



Selectarc Co21S

**Cobalt base Hardfacing
Electrode "Grade 21" type**

Classification

AWS A5.13 : ECoCr-E EN 14700 : E Co1
DIN 8555 : E20-UM-350-CKTZ

Description & Applications

Hardfacing electrode with a rutile-basic coating. Cobalt base deposit of « stellite grade 21 » type (Co-Cr-Mo-Ni). Deposit characterised by a good metal-metal wear and oxidation resistance up to 1000°C, even in presence of sulphurous atmosphere. Good behaviour to important thermal and mechanical shocks, excellent resistance to cracks, highly resistant to cavitation and erosion, deposit non-magnetic.

General applications: Surfacing of motor valves, gas turbine blades, extrusion nozzles, forging dies, forging tools, mixers, valves for gas/water/vapour/acids.

* Note : "Stellite" is a trade mark of Deloro Stellite (Haynes International).

Typical Weld Metal Composition (%)

C	Si	Mn	Cr	Mo	Ni	Fe	Co
0.3	0.8	0.5	28.0	5.0	2.5	2.0	Rem.

All Weld Metal Mechanical Properties

Hardness (as welded) +20°C	Hardness (as welded) +600°C
32-38 HRC	250-300 HB

Welding Current & Instructions

Electrode	ØxL (mm)	2,5x350	3,2x350	4,0x350
Current	(A)	75	100	140

Redrying 1h at 250°C, if necessary. Preheat massive pieces 250-400°C. Keep this temperature during welding, cool down slowly to reduce the risk of cracks while cooling. Weld eventual cushion layers with Selectarc B 90.



1G/PA



2F/PB



2G/PC

= + ~ 70V

ind.12

