



304 Stainless Steel Labels

AISI 304 stainless steel (UNS S30400) is the most widely used stainless steel, containing 18-20% Cr and 8-10.5% Ni, and also known as 18-8 stainless steel. SS 304 is non-magnetic under annealing conditions, but after cold working (such as stamping, stretching, bending, rolling), part of the austenite structure may be converted into martensite and therefore weakly magnetic. Type 304 has good resistance to atmospheric corrosion and oxidation. The high nickel-chromium alloy content gives it excellent corrosion resistance and is widely used in the food industry as a standard food grade stainless steel.

Type 304 Stainless Steel Physical Properties	
Density, g/cm ³ (lb/in ³)	7.93 (0.286)
Melting point, °C (°F)	1400-1450 (2550-2650)
Specific heat capacity, J/kg·K (Btu/lb·°F)	500 (0.12) at 20 °C (68 °F)
Electrical resistivity, μΩ·m	0.72 at 20 °C (68 °F)
Conductivity, %, IACS	2.5
Magnetic permeability	1.02 (Approximate)
Elastic modulus (Modulus of Elasticity), GPa (10 ⁶ psi)	193 (28)
Thermal diffusivity, mm ² /s (in ² /s)	3.84 (0.006)
Thermal conductivity, W/m·K (Btu/ft·h·°F)	16.2 (9.4) at 100 °C (212 °F)
	21.5 (12.4) at 500 °C (932 °F)
	17.2 (9.6) at 0-100 °C (32-212 °F)
Coefficient of thermal expansion (CTE), 10 ⁻⁶ /K (μin./in·°F)	17.8 (9.9) at 0-315 °C (32-600 °F)
	18.4 (10.2) at 0-538 °C (32-1000 °F)

ASTM A666 Type 304 Mechanical Properties							
ASTM Standard	AISI Type (UNS)	Conditions	Tensile Strength, MPa (ksi), ≥	0.2% Yield Strength, MPa (ksi), ≥	Elongation in 50 mm (2 in.), % ≥	Brinell Hardness (HB), ≤	Rockwell Hardness (HRB), ≤
ASTM A666	304 (UNS S30400)	Annealed	517 (75)	205 (30)	40	201	92
		1/2 Hard (Half Hard)	1035 (150)	760 (110)	6 (<0.015 in); 7 (≥ 0.015 in)		
		1/4 (Quarter-hard) Hard	862 (125)	517 (75)	10 (≤ 0.03 in); 12 (> 0.03 in)		
		1/8 Hard	690 (100)	380 (55)	35		
	plate, strip, sheet	1/16 Hard	550 (80)	310 (45)	40		
	304 flat bar		620 (90)	310 (45)	40 (>0.030 in)		

Technical Datasheet



Standard Colours

Black on brushed

Material

304 stainless steel

Exterior use

UV stable

Printing method

Laser engraved



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