

SG 3

CATEGORY	GMAW-GTAW Solid wires
TYPE	Copper coated welding wire for MAG welding of un and -low alloyed steels
APPLICATIONS	Shipbuilding, piping, root welding, bridges, repair, construction, offshore, car-plate welding etc...
PROPERTIES	Extreme easy to weld with excellent welding properties and increased yield strenght. High world wide excepted quality with controlled cast and helix for semi and or semi-automatic applications. Weldable with Co2 and Mix gas.

CLASSIFICATION	AWS	A.5.18: ER 70 S-6
	EN ISO	14341-A: G 46 4 M G4Si1
	DIN: W.Nr.	1.5130
	DIN	8559: SG3

SUITABLE FOR	Materials	DIN	EN	ASTM
	shipbuilding	A, B, D, E, AH 32 - EH 36	same	Typical
	Unalloyed steels	St 33, St 37-2 - St 52-3	S185 - S355	A 258 / A 516
	boiler steels	H I, H III, 17Mn4, 19Mn5	P235GH, P355GH	A 662 / A 387
	pipe steels	St 35.8, St 45.8	P235T1/T2, P460NL2	A 738 / A 612
	-	StE 210.7 TM, StE 445.7 TM	L210 - L445MB	A 299
	Fine grain steels	StE 255 to StE 460	S235 - S460QL1	-
	API-standard	X 42, X65, X 70	X 42, X65, X 70	-
	Domex 460 MC			

APPROVALS	TUV(12399.00),DB(42.206.02), CE approved, LR 5Y46-H5 in progress
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WELDING POSITIONS:	
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WELD DEPOSIT WEIGHT %							
C	Mn	Si	Cr	Ni	Mo	P	S
0,08	1,75	0,9	-	-	-	<0,025	<0,025

MECHANICAL PROPERTIES:							
gas type	R _{p0,2} (N/mm ²)	R _m (N/mm ²)	A ₅ (%)	Impact Energy (J) ISO-V			Hardness HRc / HV
				-20°C	-40°C	-60°C	
M21	>460	>560	>24	170	110		
C1	>420	>520	>24	120	90		

Recommended heat input : 8 - 13 KJ/cm.

WELDING PARAMETERS PACKING:					
Welding Parameters			Packing		
D (mm)	Voltage (V)	Current (A) DC+	spool type	kg / spool / drum	kg / pallet
0,8	18-24	60-200	K-300 / drum	15 / 250	1080 / 1000
1,0	18-32	80-300	K-300 / drum	15 / 250 / 500	1080 / 1000 / 500
1,2	18-35	120-380	K-300 / drum	15 / 250 / 500	1080 / 1000 / 500
1,4	20-38	150-480	K-300 / drum	15 / 250 / 500	1080 / 1000 / 500

REDRYING TEMPERATURE	not required
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GAS ACC. EN ISO 14175:	M21, C1
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