

## CTIHLP1604AF Series

From .10  $\mu$ H to 10  $\mu$ H



### CHARACTERISTICS

**Description:** SMD (shielded) power inductor.

**Applications:** Notebook, Desktop, Server applications, Low profile, high current power supplies, battery powered devices, DC/DC converter for Field Programmable Gate Array (FPGA).

**Operating Temperature:** -55°C to +125°C (The part temperature (ambient + temp. rise) should not exceed 125°C under worst case operating conditions. Circuit design, component placement, PWB trace size and thickness, airflow and other cooling provisions all affect the part temperature. Part temperature should be verified in the end application)

**Inductance Tolerance:**  $\pm 20\%$ ,  $\pm 30\%$

**Testing:** Inductance is tested on an HP4285A at 100KHz, 1.0V

**Packaging:** Tape & Reel.

**Marking:** Parts are marked with inductance code.

**Miscellaneous:** **RoHS Compliant.**

**Additional Information:** Additional electrical & physical information available upon request.

**Samples available. See website for ordering information.**

### SPECIFICATIONS

Part numbers indicate inductance tolerance available.

M =  $\pm 20\%$ , N =  $\pm 30\%$

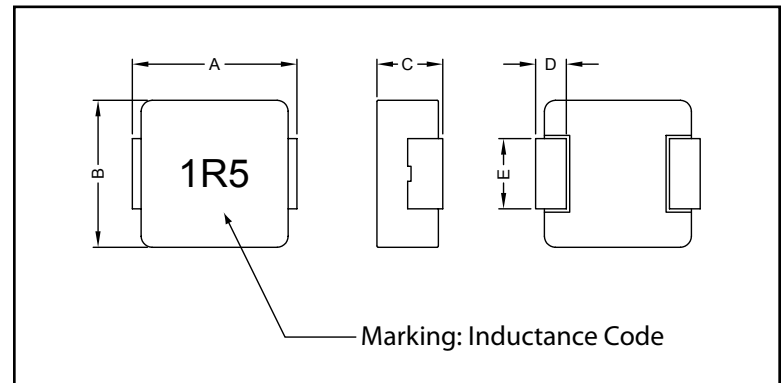
\*I<sub>rms</sub>: Will cause the coil temp. rise approximately  $\Delta T$  of 40°C. (Keep 1 Min)

\*\*I<sub>sat</sub>: Will cause L0 to drop approximately 20%. (Keep quickly)

Part Number	Inductance ( $\mu$ H)	L Test Freq. (KHz)	DCR Typ. (m $\Omega$ )	DCR Max. (m $\Omega$ )	*I <sub>rms</sub> Typ. (A)	**I <sub>sat</sub> Typ. (A)
CTIHLP1604AF-R10N	0.10	100	4.3	5.5	11.5	25
CTIHLP1604AF-R22M	0.22	100	6.6	8.0	8.5	20
CTIHLP1604AF-R47M	0.47	100	18.0	20	6.0	6.5
CTIHLP1604AF-1R0M	1.00	100	41.0	47	4.0	6.0
CTIHLP1604AF-1R5M	1.50	100	55.0	63.3	3.0	4.0
CTIHLP1604AF-2R2M	2.20	100	69.2	80	2.8	3.5
CTIHLP1604AF-3R3M	3.30	100	84.0	97	2.3	3.0
CTIHLP1604AF-4R7M	4.70	100	128	145	2.0	2.5
CTIHLP1604AF-5R6M	5.60	100	180	208	1.7	2.3
CTIHLP1604AF-6R8M	6.80	100	300	360	1.5	1.7
CTIHLP1604AF-8R2M	8.20	100	313	376	1.4	1.6
CTIHLP1604AF-100M	10.0	100	410	463	1.3	1.4

### PHYSICAL DIMENSIONS

Size	A	B	C	D	E
mm	4.45 $\pm$ 0.25	4.06 $\pm$ 0.25	1.0 $\pm$ 0.2	0.76 $\pm$ 0.3	2.0 $\pm$ 0.2
inches	0.17 $\pm$ 0.012	0.16 $\pm$ 0.008	0.04 $\pm$ 0.008	0.03 $\pm$ 0.012	0.08 $\pm$ 0.008



### PAD LAYOUT

