



Material - ASTM A351 HG10MnN

Standard Specification for Castings, Austenitic, for Pressure-Containing Parts

Group - Ferrous Stainless Steel Alloys

Sub Group - ASTM A351 / 351M Castings, Austenitic, for Pressure-Containing Parts
Application - Intended for Valves, Pumps, General Engineering, Automobile and Other Industries
Grade Belongs to the Industry - Casting

Chemical Composition			Heat Treatment	
Carbon	C %	0.070 - 0.110	Solution Annealing	
Silicon	Si %	0.700 max.		
Manganese	Mn %	3.000 - 5.000		
Phosphorus	P %	0.040 max.		
Sulphur	S %	0.030 max.		
Chromium	Cr %	18.500 - 20.500		
Nickel	Ni %	11.500 - 13.500		
Molybdenum	Mo %	0.250 - 0.450		
Copper	Cu %	0.500 max.	Mechanical Properties	
Nitrogen	N %	0.200 - 0.300	Tensile Strength in Mpa	525 min.
Iron	Fe %	Balance	Yield Strength in Mpa	225 min.
Niobium	Nb %	8*C - 1.000 max.	Elongation in %	20 min.
Iron	Fe %	Balance	Reduction of Area in %	-
-	-		Hardness in BHN	
-	-	-	Impac <mark>t in Joule</mark>	-

Cross Reference Table				
Material	Standard	Country	Grade Belong to the Industry	
A297 HG10MnN	ASTM	USA	Casting	
A743 HG10MnN	ASTM	USA	Casting	
1.4832	DIN	Germany	Casting	
LH 19 N 14 G	PN	Poland	Casting	
J92604	UNS	USA	Casting	
19 Cr 12 Ni 4 Mn	Common		Casting	
S30409	UNS	USA	General High Temperature and General Corrosive Service	

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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