

Brand name | NILO® 36, Invar 36, Pernifer 36

Trade name | Alloy 36

| Material No. | EN Designation | UNS | Alloy |
|--------------|----------------|--------|-------|
| 1.3912 | Ni 36 | K93600 | 36 |

Description | Alloy 36 / 1.3912 is a nickel-iron alloy with low expansion. (36% nickel)

Special properties | Good strength and toughness at very low temperatures. Low coefficient of expansion in low temperatures of 250°C.

| C % | Si ≤ % | Mn ≤ % | P ≤ % | S ≤ % |
|--------|--------|-----------|--------|-------|
| ≤ 0.10 | 0.35 | 0.60 | 0.025 | 0.025 |
| Cr % | Mo % | Ni % | Co % | Fe % |
| ≤ 0.50 | ≤ 0.50 | 35.0-38.0 | ≤ 1.00 | Rest |

| Hardness HB 30 ≤ HB | 0.2% Yield strength R _p ≥ N/mm ² | Tensile strength R _m N/mm ² | Elongation A ₅ ≥ % | Modulus of elasticity kN/mm ² |
|---------------------|--|---|-------------------------------|--|
| 140 | 310 | ≥ 490 | 30 | 140 |

| Density g/cm ³ | Specific heat capacity J/kg K | Thermal conductivity W/m K | Electrical resistivity Ω mm ² /m |
|---------------------------|-------------------------------|----------------------------|---|
| 8.13 | 515 | 10.5 | 0.75 |

Suitable welding filler materials | 2.4648

Application | Tanks for liquid natural gas, measuring and thermostatic instruments

Available forms for 1.3912 / ALLOY 36

