

ROYAL 8018 B1 (E 8018-B1)

AWS : SFA 5.5, E 8018-B1

Applications

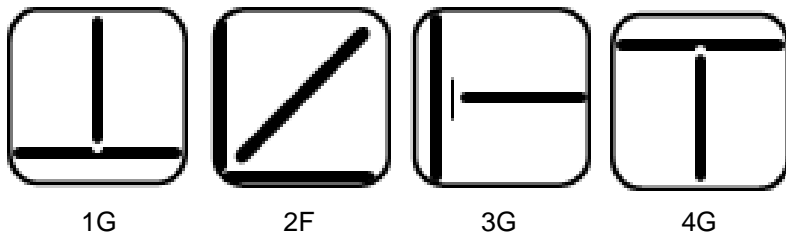
Joining of crack resistant steels, low alloy steels. Welding on equipment of Oil refineries, pipeline & high temperature synthetic chemical industries. Electric power plant.

Characteristics on Usage

It is a hydrogen controlled basic iron powder type all position electrode running with smooth & stable arc with easily detachable slag. It is designed for welds of radiographic quality and used in joining creep resistant steel and low alloy steel. The weld metal possess excellent mechanical properties and resistance to cracking caused by heavy stresses or hydrogen .

Notes On Usage

- ✍ 1) Preheat at 150 - 300 °C and post heat at 690 ± 15 °C.
- ✍ 2) Dry the electrode a 350-400 °C for 60 Min- before use .
- ✍ 3) Keep the arc as short as possible.

Welding Positions**Chemical Composition Of Weld Metal**

C%	Mn%	Si%	S%	P%	Cr %	Mo %
0.05 - 0.12	0.90 Max	0.80 Max	0.03 Max	0.03 Max	0.40 – 0.65	0.40 - 0.65

Mechanical Properties Of Weld Metal

(After PWHT at $690 \pm 15^\circ\text{C}$ for 1 Hr soaking)

U.T.S.	Y.S.	ELONGATION	Hydrogen content
(N/mm ²)	(N/mm ²)	(L = 4d) %	in 100 gm weld metal
550 Min	460 Min	19 % Min	5ml Max

Approvals**Packing and Welding Current**

SIZE (mm)	PIECES PER PACKET	PIECES PER CARTON	Current (Amps)	In Amps
2.50 x 350	150	600	AC / DC (+)	70 – 100
3.15 x 450	100	400		100 – 140
4.00 x 450	70	280		140 – 180
5.00 x 450	45	180		180 – 230