



317L/SNR

For welding steels such as Outokumpu	EN	ASTM	BS	NF	SS
4438	1.4438	317L	317S12	Z3 CND 19-15-04	2367

Standard designations

AWS A5.4 E317L-17

Characteristics

AVESTA 317L/SNR is a high Mo-alloyed electrode corresponding to AWS A5.4 E 317L designed for welding ASTM 317L steel.

Welding data

DC+ or AC	Diam. mm	Current, A
	2.0	35 – 60
	2.5	50 – 80
	3.25	80 – 120
	4.0	100 – 160
	5.0	160 – 220

Weld deposit data

Metal recovery approx. 110%.

Typical analysis % (All weld metal)

C	Si	Mn	Cr	Ni	Mo
0.02	0.7	0.9	19.0	13.0	3.7

Ferrite 10 FN DeLong

Mechanical properties

	Typical values (IIW)	Min. values AWS A5.4
Yield strength $R_{p0.2}$	485 N/mm ²	–
Tensile strength R_m	615 N/mm ²	520 N/mm ²
Elongation A_5	32 %	30 %
Impact strength KV +20°C	45 J	
Hardness approx.	210 Brinell	

Interpass temperature: Max. 100°C.

Heat input: Max. 1.5 kJ/mm.

Heat treatment: Generally none (in special cases quench annealing at 1050°C).

Structure: Austenite with 5 – 10% ferrite.

Scaling temperature: Approx. 850°C (air).

Corrosion resistance: Higher resistance than ASTM 316L in acid and chloride containing solutions.

Approvals

- CWB
- DNV

Welding positions

