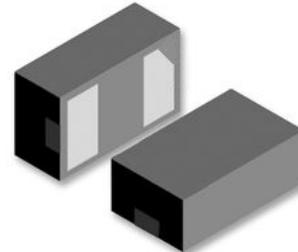


Features

- 200 Watts peak pulse power ($T_P=8/20\mu s$)
- Bidirectional configurations
- Protects one I/O port
- Low clamping voltage
- Low Leakage current
- Protection data/power line to:
- IEC 61000-4-2 ±30kV contact ±30kV air
- IEC 61000-4-4 (EFT) 40A (5/50ns)
- IEC 61000-4-5 (Lightning) 18A (8/20 μs)



Package:DFN1006



Schematic Diagram

Applications

- Cell Phone
- Notebook
- Digital Cameras
- Portable Instrumentation
- Audio and video equipment

Absolute Maximum Ratings ($T_A=25^\circ C$ unless otherwise specified)

| Parameter | Symbol | Value | Unit |
|--|-----------|-------------|------|
| Peak Pulse Power ($T_P=8/20\mu s$) | P_{PP} | 200 | W |
| Peak Pulse Current ($T_P = 8/20\mu s$) | I_{PP} | 18 | A |
| Junction Temperature | T_J | -55 to +125 | °C |
| Storage Temperature | T_{STG} | -55 to +150 | °C |

Electrical Characteristics ($T_A=25^\circ C$ unless otherwise specified)

| Parameter | Symbol | Condition | Min | Typ | Max | Unit |
|---------------------------|-----------|-----------------------------|-----|-----|------|---------|
| Reverse Stand-off Voltage | V_{RWM} | - | - | - | 5 | V |
| Reverse Breakdown Voltage | V_{BR} | $I_T=1mA$ | 6 | 6.8 | - | V |
| Reverse Leakage Current | I_R | $V_R=5V$ | - | 0.1 | 0.5 | μA |
| Clamping Voltage | V_C | $I_{PP}=18A, T_P=8/20\mu s$ | - | - | 11.5 | V |
| Junction Capacitance | C_J | $V_R=0V, f=1MHz$ | - | 30 | - | pF |

Typical Electrical and Thermal Characteristic Curves

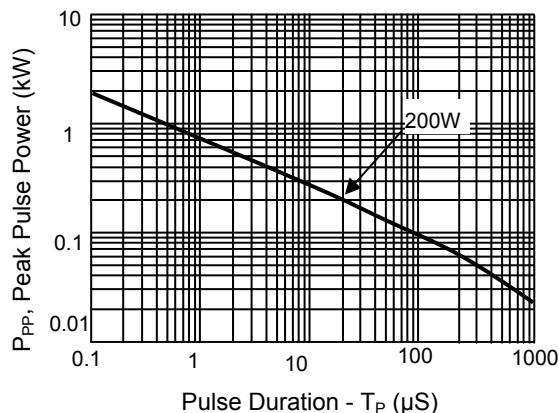


Figure 1. Peak Pulse Power vs. Pulse Duration

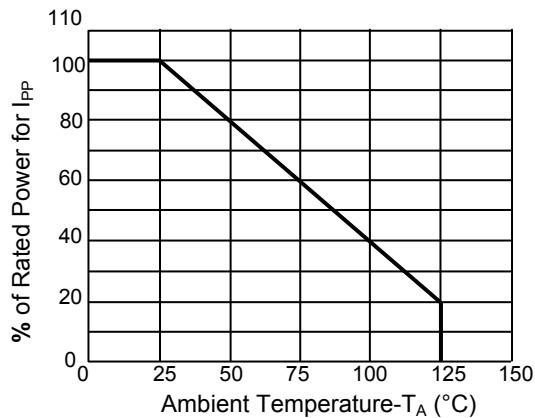


Figure 2. Power Derating Curve

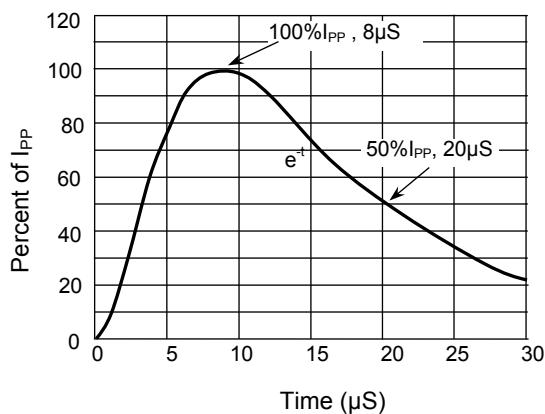


Figure 3. Pulse Waveform 8/20μs

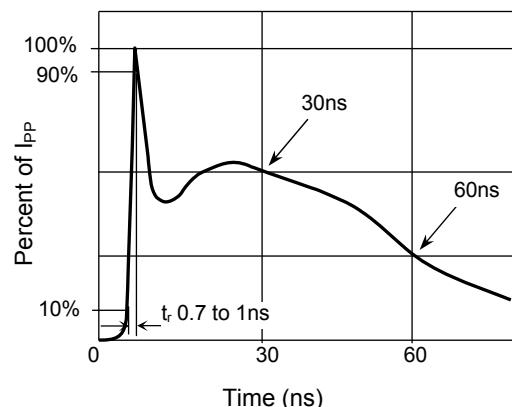
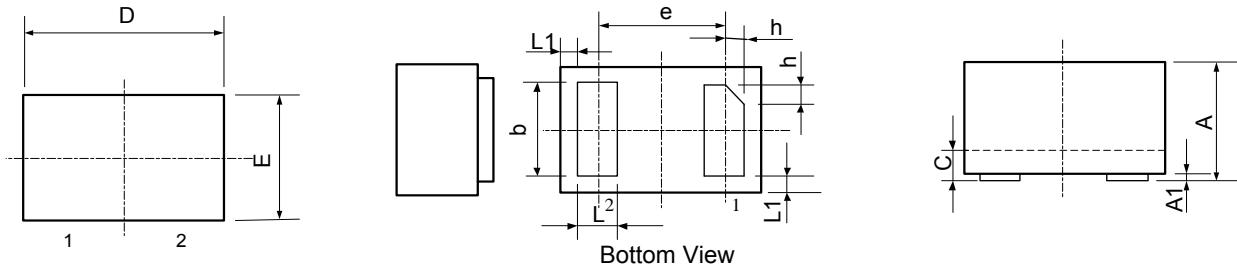


Figure 4 Pulse Waveform-ESD (IEC61000-4-2)

Package Outline Dimensions (DNF1006)



| Symbol | millimeter | | |
|--------|------------|------|------|
| | min | nom | max |
| A | 0.45 | 0.50 | 0.55 |
| A1 | 0 | 0.02 | 0.05 |
| b | 0.45 | 0.50 | 0.55 |
| C | 0.12 | 0.15 | 0.18 |
| D | 0.95 | 1.00 | 1.05 |
| e | 0.65BSC | | |
| E | 0.55 | 0.60 | 0.65 |
| L | 0.20 | 0.25 | 0.30 |
| L1 | 0.05REF | | |
| h | 0.07 | 0.12 | 0.17 |

Order Information

| Device | Package | Marking | Carrier | Quantity |
|-----------|---------|---------|-------------|------------------|
| GSEZ5B300 | DFN1006 | M5 | Tape & Reel | 10,000pcs / Reel |