

Classifications					
EN ISO 14343-A	EN ISO 14343-B	AWS A5.9	Mat. No.		
G 29 9	SS312	ER312	1.4337		
Characteristics and typical fields of application					
<p>Stainless; wet corrosion up to 300 °C (572 °F). High resistance to hot cracking: good toughness at high yield strength.</p> <p>For joining and surfacing applications with matching / similar steels / cast steel grades. For fabricating tough joints (one layer) on unalloyed/low-alloy structural steels of higher strength, on high manganese steel and CrNiMn steels.</p>					
Base materials					
<p>1.3401 – X120Mn12, 1.4006 – X10Cr13 and joints between the forementioned steels, as well as 1.4583 – X10CrNiMoNb18-12 and ferritic structural steels as S235J, S355J</p>					
Typical analysis of solid wire (wt.-%)					
	C	Si	Mn	Cr	Ni
wt-%	0.15	0.5	1.6	30.0	9.0
Structure: Austenite/ferrite					
Mechanical properties of all-weld metal					
Heat-treatment	Yield strength R _{p0.2}	Tensile strength R _m	Elongation A (L ₀ =5d ₀)	Impact work ISO-V KV J	
	MPa	MPa	%	+20 °C	
aw	500	750	20	27	
Operating data					
Polarity: DC (+)	Shielding gas: (EN ISO 14175) M12, M13		ø (mm) 1.0 1.2	Spool: B300 B300	
Welding instruction					
Materials		Preheating	Postweld heat treatment		
Stainless and heat resistant, unalloyed and low-alloy steels / cast steel grades; combinations		According to parent metal	None		