



Material - BS 420 S 45

Standard Specification for Stainless and Heat Resisting Steels

Group - Ferrous Stainless Steel Alloys

Sub Group - BS 420 S 45 Stainless and Heat Resisting Steels

Application - Intended for Valve, Pump, General Engineering, Automotive and Other Industries

Grade Belongs to the Industry - Bar, Wire, Shapes and Forging

Chemical Composition			Heat Treatment	
Carbon	C %	0.280 - 0.360	Annealing or Hardening + Tempering	
Silicon	Si %	0.800 max.		
Manganese	Mn %	1.000 max.		
Phosphorus	P %	0.040 max.		
Sulphur	S %	0.030 max.		
Chromium	Cr %	12.000 - 14.000		
Nickel	Ni %	1.000 max.		
Iron	Fe %	Balance		
-	-	-	Mechanical Properties	
-	-	-	Tensile Strength in Mpa	850 max.
-	-	-	Yield Strength in Mpa	-
-	-	-	Elongation in %	-
-	-	-	Reduction of Area in %	-
-	-	-	Hardness in HV	260 max.
-	-	-	Impact in Joule	-

Cross Reference Table			
Material	Standard	Country	Grade Belong to the Industry
1.4028	EN	European Union	Forging
SUS 420J2	JIS	Japan	Forging
30CH13	GOST	Russia	Bar, Wire, Shapes and Forging
2304	SS	Sweden	Bar, Wire, Shapes and Forging
X 30Cr13	UNI	Italy	Bar, Wire, Shapes and Forging
420	AISI	USA	Bar, Wire, Shapes and Forging
A743 CA20	ASTM	USA	Casting

Further any inquiry to discuss with Gravity Cast Pvt. Ltd. – Gravity Group of Companies team member Call on +918469160029, or email marketing@gravitycastindia.com

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