BÖHLER FOX CN 29/9-A

Covered electrode, high-alloyed, austenitic stainless, special applications

Classifications

EN ISO 3581-A	EN ISO 3581-B	AWS A5.4 / SFA-5.4
E 29 9 R 3 2	ES312-17	E312-17

Characteristics and typical fields of application

Rutile coated, core wire alloyed electrode of E 29 9 R / E312-17 type. Highly alloyed electrode with high ferrite content to offer high tensile strength and excellent resistance to cracking. Primarily intended for dissimilar welding between stainless steel, high strength steel, tool steel; spring steel and 14Mn-steel as well as other difficult-to-weld combinations. The weld metal work hardens making it suitable for wear resisting build-ups on clutches, gear wheels, shafts, etc. Also suitable for repair and maintenance; for instance welding of tools. Designed for first class weld seams and easy handling on AC or DC+. Very good corrosion resistance in wet sulfuric environments, such as in sulfate digesters used by the pulp & paper industry.

Base materials

For steels with higher strength and difficult welding characteristics, joining of dissimilar materials, tool steels, heat treatable or quenched and tempered steels, spring steels, high carbon steels etc.
1.4339 GX32CrNi28-10, 1.4347 GX8CrCrNiN26-7, 1.4340 GX49CrNi27-4, 1.4460 X3CrNiMoN27-5-2

Typical analysis

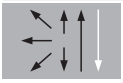
	C	Si	Mn	Cr	Ni
wt.-%	0.11	0.9	0.7	28.8	9.5

Mechanical properties of all-weld metal - typical values (min. values)

Condition	Yield strength $R_{p0.2}$	Tensile strength R_m	Elongation A (L_0=5d_0)
	MPa	MPa	%
u	650 (≥ 450)	790 (≥ 660)	24 (≥ 15)

u untreated, as-welded

Operating data



Polarity	DC+ / AC
Electrode identification	FOX CN 29/9-A E 29 9 R
Redrying	250 – 300°C / 2 h

Dimension mm	Current A
2.5 x 300	60 - 80
3.2 x 350	80 - 110
4.0 x 350	110 - 140

Recommended heat input max. 2.0 kJ/mm
Preheating and interpass temperature as required by the base metal, max. 150ºC.

Approvals

DB (30.014.16, 20.014.07), CE