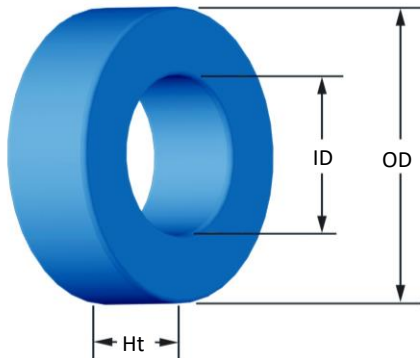




Part Number:

MS-068147-2

Revision 2022-Apr-28



(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	
	W_A - Min. Eff. Window Area	0.639 cm ²	
	S_A - Surface Area	11.7 cm ²	
Inductance	μ_i (reference)	147	
	A_L value (nominal)	105 nH/N ²	
	Test Winding	N=70, #28 AWG	
	Frequency	10 kHz	
	Voltage on Agilent 4284A	0.072 V	
Core Loss	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: $a=1.394E+10$, $b=1.034E+09$, $c=1.244E+07$, $d=4.007E-14$		
	B_{pk}	1000 G	
	frequency	50 kHz	
DC Saturation	Core Loss (nominal)	276 mW/cm ³	
	Core Loss (maximum)	318 mW/cm ³	
	$\% \mu_i = \frac{1}{a + b \cdot H^c} + d$		
	where H expressed in oersteds, and: $a=1.000E-02$, $b=4.732E-05$, $c=1.539$, $d=0.000$		
	H_{DC}	40 Oe	
Coating/Pkg	Percent Initial Perm(nom.)	42.0%	
	Percent Initial Perm(min.)	35.3%	
	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

Winding Table	Single Layer	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
	Full Winding	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

