

## Material: ASTM A240 UNS S31009

### Standard Specification for Chromium and Chromium-Nickel Stainless Steel Plate, Sheet, and Strip for Pressure Vessels and for General Applications

**Group:** Ferrous Stainless Steel Alloys

**Sub Group:** ASTM A240 Chromium and Chromium-Nickel Stainless Steel for Pressure Vessels and for General Applications

**Application:** Intended for Valve, Pump, General Engineering, Automotive and Other Industries Grade

**Belongs to the Industry:** Steel, Plate, Sheet and Strip

Chemical Composition			Heat Treatment	
Carbon	C %	0.040 - 0.100	Solution Annealing	
Silicon	Si %	0.750 max.		
Manganese	Mn %	2.000 max.		
Phosphorus	P %	0.045 max.		
Sulphur	S %	0.030 max.		
Chromium	Cr %	24.000 - 26.000		
Nickel	Ni %	19.000 - 22.000		
Iron	Fe %	Balance		
-	-	-	<b>Mechanical Properties</b> Tensile Strength in Mpa   515 min. Yield Strength in Mpa   205 min. Elongation in %   40 min. Reduction of Area in %   - Hardness in HB   217 max. Impact in Joule   -	
-	-	-		
-	-	-		
-	-	-		
-	-	-		
-	-	-		
-	-	-		
-	-	-		

Cross Reference Table			
Material	Standard	Country	Grade Belong to the Industry
A743 CK20	ASTM	USA	Casting
SA-351 Grade CK20	ASME	USA	Casting
1.4843	DIN	Germany	Round and Flat Wire
SCS 18	JIS	Japan	Centrifugal Cast Steel Pipes
Ch25N20	GOST	Russia	Precision Alloys
H 23 N 18	PN	Poland	Heat Resisting Steel
T 25 NiCr 250	STAS	Romania	Casting

**Disclaimer:** All information displayed in our data sheets are for reference purpose only and are sole property of their respective owners. Information and or material are used for educational purposes only. Data at actual may vary at actual and case to case basis. ICAST Alloys LLP does not guarantee validity of these parameters. Warranties and liabilities are exclusive to our terms and conditions of business.

**Customer Care:** +91-99090 45075 Email: [info@icastllp.com](mailto:info@icastllp.com)