**This page is mainly introduced the 0Cr17Ni12Mo2 Datasheet, including chemical information,mechanical properties, physical properties, mechanical properties, heat treatment, and Micro structure, etc. It also contains the use of 0Cr17Ni12Mo2,such as it is commonly used in bars, sheet,plates, steel coils, steel pipes,forged and other materials application.**

# Datasheet for Steel Grades Specialsteel 0Cr17Ni12Mo2

| 0Cr17Ni12Mo2 Standard Number: | | |
|---|---|---|
| ITEM | Standard Number | Descriptions |
| 1 | GB 13296 (2007) | Seamless stainless steel tubes for boiler and heat exchanger |
| 2 | GB 4238 (1992) | Heat-resisting steel sheets and plates |
| 3 | GB/T 1220 (1992) | Stainless steel bars |
| 4 | GB/T 1221 (1992) | Heat-resisting steel bars |
| 5 | GB/T 12770 (2002) | Welded stainless steel tubes for machine structures |
| 6 | GB/T 12771 (2000) | Welded stainless steel pipes for liquid delivery |
| 7 | GB/T 14975 (2002) | Stainless steel seamless tubes for structures |
| 8 | GB/T 14976 (2002) | Stainless steel seamless tubes for fluid transport |
| 9 | GB/T 3090 (2000) | Stainless steel small diameter seamless steel tubes |
| 10 | GB/T 3280 (2007) | Cold rolled stainless steel sheets and plates |
| 11 | GB/T 4226 (2004) | Cold finished stainless steel bars |
| 12 | GB/T 4237 (1992) | Hot rolled stainless steel sheets and plates |
| 13 | GB/T 4239 (1991) | Cold rolled stainless steel and heat resisting steel strips |
| 14 | GB/T 4240 (1993) | Stainless steel wires |
| 15 | GB/T 4356 (2002) | Stainless steel wire rods |
| 16 | JB 4728 (2000) | Stainless Steel Forgings for Pressure Vessels |

| 0Cr17Ni12Mo2 Chemical composition(mass fraction)(wt.%) | | |
|---|---|---|
| Chemical | Min.(%) | Max.(%) |
| C | | 0.08 |
| Si | | 1.00 |
| Mn | | 2.00 |
| P | | 0.035 |
| S | | 0.030 |

| | | |
|---|---|---|
| Ni | 10.00 | 14.00 |
| Cr | 16.00 | 18.50 |
| Mo | 2.00 | 3.00 |

| C | Si | Mn | P | S | Cr | Ni | Mo | V | Ta |
|---|---|---|---|---|---|---|---|---|---|
| | | | | | | | | | |
| W | N | Cu | Co | Pb | B | Nb | Al | Ti | Other |
| | | | | | | | | | |

# 0Cr17Ni12Mo2

## 0Cr17Ni12Mo2 Physical Properties

| | | |
|---|---|---|
| Tensile strength | 115-234 | σb/MPa |
| Yield Strength | 23 | σ 0.2 ≥/MPa |
| Elongation | 65 | δ5≥ (%) |
| ψ | - | ψ≥ (%) |
| Akv | - | Akv≥/J |
| HBS | 123-321 | - |
| HRC | 30 | - |

## 0Cr17Ni12Mo2 Mechanical Properties

| | | |
|---|---|---|
| Tensile strength | 231-231 | σb/MPa |
| Yield Strength | 154 | σ 0.2 ≥/MPa |
| Elongation | 56 | δ5≥(%) |
| ψ | - | ψ≥(%) |
| Akv | - | Akv≥/J |
| HBS | 235-268 | - |
| HRC | 30 | - |

## 0Cr17Ni12Mo2 Heat Treatment Regime

| Annealing | Quenching | Tempering | Normalizing | Q & T |
|---|---|---|---|---|
| √ | √ | √ | √ | √ |

## 0Cr17Ni12Mo2 Range of products

| Product type | Products | Dimension | Processes | Deliver Status |
|---|---|---|---|---|
| Plates / Sheets | Plates / Sheets | 0.08-200mm(T)*W*L | Forging, hot rolling and cold rolling | Annealed, Solution and Aging, Q+T, ACID-WASHED, Shot Blasting |
| Steel Bar | Round Bar, Flat Bar, Square Bar | Φ8-1200mm*L | Forging, hot rolling and cold rolling, Cast | Black, Rough Turning, Shot Blasting, |
| Coil / Strip | Steel Coil /Steel Strip | 0.03-16.0x1200mm | Cold-Rolled & Hot-Rolled | Annealed, Solution and Aging, Q+T, ACID-WASHED, Shot Blasting |
| Pipes / Tubes | Seamless Pipes/Tubes, Welded Pipes/Tubes | OD:6-219mm x WT:0.5-20.0mm | Hot extrusion, Cold Drawn, Welded | Annealed, Solution and Aging, Q+T, ACID-WASHED |

## We can produce Specialsteel the specifications follows: