



Material: Fe-1.5 % Cu-0.6 % C; iron: water atomised

carbon: not specified; sintering: 1120 °C, 30 min, 70 % N₂ + 30 % H₂

heat treatment: -

density: 6.92 g/cm³

mech. properties: H = 122 HV10; R_{p0.2} = 359 MPa; R_m = 433 MPa

Specimen: smooth, K_t = 1.0; ISO 3928; surface as sintered

Loading mode: plane bending, R = 0; 25 Hz

Limiting no. of cycles: 2 · 10⁶

Endurance limit: 106 MPa (extrapolated)

Reference: C.M. Sonsino: Ermittlung anwendungsrelevanter Kenngrößen für Sintermetalle. LBF-Report No. FB-158; Fraunhofer-Institut für Betriebsfestigkeit, Darmstadt, 1981

Stress amplitude:	139	150	MPa
Cycles to failure:	170,204	80,162	· 1000
	189,221	81,465	
	203,690	83,747	
	262,404	97,037	
	287,058	101,384	
		197,229	