



1.4550

Description - 1.4550 / AISI 347 is an austenitic chromium-nickel stainless steel with titanium and niobium addition.

Special properties - Good resistance to intergranular corrosion.

Suitable welding filler materials - 1.4316; 1.4551; 1.4576.

Application - Foodstuff industry, chemical industry.

Chemical Composition in %

C	Si	Mn	Cr	Ni	P	Fe	Nb
≤0.08	≤1.00	≤2.00	17.0-19.0	9.0-12.0	≤0.045	Rest	10 x C

Standards

Material No.	1.4550
EN Designation	X6CrNiNb18-10
AISI/SAE	347
UNS	S34700

Mechanical Properties 20 °C

Hardness HB 30	≤230
0,2% Yield strength Rp, N/mm ²	≥205
Tensile strength Rm, N/mm ²	510-740
Elongation A5, %	40/30
Modulus of elasticity, kN/mm ²	200

Physical Properties 20 °C

Density, g/cm ³	7.9
Specific heat capacity, J/kg K	500
Thermal conductivity, W/m K	15
Electrical resistivity, Ω mm ² /m	0.73