in house using the latest 3-D design software.

Materials are cut using state of the art CNC cutting.

Each Thermocover is assigned a unique serial number to ensure ease off order if a replacement cover is ever required.

All thermocovers are proudly *100% Australian made.*

INSTALLATION

Thermocovers are designed to be removed and reinstalled by one person in a matter of minutes.

Thermocovers do not require any tools for installation.

Appropriate fastening mechanisms are integrated into the Thermocover for ease of installation.

SAFETY

Thermocovers are designed to contain the appropriate thickness of insulation to keep the exterior surface temperature below OH&S guidelines and for Thermal efficiency.

All Thermocovers are asbestos free and do not contain carcinogens.

AVAILABILITY

Thermocovers are all individually designed and manufactured and are *not* available ex-stock.

Normal lead time is 10-15 days from receipt of purchase order, although this can vary according to factory loading.

Thermocovers are available for supply throughout Australia and internationally.

WARRANTY

Insulock Thermocovers are fully warranted to the original owner against defects in materials and workmanship for a period of 5 years. If a product ever fails due to a manufacturing defect, even after extended use, we will repair the product, with out charge, or replace it, at our discretion.

This warranty does not cover damage caused by accident, improper care, negligence, normal wear and tear, or the natural breakdown of colours over extended time and use.

Only original materials and workmanship are covered by this policy.