

SG CrMo5

CATEGORY GMAW-GTAW Solid wires

TYPE Medium alloyed, high-strength 5% Chromium alloy.

APPLICATIONS Mainly used in pipeline, apparatus and boiler application. This alloy is specially intended for high integrity structural service at elevated temperature.

PROPERTIES Designed for welding heat resistant steels to sustain working temperatures upto 650°C

CLASSIFICATION

| | |
|------------|----------------------|
| AWS | A 5.28: ER 80S B6 |
| EN ISO | 21952-A: G/W CrMo5Si |
| DIN: W.Nr. | 1.7373 |
| DIN | 8575: SG CrMo5 |

SUITABLE FOR A213 Grade T5, A217 Grade C5, A335 Grade P5, GX12CrMo5 (1.7362), X12CrMo5 (1.7363), Upto 1180 MPa

APPROVALS CE approved

WELDING POSITIONS:

WELD METAL ANALYSIS %

| C | Mn | Si | Cr | Mo |
|------|------|------|-----|-----|
| 0.08 | 0.50 | 0.45 | 5.7 | 0.6 |

MECHANICAL PROPERTIES

| Heat Treatment | R _{p0,2} (N/mm ²) | R _m (N/mm ²) | A ₅ (%) | Impact Energy (J) ISO-V | |
|----------------|---|--|-----------------------|-------------------------|------|
| | | | | 20°C | 40°C |
| AW (min.) | 430 | 550 | 17 | 47 | |
| SR | > 460 | > 590 | > 18 | > 110 | |

Min. : minimum values, SR: stress relieved PWHT 720°C /2 Hr (Typical)

WELDING PARAMETERS / PACKING

| D (mm) | Welding Parameters | | Spool type | Packing | |
|--------|--------------------|-------------|------------|------------|-----------|
| | Voltage (V) | Current (A) | | kg / spool | kg / 1000 |
| 0.8 | 15-24 | 60-200 | S/D 300 | 15 | 1080 |
| 1.0 | 16-32 | 80-300 | S/D 300 | 15 | 1080 |
| 1.2 | 18-35 | 120-380 | S/D 300 | 15 | 1080 |

REDRYING TEMPERATURE not required

TIG WELDING 1000 mm.cut lengths are available from 1,6 till 3,2 mm. in 5 kg tubes.