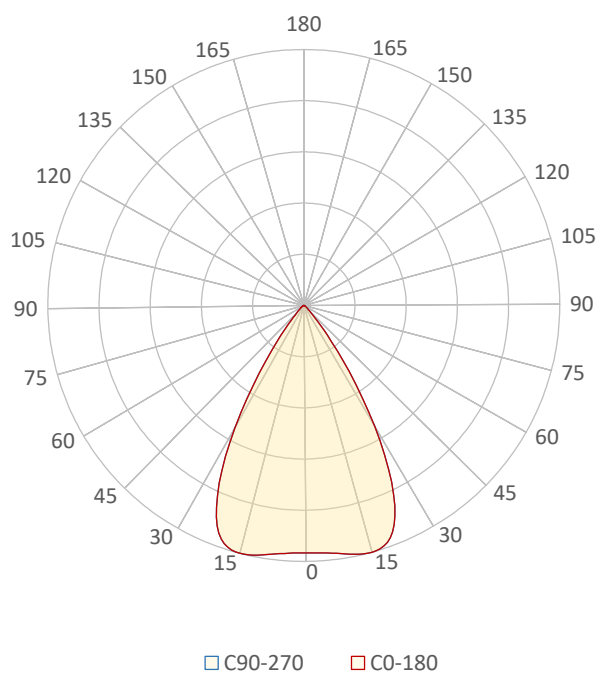


General Discription

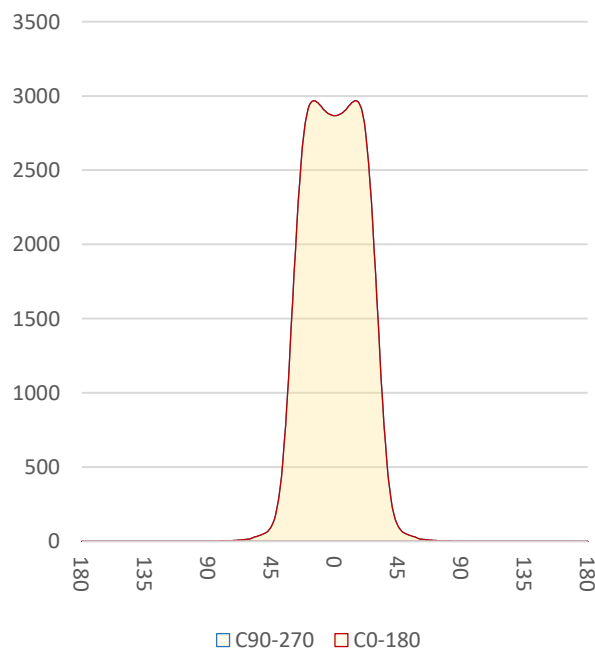
Item number	E-OL7-X-X-3090
Date and time	2-12-2022 11:31:57
CCT (Kelvin)	2960 K
Beam angle	61,5°
Luminous flux	2840 lm
Efficiency	81 lm/watt
Weighted energy	35,2 kWh/1000h
Power factor	0,98
CRI (RA)	92,7
Fidelity index Rf	Rf 90,1
Gammut index Rg	Rg 103,2
Peak	2967 cd



Polar diagram



Cartesian diagram

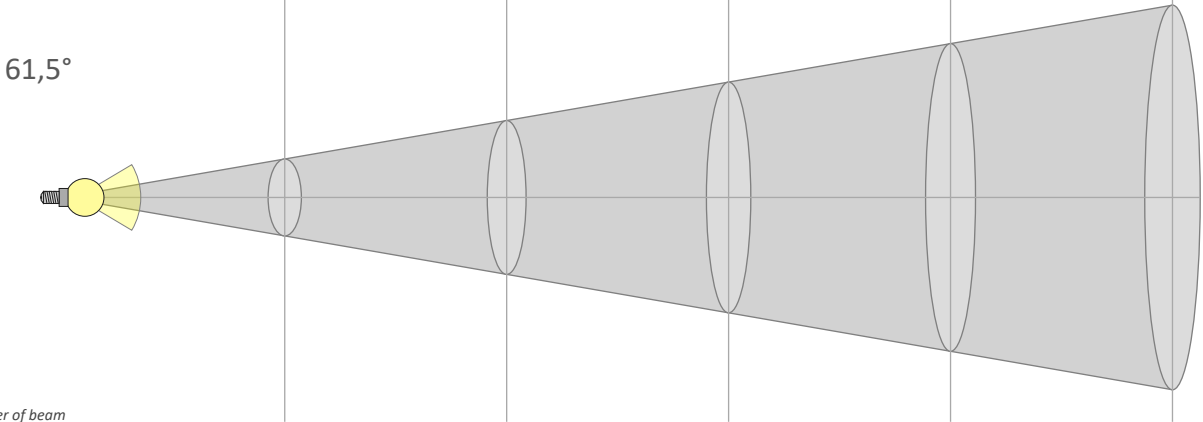


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Test Report

LM79-EMERALD-OFFICE-L7-3000K-CRI90

Beam details	1m	2m	3m	4m	5m
Lux*	2868 lx	717 lx	319 lx	179 lx	115 lx



61,5°

*measured at center of beam

Footcandles*	266,4 fcd	66,6 fcd	29,6 fcd	16,7 fcd	10,7 fcd
Beam width (meter)	1,2 m	2,4 m	3,6 m	4,8 m	6 m
Beam width (Feet)	3,9 ft	7,8 ft	11,7 ft	15,6 ft	19,5 ft

Beam intensities																			
1m	2m	3m	4m	5m	6m	7m	8m	9m	10m	11m	12m	13m	14m	15m	16m	17m	18m	19m	20m
2868lx	717lx	319lx	179lx	115lx	80lx	59lx	45lx	35lx	29lx	24lx	20lx	17lx	15lx	13lx	11lx	10lx	9lx	8lx	7lx
3,3ft	6,6ft	9,8ft	13,1ft	16,4ft	19,7ft	23ft	26,2ft	29,5ft	32,8ft	36,1ft	39,4ft	42,7ft	45,9ft	49,2ft	52,5ft	55,8ft	59,1ft	62,3ft	65,6ft
266,4fcd	66,6fcd	29,6fcd	16,7fcd	10,7fcd	7,4fcd	5,4fcd	4,2fcd	3,3fcd	2,7fcd	2,2fcd	1,9fcd	1,6fcd	1,4fcd	1,2fcd	1fcd	0,9fcd	0,8fcd	0,7fcd	0,7fcd

Intensities in 0° c-plane																			
0°	2°	4°	6°	8°	10°	12°	14°	16°	18°	20°	22°	24°	26°	28°	30°	32°	34°	36°	38°
2868	2870	2878	2890	2910	2932	2954	2966	2964	2939	2873	2746	2547	2285	1971	1623	1265	933	653	436
100%	100%	100%	101%	101%	102%	103%	103%	103%	102%	100%	96%	89%	80%	69%	57%	44%	33%	23%	15%

Intensities in 90° c-plane																			
0°	2°	4°	6°	8°	10°	12°	14°	16°	18°	20°	22°	24°	26°	28°	30°	32°	34°	36°	38°
2868	2870	2878	2890	2910	2932	2954	2966	2964	2939	2873	2746	2547	2285	1971	1623	1265	933	653	436
100%	100%	100%	101%	101%	102%	103%	103%	103%	102%	100%	96%	89%	80%	69%	57%	44%	33%	23%	15%

Intensities in 180° c-plane																			
0°	2°	4°	6°	8°	10°	12°	14°	16°	18°	20°	22°	24°	26°	28°	30°	32°	34°	36°	38°
2868	2870	2878	2890	2910	2932	2954	2966	2964	2939	2873	2746	2547	2285	1971	1623	1265	933	653	436
100%	100%	100%	101%	101%	102%	103%	103%	103%	102%	100%	96%	89%	80%	69%	57%	44%	33%	23%	15%

Intensities in 270° c-plane																			
0°	2°	4°	6°	8°	10°	12°	14°	16°	18°	20°	22°	24°	26°	28°	30°	32°	34°	36°	38°
2868	2870	2878	2890	2910	2932	2954	2966	2964	2939	2873	2746	2547	2285	1971	1623	1265	933	653	436
100%	100%	100%	101%	101%	102%	103%	103%	103%	102%	100%	96%	89%	80%	69%	57%	44%	33%	23%	15%

Beam angle 50%	Field angle 10%	Cutoff angle 2,5%	Intensity ratio in 120° cone	Intensity ratio in 90° cone
61,5°	79,6°	94,1°	99,4%	97,3%



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 info@cls-led.com
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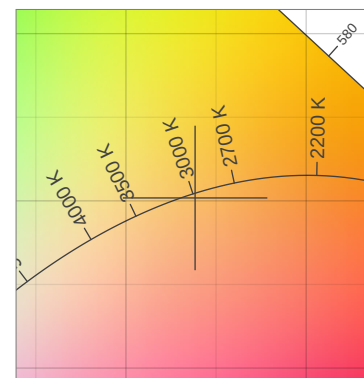
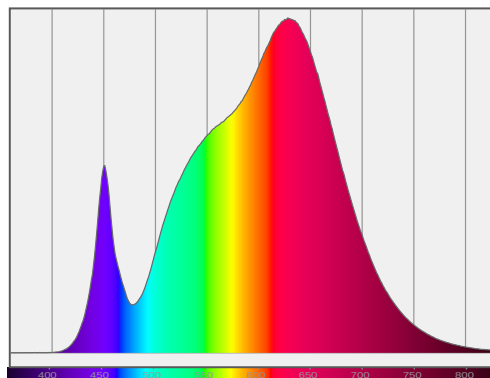
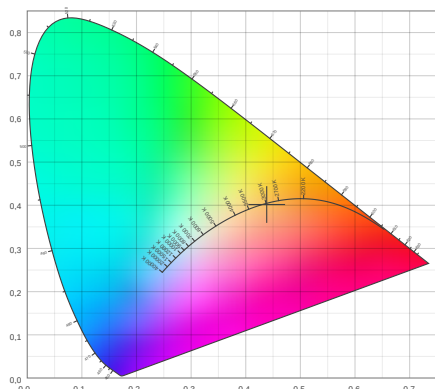
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Test Report

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Color details



CIE 1931

x: 0,438



Spectra

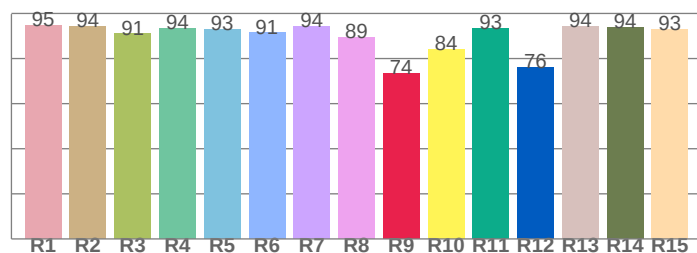
CIE 1931 ZOOM

2960 K

y: 0,402

 $\Delta uv: -0,0011$

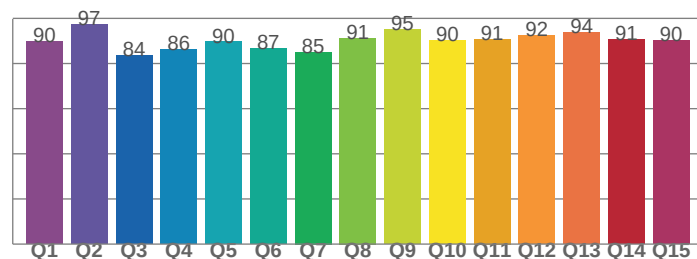
CRI: 92,7 (R1-R8)



CRI values, R1-R8 are used to calculate final CRI value

R1	R2	R3	R4	R5	R6	R7	R8
94,7	94,2	91,0	93,6	93,0	91,4	94,3	89,5
R9	R10	R11	R12	R13	R14	R15	
73,5	84,1	93,4	76,2	94,3	93,8	92,8	

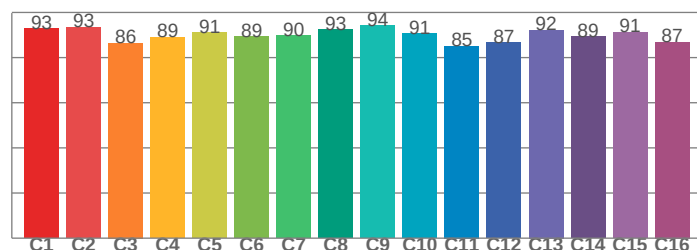
CQS: 89,4



CQS values

Q1	Q2	Q3	Q4	Q5	Q6	Q7	Q8
89,9	97,2	83,6	86,1	89,6	86,7	85,1	91,3
Q9	Q10	Q11	Q12	Q13	Q14	Q15	
95,0	90,1	90,8	92,4	93,9	90,7	90,1	

TM30: 90,1



TM30 values, 16 binned values out of total of 99 values

C1	C2	C3	C4	C5	C6	C7	C8
92,9	93,5	86,5	89,0	91,0	89,4	89,7	92,5
C9	C10	C11	C12	C13	C14	C15	
94,1	90,6	85,2	86,7	92,2	89,4	91,3	

Color parameters

Color temperature	Color rendering index	Red component	Color fidelity	Color gamut	Color quality scale	Color coordinate cie 1931	Color coordinate cie 1931	Color coordinate	Color coordinate	Color deviation from black body
CCT	CRI	CRI R9	TM30 Rf	TM30 Rg	CQS	x	y	u	v	Δuv
2960 K	92,7	73,5	90,1	103,2	89,4	0,438	0,402	0,253	0,347	-0,0011



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info@cls-led.com
www.cls-led.com

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Test Report

LM79-EMERALD-OFFICE-L7-3000K-CRI90

TM30 details

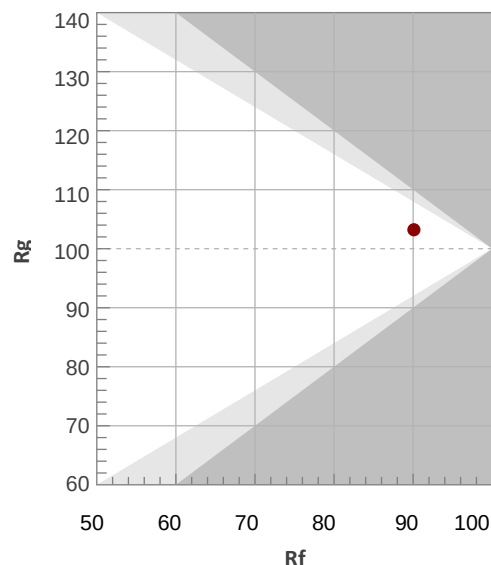
Rf 90,1

Fidelity index Rf

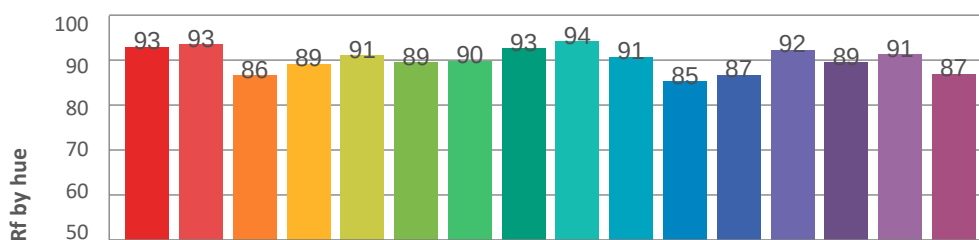
Rg 103,2

Gamut index Rg

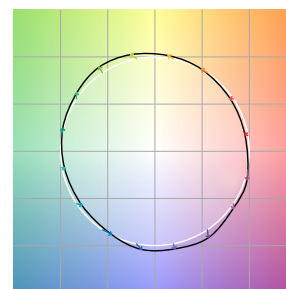
Hue Bin	R _f	Graphic shifts (%)	
		Chroma	Hue
1	93	-3%	-2%
2	93	-3%	2%
3	86	0%	7%
4	89	2%	6%
5	91	5%	5%
6	89	7%	0%
7	90	3%	-6%
8	93	1%	-5%
9	94	-3%	-2%
10	91	-4%	4%
11	85	-1%	11%
12	87	5%	6%
13	92	5%	0%
14	89	8%	-4%
15	91	3%	-5%
16	87	2%	-11%



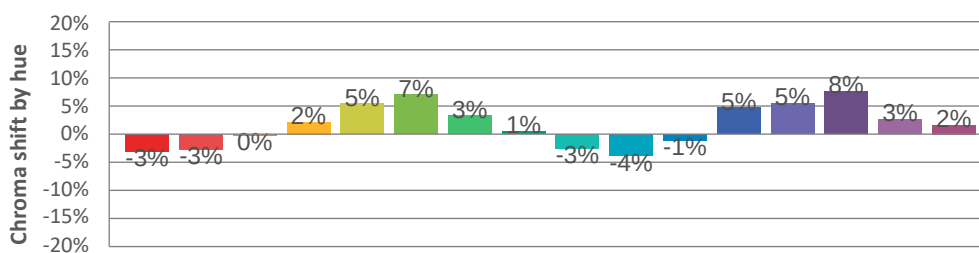
Hue binH



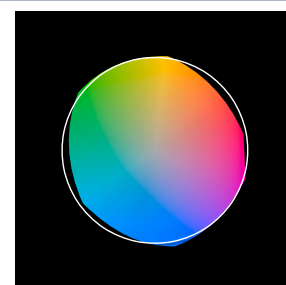
Color vector graphics



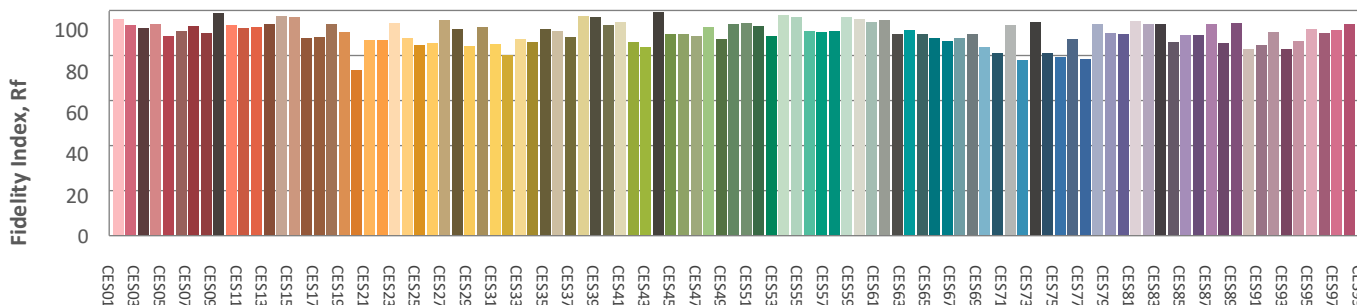
Hue bin



Color distortion graphics



Color Evaluation Sample



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Test Report

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Glare Evaluation According to UGR

p Ceiling		70	70	50	50	30	70	70	50	50	30
p Walls		50	30	50	30	30	50	30	50	30	30
p Floor		20	20	20	20	20	20	20	20	20	20
Room size X Y		Viewing direction at right angles to lamp axis					Viewing direction parallel to lamp axis				
2H	2H	23,6	24,3	23,7	24,5	24,7	23,6	24,3	23,7	24,5	24,7
	3H	23,3	24,1	23,7	24,3	24,5	23,3	24,1	23,7	24,3	24,5
	4H	23,3	24,0	23,7	24,2	24,5	23,3	24,0	23,7	24,2	24,5
	6H	23,3	23,9	23,6	24,2	24,5	23,3	23,9	23,6	24,2	24,5
	8H	23,2	23,8	23,5	24,1	24,5	23,2	23,8	23,5	24,1	24,5
	12H	23,2	23,7	23,5	24,1	24,5	23,2	23,7	23,5	24,1	24,5
4H	2H	23,3	24,0	23,7	24,2	24,5	23,3	24,0	23,7	24,2	24,5
	3H	23,2	23,7	23,5	24,1	24,5	23,2	23,7	23,5	24,1	24,5
	4H	23,0	23,5	23,4	24,0	24,5	23,0	23,5	23,4	24,0	24,5
	6H	22,9	23,5	23,4	23,8	24,2	22,9	23,5	23,4	23,8	24,2
	8H	22,9	23,4	23,4	23,7	24,1	22,9	23,4	23,4	23,7	24,1
	12H	22,8	23,2	23,3	23,6	24,1	22,8	23,2	23,3	23,6	24,1
8H	4H	22,9	23,4	23,4	23,7	24,1	22,9	23,4	23,4	23,7	24,1
	6H	22,8	23,2	23,3	23,6	24,1	22,8	23,2	23,3	23,6	24,1
	8H	22,8	23,1	23,3	23,6	24,2	22,8	23,1	23,3	23,6	24,2
	12H	22,8	23,0	23,3	23,5	24,1	22,8	23,0	23,3	23,5	24,1
12H	4H	22,8	23,2	23,3	23,6	24,1	22,8	23,2	23,3	23,6	24,1
	6H	22,8	23,1	23,3	23,6	24,2	22,8	23,1	23,3	23,6	24,2
	8H	22,8	23,0	23,3	23,5	24,1	22,8	23,0	23,3	23,5	24,1
Variation of the observer position for the luminaire distance S											
S = 1.0H		6,0 / -12,4					6,0 / -12,4				
S = 1.5H		8,8 / -16,0					8,8 / -16,0				
S = 2.0H		10,8 / -17,6					10,8 / -17,6				
Standard table		n/a					n/a				
Correction summand		n/a					n/a				
Corrected glare indices referring to 2840lm total luminous flux											



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info@cls-led.com
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