

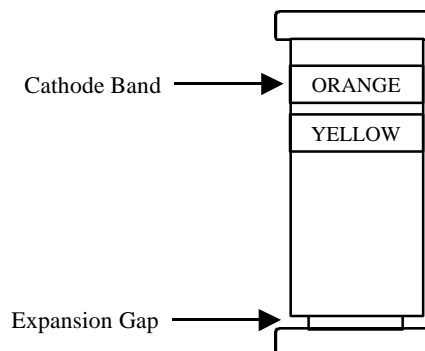


# FDLL3595

## General Description:

A General Purpose diode that couples high forward conductance fast switching speed and high blocking voltages in a glass leadless LL-34 Surface Mount package.

Placement of the Expansion Gap has no relationship to the location of the Cathode Terminal which is indicated by the first color band.



## High Conductance, Low Leakage Diode

### Absolute Maximum Ratings\* TA = 25°C unless otherwise noted

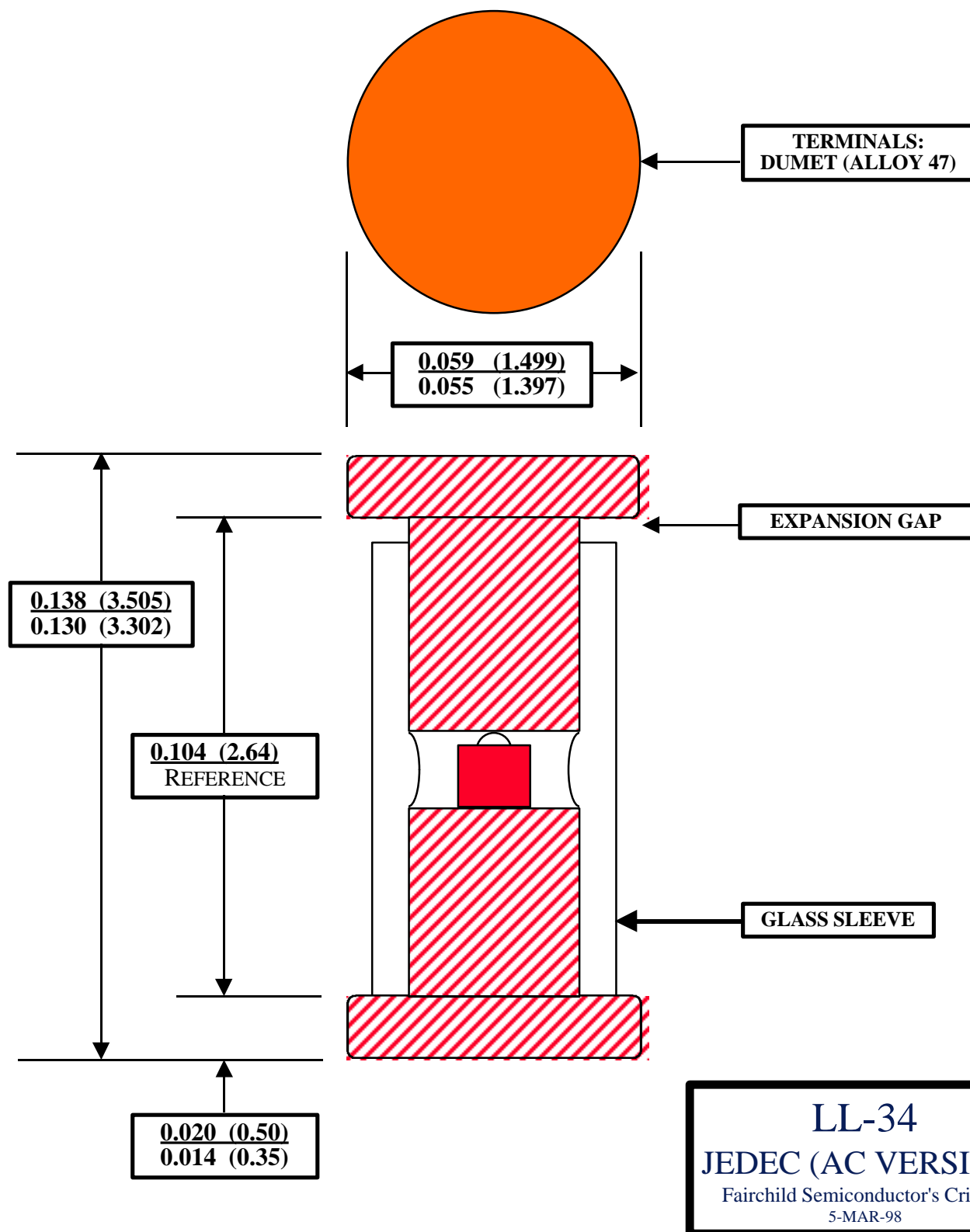
Sym	Parameter	Value	Units
T <sub>stg</sub>	Storage Temperature	-65 to +200	°C
T <sub>J</sub>	Operating Junction Temperature	-65 to +200	°C
P <sub>D</sub>	Total Power Dissipation at T <sub>A</sub> = 25°C	500	mW
	Linear Derating Factor from T <sub>A</sub> = 25°C	3.33	mW/°C
R <sub>OJA</sub>	Thermal Resistance Junction-to-Ambient	350	°C/W
W <sub>iv</sub>	Working Inverse Voltage	125	V
I <sub>O</sub>	Average Rectified Current	200	mA
I <sub>F</sub>	DC Forward Current (I <sub>F</sub> )	500	mA
i <sub>f</sub>	Recurrent Peak Forward Current	600	mA
i <sub>F(surge)</sub>	Peak Forward Surge Current (I <sub>FSM</sub> ) Pulse Width = 1.0 second	1.0	Amp
	Pulse Width = 1.0 microsecond	4.0	Amp

\*These ratings are limiting values above which the serviceability of any semiconductor device may be impaired

### Electrical Characteristics TA = 25°C unless otherwise noted

SYM	CHARACTERISTICS	MIN	MAX	UNITS	TEST CONDITIONS
B <sub>V</sub>	Breakdown Voltage	150		V	I <sub>R</sub> = 100 uA
I <sub>R</sub>	Reverse Leakage		1.0 300 500 3.0	nA nA nA uA	V <sub>R</sub> = 125 V V <sub>R</sub> = 30 V T <sub>A</sub> = 125°C V <sub>R</sub> = 125 V T <sub>A</sub> = 125°C V <sub>R</sub> = 180 V T <sub>A</sub> = 150°C
V <sub>F</sub>	Forward Voltage	520 600 650 750 790 0.83	680 750 800 880 920 1.00	mV mV mV mV mV V	I <sub>F</sub> = 1.0 mA I <sub>F</sub> = 5.0 mA I <sub>F</sub> = 10 mA I <sub>F</sub> = 50 mA I <sub>F</sub> = 100 mA I <sub>F</sub> = 200 mA
C <sub>T</sub>	Capacitance		8.0	pF	V <sub>R</sub> = 0.0 V, f = 1.0 MHz
T <sub>RR</sub>	Reverse Recovery Time		3.0	us	I <sub>F</sub> = 10 mA V <sub>R</sub> = 3.5 V R <sub>L</sub> = 1.0 kOhms

THE PLACEMENT OF THE EXPANSION GAP HAS NO RELATIONSHIP TO THE LOCATION OF THE CATHODE TERMINAL OF THE DEVICE. THE EXPANSION GAP & CATHODE BAND CAN BE ON THE SAME TERMINAL OR AT OPPOSITE TERMINALS OF THE DIODE.



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