

Via Monfalcone 41
20092 Cinisello Balsamo (Milano) – Italy
Tel. +39 0266013695 – Fax +39 0266013500

CODE NUMBER: 11000000301

**SUBJECT: Secondary Optics for Power LEDs - PLJT1395
Lens Coupling - Output Luminous Intensity Measurement**



- **Typ. Illuminance@1,2m ~ 48 lux**
- High lighting efficiency
- Excellent luminous flux
- No vibration problems
- Free testing
- Superior optical engineering for a perfect uniform light distribution
- Innovative design
- Easy fixing system to the LED
- Complying with UL94 Specifications
- ☀ UV Protected

Typical Application are:

- Wall Washing
- Architectural lighting
- Lamps
- Most applications where a compact light source is required
- Any application requiring placement of LEDs in narrow or recessed spaces, as well as in diverse LED configurations

Khatod Optics are a basic element to make your optical design real.

The right optical solution is fundamental for type and number of LEDs used in your design.

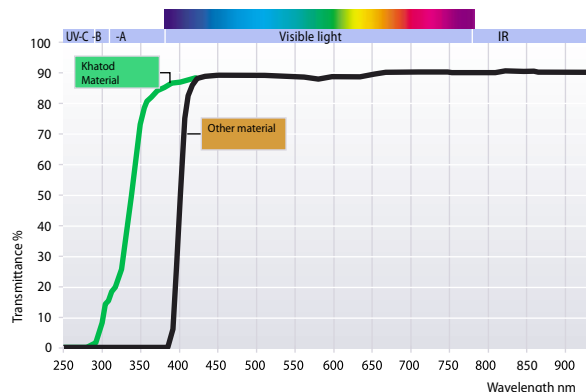
Advanced research, scientific rigour, great attention to the continuous evolution in LED Technology, have led Khatod to develop optical solutions performing an excellent, homogeneous luminous flux, and a high lighting efficiency.

The product we are proposing, is the result of Khatod's superior engineering. It helps in reducing the costs while meeting the most demanding lighting specifications and applications.

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Transmittance Curve vs Wavelength



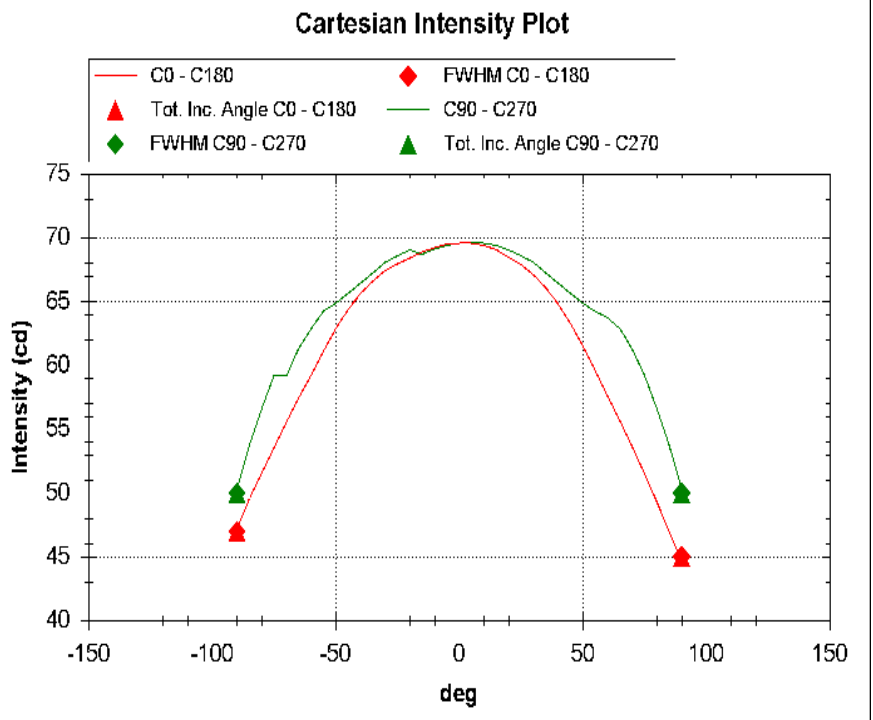
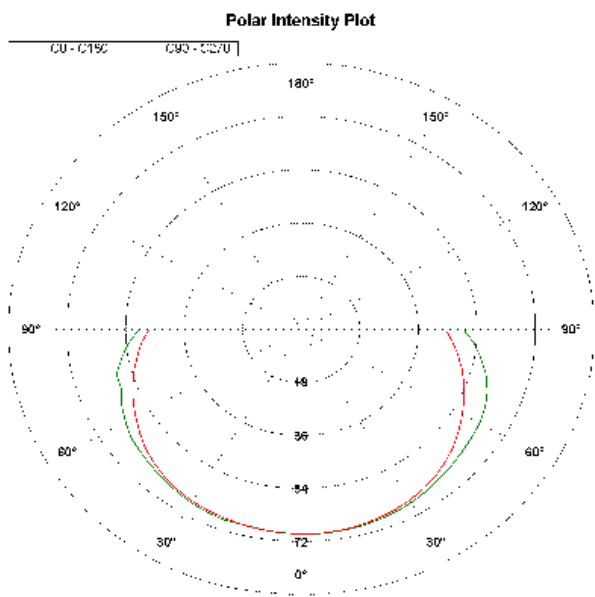
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Goniophotometer Type	KLX12M	Operator	SIMONE BASSI
Power Supply Type	ISO TECH ISP3303	Date	27/09/2011
LED Driver Type	//		

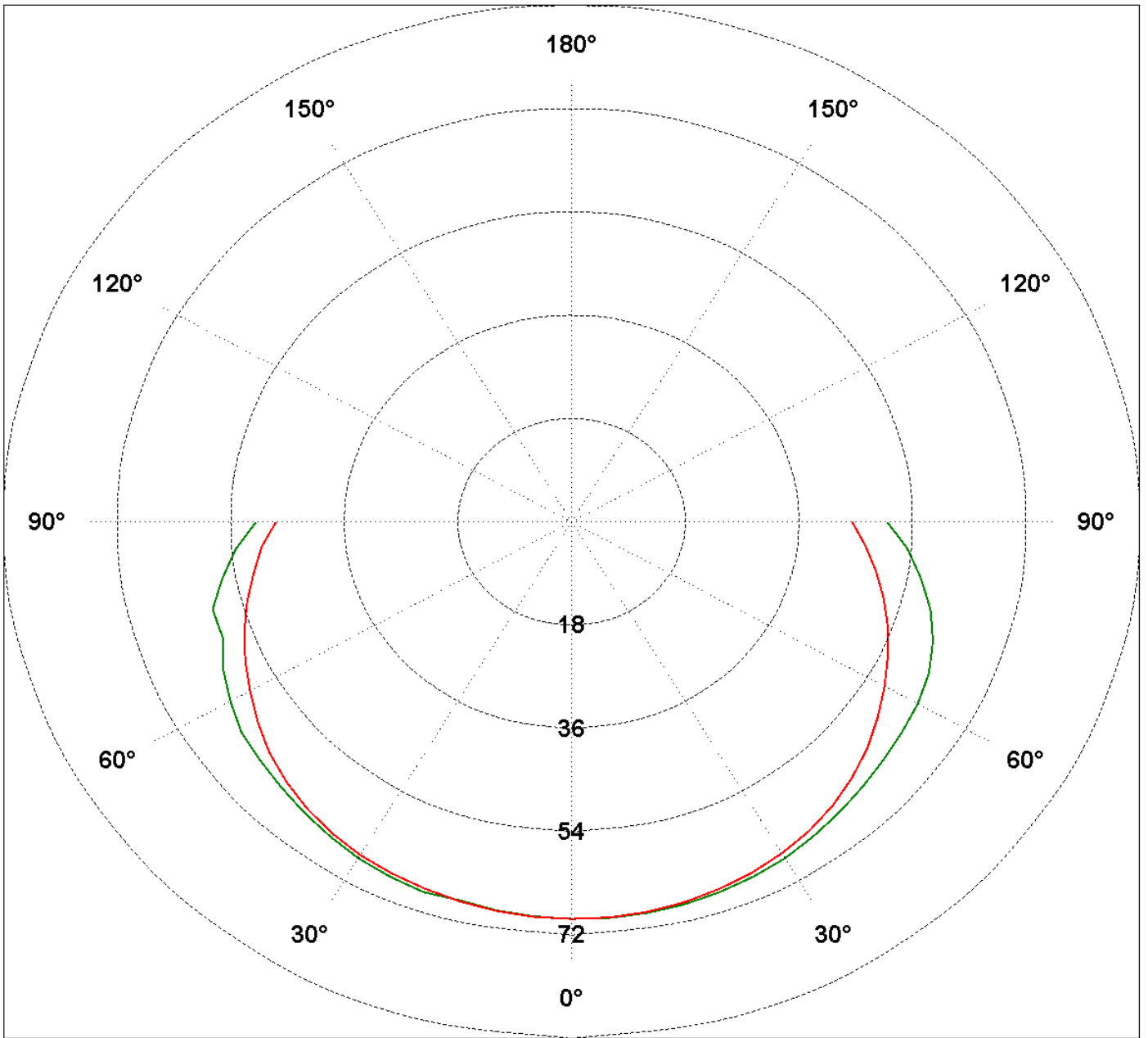
Lamp Model	//	Nominal Flux (lm)	700	Angle FWHM C Plane	180
Lens Model	PLJT1395	Total Flux (lm)	700	Angle FWHM γ Plane	180
LED Model	XICATO XSM8040-700	Imax (cd)	69.66		
N. LED	1	Max Ill. @ Meas. Dist. (lux)	7.74	Total Incl. Angle C Plane	180
Rated Voltage (V)	32	Measurement Distance (m)	3	Total Incl. Angle γ Plane	180
LED Drive Current (mA)	700	Room Temperature (°C)	25		

Notes:
General Optical Measurement Tolerance: +/-10%



Polar Intensity Plot

— C0 - C180 — C90 - C270



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Figure C0-C180

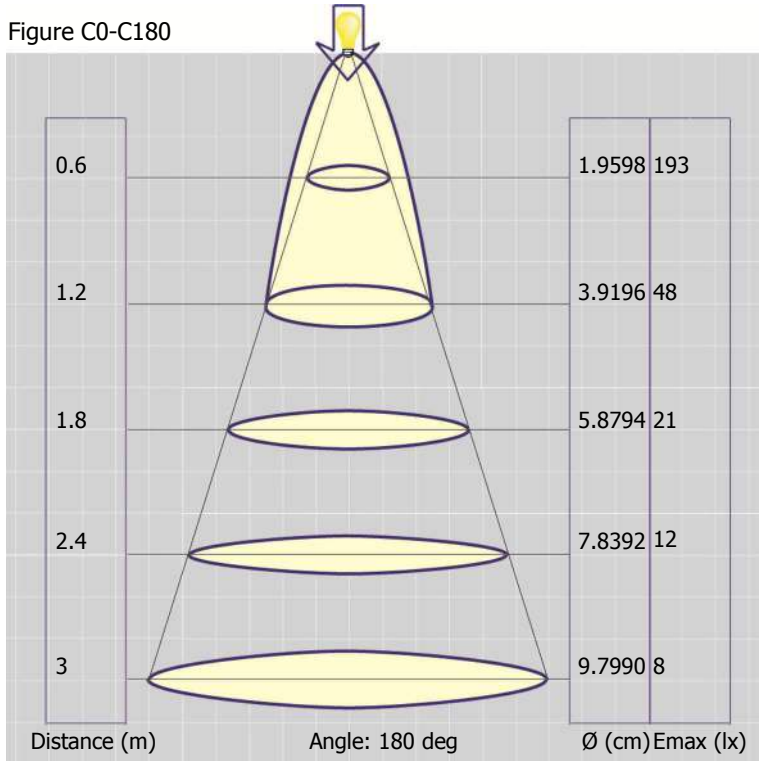
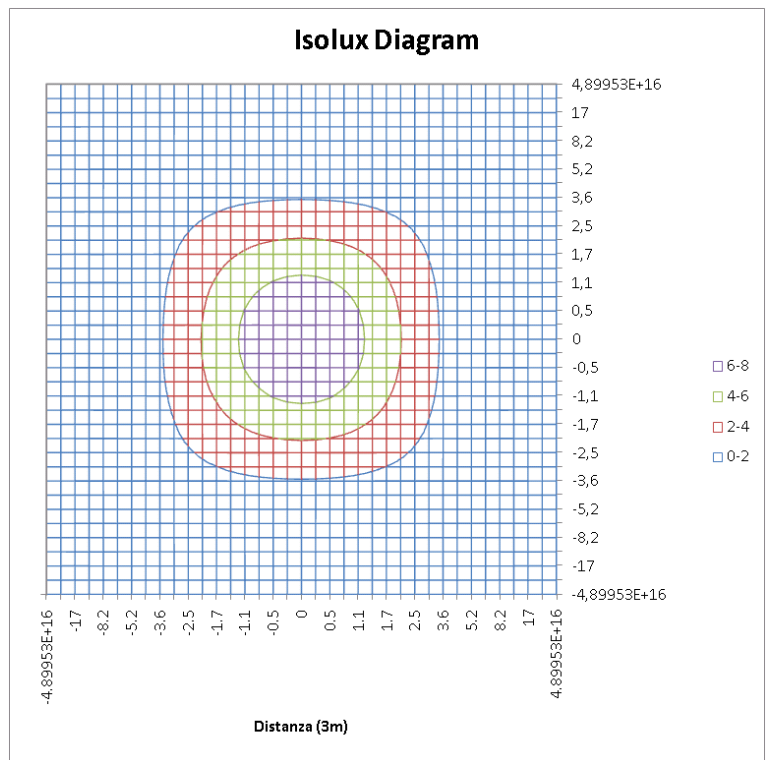
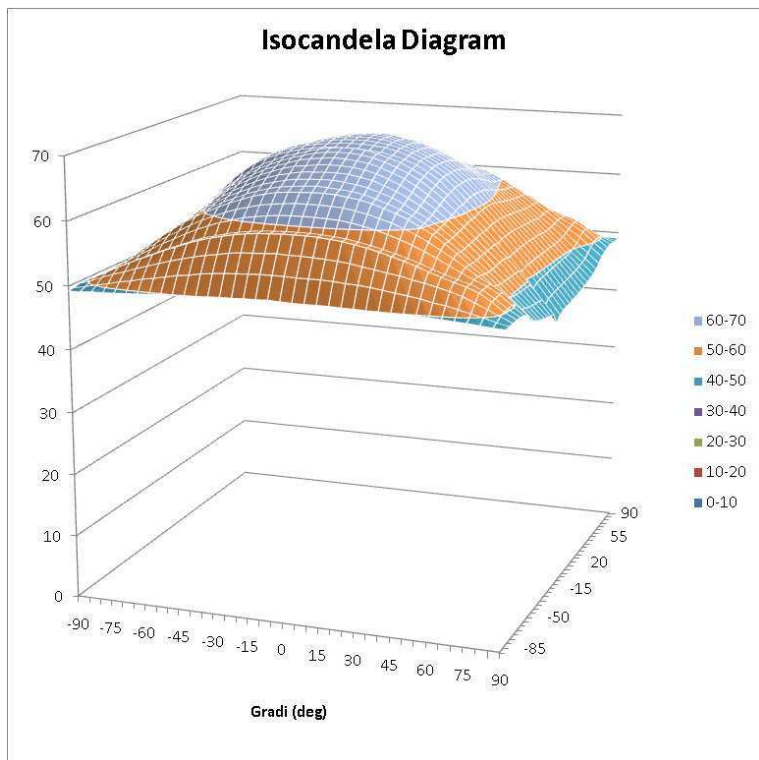
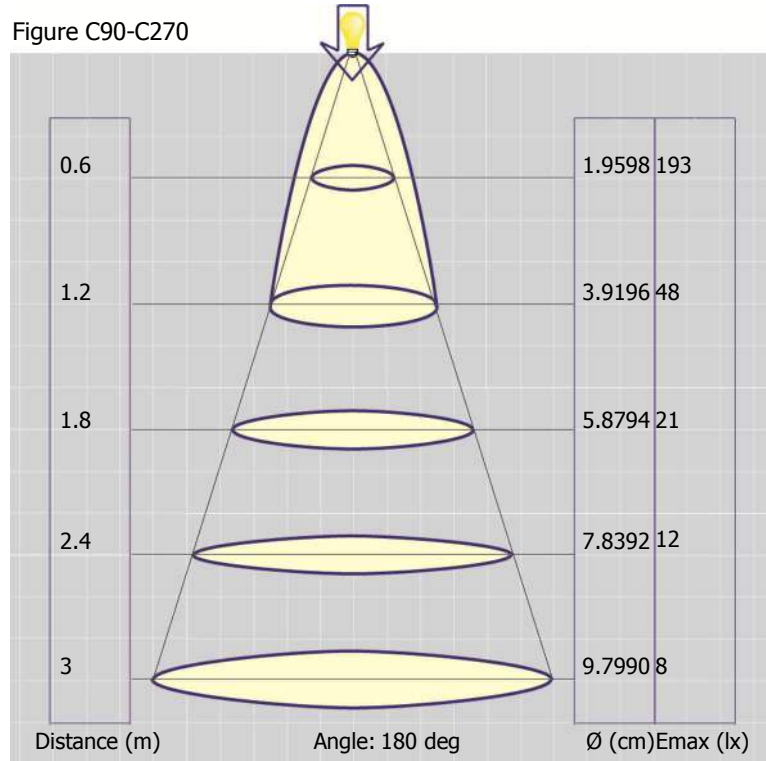
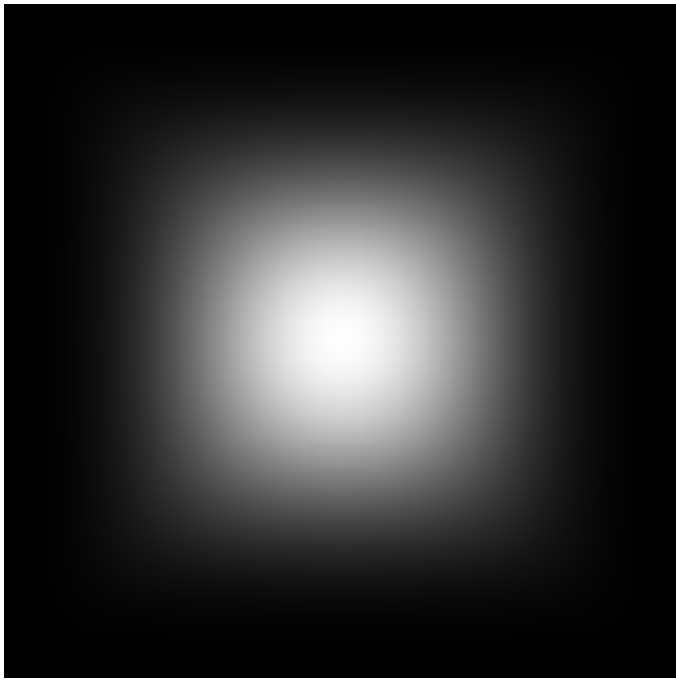


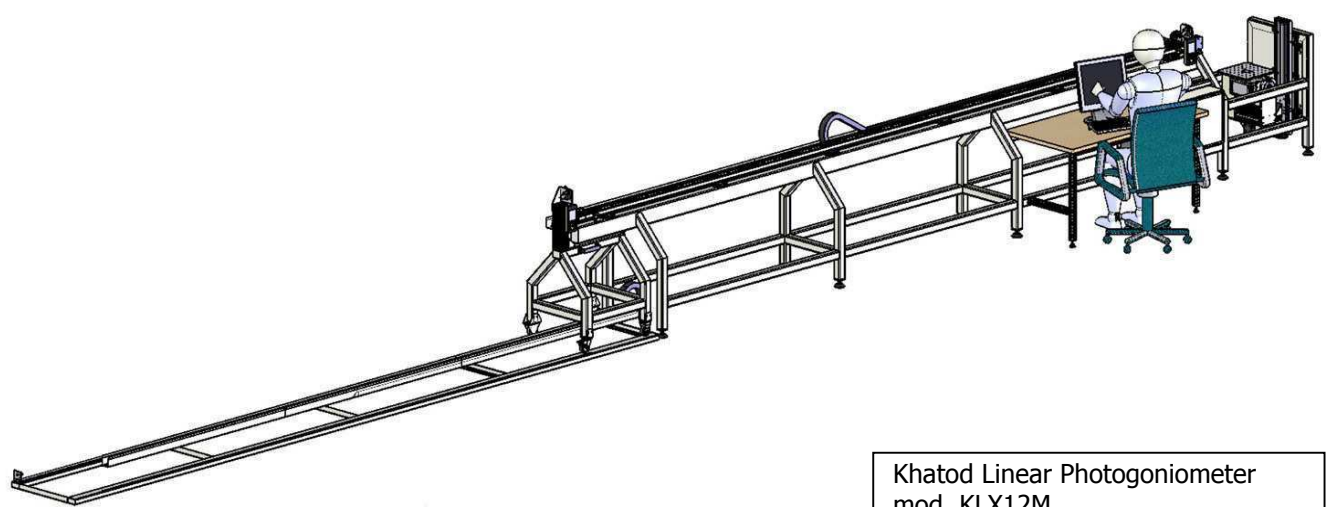
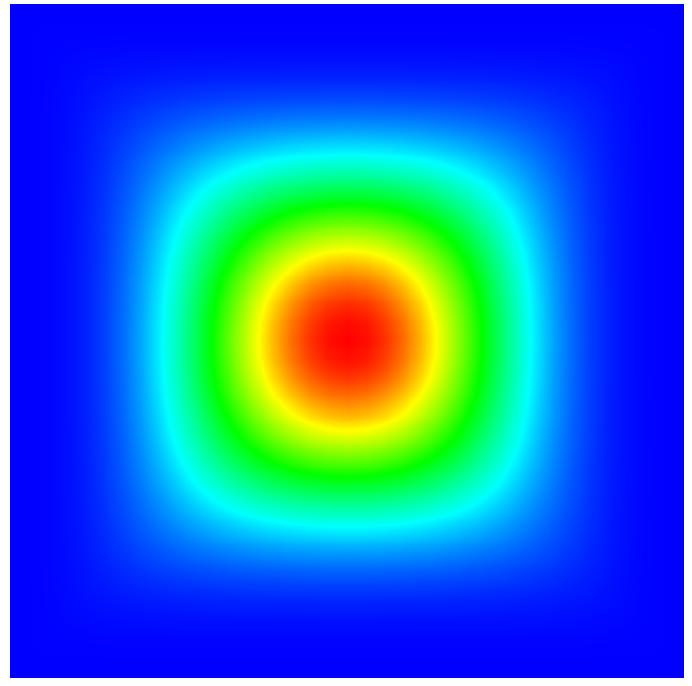
Figure C90-C270



Gray Scale Illuminance @ 5m Distance



False Colours Illuminance @ 5m Distance



Khatod Linear Photogoniometer
mod. KLX12M

Luminous Distribution Intensity Data

CODE NUMBER: 11000000301

C (deg) γ (deg)	0°	10°	20°	30°	40°	50°	60°	70°	80°	90°	100°	110°	120°	130°	140°	150°	160°	170°	180°	190°
0°	69.6	69.6	69.6	69.6	69.6	69.6	69.6	69.6	69.6	69.6	69.6	69.6	69.6	69.6	69.6	69.6	69.6	69.6	69.6	69.6
5°	69.6	69.6	69.6	69.6	69.6	69.6	69.6	69.7	69.7	69.7	69.6	69.6	69.6	69.5	69.5	69.5	69.5	69.5	69.5	69.5
10°	69.4	69.4	69.4	69.5	69.5	69.5	69.6	69.6	69.6	69.6	69.5	69.5	69.4	69.4	69.3	69.3	69.2	69.2	69.2	69.2
15°	69	69	69.1	69.1	69.2	69.3	69.4	69.4	69.4	69.4	69.3	69.2	69.1	69.1	69	69	68.9	68.9	68.9	68.8
20°	68.5	68.5	68.6	68.6	68.8	68.9	69	69.1	69.1	69	68.9	68.8	68.8	68.7	68.6	68.6	68.5	68.4	68.4	68.4
25°	67.9	67.9	67.9	68.1	68.2	68.3	68.5	68.6	68.6	68.6	68.5	68.4	68.2	68.1	68	68	68	67.9	68	68.1
30°	67.1	67	67.2	67.3	67.5	67.7	67.9	68	68	68	67.9	67.9	67.7	67.5	67.4	67.3	67.3	67.3	67.4	67.5
35°	66.1	66.1	66.2	66.4	66.7	66.9	67.2	67.2	67.3	67.2	67.2	67.1	67	66.8	66.6	66.5	66.5	66.5	66.6	66.7
40°	64.8	64.9	65.1	65.4	65.8	66	66.4	66.4	66.5	66.4	66.4	66.3	66.3	66	65.8	65.7	65.5	65.5	65.6	65.8
45°	63.3	63.4	63.8	64.2	64.7	65	65.4	65.6	65.6	65.6	65.6	65.5	65.4	65.2	64.8	64.6	64.4	64.3	64.4	64.6
50°	61.6	61.7	62.2	62.8	63.4	64	64.4	64.7	64.8	64.9	64.8	64.7	64.5	64.1	63.8	63.3	63	62.8	62.9	63.1
55°	59.6	59.8	60.4	61.2	62.1	62.9	63.5	64	64.3	64.3	64.2	64	63.6	63.1	62.6	62	61.5	61.2	61.1	61.3
60°	57.6	57.9	58.6	59.7	60.8	61.9	62.8	63.5	63.7	63.7	63.6	63.3	62.8	62.1	61.4	60.5	59.8	59.5	59.2	59.5
65°	55.6	56	56.8	58.1	59.6	61	62.1	62.8	62.9	62.8	62.8	62.6	62	61.2	60.2	59.1	58.2	57.8	57.4	57.6
70°	53.6	54.1	55.1	56.6	58.4	60.2	61.5	61.8	61.5	61.3	61.4	61.6	61.3	60.3	59.1	57.7	56.6	56	55.5	55.7
75°	51.5	52	53.4	55.1	57.2	59.4	60.5	60.2	59.5	59.2	59.5	60.2	60.3	59.5	58	56.3	54.8	54.2	53.6	53.7
80°	49.2	50	51.5	53.5	56.1	58.4	59	58.2	57	56.5	57.1	58.3	59	58.5	56.9	54.8	53	52.2	51.5	51.7
85°	47	47.8	49.6	52	55	57.3	57.3	55.7	54.3	53.7	54.4	55.9	57.4	57.4	55.8	53.3	51.1	50.1	49.6	50.1
90°	44.7	45.6	47.8	50.6	53.9	56	55.5	53.5	51.2	50.3	51.2	53.5	55.5	56.1	54.7	51.9	49.3	48	47.2	47.5

200°	210°	220°	230°	240°	250°	260°	270°	280°	290°	300°	310°	320°	330°	340°	350°
69.6	69.6	69.6	69.6	69.6	69.6	69.6	69.6	69.6	69.6	69.6	69.6	69.6	69.6	69.6	69.6
69.4	69.4	69.4	69.4	69.4	69.4	69.4	69.4	69.4	69.4	69.4	69.4	69.5	69.5	69.5	69.5
69.2	69.2	69.1	69.1	69.1	69.1	69.1	69.1	69.1	69.2	69.2	69.2	69.2	69.3	69.3	69.3
68.8	68.8	68.8	68.8	68.8	68.7	68.7	68.7	68.7	68.7	68.8	68.8	68.9	68.9	69	69
68.5	68.5	68.4	68.4	68.6	68.7	68.9	69	69	68.9	68.7	68.4	68.5	68.6	68.5	68.5
68	68	68	68.1	68.2	68.4	68.5	68.6	68.6	68.6	68.5	68.3	68	68	68	67.9
67.5	67.5	67.4	67.5	67.7	67.9	67.9	68	68	68	67.9	67.7	67.5	67.3	67.2	67.1
66.8	66.6	66.6	66.8	67	67.1	67.2	67.2	67.3	67.2	67.2	66.9	66.7	66.4	66.3	66.1
65.9	65.7	65.8	66	66.3	66.3	66.4	66.4	66.5	66.4	66.4	66	65.8	65.4	65.1	64.9
64.8	64.6	64.8	65.2	65.4	65.5	65.6	65.6	65.6	65.6	65.4	65	64.7	64.2	63.7	63.4
63.2	63.3	63.8	64.1	64.5	64.7	64.8	64.9	64.8	64.7	64.4	64	63.4	62.8	62	61.6
61.5	62	62.6	63.1	63.6	64	64.2	64.3	64.3	64	63.5	62.9	62.1	61.2	60.3	59.7
59.8	60.5	61.4	62.1	62.8	63.1	62.9	62.8	63	63.2	62.8	61.9	60.8	59.7	58.6	57.8
58.2	59.1	60.2	61.2	61.8	61.7	61.4	61.3	61.5	61.8	61.9	61	59.6	58.1	56.8	55.9
56.6	57.7	59.1	60.3	60.5	60.2	59.5	59.2	59.5	60.2	60.7	60.2	58.4	56.6	55.1	53.8
54.8	56.3	58	59.1	59.2	58.5	59.1	59.2	59	58.4	59.2	59.1	57.2	55.1	53.4	51.7
53	54.8	56.9	57.8	57.6	58.3	57.1	56.5	57	58.2	57.3	57.8	56.1	53.5	51.5	49.3
51.1	53.3	55.8	56.5	57	55.9	54.4	53.7	54.3	55.7	56.8	56.5	55	52	49.6	46.8
49.3	51.9	54.5	55.1	55.5	53.5	51.2	50.3	51.2	53.5	55.5	55	53.9	50.6	47.8	44.3

Lens characteristics

Parameter	Symbol	Rating	Unit
Lens Material	PC Optics	--	--
Holder Material	--	--	--
Operating Temperature	Topr	-40 to +120	°C
Storage Temperature	Tstg	-40 to +120	°C

Notes:

Please note that flow lines and weld lines on the external surfaces of the lenses are acceptable if the optical performance of the lens is within the specification described in the section "OPTICAL CHARACTERISTICS"

- Should you require further information, please contact Khatod for advice.
- All lens testing must be subject to identical conditions as Khatod test condition.
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KHATOD LENS Use And Maintenance

- DO NOT HANDLE OR INSTALL LENSES WITHOUT WEARING GLOVES, SKIN OILS MAY DAMAGE LENS OR LIGHT TRANSMISSION
- CLEAN LENSES WITH MILD SOAP AND WATER AND A SOFT CLOTH
- DO NOT USE ANY COMMERCIAL CLEANING SOLVENTS ON LENSES

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