

HABA 2316-S

Plastic mould steel

Grinded plates cut to size

Tempered, corrosion-resistant plastic mould steel with good machinability and dimensional stability. It is used as pattern plates in plastic injection dies and also for corrosion-resistant components for mechanical engineering.

FINISHES

Thickness	grinded Ra1.6 (N7)
Tolerance	+/-0.1 mm
Parallelism	≤0.05 mm
Evenness	≤0.2 mm
Length/width	Ra12.5 (N10) cut with a precision circular saw
HABA standard tolerance	nominal size +0.8/+0.3 mm
Customer-specific tolerance	within a tolerance field of 0.4 mm

We also manufacture rolled and milled blanks on request as well as special thicknesses and tolerances.

TECHNICAL SPECIFICATIONS

Tensile strength R_m	950-1100 (N/mm ²)
Yield strength $R_{p0.2}$	ca. 750-950 (N/mm ²)
Breaking strain $(L_o = 5 d_o) A_5$	≥5 %
Brinell hardness (HB)	280-325
Density	7.85 kg/dm ³
Thermal conductivity coefficient	35-45 (W/mK)
Thermal expansion coefficient	10.5-12 (10 ⁻⁶ /K)

HEAT TREATMENT

Soft annealing	850-880°C
Low-stress annealing	550-600°C
Hardening	1000-1050°C / Oil, heat bath
Tempering	180-500°C

CHEMICAL COMPOSITION

Carbon	C	0.28-0.38 %	Chromium	Cr	15.0-17.0 %
Silicium	Si	≤1.00 %	Molybdenum	Mo	-
Manganese	Mn	≤1.40 %	Nickel	Ni	≤1.00%
Phosphor	P	≤0.03 %	Vanadium	V	-
Sulfur	S	0.05-0.10 %	Nitrogen	N	-

Material no.	1.2085
Steel quality	Plastic mould steel
Designation	X33CrS16

MATERIAL IN USE

Mould construction
Jig manufacturing
Mechanical engineering
Plant construction
Toolmaking

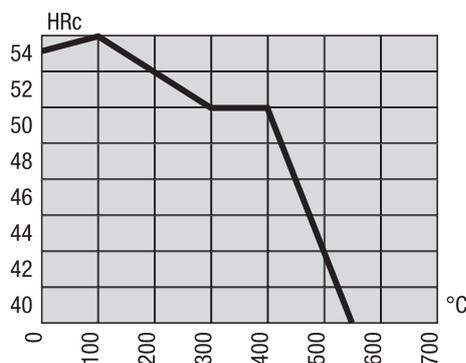
APPLICATIONS

Retaining plates for plastic moulds
Base plates

PROPERTIES

machinability	very good
dimensional stability	good
corrosion resistance	good
compression strength	high

TEMPERING DIAGRAM



We declare that our products are not suitable for any other applications and purposes, other than those specified here and do not have other product properties than those specified here.

