

# **CMLW8060S Series**

## Wire Wound SMD Power Inductor

### ◆ Features

- 1. Magnetic-resin shielded construction reduces buzz noise to ultra-low levels:
- 2. Metallization on ferrite core results in excellent shock resistance and damage-free durability;
- Closed magnetic circuit design reduces leakage flux and Electro Magnetic Interference (EMI);
- 4、30% higher current rating than conventional inductors of equal size;
- 5. Take up less PCB real estate and save more power.

# Pb



## Applications

- 1. LED Lighting;
- 2 Mobile devices with multifunction such as adding color TV and camera;
- 3. Flat-screen TVs, blue-ray disc recorders, set top boxes:
- 4. Notebooks, desktop computers, servers, graphic cards;
- 5. Portable gaming devices, personal navigation systems, personal multimedia devices;
- 6. Automotive systems
- 7. Telecomm base stations

## . --

## **♦ Lead Free Part Numbering**

CMLW 8060 S 100 M S T (1) (2) (3) (4) (5) (6) (7)

(1) Series Type

(2) Dimension: LXH

(3) Material Code

(4) Inductance: 2R2=2.2μH;

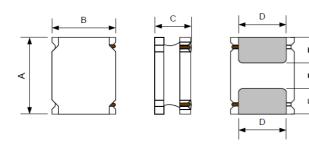
100=10µH; 101=100µH

(5) Inductance Tolerance: M=±20%, N=±30%

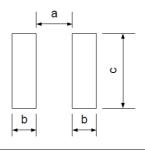
(6) Company Code

(7) Packaging: Tape Carrier Package

## Dimensions



#### Recommended Land Pattern



Unit:mm

Series	A	В	С	D	E	F	а Тур.	b Typ.	с Тур.
CMLW8060S	8.0±0.3	8.0±0.3	6.0 Max.	6.3±0.3	2.00±0.3	4.00±0.3	3.8	2.2	7.5

Page 1 of 3 www.cybermaxtech.com

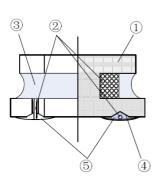


# CMLW8060S Series

# **◆ Electrical Characteristics**

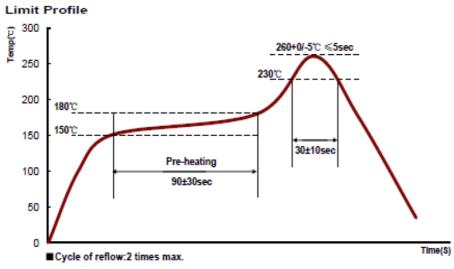
- 1) Operating temperature range (Including self-heating):  $-40^{\circ}$ C ~ +125 $^{\circ}$ C
- 2) Storage temperature range (packaging conditions): -10 °C ~+40 °C and RH 70% (Max.)

## Construction and material

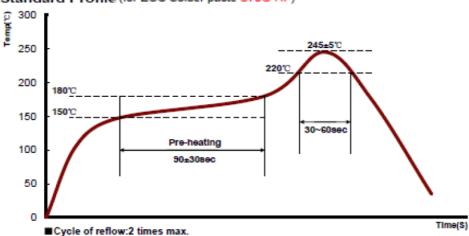


Code	Part Name	Material Name		
1)	Ferrite Core	Ni-Zn Ferrite		
2	Wire	Polyurethane system enameled copper wire		
3	Magnteic Glue	Epoxy resin and magnetic powder		
4		Ag		
	Plating Electrodes	Ni		
		Sn		
(5)	Outer Electrodes	Top surface solder coating Sn 、Ag、Cu		

## **♦ REFLOW-PROFILE**







Page 2 of 3 www.cybermaxtech.com



# CMLW8060S Series

# **♦** Specification

Part Number	Inductance @100KHz,1V (µH)	DC Resistance ±30% (Ω) DCR	Test Freq. (kHz/v)	Saturation Current(A) Isat
CMLW8060S Series				
CMLW8060S2R2NST	2.2	0.022	100/0.25	8.00
CMLW8060S3R3NST	3.3	0.025	100/0.25	7.50
CMLW8060S4R7MST	4.7	0.032	100/0.25	7.00
CMLW8060S6R0MST	6	0.034	100/0.25	6.00
CMLW8060S6R8MST	6.8	0.037	100/0.25	5.90
CMLW8060S100MST	10	0.042	100/0.25	5.80
CMLW8060S150MST	15	0.071	100/0.25	4.50
CMLW8060S220MST	22	0.100	100/0.25	4.30
CMLW8060S330MST	33	0.162	100/0.25	3.00
CMLW8060S470MST	47	0.188	100/0.25	2.85
CMLW8060S680MST	68	0.248	100/0.25	2.50
CMLW8060S101MST	100	0.380	100/0.25	2.00
CMLW8060S151MST	150	0.574	100/0.25	1.65
CMLW8060S681MST	680	2.800	100/0.25	0.80
CMLW8060S821MST	820	3.400	100/0.25	0.70
CMLW8060S102MST	1000	3.870	100/0.25	0.60

#### ◆ Note

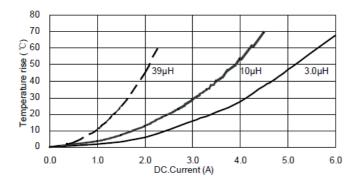
- 1: All test data is referenced to 20°C ambient;
- 2: Rated current: Isat or Irms, whichever is smaller;
- 3: Isat: DC current at which the inductance drops approximate 30% from its value without current;
- 4: Irms: DC current that causes the temperature rise (△T =40°C) from 20°C ambient.

## Standard Packing Quantity: 800 pcs/reel

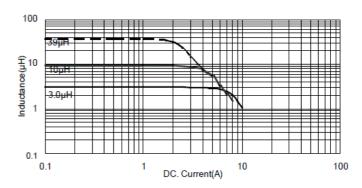
#### **◆ TYPICAL ELECTRICAL CHARACTERISTICS**

#### **CMLW8060S Series**

Temperature vs. DC Current Characteristics



#### Inductance vs. DC Current Characteristics



Page 3 of 3 www.cybermaxtech.com