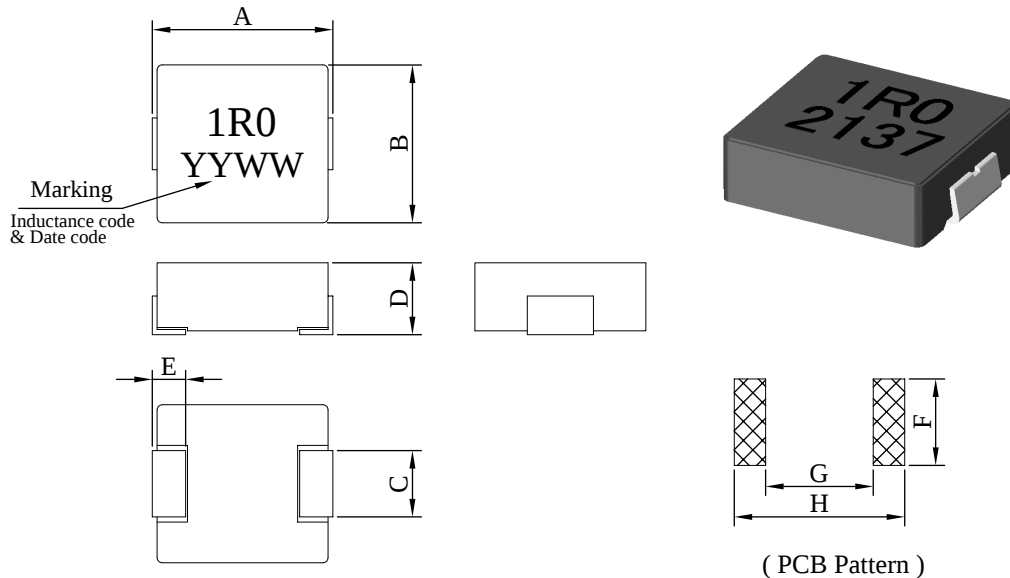


SPECIFICATION FOR APPROVAL

REF. :

PROD. NAME	Shielded Smd Power Inductor	ABC'S DWG NO.		GSSM0618□□□□2□U		
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I . Configuration and dimensions :



Unit : mm

A	B	C	D	E	F	G	H
7.00 ±0.30	6.60 ±0.30	3.00 ±0.3	1.60 ±0.2	1.80 ±0.3	3.50 ref.	2.50 ref.	7.70 ref.

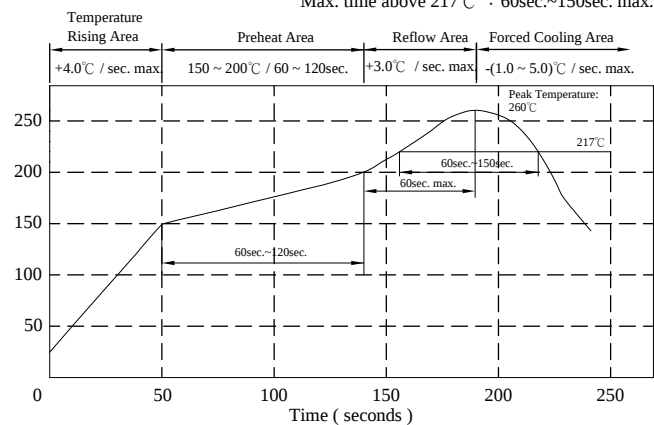
II . Description :

- a . Powder molding construction
- b . Magnetically shielded
- c . Wire : Polyester wire or equivalent
- d . Products comply with RoHS' requirements
- e . Halogen free

Peak temp. : 260℃ max.
Max. peak temp. - 5℃ : 30sec. max.
Max. time above 217℃ : 60sec.~150sec. max.

III . General specification :

- a . Operating temp. : -40℃ ----+125℃
(Temp. rise included)
- b . Resistance to solder heat : 260℃.10 sec.



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SPECIFICATION FOR APPROVAL

REF. :

PROD. NAME	Shielded Smd Power Inductor	ABC'S DWG NO.		GSSM0618□□□□2□U		
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IV . Electrical characteristics :

DWG No.	Inductance (μ H)	Isat (A) typ.	Irms (A) typ.	RDC ($m\Omega$)	
				max.	typ.
GSSM0618R10Y2AU	0.10 $\pm$ 30%	45.00	18.00	2.5	2.1
GSSM0618R15Y2AU	0.15 $\pm$ 30%	34.00	18.00	2.6	2.2
GSSM0618R18Y2AU	0.18 $\pm$ 30%	32.00	17.00	3.0	2.5
GSSM0618R22M2AU	0.22 $\pm$ 20%	26.00	16.00	3.0	2.5
GSSM0618R33M2AU	0.33 $\pm$ 20%	22.00	14.00	5.8	4.8
GSSM0618R47M2AU	0.47 $\pm$ 20%	18.00	12.00	7.4	6.4
GSSM0618R56M2AU	0.56 $\pm$ 20%	17.50	11.00	10.0	8.5
GSSM0618R68M2AU	0.68 $\pm$ 20%	17.00	10.00	11.0	9.5
GSSM0618R82M2AU	0.82 $\pm$ 20%	15.50	8.50	14.0	11.5
GSSM06181R0M2AU	1.00 $\pm$ 20%	14.00	7.00	17.0	14.5
GSSM06181R2M2AU	1.20 $\pm$ 20%	13.50	6.50	24.0	20.0
GSSM06181R5M2AU	1.50 $\pm$ 20%	13.00	6.00	25.2	21.0
GSSM06182R2M2AU	2.20 $\pm$ 20%	11.00	6.00	35.0	31.0
GSSM06183R3M2AU	3.30 $\pm$ 20%	9.00	5.00	46.0	40.0
GSSM06184R7M2AU	4.70 $\pm$ 20%	7.00	4.00	76.0	68.0
GSSM06185R6M2AU	5.60 $\pm$ 20%	6.00	3.50	86.0	78.0
GSSM06186R8M2AU	6.80 $\pm$ 20%	5.50	3.00	104.0	93.0
GSSM06188R2M2AU	8.20 $\pm$ 20%	4.50	2.60	140.0	123.0
GSSM0618100M2AU	10.00 $\pm$ 20%	3.50	2.30	160.0	143.0

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千如電子集團
ABC-ATEC ELECTRONICS GROUP

SPECIFICATION FOR APPROVAL

REF. :

PROD. NAME	Shielded Smd Power Inductor	ABC'S DWG NO.		GSSM0618□□□□2□U		
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IV . Electrical characteristics :

DWG No.	Inductance (μ H)	Isat (A) typ.	Irms (A) typ.	RDC (m Ω)	
				max.	typ.
GSSM0618150M2AU	15.00 $\pm$ 20%	3.00	2.00	280.0	240.0
GSSM0618220M2AU	22.00 $\pm$ 20%	2.50	1.80	360.0	300.0
GSSM0618330M2AU	33.00 $\pm$ 20%	2.10	1.30	650.0	550.0

- 1). Electrical specifications at 25°C
- 2). Measured frequency of inductance is 100 kHz / 1V
- 3). Isat base on $\Delta L/L0A = 30\%$ typ.
- 4). Irms base on Temp. rise 40°C typ.

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SPECIFICATION FOR APPROVAL

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V . Packaging information :

(1) Configuration

※Carrier tape width : D

(2) Dimensions

Unit:mm

Style	A	B	C	D	G
13 - 16	330	100 ±2	13 ^{+0.5} _{-0.2}	16	16.4 ⁺² ₋₀

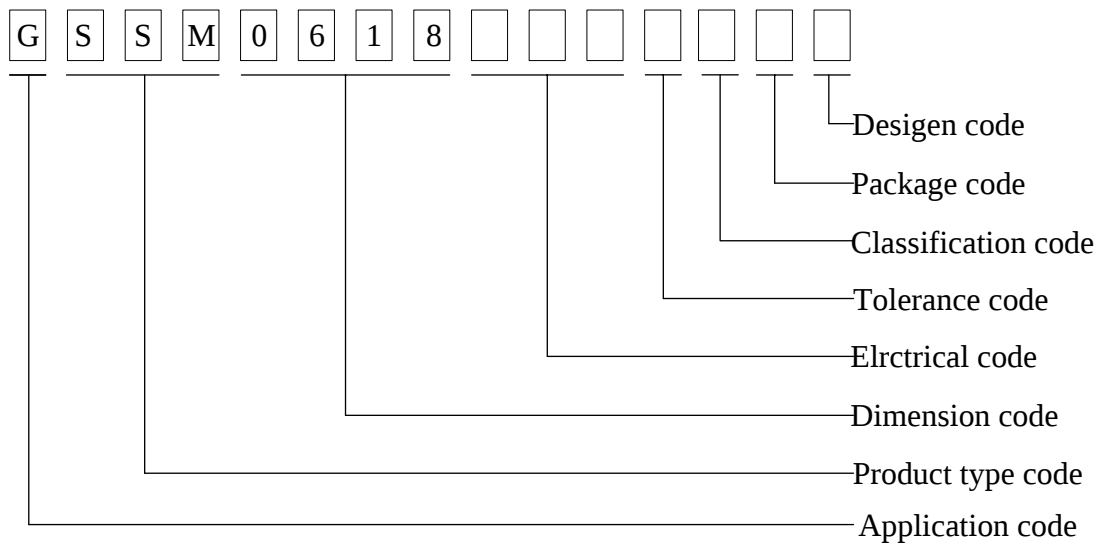
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SPECIFICATION FOR APPROVAL

REF. :

PROD. NAME	Shielded Smd Power Inductor	ABC'S DWG NO.		GSSM0618□□□□2□U		
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VI . Drawing number expression :



Package Information

Code	Inner package	Inner package Q'TY	Remark
A	T / R (Reel package)	2,000 PCS	

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PROD. NAME	Shielded Smd Power Inductor	ABC'S DWG NO.	GSSM0618□□□□2□U		
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VII . Reliability test :					
Item	Reference documents	Test Condition		Test Specification	
1.High Temperature Exposure	MIL-STD-202 Method 108	1.Temperature: 125±2℃ 2.Time:96±2 hours.		1.No mechanical or electrical damage. 2.Inductance shall not change more than ±20%.	
2.Temperature Cycling	JESD22-A 104	1.Temperature: -40℃ ~ +125℃ 2.Number of cycle:100 cycle 3.Dwell time:30 minutes		1.No mechanical or electrical damage. 2.Inductance shall not change more than ±20%.	
3.Biased Humidity Test	MIL-STD-202 Method 103	1.Temperature : 85±2 ℃ 2.Humidity: 85% RH. 3.Time:96±2 Hours		1.No mechanical or electrical damage. 2.Inductance shall not change more than ±20%.	
4.Operational Life	JESD22-A 108	1.Temperature: 125℃ (Temp. rise included) 2.Time:96±2 hours. 3.Rated current :		1.No mechanical or electrical damage. 2.Inductance shall not change more than ±20%.	
5.External Visual	JESD22-B 101 & MIL-STD-883 Method 2009	Inspect product constructions, marking and workmanship.		1.No pollution on the surface of products. 2.Clear marking. 3.No crack.	
6.Physical Dimensions	JESD22-B 100	Verify physical dimensions to the applicable product detail specification.		Per product specification standard	
7.Resistance to solvents	MIL-STD-202 Method 215	Immerse into solvent for 3±0.5 minutes & brush 10 times for 3 cycles.		1.No body change in apperance. 2.No marking blurred. 3.Inductance shall not change more than ±20%.	
8.Vibration Test	MIL-STD-202 Method 204	1.Frequency and Amplitued :10-2000-10 Hz 2.Sweep time : 20 min 3.Acceleration : 5g 4.Direction : X , Y , Z 5.Number of sweep : 6 time/axis		1.No mechanical or electrical damage. 2.Inductance shall not change more than ±20%.	
9.Resistance To Soldering Heat Test	MIL-STD-202 Method 210 & J-STD020D.1	1.Highest temperature : 260±5℃. 2.Time (temp. ≥ 217℃) : 60~150 Second. 3.Reflow times : 3 times.		1.No mechanical or electrical damage. 2.Inductance shall not change more than ±20%.	
10.Saturation Current	JIS C 6436 & User SPEC.	1.Applied rated current for 5 second. 2.Saturation current :		Inductance shall not drop more than 30% typ.	
11.Over load	JIS C 6436 & User SPEC.	1.Applied one and half rated current for a period of 5 minutes. 2.Rated current :		No electrical or mechanical damage	
12.Temperature Rise Current	JIS C 6436 & User SPEC.	1.Applied rated current for 10 minutes. 2.Temperature measure by digital surface thermometer. 3.Irms current :		Surface temperature rise is less than 40℃ typ.	
13.Solderability Test	J-STD-002 & JESD22-B 102	1.Baking in pre-testing : 150±5℃ / 16Hours±30 min. 2.Peak temperature : 240±5℃ 3.Time (temp. ≥ 217℃) : 60~150 second. 4.Reflow times : 1 times.		More than 95% soldering coverage min on terminations.	
14.Electrical Characteriazation	MIL-STD-202 Method 304 & User SPEC.	1.Operating temperature : -40℃~125℃ 2.Room temperature : 25℃.		1.No mechanical or electrical damage. 2.Inductance shall not change more than ±20%.	
15.Drop	CNS-C6354 & GB/T 2423.8	1.Products shall be mounted on SPEC. PCB and dropped down from a height of 1m 2.Drop total time : 6 time (Every side of sample drop 2 time)		1. Adhesion on PCB shall be enough. 2. Product appearance shall not break. 3. No electrical damage.	
16.Terminal Strength Test	IEC 60068-2-21	1.Apply push force to samples mounted on PCB. 2.Force of 1.8 kg for 60±1 seconds.		After test, inductors shall be no mechanical damage.	

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