

Protection in Portable Electronics Applications.

### FEATURES

- 200 Watts peak pulse power ( $t_p=8/20\mu s$ )
- Transient protection for high-speed data lines to IEC 61000-4-2(ESD) 15kV(Air), 8kV(Contact) IEC 61000-4-4(EFT) 40A( $t_p=5/50ns$ ) IEC 61000-4-5(Lightning) 24A( $t_p=8/20\mu s$ )
- Protects four I/O lines.
- Low clamping voltage.
- Low operating and leakage current.
- Small package for use in portable electronics.

### APPLICATIONS

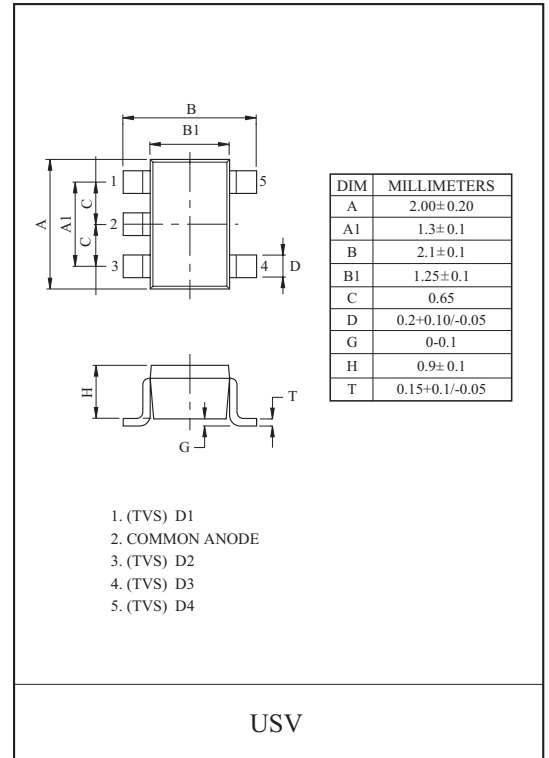
- Cellular Phone Handsets and Accessories.
- Cordless Phones.
- Personal Digital Assistants (PDA's)
- Notebooks, desktops PC, & servers.
- Portable Instrumentation.
- Set-Top Box, DVD Player.
- Digital Camera.

### MAXIMUM RATING ( $T_a=25^\circ C$ )

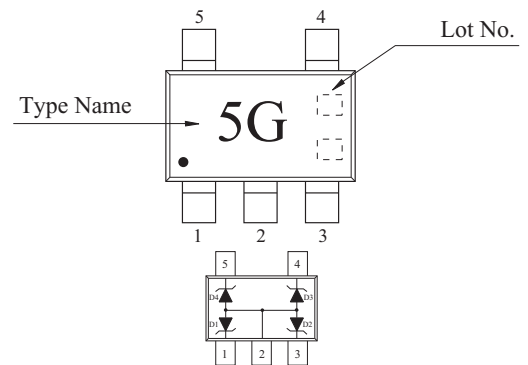
CHARACTERISTIC	SYMBOL	RATING	UNIT
Peak Pulse Power ( $t_p=8/20\mu s$ )	$P_{PK}$	200	W
Peak Pulse Current ( $t_p=8/20\mu s$ )	$I_{PP}$	24	A
Operating Temperature	$T_j$	-55 ~ 150	$^\circ C$
Storage Temperature	$T_{stg}$	-55 ~ 150	$^\circ C$

### ELECTRICAL CHARACTERISTICS ( $T_a=25^\circ C$ )

CHARACTERISTIC	SYMBOL	TEST CONDITION	MIN.	TYP.	MAX.	UNIT
Reverse Stand-Off Voltage	$V_{RWM}$	-	-	-	5	V
Reverse Breakdown Voltage	$V_{BR}$	$I_r=1mA$	6	-	-	V
Reverse Leakage Current	$I_R$	$V_{RWM}=5V$	-	-	10	$\mu A$
Clamping Voltage	$V_C$	$I_{PP}=1A, t_p=8/20\mu s$	-	-	9.5	V
		$I_{PP}=24A, t_p=8/20\mu s$	-	-	12.5	
Junction Capacitance	$C_j$	$V_R=0V, f=1MHz$ Between I/O Pins and GND	-	150	175	pF

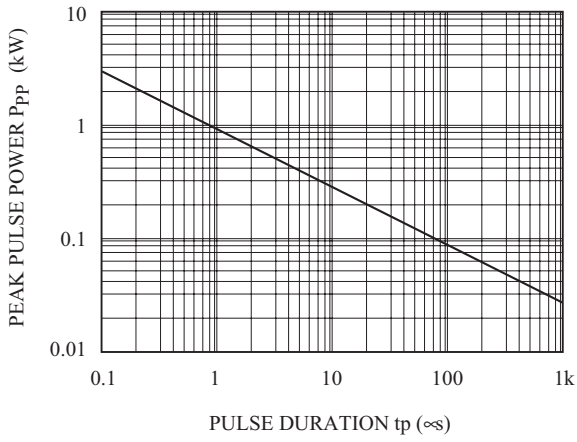


### Marking

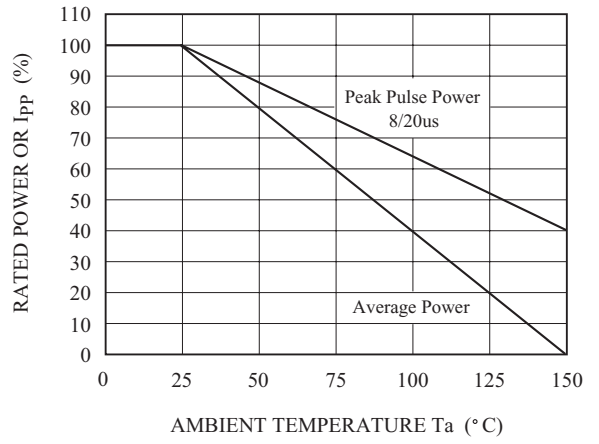


# PG05GBUSV

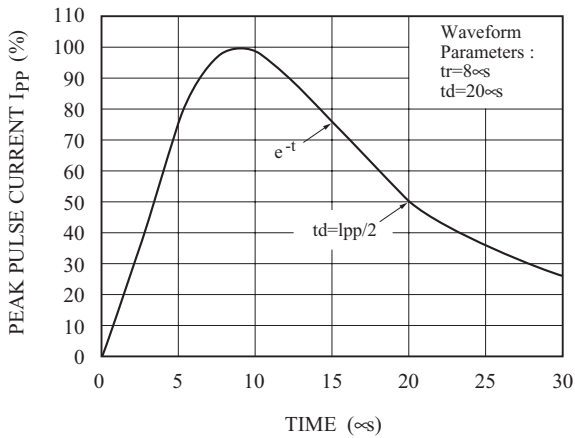
NON-REPETITIVE PEAK PULSE  
POWER VS. PULSE TIME



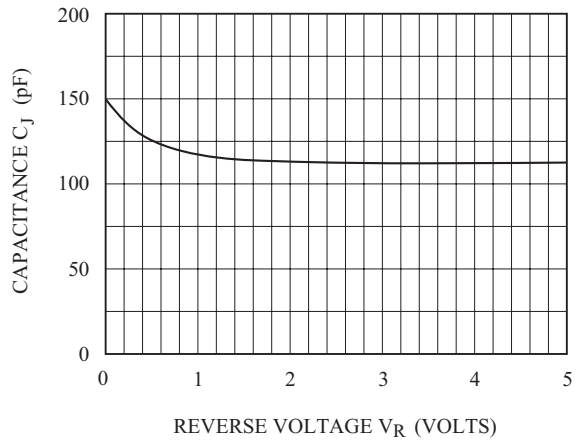
POWER DERATION CURVE



PULSE WAVEFORM



C<sub>J</sub> - V<sub>R</sub>



CLAMPING VOLTAGE VS.  
PEAK PULSE CURRENT

