



Super Duplex UNS S32550

Super Duplex UNS S32550 offers high strength along with good resistance to pitting, crevice and stress corrosion cracking, as well as high energy absorption and good workability & weldability. UNS S32550 offers good resistance to nitric, sulphuric and phosphoric conditions, as well as showing excellent resistance to organic acid. UNS S32550 shows superior corrosion resistance to other austenitic alloys, such as 304, 316 and 317 stainless steels.

Super Duplex UNS S32550, with its excellent mechanical properties, resistance to corrosion and wear resistance, better than that of austenitic stainless steels, is the ideal material for components which are in direct contact with seawater, for example, offshore oil & gas. In addition, UNS S32550 is used in a variety of applications including marine, chemical processing, nuclear, pulp & paper and flue gas desulphurisation.

Super Duplex UNS S32550 Grades & Equivalents:

- ASTM A276
- ASME SA276
- ASTM A479
- ASME SA479

Typical Chemical Analysis

C	Si	Mn	P	S	Cr	Ni	Mo
0.04	1.00	1.50	0.040	0.030	24.0-27.0	4.50-6.50	2.90-3.90
W	N	Cb/Nb	Ti	Co	Cu	Al	B
	0.10-0.25				1.5-2.50		
V	Fe	Mg	Ta	Ca	O	Bi	Se
Sn	Zn	Pb	Y	Cb/Nb + Ta	Ni + Co	H	PREN

Typical Mechanical Properties in condition A

Tensile Strength	750 N/mm ² min
0.2% Proof Stress	550 N/mm ² min
Elongation	25%
Reduction of Area	
Hardness	290 HBw
Impacts	
Stress Rupture	
Other Remarks	

Product Forms Available:

- Hexagon Head Bolts
- Hexagon Nuts
- Studbolts
- Socket Capscrews
- Socket Countersunk Screws
- Socket Setscrews
- & Many other special fasteners and bespoke machined parts

Products can be produced to customer drawings or relevant British (BS), American (ASME, ANSI), European (DIN, UNI) or International Standards (ISO).

The size ranges M3 to M120 Metric and 3/16" to 4.75" Imperial can be supplied. Thread forms include UNC, UNS, UNF, BSW, BSF, Whitworth, Metric, Metric Fine.



Callywhite Lane
Dronfield
Derbyshire
S18 2XR

T: +44 01246 291111

www.westspecialfasteners.co.uk

sales@westspecialfasteners.co.uk