

ER320LR

MIG/GMAW and TIG/GTAW stainless steel

Product name	IABCO ER320LR		
Classification EN ISO	-		
Material No.	-		
Classification AWS	A5.9: ER320LR		
Approvals	-		
Applications	<p>For welding alloys commonly referred to as alloy 20; produces a Nb stabilised weld metal with Mo and Cu. The material has a high resistance to sulphuric acid and to stress corrosion cracking in boiling sulphuric acid.</p> <p>The material is used for a wide variety of chemical tanks, agitators, heat exchangers, metal cleaning/pickling tanks, pumps, valves and process piping.</p>		
Base materials	<p>For austenitic stainless steel alloy 20. EN: 2.4660. UNS: N08020. Proprietary: 20Cb-3 (Carpenter Alloys), Incoloy alloy 020 (Special Metals).</p>		
Typical analysis of wire, weight %	C: 0.01	Si: 0.08	
	Mn: 1.8	Cr: 20.0	
	Ni: 33.0	Mo: 2.4	
	Cu: 3.3	Nb: 0.25	
Typical heat treatment ⁽¹⁾	<p>Preheat: Not required. Interpass temperature: 150°C. PWHT: Not required.</p>		
Typical mechanical properties of weld deposit ⁽²⁾	<p>0.2% proof stress, Rp0.2%: 380MPa. Tensile strength, Rm: 575MPa. Elongation, 4d/5d: 35%.</p>		
Other products	-		

Notes (1) Application codes and project specifications should always be referred to for specific requirements.

(2) Actual mechanical properties will be dependent on specific welding procedure (including shielding gas, flux, PWHT etc) and should always be confirmed by approval of an appropriate welding procedure.