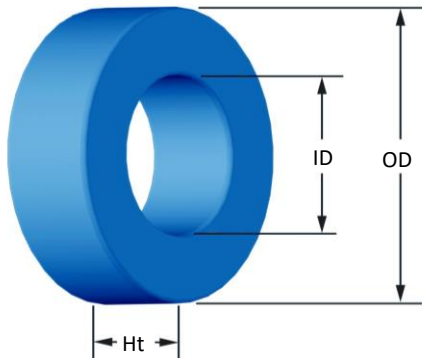




Part Number:

MS-068090-2

Revision 2021-Dec-01 - Generated 2021-Dec-01



(If coated, Max./Min. includes coating)

OD	(nom. - bare core) (max.)	17.27 mm 18.03 mm	0.680 in 0.710 in
ID	(nom. - bare core) (min.)	9.65 mm 9.02 mm	0.380 in 0.355 in
HT	(nom. - bare core) (max.)	6.35 mm 7.11 mm	0.250 in 0.280 in
Mass	(approximate)	5.7 grams	
Magnetic Dimensions	A_e - Eff. Mag. Cross Section	0.232 cm ²	
	L_e - Eff. Mag. Path Length	4.14 cm	
	V_e - Eff. Core Volume	0.961 cm ³	
	WA - Min. Eff. Window Area	0.639 cm ²	
	sa - Surface Area	11.7 cm ²	
Inductance	mlt - mean length per turn	2.77 cm	
	μ_i (reference)	90	
	A_L value (nominal)	64 nH/N ²	
	Test Winding	N=70, #28 AWG	
	Frequency	10 kHz	
Core Loss	Voltage on Agilent 4284A	0.072 V	
	AL tolerance	±8%	
	$\text{Core Loss (mW/cm}^3\text{)} = \frac{a}{B_{pk}^3} + \frac{b}{B_{pk}^{2.3}} + \frac{c}{B_{pk}^{1.65}} + d \cdot B_{pk}^2 \cdot f^2$		
	where B_{pk} expressed in gauss, f expressed in hertz, and: $a=7.890E+09$, $b=7.111E+08$, $c=8.980E+06$, $d=2.846E-14$		
	B_{pk}	1000 G	
DC Saturation	frequency	50 kHz	
	Core Loss (nominal)	323 mW/cm ³	
	Core Loss (maximum)	372 mW/cm ³	
	$\% \mu_i = \frac{1}{a + b \cdot H^c} + d$		
	where H expressed in oersteds, and: $a=1.000E-02$, $b=3.994E-06$, $c=1.883$, $d=0.000$		
Coating/Pkg	H_{dc}	50 Oe	
	Percent Initial Perm(nom.)	61.3%	
	Percent Initial Perm(min.)	52.9%	
	Coating Type:	Blue Epoxy	
	Voltage Breakdown (min.)	1000 Vrms	
Winding Table	Limit	0.1 mA, 5 s	
	Package Quantity	2,340 Pcs/Box	
	Wire Size	AWG	14
		mm	1.600
		mm	1.250

		14	16	18	20	22	24	26	28	30	32	34
	Turns	12	15	20	26	32	41	52	65	82	102	128
	Rdc(Ω)	2.8 m	5.5 m	11.6 m	24.0 m	47.0 m	95.7 m	193.1 m	383.8 m	770.0 m	1.5	3.0
	Turns	12	19	30	46	71	110	170	264	408	632	978
	Rdc(Ω)	2.8 m	6.9 m	17.4 m	42.5 m	104.2 m	256.8 m	631.1 m	1.6	3.8	9.4	23.2

