

### Standards

Material No.	EN Designation	AISI/SAE	UNS
1.4313	X3CrNiMo13-4	415	S41500

### Description

1.4313 / AISI 415 is a chromium-nickel stainless steel with additional molybdenum.

### Special properties

Good toughness properties in a temperature range of -60 to +300°C. Equal corrosion resistance to 1.4057 due to the molybdenum content.

### Chemical Composition

C %	Si ≤ %	Mn ≤ %	P ≤ %	S ≤ %
≤ 0.05	0.70	1.50	0.04	0.015
Cr %	Mo %	Ni %	N %	
12.0-14.0	0.30-0.70	3.50-4.50	≥ 0.020	

### Mechanical Properties 20°C

Hardness HB 30 ≤ HB	0.2% Yield strength $R_p \geq$ N/mm <sup>2</sup>	Tensile strength $R_m$ N/mm <sup>2</sup>	Elongation $A_5 \geq$ %	Modulus of elasticity kN/mm <sup>2</sup>
320	520	700-800	15/12	200

### Physical Properties 20°C

Density g/cm <sup>3</sup>	Specific heat capacity J/kg K	Thermal conductivity W/m K	Electrical resistivity $\Omega$ mm <sup>2</sup> /m
7.7	430	25	0.6

### Suitable welding filler materials

1.4351; 1.4313

### Application

Pumps, accessories, rotor wheels

### Available forms for 1.4313 / AISI 415

