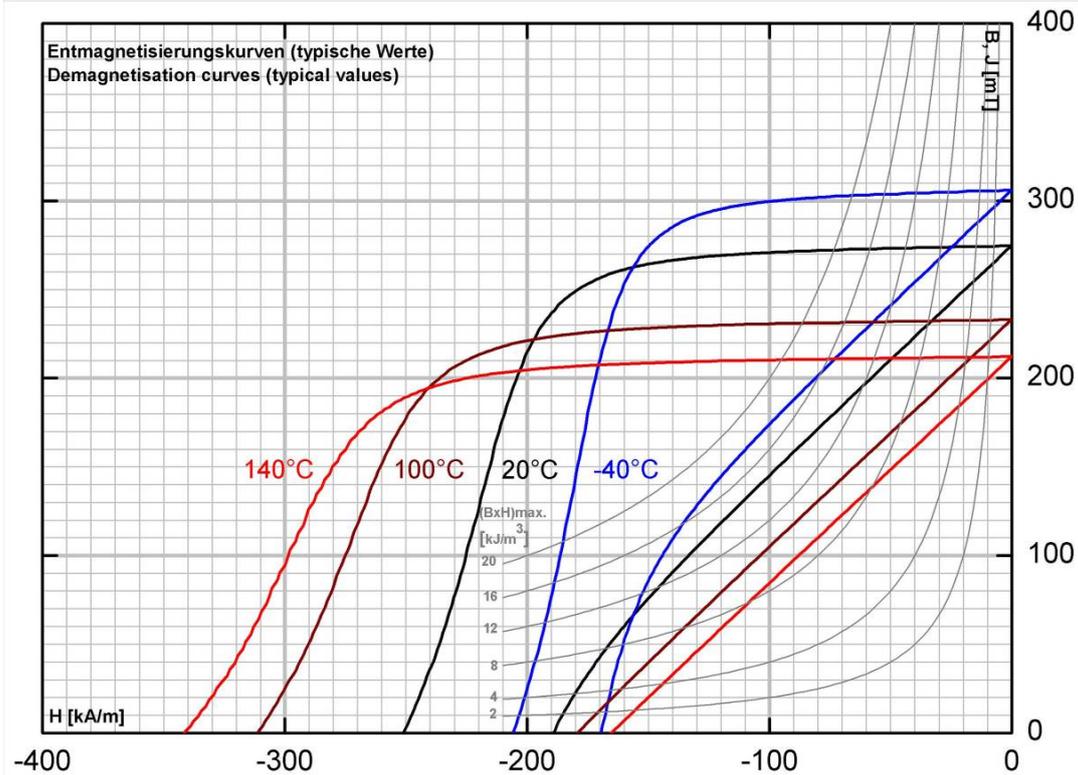


PLASTIC BONDED MAGNETS

HF 14/22 p

anisotropic, injection moulded



MATERIAL DATA

Magnetic values as in DIN IEC 60404-8-1

Energy product (B·H) _{max.}	typ.	kJ/m ³	14.5
	min.	kJ/m ³	14.0
Remanence B _r	typ.	mT	275
	min.	mT	265
revers. Temp. coeff. of B _r	approx.	%/K	-0.19
Coercivity H _c	H _{cB} typ.	kA/m	190
	H _{cB} min.	kA/m	180
	H _{cJ} typ.	kA/m	230
	H _{cJ} min.	kA/m	220
revers. Temp. coeff. of H _{cJ}	approx.	%/K	+0.3
relative permanent permeability μ _{rec.}	approx.		1.05
Curie temperature	approx.	°C	450
Magnetising field strength	min.	kA/m	800

Operating temperature

Matrix binder PA 6 ²⁾	max.	°C	160 ¹⁾
Matrix binder PA 12 ⁵⁾	max.	°C	140 ¹⁾
Matrix binder PPS ³⁾⁴⁾	max.	°C	160 ¹⁾

Mechanical values

Density	approx.	g/cm ³	3.6
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¹⁾ The max. operation temperature depends on the exposure time, the magnet dimensions as well as the specific application. With PA high temperatures have an extra negative impact on the mechanical characteristics with increasing duration of exposure. Please get in touch with our applications engineers for any further info.

²⁾ For binder PA 6 the magnetic values for H_{cB} min./H_{cB} typ. are reduced by -10 kA/m each and H_{cJ} min./H_{cJ} typ. by -30 kA/m each.

³⁾ For magnets with PPS as binder, the chemical resistance to oils, grease, motor oils etc. is significantly better than for PA-bonded magnets; however this has to be checked in individual cases.

⁴⁾ On request.

⁵⁾ Drinking water approval on request.

All values indicated were determined on a sample (10 mm x 10 mm x 5 mm) following IEC 60404-5.

For unfavourable geometries, especially for thin magnets or tight pole pitches, the excessively fast solidification process or insufficient orienting field strength can cause the material data to be less than optimal.