Self-Adhesive EPDM Waterproofing Membrane

Fully vulcanised EPDM with a reactive butyl self-adhesive layer

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01 Product description

Nexbride-Waterproof Self-Adhesive EPDM Waterproofing Membrane combines fully vulcanised ethylene propylene diene monomer (EPDM) rubber with a reactive butyl self-adhesive layer and a removable release film. It is designed for building waterproofing on compatible concrete, mortar and metal surfaces. The adhesive layer bonds the membrane to the substrate, with compatible accessories used to complete joints and details.

02 Key features

- Fully vulcanised EPDM rubber with high elongation.
- Resistance to weathering, ultraviolet radiation and ozone.
- Single-sided butyl self-adhesive layer protected by a removable release film.

03 Recommended uses

Waterproofing of basement walls and roof decks, non-traffic concrete roofs and compatible metal surfaces. Basement slabs and roofs with pedestrian access require a suitable system and protective assembly. Confirm substrate and system compatibility for each application.

04 Product information

Item	Specification
Material and construction	Fully vulcanised EPDM sheet; reactive butyl adhesive on one side; removable release film.
Appearance and colour	Black EPDM surface. Butyl adhesive: white or black.
Nominal thickness	1.2 mm, 1.5 mm, 1.8 mm or 2.0 mm. 1.5 mm variant: tolerance ±5%.
Width and length	All thicknesses: 1.2 m x 20 m (width x length). 1.5 mm variant: width ±1%; no negative length deviation.
Roll coverage	All thicknesses: 24 m² per roll, before deduction for overlaps and cutting.
Packaging	1.2 mm and 1.5 mm: woven bag, 1 roll / 24 m² per package. 2.0 mm: woven-bag roll packaging.

05 Technical properties

Performance values apply to the 1.5 mm x 1.2 m x 20 m specification only. MD = longitudinal direction; TD = transverse direction.

Property	Test Method	Unit	Declared Value
Tensile strength at 23 °C	GB/T 18173.1-2012	MPa	Measured: MD 9.9; TD 10.3
Tensile strength at 60 °C	GB/T 18173.1-2012	MPa	Measured: MD 4.8; TD 5.1
Elongation at break at 23 °C	GB/T 18173.1-2012	%	Measured: MD 622; TD 648
Elongation at break at -20 °C	GB/T 18173.1-2012	%	Measured: MD 410; TD 413
Tear strength	GB/T 18173.1-2012	kN/m	Measured: MD 31; TD 33
Watertightness 0.3 MPa, 30 min	GB/T 18173.1-2012	Result	Test result: No leakage
Low-temperature flexibility -25 °C	GB/T 18173.1-2012	Result	Test result: No cracking
Dimensional change on heating [1]	GB/T 18173.1-2012	mm	Measured: Extension 0.2; shrinkage 1.4
Tensile strength retention after heat ageing [1]	GB/T 18173.1-2012	%	Measured: MD 93; TD 87
Elongation retention after heat ageing [1]	GB/T 18173.1-2012	%	Measured: MD 93; TD 90
Tensile strength retention after alkali exposure [2]	GB/T 18173.1-2012	%	Measured: MD 91; TD 90
Elongation retention after alkali exposure [2]	GB/T 18173.1-2012	%	Measured: MD 93; TD 93
Ozone ageing [3]	GB/T 18173.1-2012	Result	Test result: No cracking
Peel strength: sheet to sheet [4]	GB/T 18173.1-2012	N/mm	Measured: 0.9
Peel strength: sheet to aluminium [4]	GB/T 18173.1-2012	N/mm	Measured: 1.2
Peel strength: sheet to cement mortar board [4]	GB/T 18173.1-2012	N/mm	Measured: 1.1

Test conditions: [1] 80 °C for 168 h. [2] Saturated $Ca(OH)_2$ solution at 23 °C for 168 h. [3] 40 °C for 168 h, 40% elongation, ozone concentration 500 x 10^-8. [4] Standard test conditions; substrate as stated in each row.

Measured values and qualitative test results describe 1.5 mm specimens under the stated test conditions. They are not production acceptance limits or guaranteed field adhesion values, and do not establish performance for other thicknesses. Test temperatures are not installation or continuous service temperature limits.

06 Application guidelines

Substrates

Concrete, cement mortar and compatible metal surfaces. Select compatible jointing and detailing components for the project.

Installation

1. Position the membrane, remove the release film and bond the butyl self-adhesive face to the prepared substrate. Press the membrane into contact.
2. Where butyl lap tape is used for joints, apply it with compatible primer and consolidate with a hand roller.

07 Limitations and compatibility

- Use EPDM-compatible jointing and detailing materials. Verify compatibility with the actual metal surface or coating before installation.
- Alkali resistance applies only to the medium and conditions in Section 05; it does not establish resistance to all chemicals.

08 Storage

Item	Requirement
Storage conditions	Store horizontally on dry, level ground, no more than five rolls high. Protect from impact, cuts and direct sunlight. Keep transport packaging intact.
Storage compatibility	Prevent contact with acids, alkalis, oils and organic solvents.

09 Health and safety

Keep away from fire and open flames. Handle rolls carefully to avoid damage.

10 Technical notes

Dimensions are nominal unless a tolerance is stated. Gross roll area excludes overlap allowances. Performance values apply only to the 1.5 mm specification. No warranty period is defined by this sheet.