

MATERIAL NUMBER 1.4495 · CLASS 1.4

S31651

Material no. 1.4495

also listed as X6CrNiMoN17-12-3

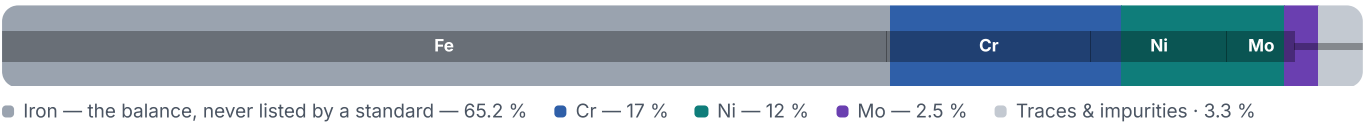
Chemical composition, mechanical and physical property values, and 25 standard designations from 4 regions.

DENSITY 7.85 g/cm ³	OTHER DESIGNATIONS 25 in 4 regions	PROPERTY VALUES 10 on file
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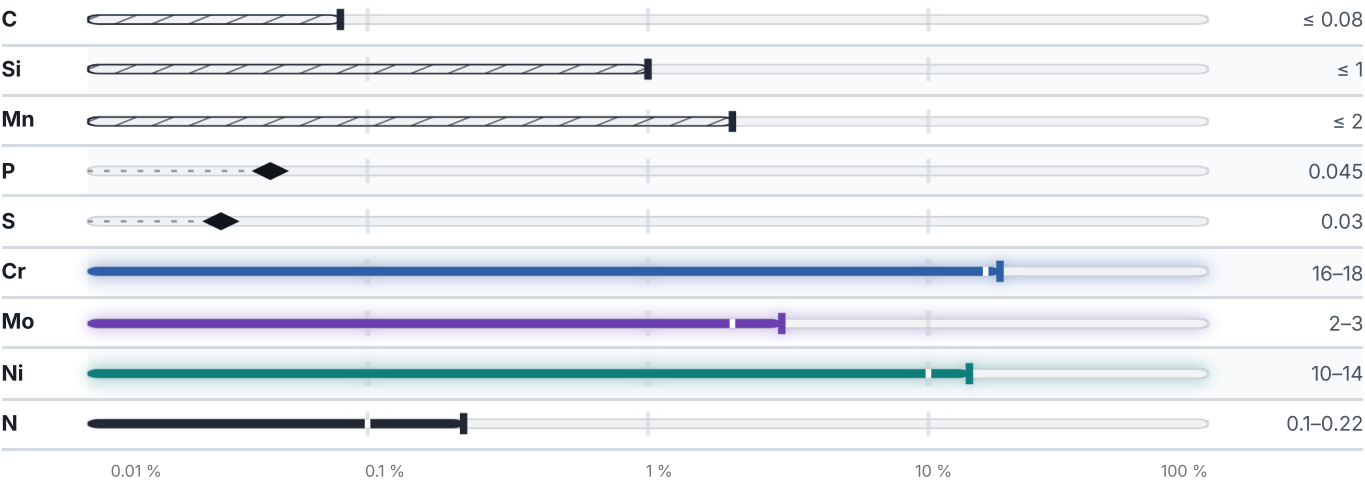
Chemical composition

Mass fraction in %

What this alloy is



Logarithmic scale, 0.01 % to 100 % — every value here compares directly, decade by decade.



The scale is logarithmic, not the element's raw share of the alloy — the only honest way to fit 0.01 % and 100 % in one picture, and it means every value here can be compared with every other.

Predicted transformation temperatures

This grade's composition falls outside the published model's validated range (a low-alloy composition window), so no transformation temperature is predicted here.

Mechanical properties

6 values across 1 conditions

CONDITION · DIMENSION	RM N/mm ²	RE N/mm ²	A %	HB	HRB	HV
Plate/Sheet Hot-rolled	550	275	35	–	–	–
Hot-rolled	–	–	–	217	95	220

Physical properties

1 values

PROPERTY	VALUE	UNIT
Density	7.85	g/cm ³

Designations across standards

25 designations · 3 documented as identical

United States		22	Europe		1
S31651	This grade's own name	uns	X6CrNiMoN17-12-3	This grade's own name	din-en
316N	This grade's own name	aisi-sae			
A1012		astm	Japan		1
A1022		astm	SUS 316N		jis
A182		astm			
A193		astm	China		1
A194		astm	0Cr17Ni12Mo2N		gb
A213		astm			
A240		astm			
A312		astm			
A336		astm			
A358		astm			
A376		astm			
A403		astm			
A479		astm			
A666		astm			
A688		astm			
A813		astm			
A814		astm			
A943		astm			
A965		astm			
A988		astm			

Note on use. The data is compiled to the best of our knowledge from publicly available standards and manufacturer documentation. It replaces neither material testing nor an inspection document to EN 10204. Please request a mill certificate to EN 10204 2.1, 3.1 or 3.2 together with your enquiry. The standard in its current valid edition always prevails.

Enquiry about S31651

Quotation, availability, mill certificate or a technical question — directly on the material page.

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DATASHEET ONLINE

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ISSUED

Aug 20, 2026