

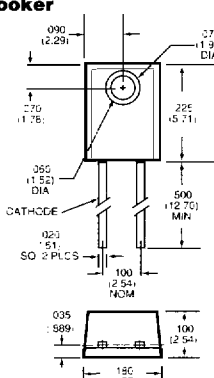
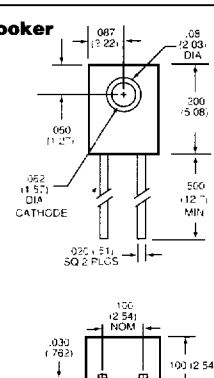
PLASTIC INFRARED LIGHT EMITTING DIODES

	Emission Angle @	I _e Radiant Intensity		V _F /I _F (V)/(mA)	I _R /V _R (μA)/(V)	Notes		
Part Number	1/2 Power	min	max	max	max			
T-1 3 mm 	940 nm GaAs							
	QEC112	±8°	6	30	mW/sr	1.50/20	10/5	1
	QEC113	±8°	14	—	mW/sr	1.50/20	10/5	1
	880 nm AlGaAs							
	QEC121	±8°	14	—	mW/sr	1.70/20	10/5	1
	QEC122	±8°	27	94	mW/sr	1.70/20	10/5	1
QEC123	±8°	39	—	mW/sr	1.70/20	10/5	1	
T-13/4 5 mm 	940 nm GaAs							
	QED233	±20°	10	53	mW/sr	1.50/20	10/5	1
	QED234	±20°	27	—	mW/sr	1.50/20	10/5	1
	880 nm AlGaAs							
	QED121	±9°	20	40	mW/sr	1.70/20	10/5	1
	QED122	±9°	50	100	mW/sr	1.70/20	10/5	1
	QED123	±9°	80	—	mW/sr	1.70/20	10/5	1
	QED221	±20°	10	20	mW/sr	1.70/20	10/5	1
	QED222	±20°	16	32	mW/sr	1.70/20	10/5	1
QED223	±20°	25	—	mW/sr	1.70/20	10/5	1	
Plastic T0 - 46 	880 nm AlGaAs							
	QED422	±30°	10	50	mW/sr	1.70/20	10/5	1
	QED423	±30°	18	—	mW/sr	1.70/20	10/5	1
	QED522	±15°	20	94	mW/sr	1.70/20	10/5	1
	QED523	±15°	40	—	mW/sr	1.70/20	10/5	1

Dimensions for all drawings are in inches (millimeters).

Tolerance of ±.010 (.25) unless otherwise stated on all non nominal dimensions.

PLASTIC INFRARED LIGHT EMITTING DIODES

	Part Number	Emission Angle @ 1/2 Power	I _e Radiant Intensity		V _F /I _F (V)/(mA)	I _R /V _R (μA)/(V)	Notes	
			min	max	max	max		
	940 nm GaAs							
	F5F1	±35°	.28	—	mW/sr	1.70/60	10/6	2
	880 nm AlGaAs							
	F5G1	±35°	.60	—	mW/sr	1.70/50	10/6	2
	940 nm GaAs							
	QEE113	±25°	3	12	mW/sr	1.50/20	10/5	1
	880 nm AlGaAs							
	QEE122	±25°	4	16	mW/sr	1.70/20	10/5	1
	QEE123	±25°	8	—	mW/sr	1.70/20	10/5	1

Notes (Applies to all components on pages 91 and 92.)

1. I_e @ I_F = 100 mA pulsed
2. I_e @ I_F = 20 mA pulsed

Maximum Ratings Table A (Applies to all components on pages 91 and 92.)

Storage Temperature	-40 to +100° C
Operating Temperature	-40 to +100° C
Soldering:	
Lead Temperature (Iron)	240° C for 5 s
Lead Temperature (Flow)	260° C for 10 s
Reverse Voltage (QEC, QED, QEE)	5.0 V
Reverse Voltage (F5F, F5G)	6.0 V
Continuous Forward Current (QEC, QEE, F5G)	50 mA
Continuous Forward Current (F5F)	60 mA
Continuous Forward Current (QED)	100 mA
Power Dissipation (QEC, QEE, F5F, F5G)	100 mW
Derate linearly at 1.33 mW/°C above 25° C	
Power Dissipation (QED)	200 mW
Derate linearly at 2.67 mW/°C above 25° C	