Declaration of Performance



T4305ARCPR

1. Unique identification code of the product-type:

Thermo-teK BD 040, Thermo-teK BD 040 ALU, Thermo-teK BD 040 VWS, Thermo-teK BD 040 VBS, Thermo-teK BD 040 WBS

2. <u>Intended use or uses:</u>

Thermal Insulation products for building equipment and industrial installations

3. Manufacturer:

Knauf Insulation d.o.o.

Varaždinska 140, 42220 Novi Marof

Croatia

www.knaufinsulation.com - dop@knaufinsulation.com

4. <u>Authorised representative:</u>

Not applicable

5. System or systems of assessment and verification of constancy of performance:

AVCP System 1 for Reaction to Fire

AVCP System 3 Internal measurements for mechanical and thermal properties

6a. Harmonized Standard:

EN 14303:2009 + A1:2013

Notified body or bodies:

AVCP System 1: Forschungsinstitut für Wärmeschutz e. V. München FIW München (Notified certification body No. 0751)

6b. European Assessment document: not applicable

European Technical Assessment: not applicable Technical Assessment Body: not applicable

Notified body/ies: not applicable

7. Declared Performances:

See next page

T4305ARCPR 23-01-19 Version 4.0 1/7

T4305ARCPR Thermo-teK BD 040



Essential Characteristics	T4305ARCPR			Harmonised Technical
	Performance		Thermo-teK BD 040	Standard
Reaction to fire	Reaction to fire		A1	EN 14303:2009 + A1:2013
Acoustic Absorption Index	Sound Absorption		NPD	
Water Permeability	Water Absorption		WS1	
Water Vapour Permeability	Water Vapour Diffusion Resistance		NPD	
Compressive Strength	Compressive Stress or Compressive Strength for Flat Products		NPD	
Rate of release of corrosive substances	Trace quantities of water-soluble value	ions and the pH-	CL10	
Release of Dangerous Substances to the indoor environment	Release of Dangerous Sub	ostances	NPD	
Continuous glowing combustion	Continuous glowing com	bustion	NPD	7
Durability of reaction to fire against ageing / degradation	Durability characteristics		NPD {b}	
Durability of thermal resistance against ageing/degradation	Thermal Conductivity Dimensional Stability		NPD {c}	_
	Maximum service temperature - dimensional stability		250°C	
	Durability characteristics		NPD	
Durability of reaction to fire against high temperature	Durability characteristics		NPD {d}	
Description of the construction of the least			NDD (-)	_
Durability of thermal resistance against high temperature	Durability Characteristics		NPD {c}	
	Maximum service temperature - dimensional stability		250°C	
Thermal Resistance	Dimensions & Tolerances		30 - 255 / T5	
	Thermal conductivity (W/mk) at	10	0,036	7
	Temperature in °C	40	0,040	7
		50	0,042	7
		100	0,052	7
		150	0,065	7
		200	0,081	7
		250	0,100	7
		NPD	NPD	7
		NPD	NPD	7
	NPD - No performance	e determined		<u>'</u>

T4305ARCPR 23-01-19 Version 4.0 2/7

T4305ARCPR Thermo-teK BD 040 ALU



Essential Characteristics	T4305ARCPR			Harmonised Technic	
	Performance		Thermo-teK BD 040 ALU	Standard	
Reaction to fire	Reaction to fire		A2 - s1, d0	EN 14303:2009 + A1:2013	
Acoustic Absorption Index	Sound Absorption	Sound Absorption			
Water Permeability	Water Absorption	1	WS1		
Water Vapour Permeability	Water Vapour Diffusion Resistance		MV1		
Compressive Strength	Compressive Stress or Compressive Strength for Flat Products		NPD		
Rate of release of corrosive substances	Trace quantities of water-soluble ions and the pH-value		CL10		
Release of Dangerous Substances to the indoor environment	Release of Dangerous Substances		NPD		
Continuous glowing combustion	Continuous glowing com	bustion	NPD	-	
Durability of reaction to fire against ageing / degradation	Durability characteristics		NPD {b}		
Durability of thermal resistance against ageing/degradation	Thermal Conductivity		NPD {c}		
-gg,g	Dimensional Stability		NPD		
	Maximum service temperature - dimensional stability		250°C		
	Durability characteristics		NPD	1	
Durability of reaction to fire against high temperature	Durability characteristics		NPD {d}		
Durability of thermal resistance against high	Durability Characteristics		NPD {c}		
temperature	Maximum service temperature - dimensional stability		250°C		
Thermal Resistance	Dimensions & Tolerances		45 - 255 / T5		
	Thermal conductivity (W/mk) at	10	0,036	-	
	Temperature in °C	40	0,040		
		50	0,042	1	
		100	0,052	1	
		150	0,065	1	
		200	0,081	1	
		250	0,100	1	
		NPD	NPD		
		NPD	NPD]	

T4305ARCPR 23-01-19 Version 4.0 3/7

T4305ARCPR Thermo-teK BD 040 VBS



Essential Characteristics		Harmonised Technical		
	Performance		Thermo-teK BD 040 VBS	Standard
Reaction to fire	Reaction to fire		A2 - s1, d0	EN 14303:2009 + A1:2013
Acoustic Absorption Index	Sound Absorption		NPD	-
Water Permeability	Water Absorption	1	WS1	-
Water Vapour Permeability	Water Vapour Diffusion Re		NPD	-
Compressive Strength	Compressive Stress or Compressive Strength for Flat Products		NPD	-
Rate of release of corrosive substances	Trace quantities of water-soluble value	Trace quantities of water-soluble ions and the pH-value		-
Release of Dangerous Substances to the indoor environment	Release of Dangerous Sub	ostances	NPD	-
Continuous glowing combustion	Continuous glowing com	bustion	NPD	1
Durability of reaction to fire against ageing / degradation	Durability characteristics		NPD {b}	
Durability of thermal resistance against	The section is in		NDD (-)	
ageing/degradation	Thermal Conductivity Dimensional Stability		NPD {c}	
	Maximum service temperature - dimensional stability		250°C	
	Durability characteristics		NPD	
Durability of reaction to fire against high temperature	Durability characteristics		NPD {d}	
Durability of thermal resistance against high			NPD {c}	-
temperature	Durability Characteristics Maximum service temperature - dimensional stability		250°C	_
Thermal Resistance	Dimensions & Tolerances		45 - 255 / T5	-
merma nesistance	Thermal conductivity (W/mk) at	10	0,036	-
	Temperature in °C	40	0,040	-
		50	0,040	-
		100	0,052	-
		150	0,065	-
		200	0,081	-
		250	0,100	-
		NPD	NPD	-
		NPD	NPD	-
	NPD - No performance			

T4305ARCPR 23-01-19 Version 4.0 4/7

T4305ARCPR Thermo-tek BD 040 VWS



Essential Characteristics		Harmonised Technical		
	Performance		Thermo-teK BD 040 VWS	Standard
Reaction to fire	Reaction to fire		A2 - s1, d0	EN 14303:2009 + A1:2013
Acoustic Absorption Index	Sound Absorption NPD		-	
Water Permeability	Water Absorption	1	WS1	
Water Vapour Permeability	Water Vapour Diffusion Re	esistance	NPD	
Compressive Strength	Compressive Stress or Compressive Strength for Flat Products		NPD	
Rate of release of corrosive substances	Trace quantities of water-soluble value	ions and the pH-	CL10	
Release of Dangerous Substances to the indoor environment	Release of Dangerous Sub	ostances	NPD	
Continuous glowing combustion	Continuous glowing com	bustion	NPD	1
Durability of reaction to fire against ageing / degradation	Durability characteristics		NPD {b}	
Durability of thermal resistance against	Thermal Conductivity		NPD {c}	
ageing/degradation	Dimensional Stability		NPD	
	Maximum service temperature - dimensional stability		250°C	
	Durability characteristics		NPD	
Durability of reaction to fire against high temperature	Durability characteristics		NPD {d}	
Durability of thermal resistance against high	Durability Characteristics		NPD {c}	
temperature	Maximum service temperature - dimensional stability		250°C	
Thermal Resistance	Dimensions & Tolerances		45 - 255 / T5	
	Thermal conductivity (W/mk) at	10	0,036	-
	Temperature in °C	40	0,040	-
		50	0,042	-
		100	0,052	1
		150	0,065	1
		200	0,081	1
		250	0,100	1
		NPD	NPD	1
		NPD	NPD	1
	NPD - No performance	e determined		

T4305ARCPR 23-01-19 Version 4.0 5/7

T4305ARCPR Thermo-teK BD 040 WBS



Essential Characteristics	T4305ARCPR			Harmonised Technical
	Performance		Thermo-teK BD 040 WBS	Standard
Reaction to fire	Reaction to fire		A1	EN 14303:2009 + A1:2013
Acoustic Absorption Index	Sound Absorption		NPD	
Water Permeability	Water Absorption		WS1	
Water Vapour Permeability	Water Vapour Diffusion Resistance		NPD	
Compressive Strength	Compressive Stress or Compressive Strength for Flat Products		NPD	
Rate of release of corrosive substances	Trace quantities of water-soluble value	ions and the pH-	CL10	
Release of Dangerous Substances to the indoor environment	Release of Dangerous Sub	ostances	NPD	
Continuous glowing combustion	Continuous glowing com	bustion	NPD	1
Durability of reaction to fire against ageing / degradation	Durability characteristics		NPD {b}	
Durability of thermal resistance against ageing/degradation	Thermal Conductivity Dimensional Stability		NPD {c}	-
	Maximum service temperature - dimensional stability		250°C	
	Durability characteristics		NPD	
Durability of reaction to fire against high temperature	Durability characteristics		NPD {d}	
Durahilita of the areal resistance assignt high	Down hillite. Characteria	.	AIDD (a)	-
Durability of thermal resistance against high temperature	Durability Characteristics		NPD {c} 250°C	
	Maximum service temperature - dimensional stability		250 C	
Thermal Resistance	Dimensions & Tolerances		45 - 255 / T5	-
	Thermal conductivity (W/mk) at	10	0,036	1
	Temperature in °C	40	0,040	1
		50	0,042	
		100	0,052	1
		150	0,065	1
		200	0,081	
		250	0,100	1
		NPD	NPD	
		NPD	NPD	
	NPD - No performance	e determined		

T4305ARCPR 23-01-19 Version 4.0 6/7



8. <u>Appropriate Technical Documentation and / or Specific Technical Documentation:</u>

Not applicable

The performance of the product identified above is in conformity with the set of declared performances.

This declaration of performance is issued, in accordance with Regulation (EU) No 305/2011, under the sole responsibility of the manufacturer identified above.

Signed for an on behalf of the manufacturer by:

Stjepan Mršić - Plant manager

(Name and function)

Novi Marof - 23-01-19

(Place and date of issue)

Footnotes

{a} The requirement on a certain characteristic is not applicable in those Member Stats (MSs) where there are no regulatory requirements on that characteristic for the intended use of the product. In this case, manufacturers placing their products on the market of these MSs are not obliged to determine nor declare the performance of their products with regard to this characteristic and the option 'No performance determined' (NPD) in the information accompanying the CE marking (see ZS.3) may be used. The NPD option may not be used, however, where the characteristic is subject to a threshold level (thermal resistance (thermal conductivity and thickness)).

(b) The fire performance of mineral wool does not deteriorate with time. The Euroclass classification of the product is related to the organic contents, which cannot increase with time.

{c} Thermal conductivity of mineral wool products does not change with time, experience has shown the fibre structure to be stable and the porosity contains no other gases than atmospheric air.

{d} The fire performance of mineral wool does not deteriorate with high temperature. The Euroclass classification of the product is related to the organic content, which remains constant or decreases with high temperature.

T4305ARCPR 23-01-19 Version 4.0 7/7