

MF-18DB-2757-SS-C2C2-K7 COB Datasheet

Applications

- Track lighting
- Down lighting

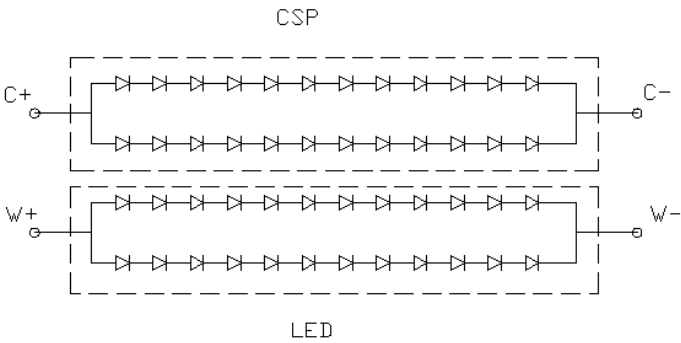
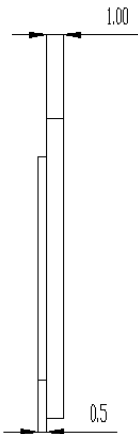
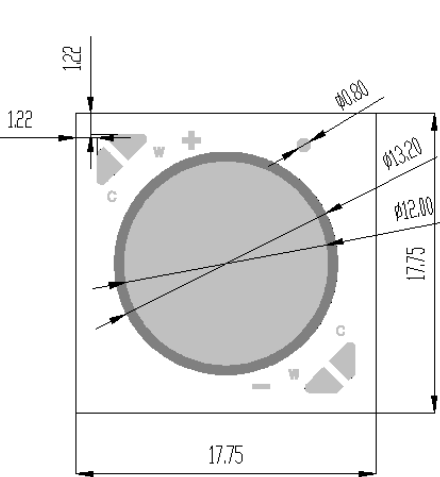


Naming Conventions

MF-18DB - 2757 - SS - C2C2 - K7
(1) (2) (3) (4)

- (1) COB Series
- (2) CCT Range : 2700K-5700K
- (3) CRI Range: > 90
- (4) Chip Array

Package Dimensions



CSP 12 series × 2 parallel =24 pcs of CSPs
LED 12 series × 2 parallel =24 pcs of LEDs

1. All dimensions in millimeters.
2. Tolerance is +/-0.3mm unless otherwise noted.
3. The information in this document is subject to change without notice.

Absolute Maximum Ratings

Item	Symbol	Absolute Maximum Rating	Unit
Forward current(C-C)	If _{C-C}	700	mA
Forward current(W-W)	If _{W-W}	700	mA
Peak Power	P	30.8	W
Reverse Voltage	Vr	-60	V
Operating Temperature	Topr	-30~+100	°C
Storage Temperature	Tstg	-40~100	°C
Hand soldering condition	Tsld	3.5sec@350°C	sec
Case Temperature	Tc	100	°C
LED Junction Temperature	Tj	125	°C
Temperature of central silicon Surface	Ts	125@IRDA Test	°C

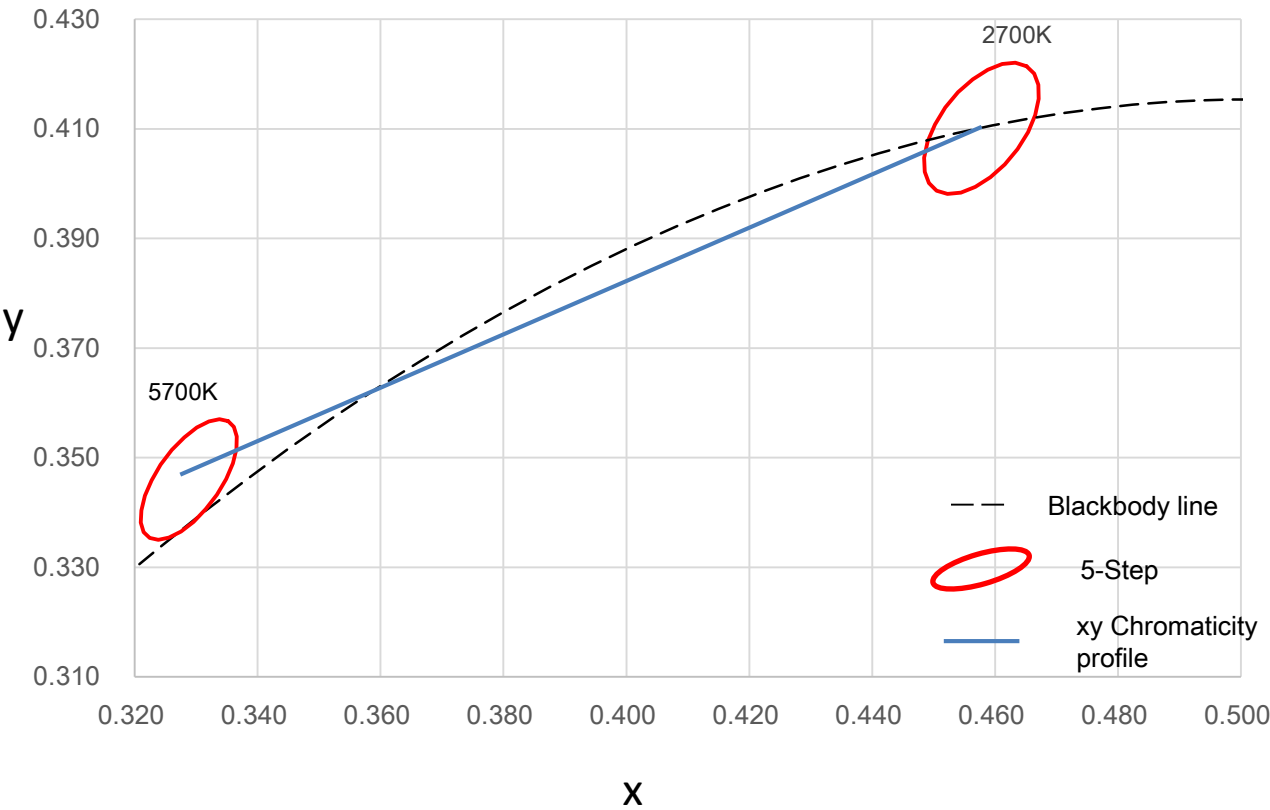
Characteristics (Tc=25°C)

Color Temp	Forward Current(mA)		Voltage(V)		Luminous Flux(lm)	R _{j-c} (°C/W)
	C.If(mA)	W.If(mA)	C.Vf(V)	W.Vf(V)	CRI 90	
2700K	100	600	30-38	30-38	2140	TBD
3000K	180	520	30-38	30-38	2270	TBD
3500K	300	400	30-38	30-38	2480	TBD
4000K	420	280	30-38	30-38	2620	TBD
5000K	580	120	30-38	30-38	2680	TBD
5700K	670	30	30-38	30-38	2670	TBD

Notes:

1. Luminous flux is measured with an accuracy of +/- 5 %.
2. CRI is measured with an accuracy of +/- 1
3. Some color and CRI bins may have limited availability, please contact us before ordering.
4. All measurements were made under the standardized environment of Shineon.

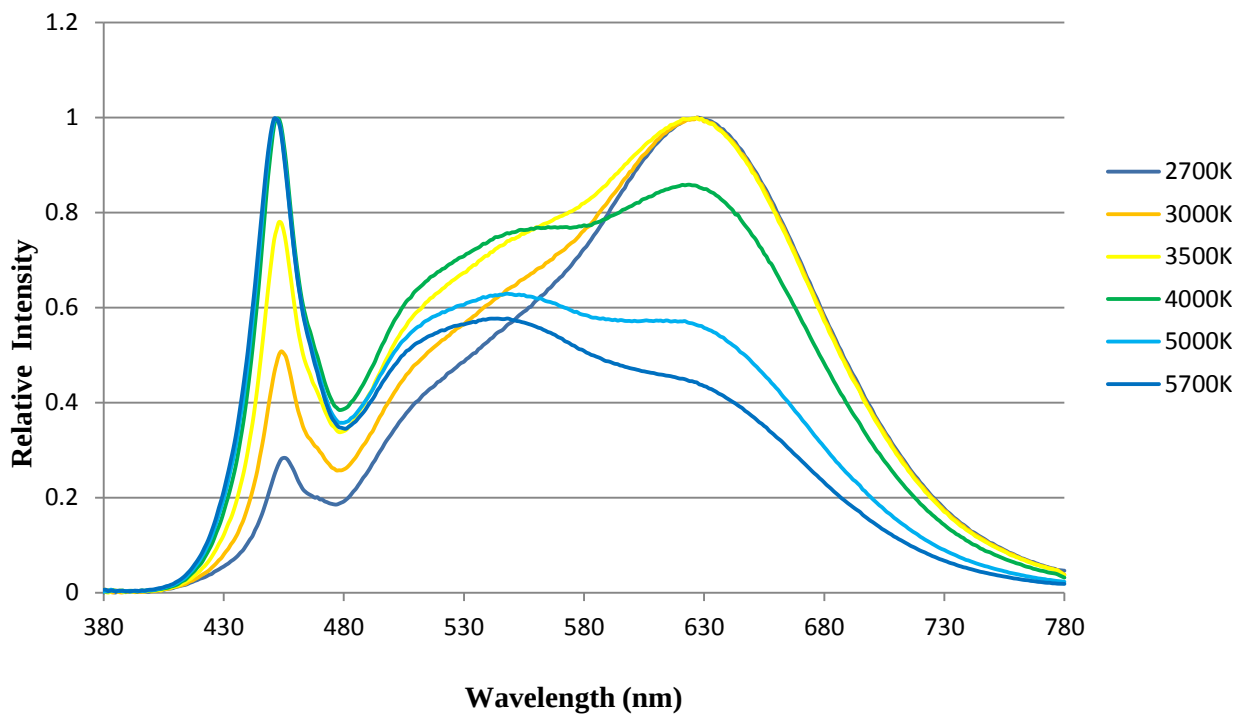
Chromaticity Characteristics (Tc=25°C)



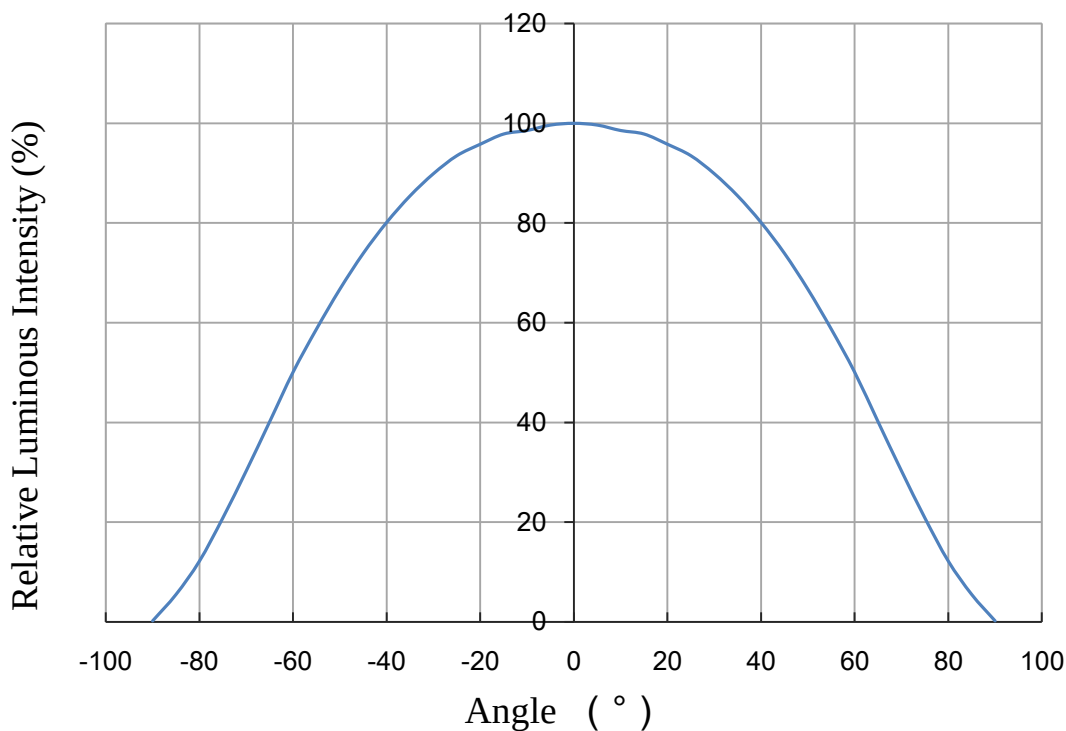
Bin Code	Nominal CCT	Center Point		Oval parameter		
		x	y	a	b	Theta°
275	2700K(5-step)	0.4578	0.4101	0.0135	0.007	57.28
575	5700K(5-step)	0.3288	0.346	0.01243	0.00533	59.09

Notes:
1. Chromaticity coordinate bins are measured with an accuracy of +/- 0.005.

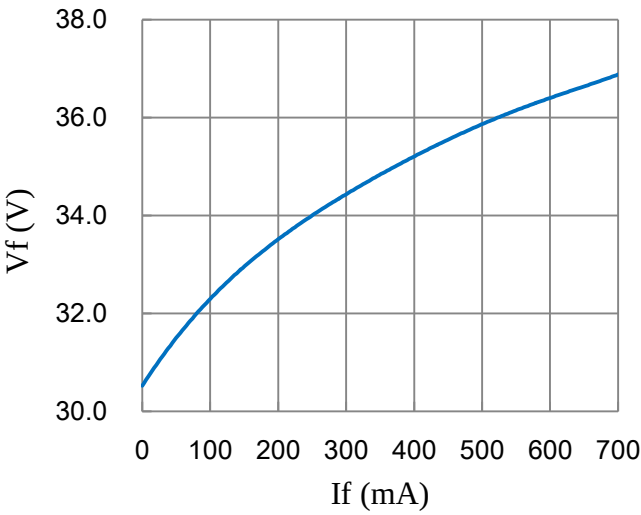
Typical Relative Spectral Power Distribution (Tc=25℃)



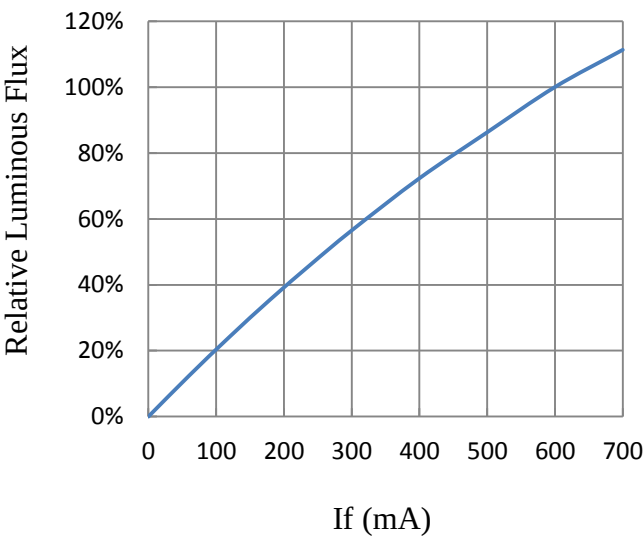
Typical Spatial Distribution (Tc=25℃)



Forward Current vs. Forward Voltage
(Tc=25°C)

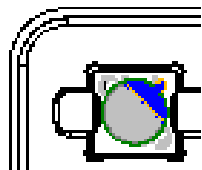


Forward Current vs. Relative Luminous Flux
(Tc=25°C)

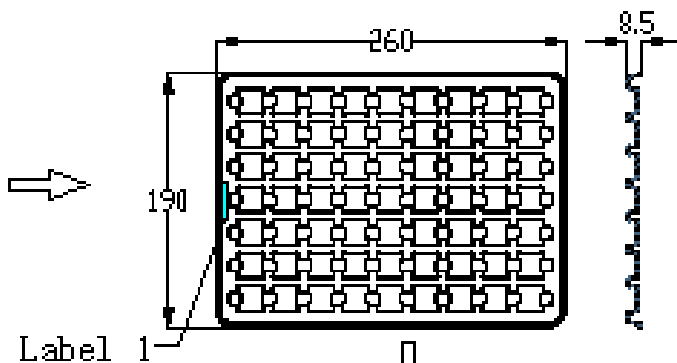


PACKING

COB 18DB

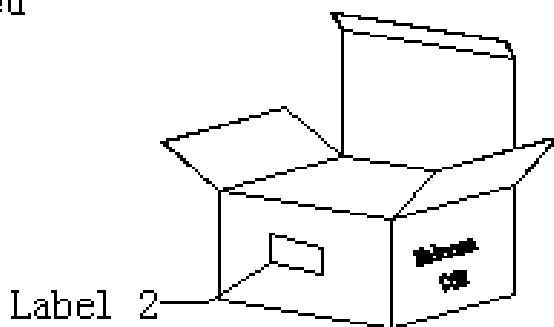


63 pcs of device
per tray



6 trays in an anti-static
bag, with one empty tray on
top.
The set of 6 trays is
packed up with a vacuumed
bag.

7 bags per box



2205 pcs of device per box