AFROX TIG ER601

Afrox TIG ER601 is a solid TIG wires for welding matching Ni-23% Cr-15% Fe-1.5% Al Alloys. The 601 alloys have exceptional oxidation resistance. They also have very good high temperature corrosion resistance in hydrogen sulphide/sulphur dioxide environments.

APPLICATIONS

The alloy finds applications up to 1200°C in thermal processing, heat treatment, petrochemical processing and gas turbine equipment.

MATERIALS TO BE WELDED

ASTM/UNS N

N06601

DIN

2.4851 (NiCr23Fe)

Proprietary

Inconel 601 (Special Metals) Nicrofer 6023 (Krupp VDM)

RA601 (Rolled Alloys)

CLASSIFICATIONS

AWS	A5.14	ERNiCrFe-II	
BS EN (proposed)		W Ni 6601	
DIN	1736	SG-NiCr23Al	
BS2901	PT5	NA49	

CHEMICAL ANALYSIS (WIRE ANALYSIS)

% Carbon	0.1 max
% Manganese	I.0 max
% Silicon	0.5 max
% Sulphur	0.015 max
% Phosphorus	0.03 max

% Nickel	58.0-63.0
% Chrome	21.0-25.0
% Copper	0.5 max
% Iron	18.0 max
% Aluminium	1.0-1.7

TYPICAL MECHANICAL PROPERTIES (ALL WELD METAL IN THE AS WELDED CONDITION)

0,2% Proof Stress	365 MPa	
Tensile Strength	585 MPa	
% Elongation on 4d	40	
% Elongation on 5d	40	
Hardness cap/mid	180/195HV	

PACKING DATA

Diameter	Item Number	Consumable	Pack Mass
mm		Length mm	Kg
2,4	077/634	1000	2,5 Tube

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