

# Power Inductor

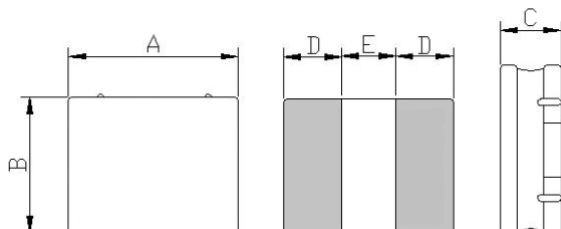
**AHP322512RA-SERIES**

## 1. Features

1. This specification applies Low Profile Power Inductors.
2. 100% Lead(Pb) & Halogen-Free and RoHS compliant.
3. Operating temperature -40~+125°C (Including self - temperature rise)



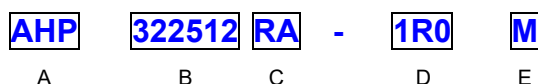
## 2. Dimension



Series	A(mm)	B(mm)	C(mm)	D(mm)	E(mm)
AHP322512RA	3.2 ± 0.2	2.5 ± 0.2	1.2 Max	0.95 ref.	1.30 ref.

Units: mm

## 3. Part Numbering



- A: Series  
 B: Dimension  
 C: Lead Free                      Material  
 D: Inductance                      1R0=1.0uH  
 E: Inductance Tolerance            M=±20%

## 4. Specification

TAI-TECH Part Number	Inductance (uH)	Tolerance (%)	Test Frequency (Hz)	DCR (Ω) typ.	DCR (Ω) Max.	I sat (A)	I rms (A)
AHP322512RA-R47M	0.47	±20	1V/1M	0.030	0.036	8.00	5.00
AHP322512RA-R68M	0.68	±20	1V/1M	0.035	0.042	6.80	4.70
AHP322512RA-1R0M	1.0	±20	1V/1M	0.042	0.051	5.50	4.00
AHP322512RA-1R5M	1.5	±20	1V/1M	0.065	0.078	4.50	3.50
AHP322512RA-2R2M	2.2	±20	1V/1M	0.090	0.108	3.50	2.80
AHP322512RA-3R3M	3.3	±20	1V/1M	0.140	0.168	2.80	2.20
AHP322512RA-4R7M	4.7	±20	1V/1M	0.200	0.240	2.50	1.70
AHP322512RA-6R8M	6.8	±20	1V/1M	0.290	0.350	2.20	1.50
AHP322512RA-100M	10	±20	1V/1M	0.350	0.420	1.50	1.30

Note:

Isat : Based on inductance change ( $\Delta L/L0 : \leq 30\%$ ) @ ambient temp. 25°C

Irms : Based on temperature rise ( $\Delta T : 40^\circ\text{C}.$ ) Max

Measurement board data

Irms

Material : FR4

Board dimensions : 100 X 50 X 1.6t mm

Pattern dimensions: 45 X 30 mm (Double side board)

Pattern thickness : 50  $\mu\text{m}$

