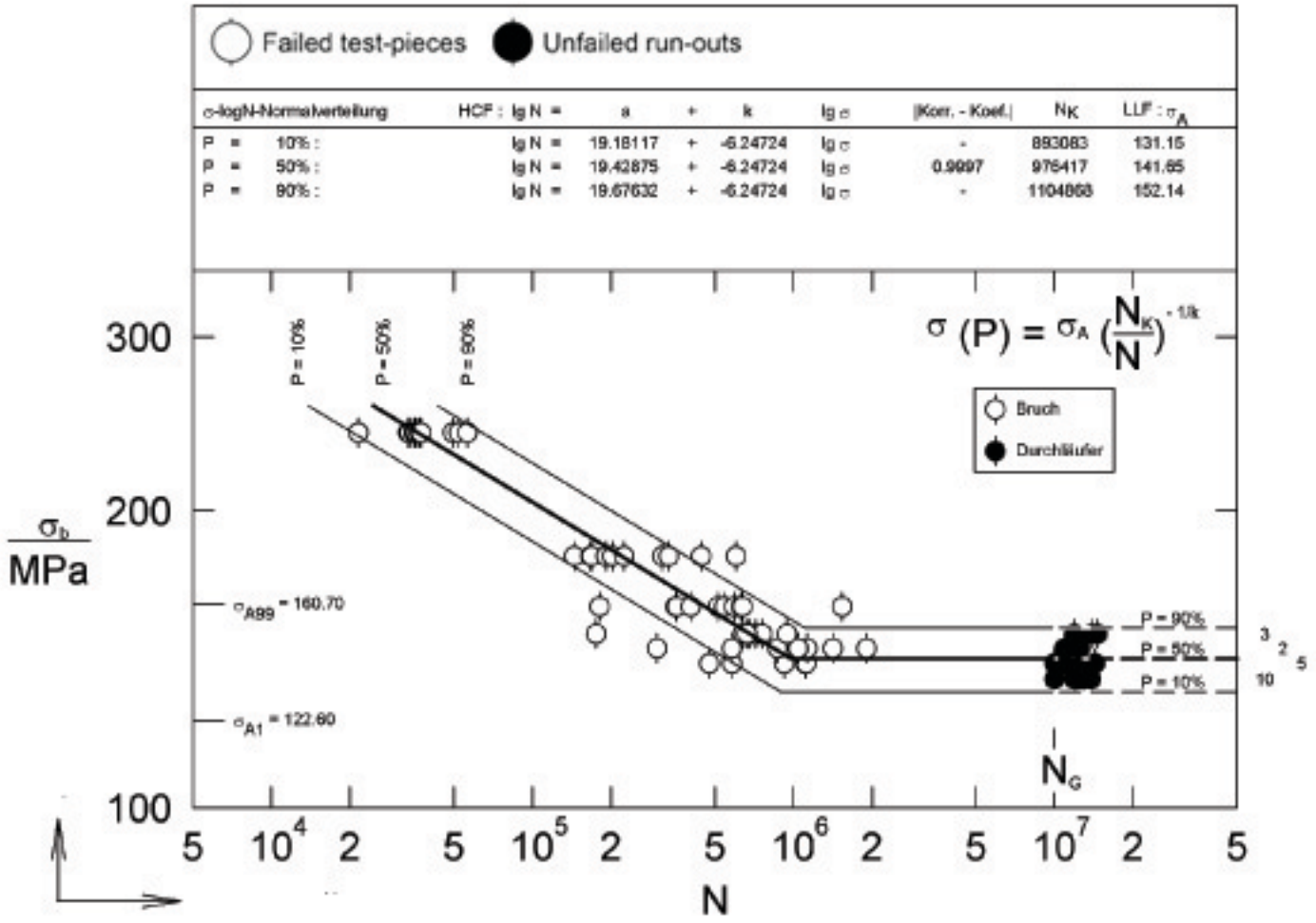

Material:	Fe-1.5 % Cu-0.6 % C; iron: water atomized sintering: 1120 °C, ca. 20 min, 90 % N_2 / 10 % H_2, -24 °C dew point, average carbon content 0.543 % heat treatment: - density: 6.95 g/cm³ mech. properties: H =146 HBW 2.5/62.5, $R_{p0.2}$ = - , R_m = -
Specimen:	smooth, K_t = 1.0; ISO 3928; surface as sintered
Loading mode:	Plane bending; R = –1; two different types of machines with 50 Hz and 120 Hz
Limiting no. of cycles:	10^7
Endurance limit:	141.7 MPa
Reference:	A. Zafari, P. Beiss; Effect of Sintering Furnace on the Fatigue Strength of Fe-1.5Cu-0.6C; Adv. Powder Metall. & Particulate Mat.-2007, Proc. CD, part 5, p. 86-94; MPIF, Princeton, NJ, 2007

Stress amplitude:	135	140	145	150	160	180	240	MPa
Cycles to failure:	10000.0	1106.6	580.7	14543.0	180.7	168.5	21.5	· 1000
	11842.0	14277.5	1130.2	639.4	591.8	314.6	33.8	
	10000.0	1115.9	867.8	681.3	1533.1	331.5	35.1	
	12956.7	917.0	10892.5	941.8	541.3	223.8	56.2	
	12796.5	578.7	12488.7	11898.5	404.2	144.0	37.4	
	12051.8	473.9	1905.6	716.3	353.4	191.0	35.7	
	13759.2	10356.3	300.5	13911.3	629.7	166.0	36.7	
	13785.0	10000.0	1415.1	757.8	355.8	443.2	52.2	
	10000.0	12690.2	1046.2	175.4	513.7	202.4	33.3	
	10000.0	10964.5	1040.2	662.2	634.7	601.2	49.5	