

CSF-316L(P)

For 18%Cr-12%Ni-2%Mo Stainless steel

AWS A5.22 E316LT0(1)-1/-4
KS D3612 YF316LC
JIS Z3323 TS316L-FB0(1)

Applications

CSF-316L(P) is suitable for welding of low carbon 18%Cr-12%Ni-2%Mo stainless steel.

Characteristics

- (1) CSF-316L(P) is flux cored wire and designed for Fillet & H-F(All-position) welding with CO₂ gas Shielding.
- (2) It provides the excellent usability with stable arc, less spattering, good bead appearance, better slag removal, and less quantity of welding fume comparable to solid wire.
- (3) Is containing Ferrite of a reasonable quantity and crack-resistance, intergranular corrosion resistance, mechanical properties of weld metal is superior.
- (4) Shield gas is 100% CO₂ or Ar+CO₂ gas.

Notes on usage

- (1) The optimum flow of CO₂ for Shielding is 20~25 l/min.
- (2) Protect the weld with a screen to prevent blowholes caused by wind where the wind velocity is 2m/sec and more.
- (3) Keep the distance between tip & base metal at 15~25mm.

Typical chemical composition of weld metal (%)

(Shielding Gas : 100% CO₂)

	C	Mn	Si	P	S	Cr	Ni	No	FN
CSF-316L	0.030	1.50	0.60	0.011	0.010	18.51	12.38	2.21	4
CSF-316LP	0.029	1.48	0.64	0.012	0.009	18.35	12.29	2.51	6

Typical mechanical properties of weld metal

(Shielding Gas : 100% CO₂)

	YP N/mm ² (MPa)	TS N/mm ² (MPa)	EL %	IV J (kgf-m)	
				0°C	-196°C
CSF-316L	420	598	40.4	49	-
CSF-316LP	425	594	41.1	52	-
CSF-316LP(Cryogenic)	430	556	42.0	61	40

Size & recommended current range (DC +)

Dia. mm (in)	Current(A)	Voltage(V)	Welding Speed(cm/min)
1.2(0.045)	150~300	24~33	20~60
1.6(0.062)	200~400	24~33	20~60

* Approval : CSF-316L : ABS, BV, DNV, GL, KR, LR, NK / CSF-316LP(for cryogenic) : ABS, BV, DNV, LR