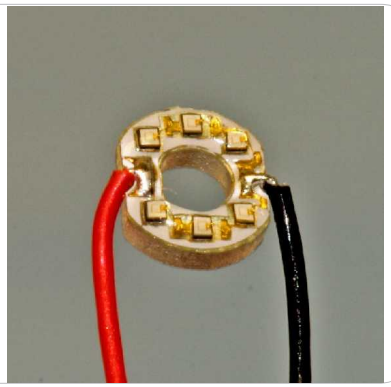
Marktech Optoelectronics

EZ500 Miniature Light Ring

Product No: **MTLR-EZ500-xxx**

Peak Emission Wavelengths: 450nm, 460nm, 470nm, 527nm

The MTLR-EZ500-xxx miniature light ring is specifically designed for applications requiring high radiant power output in an extremely small circular footprint.



FEATURES

> EZBright Power Chip LED Rf Performance
> High Reliability
> Ring Size: 0.165" Outer Diameter

APPLICATIONS

> Analytical Instruments for Bio Chemical, Medical and Scientific Analysis
> General Illumination
> Endoscopy

Absolute Maximum Ratings (Ta=25°C)

ITEMS	SYMBOL	RATINGS	UNIT
Forward Current	IF	75	mA
Operating Temperature	Topr	-40 ~ +100	°C
Storage Temperature	Tstg	-40 ~ +120	°C
LED Lunction Temperature	Tj	145	°C

Recommended operating current is 60mA maximum.

***The Light Ring should be properly heat sinked for thermal dissipation.**

****Maximum ratings are Package-dependent.**

Electrical & Optical Characteristics (Ta = 25°C)

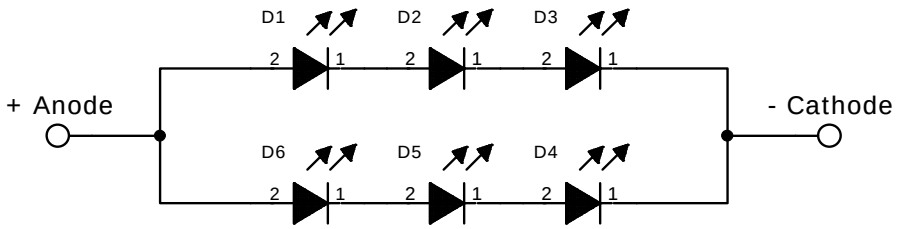
ITEMS	SYMBOL	WAVELENGTH	CONDITIONS	MIN.	TYP	MAX.	UNIT
Forward Voltage*	VF		IF=75mA	--	8.0	10.0	V
Radiant Flux [1]	Φe	450	IF=75mA	330	--	450	mW
Radiant Flux [2]	Φe	460	IF=75mA	330	--	450	mW
Radiant Flux [3]	Φe	470	IF=75mA	270	--	390	mW
Radiant Flux [4]	Φe	527	IF=75mA	90	--	180	mW
Spectral Line Half Width**	Δλ	450	IF=75mA	--	19	--	nm
Spectral Line Half Width**	Δλ	460	IF=75mA	--	20	--	nm
Spectral Line Half Width**	Δλ	470	IF=75mA	--	23	--	nm
Spectral Line Half Width**	Δλ	527	IF=75mA	--	35	--	nm

[1] MTLR-EZ500-450 [3] MTLR-EZ500-470
[2] MTLR-EZ500-460 [4] MTLR-EZ500-527

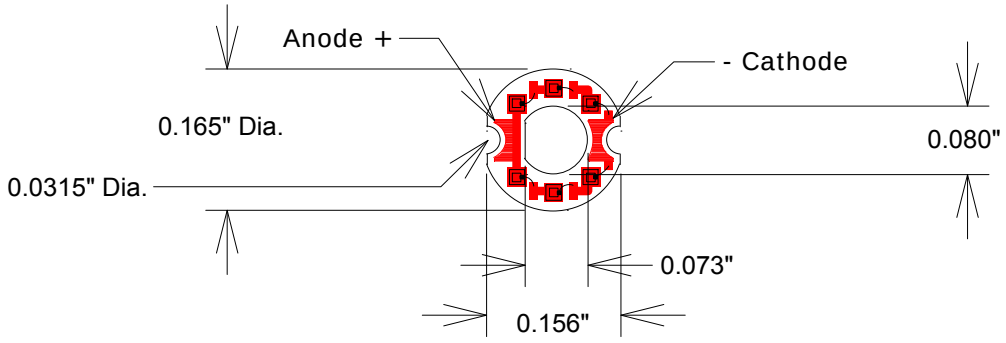
* 3 die in series

2015-01-06

Circuit Diagram



Board Dimensions



Board Material: Aluminium Core
Board Thickness: 0.031"
Overall Ring Thickness: 0.038" +/-0.005"

All Dimensions are +/-0.005"

RoHS COMPLIANT Pb Pb-Free

We reserve the right to make changes to improve technical design and may do so without further notice. Parameters can vary in different applications. All operating parameters must be validated for each customer application by the customer.

The information contained herein is subject to change without notice.

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