

MATERIAL NUMBER 1.6587 · CLASS 1.6

511

Material no. 1.6587

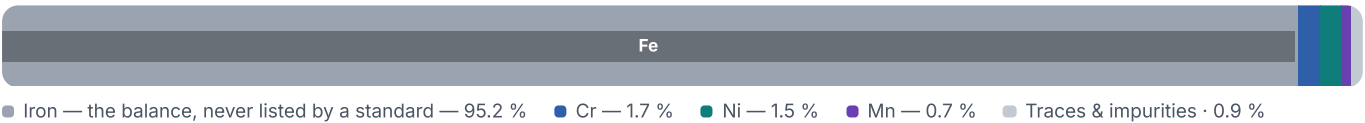
also listed as 17CrNiMo6

Chemical composition, mechanical and physical property values, and 41 standard designations from 15 regions.

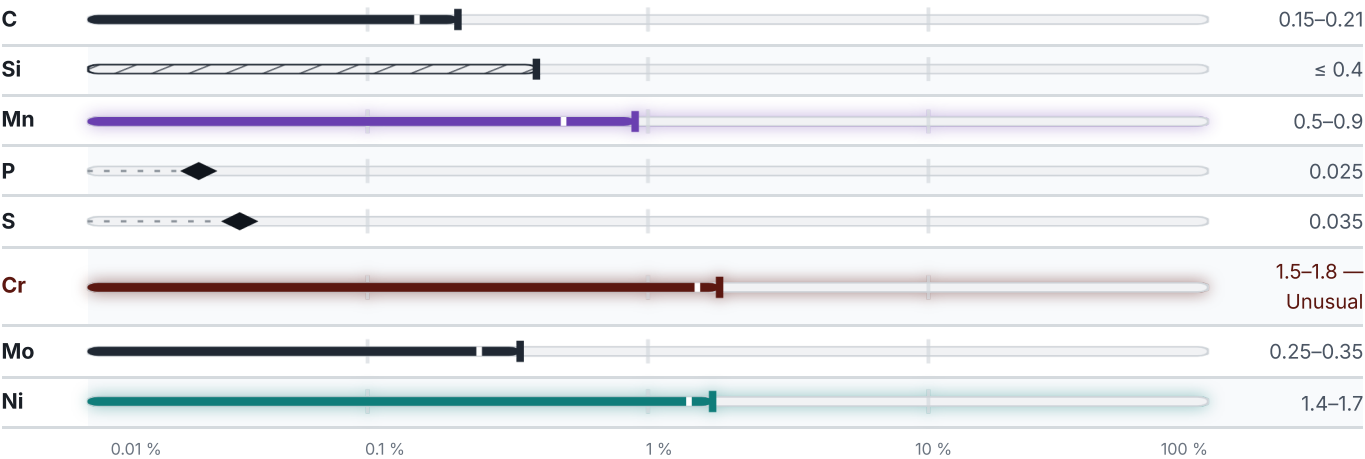
DENSITY 7.77 g/cm³	OTHER DESIGNATIONS 41 in 15 regions	PROPERTY VALUES 14 on file
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Chemical compositionMass fraction in %

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 temperaturescomputed from composition · °C

PREDICTED AE3 789 °C	PREDICTED AE1 737 °C	PREDICTED ACM 480 °C	PREDICTED BS 492 °C
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Mechanical properties

10 values across 6 conditions

QUENCHING AND DRAWING	RM N/mm ²	RE N/mm ²	A5 %	Z %	KCU kJ/m ²
Ø 15	880	685	11	50	780
TREATED TO IMPROVE SHEARABILITY					HB
Treated to improve shearability					255
SOFT ANNEALED					HB
Soft annealed					229
TREATED TO HARDNESS RANGE					HB
Treated to hardness range					179–229
TREATED TO FERRITE-PEARLITE STRUCTURE AND HARDNESS RANGE					HB
Treated to ferrite-pearlite structure and hardness range					159–207
CONDITION · DIMENSION					RM N/mm ²
200					1200

Physical properties

6 values

PROPERTY	VALUE	UNIT
Density	7.77	g/cm ³
Transformation point Ac1	720	°C
Transformation point Ac3	825	°C

Technological properties

PROPERTY	VALUE	UNIT
Weldability	limited weldability.	
Flake sensitivity	predisposed	
Temper brittleness	not predisposed	

41 designations · 6 documented as identical

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.

Start an enquiry

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

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