



Landflex ZR40 **0.50 Alumised Gas Membrane** **Gas and Damp Proof Barrier**

Building regulations require that proper preventative measures be taken to avoid danger to health and safety when building on contaminated land. Our Gas Barrier systems offer a safe solution for the protection of buildings and their occupants constructed in areas where gases are present - such as disused mines, coalfields, industrial and landfill sites.

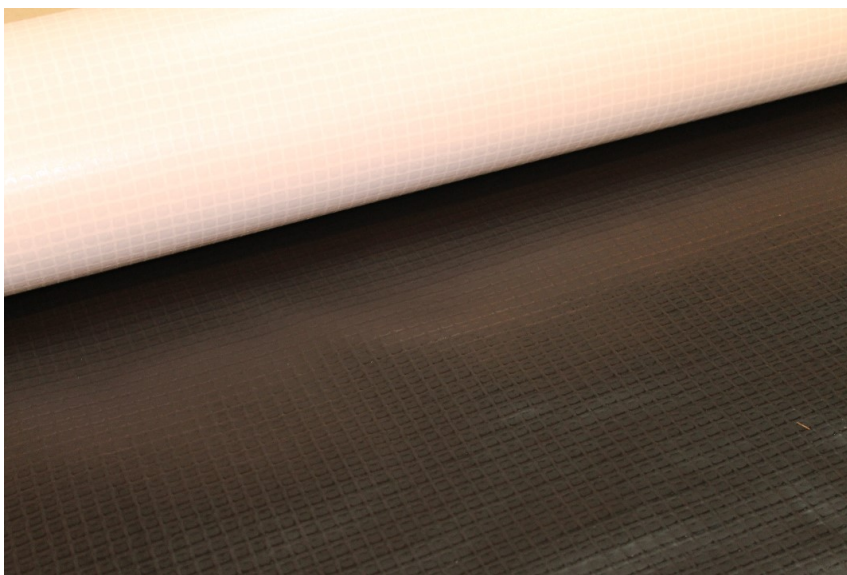
- **Low permeability to hydrocarbon & VOC vapours, Carbon Dioxide, methane & radon.**
- **Approved for use in NHBC Amber 2 applications**
- **Manufactured in accordance with ISO 9001, ISO 14001 & OSHAS 18001**
- **Multi layer reinforced LDPE membrane with Aluminium core**
- **Complies with relevant codes of**



Landflex ZR40 is recommended for use where medium to high concentrations of radon gas occur, or where methane, carbon dioxide and other gases are present. It can also serve as a damp proof membrane in solid concrete floors to protect structures against moisture from the ground.

Manufactured from multi-layer low-density polyethylene (LDPE) with a multi filament polyester (1670 dtex) reinforcing grid between to provide high strength and tear resistance, the membrane also incorporates an aluminium foil core for low gas permeability.

Landflex ZR40 is manufactured to last the lifetime of the construction provided it is correctly installed by trained technicians and not subject to mechanical damage by other building operations. The material has high puncture resistance and will not be damaged by normal footfall or site traffic on smooth or blinded surfaces.



EN 13967



BBA (British Board of Agrément) approval under certificate number 12/4912, held by Juta a.s, CZ



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The information herein is based upon data obtained by the manufacturer and is considered accurate. However, no warranty is expressed or implied regarding the accuracy of this data. This information is furnished upon the condition that the person receiving it shall evaluate its suitability for the specific application.

Characteristics	Test Method	Unit	Min	Avg	Max
Physical Properties					
Thickness	EN 1849-2	mm	0.5	0.6	0.7
Width	EN 1849-2	M	Various	Various	Various
Length	EN 1849-2	M	Various	Various	Various
Basis Weight	EN 1849-2	g/m ²	330	350	380
Hydraulic Properties					
Water Column Test	EN 20811	-	>300		
Resistance to water penetration	EN 13967, EN 1928	-	PASS		
Durability of water tightness against ageing	EN 1296, EN 13967, EN1928	-	PASS		
Mechanical Properties					
Resistance to static loading	EN 12730 Method B	Kg	20		
Tensile Strength MD	EN 12311-1	N/50mm	500	600	700
Tensile Strength CD	EN 12311-1	N/50mm	380	480	580
Elongation MD	EN 12311-1	%	10	20	30
Elongation CD	EN 12311-1	%	10	20	30
Resistance to tearing (nail shank) MD	EN 12310-1	N	270	330	400
Resistance to tearing (nail shank) CD	EN 12310-1	N	330	400	500
Durability and Chemical Resistance					
Transmission rate of volatile liquids – Diesel	ISO 6179:2010 Method B	g/m ² /h	0.246		
Transmission rate of volatile liquids – Xylene	ISO 6179:2010 Method B	g/m ² /h	0.571		
Transmission rate of volatile liquids – Toluene	ISO 6179:2010 Method B	g/m ² /h	0.583		
Transmission rate of volatile liquids – Petrol	ISO 6179:2010 Method B	g/m ² /h	0.135		
Radon Permeability	K124/02/95	m ² s-1	8 x 10-15		
Carbon Dioxide Permeability	DIN 53380-2	m ² /Pa-1/s-1	2.58 x 10-19		
Methane Gas Permeability	DIN 53380-2	m ² /Pa-1/s-2	1.56 x 10-19		
Gas transmission rate	DIN 53380-3	Cm ³ /m ² /Mpa-1/d-1	41.3		
Methane permeability at 1 atm	ASTM D1434 Method V	m ³ /m ² /den	1.87 x 10-5		
Methane permeability	ASTM D1434 Method V	cm ² /sec-atm	7.10 x 10-10		