

# SMD Inductors(Coils) For Power Line(Wound, Magnetic Shielded)

**Conformity to RoHS Directive** 

# SLF Series SLF12575

#### **FEATURES**

- The SLF series are characterized by low profile, low DC resistance, and high current handling capacities.
- Because they are magnetically shielded, these parts can be used in high-density mounting configurations.
- Flat bottom surface ensures secure, reliable mounting.
- Provided in embossed carrier tape packaging for use with automatic mounting machines.

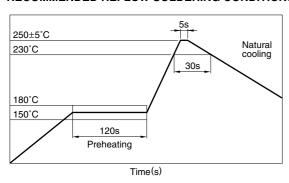
#### **APPLICATIONS**

Portable telephones, personal computers, hard disk drives, and other electronic equipment.

#### **SPECIFICATIONS**

Operating temperature range	−20 to +105°C
Operating temperature range	[Including self-temperature rise]
Storage temperature range	–40 to +105°C[Unit of products]

#### RECOMMENDED REFLOW SOLDERING CONDITIONS



#### PRODUCT IDENTIFICATION

SLF	12575	T-	220	M	3R2	- PF
(1)	(2)	(3)	(4)	(5)	(6)	(7)

- (1) Series name
- (2) Dimensions

12575	12.5×12.5×7.5mm (L×W×T)

#### (3) Packaging style

Т	Taping(reel)	
•	raping(reel)	

#### (4) Inductance value

3R3	3.3μΗ
100	10μΗ

#### (5) Inductance tolerance

M	±20%	
N	±30%	

#### (6) Rated current

1R9	1.9A	
3R2	3.2A	

# (7) Lead-free compatible product

PF	Load troe compatible product
FF	Lead-free compatible product

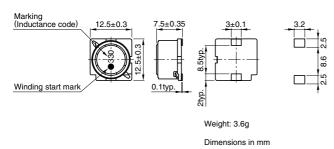
## **PACKAGING STYLE AND QUANTITIES**

Packaging style	Quantity
Taping	500 pieces/reel

<sup>•</sup> Conformity to RoHS Directive: This means that, in conformity with EU Directive 2002/95/EC, lead, cadmium, mercury, hexavalent chromium, and specific bromine-based flame retardants, PBB and PBDE, have not been used, except for exempted applications.



#### SHAPES AND DIMENSIONS/RECOMMENDED PC BOARD PATTERN



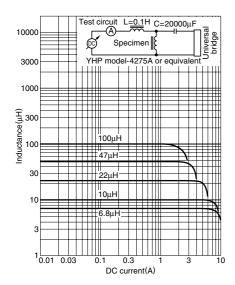


## **ELECTRICAL CHARACTERISTICS**

Industance Industance		Tool fragues and DC registers	DC vasistavas	Rated current (A)* max.		
Inductance Inductance (µH) tolerance	Test frequency L (kHz)	DC resistance $(\Omega)\pm20\%$	Based on inductance change	Based on temperature rise	Part No.	
1.2	±30%	1	0.0069	13	8.2	SLF12575T-1R2N8R2-PF
2.7	±30%	1	0.0094	10	7	SLF12575T-2R7N7R0-PF
3.9	±30%	1	0.0104	9	6.7	SLF12575T-3R9N6R7-PF
5.6	±30%	1	0.0116	7.8	6.3	SLF12575T-5R6N6R3-PF
6.8	±30%	1	0.0131	7.2	5.9	SLF12575T-6R8N5R9-PF
10	±20%	1	0.0156	5.5	5.4	SLF12575T-100M5R4-PF
15	±20%	1	0.0184	4.7	5	SLF12575T-150M4R7-PF
22	±20%	1	0.0263	4	4	SLF12575T-220M4R0-PF
33	±20%	1	0.0395	3.2	3.4	SLF12575T-330M3R2-PF
47	±20%	1	0.0528	2.7	3	SLF12575T-470M2R7-PF
68	±20%	1	0.0778	2	2.4	SLF12575T-680M2R0-PF
100	±20%	1	0.125	1.9	1.9	SLF12575T-101M1R9-PF
150	±20%	1	0.175	1.5	1.6	SLF12575T-151M1R5-PF
220	±20%	1	0.258	1.3	1.3	SLF12575T-221M1R3-PF

<sup>\*</sup> Rated current: Value obtained when current flows and the temperature has risen to 40°C or when DC current flows and the nominal value of inductance has fallen by 10%, whichever is smaller.

# TYPICAL ELECTRICAL CHARACTERISTICS INDUCTANCE CHANGE vs. DC SUPERPOSITION CHARACTERISTICS



<sup>•</sup> Test equipment L: 4194A IMPEDANCE/GAIN-PHASE ANALYZER HP, or equivalent (Measured at 1kHz/0.5V)
Rdc:MATSUSHITA VP-2941A DIGITAL MILLIOHM METER, or equivalent

<sup>•</sup> All specifications are subject to change without notice.