

查询LDTS14供应商

捷多邦, 专业PCB打样工厂, 24小时

加急出货

Microsemi Corp.

The diode experts

SANTA ANA, CA

SCOTTSDALE, AZ

For more information call:
(602) 941-6300

**LDTS14
thru
LDTS48A**

FEATURES

This series is used in automotive and vehicular applications where load-dump and field decay transients occur. The LDTS protects across-the-line dc power systems from Load Dump and Field Decay Voltage Transient Susceptibility on Power Leads.

- DESIGNED FOR DC POWER APPLICATIONS
- LOW CLAMPING RATIO

MAXIMUM RATINGS

3000 Watts of Peak Pulse Power dissipation at 50ms (see Figure 1)

$t_{clamping}$ (0 volts to $V_{(BR)}$ min.): Less than 1×10^{-12} seconds (theoretical)

Storage temperature: -50°C to $+200^{\circ}\text{C}$

Operating temperature: -50° to $+175^{\circ}\text{C}$ (Figure 3)

Forward surge rating: 200 amps, 8.3ms at 25°C

Steady state power dissipation: 50 watts, $T_C = 25^{\circ}\text{C}$

Repetition Rate (duty cycle): 0.1%

LDTS 14 Series - Designed for a standard 12 volt power system.

LDTS 24 Series - Designed for a standard 12 volt power system capable of sustaining a 24 volt (double voltage) jump start.

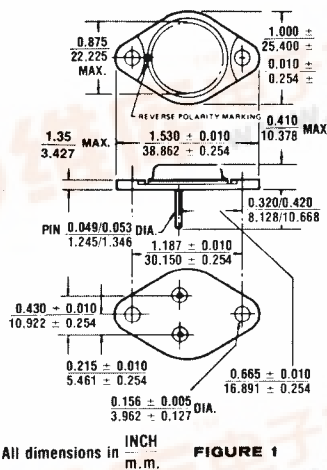
LDTS 30 Series - Designed for a standard 24 volt power system.

LDTS 48 Series - Designed for a standard 24 volt power system capable of sustaining a 48 volt (double voltage) jump start.

ELECTRICAL CHARACTERISTICS

MICROSEMI PART NUMBER	REVERSE STAND-OFF VOLTAGE V_{WM} VOLTS	MINIMUM BREAKDOWN VOLTAGE $V_{(BR)}$ @ 20mA VOLTS	MAXIMUM CLAMPING VOLTAGE @ I_{pp} V_C VOLTS	MAXIMUM SURGE CURRENT (FIG.2) @ I_{pp} AMPS	MAXIMUM REVERSE LEAKAGE V_{WM} I_D μAMPS	MAXIMUM VOLTAGE TEMP. Variation V_{BR} mV/C
LDTS 14 LDTS 14A	14.0 14.0	16.0 16.0	26.0 23.5	115.5 128.0	100.0 100.0	19.0 17.0
LDTS 24 LDTS 24A	24.0 24.0	26.5 26.5	43.0 39.0	70.0 77.0	100.0 100.0	31.0 29.0
LDTS 30 LDTS 30A	30.0 30.0	33.0 33.0	54.0 48.5	56.0 62.0	100.0 100.0	39.0 36.0
LDTS 48 LDTS 48A	48.0 48.0	53.0 53.0	86.0 78.0	34.0 38.0	100.0 100.0	55.0 50.0

TRANSIENT ABSORPTION ZENER



All dimensions in
INCH
m.m.

MECHANICAL CHARACTERISTICS

CASE: Industry standard TO-3 hermetically sealed, .052 inch diameter pins.

FINISH: All external surfaces are corrosion resistant and terminals solderable.

POLARITY: Standard polarity anode to case.

WEIGHT: 15 grams (Appx.).

MOUNTING HARDWARE:

See page 2-9.



LDS14 thru LDS38A

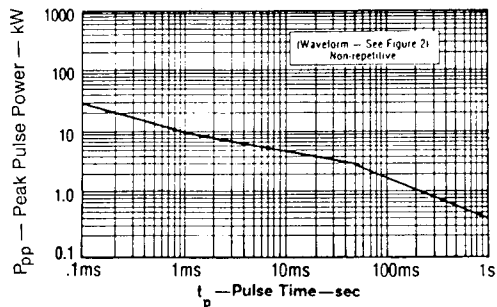
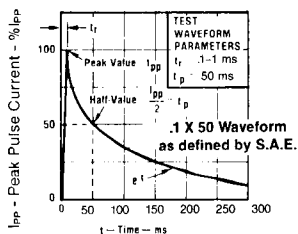
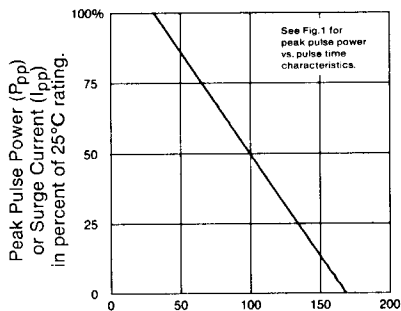


FIGURE 1
PEAK PULSE POWER
VS. PULSE TIME @ 25°C



Pulse Wave Form (.1 X 50)

FIGURE 2
SURGE WAVEFORM



T_C - Case Temperature - °C

FIGURE 3
DERATING CURVE

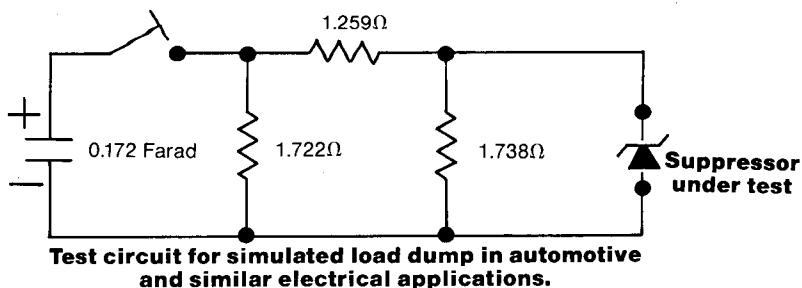


FIGURE 4