

	Test method	Requirements	Average test results from running production									
			uni 2.0 mm logic 2.0 mm signa 2.0 mm stone 2.0 mm mega 2.0 mm plus 2.0 mm classic 2.0 mm grip 2.0 mm	ultra grip 2.0 mm	eco 2.0 mm	signa 3.0 mm	mega 3.0 mm	stone acoustic mega acoustic signa acoustic	stone al 2.0 mm mega al 2.0 mm plus al 2.0 mm signa al 2.0 mm	plus al 3.5 mm signa al 3.5 mm	duo el	
CÉ conformity	EN 14 041		← Manufacturer: nora systems GmbH, D-69469 Weinheim →									
Dynamic coefficient of friction	EN 13 893		← DS →									
Electrical behaviour	EN 1081		-	-	-	-	-	-	-	-	≤ 10 ⁹	≤ 10 ⁹
Reaction to fire	EN 13 501-1	not bonded	← C _f s1 →									
Reaction to fire	EN 13 501-1	bonded on mineral subfloor	B _f s1	C _f s1	C _f s1	C _f s1	B _f s1	-	-	-	-	-

Properties acc. to EN 1817/EN 14 521

Thickness	EN 428	Mean of nominal value without foam backing ± 0.15 mm with foam backing ± 0.20 mm	2.0 mm -	2.0 mm -	2.0 mm -	3.0 mm -	3.0 mm -	- 4.0 mm	2.0 mm -	3.5 mm -	2.5 mm -	
Dimensional stability	EN 434	± 0.4 %	← ± 0.3 % →									
Cigarette-burn resistance	EN 1399	Procedure A (stubbed out) level ≥ 4 Procedure B (burning) level ≥ 3	← fulfilled →							-	fulfilled	
Flexibility	EN 435, procedure A	Mandrel diameter 20 mm, no fissuring	← fulfilled →				-	-	← fulfilled →		-	fulfilled
Hardness	ISO 7619	≥ 75 Shore A	92 Shore A	92 Shore A	92 Shore A	92 Shore A	92 Shore A	85 Shore A	92 Shore A		92 Shore A	
Residual indentation	EN 433	Mean value ≤ 0.15 mm at thickness < 2.5 mm	0.05 mm	0,05 mm	0.06 mm	-	-	-	0.05 mm	-	-	
		Mean value ≤ 0.20 mm at thickness ≥ 2.5 mm	-	-	-	0.05 mm	0.05 mm	-	-	0.05 mm	0.03 mm	
		acoustic: Mean value ≤ 0.25 mm	-	-	-	-	-	0.25 mm	-	-	-	
Abrasion resistance at 5 N load	ISO 4649, procedure A	≤ 250 mm ³	200 mm ³	200 mm ³	230 mm ³	200 mm ³	200 mm ³	150 mm ³	180 mm ³		150 mm ³	
Colour fastness to artificial light	EN 20 105-802, procedure 3, test conditions 6.1 a)	at least level 6 on the blue scale level ≥ 3 on the grey scale (= 350 MJ/m ²)	← grey scale ≥ level 3 acc. to EN 20 105-A 02 →									
Classification	EN 685	Residential/Commercial/Industrial	23/34/42	23/34/42	23/34/42	23/34/43	23/34/43	23/33/-	23/34/42	23/34/43	23/34/43	

Additional technical properties

Fire behaviour	DIN 4102		← B1 →								
Toxicity of fire gases	DIN 53 436		← carbonisation gases are non-toxic →								
Anti-slip properties	DIN 51 130	according BGR 181	stone: R 10 grip: R 10 other: R 9	R 11	R 9	R 9	R 9	R 9	stone al: R 10 other: R 9	R 9	
	DIN 51 097		-	A; B; C	-	-	-	-	-	-	
	BS 7976 TRRL Pendulum		-	36+ wet & dry	-	-	-	-	-	-	
	SATRA TM 144		-	wet: > 0,6 dry: > 0,45	-	-	-	-	-	-	
Improvement in footfall sound absorption	ISO 140-8		6 dB	7 dB	5 dB	8 dB	8 dB	20 dB	6 dB	10 dB	6 dB
Effect of chemicals	EN 423		← resistant depending on concentration and time of exposure* →								
Thermal conductivity	DIN 52 612		0.61 W/mK	0.61 W/mK	0.61 W/mK	0.61 W/mK	0.61 W/mK	0.12 W/mK	0.54 W/mK	0.45 W/mK	
			← suitable for underfloor heating systems →								
Electrical insulation properties	IEC 60093, VDE 0303 T.30		← > 10 ¹⁰ Ohm →							electrical behaviour see below	
Electrical propensity when walked upon	EN 1815		← antistatic, charging in case of rubber soles < 2 kV →							electrical behaviour see below	
Effect of a castor chair	EN 425		← suitable if castor wheels, type W, according to EN 12 529 are used →								

Electrical behaviour**

Resistance to EPA ground	ESD STM 7.1/ IEC 61340-4-1	measuring the installed floor at 23 °C (± 2 °C) and ≥ 25 % r.h.	-	-	-	-	-	-	10 ⁶ - 9 x 10 ⁷ Ohm	< 10 ⁶ Ohm
		measuring the installed floor at 23 °C (± 2 °C) and < 25 % r.h., installed on an appropriate subfloor build up	-	-	-	-	-	-	10 ⁶ - 10 ⁹ Ohm***	< 10 ⁶ Ohm
Operator system - Resistance to ground	ESD STM 97.1/ IEC 61340-4-5	for the system floor/ conductive footwear (R < 5 x 10 ⁶ Ohm) measuring the installed floor at 23 °C (± 2 °C) and ≥ 25 % r.h.	-	-	-	-	-	-	≤ 3.5 x 10 ⁷ Ohm	< 3.5 x 10 ⁷ Ohm
Body voltage generation	ESD STM 97.2 IEC 61340-4-5	tested with defined conductive footwear with 21 °C and 20 % r.h.	-	-	-	-	-	-	< 10 V	< 10 V
Resistance to earth	EN 1081		-	-	-	-	-	-	10 ⁶ - 9 x 10 ⁷ Ohm	< 10 ⁶ Ohm
Insulation resistance	VDE 0100 / T.610 / CENELEC HD 384.6.61 S2:2003		-	-	-	-	-	-	≥ 5 x 10 ⁴ Ohm	-

* In case of increased impact of oils, grease, acids, alkalis and other aggressive chemicals- please contact us.
 ** If installed electrically dissipative and conductive in conformity with our installation instruction and according to the recommendations of the adhesive manufacturer.
 The used adhesive has to have a permanent resistance of R < 3 x 10⁶ Ohm according to EN 13 415.
 *** If extremely low humidity values (< 25 % relative air humidity (= r.h.)) are expected for a longer period, please contact **nora systems GmbH**, Technical Service, for advice.

EN 1817: Specification for homogeneous and heterogeneous smooth elastomer floorcoverings
 EN 14 521: Specification for smooth rubber floorcoverings with or without foam backing with a decorative layer.
 Colour variations due to different production batches as well as technical alterations to improve the product have to be accepted.