OK 61.81



Nb-stabilized MMA-electrode for welding Nb- or Ti-stabilized stainless steel of the 19Cr10Ni-type. OK 61.81 has a better hot cracking resistance compared with OK 61.80. Owing to the quite high ferrite content level, the working temperature should be limited to maximum 400°C.

Specifications	
Classifications	EN ISO 3581-A : E 19 9 Nb R 3 2 SFA/AWS A5.4 : E347-16 Werkstoffnummer : 1.4551
Approvals	CE : EN 13479 DNV : NV 347 UKCA : EN 13479

Approvals are based on factory location. Please contact ESAB for more information.

Welding Current	DC+, AC
Ferrite Content	FN 6-12
Alloy Type	Austenitic CrNi
Coating Type	Rutile
Min AC OCV	60

Tensile_Properties			
Testing Condition	**Yield Strength**	**Tensile Strength**	**Elongation**
AWS			
As Welded	560 MPa	700 MPa	31 %
ISO			
As Welded	550 MPa	700 MPa	-

Charpy Testing		
Testing Condition	**Testing Temp**	**Impact Value**
AWS		
As Welded	20 °C	60 J
ISO		
As Welded	-10 °C	71 J

Typical Weld Metal Analysis %							
C	**Mn**	**Si**	**Ni**	**Cr**	**N**	**Nb**	**FN WRC-92**
0.06	1.7	0.7	9.7	20.2	0.08	0.72	7

Deposition Data					
Diameter	**Amps**	**Volts**	**Efficiency (Per)**	**Fusion time per electrode at 90Per I max**	**Deposition rate at 90Per**
2.5 x 300 mm	50-80 A	29 V	59 %	36 sec	1.2 kg/h
3.2 x 350 mm	75-115 A	23 V	60 %	66 sec	1.2 kg/h
4.0 x 350 mm	80-160 A	24 V	60 %	66 sec	1.7 kg/h
5.0 x 350 mm	140-210 A	25 V	60 %	78 sec	2.3 kg/h