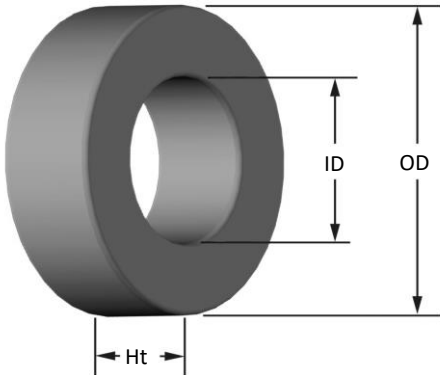




Part Number:

T7-1

Revision 20200518 - Generated 2020-May-18



OD	(nom. - bare core)	1.78 mm	0.070 in		
	(max. - after coating)	1.91 mm	0.075 in		
ID	(nom. - bare core)	0.89 mm	0.035 in		
	(min. - after coating)	0.76 mm	0.030 in		
Ht	(nom. - bare core)	0.76 mm	0.030 in		
	(max. - after coating)	0.89 mm	0.035 in		
Mass	(approximate)	0.01 grams			
Magnetic Dimensions	A _e - Eff. Mag. Cross Section	0.00350 cm ²			
	L _e - Eff. Mag. Path Length	0.420 cm			
	V _e - Eff. Core Volume	0.00150			
	W _A - Min. Eff. Window Area	0.00456 cm ²			
	s _a - Surface Area	0.135 cm ²			
	mlt - mean length per turn	0.330 cm			
Inductance	μ _i (reference)	20			
	A _L value (nominal)	3.5 nH/N ²			
	Test Winding	N=10, #36 AWG			
	Frequency	1 MHz			
	Voltage on Agilent 4284A	0.016 V			
	A _L tolerance	±10%			
Core Loss	$\text{Core Loss(mW/cm}^3\text{)} = \frac{f}{\frac{a}{B_{pk}^3} + \frac{b}{B_{pk}^{2.3}} + \frac{c}{B_{pk}^{1.65}}} + d \cdot B_{pk}^2 \cdot f^2$				
	where <i>B_{pk}</i> expressed in gauss, <i>f</i> expressed in hertz, and: <i>a</i> =1.90E+09, <i>b</i> =2.00E+08, <i>c</i> =9.00E+05, <i>d</i> =4.30E-15				
	B _{pk}	140 G			
	frequency	100 kHz			
	Core Loss (nominal)	31 mW/cm ³			
	Core Loss (maximum)	36 mW/cm ³			
DC Saturation	$\% \mu_i = \frac{1}{a + b \cdot H^c} + d$				
	where H expressed in oersteds, and: <i>a</i> =1.00E-02, <i>b</i> =1.14E-06, <i>c</i> =1.43, <i>d</i> =0.00				
	H _{DC}	200 Oe			
	Percent Initial Perm.(nom.)	82.2%			
	Percent Initial Perm.(min.)	78.0%			
Coating/Pkg	Coating Type:	Parylene C			
	Voltage Breakdown (min.)	500 Vrms, 60Hz			
	Limit	3 mA, 5 s			
	Package Quantity	250,000 Pcs/Box			
Winding Table	Wire Size	AWG	36	38	40
		mm	0.125	0.100	0.080
	Single Layer	Turns	11	14	18
		Rdc(Ω)	49.5 m	100.1 m	204.7 m
	Full Winding	Turns	11	17	26
		Rdc(Q)	49.5 m	121.6 m	295.7 m

