



## MA35B High Leaded Brass

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### Introduction

MA35B is a high-leaded brass with machinability rating of 90, moderate strength, and capacity for cold work. The alloy is used in applications requiring a combination of machining and forming operations, without annealing. Examples of use include parts with swaged, flared, knurled, or other formed features, including components with crimping requirement.

To learn more please contact our [sales department](#).

# MA35B High Leaded Brass

Chemical Composition - Limits		Chemical Composition - Nominal	
Cu 61-63 (99.5 min incl named elements)		Cu 62.0	
Pb 1.6-2.5		Pb 2.0	
Zn rem		Zn 36.0	
Fe 0.15 max			
Specifications		Fabrication Index	
ASTM B453		Soldering	5 - Excellent
EN 12164		Hot Worked	2 - Fair
EN 12166		Cold Worked	3 - Good
		Brazing	4 - Very Good
		Machinability	5 - Excellent

## Physical Properties

Annealing Range (Min)	800 °F
Annealing Range (Max)	1100 °F
Density	0.306 lb/in <sup>3</sup>
Electrical Resistivity (Annealed)	39.9 $\Omega$ ·cir-mil/ft @ 68 °F
Electrical Conductivity (Annealed)	26% IACS @ 68 °F
Thermal Conductivity	67 Btu/ft <sup>2</sup> /ft·hr/°F @ 68 °F
Coefficient of Thermal Expansion	11.3 per °F (68-572 °F)
Modulus of Elasticity (Tension)	15 ksi
Modulus of Rigidity (Tension)	5 ksi
Melting Point (Solidus)	1,620 °F
Melting Point (Liquidus)	1,880 °F

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## Round Wire - Pretempered

TEMPER NAME	TEMPER CODE	TENSILE STRENGTH (ksi)		YIELD STRENGTH, 0.5% EUL (ksi) Min	MILL LIMITS (inch)	ELONGATION (%) 1" GL
		Min	Max			
Annealed	O60	46.0		16.0	.01 - .2362	20.0
1/4 Hard	H01	52.0	65.0	25.0	.01 - .2362	7.00
1/4 Hard + SR	HR01	52.0	65.0	25.0	.01 - .2362	7.00
1/2 Hard	H02	57.0	80.0	25.0	.01 - .2362	4.00

## Round Rod - Pretempered

TEMPER NAME	TEMPER CODE	TENSILE STRENGTH (ksi)		YIELD STRENGTH, 0.5% EUL (ksi) Min	MILL LIMITS (inch)	ELONGATION (%) 1" GL
		Min	Max			
Annealed	O60	46.0		16.0	.0625 - .250	20.0
1/4 Hard	H01	52.0	65.0	25.0	.0625 - .250	10.0
1/4 Hard + SR	HR01	52.0	65.0	25.0	.0625 - .250	10.0
1/2 Hard	H02	57.0	80.0	25.0	.0625 - .250	7.00