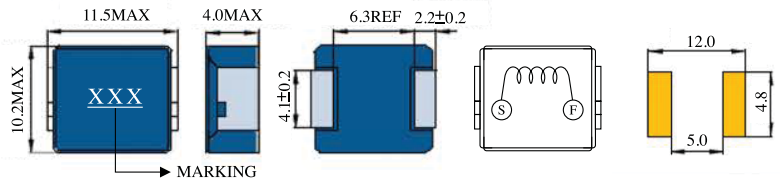
OWIHP1040 TYPE

FEATURES

1. 100% lead (Pb)-free.
2. lowest DCR/uH, in this package size.
3. Frequency range up to 5.0MHZ.
4. Handles high transient current spikes without saturation.
5. Ultra low buzz noise, due to composite construction.

APPLICATIONS

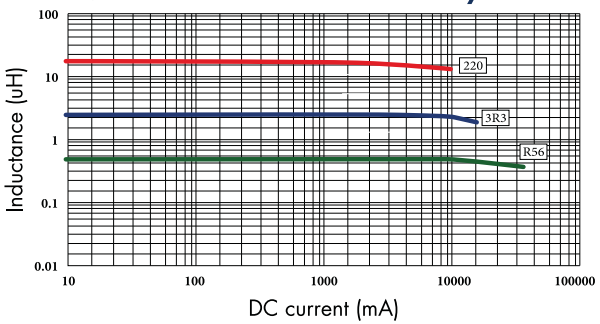
1. Notebook/Desktop/Server applications.
2. Low profile, high current power supplies.
3. Battery powered devices.
4. DC/DC converter for Field Programmable Gate Array (FPGA)



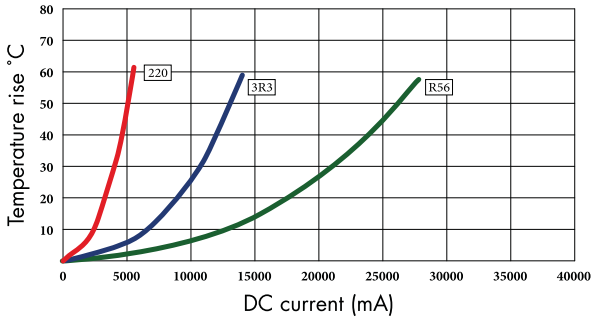
ELECTRICAL CHARACTERISTICS FOR OWIHP1040 SERIES

Part Number	Lo Inductance uH±20% @200KHZ, 0.25V, 0A	DCR mΩ MAX 25°C	Heat Rating Current DCAMPS[3] Typical	Saturation Current DCAMPS[4] Typical
OWIHP1040-R56M	0.56	2.5	22	40
OWIHP1040-R68M	0.68	3.0	21	33
OWIHP1040-R82M	0.82	3.5	20	30
OWIHP1040-1R0M	1.00	4.0	18	28
OWIHP1040-1R5M	1.50	6.5	16	20
OWIHP1040-2R2M	2.20	8.5	13	19
OWIHP1040-2R5M	2.50	9.5	12	16
OWIHP1040-3R3M	3.30	11.5	11	16
OWIHP1040-4R7M	4.70	16.0	8	14
OWIHP1040-5R6M	5.60	23.5	8	12
OWIHP1040-6R8M	6.80	25.5	7.5	11
OWIHP1040-8R2M	8.20	31.0	7	10
OWIHP1040-100M	10.0	42.0	5	8
OWIHP1040-220M	22.0	92.0	3.5	6

OWIHP1040 Inductance decrease by current



OWIHP1040 Temperature rise by current



1. All test data is referenced to 25°C ambient.
2. Operating Temperature Range -55°C to +125°C.
3. DC current(A) that will cause an approximate ΔT of 40°C.
4. DC current(A) that will cause Lo to drop approximately 20%.
5. 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.