



# Oil Filled PM Bushings

## Material Specifications

Material	Use	Composition Percent							Properties <sup>3</sup>		Properties <sup>3</sup>						COMPARABLE SPECIFICATIONS								
		Copper	Tin	Lead	Zinc	Iron	Nickel	Carbon	Density <sup>4</sup>	Porosity Percent <sup>5</sup>	Elongation		Apparent Hardness		Ultimate Tensile Strength		Compressive Yield Strength	MPiF	SAE	Military Mil B5687	ASTM				
											As Sintered	As Sintered	Heat Treated	As Sintered	Heat Treated	As Sintered	MPiF	SAE	Military Mil B5687	Number	Grade	Type	Class		
Bronze	Bearings	87.5-90.5	9.5-10.5			1.0 Max		1.75 <sup>1</sup>	6.4-6.8	18	1.0				14,000		11,000	CT-1000-K26	841	Type 1 Comp A	B438	1	II		
Bronze	Bearings	87.5-90.5	9.5-10.5			1.0 Max		1.75 <sup>1</sup>	5.8-6.2	25	1.0				8,000		7,000	CT-0010-N	840		B438	1	I		
Bronze	Mech. Components and Bearings	87.5-90.5	9.5-10.5			1.0 Max		1.75 <sup>1</sup>	6.8-7.2	7	2.0-3.0				18,000		17,500	CT-10/30-K37	842					II	
Bronze-Iron	Bearings	66.0-69.0	6.0-8.0			Remainder		1.75 Max	6.4-6.8	18	1.0														
Bronze-Iron	Bearings	54.0-56.0	4.5-5.5			Remainder		1.75 Max	7	7															
Iron-Bronze	Bearings	36.0-39.0	3.5-4.5			Remainder		1.75 Max	6.0-6.4	18 Min															B612
Iron Copper	Bearings	18.0-22.0				Remainder			5.8-6.2	18					22,000		22,000	FC-2000-K32	863	Type II Comp B	B439	4			
Iron Copper	Bearings	7.0-11.0				Remainder			5.8-6.2	18					30,000		26,000	FC-1000-K20	862	Type II Comp B	B439	3			
Brass	Mech. Components	77.0-80.0	0.1 Max	1.0-2.0	Remainder	0.25 Max	0.1 Max		7.2-7.6	7	9.0-10.0	RH55			24,000		12,000	CZP-0218-T	890	MIL-B 12128C	B282			I	
Iron	Bearings					96.25 Min		0.25 Max <sup>2</sup>	5.7-6.1	18	2.0				16,000		12,000	F-0000-K15	850	Type II Comp A1	B439	1			
Copper Steel	Mech. Components and Bearings	1.0-2.5				94.5 Min		0.6-1.0 <sup>2</sup>	5.8-6.2	18	0.0-0.5	RB20	RC28		30,000	40,000		FC-O208-N	864-A		B426	1	I		
Copper Steel	Mech. Components and Bearings	1.0-2.5				94.5 Min		0.6-1.0 <sup>2</sup>	6.0-6.4	18	0.0-0.5	RB50	RC36		41,000	49,000		FC-O208-P	864-B		B426	1	II		
Copper Steel	Mech. Components and Bearings	1.0-2.5				94.5 Min		0.6-1.0 <sup>2</sup>	6.4-6.8	18	1.0	RB65	RC40		58,000	89,000		FC-O208-R			B426	1	III		
Copper Steel	Mech. Components and Bearings	1.0-2.5				94.5 Min		0.6-1.0 <sup>2</sup>	6.8 Min	18	1.4	RB80	RC44		76,000	124,000		FC-O208-S			B426	1	IV		
Copper Steel	Mech. Components and Bearings	4.0-6.0				91.0 Min		0.6-1.0 <sup>2</sup>	5.8-6.2		0.0-0.5	RB30	RC28		34,000	45,000		FC-O508-N	865-A		B426	2	I		
Copper Steel	Mech. Components and Bearings	4.0-6.0				91.0 Min		0.6-1.0 <sup>2</sup>	6.0-6.4		0.0-0.5	RB60	RC40		48,000	54,000	50,000	FC-O508-P	865-B		B426	2	II		
Copper Steel	Mech. Components and Bearings	4.0-6.0				91.0 Min		0.6-1.0 <sup>2</sup>	6.4-6.8		1.3	RB75	RC47		68,000	92,000		FC-O508-R			B426	2	III		
Nickel Steel	Mech. Components	2.5-Max				91.6 Min	1.0-3.0	0.6-0.9 <sup>2</sup>	6.4-6.8		2.0	RB62	RC34		48,000	100,000		FN-O208-R			B484	1	I	C	
Nickel Steel	Mech. Components	2-Max				89.6 Min	3.0-5.5	0.6-0.9 <sup>2</sup>	6.8-7.2		3.0	RB79	RC45		65,000	135,000		" FN-O208-S			B484	1	II	C	
Steel	Mech. Components and Bearings					97.40 Min		0.26-0.6 <sup>2</sup>	5.7-6.1	18	1.5				20,000	30,000	18,000	F-0005-N	851		B310		I	B	
Steel	Mech. Components and Bearings					97.00 Min		0.61-1.0 <sup>2</sup>	5.7-6.1	18	0.5	RB35			26,000	40,000	22,000	F-0008-N	852		B310		I	C	
Steel	Mech. Components and Bearings					97.75 Min		0.25 Max <sup>2</sup>	6.1-6.5		3.0				20,000		17,000	F-0000-P	853		B310		II	A	
Steel	Mech. Components and Bearings					97.40 Min		0.26-0.6 <sup>2</sup>	6.1-6.5		5.0				26,000	40,000	22,000	F-0005-P			B310		II	B	
Steel	Mech. Components and Bearings					97.00 Min		0.61-1.0 <sup>2</sup>	6.1-6.5	7	0.5	RB50			34,000	50,000	26,000	F-0008-P	855		B310		II	C	
Steel	Mech. Components and Bearings					97.75 Min		0.25 Max <sup>2</sup>	6.5-6.9		5.0				26,000		20,000	F-0000-R			B310		III	A	
Steel	Mech. Components and Bearings					97.40 Min		0.26-0.6 <sup>2</sup>	6.5-6.9		3.0				34,000	50,000	24,000	F-0005-R			B310		III	B	
Steel	Mech. Components and Bearings					97.00 Min		0.61-1.0 <sup>2</sup>	6.5-6.9		1.0				44,000	64,000	28,000	F-0008-R			B310		III	C	
Steel	Mech. Components					97.75 Min		0.25 Max <sup>2</sup>	6.9-7.3		8.0	RF60			30,000		25,000	F-0000-S			B310		IV	A	
Steel	Mech. Components					97.40 Min		0.26-0.6 <sup>2</sup>	6.9-7.3		4.0				50,000	70,000	35,000	F-0005-S			B310		IV	B	
Steel	Mech. Components					97.00 Min		0.61-1.0 <sup>2</sup>	6.9-7.3		2.0				60,000	80,000	42,000	F-0008-S			B310		IV	C	
Infiltrated Steel	Mech. Components	15.0-25.0				3.0 Max	69.0-84.39		0.61-1.0 <sup>2</sup>	7.2-7.6		0.5	RB80	RC42		85,000	125,000	90,000	FX-2008-T	872		B303			C

(1) Commonly graphite. A maximum of 1.75% of another type solid lubricant may be substituted when authorized by purchaser.

(2) Combined carbon, on basis of iron only, may be a metallographic estimate.

(3) Mechanical properties do not constitute part of specification. They merely indicate to the purchaser values that may be expected from special subsized tensile and compression samples conforming to the chemical and

minimum density requirements.

(4) Density of Bearings is g/cm on fully impregnated basis. Mechanical Components is on dry, unimpregnated basis.

(5) Porosity in terms of intercommunicating void space. Porosity for Mechanical Components is not part of the specification unless requested by the purchaser.

(6) MIL-B-5687-C, Type 1, Composition A does not allow 1% max. iron.

(7) This alloy is manufactured in various density ranges per customer specifications.

[www.daemar.com](http://www.daemar.com)

861 Cranberry Court  
Oakville, ON L6L 6J7  
(905) 847-6500  
Fax: (905) 847-6943  
1-800-387-7115  
sales@daemarinc.com

548 Meloche  
Dorval, QC H9P 2T2  
(514) 636-3113  
Fax: (514) 633-1206  
1-800-361-6826  
mtlsales@daemarinc.com

4472-97<sup>TH</sup> Street  
Edmonton, AB T6E 5R9  
(780) 435-8899  
Fax: (780) 435-9090  
1-800-214-9590  
edmsales@daemarinc.com

#25-1610 Derwent Way  
Delta, BC V3M 6W1  
(604) 523-6023  
Fax: (604) 523-6123  
1-800-663-0032  
bcsales@daemarinc.com

1730 Cumberland Point Dr., #2  
Marietta, GA 30067-9205  
(770) 953-4710  
Fax: (770) 953-4711  
1-877-432-3627  
gasales@daemarinc.com