

EXPOL R1.4 WHITE UNDERFLOOR INSULATION – TECHNICAL DATA SHEET

1.0 - Product Overview

Trusted by Kiwis for more than 25 years, **EXPOL UnderFloor Insulation** (UnderFloor) is easy-to-install and is available in 4 convenient joist widths 360, 410, 470, 560 (mm). It is the DIY solution that will keep your home warm, dry and healthy.

Suitable for use in both new and existing homes, **EXPOL UnderFloor Insulation** comes with a 50-year product warranty and requires no maintenance.

EXPOL provides EXPOL R1.4 White, EXPOL R1.8 Black, R2.5 and R3.1 Black UnderFloor Insulation for insulating between the joists under timber floors. **EXPOL UnderFloor** is specifically designed for both new and existing floors.

2.0 - Installation

- 2.1 There are no special requirements for UnderFloor when handling or installing UnderFloor. It is an inert, non-toxic material.
- 2.2 When transporting, storing or installing, ensure the UnderFloor is not exposed to:
 - o Petroleum based solvents, or
 - o Fire, or
 - Sustained direct sunlight.
- 2.3 PVC sheathed electrical cables should not be allowed direct contact with UnderFloor.
- 2.4 UnderFloor is compatible with all common construction products.

3.0 - Maintenance

3.1 No maintenance required



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4.0 - Warranty

We believe we manufacture and supply the highest quality UnderFloor, EPS and XPS Foam Insulation products and that is why we stand behind them with some of the best warranties in the industry.

4.1 We provide a 50-year warranty on our UnderFloor Foam Insulation Products – for full warranty details visit www.expol.co.nz/expol-underfloor-warranty/

5.0 - Compliance with the New Zealand Building Code

UnderFloor, when installed and maintained in accordance with the requirements outlined in this technical data sheet, will meet or contribute to meeting the following provisions of the New Zealand Building Code:

- 5.1 Clause B2 Durability, performance B2.3.1 (a), B2.3.1(b)
- 5.2 Clause F2 Hazardous building materials performance F2.3.1(a)
- 5.3 Clause H1 Energy Efficiency, Performance H1.3.1 (a) and H1.3.2 E.

EXPOL UnderFloor is not subject to a warning or ban under the Building Act 2004.

6.0 - Quality Assurance

6.1 BRANZ, H1 Energy efficiency performance H1.3.1(a), H1.3.2(e)



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7.0 - Technical Data

Properties	Test / Method / Standard	Test Results
Material	Expanded Polystyrene	
Density	12 kg / m3	
Sheet Size	1200 mm x 60 mm x 360 mm	1200 mm x 60 mm x 410 mm
	1200 mm x 60 mm x 470 mm	1200 mm x 60 mm x 560 mm
Thickness / R Value	60mm	R 1.40
	120mm	R 2.80
Thermal Conductivity	ATSM 168	K – Value 0.043
Rate of water vapour transmission (max)		
measured parallel to rise at 23 deg C	AS 2498.5	630 mg/m2s
Permeability m/s		-
Compressive Resistance KPA at 1%	AS 2498.3	- KPA
Compressive Resistance KPA at 2%		- KPA
Compressive Resistance KPA at 5%		- KPA
Compressive Resistance KPA at 10%		70 KPA
Youngs Modulus	-	- MPA
Cross breaking strength KPA	AS 2498.4	135 KPA
Dimensional stability of length, width &		
thickness (max) at 70 deg C for 7 days	AS2498.6	1%
Long term water absorption by	ASTM C72	- %v / v
immersion		• •
Determination of flame propagation		
surface ignition		
	AS2122.1-1993	2 sec
Medium flame duration (max)		
,		3 sec
Eighth vale		
Fire behavior		
Spread of flame index $(0-10)$	AS/NZS 1530.3:1999	0
Smoke developed index (0 – 10)		5
Recycled Content	30%	
Recyclability	UnderFloor is 100% recyclable	
Environmental Statement	UnderFloor is inert and non-toxic. There are no chemicals or gases harmful to	
	the environment emitted from UnderFloor either during manufacture or within	
	use.	
Ozone Depleting Potential	UnderFloor does not contain ozone-depleting CFC or HCFC gases, nor use them	
	in its manufacture. As a result, UnderFloor has zero ozone depletion potential.	
Vermin Resistance	UnderFloor does not offer any nutritive value.	