

LLD08-E-41C

**SINGLE PHASE GLASS PASSIVATED
SURFACE MOUNT FLAT BRIDGE RECTIFIER
VOLTAGE: 800V CURRENT: 0.8A**

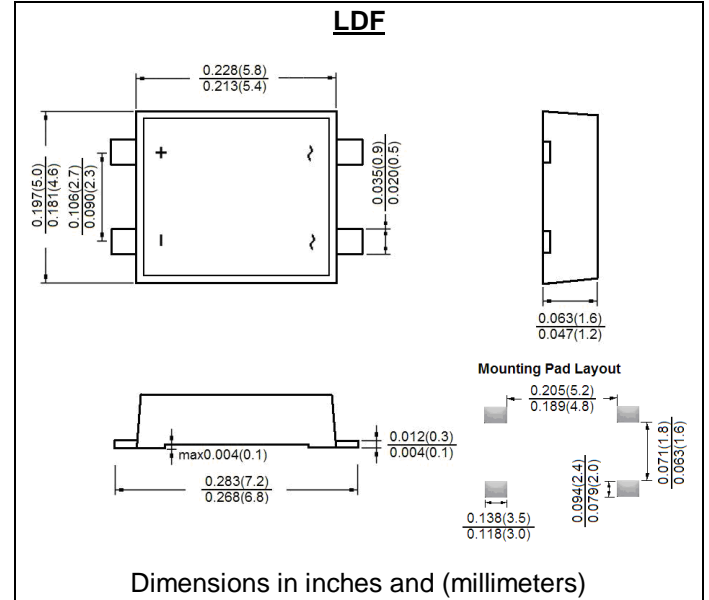


FEATURE

Low profile space
Ideal for automated placement
Glass passivated chip
Low forward voltage drop
Low leakage current
High forward surge capability
High temperature soldering: 260°C/10 seconds
Halogen Free

MECHANICAL DATA

Terminal: Plated leads solderable per J-STD-002
Case: Molded with UL-94 Class V-0 Halogen Free Epoxy
Polarity: Polarity symbol marked on body



MAXIMUM RATINGS AND ELECTRICAL CHARACTERISTICS

(single-phase, half -wave, 60HZ, resistive or inductive load rating at 25°C, unless otherwise stated)

	SYMBOL	LLD08-E-41C	Units
Maximum Recurrent Peak Reverse Voltage	V _{rrm}	800	V
Maximum RMS Voltage	V _{rms}	560	V
Maximum DC blocking Voltage	V _{DC}	800	V
Maximum Average Forward Rectified Current at T _a =40°C	I _{f(av)}	0.8	A
Peak Forward Surge Current single half sine-wave superimposed on rated load	I _{fsm}	35	A
Inrush Current with 10Ω and 20uF foil capacitor placed in series to the DUT 10000 times, 10s between each pulse T _c =120°C	I _{fsm-1}	40min	A
Inrush Current with 10Ω and 20uF foil capacitor placed in series to the DUT 1000 times, 10s between each pulse T _c =120°C	I _{fsm-2}	50min	A
Maximum Instantaneous Forward Voltage at forward current 0.4A	V _f	1.0	V
Maximum DC Reverse Current at V _{DC} =325V and T _c =25°C	I _r	1.0	μA
Maximum DC Reverse Current at rated DC blocking voltage T _c =25°C T _c =120°C	I _r	5.0 100.0	μA
Total power dissipatio (Note1)	P _{tot}	1.28	W
Typical Thermal resistance (Note2)	R _{th(ja)} R _{th(jc)} R _{th(jl)}	70 45 20	°C/W
Typical Junction Capacitance (Note3)	C _j	15.0	pF
Storage and Operating Junction Temperature Range	T _{stg} , T _j	-55 to +150	°C

Note:
1. T_c=25°C (according to calculations)
2. On aluminum substrate P.C.B. with an area of 0.8"×0.8"(20×20mm) mounted on 0.05×0.05"(1.3×1.3mm) solder pad
3. Measured at 1.0 MHz and applied voltage of 4.0 volt

Fig.1 Derating Curve For Output Rectified Current

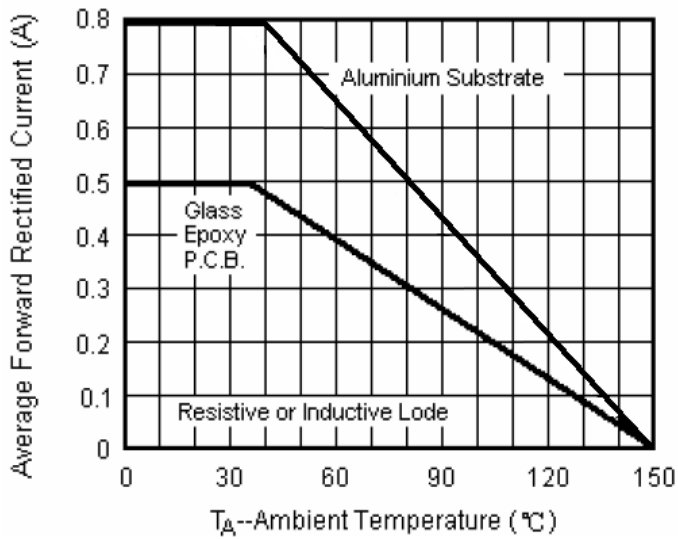


Fig.2 Maximum Non-Repetitive Peak Forward Surge Current Per Leg

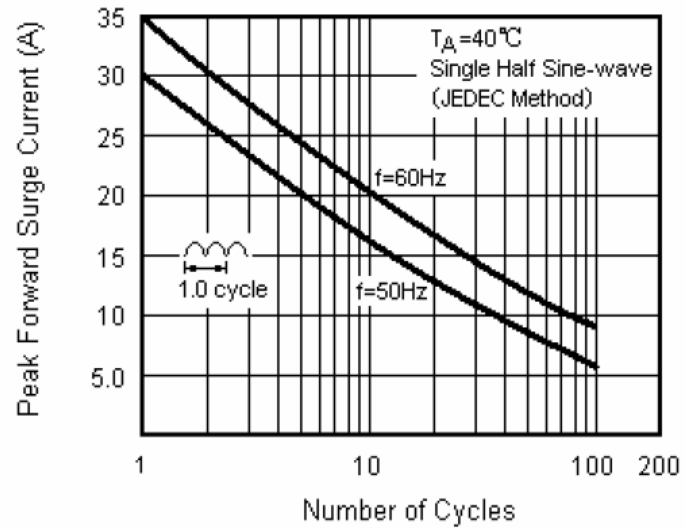


Fig.3 Typical Forward Voltage Characteristics Per Leg

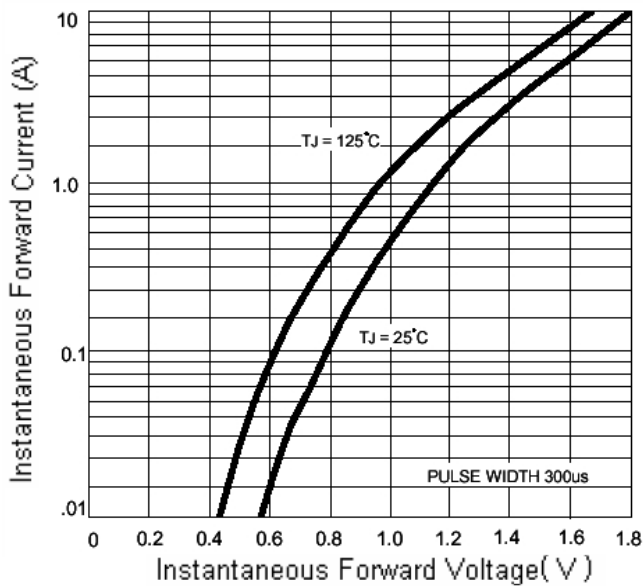


Fig.4 Typical Reverse Leakage Characteristics Per Leg

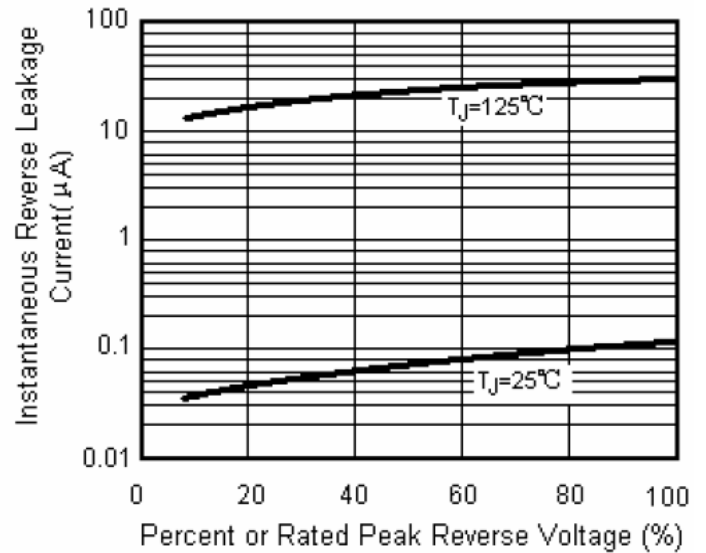


Fig.5 Typical Junction Capacitance Per Leg

