







Stainless Steel

1.4125 (440C) Bar

**Datasheet Updated** 05 August 2021

# **SPECIFICATIONS**

Commercial 440C EN 1.4125

A martensitic stainless steel with the highest carbon content in the 400 series.

# **CHEMICAL COMPOSITION**

# EN 10088-3 1.4125 Steel

Element	% Present
Carbon (C)	0.95 - 1.20
Chromium (Cr)	16.00 - 18.00
Manganese (Mn)	0.00 - 1.00
Silicon (Si)	0.00 - 1.00
Phosphorous (P)	0.00 - 0.04
Sulphur (S)	0.00 - 0.03
Molybdenum (Mo)	0.40 - 0.80
Iron (Fe)	Balance

## **ALLOY DESIGNATIONS**

- 440C
- UNS44004
- 1.4125

### SUPPLIED FORMS

# **APPLICATIONS**

- Rolling element bearings
- Valve seats
- High quality knife blades
- Surgical instruments
- Chisels

### **CHARACTERISTICS**

- Excellent hardness
- High wear resistance
- Good mechanical strength
- Good fatigue resistance
- Moderate corrosion resistance

# **MECHANICAL PROPERTIES**

### EN 10088-3

## Bar Up To 100mm Dia or Thickness

Property	Value
Proof Stress	448-1900 MPa
Tensile Strength	758-2030 MPa
Elongation A50 mm	4-14 %

#### **DISCLAIMER**

This Data is indicative only and as such is not to be relied upon in place of the full specification. In particular, mechanical property requirements vary widely with temper, product and product dimensions. All information is based on our present knowledge and is given in good faith. No liability will be accepted by the Company in respect of any action taken by any third party in reliance thereon. Please note that the 'Datasheet Update' date shown above is no guarantee of accuracy or whether the datasheet is up to date.

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