

309 LSi Tig

CATEGORY GMAW-GTAW Solid wires

TYPE Stainless steel filler metal for dissimilar welding between steel and stainless steel and difficult to weld steels

APPLICATIONS Buffer layers before hard facing, dissimilar joints between ferritic and austenitic steels and or difficult to weld steels.

PROPERTIES High mechanical properties and very good weldability due to a increased silicon content, suitable for operating temperatures up to 300°C.

CLASSIFICATION

AWS	A 5.9: ER 309 LSi
EN ISO	14343-A: W 23 12 L Si 14343-B: SS309LSi
DIN: W.Nr.	1.4332
DIN	8556: SG X2CrNi 24 12

SUITABLE FOR Buffer layers before hard facing, dissimilar joints between ferritic and austenitic steels and or difficult to weld steels such as: 42CrMo4, C45, 42MnV7, tool steels etc.

APPROVALS TUV (12394.00), CE approved

WELDING POSITIONS:



WELD METAL ANALYSIS

C	Cr	Ni	Mo	Mn	Si	P	S	Cu
<0.03	23.0-25.0	12.0-14.0	<0.75	1.0-2.5	0.65-1.0	<0.03	<0.03	<0.75

MECHANICAL PROPERTIES

Heat Treatment	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	-110°C	
AW	440	600	37	160		90	

AW: as welded

WELDING PARAMETERS / PACKING

D (mm)	Welding Parameters		Packing (kg)	
	Current (A) DC-		single	master
1,6 x 1000	50-80		5	25
2.0 x 1000	70-110		5	25
2,4 x 1000	110-180		5	25

REDRYING TEMPERATURE not required

GAS ACC. EN ISO 14175: I1