



EN19 Forged Round Bars in Machinable Condition – Precision Ready Alloy Steel

Description

EN19 forged rounds in machinable condition are a top choice for critical engineering components that demand **high tensile strength**, **good ductility**, **shock resistance**, and **excellent machinability**. Typically falling under the **BS970:1955 EN19** standard (also known as **709M40** under BS970:1991), this chromium-molybdenum alloy steel offers a fine balance of toughness and strength, making it highly suitable for machining-intensive operations prior to hardening or heat treatment.

At [Steelmet Industries](http://www.steelmet.in), we offer **EN19 forged rounds in machinable condition** – also known as **soft annealed or normalized + tempered condition** – in diameters ranging from **40mm to 400mm**, with **custom size and cut length options**, especially suited for applications where pre-machining is critical before final hardening and finishing.

Key Characteristics of EN19 Forged Bars

- **Standard:** BS970:1955 EN19
- **Alternate Designation:** 709M40 (BS970:1991), AISI 4140
- **Delivery Condition:** Machinable (typically Annealed or N+T)
- **Material Type:** Cr-Mo alloy steel
- **Surface:** Black forged or machined

- **Machinability:** Excellent in this condition, ideal for turning/milling
- **Post Processing:** Suitable for hardening, tempering, and surface nitriding

Applications of EN19 Forged Rounds in Machinable Condition

EN19 is widely used across industries due to its adaptability to various heat treatments. Machinable EN19 forged bars are typically used to manufacture:

- High-strength **automotive shafts, gears, and pinions**
- **Crankshafts, spindles, axles, and connecting rods**
- General purpose mechanical parts requiring good machinability
- **Tool holders, jigs, and fixtures**
- **Mining and oilfield components** requiring moderate wear resistance

Other Forms & Conditions Available

Steelmet Industries also supplies EN19 in a variety of shapes and finishes:

- **Bright bars** ??? drawn, peeled, or ground
- **Flats, Squares, and Custom Profiles**
- **Heat treated** ??? QT (quenched and tempered), N+T, or hardened and tempered
- **Rough machined or turned** finishes
- Also available in **cut-to-length** bars for process-ready delivery

Global Equivalent Grades for EN19 Alloy Steel

Standard	Equivalent Grade
BS970:1955	EN19
BS970:1991	709M40
AISI/SAE	4140
DIN	42CrMo4 (1.7225)
ISO	42CrMo4
IS (India)	40CrMoS4
JIS (Japan)	SCM440
GOST (Russia)	38Kh2MFA
UNI (Italy)	42CrMo4
AFNOR (France)	42CD4
GB (China)	42CrMo

Disclaimer: These equivalencies are based on chemical composition. Always confirm mechanical property and heat treatment suitability for critical applications.

For more specifications, see:

- [BS970-1955 Specification](#)
- [DIN Steel Grades](#)
- [SAE Steel Grades](#)

Why Order EN19 Forged Bars from Steelmet Industries?

Steelmet Industries specializes in **supply of EN19 forged rounds** across India and globally, with key advantages such as:

- **Wide size range availability**, including non-standard diameters
- **Custom cut lengths** for ease of machining and logistics
- **Consistent supply & scheduled deliveries** for production planning

- **Traceability** through:
 - MTCs (Mill Test Certificates)
 - Third-party inspection reports
 - Lorry receipts & dispatch documentation
 - Customer-verified endorsements
- Access to **NABL-certified labs** and **strict quality policies**
 - [View Our Quality Policy](#)

Explore all offerings: [What We Do](#)

Frequently Asked Questions About EN19 Forged Rounds

Q1: What does "machinable condition" mean for EN19 forged rounds?

A: Machinable condition typically refers to bars supplied in annealed or normalized and tempered condition, where the hardness is low (~200-250 BHN), ensuring easy cutting, turning, and milling.

Q2: Can EN19 forged rounds be used without further heat treatment?

A: Yes, in some cases. However, most applications require hardening and tempering to fully utilize EN19's high tensile and fatigue strength capabilities.

Q3: Are EN19 and AISI 4140 the same?

A: They are close equivalents in terms of chemistry and performance. Always refer to the project specifications to verify tolerances.

Q4: Do you provide forged EN19 bars with documentation and third-party inspection?

A: Yes. Upon prior agreement, we can supply MTCs, lab reports, inspection documents, and even transport records.

Q5: Do you export EN19 bars?

A: Absolutely. We serve both **Indian** and **international clients** with full export documentation and packaging as required.

Get a Quote or Know More

Call us at:

India: 0712-2728071 | International: +91-712-2728071

WhatsApp: +917122728071

Enquiry Form: [Submit Your Requirement](#)

Visit us at: www.steelmet.in

We cater to customers across **India**, the **Middle East**, **Southeast Asia**, **Europe**, and beyond.

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