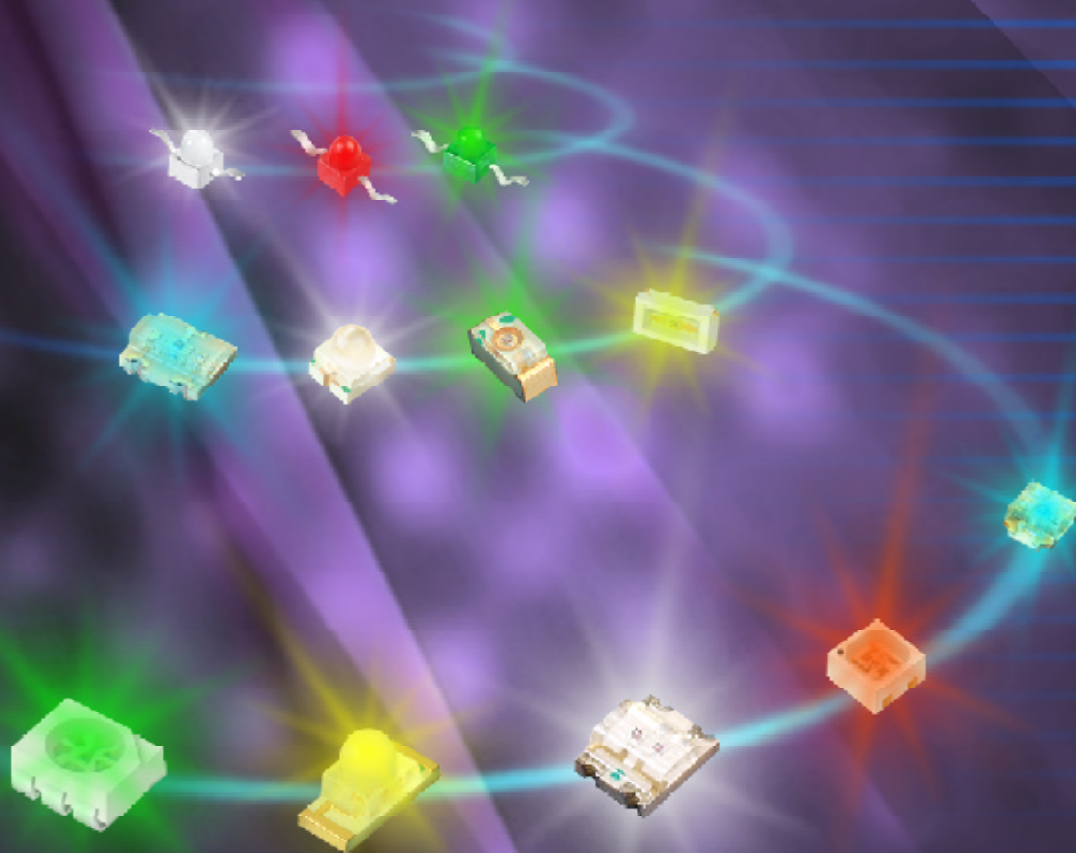


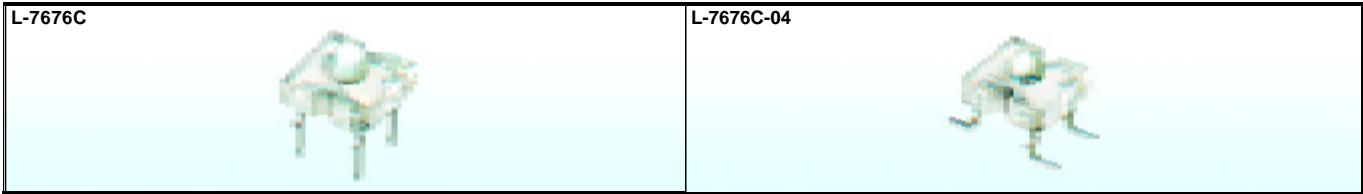
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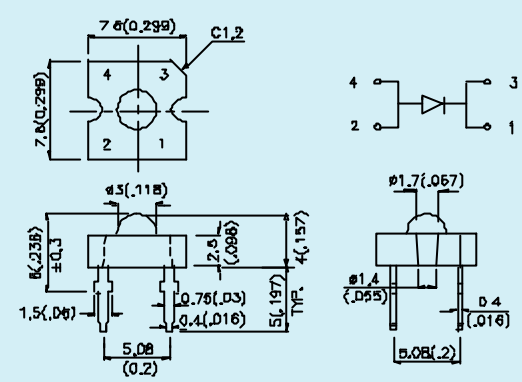
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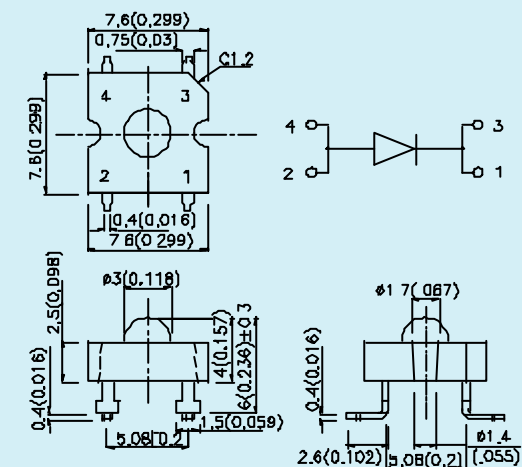


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Part No.	Material	I D (nm)	Lens Type	Iv (mcd) @20mA *70mA		Viewing Angle 2 $\theta$ 1/2	Dimension
				Min.	Typ.		
L-7676CSURC	InGaAlP	628	water clear	280	500	70	7.6mm x 7.6mm 
L-7676CSURC-E	InGaAlP	630	water clear	380	600	70	
L-7676CSEC-E	InGaAlP	621	water clear	480	800	70	
L-7676CSEC-G	InGaAlP	625	water clear	650	1200	70	
L-7676CSEC-H	InGaAlP	630	water clear	1500	1800	70	
L-7676CSYC	InGaAlP	588	water clear	180	400	70	
L-7676CSYC-H	InGaAlP	589	water clear	280	450	70	
L-7676CVGC-H	InGaN	525	water clear	2500	4300	70	
L-7676CPBC-H	InGaN	470	water clear	380	800	70	
L-7676CPWC-H	InGaN	-	water clear	650	1300	70	
				X=0.33, Y=0.34			
				*2200	*3200	70	
				X=0.33, Y=0.34			

L-7676CSURC-04	InGaAlP	628	water clear	280	500	70	7.6mm x 7.6mm 
L-7676CSURC-E-04	InGaAlP	630	water clear	380	600	70	
L-7676CSEC-E-04	InGaAlP	621	water clear	480	800	70	
L-7676CSEC-G-04	InGaAlP	625	water clear	650	1200	70	
L-7676CSEC-H-04	InGaAlP	630	water clear	1500	1800	70	
L-7676CSYC-04	InGaAlP	588	water clear	180	400	70	
L-7676CSYC-H-04	InGaAlP	589	water clear	280	450	70	
L-7676CVGC-H-04	InGaN	525	water clear	2500	4300	70	
L-7676CPBC-H-04	InGaN	470	water clear	380	800	70	
L-7676CPWC-H-04	InGaN	-	water clear	650	1300	70	
				X=0.33, Y=0.34			
				*2200	*3200	70	
				X=0.33, Y=0.34			

1. DRIVE CURRENT BETWEEN 10mA AND 30mA ARE RECOMMENDED FOR LONG TERM PERFORMANCE.
2. OPERATION AT CURRENT BELOW 10mA IS NOT RECOMMENDED.

NOTES:

1. All dimensions are in millimeters (inches).
2. Tolerance is  $\pm 0.25\text{mm}$  (0.01") unless otherwise noted.

L-76761C

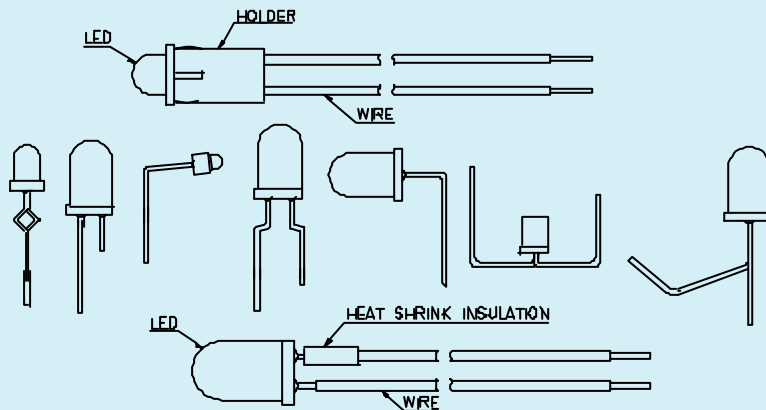


Part No.	Material	λ D (nm)	Lens Type	Iv (mcd) @20mA *70mA		Viewing Angle 2 $\theta$ 1/2	Dimension	
				Min.	Typ.			
L-76761CSURC	InGaAlP	628	water clear	900	2000	20	7.6mm x 7.6mm 	
L-76761CSURC-E	InGaAlP	630	water clear	1200	2300	20		
L-76761CSEC-E	InGaAlP	621	water clear	1800	3400	20		
L-76761CSEC-G	InGaAlP	625	water clear	2200	3500	20		
L-76761CSEC-H	InGaAlP	630	water clear	2800	4500	20		
L-76761CSYC	InGaAlP	588	water clear	380	800	20		
L-76761CSYC-H	InGaAlP	589	water clear	480	900	20		
L-76761CVGC-H	InGaN	525	water clear	1800	3400	20		
L-76761CPBC-H	InGaN	470	water clear	1200	2400	20		
L-76761CPWC-H	InGaN	-	water clear	1800	4500	20		
				X=0.33, Y=0.34				
				*7500	*12000	20		
				X=0.33, Y=0.34				

1. DRIVE CURRENT BETWEEN 10mA AND 30mA ARE RECOMMENDED FOR LONG TERM PERFORMANCE.
2. OPERATION AT CURRENT BELOW 10mA IS NOT RECOMMENDED.

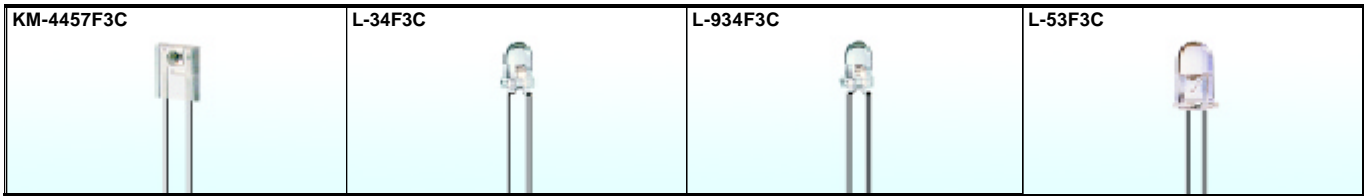
**VALUE ADDED LED LAMPS**

LED lamp with forming/wire leads available



NOTES:

1. All dimensions are in millimeters(inches).
2. Tolerance is  $\pm 0.25\text{mm}(0.01")$  unless otherwise noted.



Part No.	Material	λ D (nm)	Lens Type	Iv (mcd) @20mA *70mA		Viewing Angle 2θ 1/2	Dimension
				Min.	Typ.		

KM-4457F3C	GaAs	940	water clear	1.2	3	70	1.5mm (Side Look) 

L-34F3C	GaAs	940	water clear	1.6	10	50	T-1 (3mm) Round 
L-34F3BT	GaAs	940	blue transparent	*4	*20	50	
L-34SF4C	GaAlAs	880	water clear	1.6	4	50	
L-34SF4BT	GaAlAs	880	blue transparent	*7	*20	50	
L-34SF6C	GaAlAs	860	water clear	7	15	50	
L-34SF6BT	GaAlAs	860	blue transparent	*10	*40	50	
L-34SF7C	GaAlAs	850	water clear	7	18	50	
L-34SF7BT	GaAlAs	850	blue transparent	*10	*45	50	

L-934F3C	GaAs	940	water clear	1.6	10	50	T-1 (3mm) Round 
				*4	*15	50	
L-934F3BT	GaAs	940	blue transparent	4	14	50	
				*10	*45	50	

L-53F3C	GaAs	940	water clear	7	20	30	T-1 3/4 (5mm) Round 
L-53F3BT	GaAs	940	blue transparent	*10	*30	30	
L-53SF4C	GaAlAs	880	water clear	4	20	30	
L-53SF4BT	GaAlAs	880	blue transparent	*7	*30	30	
L-53SF6C	GaAlAs	860	water clear	7	20	30	
L-53SF6BT	GaAlAs	860	blue transparent	*10	*30	30	
L-53SF7C	GaAlAs	850	water clear	10	40	30	
L-53SF7BT	GaAlAs	850	blue transparent	*50	*100	30	

NOTES:  
 1. All dimensions are in millimeters (inches).  
 2. Tolerance is ±0.25mm (0.01") unless otherwise noted.

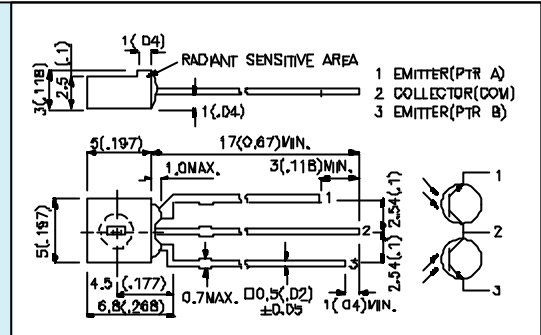


**PHOTOTRANSISTOR**

L-610MP4BT/BD NPN BLACK PLASTIC PHOTOTRANSISTOR

**ELECTRICAL AND RADIANT CHARACTERISTICS T<sub>A</sub>=25°C**

Symbol	Parameter	Min.	Typ.	Max.	Unit	Test Condition
V <sub>BR CEO</sub>	Collector-to-Emitter Breakdown Voltage	30	-	-	V	I <sub>C</sub> = 100μA E <sub>e</sub> = 0mW/cm <sup>2</sup>
V <sub>BR ECO</sub>	Emitter-to-Collector Breakdown Voltage	5	-	-	V	I <sub>E</sub> = 100μA E <sub>e</sub> = 0mW/cm <sup>2</sup>
V <sub>CE (SAT)</sub>	Collector-to-Emitter Saturation Voltage	-	-	0.4	V	I <sub>C</sub> = 500μA E <sub>e</sub> = 5mW/cm <sup>2</sup>
I <sub>CEO</sub>	Collector Dark Current	-	-	100	nA	V <sub>CE</sub> = 10V E <sub>e</sub> = 0mW/cm <sup>2</sup>
T <sub>R</sub>	Rise Time (10% to 90%)	-	16	-	μs	V <sub>CE</sub> = 5V I <sub>C</sub> = 1mA R <sub>L</sub> = 1KΩ
T <sub>F</sub>	Fall Time (90% to 10%)	-	18	-	μs	
I <sub>(ON)</sub>	On State Collector Current	0.1	0.5	-	mA	V <sub>CE</sub> = 5V, E <sub>e</sub> = 1mW/cm <sup>2</sup> , λ = 940nm
R	Collector Current Ratio of Phototransistor	0.8	1	1.25	Ω	I <sub>C (on) (a)</sub> / I <sub>C (on) (b)</sub>



**ABSOLUTE MAXIMUM RATING T<sub>A</sub>=25°C**

Parameter	Max. Ratings
Collector-to-Emitter Breakdown Voltage	30V
Emitter-to-Collector Breakdown Voltage	5V
Power Dissipation at (or below) 25°C Free Air Temperature	100mW
Operating Temperature Range	-55°C ~ +100°C
Storage Temperature Range	-55°C ~ +100°C
Lead Soldering Temperature (>5mm For 5sec)	260°C

**T-1 (3m m) PHOTOTRANSISTOR**

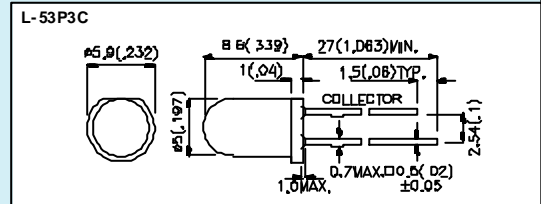
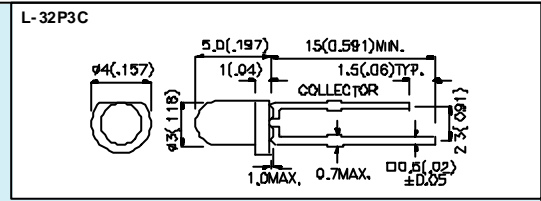
L-32P3C WATER CLEAR LENS

**T-1 3/4 (5m m) PHOTOTRANSISTOR**

L-53P3C WATER CLEAR LENS

**ELECTRICAL AND RADIANT CHARACTERISTICS T<sub>A</sub>=25°C**

Symbol	Parameter	Min.	Typ.	Max.	Unit	Test Condition
V <sub>BR CEO</sub>	Collector-to-Emitter Breakdown Voltage	30	-	-	V	I <sub>C</sub> = 100μA E <sub>e</sub> = 0mW/cm <sup>2</sup>
V <sub>BR ECO</sub>	Emitter-to-Collector Breakdown Voltage	5	-	-	V	I <sub>E</sub> = 100μA E <sub>e</sub> = 0mW/cm <sup>2</sup>
V <sub>CE (SAT)</sub>	Collector-to-Emitter Saturation Voltage	-	-	0.8	V	I <sub>C</sub> = 2mA E <sub>e</sub> = 20mW/cm <sup>2</sup>
I <sub>CEO</sub>	Collector Dark Current	-	-	100	nA	V <sub>CE</sub> = 10V E <sub>e</sub> = 0mW/cm <sup>2</sup>
T <sub>R</sub>	Rise Time (10% to 90%)	-	3	-	μs	V <sub>CE</sub> = 5V I <sub>C</sub> = 1mA R <sub>L</sub> = 1KΩ
T <sub>F</sub>	Fall Time (90% to 10%)	-	3	-	μs	
I <sub>(ON)</sub>	On State Collector Current	0.1	0.5	-	mA	V <sub>CE</sub> = 5V, E <sub>e</sub> = 1mW/cm <sup>2</sup> , λ = 940nm

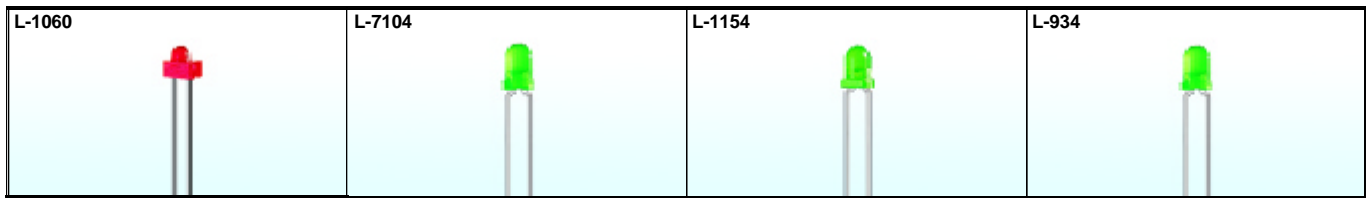


**ABSOLUTE MAXIMUM RATING T<sub>A</sub>=25°C**

Parameter	Max. Ratings
Collector-to-Emitter Breakdown Voltage	30V
Emitter-to-Collector Breakdown Voltage	5V
Power Dissipation at (or below) 25°C Free Air Temperature	100mW
Operating Temperature Range	-40°C ~ +85°C
Storage Temperature Range	-40°C ~ +85°C
Lead Soldering Temperature (>5mm For 5sec)	260°C

NOTES:

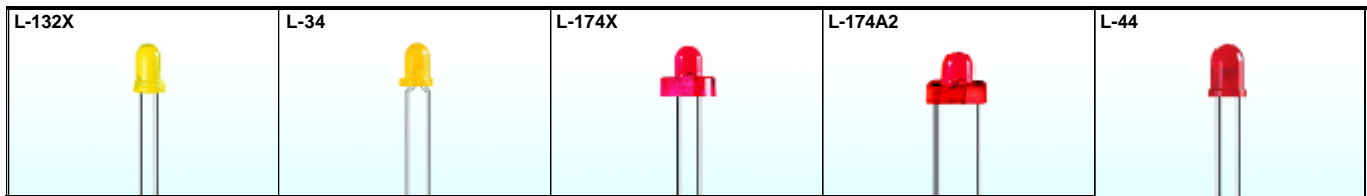
- All dimensions are in millimeters (inches).
- Tolerance is ±0.25mm (0.01") unless otherwise noted.



Part No.	Material	λ D (nm)	Lens Type	Iv (mcd) @10mA *20mA		Viewing Angle 2θ1/2	Dimension
				Min.	Typ.		
L-1060ID	GaAsP/GaP	625	red diffused	8	15	70	1.8mm Round 
L-1060SRD	GaAlAs	640	red diffused	*70	*200	70	
L-1060SRC	GaAlAs	640	water clear	*110	*300	30	
L-1060ED	GaAsP/GaP	625	orange diffused	8	15	70	
L-1060YD	GaAsP/GaP	588	yellow diffused	5	8	70	
L-1060GD	GaP	568	green diffused	5	10	70	
L-7104ID	GaAsP/GaP	625	red diffused	8	20	40	T-1 (3mm) Round 
L-7104IT	GaAsP/GaP	625	red transparent	18	60	34	
L-7104EC	GaAsP/GaP	625	water clear	18	60	34	
L-7104ED	GaAsP/GaP	625	orange diffused	8	20	40	
L-7104ND	GaAsP/GaP	610	orange diffused	8	30	40	
L-7104NT	GaAsP/GaP	610	orange transparent	18	50	34	
L-7104NC	GaAsP/GaP	610	water clear	18	50	34	
L-7104YD	GaAsP/GaP	588	yellow diffused	5	15	40	
L-7104YT	GaAsP/GaP	588	yellow transparent	8	20	34	
L-7104YC	GaAsP/GaP	588	water clear	8	20	34	
L-7104GD	GaP	568	green diffused	8	20	40	
L-7104GT	GaP	568	green transparent	18	60	34	
L-7104GC	GaP	568	water clear	18	60	34	
L-7104PGD	GaP	555	green diffused	1.8	5	40	
L-7104PGT	GaP	555	green transparent	3	15	34	
L-7104PGC	GaP	555	water clear	3	15	34	
L-1154ID	GaAsP/GaP	625	red diffused	8	25	60	T-1 (3mm) Round 
L-1154IT	GaAsP/GaP	625	red transparent	18	60	50	
L-1154ND	GaAsP/GaP	610	orange diffused	8	30	60	
L-1154NT	GaAsP/GaP	610	orange transparent	18	50	50	
L-1154YD	GaAsP/GaP	588	yellow diffused	5	15	60	
L-1154YT	GaAsP/GaP	588	yellow transparent	8	20	50	
L-1154GD	GaP	568	green diffused	8	15	60	
L-1154GT	GaP	568	green transparent	18	40	50	
L-1154PGD	GaP	555	green diffused	1.8	5	60	
L-1154PGT	GaP	555	green transparent	3	10	50	
L-934HD	GaP	660	red diffused	1	3	60	T-1 (3mm) Round 
L-934ID	GaAsP/GaP	625	red diffused	8	20	60	
L-934IT	GaAsP/GaP	625	red transparent	18	60	50	
L-934EC	GaAsP/GaP	625	water clear	18	60	50	
L-934ED	GaAsP/GaP	625	orange diffused	8	20	60	
L-934ND	GaAsP/GaP	610	orange diffused	8	30	60	
L-934NT	GaAsP/GaP	610	orange transparent	18	50	50	
L-934NC	GaAsP/GaP	610	water clear	18	50	50	
L-934YD	GaAsP/GaP	588	yellow diffused	5	15	60	
L-934YT	GaAsP/GaP	588	yellow transparent	8	20	50	
L-934YC	GaAsP/GaP	588	water clear	8	20	50	
L-934GD	GaP	568	green diffused	8	20	60	
L-934GT	GaP	568	green transparent	18	60	50	
L-934GC	GaP	568	water clear	18	60	50	
L-934PGD	GaP	555	green diffused	1.8	5	60	
L-934PGT	GaP	555	green transparent	3	15	50	
L-934PGC	GaP	555	water clear	3	15	50	

NOTES:

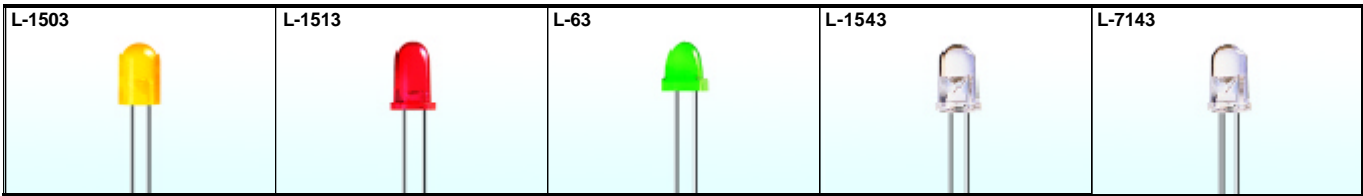
- All dimensions are in millimeters (inches).
- Tolerance is ±0.25mm (0.01") unless otherwise noted.



Part No.	Material	λ D (nm)	Lens Type	Iv (mcd) @10mA *20mA		Viewing Angle 2 $\theta$ 1/2	Dimension
				Min.	Typ.		
L-132XID	GaAsP/GaP	625	red diffused	8	25	60	T-1 (3mm) Round 
L-132XIT	GaAsP/GaP	625	red transparent	18	60	50	
L-132XND	GaAsP/GaP	610	orange diffused	8	30	60	
L-132XNT	GaAsP/GaP	610	orange transparent	18	50	50	
L-132XNC	GaAsP/GaP	610	water clear	18	50	50	
L-132XYD	GaAsP/GaP	588	yellow diffused	5	15	60	
L-132XYT	GaAsP/GaP	588	yellow transparent	8	20	50	
L-132XYC	GaAsP/GaP	588	water clear	8	20	50	
L-132XGD	GaP	568	green diffused	8	15	60	
L-132XGT	GaP	568	green transparent	18	40	50	
L-132XGC	GaP	568	water clear	18	40	50	
L-132XPGD	GaP	555	green diffused	1.8	5	60	
L-132XPGT	GaP	555	green transparent	3	10	50	
L-132XPGC	GaP	555	water clear	3	10	50	
L-34HD	GaP	660	red diffused	1	3	60	T-1 (3mm) Round 
L-34ID	GaAsP/GaP	625	red diffused	8	25	60	
L-34YD	GaAsP/GaP	588	yellow diffused	1.8	6	60	
L-34AD	GaAsP/GaP	588	amber diffused	8	15	60	
L-34GD	GaP	568	green diffused	5	20	60	
L-174XHT	GaP	660	red transparent	1.8	5	100	3.2mm Round 
L-174XIT	GaAsP/GaP	625	red transparent	8	30	100	
L-174XSRT	GaAlAs	640	red transparent	*110	*400	100	
L-174XYT	GaAsP/GaP	588	yellow transparent	8	30	100	
L-174XGT	GaP	568	green transparent	8	30	100	
L-174A2HT	GaP	660	red transparent	1.8	6	35	3.2mm Round 
L-174A2IT	GaAsP/GaP	625	red transparent	28	90	35	
L-174A2SRT	GaAlAs	640	red transparent	*380	*900	35	
L-174A2YT	GaAsP/GaP	588	yellow transparent	18	35	35	
L-174A2GT	GaP	568	green transparent	12	40	35	
L-44HD	GaP	660	red diffused	0.7	2	80	4mm Round 
L-44ID	GaAsP/GaP	625	red diffused	5	15	80	
L-44YD	GaAsP/GaP	588	yellow diffused	3	10	80	
L-44GD	GaP	568	green diffused	3	12	80	

**NOTES:**

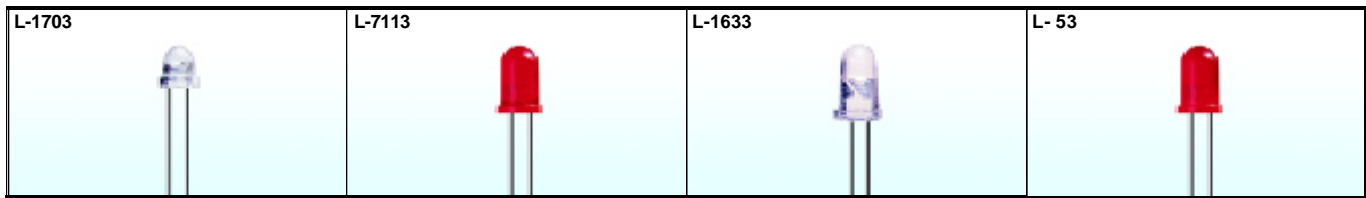
- All dimensions are in millimeters (inches).
- Tolerance is  $\pm 0.25\text{mm}$  ( $0.01''$ ) unless otherwise noted.



Part No.	Material	I D (nm)	Lens Type	Iv (mcd) @10mA *20mA		Viewing Angle 2 $\phi$ 1/2	Dimension
				Min.	Typ.		
L-1503ID	GaAsP/GaP	625	red diffused	8	30	60	T-1 3/4 (5mm) Round 
L-1503IT	GaAsP/GaP	625	red transparent	28	80	30	
L-1503EC	GaAsP/GaP	625	water clear	28	80	30	
L-1503SRC-D	GaAlAs	640	water clear	*900	*1500	30	
L-1503SRC-E	GaAlAs	640	water clear	*1800	*2800	30	
L-1503SRC-F	GaAlAs	640	water clear	*3300	*4000	30	
L-1503SRD	GaAlAs	640	red diffused	*110	*400	60	
L-1503YD	GaAsP/GaP	588	yellow diffused	5	20	60	
L-1503YT	GaAsP/GaP	588	yellow transparent	18	40	30	
L-1503YC	GaAsP/GaP	588	water clear	18	40	30	
L-1503GD	GaP	568	green diffused	5	20	60	
L-1503GT	GaP	568	green transparent	18	60	30	
L-1503GC	GaP	568	water clear	18	60	30	
L-1503SGC	GaP	568	water clear	*70	*200	30	
L-1503SGT	GaP	568	green transparent	*70	*150	30	
L-1513IT	GaAsP/GaP	625	red transparent	40	80	20	T-1 3/4 (5mm) Round 
L-1513EC	GaAsP/GaP	625	water clear	40	80	20	
L-1513SURC	InGaAlP	628	water clear	*1200	*1800	20	
L-1513SURC-E	InGaAlP	630	water clear	*1500	*2200	20	
L-1513YT	GaAsP/GaP	588	yellow transparent	18	40	20	
L-1513YC	GaAsP/GaP	588	water clear	18	40	20	
L-1513GT	GaP	568	green transparent	18	50	20	
L-1513GC	GaP	568	water clear	18	50	20	
L-63ID	GaAsP/GaP	625	red diffused	12	20	60	T-1 3/4 (5mm) Round 
L-63IT	GaAsP/GaP	625	red transparent	28	50	30	
L-63SRD	GaAlAs	640	red diffused	*110	*300	60	
L-63SRT	GaAlAs	640	red transparent	*280	*600	30	
L-63SRC	GaAlAs	640	water clear	*180	*700	30	
L-63YD	GaAsP/GaP	588	yellow diffused	5	10	60	
L-63YT	GaAsP/GaP	588	yellow transparent	18	35	30	
L-63GD	GaP	568	green diffused	5	12	60	
L-63GT	GaP	568	green transparent	18	40	30	
L-1543SRC-C	GaAlAs	640	water clear	*380	*600	50	T-1 3/4 (5mm) Round 
L-1543SRC-D	GaAlAs	640	water clear	*650	*900	50	
L-1543SRC-E	GaAlAs	640	water clear	*900	*2000	50	
L-1543SURC	InGaAlP	628	water clear	*480	*850	50	
L-1543SURC-E	InGaAlP	630	water clear	*650	*1300	50	
L-1543SGC	GaP	568	water clear	*70	*150	50	
L-7143SRC-C	GaAlAs	640	water clear	*380	*600	30	T-1 3/4 (5mm) Round 
L-7143SRC-D	GaAlAs	640	water clear	*650	*900	30	
L-7143SRC-E	GaAlAs	640	water clear	*900	*2000	30	
L-7143SGC	GaP	568	water clear	*70	*150	30	

**NOTES:**

1. All dimensions are in millimeters (inches).
2. Tolerance is  $\pm 0.25\text{mm}$  ( $0.01''$ ) unless otherwise noted.



Part No.	Material	λ D (nm)	Lens Type	Iv (mcd) @10mA *20mA		Viewing Angle 2 $\theta$ 1/2	Dimension
				Min.	Typ.		

L-1703SURC	InGaAlP	628	water clear	*280	*700	50	T-1 3/4 (5mm) Round 
L-1703SURC-E	InGaAlP	630	water clear	*650	*1000	50	

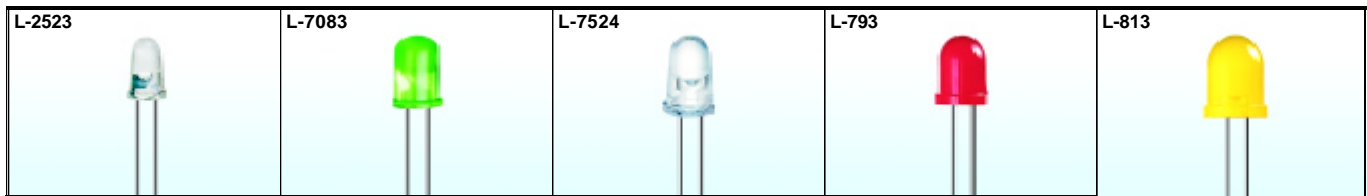
L-7113ID	GaAsP/GaP	625	red diffused	8	25	30	T-1 3/4 (5mm) Round 
L-7113IT	GaAsP/GaP	625	red transparent	28	80	20	
L-7113EC	GaAsP/GaP	625	water clear	28	80	20	
L-7113ED	GaAsP/GaP	625	orange diffused	8	25	30	
L-7113ND	GaAsP/GaP	610	orange diffused	12	30	30	
L-7113NT	GaAsP/GaP	610	orange transparent	40	80	20	
L-7113NC	GaAsP/GaP	610	water clear	40	80	20	
L-7113YD	GaAsP/GaP	588	yellow diffused	5	20	30	
L-7113YT	GaAsP/GaP	588	yellow transparent	18	40	20	
L-7113YC	GaAsP/GaP	588	water clear	18	40	20	
L-7113GD	GaP	568	green diffused	5	20	30	
L-7113GT	GaP	568	green transparent	18	60	20	
L-7113GC	GaP	568	water clear	18	60	20	
L-7113PGD	GaP	555	green diffused	1.8	5	30	
L-7113PGT	GaP	555	green transparent	5	10	20	
L-7113PGC	GaP	555	water clear	5	10	20	

L-1633SURC	InGaAlP	628	water clear	*650	*1600	50	T-1 3/4 (5mm) Round 
L-1633SURC-E	InGaAlP	630	water clear	*1200	*2000	50	

L-53HD	GaP	660	red diffused	1.8	5	60	T-1 3/4 (5mm) Round 
L-53ID	GaAsP/GaP	625	red diffused	8	25	60	
L-53IT	GaAsP/GaP	625	red transparent	28	80	30	
L-53EC	GaAsP/GaP	625	water clear	28	80	30	
L-53ED	GaAsP/GaP	625	orange diffused	8	25	60	
L-53ND	GaAsP/GaP	610	orange diffused	12	30	60	
L-53NT	GaAsP/GaP	610	orange transparent	40	80	30	
L-53NC	GaAsP/GaP	610	water clear	40	80	30	
L-53YD	GaAsP/GaP	588	yellow diffused	5	20	60	
L-53YT	GaAsP/GaP	588	yellow transparent	18	40	30	
L-53YC	GaAsP/GaP	588	water clear	18	40	30	
L-53GD	GaP	568	green diffused	5	20	60	
L-53GT	GaP	568	green transparent	18	60	30	
L-53GC	GaP	568	water clear	18	60	30	
L-53PGD	GaP	555	green diffused	1.8	5	60	
L-53PGT	GaP	555	green transparent	5	10	30	
L-53PGC	GaP	555	water clear	5	10	30	

**NOTES:**

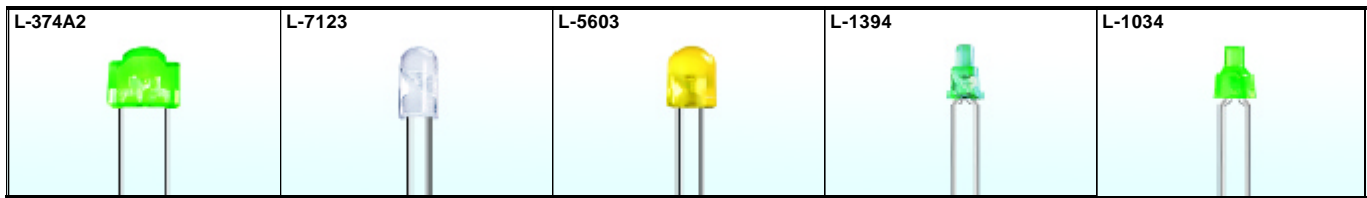
1. All dimensions are in millimeters (inches).
2. Tolerance is  $\pm 0.25\text{mm}$  ( $0.01''$ ) unless otherwise noted.



Part No.	Material	λ D (nm)	Lens Type	Iv (mcd) @10mA *20mA		Viewing Angle 2 $\theta$ 1/2	Dimension
				Min.	Typ.		
L-2523SURC	InGaAlP	628	water clear	*1200	*2000	12	T-1 3/4 (5mm) Round 
L-2523SURC-E	InGaAlP	630	water clear	*1500	*2500	12	
L-7083SED-H	InGaAlP	630	orange diffused	*2200	*3600	60	5mm Round 
L-7083SYD-H	InGaAlP	589	yellow diffused	*180	*420	60	
L-7083VGD-H	InGaN	525	green diffused	*1500	*2200	60	
L-7083PBD-H	InGaN	470	blue diffused	*280	*450	60	
L-7083PWW-H	InGaN	-	white diffused	*480	*1000	60	
				X=0.33, Y=0.34			
L-7524SEC-H	InGaAlP	630	water clear	*3800	*7500	12	5mm Round 
L-7524SYC-H	InGaAlP	589	water clear	*1800	*2800	12	
L-7524VGC-H	InGaN	525	water clear	*7500	*13000	12	
L-7524PBC-H	InGaN	470	water clear	*1800	*3300	12	
L-7524PWC-H	InGaN	-	water clear	*3800	*7500	12	
				X=0.33, Y=0.34			
L-793ID	GaAsP/GaP	625	red diffused	*36	*100	60	8mm Round 
L-793SRC-D	GaAlAs	640	water clear	*1500	*1700	40	
L-793SRC-E	GaAlAs	640	water clear	*1800	*2700	40	
L-793SRC-F	GaAlAs	640	water clear	*2800	*3800	40	
L-793SRD-C	GaAlAs	640	red diffused	*180	*250	60	
L-793SRD-D	GaAlAs	640	red diffused	*280	*350	60	
L-793SRD-E	GaAlAs	640	red diffused	*380	*450	60	
L-793SRD-F	GaAlAs	640	red diffused	*480	*600	60	
L-793SRD-G	GaAlAs	640	red diffused	*650	*700	60	
L-793SRD-H	GaAlAs	640	red diffused	*900	*1200	60	
L-793ED	GaAsP/GaP	625	orange diffused	*36	*100	60	
L-793YD	GaAsP/GaP	588	yellow diffused	*18	*50	60	
L-793GD	GaP	568	green diffused	*18	*60	60	
L-813ID	GaAsP/GaP	625	red diffused	*36	*100	60	10mm Round 
L-813SRC-D	GaAlAs	640	water clear	*1500	*1700	40	
L-813SRC-E	GaAlAs	640	water clear	*1800	*2700	40	
L-813SRC-F	GaAlAs	640	water clear	*2800	*3800	40	
L-813SRD-C	GaAlAs	640	red diffused	*180	*250	60	
L-813SRD-D	GaAlAs	640	red diffused	*280	*350	60	
L-813SRD-E	GaAlAs	640	red diffused	*380	*450	60	
L-813SRD-F	GaAlAs	640	red diffused	*480	*600	60	
L-813SRD-G	GaAlAs	640	red diffused	*650	*700	60	
L-813SRD-H	GaAlAs	640	red diffused	*900	*1200	60	
L-813ED	GaAsP/GaP	625	orange diffused	*36	*100	60	
L-813YD	GaAsP/GaP	588	yellow diffused	*18	*50	60	
L-813GD	GaP	568	green diffused	*18	*60	60	

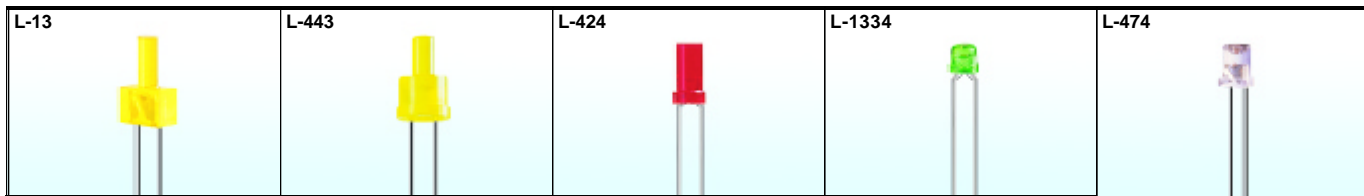
NOTES:

1. All dimensions are in millimeters (inches).
2. Tolerance is  $\pm 0.25\text{mm}$  (0.01") unless otherwise noted.



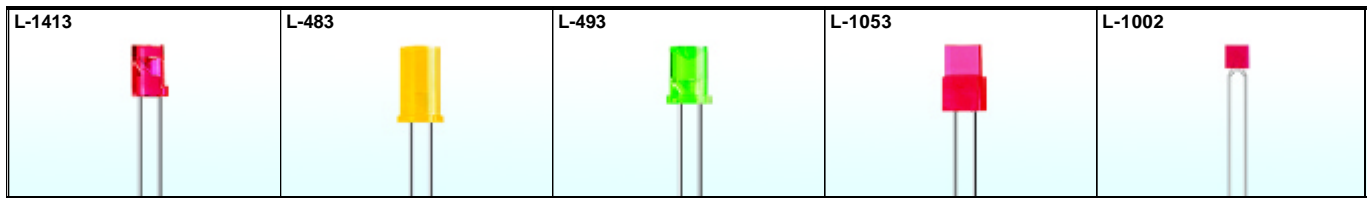
Part No.	Material	I D (nm)	Lens Type	Iv (mcd) @10mA *20mA		Viewing Angle 2 $\theta$ 1/2	Dimension
				Min.	Typ.		
L-374A2IT	GaAsP/GaP	625	red transparent	8	20	60 (H) 55 (V)	3.6mm x 3.1mm Oval 
L-374A2AT	GaAsP/GaP	588	amber transparent	3	9	60 (H) 55 (V)	
L-374A2YT	GaAsP/GaP	588	yellow transparent	3	10	60 (H) 55 (V)	
L-374A2GT	GaP	568	green transparent	5	15	60 (H) 55 (V)	
L-7123SURC	InGaAlP	628	water clear	*280	*600	30° (H) 88° (V)	4mm Oval 
L-7123SYC	InGaAlP	588	water clear	*110	*250	30° (H) 88° (V)	
L-7123MGC	InGaAlP	568	water clear	*110	*250	30° (H) 88° (V)	
L-7123VGC	InGaN	525	water clear	*380	*800	30° (H) 88° (V)	
L-5603SIDL-H/SD	InGaAlP	630	red semi diffused	*1500	*2500	100° (H) 50° (V)	5.2mm Oval 
L-5603SYDL-H/SD	InGaAlP	589	yellow semi diffused	*380	*750	100° (H) 50° (V)	
L-5603VGDL-H/SD	InGaN	525	green semi diffused	*650	*2100	100° (H) 50° (V)	
L-5603PBDL-H/SD	InGaN	470	blue semi diffused	*480	*1100	100° (H) 50° (V)	
L-1394HD	GaP	660	red diffused	0.4	1	120	2mm Flat Top 
L-1394ID	GaAsP/GaP	625	red diffused	5	8	120	
L-1394YD	GaAsP/GaP	588	yellow diffused	1.8	5	120	
L-1394GD	GaP	568	green diffused	3	5	120	
L-1034HD	GaP	660	red diffused	0.4	1	70	2mm Flat Top 
L-1034ID	GaAsP/GaP	625	red diffused	3	8	70	
L-1034YD	GaAsP/GaP	588	yellow diffused	1.8	5	70	
L-1034GD	GaP	568	green diffused	1.8	6	70	

NOTES:  
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 2. Tolerance is  $\pm 0.25\text{mm}$  (0.01") unless otherwise noted.



Part No.	Material	λ D (nm)	Lens Type	Iv (mcd) @10mA *20mA		Viewing Angle 2 $\theta$ 1/2	Dimension
				Min.	Typ.		
L-13HD	GaP	660	red diffused	0.4	1.5	70	2mm Flat Top 
L-13ID	GaAsP/GaP	625	red diffused	5	10	70	
L-13YD	GaAsP/GaP	588	yellow diffused	3	8	70	
L-13GD	GaP	568	green diffused	3	10	70	
L-443HDT	GaP	660	red diffused	0.4	2	100	2.4mm Flat Top 
L-443IDT	GaAsP/GaP	625	red diffused	3	10	100	
L-443EDT	GaAsP/GaP	625	orange diffused	3	10	100	
L-443YDT	GaAsP/GaP	588	yellow diffused	1	5	100	
L-443GDT	GaP	568	green diffused	1	5	100	
L-424HDT	GaP	660	red diffused	0.4	1	100	T-1 (3mm) Cylindrical 
L-424IDT	GaAsP/GaP	625	red diffused	3	5	100	
L-424SRDT	GaAlAs	640	red diffused	*36	*100	100	
L-424EDT	GaAsP/GaP	625	orange diffused	3	5	100	
L-424YDT	GaAsP/GaP	588	yellow diffused	1	4	100	
L-424GDT	GaP	568	green diffused	1	4	100	
L-1334IT	GaAsP/GaP	625	red transparent	3	5	130	T-1 (3mm) Cylindrical 
L-1334EC	GaAsP/GaP	625	water clear	3	5	130	
L-1334SRT	GaAlAs	640	red transparent	*18	*60	130	
L-1334SRC	GaAlAs	640	water clear	*18	*60	130	
L-1334SRWT	GaAlAs	640	white diffused	*18	*50	130	
L-1334NT	GaAsP/GaP	610	orange transparent	3	8	130	
L-1334NC	GaAsP/GaP	610	water clear	3	8	130	
L-1334YT	GaAsP/GaP	588	yellow transparent	1	3	130	
L-1334YC	GaAsP/GaP	588	water clear	1	3	130	
L-1334GT	GaP	568	green transparent	1.8	6	130	
L-1334GC	GaP	568	water clear	1.8	6	130	
L-1334SGT	GaP	568	green transparent	*4	*10	130	
L-1334SGC	GaP	568	water clear	*4	*10	130	
L-1334PGT	GaP	555	green transparent	0.7	1.5	130	
L-1334PGC	GaP	555	water clear	0.7	1.5	130	
L-474IT	GaAsP/GaP	625	red transparent	3	8	130	T-1 (3mm) Cylindrical 
L-474EC	GaAsP/GaP	625	water clear	3	8	130	
L-474YT	GaAsP/GaP	588	yellow transparent	1.8	5	130	
L-474YC	GaAsP/GaP	588	water clear	1.8	5	130	
L-474GT	GaP	568	green transparent	1.8	5	130	
L-474GC	GaP	568	water clear	1.8	5	130	

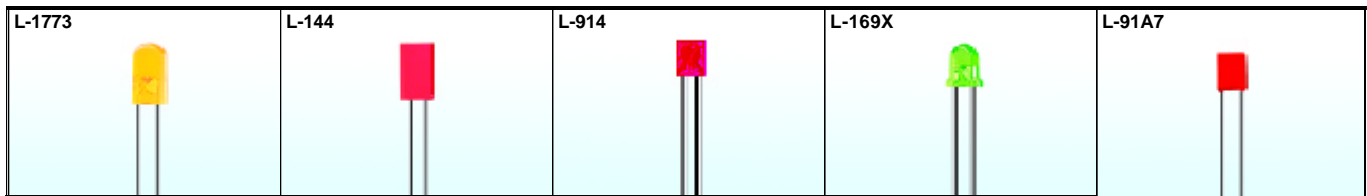
NOTES:  
 1. All dimensions are in millimeters (inches).  
 2. Tolerance is ±0.25mm (0.01") unless otherwise noted.



Part No.	Material	λ D (nm)	Lens Type	Iv (mcd) @10mA *20mA		Viewing Angle 2 $\theta$ 1/2	Dimension
				Min.	Typ.		
L-1413HDT	GaP	660	red diffused	0.3	1	100	4mm Cylindrical 
L-1413IDT	GaAsP/GaP	625	red diffused	3	5	100	
L-1413ITL	GaAsP/GaP	625	red transparent	12	20	70	
L-1413SRDT	GaAlAs	640	red diffused	*50	*80	100	
L-1413YDT	GaAsP/GaP	588	yellow diffused	1	3	100	
L-1413GDT	GaP	568	green diffused	1	3	100	
L-1413SGDL	GaP	568	green diffused	*2.6	*10	100	
L-483HDT	GaP	660	red diffused	0.4	1	100	T-1 3/4 (5mm) Cylindrical 
L-483IDT	GaAsP/GaP	625	red diffused	1.8	5	100	
L-483EDT	GaAsP/GaP	625	orange diffused	3	7	100	
L-483YDT	GaAsP/GaP	588	yellow diffused	1	4	100	
L-483GDT	GaP	568	green diffused	1	4	100	
L-483SRSGW	GaAlAs	640	white diffused	*18	*50	80	
	GaP	568		*4	*10		
L-493IT	GaAsP/GaP	625	red transparent	1.8	6	140	T-1 3/4 (5mm) Cylindrical 
L-493EC	GaAsP/GaP	625	water clear	1.8	6	140	
L-493YT	GaAsP/GaP	588	yellow transparent	1	4	140	
L-493YC	GaAsP/GaP	588	water clear	1	4	140	
L-493GT	GaP	568	green transparent	1.8	5	140	
L-493GC	GaP	568	water clear	1.8	5	140	
L-1053HDT	GaP	660	red diffused	0.4	1	110	1mm x 5mm Rectangular 
L-1053IDT	GaAsP/GaP	625	red diffused	3	8	110	
L-1053YDT	GaAsP/GaP	588	yellow diffused	1.8	5	110	
L-1053GDT	GaP	568	green diffused	1.8	5	110	
L-1002HD	GaP	660	red diffused	0.3	0.7	110	1.1mm x 3.4mm Rectangular 
L-1002ID	GaAsP/GaP	625	red diffused	1	3	110	
L-1002YD	GaAsP/GaP	588	yellow diffused	0.4	2.5	110	
L-1002GD	GaP	568	green diffused	0.4	2.5	110	

NOTES:

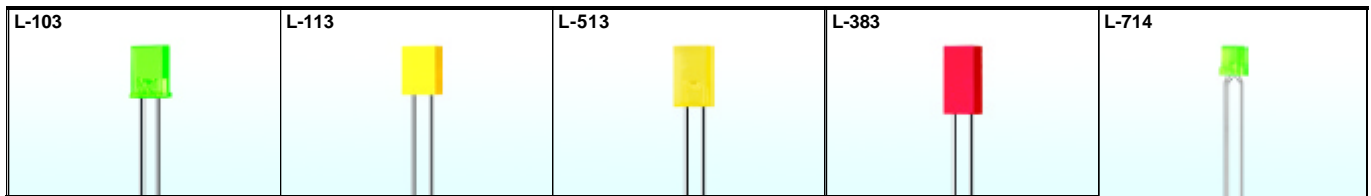
1. All dimensions are in millimeters (inches).
2. Tolerance is  $\pm 0.25\text{mm}$  ( $0.01''$ ) unless otherwise noted.



Part No.	Material	λ D (nm)	Lens Type	Iv (mcd) @10mA *20mA		Viewing Angle 2 $\theta$ 1/2	Dimension
				Min.	Typ.		
L-1773HD	GaP	660	red diffused	0.7	2	100	1.75mm x 4mm Rectangular 
L-1773ID	GaAsP/GaP	625	red diffused	5	10	100	
L-1773ED	GaAsP/GaP	625	orange diffused	5	10	100	
L-1773ND	GaAsP/GaP	610	orange diffused	5	8	100	
L-1773YD	GaAsP/GaP	588	yellow diffused	3	8	100	
L-1773GD	GaP	568	green diffused	3	10	100	
L-144HDT	GaP	660	red diffused	0.4	1	110	1.9mm x 3.9mm Rectangular 
L-144IDT	GaAsP/GaP	625	red diffused	3	6	110	
L-144SRDT	GaAlAs	640	red diffused	*36	*70	110	
L-144EDT	GaAsP/GaP	625	orange diffused	3	6	110	
L-144YDT	GaAsP/GaP	588	yellow diffused	1	3	110	
L-144GDT	GaP	568	green diffused	1	4	110	
L-914HD	GaP	660	red diffused	0.2	1	100	2mm x 3mm Rectangular 
L-914HT	GaP	660	red transparent	0.4	1	90	
L-914ID	GaAsP/GaP	625	red diffused	1.8	8	100	
L-914IT	GaAsP/GaP	625	red transparent	3	8	90	
L-914ED	GaAsP/GaP	625	orange diffused	1.8	8	100	
L-914ET	GaAsP/GaP	625	orange transparent	3	8	90	
L-914AD	GaAsP/GaP	588	amber diffused	1.8	5	100	
L-914AT	GaAsP/GaP	588	amber transparent	1.8	7	90	
L-914GD	GaP	568	green diffused	1.8	6	100	
L-914GT	GaP	568	green transparent	3	8	90	
L-914PGT	GaP	555	green transparent	0.4	1	90	
L-169XHD	GaP	660	red diffused	1	3	100	2mm x 3mm Rectangular 
L-169XHT	GaP	660	red transparent	1.8	5	30	
L-169XID	GaAsP/GaP	625	red diffused	8	15	100	
L-169XIT	GaAsP/GaP	625	red transparent	12	30	30	
L-169XYD	GaAsP/GaP	588	yellow diffused	5	10	100	
L-169XYT	GaAsP/GaP	588	yellow transparent	5	15	30	
L-169XAT	GaAsP/GaP	588	amber transparent	5	15	30	
L-169XGD	GaP	568	green diffused	5	15	100	
L-169XGT	GaP	568	green transparent	5	20	30	
L-169XPGD	GaP	555	green diffused	1.8	5	100	
L-169XPGTL	GaP	555	green transparent	3	8	30	
L-91A7ID	GaAsP/GaP	625	red diffused	3	8	60	2mm x 3mm Rectangular 
L-91A7YD	GaAsP/GaP	588	yellow diffused	1	3.5	60	
L-91A7GD	GaP	568	green diffused	3	7	60	

**NOTES:**

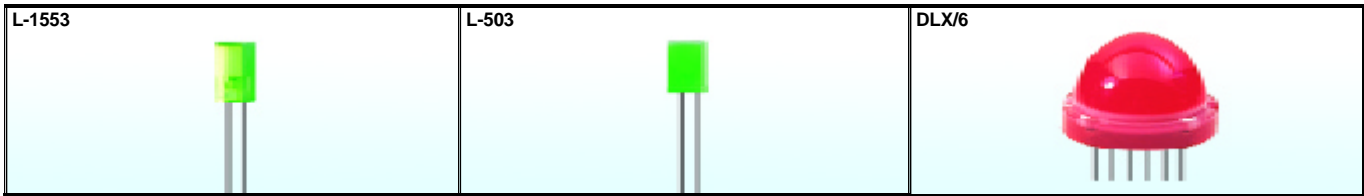
1. All dimensions are in millimeters (inches).
2. Tolerance is  $\pm 0.25\text{mm}$  ( $0.01''$ ) unless otherwise noted.



Part No.	Material	λ D (nm)	Lens Type	Iv (mcd) @10mA *20mA		Viewing Angle 2 $\phi$ 1/2	Dimension
				Min.	Typ.		
L-103HD	GaP	660	red diffused	0.4	1	110	2mm x 5mm Rectangular 
L-103ID	GaAsP/GaP	625	red diffused	3	5	110	
L-103SRD	GaAlAs	640	red diffused	*36	*80	110	
L-103ED	GaAsP/GaP	625	orange diffused	3	5	110	
L-103YD	GaAsP/GaP	588	yellow diffused	1	4	110	
L-103GD	GaP	568	green diffused	1.8	5	110	
L-113HDT	GaP	660	red diffused	0.4	1	110	2mm x 5mm Rectangular 
L-113IDT	GaAsP/GaP	625	red diffused	3	5	110	
L-113SRDT	GaAlAs	640	red diffused	*36	*80	110	
L-113EDT	GaAsP/GaP	625	orange diffused	3	5	110	
L-113YDT	GaAsP/GaP	588	yellow diffused	1	4	110	
L-113GDT	GaP	568	green diffused	1.8	5	110	
L-113SRSGWT	GaAlAs	640	white diffused	*36	*70	100	
	GaP	568	white diffused	*7	*10	100	
L-513HDT	GaP	660	red diffused	0.4	1	110	2.5mm x 5mm Rectangular 
L-513IDT	GaAsP/GaP	625	red diffused	1.8	5	110	
L-513EDT	GaAsP/GaP	625	orange diffused	1.8	5	110	
L-513YDT	GaAsP/GaP	588	yellow diffused	1	3	110	
L-513GDT	GaP	568	green diffused	1	3	110	
L-513SGDT	GaP	568	green diffused	*7	*10	110	
L-383HDT	GaP	660	red diffused	0.4	1	110	2.5mm x 5mm Rectangular 
L-383IDT	GaAsP/GaP	625	red diffused	3	5	110	
L-383SRDT	GaAlAs	640	red diffused	*36	*70	110	
L-383SRWT	GaAlAs	640	white diffused	*36	*70	110	
L-383EDT	GaAsP/GaP	625	orange diffused	3	5	110	
L-383YDT	GaAsP/GaP	588	yellow diffused	1	4	110	
L-383GDT	GaP	568	green diffused	1	4	110	
L-383SGWT	GaP	568	white diffused	*7	*15	110	
L-714HD	GaP	660	red diffused	0.4	1	110	3mm x 3mm Square 
L-714ID	GaAsP/GaP	625	red diffused	3	5	110	
L-714SRD	GaAlAs	640	red diffused	*36	*70	110	
L-714ED	GaAsP/GaP	625	orange diffused	3	5	110	
L-714YD	GaAsP/GaP	588	yellow diffused	1	5	110	
L-714GD	GaP	568	green diffused	1	5	110	

**NOTES:**

- All dimensions are in millimeters (inches).
- Tolerance is  $\pm 0.25\text{mm}$  ( $0.01''$ ) unless otherwise noted.



Part No.	Material	λ D (nm)	Lens Type	Iv (mcd) @10mA *20mA		Viewing Angle 2θ1/2	Dimension
				Min.	Typ.		
L-1553HDT	GaP	660	red diffused	0.4	1	110	5mm x 5mm Square 
L-1553IDT	GaAsP/GaP	625	red diffused	3	8	110	
L-1553SRDT	GaAlAs	640	red diffused	*36	*80	110	
L-1553EDT	GaAsP/GaP	625	orange diffused	3	8	110	
L-1553YDT	GaAsP/GaP	588	yellow diffused	1	5	110	
L-1553GDT	GaP	568	green diffused	1	5	110	
L-503HDT	GaP	660	red diffused	0.4	1	110	5mm x 5mm Square 
L-503IDT	GaAsP/GaP	625	red diffused	3	6	110	
L-503YDT	GaAsP/GaP	588	yellow diffused	1	3	110	
L-503GDT	GaP	568	green diffused	1	3	110	
DLA/6ID DLC/6ID	GaAsP/GaP	625	red diffused	12	50	120	20mm <p>ORIENTATION MARK</p> <p>DLA/6 1 3 5 7 9 11 2 4 6 8 10 12</p> <p>DLC/6 1 3 5 7 9 11 2 4 6 8 10 12</p>
DLA/6SRD DLC/6SRD	GaAlAs	640	red diffused	*100	*400	120	
DLA/6YD DLC/6YD	GaAsP/GaP	588	yellow diffused	12	50	120	
DLA/6GD DLC/6GD	GaP	568	green diffused	20	80	120	
DLA/6SGD DLC/6SGD	GaP	568	green diffused	*70	*200	120	

NOTES:

1. All dimensions are in millimeters (inches).
2. Tolerance is ±0.25mm (0.01") unless otherwise noted.

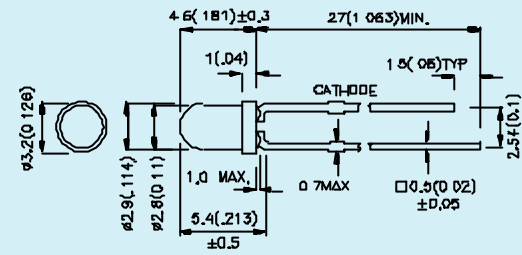
L-7104



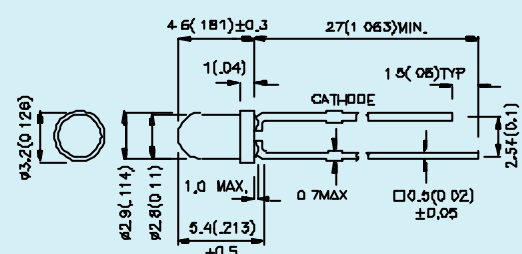
L-934



Part No.	Material	l D (nm)	Lens Type	Iv (mcd) @10mA *20mA		Viewing Angle 2 $\theta$ 1/2	Dimension
				Min.	Typ.		
L-7104SRC-D	GaAlAs	640	water clear	480	600	34	T-1 (3mm) Round
L-7104SRC-E	GaAlAs	640	water clear	650	800	34	
L-7104SRC-F	GaAlAs	640	water clear	900	1100	34	
L-7104SRC-G	GaAlAs	640	water clear	1200	1300	34	
L-7104SRC-H	GaAlAs	640	water clear	1500	1700	34	
L-7104SRC-J	GaAlAs	640	water clear	1800	2300	34	
L-7104SRD-D	GaAlAs	640	red diffused	110	150	40	
L-7104SRD-E	GaAlAs	640	red diffused	180	250	40	
L-7104SRD-F	GaAlAs	640	red diffused	280	350	40	
L-7104SRD-G	GaAlAs	640	red diffused	380	500	40	
L-7104SRD-H	GaAlAs	640	red diffused	650	800	40	
L-7104SRD-J	GaAlAs	640	red diffused	900	1200	40	
L-7104SURC-E	InGaAlP	630	water clear	900	1300	34	
L-7104SEC	InGaAlP	601	water clear	480	1300	34	
L-7104SET	InGaAlP	601	orange transparent	480	1300	34	
L-7104SED	InGaAlP	601	orange diffused	280	800	40	
L-7104SEC-E	InGaAlP	621	water clear	900	2000	34	
L-7104SEC-H	InGaAlP	630	water clear	1800	3500	34	
L-7104SYC	InGaAlP	588	water clear	280	700	34	
L-7104SYT	InGaAlP	588	yellow transparent	280	700	34	
L-7104SYD	InGaAlP	588	yellow diffused	110	250	40	
L-7104SYC-H	InGaAlP	589	water clear	480	900	34	
L-7104SGC	GaP	568	water clear	70	150	34	
L-7104SGD	GaP	568	green diffused	18	40	40	
L-7104CGCK	InGaAlP	570	water clear	110	350	34	
L-7104VGC-E	InGaN	525	water clear	1500	2000	34	
L-7104MBDK	GaN	466	blue diffused	7	25	30	
L-7104MBTK	GaN	466	blue transparent	10	40	20	
L-7104MBCK	GaN	466	water clear	18	60	20	
L-7104PBD	InGaN	470	blue diffused	70	200	30	
L-7104PBT	InGaN	470	blue transparent	110	250	20	
L-7104PBC	InGaN	470	water clear	180	450	20	
L-7104PBC-E	InGaN	470	water clear	280	550	20	
L-7104MWC	GaN	-	water clear	50	180	34	
L-7104PWC	InGaN	-	water clear	180	600	34	
				X=0.33, Y=0.34			
				X=0.33, Y=0.34			

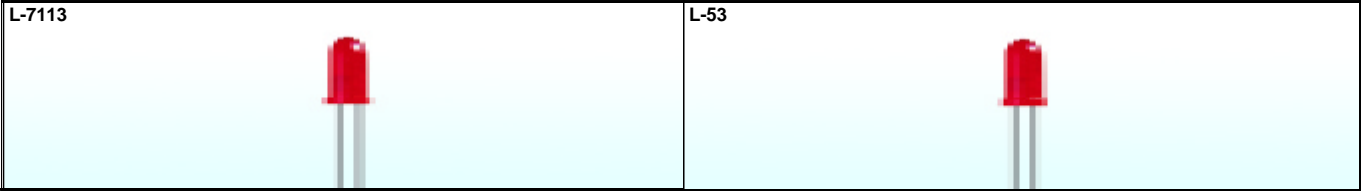


L-934SRC-D	GaAlAs	640	water clear	480	600	50	T-1 (3mm) Round
L-934SRC-E	GaAlAs	640	water clear	650	800	50	
L-934SRC-F	GaAlAs	640	water clear	900	1100	50	
L-934SRC-G	GaAlAs	640	water clear	1200	1300	50	
L-934SRC-H	GaAlAs	640	water clear	1500	1700	50	
L-934SRC-J	GaAlAs	640	water clear	1800	2300	50	
L-934SRD-D	GaAlAs	640	red diffused	110	150	60	
L-934SRD-E	GaAlAs	640	red diffused	180	250	60	
L-934SRD-F	GaAlAs	640	red diffused	280	350	60	
L-934SRD-G	GaAlAs	640	red diffused	380	500	60	
L-934SRD-H	GaAlAs	640	red diffused	650	800	60	
L-934SRD-J	GaAlAs	640	red diffused	900	1200	60	
L-934SURC	InGaAlP	628	water clear	480	1000	50	
L-934SURC-E	InGaAlP	630	water clear	900	1300	50	
L-934SEC	InGaAlP	601	water clear	480	1300	50	
L-934SET	InGaAlP	601	orange transparent	480	1300	50	
L-934SED	InGaAlP	601	orange diffused	280	800	60	
L-934SEC-E	InGaAlP	621	water clear	900	2000	50	
L-934SEC-H	InGaAlP	630	water clear	1800	3500	50	
L-934SYC	InGaAlP	588	water clear	280	700	50	
L-934SYT	InGaAlP	588	yellow transparent	280	700	50	
L-934SYD	InGaAlP	588	yellow diffused	110	250	60	
L-934SYC-H	InGaAlP	589	water clear	480	900	50	
L-934SGC	GaP	568	water clear	70	150	50	
L-934SGD	GaP	568	green diffused	18	40	60	
L-934CGCK	InGaAlP	570	water clear	110	350	50	
L-934VGC-E	InGaN	525	water clear	1500	2000	50	
L-934MBD	GaN	466	blue diffused	18	50	60	
L-934MBT	GaN	466	blue transparent	36	60	20	
L-934MBC	GaN	466	water clear	36	80	20	
L-934MBDK	GaN	466	blue diffused	7	25	60	
L-934MBTK	GaN	466	blue transparent	10	40	20	
L-934MBCK	GaN	466	water clear	18	60	20	
L-934PBC-E	InGaN	470	water clear	280	550	20	

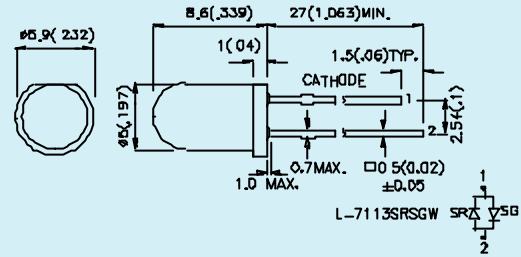


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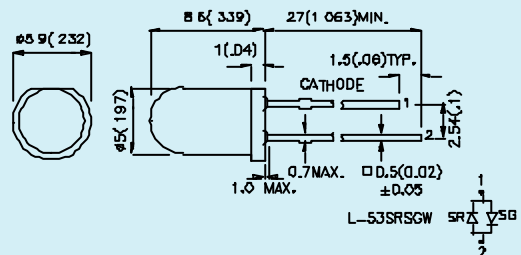
1. All dimensions are in millimeters (inches).
2. Tolerance is  $\pm 0.25\text{mm}$  (0.01") unless otherwise noted.



Part No.	Material	I D (nm)	Lens Type	Iv (mcd) @10mA *20mA		Viewing Angle 2 $\phi$ 1/2	Dimension
				Min.	Typ.		
L-7113SRC-DU	GaAlAs	640	water clear	900	1100	20	T-1 3/4 (5mm) Round
L-7113SRC-DV	GaAlAs	640	water clear	1200	1400	20	
L-7113SRC-DW	GaAlAs	640	water clear	1500	1700	20	
L-7113SRC-E	GaAlAs	640	water clear	1800	2800	20	
L-7113SRC-F	GaAlAs	640	water clear	3300	4000	20	
L-7113SRD-D	GaAlAs	640	red diffused	180	250	30	
L-7113SRD-E	GaAlAs	640	red diffused	280	400	30	
L-7113SRD-F	GaAlAs	640	red diffused	480	600	30	
L-7113SRD-G	GaAlAs	640	red diffused	650	800	30	
L-7113SRD-H	GaAlAs	640	red diffused	900	1500	30	
L-7113SURC	InGaAlP	628	water clear	1200	1400	20	
L-7113SURC-E	InGaAlP	630	water clear	1500	2200	20	
L-7113SEC	InGaAlP	601	water clear	650	2500	20	
L-7113SET	InGaAlP	601	orange transparent	650	2500	20	
L-7113SED	InGaAlP	601	orange diffused	380	800	30	
L-7113SEC-E	InGaAlP	621	water clear	1500	5000	20	
L-7113SEC-H	InGaAlP	630	water clear	6700	10000	20	
L-7113SYC	InGaAlP	588	water clear	380	1200	20	
L-7113SYT	InGaAlP	588	yellow transparent	380	1200	20	
L-7113SYD	InGaAlP	588	yellow diffused	110	400	30	
L-7113SYC-H	InGaAlP	589	water clear	1500	2100	20	
L-7113SGC	GaP	568	water clear	70	200	20	
L-7113SGD	GaP	568	green diffused	18	40	30	
L-7113CGCK	InGaAlP	570	water clear	380	900	20	
L-7113VGC-E	InGaN	525	water clear	2800	4500	20	
L-7113MBDK	GaN	466	blue diffused	10	40	20	
L-7113MBTK	GaN	466	blue transparent	36	65	16	
L-7113MBCK	GaN	466	water clear	50	110	16	
L-7113PBD	InGaN	470	blue diffused	70	400	20	
L-7113PBT	InGaN	470	blue transparent	280	450	16	
L-7113PBC	InGaN	470	water clear	280	1000	16	
L-7113PBC-E	InGaN	470	water clear	650	1200	16	
L-7113MWC	GaN	-	water clear	70	200	20	
L-7114PWC	InGaN	-	water clear	480	1200	20	
L-7113SRSGW	GaAlAs	640	white diffused	110	200	35	
	GaP	568	white diffused	18	60	35	



L-53SRC-DU	GaAlAs	640	water clear	900	1100	30	T-1 3/4 (5mm) Round
L-53SRC-DV	GaAlAs	640	water clear	1200	1400	30	
L-53SRC-DW	GaAlAs	640	water clear	1500	1700	30	
L-53SRC-E	GaAlAs	640	water clear	1800	2800	30	
L-53SRC-F	GaAlAs	640	water clear	3300	4000	30	
L-53SRD-D	GaAlAs	640	red diffused	180	250	60	
L-53SRD-E	GaAlAs	640	red diffused	280	400	60	
L-53SRD-F	GaAlAs	640	red diffused	480	600	60	
L-53SRD-G	GaAlAs	640	red diffused	650	800	60	
L-53SRD-H	GaAlAs	640	red diffused	900	1500	60	
L-53SURC	InGaAlP	628	water clear	1200	1400	30	
L-53SURC-E	InGaAlP	630	water clear	1500	2200	30	
L-53SEC	InGaAlP	601	water clear	650	2500	30	
L-53SET	InGaAlP	601	orange transparent	650	2500	30	
L-53SED	InGaAlP	601	orange diffused	380	800	60	
L-53SEC-E	InGaAlP	621	water clear	1500	5000	30	
L-53SEC-H	InGaAlP	630	water clear	6700	10000	30	
L-53SYC	InGaAlP	588	water clear	380	1200	30	
L-53SYT	InGaAlP	588	yellow transparent	380	1200	30	
L-53SYD	InGaAlP	588	yellow diffused	110	400	60	
L-53SYC-H	InGaAlP	589	water clear	1500	2100	30	
L-53SGC	GaP	568	water clear	70	200	30	
L-53SGD	GaP	568	green diffused	18	40	60	
L-53CGCK	InGaAlP	570	water clear	380	900	30	
L-53VGC-E	InGaN	525	water clear	2800	4500	30	
L-53MBD	GaN	466	blue diffused	36	60	60	
L-53MBT	GaN	466	blue transparent	50	100	16	
L-53MBC	GaN	466	water clear	50	150	16	
L-53MBDK	GaN	466	blue diffused	10	40	60	
L-53MBTK	GaN	466	blue transparent	36	65	16	
L-53MBCK	GaN	466	water clear	50	110	16	
L-53PBC-E	InGaN	470	water clear	650	1200	30	
L-53SRSGW	GaAlAs	640	white diffused	110	200	50	
	GaP	568	white diffused	18	60	50	



NOTES:  
 1. All dimensions are in millimeters (inches).  
 2. Tolerance is  $\pm 0.25\text{mm}$  (0.01") unless otherwise noted.



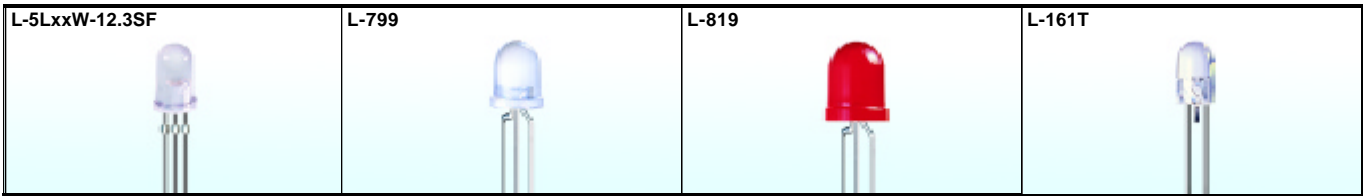
Part No.	Material	λ D (nm)	Lens Type	Iv (mcd) @ 20mA		Viewing Angle 2φ1/2	Dimension		
				Min.	Typ.				
L-937IID	GaAsP/GaP	625	red diffused	7	20	60	T-1 (3mm) Round 		
	GaAsP/GaP	625		7	20				
L-937GGD	GaP	568	green diffused	4	15	60			
	GaP	568		4	15				
L-937YYD	GaAsP/GaP	588	yellow diffused	4	10	60			
	GaAsP/GaP	588		4	10				
L-937EGW	GaAsP/GaP	625	white diffused	7	20	60			
	GaP	568		7	16				
L-937EYW	GaAsP/GaP	625	white diffused	7	20	60			
	GaAsP/GaP	588		4	7				
L-937GYW	GaP	568	white diffused	7	16	60			
	GaAsP/GaP	588		4	7				
L-115VEGW	GaAsP/GaP	625	white diffused	10	50	60		T-1 (3mm) Round 	
	GaP	568		10	30				
L-115VEYW	GaAsP/GaP	625	white diffused	10	50	60			
	GaAsP/GaP	588		7	15				
L-115VGYW	GaP	568	white diffused	10	30	60			
	GaAsP/GaP	588		7	15				
L-115WEGW	GaAsP/GaP	625	white diffused	10	40	60	T-1 (3mm) Round 		
	GaP	568		10	35				
L-115WEYW	GaAsP/GaP	625	white diffused	10	40	60			
	GaAsP/GaP	588		7	20				
L-115WGYW	GaP	568	white diffused	10	35	60			
	GaAsP/GaP	588		7	20				
L-3VEGW	GaAsP/GaP	625	white diffused	10	40	60			T-1 (3mm) Round 
	GaP	568		10	35				
L-3VEYW	GaAsP/GaP	625	white diffused	10	40	60			
	GaAsP/GaP	588		7	15				
L-3VGYW	GaP	568	white diffused	10	35	60			
	GaAsP/GaP	588		7	15				

NOTES:  
 1. All dimensions are in millimeters (inches).  
 2. Tolerance is ±0.25mm (0.01") unless otherwise noted.



Part No.	Material	l D (nm)	Lens Type	Iv (mcd) @ 20mA		Viewing Angle 2q1/2	Dimension
				Min.	Typ.		
L-57IID	GaAsP/GaP	625	red diffused	7	20	60	T-1 3/4 (5mm) Round 
	GaAsP/GaP	625		7	20		
L-57GGD	GaP	568	green diffused	4	10	60	
	GaP	568		4	10		
L-57YYD	GaAsP/GaP	588	yellow diffused	4	10	60	
	GaAsP/GaP	588		4	10		
L-57SRSRD	GaAlAs	640	red diffused	70	150	60	
	GaAlAs	640		70	150		
L-57EGW	GaAsP/GaP	625	white diffused	10	30	60	
	GaP	568		10	20		
L-57EYW	GaAsP/GaP	625	white diffused	10	30	60	T-1 3/4 (5mm) Round 
	GaP	568	white diffused	18	60	60	
L-59EGW-CA	GaAsP/GaP	625	white diffused	2.6	5	60	
	GaP	568		1.6	5		
L-59EYW	GaAsP/GaP	625	white diffused	18	60	60	
	GaAsP/GaP	588		18	40		
L-59GYW	GaP	568	white diffused	18	50	60	
	GaAsP/GaP	588		18	40		
L-59SRSGW-CC	GaAlAs	640	white diffused	110	220	60	
	GaP	568		36	60		
L-59SURKMGKW	InGaAlP	635	white diffused	380	800	60	T-1 3/4 (5mm) Full color 
	InGaAlP	570	white diffused	50	170	60	
L-59EGC	GaAsP/GaP	625	water clear	70	150	24	
	GaP	568		70	150		
L-59EYC	GaAsP/GaP	625	water clear	70	150	24	
	GaAsP/GaP	588		18	60		
L-59GYC	GaP	568	water clear	70	150	24	
	GaAsP/GaP	588		18	60		
L-59SRSGC-CC	GaAlAs	640	water clear	280	600	24	
	GaP	568		70	200		
L-59SURKSGC	InGaAlP	635	water clear	900	1600	24	T-1 3/4 (5mm) Full color 
	GaP	568		70	200		
L-154A4SURKPBVGKC	InGaAlP	635		480	1000	50	
	InGaN	470	water clear	380	600	60	
	InGaN	525		380	900		
L-154A4SURKPBVGKW	InGaAlP	635		380	600	60	
	InGaN	470	white diffused	110	350		
	InGaN	525		280	500		
L-154A4SUREPBGVGC	InGaAlP	630		380	600	50	
	InGaN	470	water clear	180	350		
	InGaN	525		280	500		
L-154A4SUREPBGVGW	InGaAlP	630		180	400	60	
	InGaN	470	white diffused	110	300		
	InGaN	525		180	320		

NOTES:  
 1. All dimensions are in millimeters (inches).  
 2. Tolerance is ±0.25mm (0.01") unless otherwise noted.



Part No.	Material	λ D (nm)	Lens Type	Iv (mcd) @ 20mA		Viewing Angle 2θ1/2	Dimension
				Min.	Typ.		

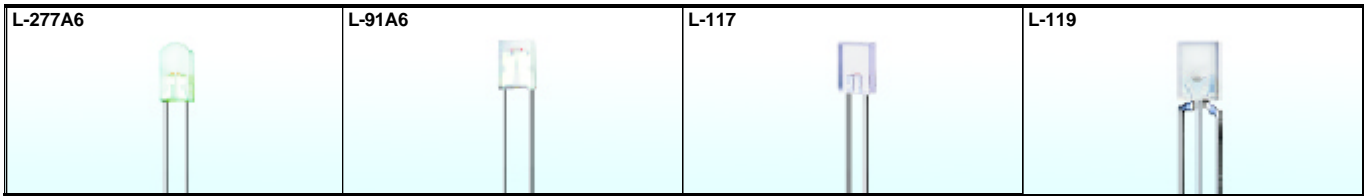
L-5LEGW-12.3SF	GaAsP/GaP	625	white diffused	18	60	60	T-1 3/4 (5mm) Round 
	GaP	568		18	50		
L-5LEYW-12.3SF	GaAsP/GaP	625	white diffused	18	60	60	
	GaAsP/GaP	588		18	40		
L-5LGYW-12.3SF	GaP	568	white diffused	18	50	60	
	GaAsP/GaP	588		18	40		

L-799EGW	GaAsP/GaP	625	white diffused	36	80	50	8mm Round 
	GaP	568		18	50		
L-799SRSGW-CC	GaAlAs	640	white diffused	110	200	50	
	GaP	568		18	50		
L-799SURKMGKW	InGaAlP	635	white diffused	380	600	50	
	InGaAlP	570		50	130		

L-819IID	GaAsP/GaP	625	red diffused	36	80	50	10mm Round 
	GaAsP/GaP	625		36	80		
L-819GGD	GaP	568	green diffused	10	40	50	
	GaP	568		10	40		
L-819YYD	GaAsP/GaP	588	yellow diffused	10	30	50	
	GaAsP/GaP	588		10	30		
L-819EGW	GaAsP/GaP	625	white diffused	36	80	50	
	GaP	568		18	50		
L-819SRSGW-CC	GaAlAs	640	white diffused	110	200	50	
	GaP	568		36	50		
L-819SURKMGKW	InGaAlP	635	white diffused	380	750	50	
	InGaAlP	570		50	130		

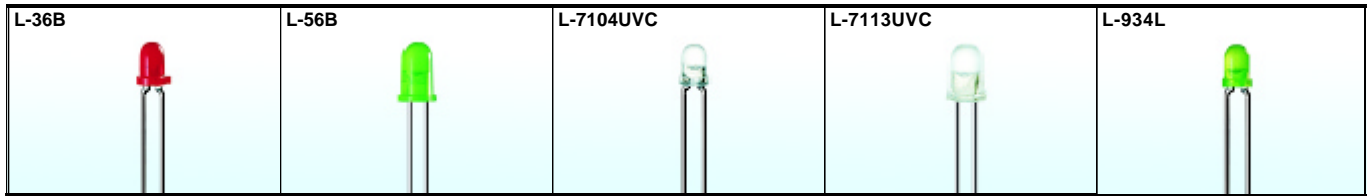
L-161TEEC	GaAsP/GaP	625	water clear	110	200	45°(H)	T-1 3/4 (5mm) Oval 
	GaAsP/GaP	625		110	200	25°(V)	
L-161TYYC	GaAsP/GaP	588	water clear	110	150	45°(H)	
	GaAsP/GaP	588		110	150	25°(V)	
L-161TSGSGC	GaP	568	water clear	110	200	45°(H)	
	GaP	568		110	200	25°(V)	
L-161TSRSRC	GaAlAs	640	water clear	480	1300	45°(H)	
	GaAlAs	640		480	1300	25°(V)	

NOTES:  
 1. All dimensions are in millimeters (inches).  
 2. Tolerance is ±0.25mm (0.01") unless otherwise noted.



Part No.	Material	λ D (nm)	Lens Type	Iv (mcd) @ 20mA		Viewing Angle 2θ1/2	Dimension		
				Min.	Typ.				
L-277A6GNW	GaP	568	white diffused	4	10	60	1.75mm x 3.9mm Rectangular 		
	GaAsP/GaP	610		4	11				
L-277A6GYW	GaP	568	white diffused	4	12	60			
	GaAsP/GaP	588		2.6	6				
L-91A6GNW	GaP	568	white diffused	2.6	8	110		2mm x 3mm Rectangular 	
	GaAsP/GaP	610		4	10				
L-91A6YGW	GaAsP/GaP	588	white diffused	1.6	4	110			
	GaP	568		4	9				
L-117EGW	GaAsP/GaP	625	white diffused	4	10	110			2mm x 5mm Rectangular 
	GaP	568		4	8				
L-117EYW	GaAsP/GaP	625	white diffused	4	10	110			
	GaAsP/GaP	588		2.6	6				
L-117GYW	GaP	568	white diffused	4	8	110			
	GaAsP/GaP	588		2.6	6				
L-119EGW	GaAsP/GaP	625	white diffused	7	20	110	2mm x 5mm Rectangular 		
	GaP	568		4	12				
L-119SRSGWT-CC	GaAlAs	640	white diffused	18	60	110			
	GaP	568		4	12				
L-119SURKMGKWT	InGaAlP	635	white diffused	70	170	110			
	InGaAlP	570		10	30				

NOTES:  
 1. All dimensions are in millimeters (inches).  
 2. Tolerance is ±0.25mm (0.01") unless otherwise noted.



Part No.	Material	λ D (nm)	Lens Type	Iv (mcd) V=9V		Viewing Angle 2 $\phi$ 1/2	Dimension
				Min.	Typ.		

L-36BHD	GaP	660	red diffused	1	2	60	T-1 (3mm) Round 
L-36BID	GaAsP/GaP	625	red diffused	12	20	60	
L-36BSRD-B	GaAlAs	640	red diffused	110	200	60	
L-36BYD	GaAsP/GaP	588	yellow diffused	5	10	60	
L-36BGD	GaP	568	green diffused	5	15	60	

L-56BHD	GaP	660	red diffused	1.8	5	60	T-1 3/4 (5mm) Round 
L-56BID	GaAsP/GaP	625	red diffused	18	40	60	
L-56BSRD-B	GaAlAs	640	red diffused	110	200	60	
L-56BYD	GaAsP/GaP	588	yellow diffused	5	20	60	
L-56BGD	GaP	568	green diffused	5	20	60	

Part No.	Material	λ D (nm)	Lens Type	F $\epsilon$ (mW) @ 20 mA		Viewing Angle 2 $\phi$ 1/2	Dimension
				Min.	Typ.		

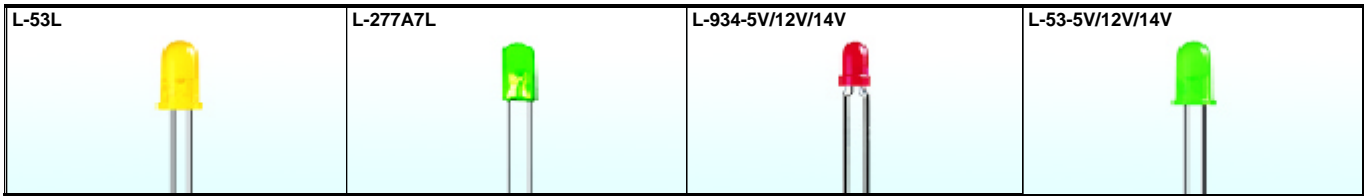
L-7104UVC	InGaN	395	water clear	50	90	34	Ultraviolet 
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L-7113UVC	InGaN	395	water clear	36	160	20	Ultraviolet 
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Part No.	Material	λ D (nm)	Lens Type	Iv (mcd) @ 2mA		Viewing Angle 2 $\phi$ 1/2	Dimension
				Min.	Typ.		

L-934LID	GaAsP/GaP	625	red diffused	0.7	3	60	T-1 (3mm) Round 
L-934LSRD	GaAlAs	640	red diffused	8	20	60	
L-934LYD	GaAsP/GaP	588	yellow diffused	0.7	1.5	60	
L-934LGD	GaP	568	green diffused	0.7	2	60	

NOTES:  
 1. All dimensions are in millimeters (inches).  
 2. Tolerance is  $\pm 0.25\text{mm}$  (0.01") unless otherwise noted.



Part No.	Material	λ D (nm)	Lens Type	Iv (mcd) @ 2mA		Viewing Angle 2θ 1/2	Dimension
				Min.	Typ.		
L-53LID	GaAsP/GaP	625	red diffused	0.7	5	60	T-1 3/4 (5mm) Round 
L-53LSRD	GaAlAs	640	red diffused	8	20	60	
L-53LYD	GaAsP/GaP	588	yellow diffused	0.7	2	60	
L-53LGD	GaP	568	green diffused	0.7	2	60	
L-277A7LID	GaAsP/GaP	625	red diffused	0.4	2	30	1.75mm x 3.9mm Rectangular 
L-277A7LYD	GaAsP/GaP	588	yellow diffused	0.2	0.5	30	
L-277A7LGD	GaP	568	green diffused	0.3	0.8	30	

Part No.	Material	λ D (nm)	Lens Type	Iv (mcd) V=5V *V=12V **V=14V		Viewing Angle 2θ 1/2	Dimension
				Min.	Typ.		
L-934ID-5V	GaAsP/GaP	625	red diffused	8	20	60	T-1 (3mm) Round 
L-934ID-12V	GaAsP/GaP	625	red diffused	*8	*20	60	
L-934ID-14V	GaAsP/GaP	625	red diffused	**8	**20	60	
L-934SRD-5V	GaAlAs	640	red diffused	70	150	60	
L-934SRD-12V	GaAlAs	640	red diffused	*40	*100	60	
L-934SRD-14V	GaAlAs	640	red diffused	**28	**90	60	
L-934YD-5V	GaAsP/GaP	588	yellow diffused	8	15	60	
L-934YD-12V	GaAsP/GaP	588	yellow diffused	*8	*15	60	
L-934YD-14V	GaAsP/GaP	588	yellow diffused	**3	**11	60	
L-934GD-5V	GaP	568	green diffused	8	20	60	
L-934GD-12V	GaP	568	green diffused	*8	*20	60	
L-934GD-14V	GaP	568	green diffused	**8	**20	60	
L-934SGD-5V	GaP	568	green diffused	8	20	60	
L-934SGD-12V	GaP	568	green diffused	*8	*20	60	
L-934SGD-14V	GaP	568	green diffused	**8	**20	60	
L-53ID-5V	GaAsP/GaP	625	red diffused	12	30	60	T-1 3/4 (5mm) Round 
L-53ID-12V	GaAsP/GaP	625	red diffused	*12	*30	60	
L-53ID-14V	GaAsP/GaP	625	red diffused	**12	**30	60	
L-53SRD-5V	GaAlAs	640	red diffused	110	180	60	
L-53SRD-12V	GaAlAs	640	red diffused	*110	*180	60	
L-53SRD-14V	GaAlAs	640	red diffused	**70	**160	60	
L-53YD-5V	GaAsP/GaP	588	yellow diffused	5	20	60	
L-53YD-12V	GaAsP/GaP	588	yellow diffused	*5	*20	60	
L-53YD-14V	GaAsP/GaP	588	yellow diffused	**5	**16	60	
L-53GD-5V	GaP	568	green diffused	8	20	60	
L-53GD-12V	GaP	568	green diffused	*8	*20	60	
L-53GD-14V	GaP	568	green diffused	**5	**18	60	
L-53SGD-5V	GaP	568	green diffused	8	20	60	
L-53SGD-12V	GaP	568	green diffused	*8	*20	60	
L-53SGD-14V	GaP	568	green diffused	**5	**18	60	

NOTES:

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