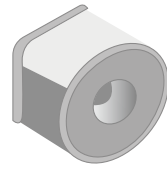
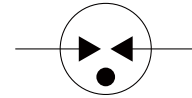


FEATURES

- | Surface Mounting Design 5.4*5.4*5.0mm
- | High Current Handling Capability 5000A @ 8/20 μ s
- | Low Capacitance and Insertion Loss
- | Quick Response and Long Service Life
- | Moisture sensitivity level: Level 1



5.4*5.4*5.0mm





Schematic Symbol

APPLICATION INFORMATION

- | Communication equipment.
- | Repeaters, Modems
- | Telephone Interface, Line cards.
- | Data communication equipment.

AGENCY APPROVALS

Icon	Solderability
RoHS	Compliance with 2011/65/EU
HF	Compliance with IEC61249-2-21:2003
	Mean lead free
	UL Certificated E505857

PRODUCT CHARACTERISTICS

Lead Material	Body Material	Terminal Finish
Copper or Fe-Ni alloy	Ceramics	100% Matte-Tin Plated

ELECTRICAL PARAMETER

Parameter	Condition	Rating	Unit
DC Spark-over Voltage 1)	100V/s	63-117	V
Impulse Spark-over Voltage	At 1kV/μs	for 99 % of measured values ≤650	
	At 1kV/μs	Typical values of distribution ≤600	
Discharge Current (8/20us) 2)	10 times	5	KA
AC Discharge Current	50Hz, 1S	5	A
Minimum Insulation Resistance	Test Voltage DC=50V	1	GΩ
Max. Capacitance 1MHz	$V_{DC}=0.5V$	1	pF
Operating and Storage Temperature		-40~125	°C

1) In ionized mode

2) Terms and waveforms in accordance with ITU-T Rec. K. 12; IEC 61643-21

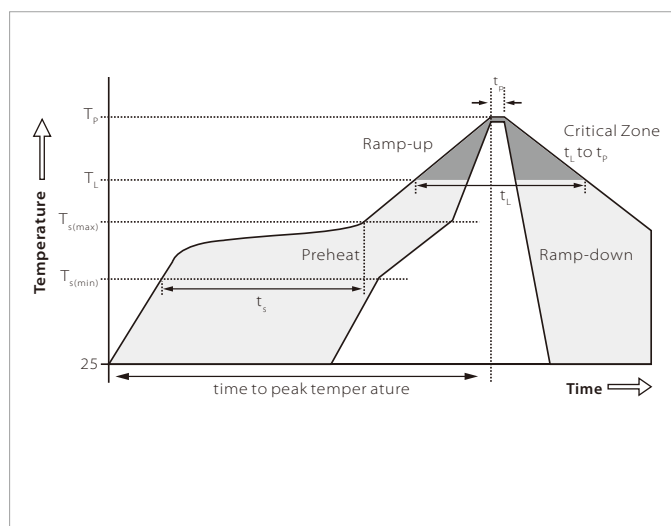
ENVIRONMENTAL RELIABILITY CHARACTERISTICS

Testing items	Technical standards
High Temperature Storage Test	Temperature: 85°C ; Time: 2H
Low Temperature Storage Test	Temperature: -40°C ; Time: 2H
Vibration	Frequency: 10-500Hz ; Amplitude : 0.15mm ; Time: 45min
Resistance of soldering heat	Temperature: 260±5°C; Time of dip soldering: 10s, 1time

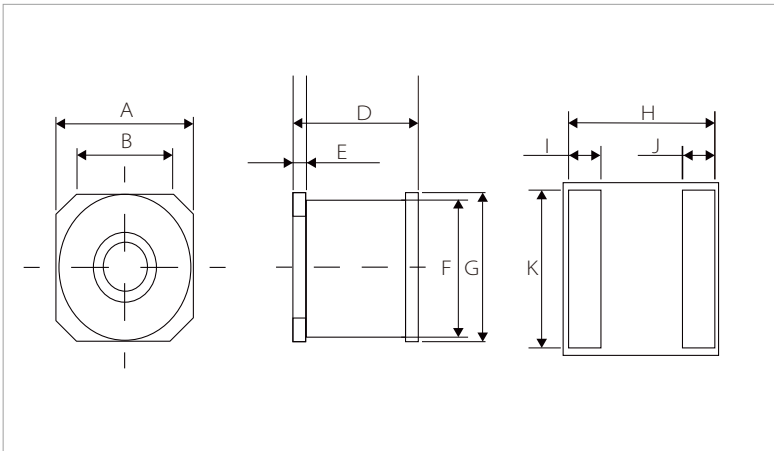
NOTE: Up-screen program can be specified by customer's request via contacting Semiware service

REFLOW PROFILE

Reflow Condition		Lead-free assembly
Pre Heat	Temperature Min	150°C
	Temperature Max	200°C
	Time(min to max)	60-180 secs
Average ramp up rate (Liquidus)Temp (T_L) to peak $T_s(max)$ to T_L - Ramp-up Rate		3°C/second max
Reflow	Temperature (T_L) (Liquidus)	217°C
	Temperature (T_L)	60-150 seconds
Peak Temperature (T_p)		245~260 °C
Time within 5°C of actual peak Temperature (t_p)		30 seconds
Ramp-down Rate		6°C/second max
Time 25°C to peak Temperature (T_p)		8 minutes max.
Do not exceed		260°C

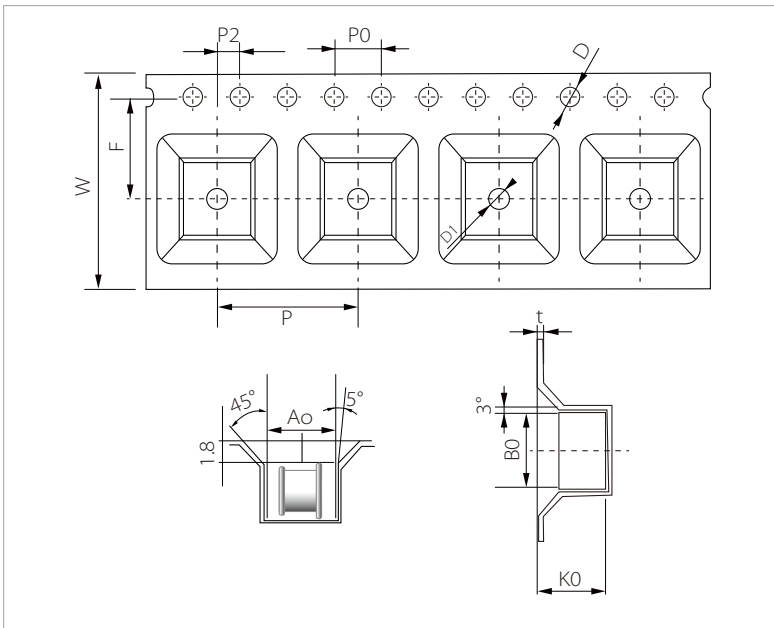


DIMENSIONS AND RECOMMENDED SOLDERING PAD



Ref.	mm
A	5.4±0.1
B	3.8
D	5.0±0.2
E	0.5±0.1
F	∅5.0±0.1
G	∅5.4±0.1
H	5.7
I	1.2
J	1.2
K	5.8

PACKAGE REEL INFORMATION



Ref.	mm
W	16.0±0.3
P	12.0±0.1
F	7.5±0.1
P2	2.0±0.1
D	1.5±0.1
D1	1.5±0.1
P0	4.0±0.1
10P0	40.0±0.2
A0	5.7±0.1
B0	5.7±0.1
K0	5.7±0.1
t	0.4±0.05

ORDERING INFORMATION

Part Number	Size	Marking	QTY/Reel	Reel Size
SG2R05B090A	5.4*5.4*5.0mm	 SG090 05	800	13"

Headquarters

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201000

Hotline

400-021-5756

Web

<https://www.semiware.com>

Sales Center

Tel: 86-21-3463-7458
Email: sales18@semiware.com

Customer Service

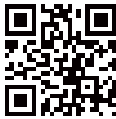
Tel: 86-21-5484-1001
Email: sales17@semiware.com

Technical Support

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Email: fae01@semiware.com

Complaint & Suggestions

Tel: 86-21-3463-7172
Ext: 8868
Email: cs03@semiware.com

By QR Code

Website



Wechat

To find your local partner within Semiware's global network: www.semiware.com

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