

# Spark Diamond Type: Basic E 7018

## Description

Basic coated, hydrogen controlled iron powder electrode, with 115% metal recovery, excellent welding performance and radiographic quality.

## Deposition Efficiency

115%

## Welding current

DC + / - , AC 70 V

## Application

- Dynamically loaded heavy structures with Impacts down to - 30C
- Pressure Vessels and Boilers
- Pipe welding in 5G & 6G positions
- Tanks and Bridges
- Buffer layer for hardfacing and joining cast irons

Description	Size	Pcs/ Kg
SPARK Diamond	2.50 X 350	42
SPARK Diamond	3.15 X 450	23
SPARK Diamond	4.00 X 450	15
SPARK Diamond	5.00 X 450	10

## Welding Parameters

Diameter	Length	Welding	Arc voltage
mm	mm	current, A	V
2.5	350	80 - 110	23
3.15	450	100 - 140	23
4.0	450	135 - 190	24
5.0	450	170 - 270	24

## Classifications

SFA/AWS A5.1	E7018
IS : 814	EB 5426 H3JX

## Typical all weld metal composition, %

C	Si	Mn
0.06	0.5	1.3

## Typical mech. properties all weld metal

Yield stress, MPa	470
Tensile strength, MPa	540
Elongation, %	26

## Charpy V

Test temps, °C	Impact values, J
-20	140
-30	70

