



## Material - AISI 1065

## Standard Specification For Carbon Steel Compositions For Forging To Hot-Rolled Steel and Bar

**Group - Ferrous Mild Steel Alloys** 

Sub Group - AISI 1065 Carbon Steel Compositions For Forging To Hot-Rolled Steel and Bar Application - Intended for Valve, Pump, General Engineering, Automotive and Other Industries Grade Belongs to the Industry - Steel and Bar

Chemical Composition			Heat Treatment	
Carbon	C %	0.600 - 0.700		
Manganese	Mn %	0.600 - 0.900	As Raw or Annealing or Normalizing or Hardening and Tempering	
Phosphorus	P %	0.040 max.		lizing or Hardoning and
Sulphur	S %	0.050 max.		· ·
Boron	В%	0.0005 - 0.003		
Copper	Cu %	0.200 max.		
Niobium	Nb %	0.0150 min.		
Silicon	Si %	0.100 max.		
Aluminium	Al %	0.200 max.	Mechanical Properties	
Vanadium	V %	0.020 min.	Tensile Strength in Mpa	630 - 690
Iron	Fe %	Balance	Yield Strength in Mpa	380 min.
-	-	-	Elongation in %	10 min.
-	-	-	Reduction of Area in %	30 - 45
-	-	-	Hardness in HB	187 - 207
-	-	-	Impact in Joule	-

Cross Reference Table				
Material	Standard	Country Grade Belong to the Industry		
G10650	UNS	USA	Bars, Wire Rods, Plates, Strip, Sheets and Tubing	
1065	SAE	USA	Plate, Strip, Sheet and Tubing	
A 830 G10650	ASTM	USA	Plate and Steel	
A 713 G10650	ASTM	USA	Steel and wire	
A 682 G10650	ASTM	USA	Steel and Strip	
A 682 Grade 1065	ASTM	USA	Steel and Strip	
A 684 Grade 1065	ASTM	USA	Steel and Strip	

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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