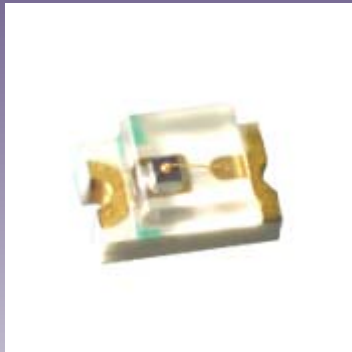




We Tame Photons to Work for You!



Products > LEDs > Surface Mount > 0805 Package > Half Moon Solder Terminals



Features / Options

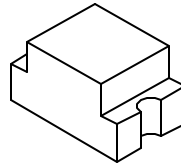
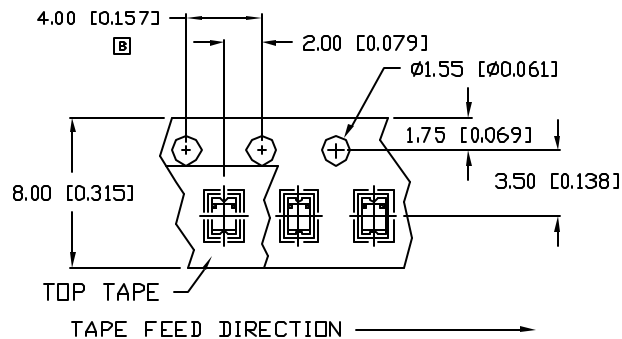
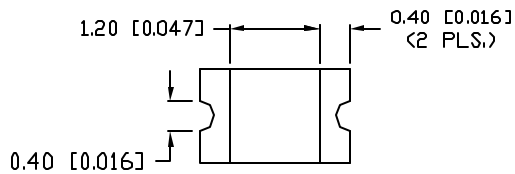
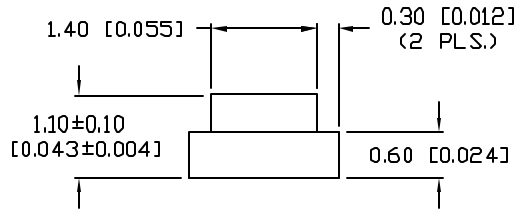
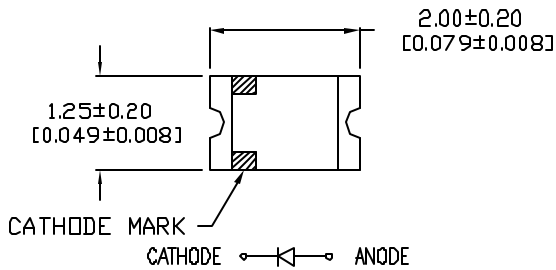
- ▶ State-of-the-Art, High Brightness Chip Technology
- ▶ Choice of Colors and Lens Finishes
- ▶ Lead Frame / Lens Casting Reliability
- ▶ Easy-to-Solder Leads, Tin Finish
- ▶ Available Bulk or on Tape and Reel
- ▶ Lead Trimming and Forming Available
- ▶ Custom Shapes, Easily Tooled, Low Minimum

Applications / Uses

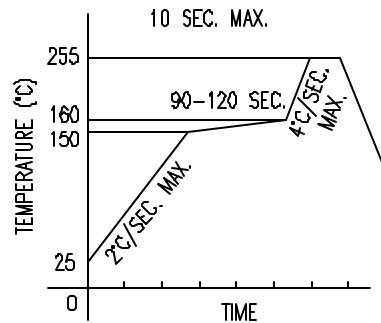
- ▶ Board or Panel Indication or Illumination
- ▶ Annunciator and Control Panels
- ▶ Telecom Switches and Central Station Equipment
- ▶ Large Panel Indicators

Part Number:	SPEC	Brightness	Dice Material	Emitted Color	Peak Wavelength	Epoxy Lens	Operating Typ Vf (V)	Intensity Typ, mcd @ 20 mA	View Angle 2x Theta		
SML-LX0805DRC-TR		HIGH	AllnGaP	Red	660	Clear	2.0	25	140		—
SML-LX0805GC-TR		STANDARD	GaP	Green	565	Clear	2.1	10	140		—
SML-LX0805IC-TR		STANDARD	GaAsP	Red	635	Clear	2	9	140		—
SML-LX0805SIC-TR		HIGH	AllnGaP	Red	636	Clear	2.0	60	140		—
SML-LX0805SOC-TR		HIGH	AllnGaP	Orange	610	Clear	2.0	60	140		—
SML-LX0805SRC-TR		STANDARD	GaAlAs	Red	660	Clear	1.85	25	140		—
SML-LX0805SUGC-TR		HIGH	AllnGaP	Green	574	Clear	2.2	45	140		—
SML-LX0805SYC-TR		HIGH	AllnGaP	Yellow	590	Clear	2.0	60	140		—
SML-LX0805UPGC-TR		HIGH	InGaN	Green	525	Clear	3.5	45	140		—
SML-LX0805USBC-TR		HIGH	InGaN	Blue	470	Clear	3.5	25	140		—

UNCONTROLLED DOCUMENT

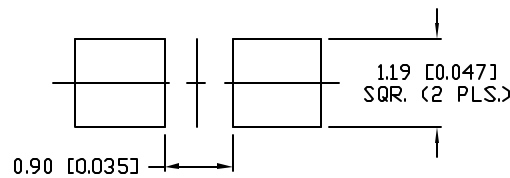


LEAD FREE REFLOW PROFILE



TOTAL TIME ABOVE 220°C IS 60 SECONDS MAX.

RECOMMENDED SOLDER PAD LAYOUT



PART NUMBER  
SML-LX0805SRC-TR

REV.  
G

REV.	E.C.N. NUMBER AND REVISION COMMENTS	DATE
A	E.C.N. #10514.	5.7.99
B	E.C.N. #10644. & REDRAWN IN 3D.	7.18.00
C	E.C.N. #10751.	5.31.01
D	E.C.N. #10784.	9.8.01
E	E.C.N. #10862.	5.9.02
F	E.C.N. #10967.	3.14.03
G	E.C.N. #11148.	1.17.05

ELECTRO-OPTICAL CHARACTERISTICS  $T_A=25^\circ\text{C}$   $I_f=20\text{mA}$

PARAMETER	MIN	TYP	MAX	UNITS	TEST COND
PEAK WAVELENGTH		660		nm	
FORWARD VOLTAGE		1.7	2.2	V <sub>f</sub>	
REVERSE VOLTAGE	5.0			V <sub>r</sub>	I <sub>r</sub> =100μA
AXIAL INTENSITY		25		mcd	I <sub>f</sub> =20mA
VIEWING ANGLE		140		2x theta	
EMITTED COLOR:	RED				
EPOXY LENS FINISH:	WATER CLEAR				

LIMITS OF SAFE OPERATION AT 25°C

PARAMETER	MAX	UNITS
PEAK FORWARD CURRENT*	160	mA
STEADY CURRENT	25	mA
POWER DISSIPATION	100	mW
DERATE FROM 25°C	-1.2	mW/°C
OPERATING TEMP.	-40 TO +85	°C
STORAGE TEMP.	-40 TO +85	°C

\* t < 10μs

NOTES:

1. THE CATHODE IS ORIENTED TOWARDS THE TAPE SPROCKET HOLE.



CAUTION: MOISTURE SENSITIVE DEVICE  
PER JEDEC LEVEL 4 STANDARDS

\*UNLESS OTHERWISE SPECIFIED TOLERANCES PER DECIMAL PRECISION ARE: X=±1 (+0.039), X.X=±0.5 (+0.020), X.XX=±0.25 (+0.010), X.XXX=±0.127 (+0.005), LEAD SIZE=±0.05 (0.002), LEAD LENGTH=±0.75 (+0.030), MIN.= +DECIMAL PRECISION -0.00, MAX.= +0.00 -DECIMAL PRECISION

REV. G PART NUMBER SML-LX0805SRC-TR

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2.0mm x 1.25mm PCB SURFACE MOUNT,  
660nm SUPER RED, WATER CLEAR LENS, TAPE AND REEL.

RELIABILITY NOTE  
OUR MANY YEARS OF EXPERIENCE DATA ACCUMULATION INDICATE THAT SOLDER HEAT IS A MAJOR CAUSE OF EARLY AND FUTURE FAILURE. PLEASE PAY ATTENTION TO YOUR SOLDERING PROCESS.

DRAWN BY: CT CHECKED BY: APPROVED BY: DATE: 1.29.99  
PAGE: 1 OF 1  
SCALE: N/A