

- 1 . Part Number: LBF6222-20DLXA-B
- 2 . Structure: The LED light bar mounted LED dice (bare chip) on substrate by array  
( 2serial 2parallel 2color )
- 3 . Application: Lighting source
- 4 . Maximum Condition ( T a = 2 5 )

| Item                       | Symbol           | Condition  | Unit |
|----------------------------|------------------|------------|------|
| Admissibility disipation 1 | Po               | 2.88       | W    |
| Forward Current 1          | I <sub>F</sub>   | 0.4        | A    |
| Operation Temperature      | T <sub>op</sub>  | -30 ~ +85  |      |
| Preservation Temperature   | T <sub>stg</sub> | -40 ~ +100 |      |
| Junction Temperature       | T <sub>j</sub>   | 125        |      |

1 : one color ( D;6500K / L;2700K )

- 5 . Electrical and optical Characteristics ( T a = 2 5 )

| Item                          | Symbol          | Min.    | Typ.    | Max.    | Unit | Condition               |
|-------------------------------|-----------------|---------|---------|---------|------|-------------------------|
| Forward Voltage 2             | V <sub>F</sub>  | 5.3     | 5.8     | 6.3     | V    | I <sub>F</sub> = 150 mA |
| Luminous Flux (D) 3           | v               | 114.9   | 118.5   | -       | lm   | I <sub>F</sub> = 150 mA |
| Luminous Flux (L) 3           | v               | 98.3    | 101.4   | -       | lm   | I <sub>F</sub> = 150 mA |
| Color Temperature (D)         | T <sub>cp</sub> | 6025    | 6406    | 6787    | K    | I <sub>F</sub> = 150 mA |
| Color Temperature (L)         | T <sub>cp</sub> | 2613    | 2739    | 2865    | K    | I <sub>F</sub> = 150 mA |
| Deviation Color (D)           | duv             | +0.0009 | +0.0048 | +0.0086 | -    | I <sub>F</sub> = 150 mA |
| Deviation Color (L)           | duv             | -0.0034 | +0.0004 | +0.0041 | -    | I <sub>F</sub> = 150 mA |
| General Color Rendering Index | Ra              | 75      | 80      | -       | -    | I <sub>F</sub> = 150 mA |

1 : measurement tolerance : ± 3 %

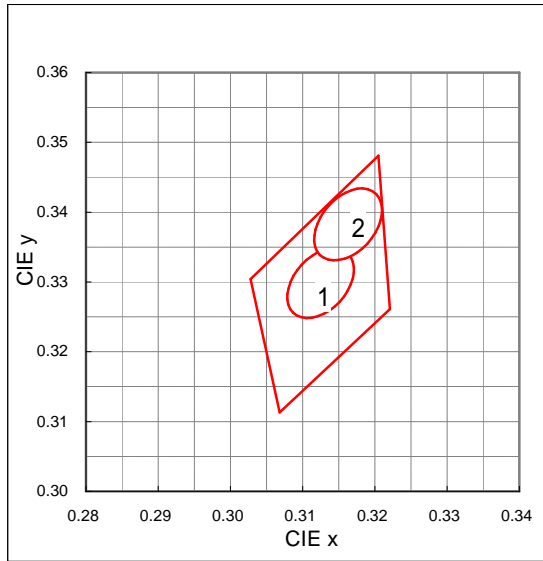
2 : measurement tolerance : ± 7 %

These data are measured by a measuring equipment complying with CIE125 Condition B.

| DESIGN | CHECK | APPROVAL | DATE: 2012/9/6 | SPECIFICATION No.: Target SPEC |
|--------|-------|----------|----------------|--------------------------------|
|        |       |          | REV. A         | <b>ROHM Co.,Ltd.</b>           |

6 . Chromaticity coordinate ( T a = 2 5 、 IF= 1 5 0 m A、 measurement tolerance : ±0.005 )

D ; 6500K



Chromaticity coordinates Point

| 6500K-2 |        |
|---------|--------|
| x       | y      |
| 0.3163  | 0.3382 |
| 6500K-1 |        |
| x       | y      |
| 0.3125  | 0.3298 |

MacAdam ellipse  
3step

ANSI C78.377 standard

| LBF62* |        |
|--------|--------|
| 6500K  |        |
| x      | y      |
| 0.3068 | 0.3113 |
| 0.3221 | 0.3261 |
| 0.3205 | 0.3481 |
| 0.3028 | 0.3304 |

center point (0.3123,0.3282)

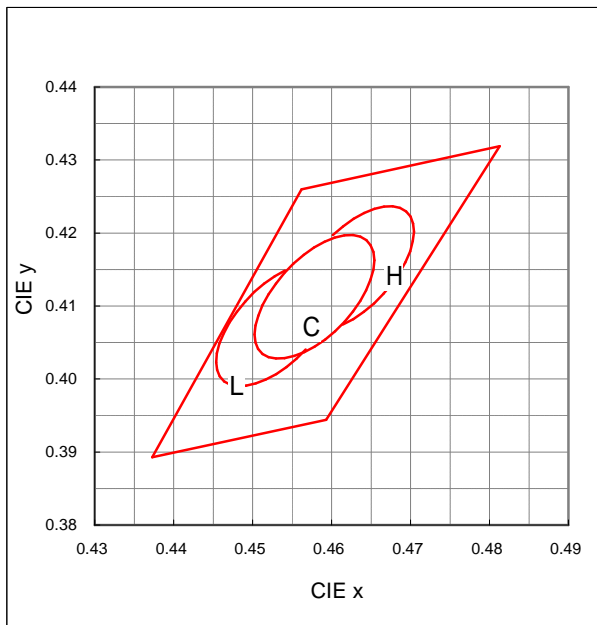
<Range within 1Bar>

x : R 0.015

y : R 0.020

(R=max-min)

L ; 2700K



Chromaticity coordinates Point

| 2700K-H |         |
|---------|---------|
| x       | y       |
| 0.4628  | 0.4150  |
| 2700K-C |         |
| x       | y       |
| 0.45785 | 0.41115 |
| 2700K-L |         |
| x       | y       |
| 0.4529  | 0.4073  |

MacAdam ellipse  
4step

ANSI C78.377 standard

| LBF62* |        |
|--------|--------|
| 2700K  |        |
| x      | y      |
| 0.4373 | 0.3893 |
| 0.4593 | 0.3944 |
| 0.4813 | 0.4319 |
| 0.4562 | 0.4260 |

center point (0.4578,0.4101)

<Range within 1Bar>

x : R 0.015

y : R 0.020

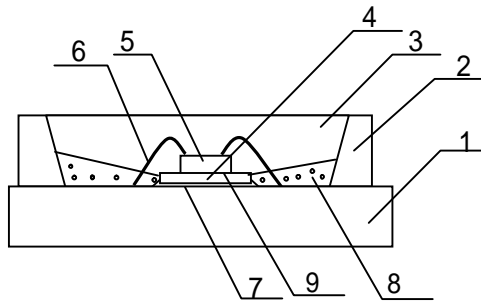
(R=max-min)

The product that is located in the square A except for the area of the MacAdam ellipses is to be discussed for sales.

Color rank

| color rank |   | 2700K |    |    |
|------------|---|-------|----|----|
|            |   | L     | C  | H  |
| 6500K      | 1 | L1    | C1 | H1 |
|            | 2 | L2    | C2 | H2 |

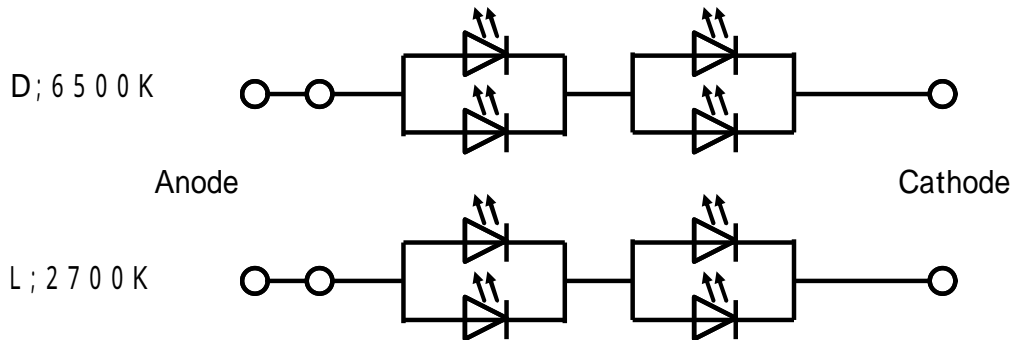
7 . Structure



| No | Parts Name          | Material                           |
|----|---------------------|------------------------------------|
| 1  | Substrate           | CEM-3 Substrate                    |
| 2  | White Resin         | Silicone Resin                     |
| 3  | Resin               | Silicone Resin                     |
| 4  | Sub Mount Substrate | Si                                 |
| 5  | LED Die             | InGaN on Sapphire                  |
| 6  | Bonding Wire        | Au                                 |
| 7  | Die Bond            | Ag                                 |
| 8  | White Resin         | Silicone Resin (TiO <sub>2</sub> ) |
| 9  | Die Bond            | Silicone Resin                     |

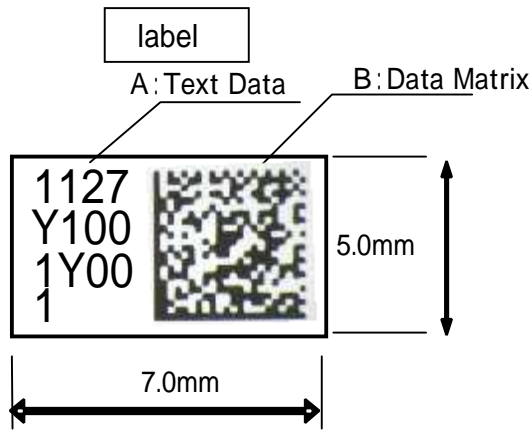
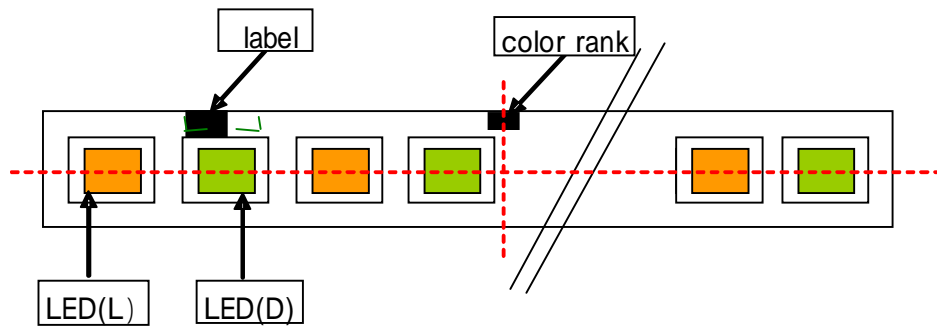
8 . Circuit Diagram

2 serial 2 parallel

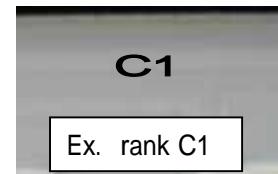




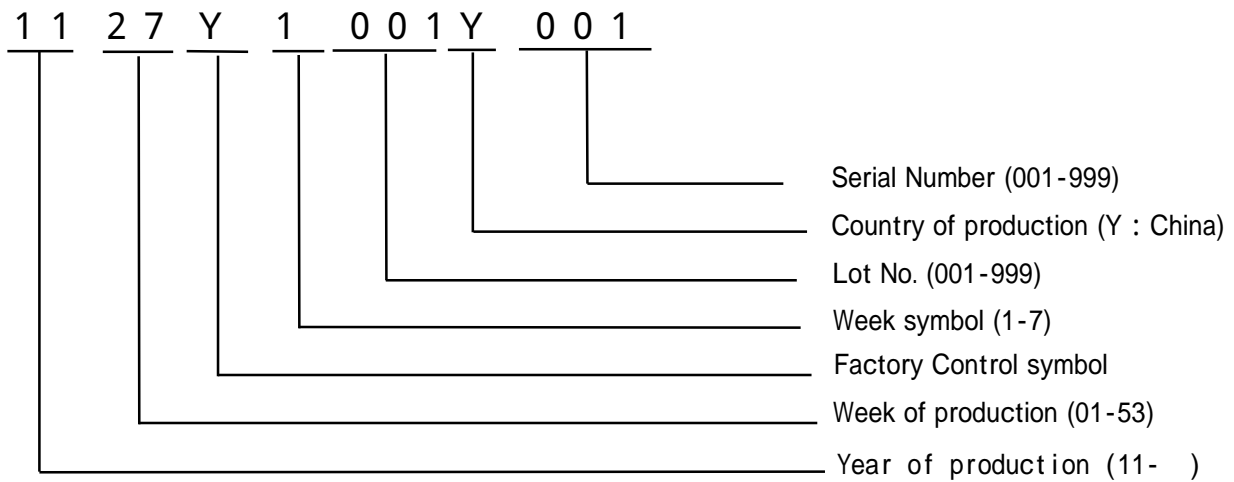
1 0 .Product Label



Color rank (L1,L2,C1,C2,H1,H2)



[A] Text Data



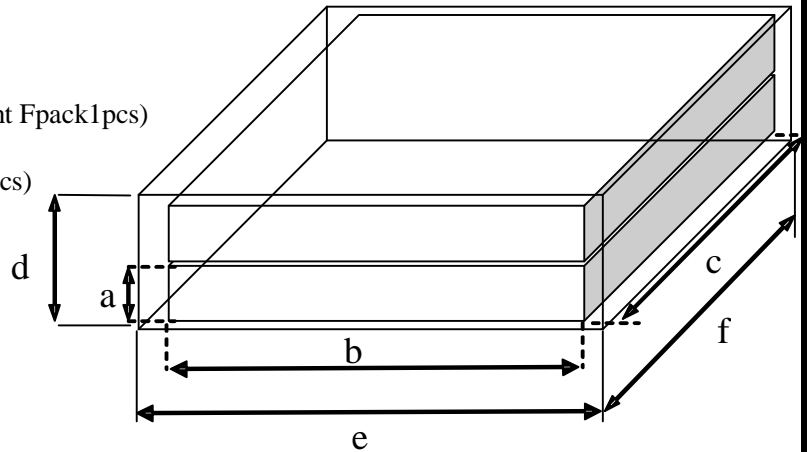
[B] Data Matrix

L B F 6 2 2 2 - 2 0 D L X A - B (16grids) Part Number  
1 1 2 7 Y 1 0 0 1 Y 0 0 1 (13grids) Lot Number  
1 2 3 4 5 6 7 8 (8grids) Factory Control Part

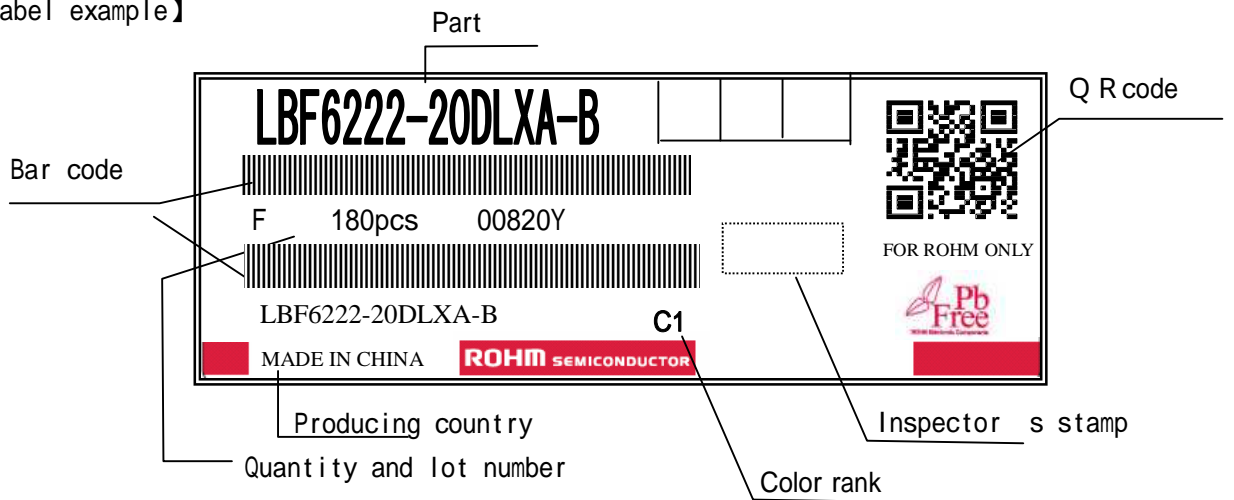
1 1 . Packing

【Package】

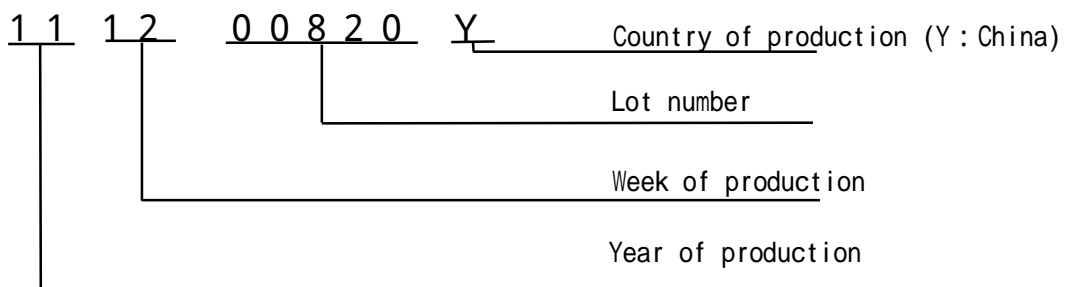
- (1) 18 Bars are on one film tray.
- (2) Inner package size (Fpack10pcs+vacant Fpack1pcs)  
(a)60 x (b)300 x (c)343 (Unit: mm)
- (3) Outer package size(inner package x 2pcs)  
(d)155 x (e)313 x (f)353 (Unit: mm)



【 Label example】



【Lot number example】



【Manufacturing factory (country of origin)】

• ROHM SEMICONDUCTOR CHINA CO.,LTD. (China)