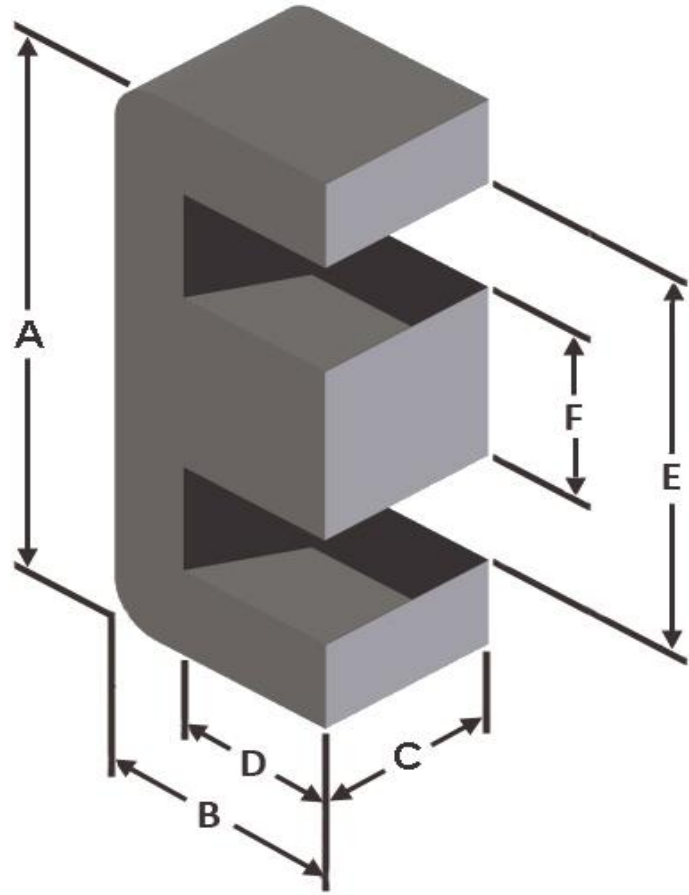




Part Number: **E145-52**

Revision 20190524 - Generated 2019-May-30



A	36.96 ± 0.38 mm	1.455 ± 0.015 in											
B	17.40 ± 0.20 mm	0.685 ± 0.008 in											
C	10.80 ± 0.18 mm	0.425 ± 0.007 in											
D	12.07 mm (nom.)	0.475 in (nom.)											
E	26.29 mm (nom.)	1.035 in (nom.)											
F	10.80 ± 0.18 mm	0.425 ± 0.007 in											
Mass	(approximate)	35 grams/half											
Magnetic Dimensions	A _e - Eff. Mag. Cross Section	1.17 cm ²											
	L _e - Eff. Mag. Path Length	8.50 cm											
	V _e - Eff. Core Volume	9.89 cm ³											
	WA - Min. Eff. Window Area	1.85 cm ²											
	sa - Surface Area	49.0 cm ²											
Inductance	mlt - mean length per turn	7.42 cm											
	μ _i (reference)	75											
	A _L value (nominal)	146 nH/N ²											
	Test Winding	N=100, #20 AWG											
	Frequency	10 kHz											
Core Loss	Voltage on Agilent 4284A	0.52 V											
	A _L tolerance	±10%											
	$\text{Core Loss (mW/cm}^3\text{)} = \frac{f}{\frac{a}{B_{pk}^3} + \frac{b}{B_{pk}^{2.3}} + \frac{c}{B_{pk}^{1.65}}} + d \cdot B_{pk}^2 \cdot f^2$												
	where B _{pk} expressed in gauss, f expressed in hertz, and: a=1.00E+09, b=1.10E+08, c=2.10E+06, d=6.90E-14												
	B _{pk}	140 G											
DC Saturation	frequency	100 kHz											
	Core Loss (nominal)	58 mW/cm ³											
	Core Loss (maximum)	67 mW/cm ³											
	$\% \mu_i = \frac{1}{a + b \cdot H^c} + d$												
	where H expressed in oersteds, and: a=1.00E-02, b=4.66E-06, c=1.84, d=0.00												
Coating/Pkg	H _{DC}	50 Oe											
	Percent Initial Perm(nom.)	61.6%											
	Percent Initial Perm(min.)	53.4%											
	Coating Type:	None, Green/Blue Stripes											
	Voltage Breakdown (min.)	N/A											
Winding Table	Limit	N/A											
	Package Quantity	360 Halves/Box											
	Wire Size	AWG	10	12	14	16	18	20	22	24	26	28	30
		mm	2.500	2.000	1.600	1.250	1.000	0.800	0.630	0.500	0.400	0.315	0.250
	Full Winding	Turns	15	24	37	57	88	137	212	328	508	786	1,216
	Rdc(Ω)	3.6 m	9.3 m	22.7 m	55.6 m	136.5 m	338.1 m	832.0 m	2.0	5.0	12.4	30.5	

