

1.4404 STAINLESS STEEL

GENERAL INFORMATION

THIS IS ONE OF THE MOST USED KIND OF AUSTENITIC STAINLESS STEEL. THE LOW CARBON VERSION PREVENTS CARBIDES FROM FORMING, AND GRANTS HIGHER CORROSION RESISTANCE. THIS STEEL IS WIDELY USED FOR MARINE APPLICATION, ANY OTHER SALT ENVIRONMENT AND IN FOOD PROCESSING INDUSTRIES.

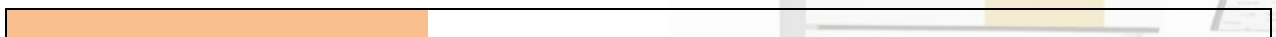
DENSITY 7.9 KG/DM³



BIO-COMPATIBILITY VERY GOOD



MACHINABILITY HARD



WELDABILITY EXCELLENT



CORROSION RESISTANCE VERY GOOD



CHEMICAL COMPOSITION (ACCORDING TO SUPPLIER)

FE	CR	NI	MO	MN	SI	C	N	P	S
BALANCE	17%	11.5%	2.25%	<2 %	<1 %	<0.03 %	<0.1 %	<0.045 %	<0.015 %

MECHANICAL PROPERTIES

AS BUILT	
YIELD STRENGTH ¹	510 MPA
TENSILE STRENGTH ¹	620 MPA
ELONGATION A ¹	40 %
YOUNG'S MODULUS ¹	220 GPa
HARDNESS ²	18 HRC
RELATIVE DENSITY ³	OVER 99.5 %

¹ TESTED ACCORDING TO EN 6892-1:2009

² MEASURED ACCORDING TO EN ISO 6507-1

³ MEASURED ACCORDING TO ASTM E1245

SURFACE QUALITY

RA (30 μm SPOT)	7 μm
RA (55 μm SPOT)	18 μm

MEASURED IN COMPLIANCE WITH ISO 4287-1997. RESULTS STRONGLY DEPEND ON SAMPLE GEOMETRICAL COMPLEXITY AND ORIENTATION.

NOTES

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