

I	Size Design	5.0*5.0*7.5mm	
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- High Current Handling Capability 5000A @ 8/20  $\mu s$
- Low Capacitance and Insertion Loss
- Quick Response and Long Service Life
- Moisture sensitivity level:Level 1

# **APPLICATION INFORMATION**

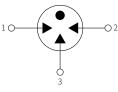
Communication equipment.

- Repeaters, Modems
- Telephone Interface, Line cards.

Data communication equipment.



5.0\*5.0\*7.5mm



Schematic Symbol

#### **AGENCY APPROVALS**

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

## **PRODUCT CHARACTERISTICS**

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



# **ELECTRICAL PARAMETER**

Parameter	Symbol	Rating	Unit
DC Blocking Voltage 1)	L) 100V/s 640-960		V
Impulse Spark-over Voltage	At 1kV/µs	for 99 % of measured values $\leq$ 1500	V
impulse spark-over voltage	At 1kV/µs	Typical values of distribution ≤1400	V
Impulse Discharge Current 2)	8/20µs	5	KA
Insulation Resistance	DC=100V	≥1	GΩ
Capacitance at 1MHz	V <sub>DC</sub> =0.5V	≤1	
Operating and Storage Temperature		-40~90	°C

1) In ionized mode

2) Terms and waveforms in accordance with ITU-T Rec. K. 12; IIEC 61643-311

### **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°C; Time of dip soldering:10s,1time	

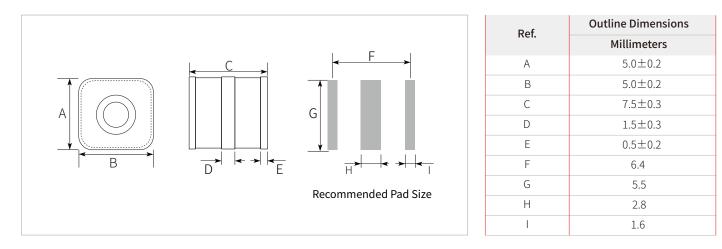
**NOTE:**Up-screen program can be specified by customer's request via contacting Semiware service



# **REFLOW PROFILE**

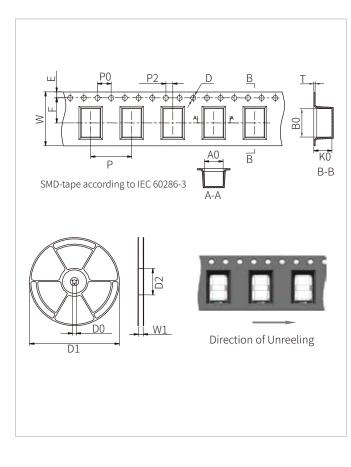
	Reflow Condition	Lead-free assembly
	Temperature Min	150°C
Pre Heat	Temperature Max	200°C
	Time(min to max)	60~180 secs
Average ramp up rate (Liquidus)Temp ( $T_L$ ) to peak $T_s$ (max)to $T_L$ - Ramp-up Rate		3°C/second max
Reflow	Temperature (T <sub>L</sub> ) (Liquidus)	217°C
Reflow	Time(min to max)(t <sub>s</sub> )	60~150 seconds
Peak Temperature (T <sub>P</sub> )		260 °C
Time with	nin 5°C of actual peak Temperature (tp)	20~40 seconds
Ramp-down Rate		6°C/second max
Time 25°C to peak Temperature (T <sub>P</sub> )		8 minutes max.
Do not exceed		260°C

### **PRODUCT DIMENSIONS**





### TAPE AND REEL SPECIFICATION



Ref.	Dimensions		
Kei.	Millimeters	Inches	
W	16±0.3	0.630±0.012	
AO	5.4±0.1	0.213±0.004	
В0	8.4±0.1	0.331±0.004	
K0	5.3±0.1	0.209±0.004	
Р	12±0.1	0.472±0.004	
F	7.5±0.1	0.295±0.004	
E	1.75±0.1	0.069±0.004	
D	1.5+0.1/-0.0	0.059+0.004/-0.0	
P0	4±0.1	0.157±0.004	
P2	2±0.1	0.079±0.004	
Т	0.4±0.1	0.016±0.004	
D0	13.3±0.15	0.524±0.006	
D1	330±2	12.992±0.079	
D2	100+1/-2	3.937+0.039/-0.079	
W1	16.5±0.4	0.65±0.016	

#### **ORDERING INFORMATION**

Part Number	Size	QTY/Reel	Reel Size
SG3D05B800B	5.0*5.0*7.5mm	1000PCS	13 "



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#### By QR Code





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SG3D05B800B

Gas Discharge Tube