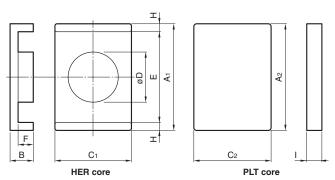
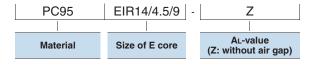


# Mn-Zn EIR Cores

## **SHAPES AND DIMENSIONS**





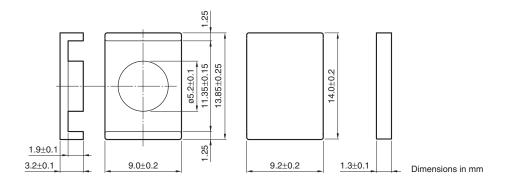


Part No.(ELH+ELH)	Dimensions (mm)										
	<b>A</b> 1	В	C <sub>1</sub>	øD	E	F	Н	<b>A</b> 2	C <sub>2</sub>	1	
PC95EIR14/4.5/9-Z	13.85±0.25	3.20±0.10	9.00±0.20	5.20±0.10	11.35±0.15	1.90±0.10	1.25	14.00±0.20	9.20±0.20	1.30±0.10	
PC90EIR14/4.5/9-Z	13.05±0.25	3.20±0.10	9.00±0.20	5.20±0.10	11.35±0.15	1.90±0.10	1.25	14.00±0.20	9.20±0.20	1.50±0.10	
PC95EIR18/5/12-Z	18.15±0.30	3.50±0.10	12.00±0.20	6.00±0.10	15.75±0.25	2.00±0.10	1.20	18.20±0.25	12.20±0.20	1.50±0.10	
PC90EIR18/5/12-Z	16.15±0.30										
PC95EIR22/5.5/15-Z	22.10±0.35	3.75±0.10	15.25±0.25	6.80±0.10	19.70±0.30	2.00±0.10	1.20	22.20±0.30	15.50±0.20	1.75±0.10	
PC90EIR22/5.5/15-Z	ZZ.10±0.33									1.75±0.10	

	Effective para	ameter						Electrical charac	teristics	
	Core factor	Effective cross-sectional area	Effective magnetic path length	Effective core volume	Amin.	Acw	Weigh	AL-value		
Part No.(HPQ+PQD)	C <sub>1</sub> (mm <sup>-1</sup> )	Ae(mm²)	ℓe(mm)	Ve(mm <sup>3</sup> )	(mm²)	(mm²)	(g)	(nH/N <sup>2</sup> ) 1kHz 0.5mA 100Ts	Lawren -	
								Without air gap	With air gap	
PC95EIR14/4.5/9-Z	0.679	15.4	22.7	349	21.2	5.84	2.0	2800±25%	63±3% - 100±5% 160±7%	
PC90EIR14/4.5/9-Z	0.679	15.4	22.1	349	21.2	5.04	2.0	2050±25%		
PC95EIR18/5/12-Z	0.601	19.7	32.8	645	28.3	9.75	3.8	3690±25%	80±3%	
PC90EIR18/5/12-Z	0.601	19.7	32.0	045	20.3	9.75	3.0	2500±25%	125±5% 200±7%	
PC95EIR22/5.5/15-Z	0.505	23.2	46.1	1070	36.3	12.9	6.5	4150±25%	80±3%	
PC90EIR22/5.5/15-Z	0.505	23.2	40.1	1070	30.3	12.3	0.0	3000±25%	125±5% 200±7%	

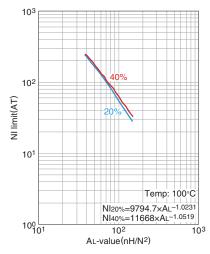
# Mn-Zn Planar series Part No.: PC90EIR14/4.5/9-Z

### **SHAPES AND DIMENSIONS**



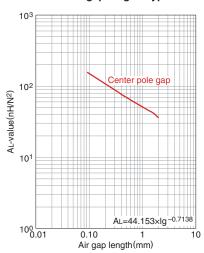
Effective pa	arameter	Electrical characteristics					
Core factor	Effective magnetic path length	Effective cross-sectional area	Effective core volume	Cross-sectional winding area of core	Weigh	AL-value *	Core loss
C <sub>1</sub>	ℓe	Ae	Ve	Acw			
(mm <sup>-1</sup> )	(mm)	(mm <sup>2</sup> )	(mm <sup>3</sup> )	(mm <sup>2</sup> )	(g/set)	(nH/N <sup>2</sup> )	(W)max.
						1kHz 0.5mA	100kHz 200mT
							100°C
0.679	15.4	22.7	349	5.84	2.0	2050±25%	0.3

### NI limit vs. AL-value (Typ.)



The 20% and 40% graph shows when a 20% and 40% drop from the initial ALvalue has been made due to the DC superimposition.

### AL-value vs. Air gap length (Typ.)



Measuring conditions
• Coil: ø0.18 2UEW 100Ts

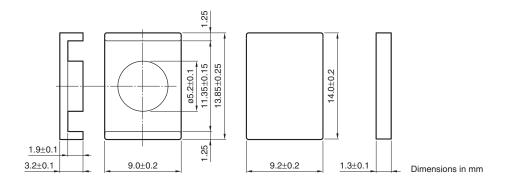
• Frequency : 1kHz

• Current level: 0.5mA

• Ambient temperature: 25°C

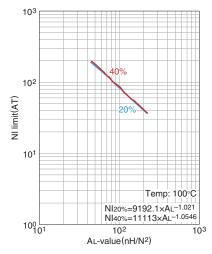
# Mn-Zn Planar series Part No.: PC95EIR14/4.5/9-Z

### **SHAPES AND DIMENSIONS**



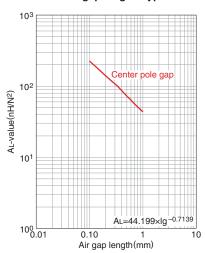
Effective p	arameter	Electrical characteristics							
Core factor	Effective magnetic path length	Effective cross-sectional area	Effective core volume	Cross-sectional winding area of core	Weigh	AL-value *	Core los	s	
C <sub>1</sub>	ℓe	Ae	Ve	Acw					
(mm <sup>-1</sup> )	(mm)	(mm²)	(mm <sup>3</sup> )	(mm²)	(g/set)	(nH/N²) 1kHz 0.5mA	(W)max 100kHz 200mT 25°C		120°C
							25.0	80.0	12010
0.679	15.4	22.7	349	5.84	2.0	2800±25%	0.25	0.2	0.25

### NI limit vs. AL-value (Typ.)



The 20% and 40% graph shows when a 20% and 40% drop from the initial AL-value has been made due to the DC superimposition.

### AL-value vs. Air gap length (Typ.)



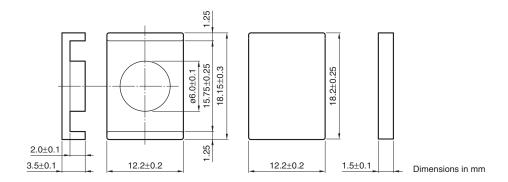
Measuring conditions
• Coil: ø0.18 2UEW 100Ts

• Frequency: 1kHz • Current level: 0.5mA

Ambient temperature : 25°C

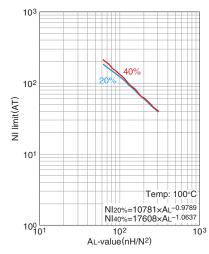
# Mn-Zn Planar series Part No.: PC90EIR18/5/12-Z

### **SHAPES AND DIMENSIONS**



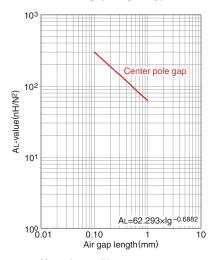
Effective pa	arameter	Electrical characteristics					
Core factor	Effective magnetic path length	Effective cross-sectional area	Effective core volume	Cross-sectional winding area of core	Weigh	AL-value *	Core loss
C <sub>1</sub>	ℓe	Ae	Ve	Acw			
(mm <sup>-1</sup> )	(mm)	(mm <sup>2</sup> )	(mm <sup>3</sup> )	(mm <sup>2</sup> )	(g/set)	(nH/N <sup>2</sup> )	(W)max.
						1kHz 0.5mA	100kHz 200mT
							100°C
0.601	19.7	32.8	645	9.75	3.8	2500±25%	0.45

### NI limit vs. AL-value (Typ.)



The 20% and 40% graph shows when a 20% and 40% drop from the initial AL-value has been made due to the DC superimposition.

### AL-value vs. Air gap length (Typ.)



Measuring conditions
• Coil: Ø0.18 2UEW 100Ts
• Frequency: 1kHz

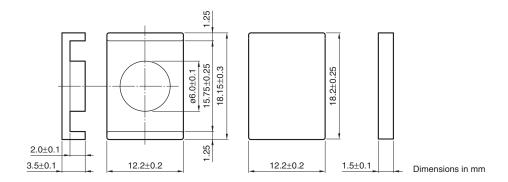
Frequency : 1kHz
 Current level : 0.5mA

• Ambient temperature : 25°C

Please be sure to request delivery specifications that provide further details on the features and specifications of the products for proper and safe use. Please note that the contents may change without any prior notice due to reasons such as upgrading.

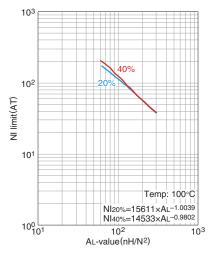
# Mn-Zn Planar series Part No.: PC95EIR18/5/12-Z

### **SHAPES AND DIMENSIONS**



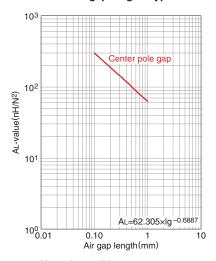
Effective p	arameter	Electrical characteristics							
Core factor	Effective magnetic path length	cross-sectional area	Effective core volume	Cross-sectional winding area of core	Weigh	AL-value *	Core los	s	
C <sub>1</sub>	ℓe	Ae	Ve	Acw					
(mm <sup>-1</sup> )	(mm)	(mm²)	(mm³)	(mm²)	(g/set)	(nH/N <sup>2</sup> ) 1kHz 0.5mA	(W)max 100kHz 200mT		
							25°C	80°C	120°C
0.601	19.7	32.8	645	9.75	3.8	3690±25%	0.4	0.35	0.4

### NI limit vs. AL-value (Typ.)



The 20% and 40% graph shows when a 20% and 40% drop from the initial AL-value has been made due to the DC superimposition.

### AL-value vs. Air gap length (Typ.)



Measuring conditions
• Coil: Ø0.18 2UEW 100Ts
• Frequency: 1kHz
• Current level: 0.5mA

• Ambient temperature : 25°C

Please be sure to request delivery specifications that provide further details on the features and specifications of the products for proper and safe use. Please note that the contents may change without any prior notice due to reasons such as upgrading.