



CEWELD 318Si Tig

TYPE Solid stabilized stainless steel TIG rod with high Mo content

APPLICATIONS Constructions in chemical industries like apparatus and vessels up to working temperatures of approximately 120 °C up to 400 °C.

PROPERTIES Applicable for welding of joints and surfacings of stabilized, corrosion resistant CrNiMo steels. Excellent corrosion resistance as needed in chemical industry up to 400°C and good weldability with excellent flowing properties due to the increased Silicon content

CLASSIFICATION

| | |
|--------|--------------------------|
| AWS | A 5.9: ER318 |
| EN ISO | 14343-A: W 19 12 3 Nb Si |
| F-nr | 6 |
| FM | 5 |

SUITABLE FOR 1.4301, 1.4306, 1.4401, 1.4404, 1.4408, 1.4420, 1.4435, 1.4436, 1.4541, 1.4550, 1.4571, 1.4573, 1.4580, 1.4581, 1.4583
 X 6 CrNiMoTi 17 12 2, X10 CrNiMoTi 18 12, X 6 CrNiMoNb 17 12 2, G-X 5 CrNiMoNb 18 10, X 10 CrNiMoNb 18 12, X 5 CrNiMo 18 11, X 2 CrNiMo 17 13 2, G-X 2 CrNiMo 18 10, X 2 CrNiMo 18 14 3, X 5 CrNiMo 17 12 2, G-X 6 CrNiMo 18 10, X 5 CrNiMo 17 13 3
 UNS S31600, S31603, S31635, S31640, S31653,
 AISI 316, 316L, 316Ti, 316Cb

APPROVALS TÜV: TÜV (12391.00), CE, DB: DB (43.206.03)

WELDING POSITIONS



TYPICAL CHEMICAL ANALYSIS OF THE FILLER METAL (%)

| C | Si | Mn | P | S | Cr | Ni | Mo | Nb |
|------|----|----|------|------|----|----|-----|-----|
| 0.05 | 1 | 2 | 0.01 | 0.01 | 19 | 13 | 2.8 | 0.6 |

MECHANICAL PROPERTIES

| Heat Treatment | R _{p0,2} (MPa) | R _m (MPa) | A ₅ (%) | Impact Energy (J) ISO-V | | Hardness |
|----------------|-------------------------|----------------------|--------------------|-------------------------|-------|----------|
| | | | | RT | -60°C | |
| As Welded | 460 | 615 | 35 | 100 | 70 | HRc |

REDRYING Not required

GAS ACC. EN ISO 14175 I1



CEWELD 318Si Tig

318SI TIG 0,8 X 1000MM

| Packaging | KG/unit | EanCode |
|-----------|---------|---------------|
| Tube | 5 | 8720663415189 |

318SI TIG 1,0 X 1000MM

| Packaging | KG/unit | EanCode |
|-----------|---------|---------------|
| Tube | 5 | 8720663415172 |

318SI TIG 1,6 X 1000MM

| Packaging | KG/unit | EanCode |
|-----------|---------|---------------|
| Tube | 5 | 8720663415196 |

318SI TIG 2,0 X 1000MM

| Packaging | KG/unit | EanCode |
|-----------|---------|---------------|
| Tube | 5 | 8720663415202 |

318SI TIG 2,4 X 1000MM

| Packaging | KG/unit | EanCode |
|-----------|---------|---------------|
| Tube | 5 | 8720663415226 |

318SI TIG 3,2 X 1000MM

| Packaging | KG/unit | EanCode |
|-----------|---------|---------------|
| Tube | 5 | 8720663415233 |

318SI TIG 4,0 X 1000MM

| Packaging | KG/unit | EanCode |
|-----------|---------|---------------|
| Tube | 5 | 8720663415240 |