

**Harvatek International 5.0mm ROUND IR LED LAMP  
HV-8IR20WCXHB-E0000**

Official Product	HV-8IR20WCXHB-E0000	Customer Part No.	Data Sheet No.
	*****	*****	HV-8IR20WCXHB-E0000
Specifications are subject to change without notice. Data and drawings herein are copyrighted.	Oct. 24 2017	Version of 1.0	Page 1/8

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## LIFE SUPPORT POLICY

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1. Life support devices or systems are devices or systems which, (a) are intended for surgical implant into the body, or (b) support or sustain life, and (c) whose failure to perform when properly used in accordance with instructions for use provided in the labeling, can be reasonably expected to result in a significant injury of the user.
  
2. A critical component in any component of a life support device or system whose failure to perform can be reasonably expected to cause the failure of the life support device or system, or to affect its safety or effectiveness.

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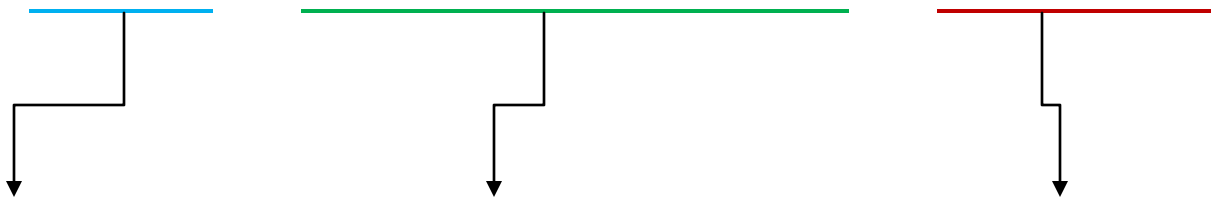
## Compliance and Certification

ISO9002, QS9000 and ISO14001 Certified  
RoHS Compliant



## Orderable Information

H V - 8 IR 20 WC XHB - E 00 00

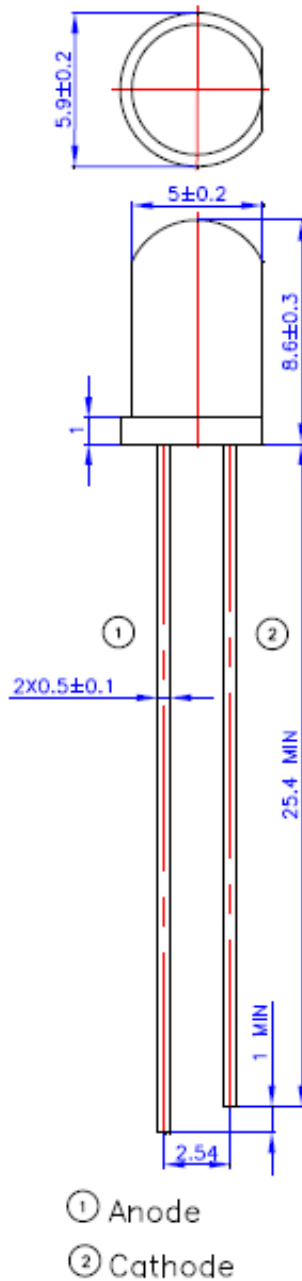


Series Name	Color Code	Remark
HV : HARVATEK	8IR : 5.0mm Round Lamp, 8.6mm Lens. 940nm GaAIAs IR Chip. 20 : Viewing angle 20 deg. WC : Water Clear. XHB : HARVATEK Part No.	E0000 : Customer Product Code.

## Features:

- Stable Color
- Popular 5.0mm through hole package, 8.6mm lens height.
- Water Clear Lens.

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**Notes:**

1. All dimensions are millimeters.
2. Tolerance is +/-0.25mm unless otherwise noted.
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## Absolute Maximum Ratings at Ta=25°C

Parameter	Symbol	Rating	Unit
Forward Current	IF	100	mA
Operating Temperature	Topr	-40to+85	°C
Storage Temperature	Tstg	-40to+100	°C
Soldering Temperature*1	Tsol	260±5	°C
Power Dissipation	Pd	75	mW
Reverse Voltage	VR	5	V
Peak Forward Current*2	IFp	1.0	A

\*1:Soldering time  $\leq$  5 seconds. \*2 tw=100u second T=10m second.

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## Electrical and Optical Characteristic

Parameter	Symbol	Condition	Min.	Typ.	Max.	Unit
Forward Voltage	$V_F$	$I_F=20\text{ mA}$	/	1.2	1.5	V
		$I_F=100\text{ mA} *1$		1.4	1.8	
Reverse Current	$I_R$	$V_R=5\text{ V}$	/	/	10	$\mu\text{A}$
Luminous Intensity	$I_V$	$I_F=20\text{ mA}$	10.0	35.0	/	mW/Sr
		$I_F=100\text{ mA} *1$	40.0	120.0		
Viewing Angle	$2\theta_{1/2}$	$I_F=20\text{ mA}$	/	20	/	deg
Peak Wavelength	$\lambda_p$	$I_F=20\text{ mA}$	/	940	/	nm
Spectrum Radiation Bandwidth	$\Delta\lambda$	$I_F=20\text{ mA}$	/	40	/	nm

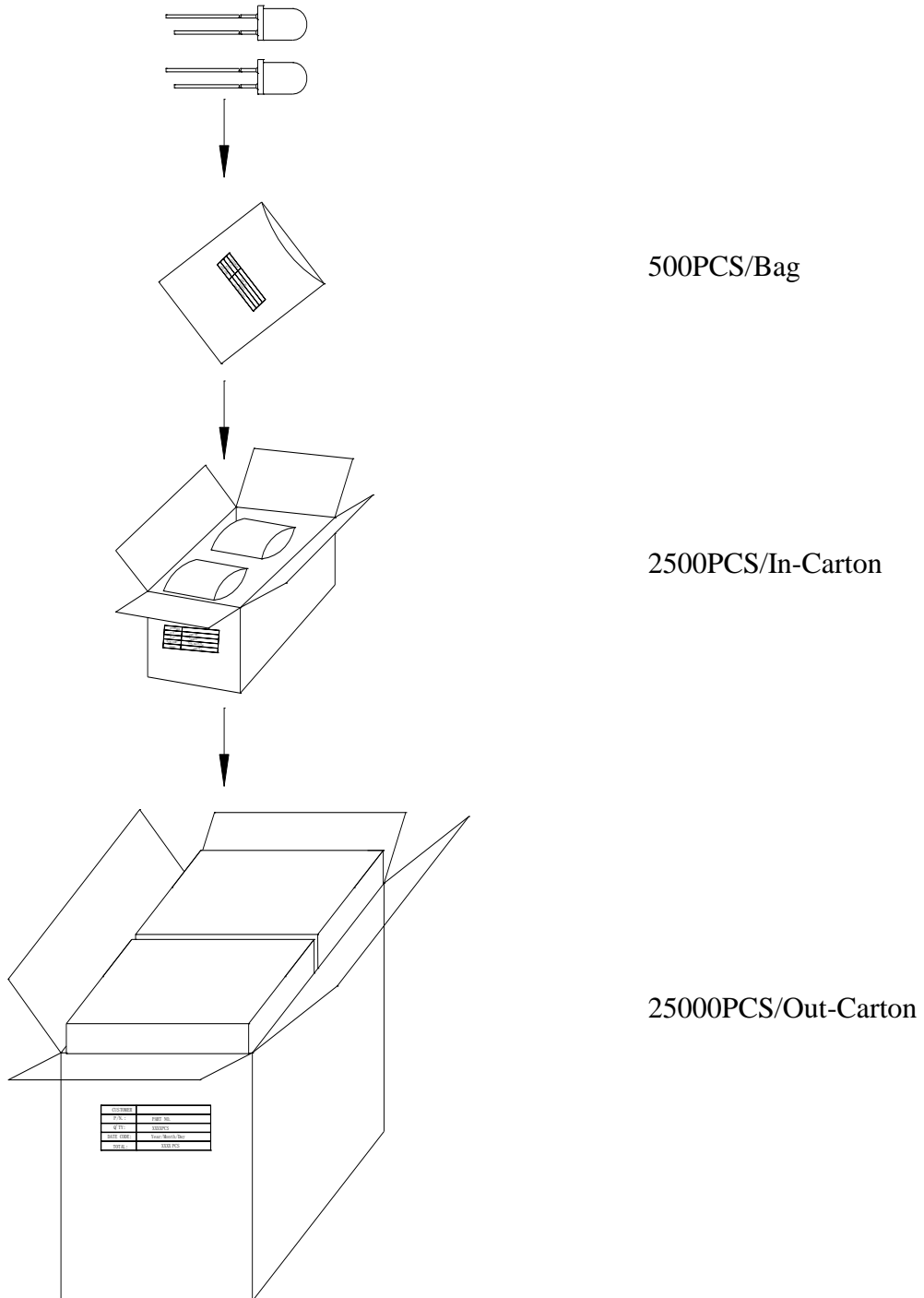
\*1 Pulse Width  $\leq 100\text{ us}$  , Duty  $\leq 1\%$

Notes:

1. $\theta_{1/2}$  is the angle from optical centerline where the luminous intensity is 1/2 the optical centerline value.
- 2.Luminous intensity: +/-15%.
- 3.Wavelength: +/-1nm.

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**Packing Specification:**



500PCS/Bag

2500PCS/In-Carton

25000PCS/Out-Carton

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## Revision History

Revision	Page	Version No.	Revision Date
Initial Release		1.0	10-24-2017

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