

ROYAL THERM H4R (E 7018 H4 R)

AWS : SFA 5.1, E 7018 H4 R EN ISO 2560 A E 42 3 B 32 H5

Applications

All maintenance application including welding of all types of Carbon-manganese steel, high tensile steel, heavy structure, plant and equipments subject to static or dynamic loading. Can be used as a buffer layer before hardfacing.

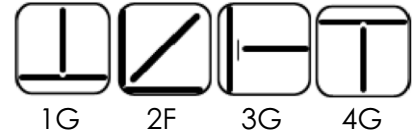
Characteristics on Usage

The low hydrogen controlled, vacuum packed, basic coated electrodes which is welder friendly and is recommended for welding of mild steel, medium carbon, steel, high strength steel, cast steel and problematic steels. The electrodes is vacuum packed and hence does not require expensive redrying at 300°C for 2 hours or a higher temperature. The weld metal is clean and has lowest level of impurities with has much longer life than the weld metal usually deposited with other E 7016 or E 7018 class of electrodes. Deposited weld metal met X-ray radiographic quality standards.

Packing

Vaccum packing

Welding Positions



Notes On Usage

- ⚠️ Rebaking is not necessary if the package is undamaged. If the package has been open more than 8 hrs. Re-bake at 300 °C for 2 hrs.
- ⚠️ Hold the electrodes in portable oven at 100-150 °C during welding and rebake the electrodes in mother oven/ holding oven at 300 °C for 2hrs before use.
- ⚠️ Keep the arc as short as possible
- ⚠️ Use wind screen against strong wind.

Chemical Composition Of Weld Metal

| C% | Mn% | Si% | S% | P% | Cr % | Ni % | Mo % |
|----------|----------|----------|-----------|-----------|----------|----------|----------|
| 0.15 Max | 1.60 Max | 0.75 Max | 0.035 Max | 0.035 Max | 0.20 Max | 0.30 Max | 0.30 Max |

Mechanical Properties Of Weld Metal

| U.T.S. (N/mm ²) | Y.S. (N/mm ²) | ELONGATION (L = 4d) % | IMPACT (CVN) AT - 30° C (J) | Hydrogen content in 100gm weld metal |
|--------------------------------|------------------------------|----------------------------|----------------------------------|---|
| 490 Min | 400 Min | 22 % Min | 27 Joules Min | 4 ml Max |

Packing and Welding Current

| SIZE (mm) | KG PER PACKET | KG PER CARTON | Current (Amps) | In Amps |
|-------------|------------------|------------------|----------------|---------|
| 2.50 x 350 | 2 | 10 | AC / DC (+) | 70-90 |
| 3.15 x 350 | 2 | 10 | | 100-130 |
| 4.00 x 350 | 2 | 10 | | 140-190 |
| 5.00 x 350 | 2 | 10 | | 190-240 |