

Products & Sizes

Coil	Sheet	Precision Reroll Strip
0.010" - 0.125"	0.010" - 0.125"	0.0008" - 0.015"

302 Chemical Composition

	Element	Min	Max
C	Carbon	-	0.15
Mn	Manganese	-	2.0
P	Phosphorus	-	0.045
S	Sulfur	-	0.03
Si	Silicon	-	0.75
Cr	Chromium	17.000	19.000
Ni	Nickel	8.000	10.000
Al	Aluminum	-	0.1

Industry Standards

- PWA-LCS
- GE Aircraft Engine (GT193)
- GE Aviation S-SPEC-35 AeDMS S-400
- RR SABRe Edition 2
- DFARS Compliant

Industry Applications

- Food and beverage industry
- Pressure containing applications
- Sanitary or cryogenic applications

Physical Properties

Property	Value
Density	0.29 lb/in ³ (8.03 g/cm ³)
Modulus of Elasticity in Tension	29x10 ⁶ psi (200 GPa)
Magnetic Permeability	1.02 Max @ 200 H

Linear Coefficient of Thermal Expansion

Temperature Range		Mean Coefficient of Thermal Expansion	
°C	°F	mm/mm°C	in/in/°F x 10 ⁷
20 - 100	68 - 212	16.6 · 10 ⁻⁶	9.2 · 10 ⁻⁶
20 - 870	68 - 1600	19.8 · 10 ⁻⁶	11 · 10 ⁻⁶

Thermal Conductivity			
Temperature Range		W/m·K	Btu/(hr/ft ² /hr/°F/ft)
°C	°F		
100	212	16.3	9.4
500	932	21.4	12.4

Specific Heat			
Temperature Range		J/kg°K	Btu/lb/°F
°C	°F		
0-100	32-212	500	0.12

Electric Resistivity			
Temperature Range		microhm-cm	microhm-in
°C	°F		
20	68	72	28.3
100	212	78	30.7
200	392	86	33.8
400	752	100	39.4
600	1112	111	43.7
800	1472	121	47.6
900	1652	126	49.6

Mechanical Properties

Property	302, 304	304L	305
0.2% Offset Yield Strength, psi (MPa)	30,000 (205)	25,000 (170)	25,000 (170)
Ultimate Tensile Strength, psi (MPa)	75,000 (515)	70,000 (485)	70,000 (485)