



## Material - ASTM A 576 10L78

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

Group - Ferrous Mild Steel Alloys

Sub Group - ASTM A 576 10L78 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 %	0.720 - 0.850	As Raw or Annealing or Normalizing or Hardening and Tempering	
Manganese	Mn %	0.300 - 0.600		
Phosphorus	P %	0.040 max.		
Sulphur	S %	0.050 max.		
Boron	B %	0.0005 - 0.003		
Copper	Cu %	0.200 min.		
Lead	Pb %	0.150 - 0.350		
Silicon	Si %	0.100 max.		
Iron	Fe %	Balance		
-	-	-		
			Mechanical Properties	
-	-	-	Tensile Strength in Mpa	650 - 690
-	-	-	Yield Strength in Mpa	380 min.
-	-	-	Elongation in %	10 min.
-	-	-	Reduction of Area in %	30 - 40
-	-	-	Hardness in HB	192 - 207
-	-	-	Impact in Joule	-

Cross Reference Table			
Material	Standard	Country	Grade Belong to the Industry
G10780	UNS	USA	Bars, Wire Rods, Plates, Strip, Sheets and Tubing
1078	SAE	USA	Steel
1078	AISI	USA	Steel and Bar
A 830 G10780	ASTM	USA	Plate and Steel
A 713 G10780	ASTM	USA	Steel and Wire
A 830 1078	ASTM	USA	Plate and Steel
A 713 Grade 1078	ASTM	USA	Steel and Wire

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

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