



Product Model Number

CKO-CH15-045021-1601

✓ Model Number Definitions

CKO-XXXX-XXXXXX-XXXX

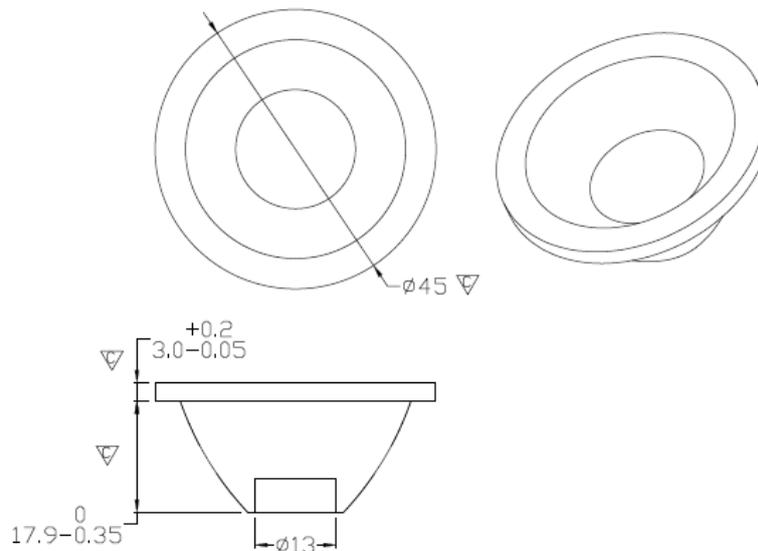


- A. Chun Kuang Optics Corp. Product
- B. Product Type: product abbreviation
Ex:
CH→CoB High Intensity
CC→CoB Compact
CS→Soft Shading for CoB LED
HC→Holder for CoB LED

- C. Identity Code
- D. Lens / Fixture Size
Ex: 075026=Φ75mm / Thickness=26mm (round up)
- C. Serial Numbers

The lens datasheet is applicable for **CREE LED**, that manufactured by Chun Kuang Optics Corp.

✓ Dimensions (mm) : Φ45 x 20.9



▽:Critical Dimension



✓ Optical Characteristics – Angle Performances

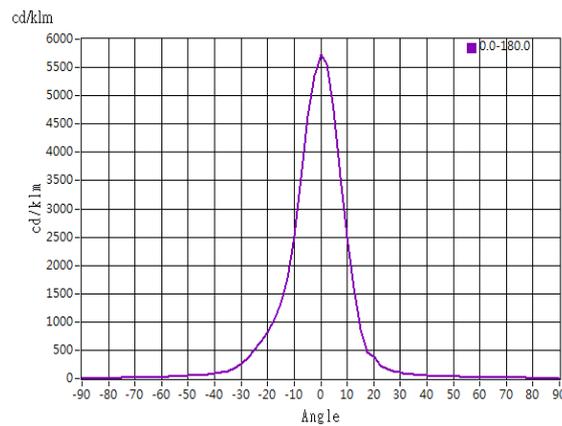
CREE	LED LES (mm)	FWHM (degrees)	Field Angle (degrees)
XHP50	5.0 x 5.0	12°	28°
MHD-E	7.0 x 7.0	16°	34°
MHD-G	7.0 x 7.0	18°	40°
XHP70	7.0 x 7.0	16°	35°
XHP70.2	7.0 x 7.0	17°	39°
CMA1303	Φ4.5	11°	24°
CXA1304	Φ6	14°	29°
CXB1304	Φ6	13°	29°
CMA1306	Φ6	14°	32°
CXB1310	Φ6	14°	33°
CXA1507	Φ9	19°	44°
CXB1507	Φ9	21°	46°
CXA1510	Φ9	21°	44°
CXA1512	Φ9	18°	41°
CXB1512	Φ9	20°	44°
CMA1516	Φ9	22°	46°
CXB1520	Φ9	22°	48°
CMT1407	Φ9.8	22°	48°
CMT1412	Φ9.8	22°	49°
CMT1420	Φ9.8	23°	49°
CXA1816	Φ12	26°	57°
CXB1816	Φ12	27°	59°
CXA1820	Φ12	28°	61°
CXB1820	Φ12	27°	59°
CMA1825	Φ12	28°	61°



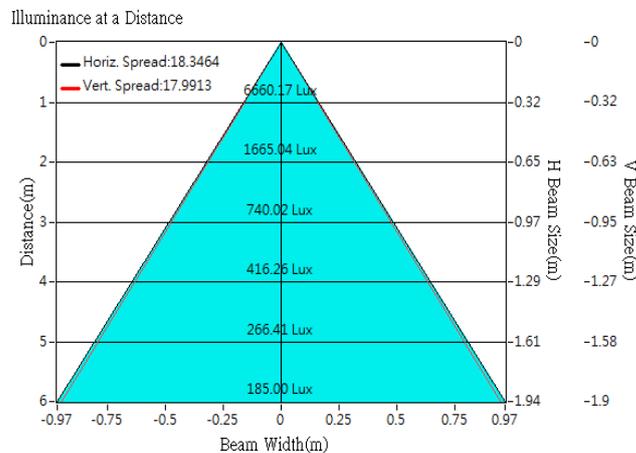
Optical Characteristics

Model Number	CKO-CH15-045021-1601		<p>"H" definition</p>
LED	MHD-G		
LES / LED Size	7.0 x 7.0		
FWHM (D50)	18°		
Field Angle (D10)	40°		
H (distance)	2.5 mm		
MCPCB Height	1.1 mm		
Dimension	Φ =45 mm, Thickness=20.9 mm		
Luminous Flux	1165 lm	Measured @ 12.68W	
Material	PC / UL94V2		

cd/klm



Illuminance At Distances

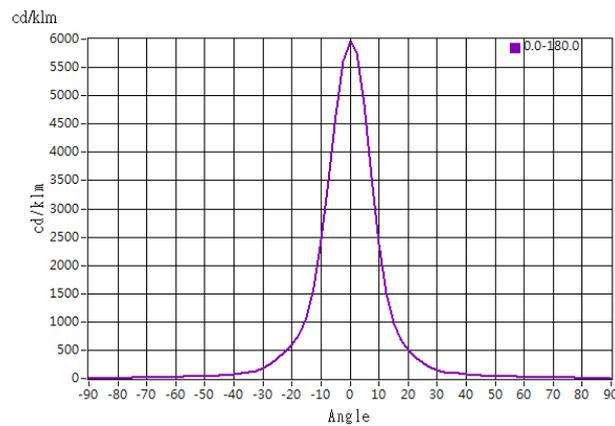




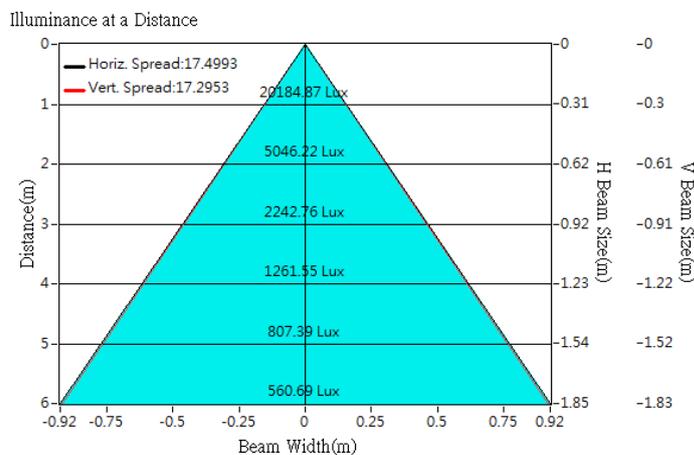
Optical Characteristics

Model Number	CKO-CH15-045021-1601		<p>"H" definition</p>
LED	XHP 70.2		
LES / LED Size	7.0 x 7.0		
FWHM (D50)	17°		
Field Angle (D10)	39°		
H (distance)	2.5 mm		
MCPCB Height	1.1 mm		
Dimension	Φ =45 mm, Thickness=20.9 mm		
Luminous Flux	3389 lm	Measured @ 32.2 W	
Material	PC / UL94V2		

cd/klm



Illuminance At Distances

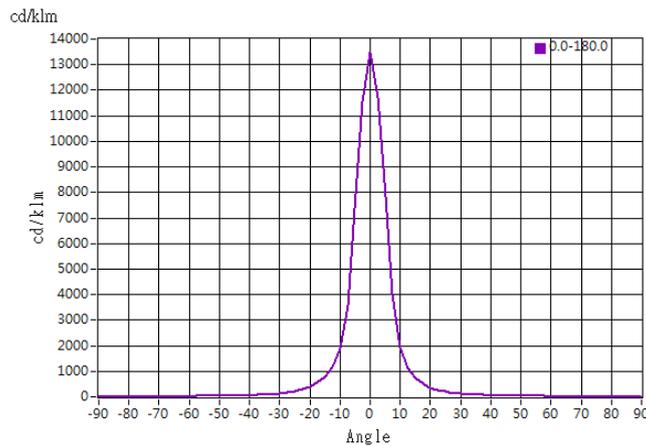




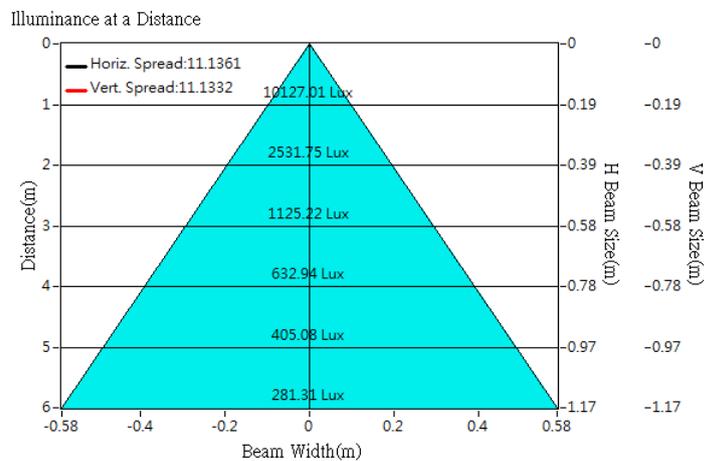
Optical Characteristics

Model Number	CKO-CH15-045021-1601		<p>"H" definition</p> <p>LES CoB</p>
LED	CMA1303		
LES / LED Size	Φ 4.5 mm		
FWHM (D50)	11°		
Field Angle (D10)	24°		
H (distance)	2.5mm		
Dimension	Φ =45 mm, Thickness=20.9 mm		
Luminous Flux	752 lm	Measured @ 6.73 W	
Material	PC / UL94V2		

cd/klm



Illuminance At Distances

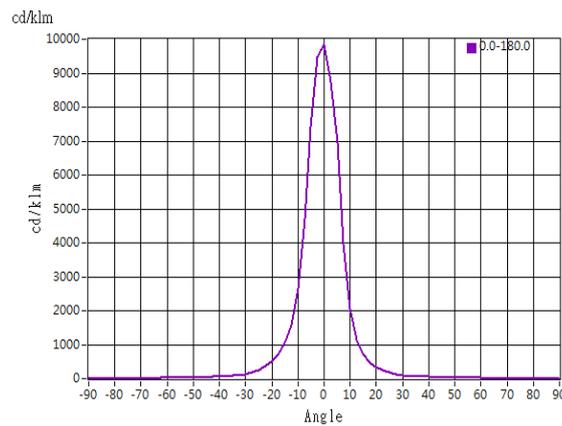




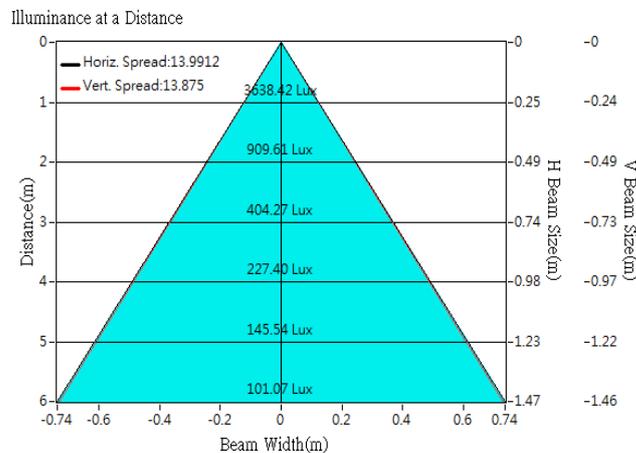
Optical Characteristics

Model Number	CKO-CH15-045021-1601		<p>"H" definition</p>
LED	CXA1304		
LES / LED Size	Φ 6 mm		
FWHM (D50)	14°		
Field Angle (D10)	29°		
H (distance)	2.5mm		
Dimension	Φ =45 mm, Thickness=20.9 mm		
Luminous Flux	369 lm	Measured @ 3.6 W	
Material	PC / UL94V2		

cd/klm



Illuminance At Distances

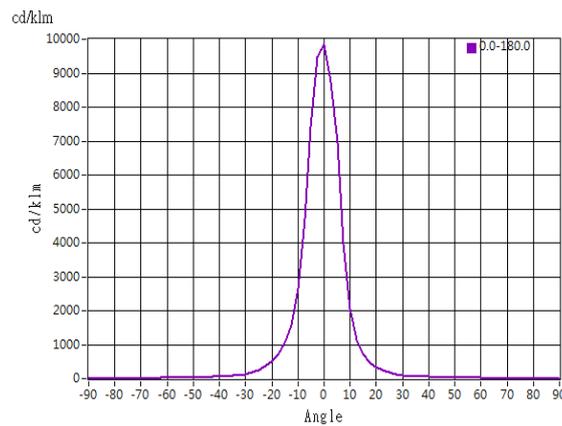




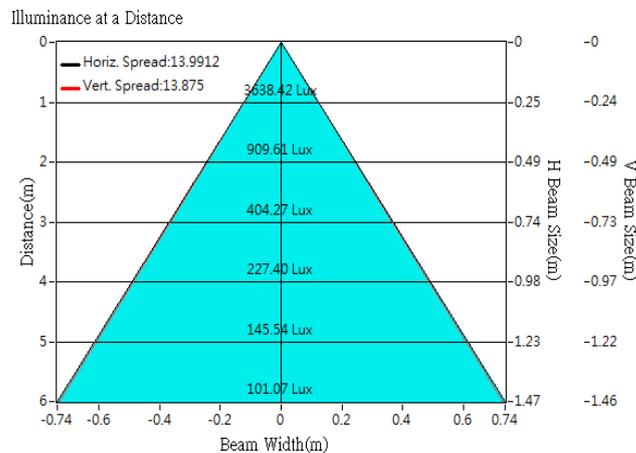
Optical Characteristics

Model Number	CKO-CH15-045021-1601	<p>"H" definition</p>
LED	CXB1304	
LES / LED Size	Φ 6 mm	
FWHM (D50)	13°	
Field Angle (D10)	29°	
H (distance)	2.5mm	
Dimension	Φ =45 mm, Thickness=20.9 mm	
Luminous Flux	369 lm	
Material	PC / UL94V2	

cd/klm



Illuminance At Distances

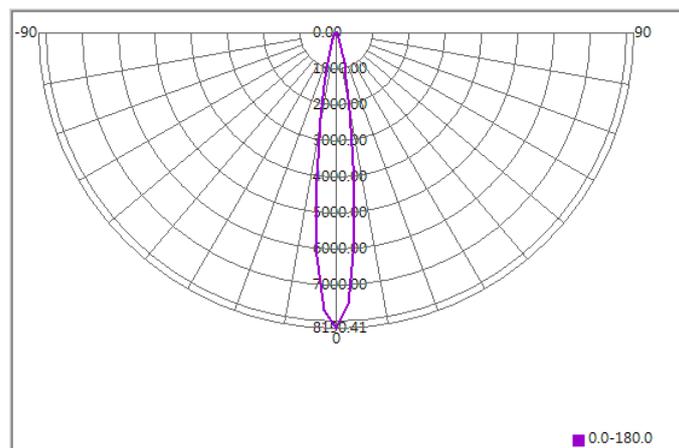




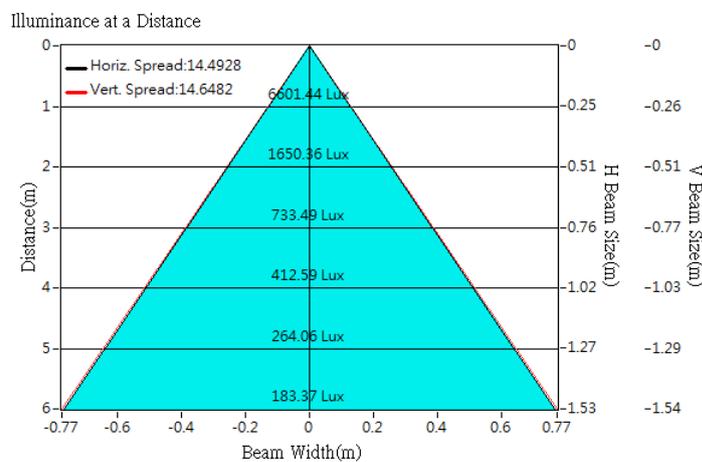
Optical Characteristics

Model Number	CKO-CH15-045021-1601		<p>"H" definition</p> <p>LES CoB</p>
LED	CMA1306		
LES / LED Size	Φ 6 mm		
FWHM (D50)	14°		
Field Angle (D10)	32°		
H (distance)	2.5mm		
Dimension	Φ =45 mm, Thickness=20.9 mm		
Luminous Flux	805 lm	Measured @ 6.1 W	
Material	PC / UL94V2		

cd/klm



Illuminance At Distances

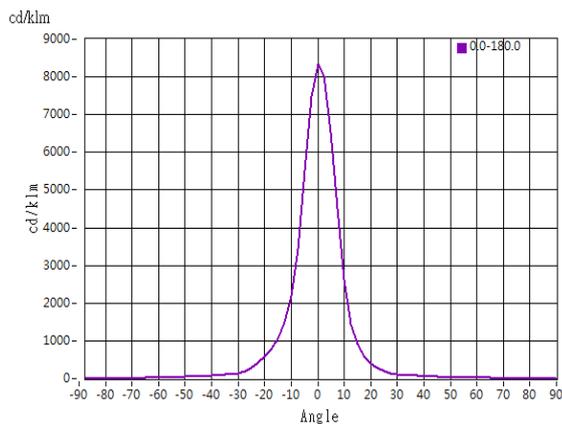




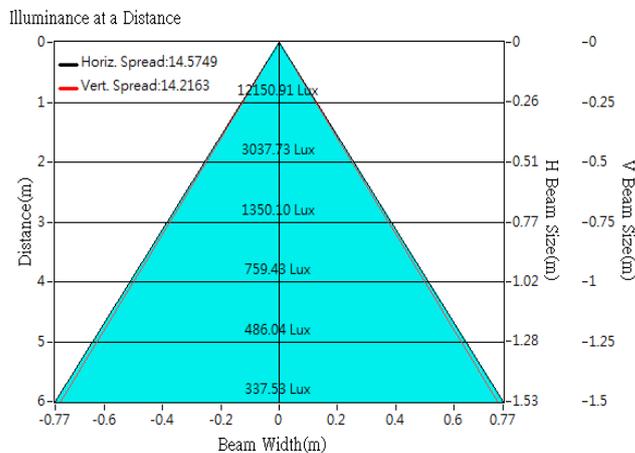
Optical Characteristics

Model Number	CKO-CH15-045021-1601	<p>"H" definition</p>
LED	CXB1310	
LES / LED Size	Φ 6 mm	
FWHM (D50)	14°	
Field Angle (D10)	33°	
H (distance)	2.5mm	
Dimension	Φ =45 mm, Thickness=20.9 mm	
Luminous Flux	1458 lm	
Material	PC / UL94V2	

cd/klm



Illuminance At Distances

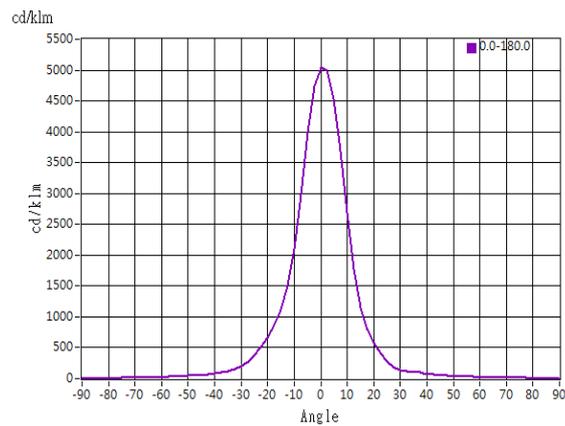




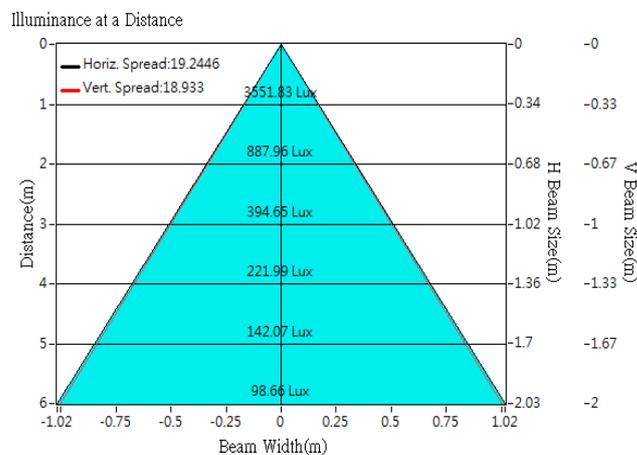
Optical Characteristics

Model Number	CKO-CH15-045021-1601		<p>"H" definition</p>
LED	CXA1507		
LES / LED Size	Φ 9 mm		
FWHM (D50)	19°		
Field Angle (D10)	44°		
H (distance)	2.5mm		
Dimension	Φ =45 mm, Thickness=20.9 mm		
Luminous Flux	704 lm	Measured @ 7.3 W	
Material	PC / UL94V2		

cd/klm



Illuminance At Distances

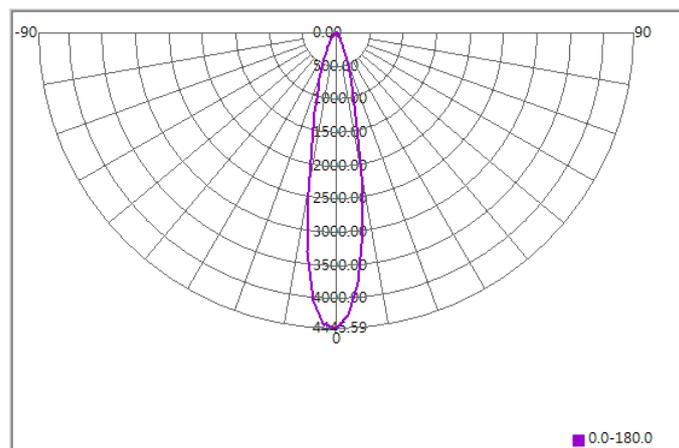




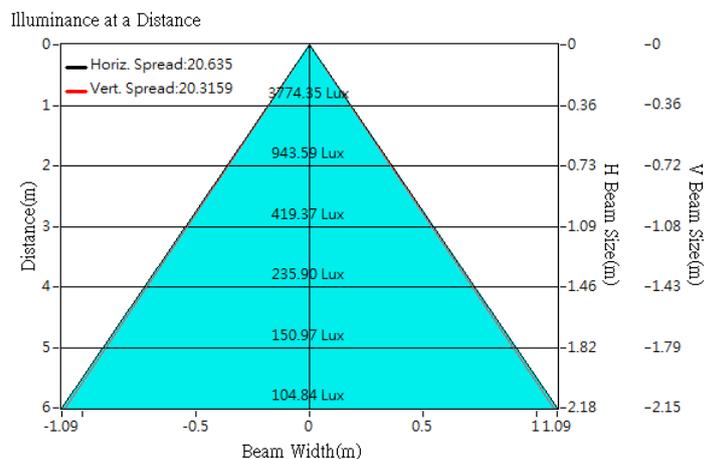
Optical Characteristics

Model Number	CKO-CH15-045021-1601		<p>"H" definition</p>
LED	CXB1507		
LES / LED Size	Φ 9 mm		
FWHM (D50)	21°		
Field Angle (D10)	46°		
H (distance)	2.5mm		
Dimension	Φ =45 mm, Thickness=20.9 mm		
Luminous Flux	849 lm	Measured @ 7.1 W	
Material	PC / UL94V2		

cd/klm



Illuminance At Distances

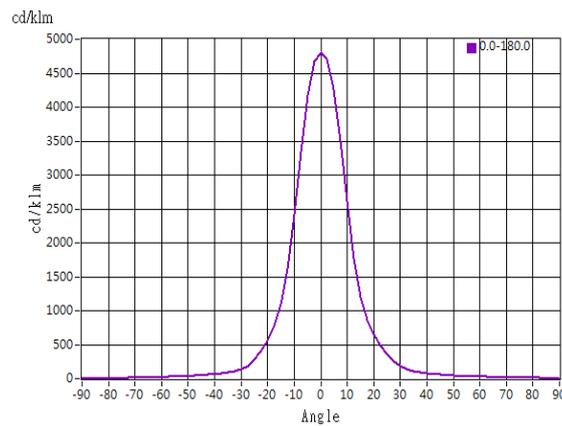




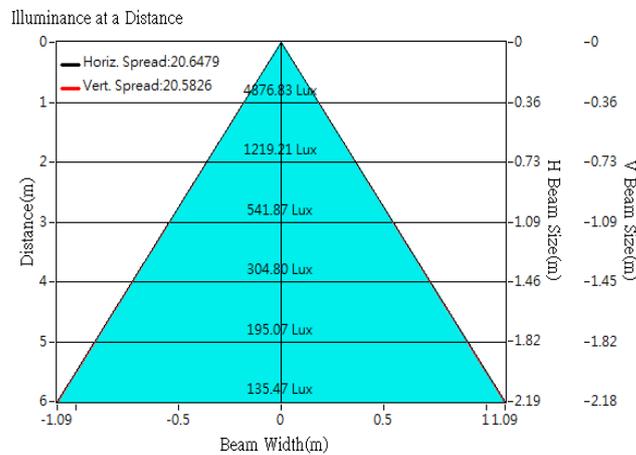
Optical Characteristics

Model Number	CKO-CH15-045021-1601	<p>"H" definition</p>
LED	CXA1510	
LES / LED Size	Φ 9 mm	
FWHM (D50)	21°	
Field Angle (D10)	44°	
H (distance)	2.5mm	
Dimension	Φ =45 mm, Thickness=20.9 mm	
Luminous Flux	1015 lm	
Material	PC / UL94V2	

cd/klm



Illuminance At Distances

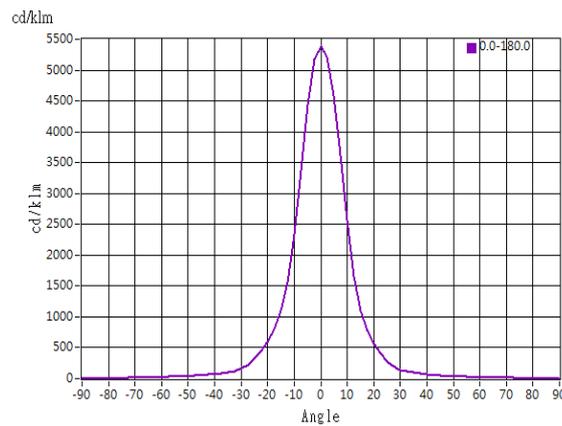




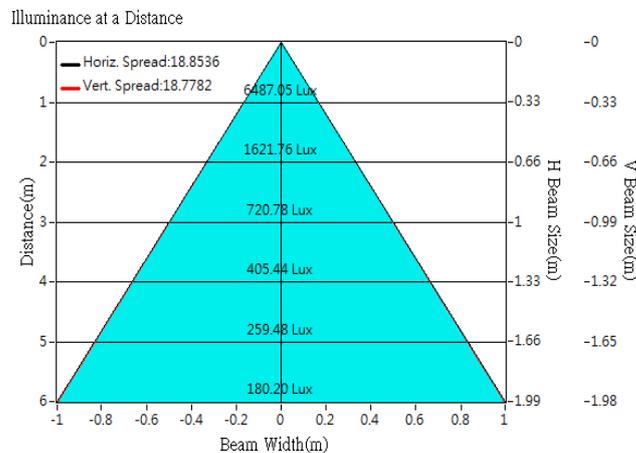
Optical Characteristics

Model Number	CKO-CH15-045021-1601	<p>"H" definition</p>
LED	CXA1512	
LES / LED Size	Φ 9 mm	
FWHM (D50)	18°	
Field Angle (D10)	41°	
H (distance)	2.5mm	
Dimension	Φ =45 mm, Thickness=20.9 mm	
Luminous Flux	5383 lm	
Material	PC / UL94V2	

cd/klm



Illuminance At Distances

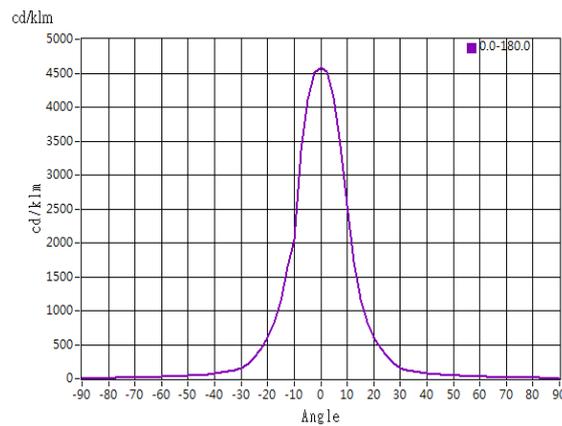




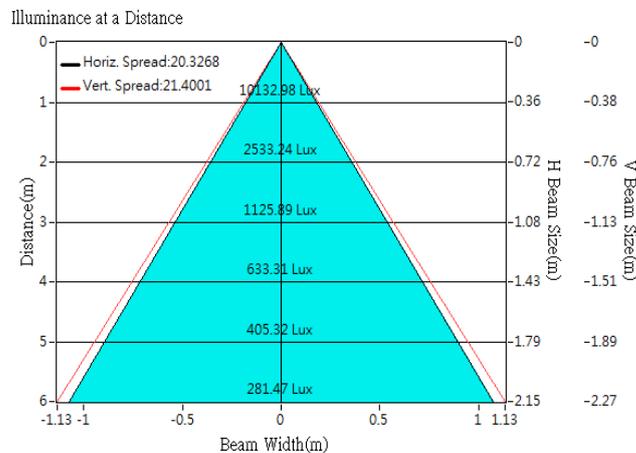
Optical Characteristics

Model Number	CKO-CH15-045021-1601	<p>"H" definition</p>
LED	CXB1512	
LES / LED Size	Φ 9 mm	
FWHM (D50)	20°	
Field Angle (D10)	44°	
H (distance)	2.5mm	
Dimension	Φ =45 mm, Thickness=20.9 mm	
Luminous Flux	2212 lm	
Material	PC / UL94V2	

cd/klm



Illuminance At Distances

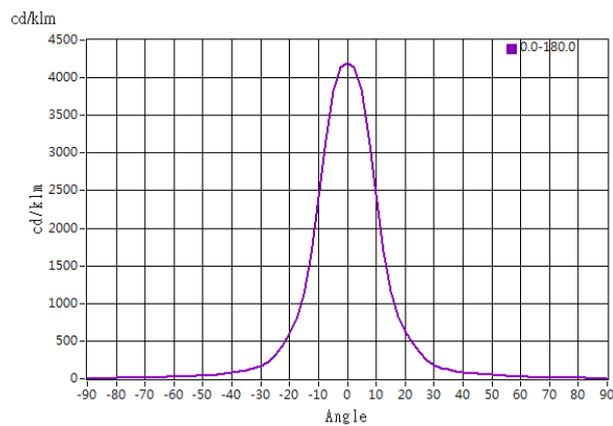




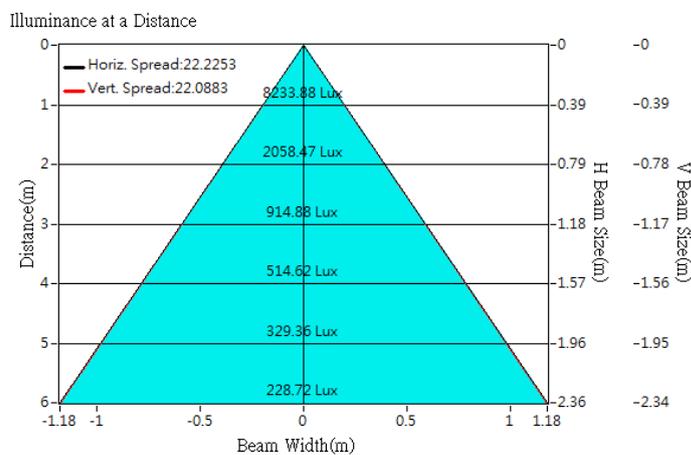
Optical Characteristics

Model Number	CKO-CH15-045021-1601	<p>"H" definition</p>
LED	CMA1516	
LES / LED Size	Φ 9 mm	
FWHM (D50)	22°	
Field Angle (D10)	46°	
H (distance)	2.5mm	
Dimension	Φ =45 mm, Thickness=20.9 mm	
Luminous Flux	1963 lm	
Material	PC / UL94V2	

cd/klm



Illuminance At Distances

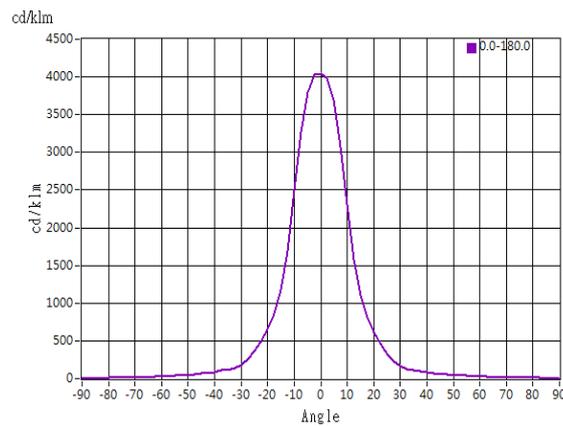




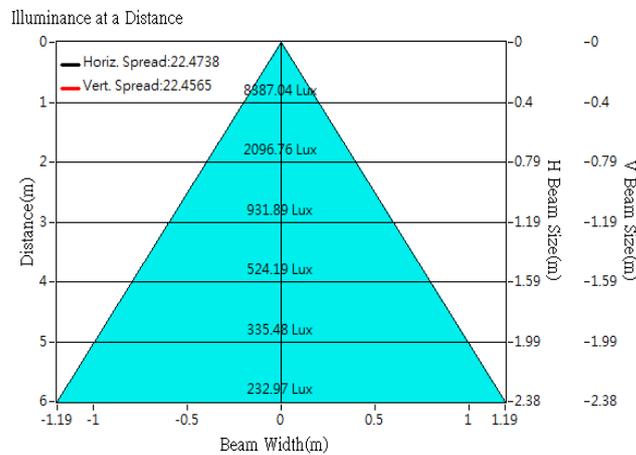
Optical Characteristics

Model Number	CKO-CH15-045021-1601	<p>"H" definition</p>
LED	CXB1520	
LES / LED Size	Φ 9 mm	
FWHM (D50)	22°	
Field Angle (D10)	48°	
H (distance)	2.5mm	
Dimension	Φ =45 mm, Thickness=20.9 mm	
Luminous Flux	2078 lm	
Material	PC / UL94V2	

cd/klm



Illuminance At Distances

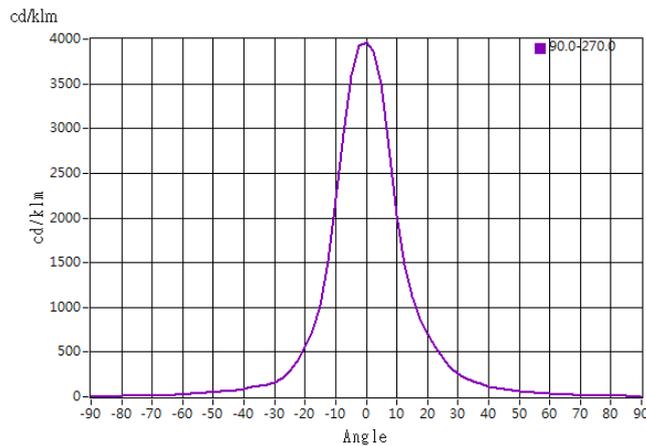




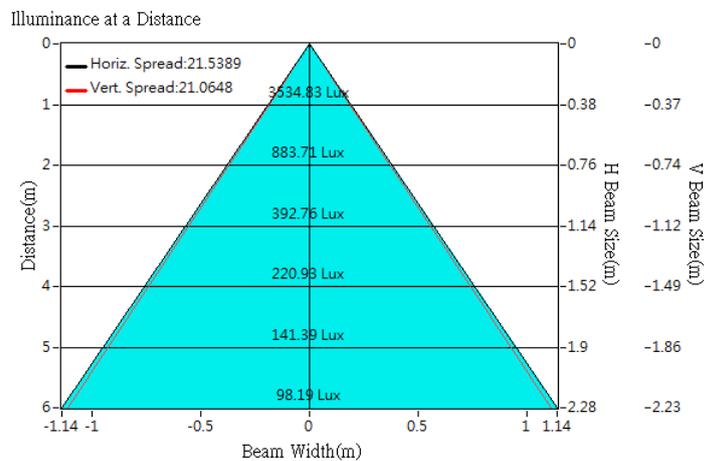
Optical Characteristics

Model Number	CKO-CH15-045021-1601		<p>"H" definition</p>
LED	CMT1407		
LES / LED Size	Φ 9.8 mm		
FWHM (D50)	22°		
Field Angle (D10)	48°		
H (distance)	2.5mm		
Dimension	Φ =45 mm, Thickness=20.9 mm		
Luminous Flux	891 lm	Measured @ 6.9 W	
Material	PC / UL94V2		

cd/klm



Illuminance At Distances

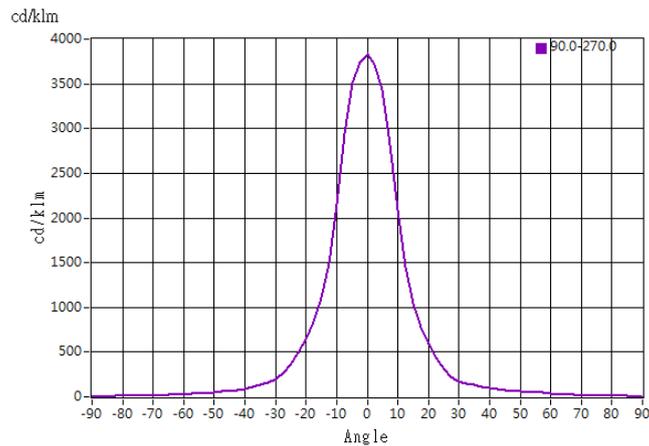




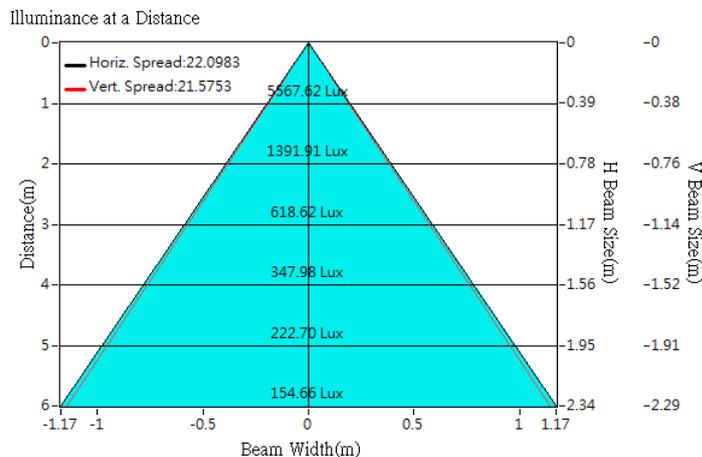
Optical Characteristics

Model Number	CKO-CH15-045021-1601	<p>"H" definition</p> <p>LES CoB "H" mm (distance)</p>
LED	CMT1412	
LES / LED Size	Φ 9.8 mm	
FWHM (D50)	22°	
Field Angle (D10)	49°	
H (distance)	2.5mm	
Dimension	Φ =45 mm, Thickness=20.9 mm	
Luminous Flux	1453 lm Measured @ 12.9 W	
Material	PC / UL94V2	

cd/klm



Illuminance At Distances

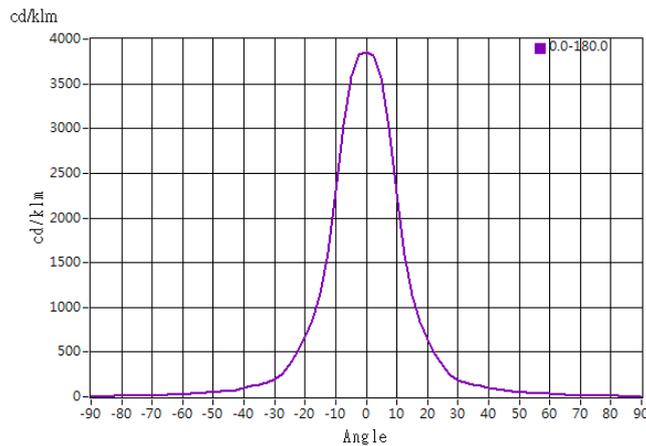




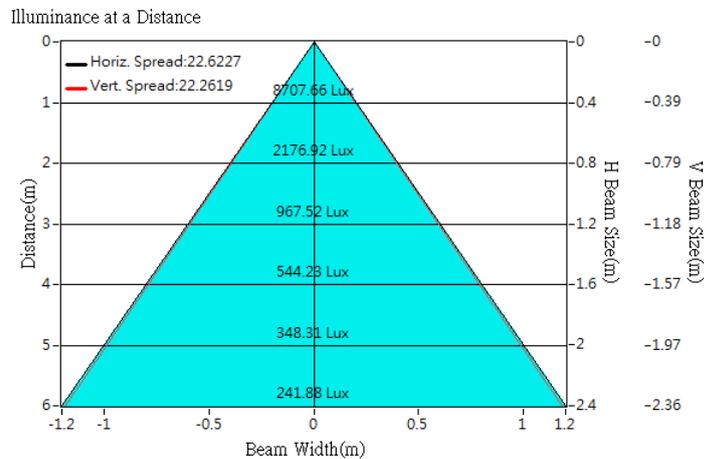
Optical Characteristics

Model Number	CKO-CH15-045021-1601	<p>"H" definition</p>
LED	CMT1420	
LES / LED Size	Φ 9.8 mm	
FWHM (D50)	23°	
Field Angle (D10)	49°	
H (distance)	2.5mm	
Dimension	Φ =45 mm, Thickness=20.9 mm	
Luminous Flux	2260 lm	
Material	PC / UL94V2	

cd/klm



Illuminance At Distances

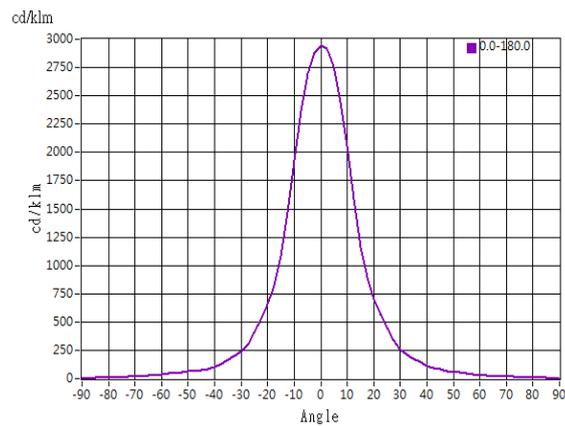




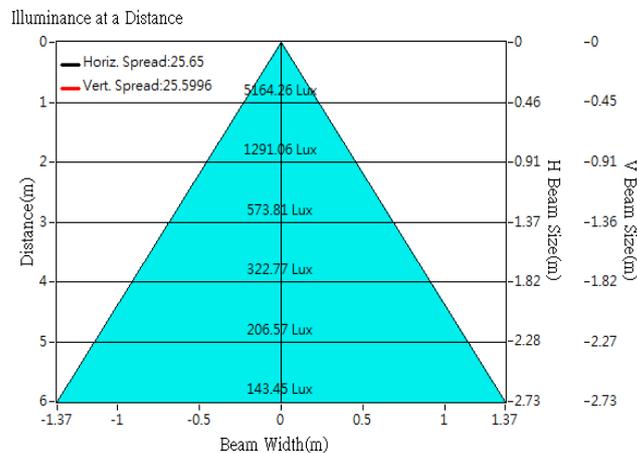
Optical Characteristics

Model Number	CKO-CH15-045021-1601	<p>"H" definition</p>
LED	CXA1816	
LES / LED Size	Φ 12 mm	
FWHM (D50)	26°	
Field Angle (D10)	57°	
H (distance)	2.5mm	
Dimension	Φ =45 mm, Thickness=20.9 mm	
Luminous Flux	1754 lm	
Material	PC / UL94V2	

cd/klm



Illuminance At Distances

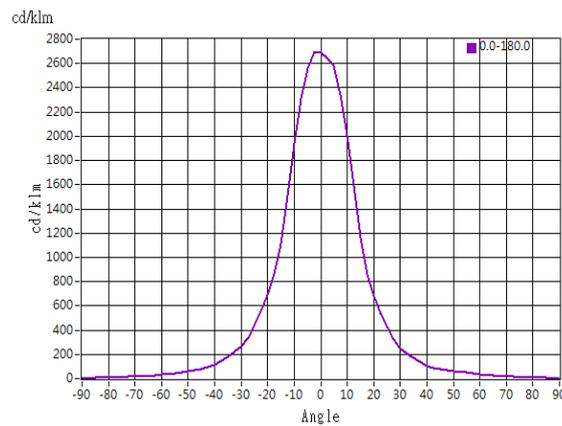




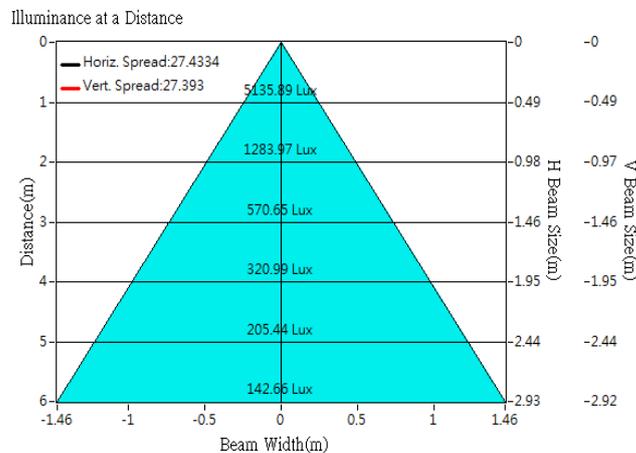
Optical Characteristics

Model Number	CKO-CH15-045021-1601		<p>"H" definition</p>
LED	CXB1816		
LES / LED Size	Φ 12 mm		
FWHM (D50)	27°		
Field Angle (D10)	59°		
H (distance)	2.5mm		
Dimension	Φ =45 mm, Thickness=20.9 mm		
Luminous Flux	1909 lm	Measured @ 15.6W	
Material	PC / UL94V2		

cd/klm



Illuminance At Distances

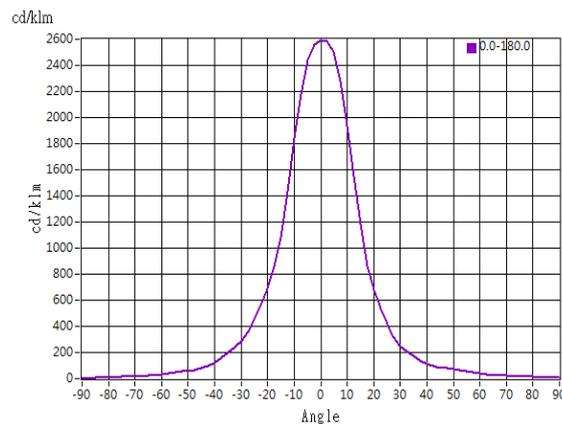




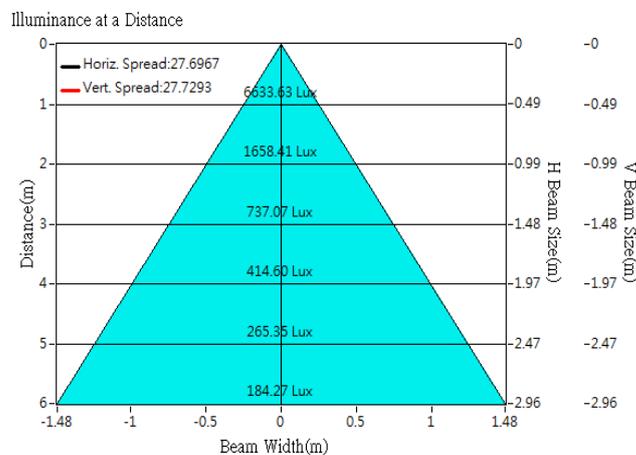
Optical Characteristics

Model Number	CKO-CH15-045021-1601		<p>"H" definition</p>
LED	CXA1820		
LES / LED Size	Φ 12 mm		
FWHM (D50)	28°		
Field Angle (D10)	61°		
H (distance)	2.5mm		
Dimension	Φ =45 mm, Thickness=20.9 mm		
Luminous Flux	2558 lm	Measured @ 30.9W	
Material	PC / UL94V2		

cd/klm



Illuminance At Distances

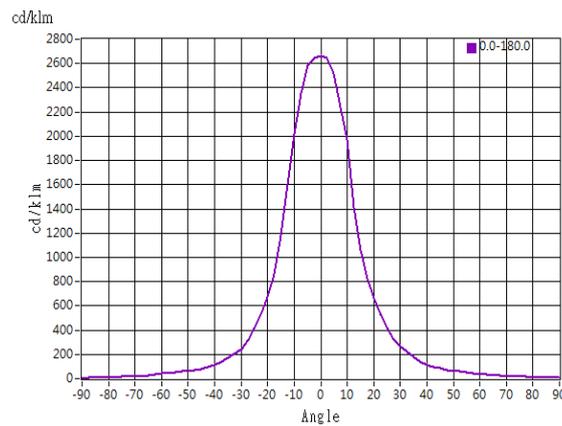




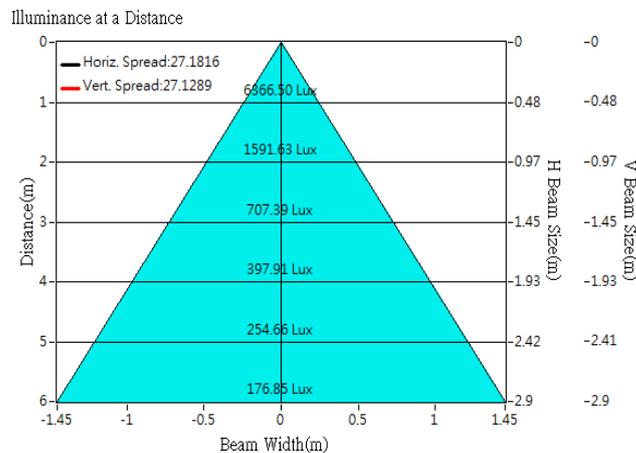
Optical Characteristics

Model Number	CKO-CH15-045021-1601		<p>"H" definition</p>
LED	CXB1820		
LES / LED Size	Φ 12 mm		
FWHM (D50)	27°		
Field Angle (D10)	59°		
H (distance)	2.5mm		
Dimension	Φ =45 mm, Thickness=20.9 mm		
Luminous Flux	2391 lm	Measured @ 19.7W	
Material	PC / UL94V2		

cd/klm



Illuminance At Distances

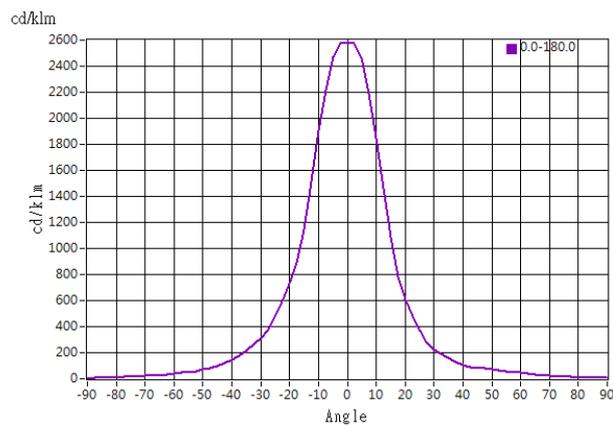




Optical Characteristics

Model Number	CKO-CH15-045021-1601	<p>"H" definition</p>
LED	CMA1825	
LES / LED Size	Φ 12 mm	
FWHM (D50)	28°	
Field Angle (D10)	61°	
H (distance)	2.5mm	
Dimension	Φ =45 mm, Thickness=20.9 mm	
Luminous Flux	2912 lm	
Material	PC / UL94V2	

cd/klm



Illuminance At Distances

