

AllnGaP LED DICE

Part NO.: AOC-T14RxM-Au Series

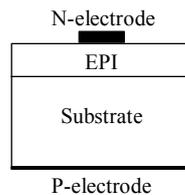
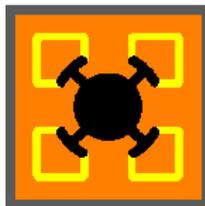
Features

- Red color emission
- Excellent performance and high efficiency
- Great reliability even in harsh environment
- Mirror reflector to increase efficiency

Description

AOC-T14RxM series is a red color emitting AllnGaP LED grown by MOCVD technique. Its structure enables enhanced quantum efficiency; the mirror reflector greatly increases the light extraction efficiency and therefore a greater light intensity. This device is designed for ultra-high brightness (UHB) automobile, display, and consumer electronic applications.

Chip Dimensions



Chip Size : $355\mu\text{m} \times 355\mu\text{m} \pm 25\mu\text{m}$
 Bonding Pad : $\phi 105\mu\text{m} \pm 10\mu\text{m}$
 Chip Thickness : $165\mu\text{m} \pm 25\mu\text{m}$

Electrical and Optics Characteristics

Measuring Item	Symbol	Condition	Min	Typ.	Max	Unit
Forward Voltage	V_F	$I_F=20\text{mA}$	1.75	-	2.40	V
Reverse Current	I_R	$V_R=5\text{V}$	-	-	1.0	μA
Dominant Wavelength	λ_d	$I_F=20\text{mA}$	616	-	630	nm
Max. Junction Temperature	T_{max}	-	< 120			$^{\circ}\text{C}$
Max. DC forward current	I_f	$T_a = 25^{\circ}\text{C}$	< 70			mA
Max. pulse forward current (Pulse width 0.1 msec, frequency=1 kHz.)	I_{fm}	$T_a = 25^{\circ}\text{C}$	< 140			mA
Storage temperature	T_{stg}	Chip on tape	0 ~ 40			$^{\circ}\text{C}$
		Only chip	-40 ~ 80			

Available Dominate Wavelength and Iv Matrix

Part No.	Wavelength	≥ 200	≥ 240	≥ 280	≥ 320	≥ 360	≥ 400	≥ 440	≥ 480
T14RSM	615 ~ 622 nm				-	Y36	Y40	Y44	Y48
T14RMM	620 ~ 627 nm				Y32	Y36	Y40	Y44	-
T14RLM	627 ~ 635 nm	S	W	Y28	Y32	-	-	-	-

Note:

1. All measurements are done with AOC's standard testing equipment.
2. Luminance intensity is measured on bare chip.
3. Above contents are subject to change without notice.
4. Special requests are also welcome, please contact AOC's sale representative for any request.
5. Characteristics curves are measured within TO-46 package.