

This specification covers a corrosion and heat-resisting steel in the form of work hardened bar. A286 cold reduced nickel bar 15% -17% is typically used in fastener applications requiring room temperature minimum tensile strength of 160 ksi and for use at temperatures up to 1000° F and requiring oxidation resistance up to 1200° F. A286 stainless steel is typically multiple melted with either a vacuum arc remelt (VAR) or electroslag remelt (ESR) practice in the remelt cycle.

Nominal Composition

C	Carbon – 0.08%
Mn	Manganese – 2.00%
P	Phosphorous – 0.025%
S	Sulfur – 0.025%
Si	Silicon – 1.00%
Cr	Chromium – 13.50 – 16.00%
Ni	Nickel – 24.00 – 27.00%
Mo	Molybdenum – 1.00 – 1.50%
Ti	Titanium – 1.90 – 2.35%
V	Vanadium – 0.10 – 0.50%
Al	Aluminum – 0.35%
B	Boron – 0.003 – 0.010%
Cu	Copper – 0.50%

Percent by weight, maximum unless a range is listed.

Standard Inventory Specifications

- AMS 5853 (160 ksi)
- AMS 5726
- AMS 5731
- AMS 5732 Heading Stock
- AMS 5734 Heading Stock
- AMS 5736 Heading Stock
- AMS 5737 Heading Stock

Forms Stocked

- A286 CR Bar
- Cold reduced 15-17%
- Cold reduced 40-60%

Thickness Stocked – 15-17% CR

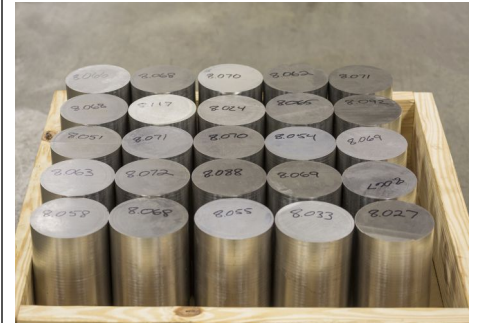
- 0.260" – 1.510" – Bar
- 0.020" – 0.125" – Coil
- 0.020" – 0.125" – Sheet

Thickness Stocked – 40-60% CR

- 0.385" – 1.010" – Bar

Industry Applications

- Aerospace fasteners



Call 1.888.282.3292

Or click here to view our product page and request a quote on cold reduced a286 bars

Physical Properties

Property	Value
Density	0.286 lbs/in ³ , 7.92 g/cm ³

Mechanical Properties

Property	Value
Yield Strength	120 ksi minimum
Elongation (4D)	12% minimum
Reduction of Area	18% minimum
Hardness	298 BN minimum