

**■ Description**

- LED Kit contains Multi-voltage DC3-15V LEDs
- 140pcs are supplied in a storage box for easy storage
- Wide input voltage range (3-15V)
- With built-in resistor, direct use
- Cost effective (save space and resistor cost)
- User-friendly
- Widely applied to project design, Arduino/Pi Pico/ Steam kit, TTL/Cmos compatible applications

**■ Features**

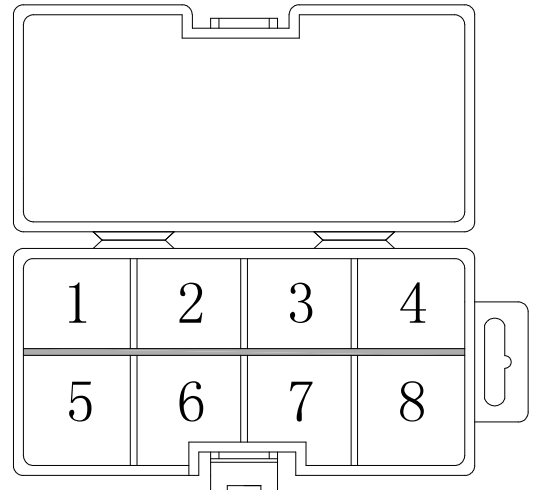
- 3mm round standard 40° directivity
- Red/Yellow/Blue/Pure Green/Warm White/Cool White/ Bi-color Red&Blue/Red&Pure Green
- Diffused type

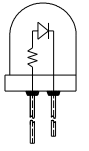
**■ Kit Contents**

Section	Contents	Pcs	P/N	Spec
1	3mm Multi-voltage LED, Red	20	OSR53144A-VV	Page 2
2	3mm Multi-voltage LED, Yellow	20	OSY53144A-VV	
3	3mm Multi-voltage LED Blue	20	OSB53144A-VV	
4	3mm Multi-voltage LED, Pure Green	20	OSG53144A-VV	
5	3mm Multi-voltage LED, Warm White	20	OSM53144A-VV	
6	3mm Multi-voltage LED, Cool White	20	OSW53144A-VV	
7	3mm Bi-color Multi-voltage LED, Red/Blue	10	OSRBMC3142A-VV	Page 3
8	3mm Bi-color Multi-voltage LED, Red/Pure Green	10	OSRPMC3142A-VV	

**■ Product Picture**

**140pcs/Box (Dimensions: 137\*68\*28mm)**





**■Description**

This LED builds with internal resistor to operate with wide operation voltage of DC3-15V.

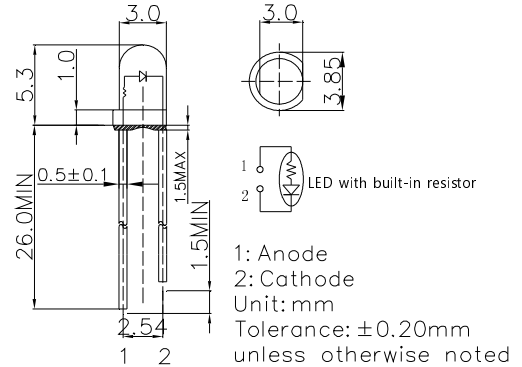
**■Features**

- Wide Input Voltage
- Cost Saving and Space Saving
- Diffused type
- Single Color

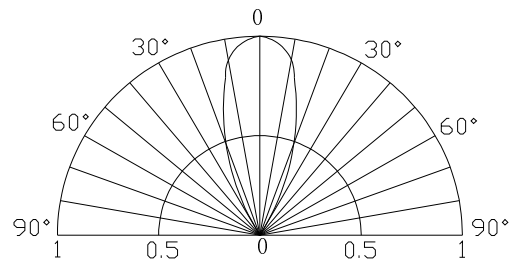
**■Applications**

- Toys/Game/Audio
- TTL/Cmos Compatible
- Arduino/Pi Pico/Steam Kit
- Other Electronics Products

**■Outline Dimension**



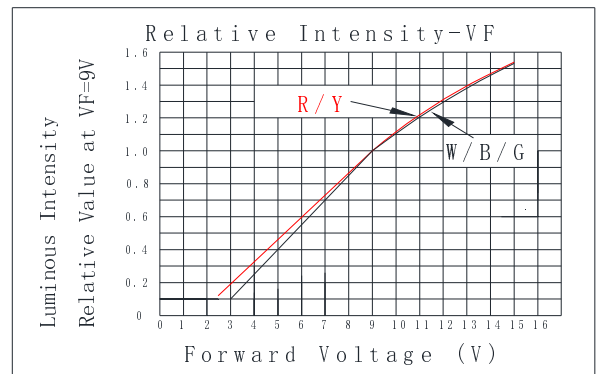
**■Directivity**








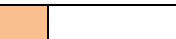
**■Absolute Maximum Rating (Ta=25°C)**

Item	Symbol	Value	Unit
DC Forward Voltage	V <sub>F</sub>	15	V
Reverse Voltage	V <sub>R</sub>	12	V
Power Dissipation	P <sub>D</sub>	190	mW
Operating Temperature	Topr	-30 ~ +85	°C
Storage Temperature	Tstg	-40~ +100	°C
Lead Soldering Temperature	Tsol	260°C/5sec	-

**■Optical Characteristic Curves**



**■Electrical -Optical Characteristics (Ta=25°C)**

3mm Multi-Voltage LED						
<b>LED P/N</b>	OSR53144A-VV	OSY53144A-VV	OSB53144A-VV	OSG53144A-VV	OSM53142A-VV	OSW53142A-VV
<b>Light Color</b>	Red	Yellow	Blue	Pure Green	Warm White	Cool White
<b>Lens Color</b>	Red Diffused	Yellow Diffused	Blue Diffused	Green Diffused	White Diffused	White Diffused
<b>Wavelength*1/Color Temperature*2</b>	620-630nm	585-595nm	465-475m	520-530nm	2700-3300K	8500-18000K
<b>Luminous Intensity(typ.)*3</b>	400mcd	400mcd	300mcd	1560mcd	1560mcd	1560mcd
<b>Forward Voltage(typ.)</b>	9V	9V	9V	9V	9V	9V
<b>Forward Current(typ.)</b>	8mA	8mA	7.5mA	7.5mA	7.5mA	7.5mA
<b>Viewing Angle(typ.)</b>	40°	40°	40°	40°	40°	40°
<b>Quantity(pcs)/Box</b>	20	20	20	20	20	20

\*1 Tolerance of measurements of dominant wavelength is ±1nm

\*2 Tolerance of measurements of color temperature is ±10%

\*3 Tolerance of measurements of luminous intensity is ±15%

**Bi-Color Multi-Voltage LED  
3mm Round LED (3-Pin)**

**■ Description**

This LED is built with two different or same color LEDs. It builds with resistors to operate with wide operation voltage of DC3-15V.

**■ Features**

- Wide Input Voltage
- Cost Saving and Space Saving
- Diffused type
- Bi-color Common Cathode Type

**■ Applications**

- Toys/Game/Audio
- TTL/Cmos Compatible
- Arduino/Pi Pico/Steam Kit
- Other Electronics Products

**■ Absolute Maximum Rating**

(Ta=25°C)

Item	Symbol	Value	Unit
DC Forward Voltage	V <sub>F</sub>	15	V
Reverse Voltage	V <sub>R</sub>	12	V
Power Dissipation	P <sub>D</sub>	190	mW
Operating Temperature	Topr	-30 ~ +85	°C
Storage Temperature	Tstg	-40 ~ +100	°C
Lead Soldering Temperature	Tsol	260°C/5sec	-

**■ Electrical -Optical Characteristics** (Ta=25°C)

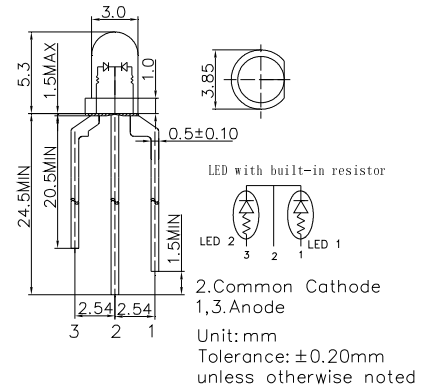
LED P/N	OSRBMC3142A-VV		OSRPMC3142A-VV	
Light Color	Red	Blue	Red	Pure Green
Lens Color	White Diffused		White Diffused	
Wavelength*1	620-630nm	465-475m	620-630nm	520-530nm
Luminous Intensity(typ.)*2	400mcd	300mcd	400mcd	1560mcd
Forward Voltage(typ.)*3	9V	9V	9V	9V
Forward Current(typ.)	8mA	7.5mA	8mA	7.5mA
Viewing Angle(typ.)	40°	40°	40°	40°
Quantity(pcs)/Box	10		10	

\*1 Tolerance of measurements of dominant wavelength is ±1nm

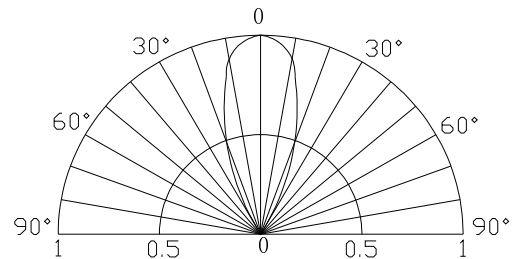
\*2 Tolerance of measurements of luminous intensity is ±15%

\*3 Tolerance of measurements of forward current ±1mA

**■ Outline Dimension**



**■ Directivity**



**■ Optical Characteristic Curves**

