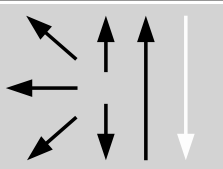


Classifications							
EN ISO 14172	AWS A5.11			Mat. No.			
E Ni 6059 (NiCr23Mo16)	ENiCrMo-13			2.4609			
Characteristics and typical fields of application							
<p>Stainless. High corrosion resistance in reducing and, above all, in oxidizing environments. For joining and surfacing with matching and similar alloys and cast alloys. For welding the clad side of plates of matching and similar alloys.</p>							
Base materials							
2.4602 – NiCr21Mo14W – Alloy C-22; 2.4605 – NiCr23Mo16Al – Alloy 59; 2.4610 – NiMo16Cr16Ti – Alloy C-4; 2.4819 – NiMo16Cr15W – Alloy C-276							
Typical analysis of all-weld metal (wt.-%)							
	C	Si	Mn	Cr	Mo	Ni	Fe
wt-%	< 0.02	0.10	< 0.5	23.0	16.0	Bal.	< 1.5
Structure: Austenite							
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	420	700		30	60		
Creep rupture properties: According to matching/similar high temperature resistant metals up to 800 °C (1472 °F).							
Operating data							
	Polarity: DC (+)		ø (mm)	L mm	Amps A		
			2.5	250	45 – 70		
			3.2	300	65 – 105		
		4.0	350	85 – 135			
Welding instruction							
Materials	Preheating			Postweld heat treatment			
Matching and similar metals	None. Cooling in air. Welding with electrodes of thin diameter, low heat input (stringer beads recommended)			Heat treatment is mostly not necessary for matching precipitation insensitive parent metals, if the recommendations for welding are observed. Otherwise solution annealing at 1150 °C (2102 °F) to 1175 °C (2147 °F) / water to restore full corrosion resistance			
Approvals							
TÜV (09272), CE							