

Power Choke HC 103R 104R 105R Series



Features

- Magnetic shielded surface mount inductor with high current rating
- High inductance/High power inductor.

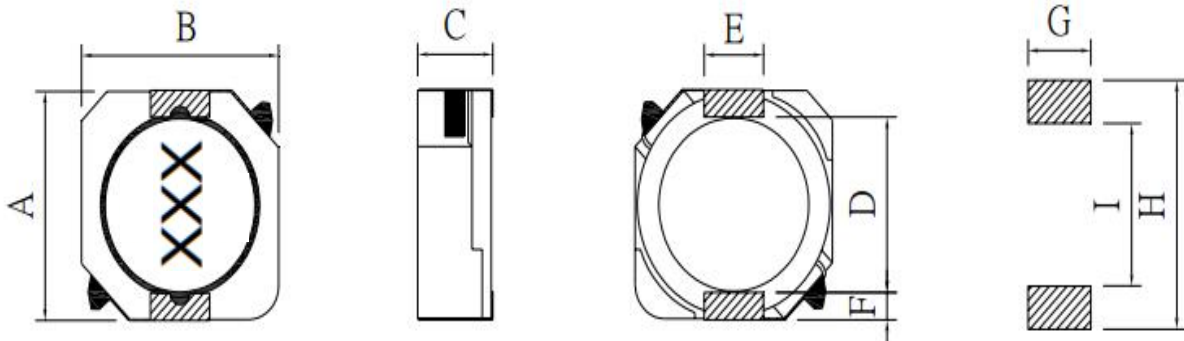
Application

- Ideal use in variety of DC-DC converter inductor applications.

Tolerance

- (K 10%, L 15%, M 20% ,N 30%)

Configurations & Dimensions



Dimensions

Chip Size

Units:mm

TYPE	A	B	C	D±0.3	E±0.1	F±0.15	G	H	I
HC103R	10.1±0.3	10.0±0.3	3.0 max	7.7	3.0	1.2	3.2	10.7	7.3
HC104R	10.1±0.3	10.0±0.3	4.0 max	7.7	3.0	1.2	3.2	10.7	7.3
HC105R	10.1±0.3	10.0±0.3	5.0 max	7.7	3.0	1.2	3.2	10.7	7.3

Design as Customer's Requested Specifications.



Speciflcations HC103R

Part Number	Inductance (uH)	Tolerance (%)	Test Frequency (KHz)	DCR (Ω) max	Isat (A) max	Irms (A) max
HC103R-1R0N	1.0	30	0.1V/100	0.0110	5.80	4.80
HC103R-1R5N	1.5	30	0.1V/100	0.0110	5.80	5.00
HC103R-2R2N	2.2	30	0.1V/100	0.0169	5.10	4.50
HC103R-3R3N	3.3	30	0.1V/100	0.0210	4.70	4.00
HC103R-4R7N	4.7	30	0.1V/100	0.0300	4.00	3.50
HC103R-6R8N	6.8	30	0.1V/100	0.0350	3.60	3.00
HC103R-100M	10	20	0.1V/100	0.0581	2.70	2.80
HC103R-120M	12	20	0.1V/100	0.0721	2.25	2.10
HC103R-150M	15	20	0.1V/100	0.0865	2.22	2.05
HC103R-180M	18	20	0.1V/100	0.1161	1.90	1.80
HC103R-220M	22	20	0.1V/100	0.1454	1.78	1.60
HC103R-270M	27	20	0.1V/100	0.1759	1.63	1.50
HC103R-330M	33	20	0.1V/100	0.2134	1.46	1.35
HC103R-390M	39	20	0.1V/100	0.2689	1.32	1.25
HC103R-470M	47	20	0.1V/100	0.2986	1.18	1.20
HC103R-560M	56	20	0.1V/100	0.3358	1.10	1.15
HC103R-680M	68	20	0.1V/100	0.4513	1.04	0.98
HC103R-820M	82	20	0.1V/100	0.5138	0.94	0.80
HC103R-101M	100	20	0.1V/100	0.7000	0.84	0.70
HC103R-121M	120	20	0.1V/100	0.7650	0.76	0.65
HC103R-151M	150	20	0.1V/100	0.8763	0.70	0.51

Note: Isat:Based on inductance change ($\Delta L/L_0 \leq 35\%$)@ambient temp. 25°C



Speciflcations HC104R

Part Number	Inductance (uH)	Tolerance (%)	Test Frequency (KHz)	DCR (Ω) max	Isat (A) max	Irms (A) max
HC104R-1R3N	1.3	30	0.1V/100	0.081	10.00	6.50
HC104R-2R5N	2.5	30	0.1V/100	0.010	7.50	6.10
HC104R-3R3N	3.3	30	0.1V/100	0.011	7.00	5.80
HC104R-3R8N	3.8	30	0.1V/100	0.013	6.00	5.50
HC104R-5R2N	5.2	30	0.1V/100	0.022	5.50	5.40
HC104R-7R0N	7.0	30	0.1V/100	0.027	4.80	4.50
HC104R-100M	10	20	0.1V/100	0.035	4.40	3.80
HC104R-150M	15	20	0.1V/100	0.050	3.60	3.10
HC104R-220M	22	20	0.1V/100	0.073	2.90	2.50
HC104R-330M	33	20	0.1V/100	0.093	2.30	2.20
HC104R-470M	47	20	0.1V/100	0.128	2.10	1.90
HC104R-680M	68	20	0.1V/100	0.213	1.50	1.42
HC104R-101M	100	20	0.1V/100	0.304	1.35	1.25
HC104R-151M	150	20	0.1V/100	0.506	1.15	0.85
HC104R-221M	100	20	0.1V/100	0.756	0.92	0.70
HC104R-331M	150	20	0.1V/100	1.090	0.70	0.52
HC104R-471M	470	20	0.1V/100	1.650	0.50	0.40
HC104R-681M	680	20	0.1V/100	3.100	0.30	0.23
HC104R-102M	1000	20	0.1V/100	5.500	0.20	0.15

Note: Isat:Based on inductance change ($\Delta L/L_0 \leq 35\%$)@ambient temp. 25°C



Speciflcations HC105R

Part Number	Inductance (uH)	Tolerance (%)	Test Frequency (KHz)	DCR (Ω) max	Isat (A) max	Irms (A) max
HC103R-100M	10	20	0.1V/100	0.0258	3.45	4.50
HC103R-120M	12	20	0.1V/100	0.0320	3.40	3.80
HC103R-150M	15	20	0.1V/100	0.0400	2.83	3.70
HC103R-180M	18	20	0.1V/100	0.0460	2.62	3.10
HC103R-220M	22	20	0.1V/100	0.0585	2.44	3.00
HC103R-270M	27	20	0.1V/100	0.0654	2.24	2.60
HC103R-330M	33	20	0.1V/100	0.0814	1.88	2.50
HC103R-390M	39	20	0.1V/100	0.1031	1.70	2.25
HC103R-470M	47	20	0.1V/100	0.1221	1.56	2.20
HC103R-560M	56	20	0.1V/100	0.1448	1.39	1.90
HC103R-680M	68	20	0.1V/100	0.1930	1.36	1.60
HC103R-820M	82	20	0.1V/100	0.2194	1.20	1.50
HC103R-101M	100	20	0.1V/100	0.2470	1.09	1.35
HC103R-121M	120	20	0.1V/100	0.2984	1.00	1.20
HC105R-151M	150	20	0.1V/100	0.3551	0.91	1.15
HC105R-181M	180	20	0.1V/100	0.3943	0.84	1.10
HC105R-221M	220	20	0.1V/100	0.4838	0.75	1.00
HC105R-271M	270	20	0.1V/100	0.6325	0.68	0.80
HC105R-331M	330	20	0.1V/100	0.7800	0.60	0.75
HC105R-391M	390	20	0.1V/100	0.9575	0.57	0.70
HC105R-471M	470	20	0.1V/100	1.2204	0.50	0.54
HC105R-561M	560	20	0.1V/100	1.3524	0.47	0.52
HC105R-681M	680	20	0.1V/100	1.5192	0.43	0.51
HC105R-821M	820	20	0.1V/100	1.6944	0.39	0.48
HC105R-102M	1000	20	0.1V/100	1.9464	0.35	0.42

Note: Isat:Based on inductance change ($\Delta L/L_0 \leq 35\%$)@ambient temp. 25°C