Technical datasheet

PA 6 E (Polyamide 6 extruded)

Example of application
› slide roller; gear wheels; diversion wheel

Advantages	Disadvantages
› very high hardness › very high resistance › dimensional stability	› high water absorption › bad UV-resistance

Basic information	Specification
Format	**round material:** 6 mm up to 200 mm availablei 3 m length **sheets:** 0.5 mm up to 50 mm available in 2 m x 1 m

Physical properties	Standard term/Specification*	Unit	Testing method
Density	1.13	g/cm^3	ISO 1183
Moisture ingress	9.5	%	DIN EN ISO 62

Mechanical properties	Standard term/Specification*	Unit	Testing method
Tensile strength	54	MPa	DIN EN ISO 527
Elongation at break	50	%	DIN EN ISO 527
E-Module	3.330	MPa	DIN EN ISO 527
Notch toughness	7	kJ/m^2	ISO 179
Rochwellhardness	155	MPa	DIN EN ISO 2039

Thermal properties	Standard term/Specification*	Unit	Testing method
Thermal conductivity	0.32	W/(m·K)	DIN 52612
Linear thermal expansion coefficient based on a fixed initial length	1.1	K^{-1} · 10^{-4}	DIN 53752
	2.2	mm	At initial length of 1.000 mm and a temperature difference of 20 °C.
Max. operating temperature, long-term	100	°C	
Max. operating temperature, short-term	n.sp.	°C	
Min. operating temperature, long-term	-40	°C	

Electrical properties	Standard term/Specification*	Unit	Testing method
Resistance	10^{13}	Ω·cm	DIN IEC 60093
Outer surface coefficient	10^{13}	Ω	DIN IEC 60093
Puncture resistance	30	kV/mm	DIN EN 60243

Legend
n.sp. = not specified

Should you require binding and exact values, please ask for the appropriate factory certificate. This may incur additional costs. Please note that all specifications are standard values only, which are subject to production-related fluctuations.
*Higher specification on request.

All information based on current knowledge and experience. Information provided shall not exempt the contractor or user from conducting own tests. A legally binding warranty as to product features or its suitability for specific purposes may not be derived therefrom. Compliance with any proprietary rights as well as existing laws or regulations is the responsibility of the recipient of our products. No liability assumed for printing and any other errors. Technical data subject to change without notice. Reproduction or duplication of this document or its contents - whole or in part - is only permitted with express approval by company noltewerk. The German version of this data shall prevail. As of 1119.

technical plastics

noltewerk GmbH & Co. KG · Mergenthalerstr. 15 · 48268 Greven · Germany · t +49 (25 71)16-0 · f +49 (25 71)16-402 · info@noltewerk.de · www.noltewerk.de