

## SMD Type Power Inductors 晶片型功率電感

### SPT Series

Ultra Super Low Profile Power Inductors



#### Features

- 1.The SPT series has the unique feature of small profile for a power inductor.
- 2.The SPT series is well suited for a wide variety of flat Profile gadgets.
- 3.Suitable for flow and reflow soldering.

#### 特徵

- 1.SPT 系列是具扁薄外觀之獨特性的功率電感。
- 2.SPT 系列非常適合應用于扁薄小巧的機件。
- 3.適合一般焊接及回焊。

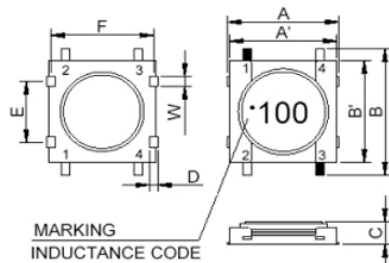
#### Applications

Ideal use in height-conscious applications.

#### 應用

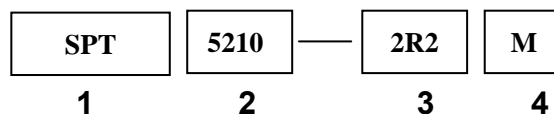
非常适合使用于有高度顾虑的应用。

#### Dimensions



Size	A (mm)	A <sup>1</sup> (mm)	B (mm)	B <sup>1</sup> (mm)	C (mm)	D (mm)	E (mm)	F (mm)	W (mm)
SPT 5210	5.2±0.1	5.0±0.1	6.50 <sup>+0</sup>	5.0±0.1	1.05 <sup>+0</sup>	0.4±0.1	3.0±0.1	4.8±0.1	0.5±0.1
SPT 5212	5.2±0.1	5.0±0.1	6.50 <sup>+0</sup>	5.0±0.1	1.25 <sup>+0</sup>	0.4±0.1	3.0±0.1	4.8±0.1	0.5±0.1
SPT 5215	5.2±0.1	5.0±0.1	6.50 <sup>+0</sup>	5.0±0.1	1.55 <sup>+0</sup>	0.4±0.1	3.0±0.1	4.8±0.1	0.5±0.1
SPT 5225	5.2±0.1	5.0±0.1	6.50 <sup>+0</sup>	5.0±0.1	2.55 <sup>+0</sup>	0.4±0.1	3.0±0.1	4.8±0.1	0.5±0.1

#### Part Numbering



- 1 . Series
- 2 . Dimension : A\*C
- 3 . Inductance : 2R2 =2.2uH
- 4 . Inductance Tolerance : M=±20 %

### SPT 5210 Series

Part Number	Inductance (uH)	Test Frequency (Hz)	DCR ( $\Omega$ )max	I rms1 (A)	I rms 2 (A)	I sat (A)
SPT 5210-2R2M	2.2 $\pm$ 20%	0.1V/100K	0.18	0.51	0.76	1.70
SPT 5210-3R3M	3.3 $\pm$ 20%	0.1V/100K	0.22	0.46	0.69	1.50
SPT 5210-4R7M	4.7 $\pm$ 20%	0.1V/100K	0.28	0.41	0.61	1.32
SPT 5210-6R8M	6.8 $\pm$ 20%	0.1V/100K	0.38	0.35	0.52	1.12
SPT 5210-100M	10 $\pm$ 20%	0.1V/100K	0.61	0.27	0.41	0.90
SPT 5210-150M	15 $\pm$ 20%	0.1V/100K	0.82	0.24	0.35	0.73
SPT 5210-220M	22 $\pm$ 20%	0.1V/100K	1.10	0.20	0.31	0.62
SPT 5210-330M	33 $\pm$ 20%	0.1V/100K	1.88	0.15	0.23	0.52
SPT 5210-470M	47 $\pm$ 20%	0.1V/100K	2.34	0.14	0.21	0.42

### SPT 5212 Series

Part Number	Inductance (uH)	Test Frequency (Hz)	DCR ( $\Omega$ )max	I rms1 (A)	I rms 2 (A)	I sat (A)
SPT 5212-2R2M	2.2 $\pm$ 20%	0.1V/100K	0.18	0.55	0.82	1.97
SPT 5212-3R3M	3.3 $\pm$ 20%	0.1V/100K	0.22	0.50	0.74	1.82
SPT 5212-4R7M	4.7 $\pm$ 20%	0.1V/100K	0.27	0.45	0.67	1.54
SPT 5212-6R8M	6.8 $\pm$ 20%	0.1V/100K	0.37	0.38	0.57	1.30
SPT 5212-100M	10 $\pm$ 20%	0.1V/100K	0.48	0.33	0.50	0.10
SPT 5212-150M	15 $\pm$ 20%	0.1V/100K	0.62	0.29	0.44	0.95
SPT 5212-220M	22 $\pm$ 20%	0.1V/100K	1.00	0.23	0.35	0.77
SPT 5212-330M	33 $\pm$ 20%	0.1V/100K	1.40	0.19	0.29	0.60
SPT 5212-470M	47 $\pm$ 20%	0.1V/100K	2.16	0.15	0.23	0.51

### SPT 5215 Series

Part Number	Inductance (uH)	Test Frequency (Hz)	DCR ( $\Omega$ )max	I rms1 (A)	I rms 2 (A)	I sat (A)
SPT 5215-101M	100 $\pm$ 20%	0.1V/100K	3.2	0.160	0.240	0.50
SPT 5215-151M	150 $\pm$ 20%	0.1V/100K	5.0	0.130	0.190	0.35
SPT 5215-221M	220 $\pm$ 20%	0.1V/100K	6.5	0.115	0.170	0.30
SPT 5215-331M	330 $\pm$ 20%	0.1V/100K	12.0	0.085	0.125	0.22
SPT 5215-471M	470 $\pm$ 20%	0.1V/100K	22.0	0.060	0.090	0.17
SPT 5215-631M	630 $\pm$ 20%	0.1V/100K	27.0	0.055	0.080	0.15
SPT 5215-102M	1000 $\pm$ 20%	0.1V/100K	33.0	0.050	0.075	0.13

### SPT 5225 Series

Part Number	Inductance (uH)	Test Frequency (Hz)	DCR ( $\Omega$ )max	I rms1 (A)	I rms 2 (A)	I sat (A)
SPT 5225-101M	100 $\pm$ 20%	0.1V/100K	1.6	0.240	0.036	0.45
SPT 5225-151M	150 $\pm$ 20%	0.1V/100K	2.5	0.190	0.290	0.35
SPT 5225-221M	220 $\pm$ 20%	0.1V/100K	3.8	0.160	0.230	0.30
SPT 5225-331M	330 $\pm$ 20%	0.1V/100K	5.9	0.130	0.190	0.25
SPT 5225-471M	470 $\pm$ 20%	0.1V/100K	7.5	0.110	0.170	0.22
SPT 5225-681M	680 $\pm$ 20%	0.1V/100K	12.0	0.090	0.130	0.18
SPT 5225-102M	1000 $\pm$ 20%	0.1V/100K	20.0	0.070	0.100	0.14
SPT 5225-152M	1500 $\pm$ 20%	0.1V/100K	25.0	0.060	0.090	0.12
SPT 5225-222M	2200 $\pm$ 20%	0.1V/100K	45.0	0.045	0.650	0.09
SPT 5225-332M	3300 $\pm$ 20%	0.1V/100K	60.0	0.040	0.060	0.08

Note: 1. Inductance measured by LCR Meter HP 4294 / HP4291

2. DCR measured by Milliohm meter CH502AC