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416 Round Bar

MATERIAL SPECIFICATIONS

PREPARED BY: H POPE

REVISION DATE: 03/15/13

MATERIAL	STAINLESS ROUND BAR 416 R/L 12-14'	SMOOTH TURNED	RMS 50
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SPCIFICATIONS	ALL SPECIFICATIONS WITH LATEST YEAR REVISIONS AISI 416 UNS# S40416 ASTM A314, ASTM A484, ASTM A582, AMS 5610 TYPE 11, QQ-S-764B AMD2 COND A, MIL-S-862-B, EN 10204-3.1
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<u>CHEMICAL ANALYSIS</u>			<u>MECHANICAL PROPERTIES</u>		
Carbon (C)	.15		Tensile Strength	up to 1/2"	83/105 KSI
Chromium (Cr)	12.00-14.00		(U.T.S.)	over 1/2"	75 KSI
Copper (Cu)		report content	Yield Strength		to be reported
Manganses (Mn)	1.25		(Yield)		
Molybdenum (Mo)	.60		Elongation		to be reported
Nickel (Ni)		report content	(Ei. or Elong.)		
Nitrogen (N)	.07		Reduction of Area		to be reported
Other (if any)		report content	(R.A. or Red.)		
Phosphorous (P)	.06		Hardness		140/255
Silicon (Si)	1.00		(RB,RC,or BHN)		aim 170-220
Sulfur (S)	0.03 min	aim .32-.40			RC 35 min

All singular chemistry values are
MAXIMUM unless otherwise noted

All mechanical properties are
MINIMUM unless otherwise noted

OTHER TEST(S) AND/OR REQUIREMENTS

MACRO ETCH TEST & MICRO STRUCTURE TO BE SATISFACTORY
MERCURY FREE CONTAMINATION STATEMENT
FREE FROM RADIOACTIVE CONTAMINATION
NO WELDING OR WELD REPAIR STATEMENT
SOLUTION ANNEALED CONDITION A. TEMP. 1040C/1900F MINIMUM AND WATER QUENCHED
HEAT TREATMENT AND SOAK TIME MUST BE REPORTED.
FINISHED CONDITION RMS 50 MAX , MELT AND HOT WORKING PRACTICES TO BE REPORTED
GRADE AND HEAT NUMBER MUST BE METAL STAMPED AT BOTH ENDS ON SIZES 1" DIA. AND LARGER
COLOUR CODE BROWN
BUNDLE WEIGHT - 2200 LBS MAXIMUM

IMPORTANT:

ORIGINAL CERTIFICATES OF CHEMICAL & PHYSICAL ANALYSIS REQUIRED TWO (2) WEEKS BEFORE
SHIPMENT ARRIVES
ALL TEST REPORTS MUST STATE COUNTRY OF ORIGIN
TEST REPORTS MUST HAVE THE SIGNATURE NAME AND TITLE PRINTED
ALL TEST REPORTS MUST BE SIGNED BY AUTHORIZED PERSON