



SUPERIOR

DIE SET CORPORATION

SUPERPLAST®

YOUR NEW CHOICE IN STAINLESS

STAINLESS STEEL MOLD BASES

- Premium 420f Stainless Steel
- 32 Rc pre-hardness
- Improved machinability and increased thermal conductivity



website

SUPERPLAST® IS A REGISTERED TRADEMARK OF ArcelorMittal 

SUPERPLAST[®] STAINLESS STEEL MOLD BASES



Superplast[®] Stainless is a prehardened free-machining stainless mold steel specially designed for plastic mold bases, and providing improved performances compared to standard grades such as 420f.

Superplast[®] Stainless offers:

- Improved machinability
- improved consistency and weldability

With its low Carbon and 12% Chromium content, Superplast[®] Stainless ensures a good corrosion resistance both in humid atmospheres and in corrosive molding environments (PVC).

CHEMICAL ANALYSIS

	C	S Max	Si	Cr
Superplast [®] Stainless	0.07	0.15	0.10	12.0
W1.2085	0.4	0.07	0.35	16.0

Typical Values

MECHANICAL PROPERTIES

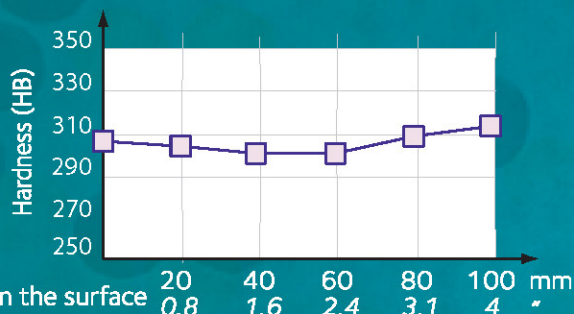
	YS 0.2 MPa(KSI)	UTS MPa (KSI)	El% 5d	HB
Superplast [®] Stainless	890 (129)	1000 (145)	14	310
W1.2085	870 (126)	1000 (145)	12	310

Superplast[®] Stainless is delivered prehardened with a hardness between 290 and 330 HB (30 - 34 HRC*)

*HRC Hardness is only indicative value (translation from HB according to ISO 18265 : 2003 table B2)

MICROSTRUCTURE

Superplast[®] Stainless is a martensitic stainless steel offering microstructure and hardness consistency through thickness



Example in a 100 mm (4") thick plate



900 W. Drexel Avenue • Oak Creek, WI 53154
Phone (800) 558-6040 • FAX (800) 657-0855
messages@superiordieset.com
www.superiordieset.com