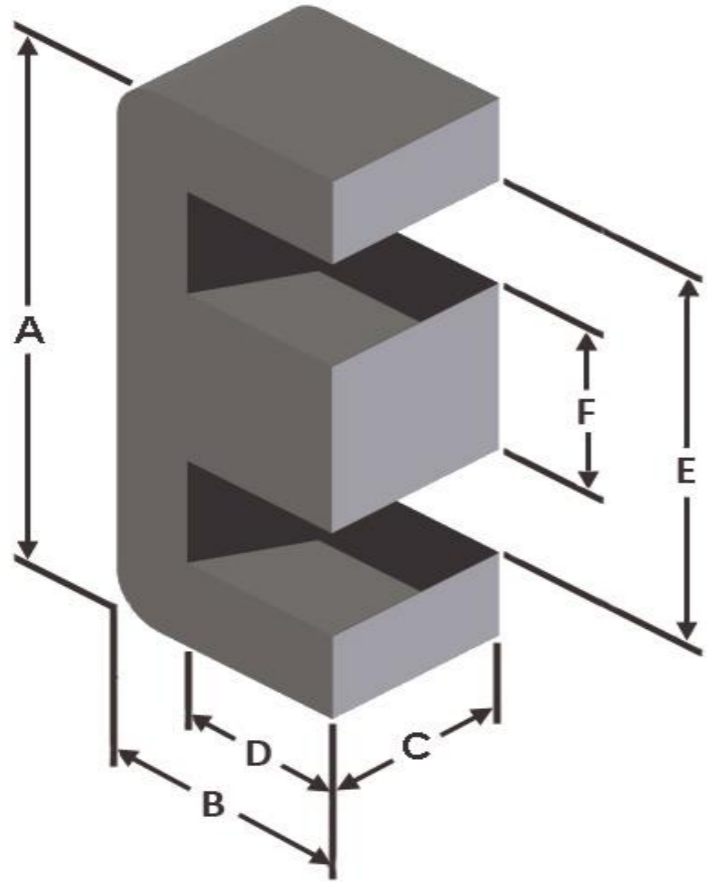




Part Number: EMS-1144635-090

Revision 20160816 - Generated 2016-Aug-16



A	114 ± 1.70 mm	4.488 ± 0.067 in
B	46.2 ± 0.69 mm	1.819 ± 0.027 in
C	34.9 ± 0.58 mm	1.374 ± 0.023 in
D	28.6 mm (min.)	1.126 in (min.)
E	79.3 mm (min.)	3.122 in (min.)
F	34.9 ± 0.69 mm	1.374 ± 0.027 in
Mass	(approximate)	830 grams/half
Magnetic Dimensions	A _e - Eff. Mag. Cross Section	12.2 cm ²
	L _e - Eff. Mag. Path Length	22.9 cm
	V _e - Eff. Core Volume	280 cm ³
	WA - Min. Eff. Window Area	12.5 cm ²
	sa - Surface Area	415 cm ²
	mlt - mean length per turn	22.8 cm
Inductance	μ _i (reference)	90
	A _L value (nominal)	669 nH/N ²
	Test Winding	N=100, #14 AWG
	Frequency	10 kHz
	Voltage on Agilent 4284A	5.4 V
A _L tolerance	±8%	
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 B _{pk} expressed in gauss, f expressed in hertz, and: a=1.46E+09, b=8.28E+08, c=4.62E+06, d=1.09E-14	
	B _{pk}	1000 G
	frequency	50 kHz
	Core Loss (nominal)	345 mW/cm ³
Core Loss (maximum)	396 mW/cm ³	
DC Saturation	$\% \mu_i = \frac{1}{a + b \cdot H^c} + d$	
	where H expressed in oersteds, and: a=0.01, b=1.26E-05, c=1.70, d=0.00	
	H _{DC}	50 Oe
	Percent Initial Perm(nom.)	50.6%
Percent Initial Perm(min.)	42.9%	
Coating/Pkg	Coating Type:	None
	Voltage Breakdown (min.)	N/A
	Limit	N/A
	Package Quantity	16 Halves/Box

Winding Table	Wire Size	AWG	8	10	12	14	16	18	20	22	24	26	28
		mm	3.150	2.500	2.000	1.600	1.250	1.000	0.800	0.630	0.500	0.400	0.315
	Full Winding	Turns	67	104	161	250	387	599	927	1,434	2,220	3,436	5,317
	Rdc(Ω)		31.5 m	77.7 m	191.2 m	472.3 m	1.2	2.9	7.0	17.3	42.7	105.0	258.5

