



Material - ASTM B 815 R31233

Standard Specification for Cobalt-Chromium-Nickel-Molybdenum-Tungsten Alloy Rod

Group - Non-Ferrous Nickel Alloys

Sub Group - ASTM B 815 R31233 Cobalt-Chromium-Nickel-Molybdenum-Tungsten Alloy Rod Application - Intended for Valve, Pump, General Engineering, Automotive, Medical and other Industries Grade Belongs to the Industry - Rod

Chemical Composition			Heat Treatment	
Carbon	C %	0.020 - 0.100		
Silicon	Si %	0.050 - 1.000		
Manganese	Mn %	0.100 - 1.500		
Chromium	Cr %	23.500 - 27.500	As-Cast or Annealing	or Age Hardning
Sulphur	S %	0.020 max.		
Molybdenum	Mo %	4.000 - 6.000		
Phosphorus	P %	0.030 max.		
Boron	B %	0.015 max.		
Iron	Fe %	1.000 - 5.000	Mechanical Properties	
Nickel	Ni %	7.000 - 11.000	Tensile Strength in Mpa	896 min.
Nitrogen	N %	0.030 - 0.120	Yield Strength in Mpa	379 min.
Tungsten	W %	1.000 - 3.000	Elongation in %	15 min.
Cobalt	Co %	Balance	Reduction of Area in %	-
-	-		Hardness in BHN	
-	-	-	Impact in Joule	-

Cross Reference Table					
Material	Standard	Country	Country Grade Belong to the Industry		
B 818 R31233	ASTM	USA	Plate, Sheet and Strip		
SB-815 R31233	ASME	USA	Rod		
SB-818 R31233	ASME	USA	Plate, Sheet and Strip		
R31233	UNS	USA	Rod		
-	-	-	-		
-	-	-	-		
-	-	-	-		

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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