

MATERIAL NUMBER 1.4873 · CLASS 1.4

SZ 12

Material no. 1.4873

also listed as X45CrNiW18-9

Chemical composition, mechanical and physical property values, and 25 standard designations from 12 regions.

DENSITY	OTHER DESIGNATIONS	PROPERTY VALUES
7.85 g/cm ³	25 in 12 regions	9 on file

Chemical composition

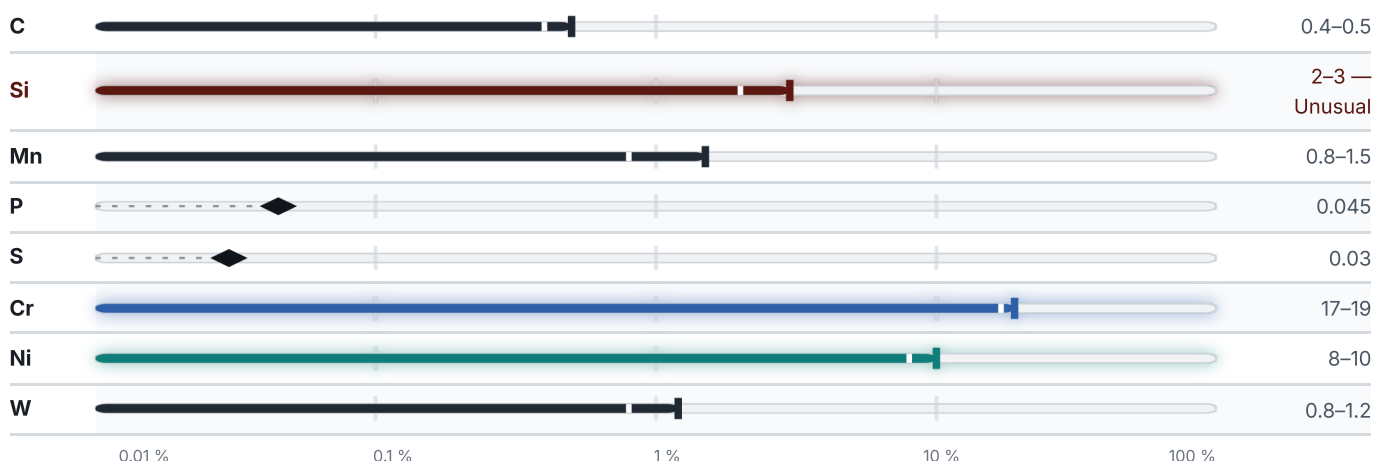
Mass fraction in %

What this alloy is



● Iron — the balance, never listed by a standard — 67.8 % ● Cr — 18 % ● Ni — 9 % ● Si — 2.5 % ● Traces & impurities · 2.7 %

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

Not enough recorded composition to predict a transformation temperature for this grade — missing: Mo.

Physical properties

1 values

PROPERTY	VALUE	UNIT
Density	7.85	g/cm³

Designations across standards

25 designations · 1 documented as identical

Spain	5	United Kingdom	2
28-09	une	331S40	bs
F.320.C	une	331S42	bs
F.3211	une		
F.3211-X45CrNiSiW	une	Bulgaria	2
X 45 CrNiSiW 18-09	une	4Ch18N9S2WG	bds
		4X18H9C2BF	bds
Japan	4		
F SUH 31	jis	Europe	1
SUH 31	jis	X45CrNiW18-9	din-en
SUH 31 TK	jis		
SUH 31 TP	jis	Czechia	1
		17 322	csn
France	3		
X19T4	afnor	Poland	1
Z35CNWS14.14	afnor	4H14N14W2M	pn
Z45CNW18-09	afnor		
		Serbia	1
Russia / CIS	3	Č.4571.1	srps
45Ch14N14V2M	gost		
45Kh14N14V2M	gost	Hungary	1
EL189	gost	SZ 12	msz
		Romania	1
		45WNIcr180	stas

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 SZ 12

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

Start an enquiry

DATASHEET ONLINE

View the material page

GRADE SEARCH

Search all grades

MATERIAL NO.

1.4873

ISSUED

Aug 20, 2026