



# CEWELD 309LSi Tig

|                                                   |                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                |                         |                      |                    |                         |        |          |
|---------------------------------------------------|--------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------|-------------------------|----------------------|--------------------|-------------------------|--------|----------|
| TYPE                                              | Stainless steel filler metal for dissimilar welding between steel and stainless steel and difficult to weld steels.( Type 1.4432, 23 12 LSi )                                                                                                                                                                                                                                                                                                                                                                                                                                                                                  |                         |                      |                    |                         |        |          |
| APPLICATIONS                                      | CEWELD 309LSi Tig is for buffer layers before hard facing, dissimilar joints between ferritic and austenitic steels and or difficult to weld steels.                                                                                                                                                                                                                                                                                                                                                                                                                                                                           |                         |                      |                    |                         |        |          |
| PROPERTIES                                        | High mechanical properties and very good weldability due to a ingreased silicon content, suitable for operating temperatures from -120°C up to 300°C.                                                                                                                                                                                                                                                                                                                                                                                                                                                                          |                         |                      |                    |                         |        |          |
| CLASSIFICATION                                    | AWS                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                            | A 5.9: ER309LSi         |                      |                    |                         |        |          |
|                                                   | EN ISO                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                         | 14343-A: W 23 12 L Si   |                      |                    |                         |        |          |
|                                                   | W.Nr.                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                          | 1.4432                  |                      |                    |                         |        |          |
|                                                   | F-nr                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                           | 6                       |                      |                    |                         |        |          |
|                                                   | FM                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                             | 5                       |                      |                    |                         |        |          |
| SUITABLE FOR                                      | ISO 15608: 8.1 Austenitic ≤ 19 % Cr ( no Mo)<br>ISO 15608: Gr. 8.1 mix 1.1<br>1.2780, 1.4541, 1.4550, 1.4710, 1.4712, 1.4713, 1.4724, 1.4729, 1.4740, 1.4741, 1.4742, 1.4746, 1.4762, 1.4745, 1.4825, 1.4826, 1.4828, 1.4832, 1.4878,<br>X15CrNiSi20 12, G-X 40 CrNiSi20 9,<br>AISI 446, AISI442, AISI309,<br>UNS S30900, S44200, S44600                                                                                                                                                                                                                                                                                       |                         |                      |                    |                         |        |          |
| APPROVALS                                         | TÜV: (12394), CE                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                               |                         |                      |                    |                         |        |          |
| WELDING POSITIONS                                 | <div>PAPBPCPDPEPFPG</div> |                         |                      |                    |                         |        |          |
| TYPICAL CHEMICAL ANALYSIS OF THE FILLER METAL (%) | C                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                              | Si                      | Mn                   | P                  | S                       | Cr     | Ni       |
|                                                   | 0.02                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                           | 0.7                     | 1.7                  | 0.01               | 0.01                    | 24     | 13       |
| MECHANICAL PROPERTIES                             | Heat Treatment                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                 | R <sub>P0,2</sub> (MPa) | R <sub>m</sub> (MPa) | A <sub>5</sub> (%) | Impact Energy (J) ISO-V |        | Hardness |
|                                                   |                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                |                         |                      |                    | RT                      | -196°C |          |
|                                                   | As Welded                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                      | 535                     | 640                  | 37                 | 140                     | 50     | HRc      |
| REDRYING                                          | Not required                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                   |                         |                      |                    |                         |        |          |
| GAS ACC. EN ISO 14175                             | I1                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                             |                         |                      |                    |                         |        |          |



# CEWELD 309LSi Tig

|                         |           |         |               |
|-------------------------|-----------|---------|---------------|
| 309LSi TIG 1,0 X 1000MM | Packaging | KG/unit | EanCode       |
|                         | Tube      | 5       | 8720663413987 |
| 309LSi TIG 1,2 X 1000MM | Packaging | KG/unit | EanCode       |
|                         | Tube      | 5       | 8720663414007 |
| 309LSi TIG 1,6 X 1000MM | Packaging | KG/unit | EanCode       |
|                         | Tube      | 5       | 8720663413994 |
| 309LSi TIG 1,6 X 500MM  | Packaging | KG/unit | EanCode       |
|                         | Tube      | 5       | 8720663414014 |
| 309LSi TIG 2,0 X 1000MM | Packaging | KG/unit | EanCode       |
|                         | Tube      | 5       | 8720663414021 |
| 309LSi TIG 2,0 X 500MM  | Packaging | KG/unit | EanCode       |
|                         | Tube      | 5       | 8720663414045 |
| 309LSi TIG 2,4 X 1000MM | Packaging | KG/unit | EanCode       |
|                         | Tube      | 5       | 8720663414069 |
| 309LSi TIG 2,4 X 500MM  | Packaging | KG/unit | EanCode       |
|                         | Tube      | 5       | 8720663414083 |
| 309LSi TIG 3,2 X 1000MM | Packaging | KG/unit | EanCode       |
|                         | Tube      | 5       | 8720663414090 |
| 309LSi TIG 4,0 X 1000MM | Packaging | KG/unit | EanCode       |
|                         | Tube      | 5       | 8720663414182 |