

Product data sheet

COLETANCHE ES3 HFA

Description

Coletanche ES3 HFA is an elastomeric modified bituminous geomembrane.

Use

Extreme level of mechanical constraints, exposed or covered (puncturing materials, thick cover layer, high pressures). For example:

- Mining and industrial waste storage facilities,
- Bottom of landfill cells,
- Deep hydraulic ponds,
- Dams.

The membrane has the same friction angle on both sides.

The product use must be validated by consultation.

Application method

By torch welding or other similar process.

Storage

Rolls must not be stored directly on the ground. Provide suitable supports (blocks, slides, wooden planks) with a minimum height of 35 cm to be placed under the ends of the mandrel.

Composition (indicative)

Reinforcement:	Geotextile	300 g/m ²
Reinforcement:	Glass fleece	50 g/m ²
Binder:	Elastomeric bitumen	4800 g/m ²
Surface finish:	Sand	250 g/m ²
Underside finish:	Peel-off silicone coated film	40 g/m ²

Characteristics

		Standards	Units	Average	Minimum
Dimensions	Length	EN 1868-1	m	65	64
	Width		m	5,10	5,01
Thickness (on finished product)		EN 1869-1	mm	4,80	4,20
Surface mass		EN 1869-1	kg/m ²	5,80	5,00
Tensile properties: Strength	Longitudinal direction	EN 12311-1	N/50 mm	1400	1000
	Cross direction			1200	850
Tensile properties: Elongation	Longitudinal direction		%	45	30
	Cross direction			45	30
Flexibility at low temperature		EN 1109	°C	-20	-16
Static puncture	Resistance	EN ISO 12236	kN	3,9	3,2
	Displacement		mm	50	40
Water permeability		EN 14150	m ³ /m ² /d	1.10 ⁻⁶	<
Gas permeability		ASTM D1434-82	m ³ /(m ² .d.atm)	2.10 ⁻⁴	<
Dangerous substances according to the database "Dangerous substances" available on: http://europa.eu.int/comm/enterprise/construction/internal/dangsub/dangmain.htm		-	-	None	-
Durability					
Oxidation	Tensile strength according to EN 12311-1	EN 14575	%	100	75
				Maximum elongation	100
Weathering	Residual value according to EN 12226	EN 12224	%	100	75
				Maximum elongation	100