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Designated according to Article 29 of Regulation (EU) No 305/2011

BBA APPROVAL INSPECTION TESTING CERTIFICATION
TECHNICAL APPROVALS FOR CONSTRUCTION

European Technical Assessment ETA-07/0004

Second issue*

Technical Assessment Body issuing the ETA and designated according to Article 29 of the Regulation (EU) No 305/2011:

Trade name	Decothane Root Resistant Waterproofing System
Holder of assessment:	Sika Liquid Plastics Miller Street Preston Lancashire PR1 1EA United Kingdom
Generic type and use of construction product:	Roof Waterproofing
Issued on:	20 August 2014
Manufacturing plant:	Sika Liquid Plastics Miller Street Preston Lancashire PR1 1EA United Kingdom
This European Technical Assessment contains:	This European Technical Assessment contains 5 pages plus one Annex which forms an integral part of the document.
Basis of ETA:	This European Technical Assessment is issued in accordance with Regulation (EU) No 305/2011, on the basis of the *Guideline for European Technical Approval (ETAG) of Liquid Applied Roof Waterproofing Kits* 005 Part 1: *General* and Part 6 *Specific Stipulations for Kits Based on Polyurethane* Edition March 2000 Revised March 2004) used as the European Assessment Document (EAD).
This Assessment replaces:	ETA-07/004 with validity from 07/04/2009 to 20/08/2014.

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1 Technical description of the product

The kit consists of the following components:

- Decothane Root Resistant Base Coat and Top Coat — a root-resistant, one-part, moisture-triggered, liquid-applied aliphatic polyurethane roof waterproofing applied as a base coat and a top coat
- Decothane Root Resistant Detail Coat — a root-resistant, one-part, moisture-triggered, liquid-applied aliphatic polyurethane for use as a topcoat in exposed areas of the system (eg upstands)
- Sika Reemat Premium — a non-woven glass reinforcement for use as a reinforcement embedded in the Base Coat layer while still wet, and available for use in strips to cover individual cracks, joints or details
- Sika Flexitape — a nylon mesh available in light- and heavy-duty grades for use in reinforcing over cracks or substrate joints.

The kit is used to produce a two-coat application. The application rates, finished thickness and reinforcements are given in the following table.

Coverage rate and finished thickness

Layer	Specification build-up
Base coat ($\ell \cdot m^{-2}$)	1.5
Reinforcement	Sika Reemat Premium
Top coat ($\ell \cdot m^{-2}$)	1.0
Finished thickness (mm)	2.1

At exposed areas, such as upstands, Decothane Root Resistant Detail Coat should be substituted for the Decothane Root Resistant Top Coat applied in two coats at the rate of 0.75 $\ell \cdot m^{-2}$ and 0.75 $\ell \cdot m^{-2}$.

2 Specification of the intended use in accordance with the applicable EAD

The kit is for use as a liquid-applied roof waterproofing in:

- warm ballasted roof specifications using pavers or other suitable protection on flat roofs with limited or pedestrian access
- inverted roof specifications using aggregate ballast on flat roofs with limited access
- protected inverted roof specifications using pavers or other suitable protection on flat roofs with limited or pedestrian access
- green roof specifications (defined as extensive, lightweight systems composed typically of succulents, such as sedum, or other hardy plant species) on flat roofs with limited or pedestrian access or pitched roofs with limited access
- roof garden specifications (defined as intensive systems designed primarily for recreational use and requiring structural consideration to accommodate the additional weight) on flat roofs with limited or pedestrian access
- biodiverse specifications (similar in composition to an extensive roof but designed specifically to create a habitat) on flat roofs with limited or pedestrian access or pitched roofs with limited access.

The kit has been assessed for use on precast concrete, concrete block substrate decks, screeds, asphalt, bitumen felt, and correctly-constructed plywood decks.

The provisions made in this European Technical Assessment are based on an assumed working life of the roof of 25 years. The indications given on the working life cannot be interpreted as a guarantee given by the producer, but are to be regarded only as a means for choosing the right products in relation to the expected economically reasonable working life of the works.

3 Performance of the product and references to the methods used for its assessment

3.1 Mechanical resistance and stability (ER1)

Not relevant

3.2 Safety in case of fire (ER2)

Characteristic	Method	Classification
External fire performance	ENV 1187 : 2002 Test 4 Classified to EN 13501-5 : 2005 + A1 : 2009	See Annex A
Reaction to fire	EN ISO 11925-2 : 2010 Classified to EN 13501-1 : 2007 + A1 : 2009	See Annex A

3.3 Hygiene, health and the environment (ER3)

Characteristic	Method	Category
Resistance to water vapour	EN 1931 : 2000	See Annex A
Watertightness	EOTA TR-003	See Annex A
Resistance to wind loads	EOTA TR-004	See Annex A
Resistance to dynamic indentation	EOTA TR-006	See Annex A
Resistance to static indentation	EOTA TR-007	See Annex A
Resistance to fatigue movements	EOTA TR-008	See Annex A
Effect of low surface temperatures	EOTA TR-006	See Annex A
Extreme low temperatures	EOTA TR-006	
EOTA TR-013	NPD	
Effects of high surface temperature	EOTA TR-007	See Annex A
Resistance to heat ageing	EOTA TR-011 EN ISO 527-4 : 1996 EOTA TR-006 EOTA TR-008	See Annex A
UV radiation in the presence of water	EOTA TR-010	EN ISO 527-4 : 1996
Resistance to water ageing	EOTA TR-012 EOTA TR-004 EOTA TR-007	See Annex A
Root resistance	EN 13948 : 2007	See Annex A
Content and/or release of dangerous substances[1]	EOTA TR-034	NPD

(1) The manufacturer has made a declaration that the product does not contain any dangerous substances.

3.4 Safety in use (ER 4)

Characteristic	Method	Category
Resistance to wind loads	EOTA TR-004	See Annex A
Resistance to water ageing	EOTA TR-012 EOTA TR-004	See Annex A
Slipperiness	EN 13893 : 2002	See Annex A

3.5 Protection against noise (ER 5)

Not relevant.

3.6 Energy economy and heat retention (ER 6)

Not relevant.

3.7 Related aspects to serviceability

Characteristic	Method	Category
Comparative testing of dynamic indentation – variation in installation temperature	EN ISO 527-4 : 1996 EOTA TR-006	See Annex A
Effects of day joints	EOTA TR-004	See Annex A

4 Assessment and verification of constancy of performance (AVCP) system applied, with reference to its legal base.

According to the Decision 98/599/EC of the European Commission(1) and amended by Decision 2001/596/EC of the European Commission(2), the system of assessment and verification of constancy of performance (see Annex V to Regulation (EU) No 305/2011) given in the following table applies.

Product	Intended use	Level or class	System
Liquid applied roof waterproofing kits	For all roof waterproofing uses	–	3

(1) Official Journal of the European Communities L 287 of 24.10.1998.

(2) Official Journal of the European Communities L 209 of 02.08.2001.

5 Technical details necessary for the implementation of the AVCP system, as outlined in the applicable EAD

5.1 Tasks of the manufacture

The manufacturer must make a declaration of conformity, stating that the construction product is in conformity with the provisions of the European Technical Assessment.

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On behalf of the British Board of Agrément

Date of Second issue: 20 August 2014

Simon Wroe
Head of Approvals — Materials

Claire Curtis-Thomas
Chief Executive

*Origonal ETA issued on 7 April 2009.

**Amended 18 September 2014 due to missing clauses.

ANNEX A CATEGORISATION OF LEVELS OF PERFORMANCE OF DECOTHANE ROOT RESISTANT WATERPROOFING SYSTEM

This annex applies to the Decothane Root Resistant Waterproofing System roof waterproofing kit described in the main body of the European Technical Assessment.

The substrates applicable to this kit are defined in the main body of the European Technical Assessment.

The kit has the following characteristics:

- water vapour resistance factor (μ) — 1235
- resistance to wind loads — >50 kPa
- assembled kit thickness — 2.1 mm.

The categorisation of levels of performance in accordance with ETAG 005 are as follows:

- External fire performance — NPD(1)
- Reaction to fire — Euroclass F
- Categorisation by working life — W3
- Categorisation by climatic zones — M and S(2)
- Categorisation by imposed loads — P4
- Categorisation by roof slope — S1
- Categorisation by surface temperature
  lowest — TL1
  highest — TH2
- Statement on dangerous substances — None contained
- Root resistance(3) — Satisfactory
- Slipperiness — NPD

(1) When the kit is fully covered by the inorganic coverings listed in the Annex of Commission Decision 2000/553/EC it can be considered to satisfy the requirements regarding external fire performance without the need for testing in accordance with the Commission Decision 2000/553/EC.

(2) UV ageing not carried out as assembled kit is always under protection.

(3) Tested to DIN 4062 : 1978 *Cold processable plastic jointing materials for sewer drains; jointing materials for prefabricated parts of concrete, requirements, testing and processing.*

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