BÖHLER SAS 2-FD

Flux cored wire, high-alloyed, stainless

Classifications

EN ISO 17633-A	EN ISO 17633-B	AWS A5.22
T 19 9 Nb R M21 3	TS347L-F M21 0	E347T0-4
T 19 9 Nb R C1 3	TS347L-F C1 0	E347T0-1

Characteristics and typical fields of application

Rutile strip alloyed flux cored welding wire of type T 19 9 Nb R / E347LT0 for GMAW of stainless steels like 1.4546 / 347. BÖHLER SAS 2-FD is designed for single and multi-pass welding mainly in the flat and horizontal position, horizontal/vertical position as well as the slightly vertical-down position (1 o'clock).

This product achieves high productivity and is easy to operate providing excellent operating characteristics, self releasing slag, almost no spatter formation and temper discoloration, smooth weld finish and safe penetration. Increased travel speeds as well as little demand for cleaning and pickling provide considerable savings in time and money. Suitable for service temperatures from −196 °C to +400 °C.

Base materials

1.4550 X6CrNiNb18-10, 1.4541 X6CrNiTi18-10, 1.4552 GX5CrNiNb19-11, 1.4301 X5CrNi18-10, 1.4312 GX10CrNi18-8, 1.4546 X5CrNiNb18-10, 1.4311 X2CrNiN18-10, 1.4306 X2CrNi19-11

AISI 347, 321,302, 304, 304L, 304LN; ASTM A296 Gr. CF 8 C, A157 Gr. C9, A320 Gr. B8C or D
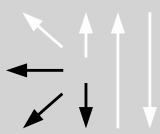
Typical analysis of all-weld metal (wt.-%)

	C	Si	Mn	Cr	Ni	Nb
wt.-%	0.03	0.6	1.4	19.0	10.4	+

Mechanical properties of all-weld metal

Condition	Yield strength $R_{p0,2}$	Tensile strength R_m	Elongation A ($L_0=5d_0$)	Impact work ISO-V KV J		
	MPa	MPa	%	+20 °C	−120 °C	−196 °C
u	**420** (≥ 350)	**600** (≥ 550)	**35** (≥ 30)	**75**	**45**	≥ 32

u   untreated, as welded – shielding gas Ar + 18 % CO_2

Operating data

	Polarity: DC (+)	Shielding gases: M1 – M3; C1	Redrying: possible, 150 °C/24 h	ø (mm) 1.2 1.6	Amps A 125 – 280 200 – 235	Voltage V 20 – 34 25 – 35

Welding with standard GMAW-facilities possible slightly trailing torch position (angel appr. 80°), when using 100 % CO_2 as shielding gas it is necessary to increase the voltage by 2 V; the gas flow should be 15 – 18 l/min

Approvals

TÜV (09740.), SEPROZ, CE