

Report No.: MSTLAB250520003

Test Time: 2025-05-23

## Luminaire Property

Luminaire Manufacturer: MESTER

Luminaire Category:

Luminaire Description: ALL054F40W27V35K DOWN100%

Lamp Catalog: L128-ETSP2-YKCIE-SC(2790)+L128-ETSP2-YHCIE-SC(5090)

Lamp Description: BQ-40-0820-47-AD

Number of Lamps: 1

Lumens per Lamp:

Luminous Length (mm): 1200

Luminous Width (mm): 63

Luminous Height (mm):

Voltage: 120.1 V

Current: 0.313 A

Power: 37.47 W

Power Factor: 0.997

## Photometric Results

CIE Class: Direct

Measurement Flux: 1856.2 lm

Downward Ratio: 100%

Horizontal Diffuse Angle(10%,50%,75%,100%): H112.4,H65.5,H39.2,H0

Vertical Diffuse Angle(10%,50%,75%,100%): V113.2,V69.8,V42.5,V0

Luminous Efficacy (lm/w): 49.54

C0r0 Intensity: 1450.31 cd

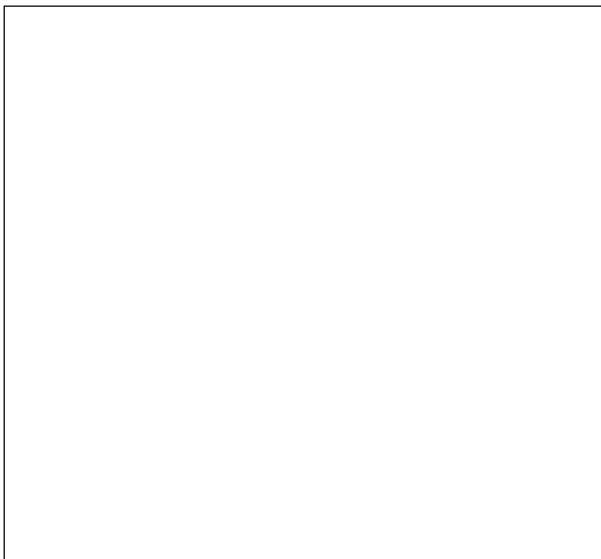
Max. Intensity: 1452 cd

Pos of Max. Intensity: H150 V1

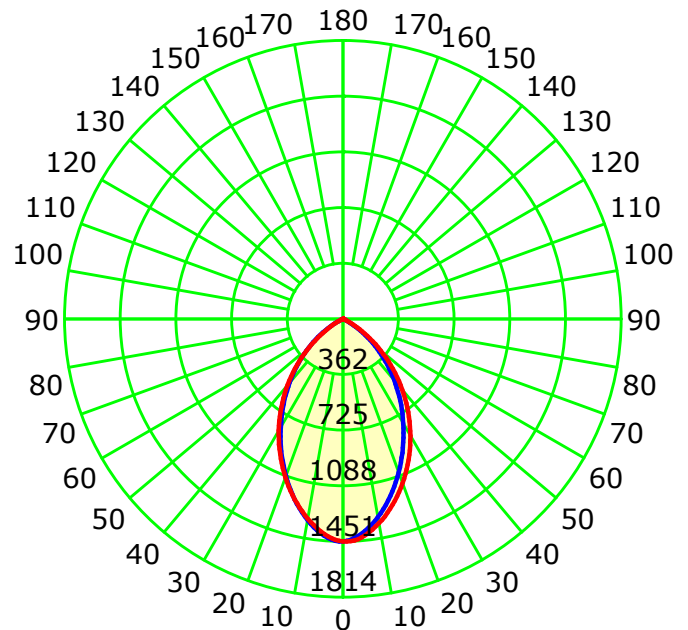
S/MH(C0/C180): 0.90

S/MH(C90/C270): 0.95

Picture Of Luminaire



Luminous Intensity Distribution Curve



Unit: cd

Average Diffuse Angle(50%): 67.6°

— C0-C180 — C90-C270

C Plane (°):0.0-360.0: 30.0

Test Lab: EVERFINE

Test Type: TYPE C

Temperature: 25.3℃

Operator:

Gamma Plane (°):0.0-90.0:1.0

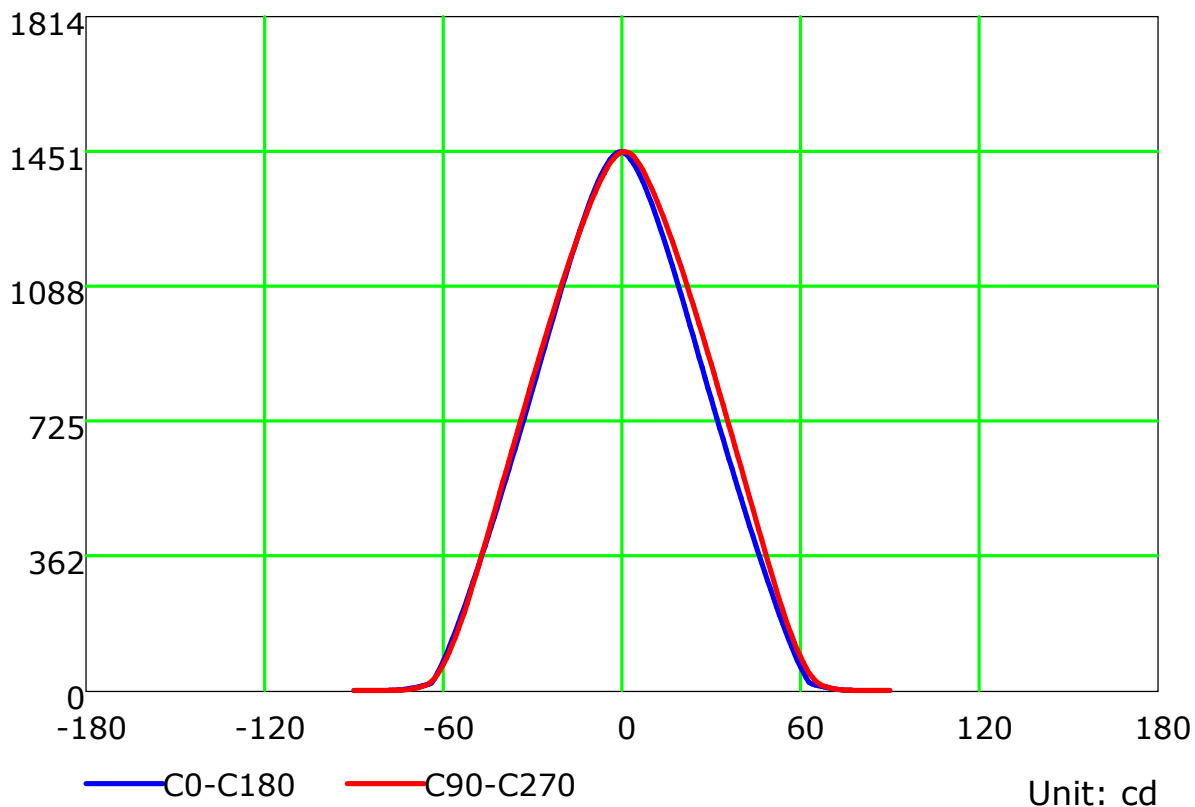
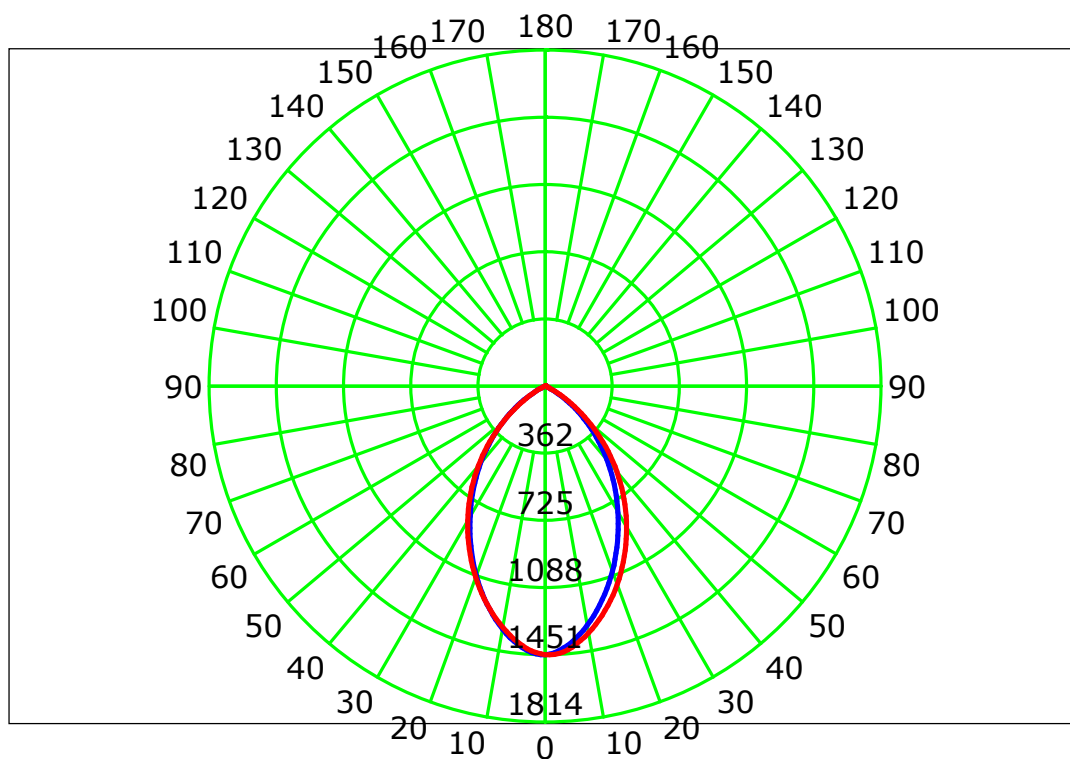
Test Device:

Distance: 11.655m [K=1.0000]

Humidity: 45% R.H

Inspector:

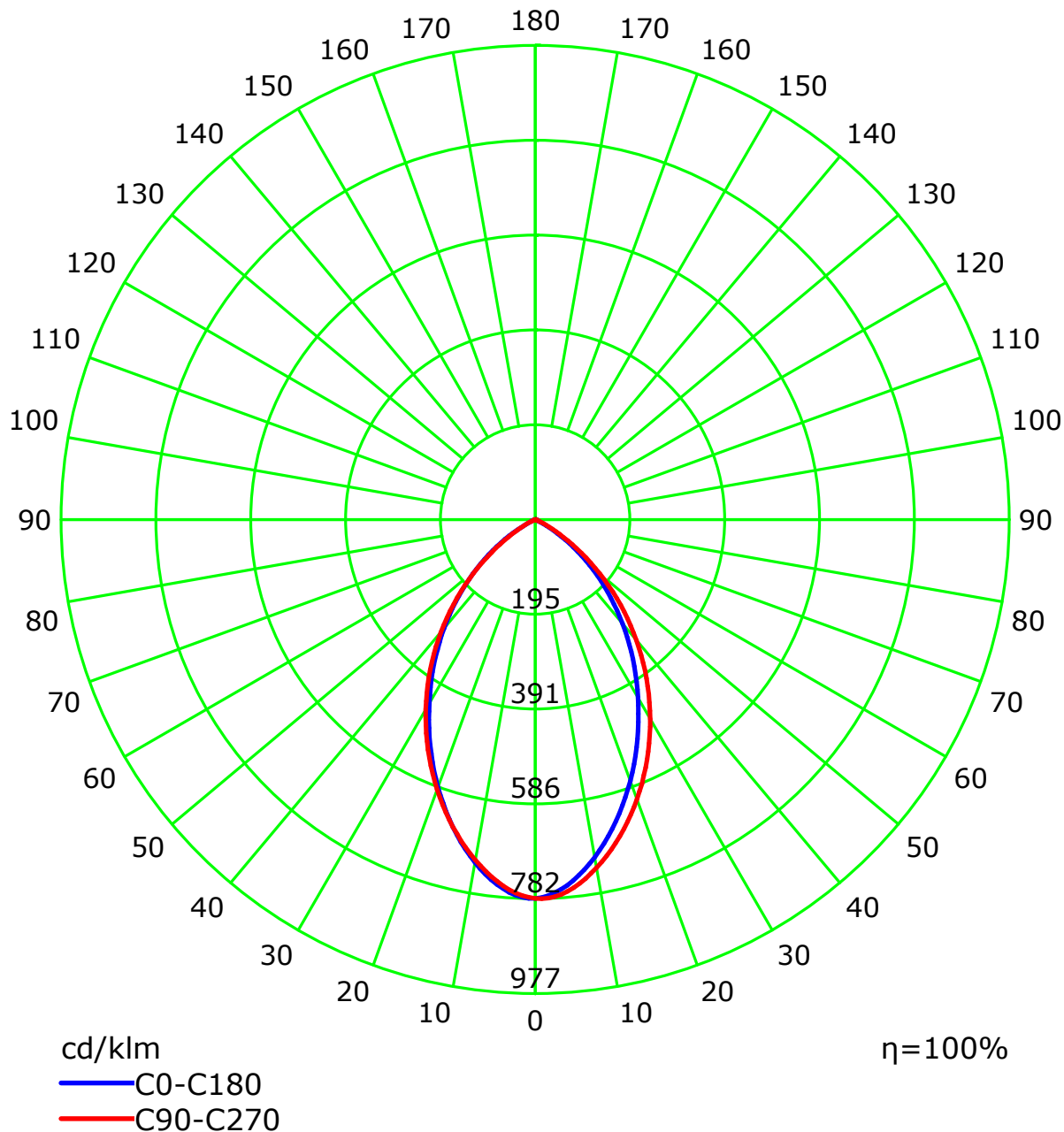
## Luminous Intensity Distribution Curve



C Plane (°):0.0-360.0: 30.0  
Test Lab: EVERFINE  
Test Type: TYPE C  
Temperature: 25.3℃  
Operator:

Gamma Plane (°):0.0-90.0:1.0  
Test Device:  
Distance: 11.655m [K=1.0000]  
Humidity: 45% R.H  
Inspector:

## Luminous Intensity Distribution Curve(cd/klm)



C Plane (°):0.0-360.0: 30.0  
Test Lab: EVERFINE  
Test Type: TYPE C  
Temperature: 25.3℃  
Operator:

Gamma Plane (°):0.0-90.0:1.0  
Test Device:  
Distance: 11.655m [K=1.0000]  
Humidity: 45% R.H  
Inspector:

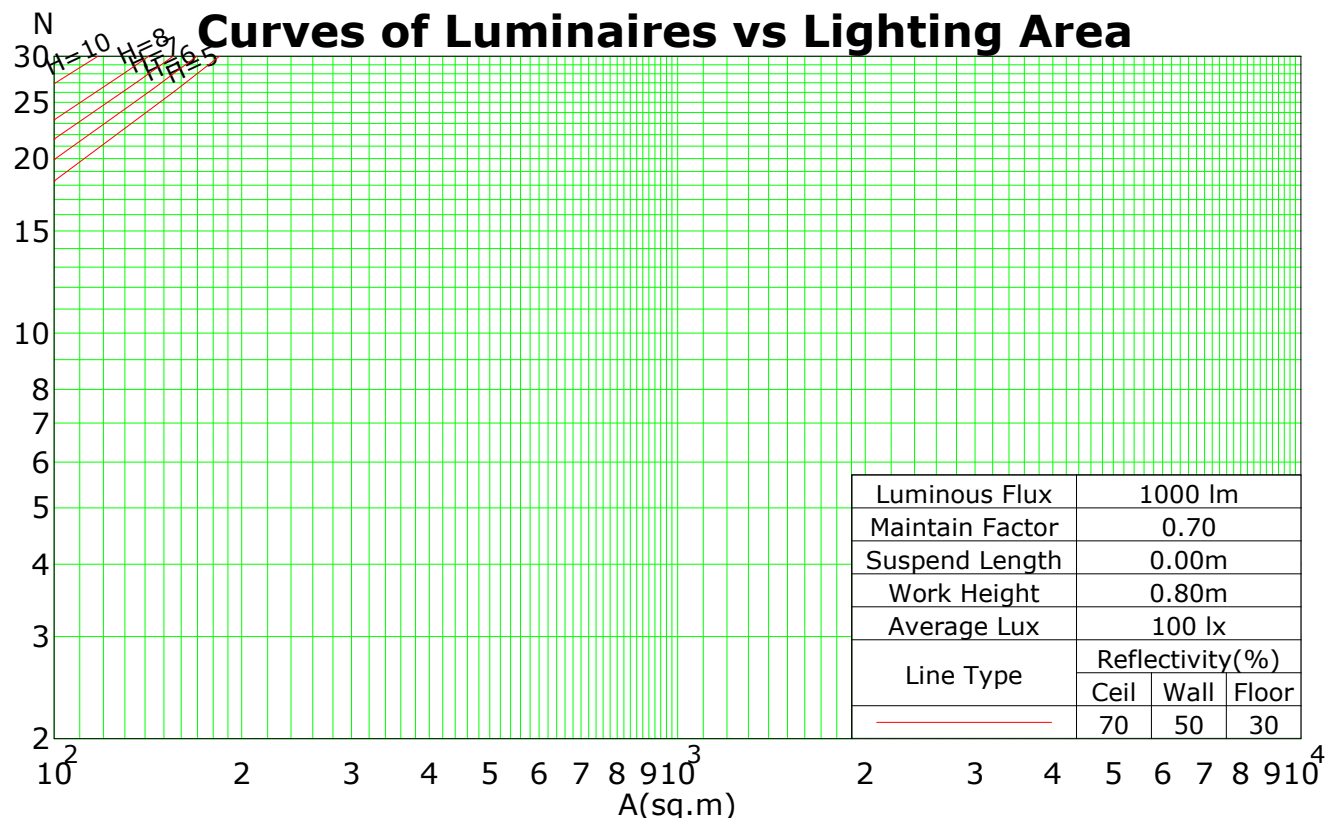
## Coefficients Of Utilization - Zonal Cavity Method

RC	0.8	0.8	0.8	0.8	0.7	0.7	0.7	0.7	0.5	0.5	0.5	0.3	0.3	0.3	0.1	0.1	0.1	0
RW	0.7	0.5	0.3	0.1	0.7	0.5	0.3	0.1	0.5	0.3	0.1	0.5	0.3	0.1	0.5	0.3	0.1	0
RCR	RF = 0.2																	
0	1.19	1.19	1.19	1.19	1.16	1.16	1.16	1.16	1.11	1.11	1.11	1.06	1.06	1.06	1.02	1.02	1.02	1.00
1	1.12	1.09	1.06	1.04	1.10	1.07	1.04	1.02	1.03	1.01	0.99	0.99	0.97	0.96	0.96	0.94	0.93	0.91
2	1.05	1.00	0.95	0.91	1.03	0.98	0.94	0.90	0.95	0.91	0.88	0.92	0.89	0.86	0.89	0.86	0.84	0.82
3	0.99	0.91	0.85	0.80	0.97	0.90	0.84	0.80	0.87	0.82	0.78	0.84	0.80	0.77	0.82	0.79	0.76	0.74
4	0.92	0.83	0.77	0.72	0.90	0.82	0.76	0.71	0.80	0.75	0.70	0.78	0.73	0.69	0.76	0.72	0.69	0.67
5	0.86	0.76	0.70	0.64	0.85	0.75	0.69	0.64	0.74	0.68	0.63	0.72	0.67	0.63	0.70	0.66	0.62	0.61
6	0.81	0.70	0.63	0.58	0.79	0.70	0.63	0.58	0.68	0.62	0.58	0.66	0.61	0.57	0.65	0.60	0.57	0.55
7	0.76	0.65	0.58	0.53	0.75	0.64	0.58	0.53	0.63	0.57	0.53	0.62	0.56	0.52	0.61	0.56	0.52	0.50
8	0.72	0.60	0.53	0.49	0.70	0.60	0.53	0.48	0.59	0.53	0.48	0.57	0.52	0.48	0.56	0.51	0.48	0.46
9	0.67	0.56	0.49	0.45	0.66	0.56	0.49	0.45	0.55	0.49	0.44	0.54	0.48	0.44	0.53	0.48	0.44	0.43
10	0.64	0.53	0.46	0.41	0.63	0.52	0.46	0.41	0.51	0.45	0.41	0.50	0.45	0.41	0.50	0.44	0.41	0.39

Spacing Criteria (0-180): 0.90

Spacing Criteria (90-270): 0.95

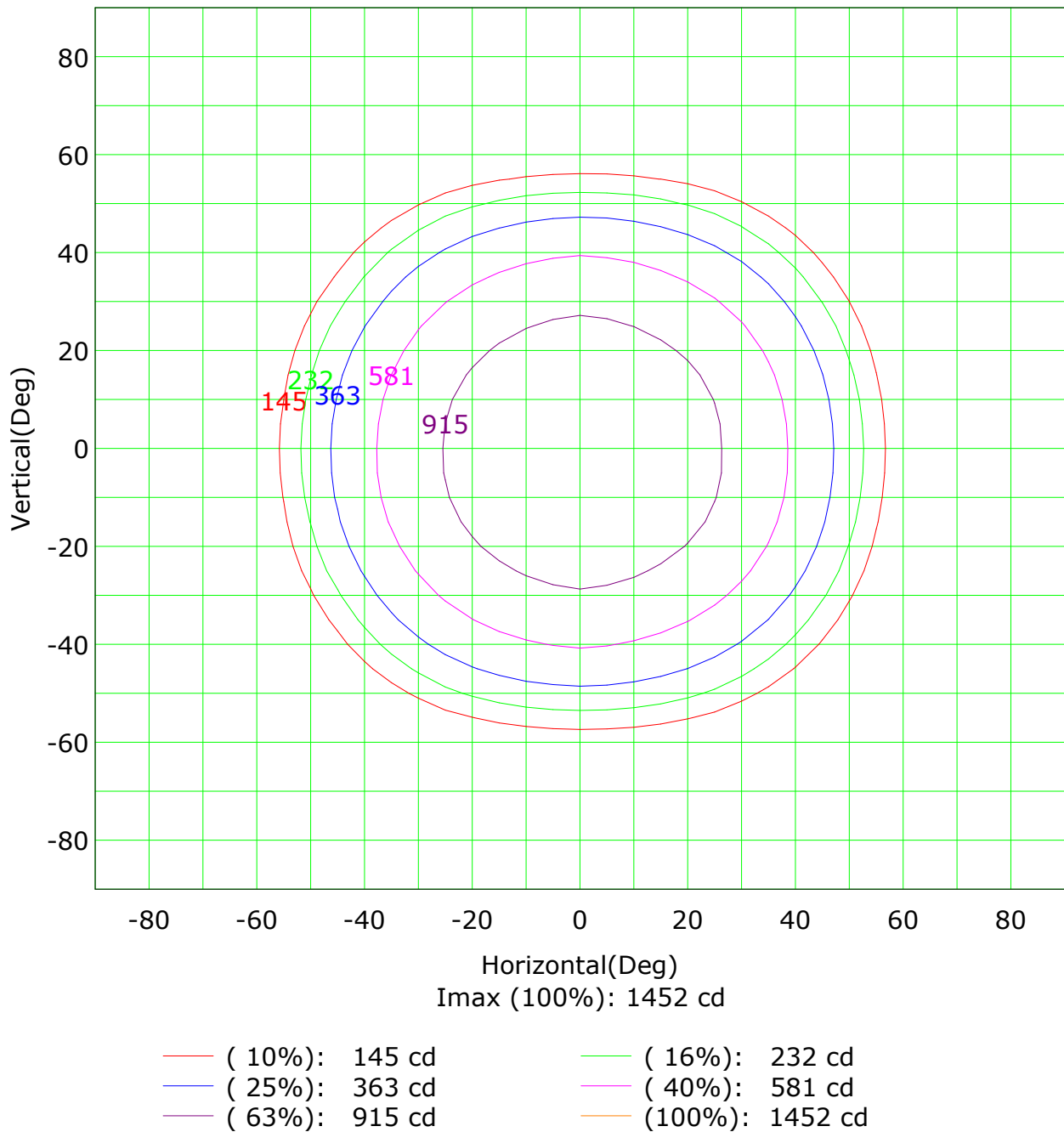
Spacing Criteria (Diagonal): 1.01



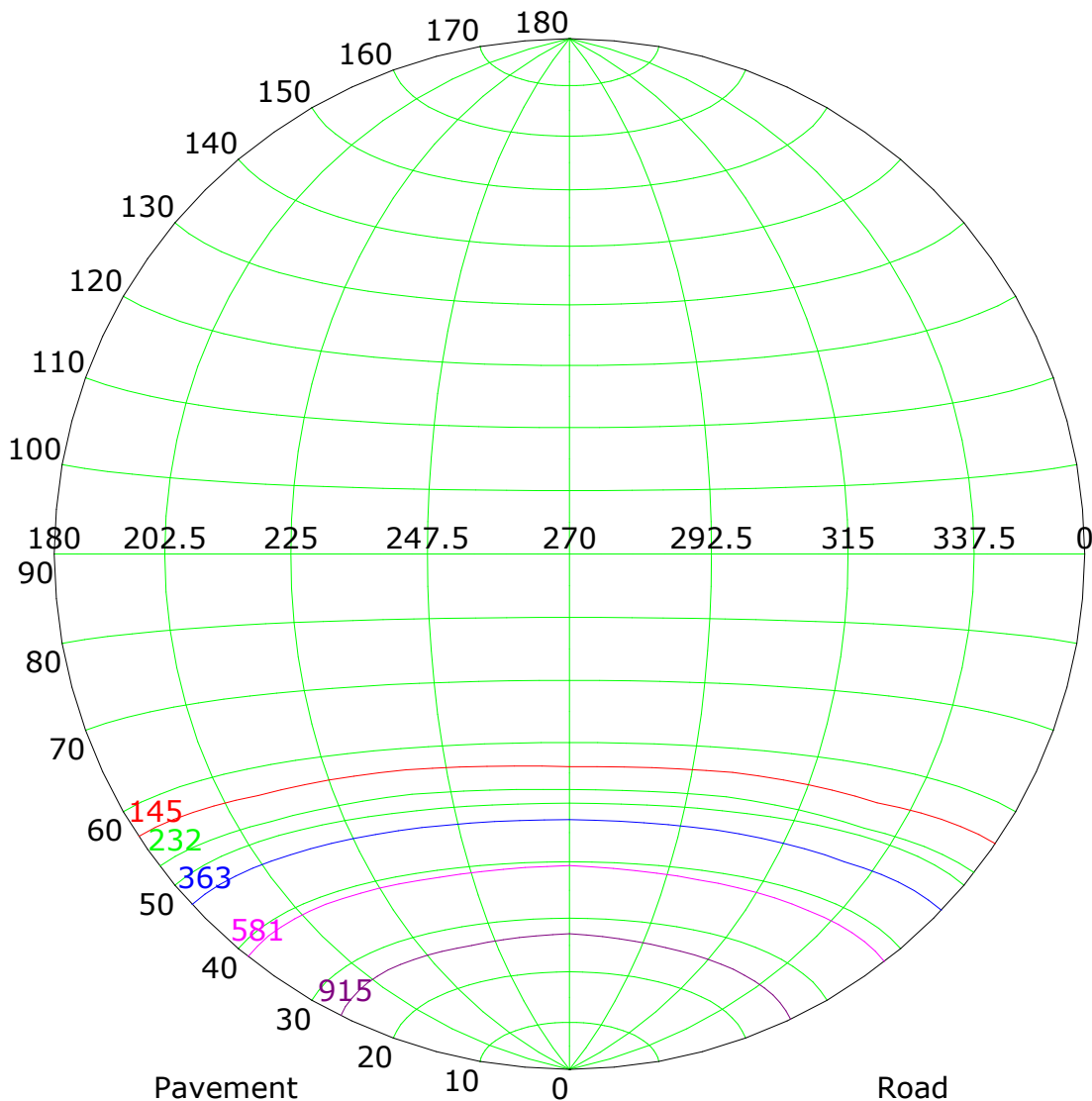
C Plane (°):0.0-360.0: 30.0  
Test Lab: EVERFINE  
Test Type: TYPE C  
Temperature: 25.3℃  
Operator:

Gamma Plane (°):0.0-90.0:1.0  
Test Device:  
Distance: 11.655m [K=1.0000]  
Humidity: 45% R.H  
Inspector:

## Isocandela (rectangle)



## Isocandela (sphere)



Imax (100%): 1452 cd

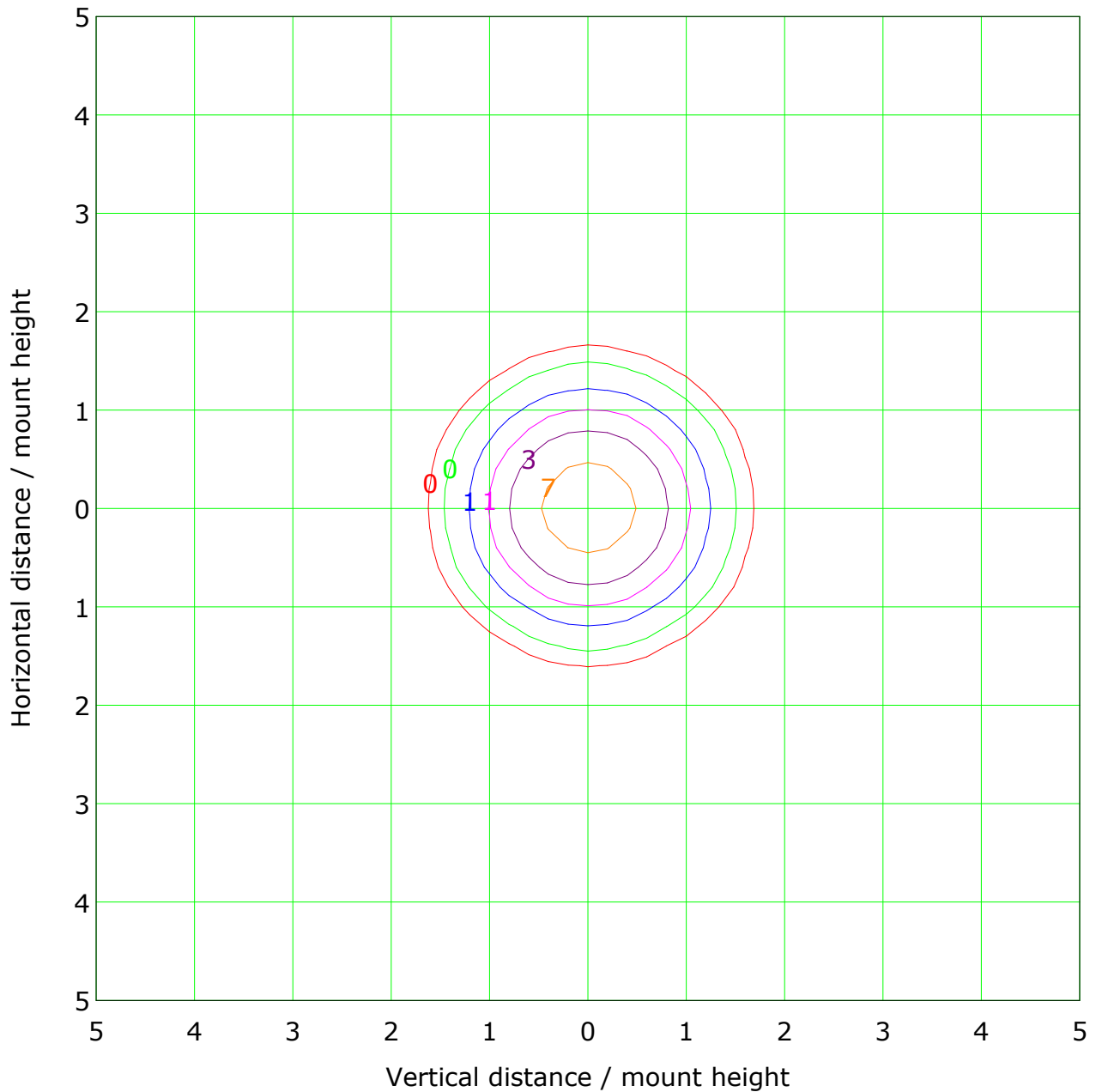
( 10%): 145 cd  
( 25%): 363 cd  
( 63%): 915 cd

( 16%): 232 cd  
( 40%): 581 cd  
(100%): 1452 cd

CIE: narrow - short  
CIE: Full-cut-off luminaire  
Max.At90: 0.085 cd/klm

IES: Cut-off  
Max.At80: 0.350 cd/klm  
Max.80-90: 0.350 cd/klm

## IsoLux Plot



Mounting Height: 10.0m    Max Lux(100%): 14.5 lx

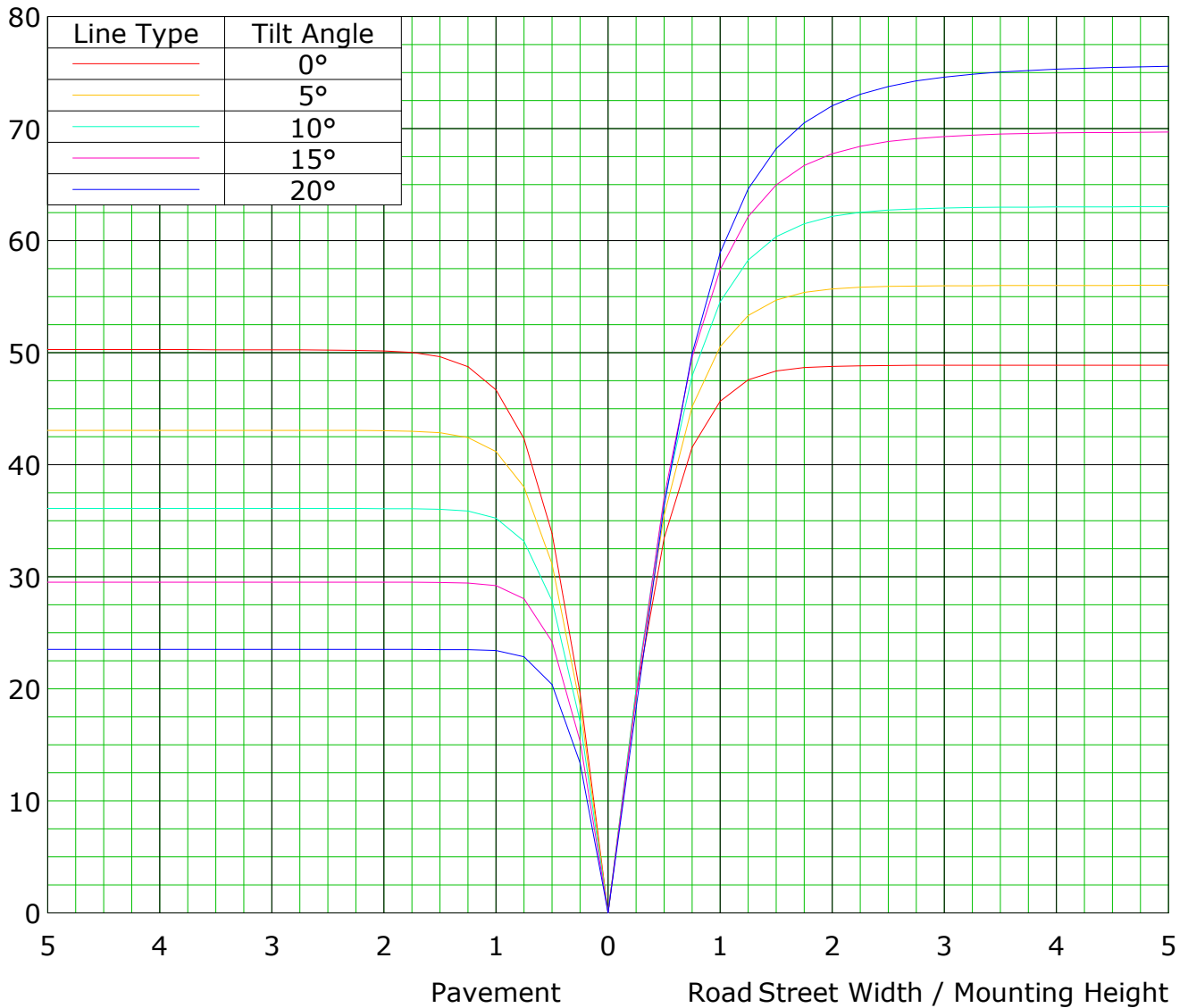
( 1%): 0.1 lx	( 2%): 0.3 lx
( 5%): 0.7 lx	( 10%): 1.5 lx
( 20%): 2.9 lx	( 50%): 7.3 lx
(100%): 14.5 lx	

C Plane (°):0.0-360.0: 30.0  
Test Lab: EVERFINE  
Test Type: TYPE C  
Temperature: 25.3℃  
Operator:

Gamma Plane (°):0.0-90.0:1.0  
Test Device:  
Distance: 11.655m [K=1.0000]  
Humidity: 45% R.H  
Inspector:

## Roadway CU Curve

Efficiency(%)



C Plane (°):0.0-360.0: 30.0  
Test Lab: EVERFINE  
Test Type: TYPE C  
Temperature: 25.3℃  
Operator:

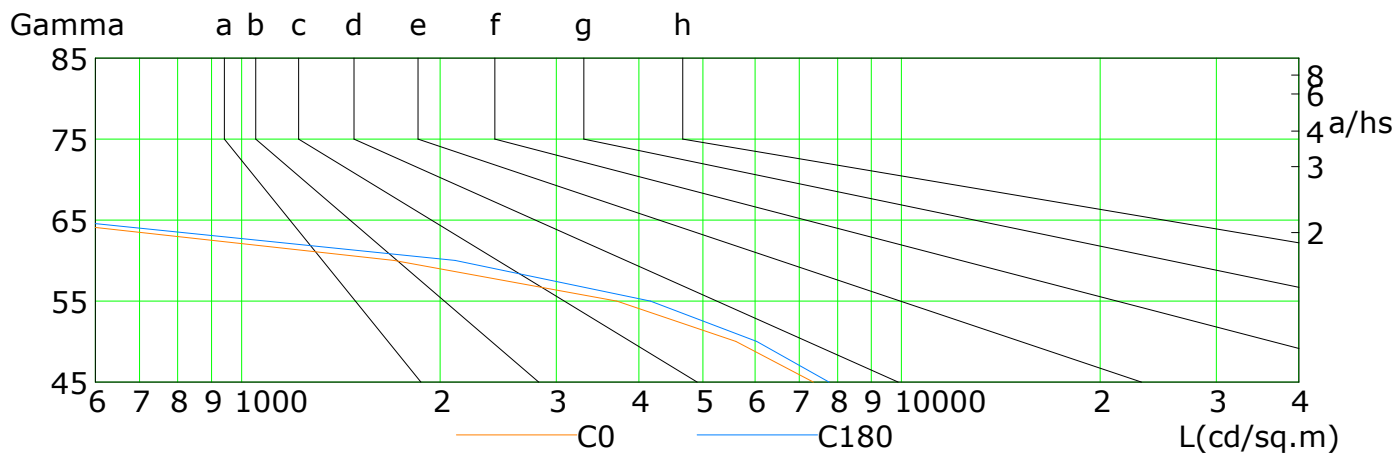
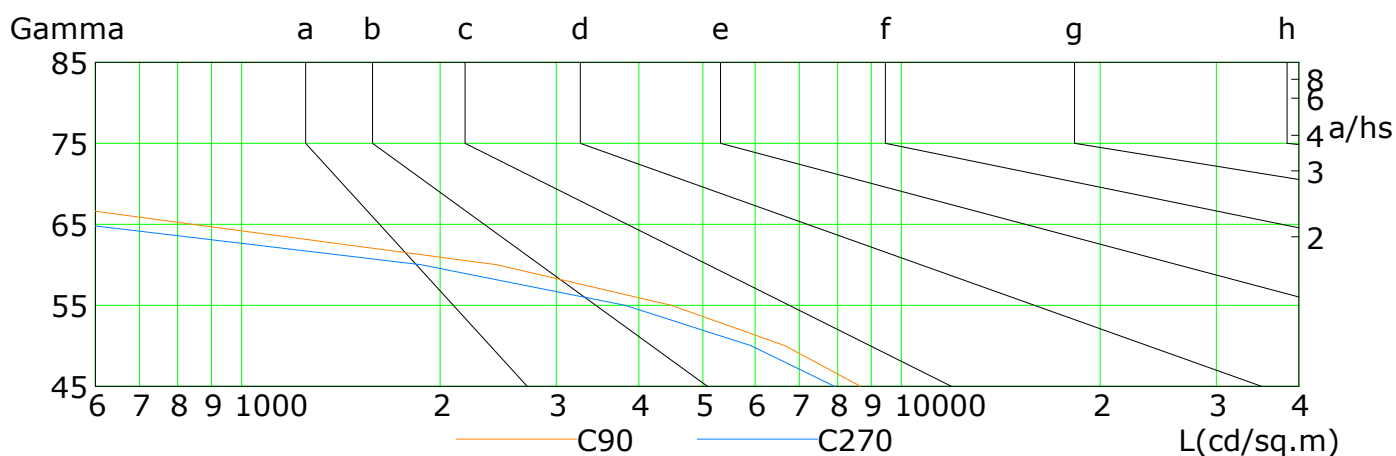
Gamma Plane (°):0.0-90.0:1.0  
Test Device:  
Distance: 11.655m [K=1.0000]  
Humidity: 45% R.H  
Inspector:



## Lum Limit Curve

Dazzle	Quality	Illuminance (lx)							
1.15	A	2000	1000	500	<=300				
1.50	B		2000	1000	500	<=300			
1.85	C			2000	1000	500	<=300		
2.20	D				2000	1000	500	<=300	
2.55	E					2000	1000	500	<=300

a b c d e f g h

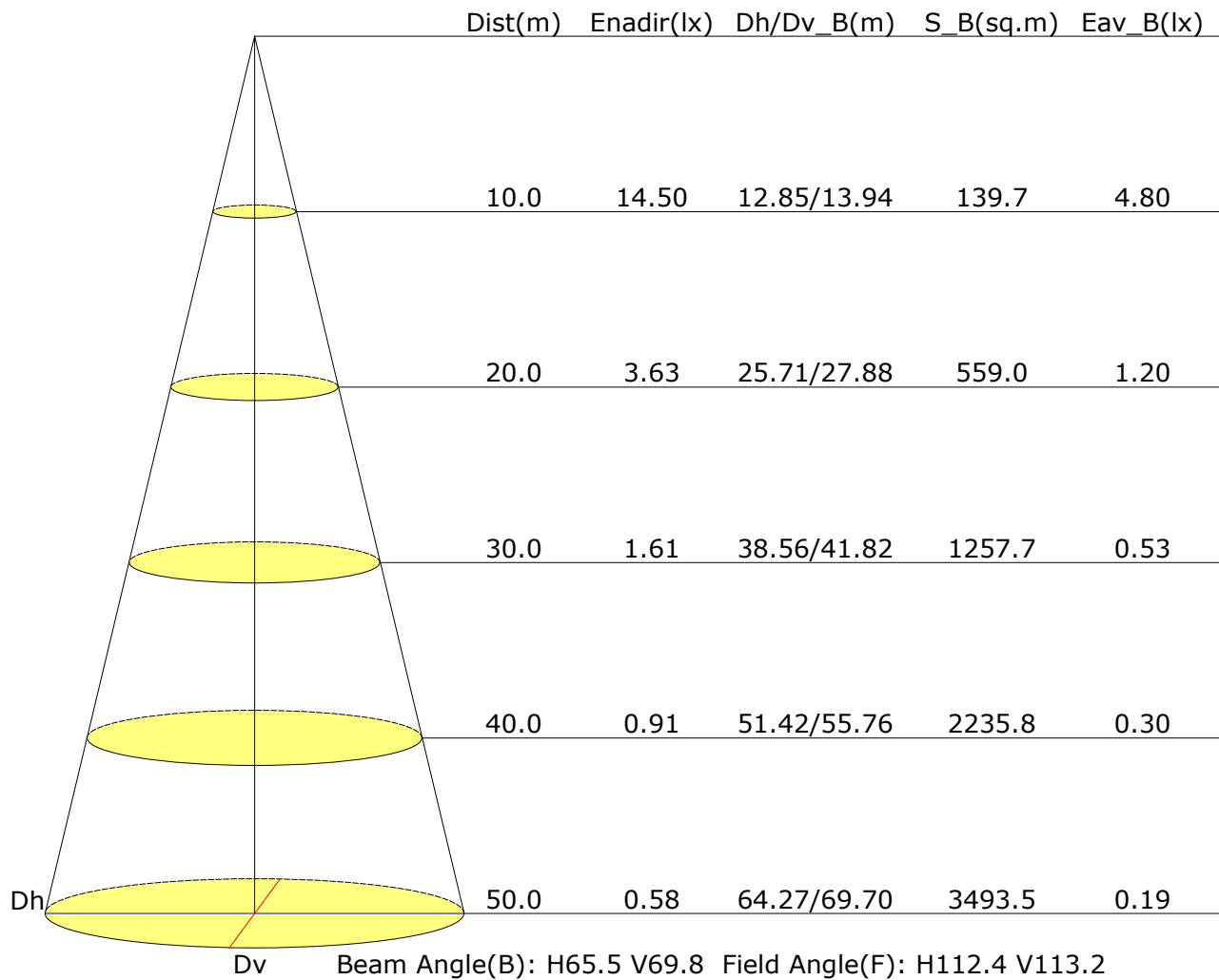


L(cd/sq.m)	G45	G50	G55	G60	G65	G70	G75	G80	G85
C0	7349	5613	3701	1702	476	251	83	44	34
C90	8660	6654	4479	2432	842	297	81	42	37
C180	7762	6036	4163	2106	537	299	95	48	38
C270	7915	5913	3813	1867	574	212	67	49	58

C Plane (°):0.0-360.0: 30.0  
Test Lab: EVERFINE  
Test Type: TYPE C  
Temperature: 25.3℃  
Operator:

Gamma Plane (°):0.0-90.0:1.0  
Test Device:  
Distance: 11.655m [K=1.0000]  
Humidity: 45% R.H  
Inspector:

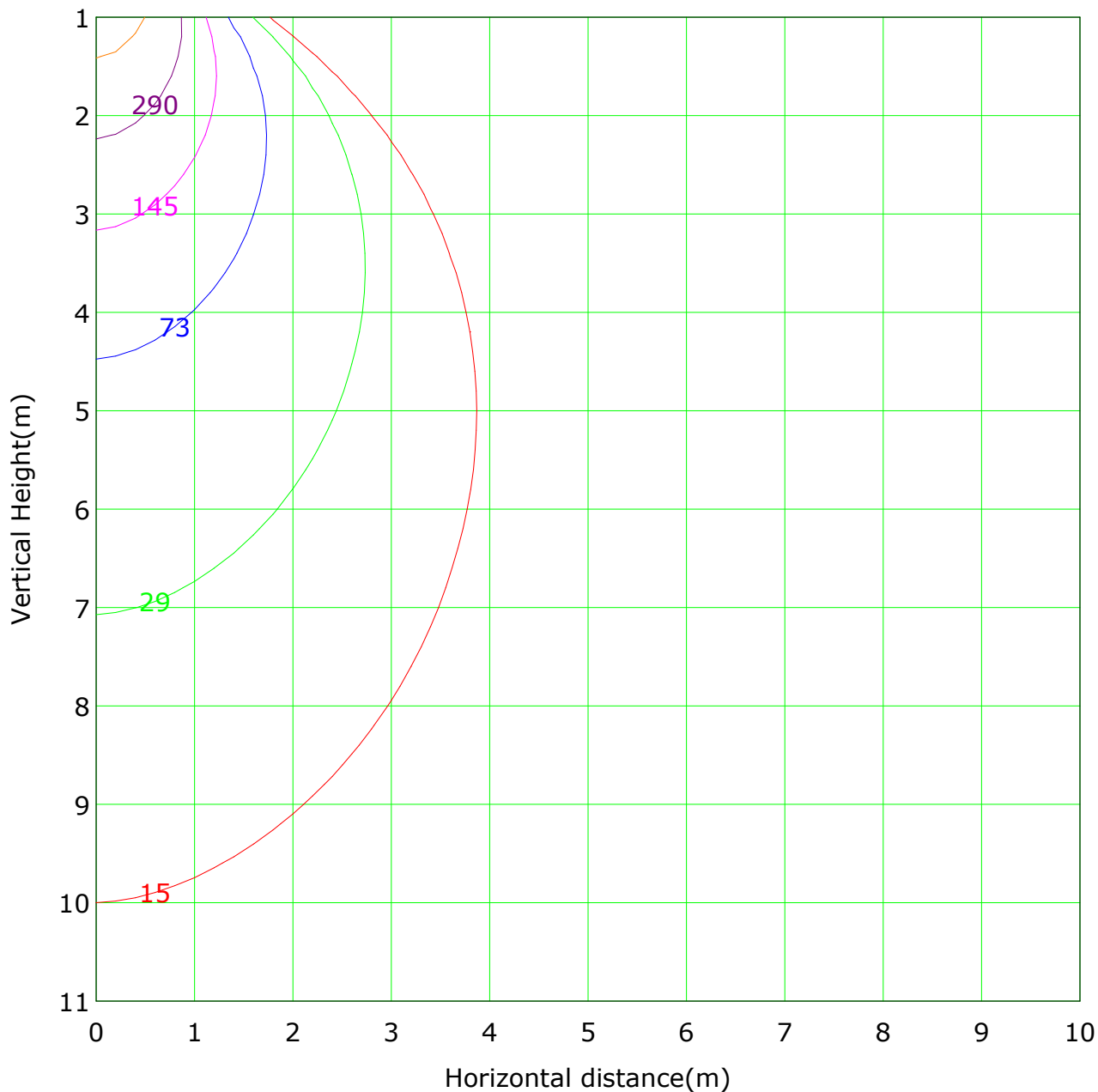
## Illuminance at a Distance



C Plane (°):0.0-360.0: 30.0  
Test Lab: EVERFINE  
Test Type: TYPE C  
Temperature: 25.3℃  
Operator:

Gamma Plane (°):0.0-90.0:1.0  
Test Device:  
Distance: 11.655m [K=1.0000]  
Humidity: 45% R.H  
Inspector:

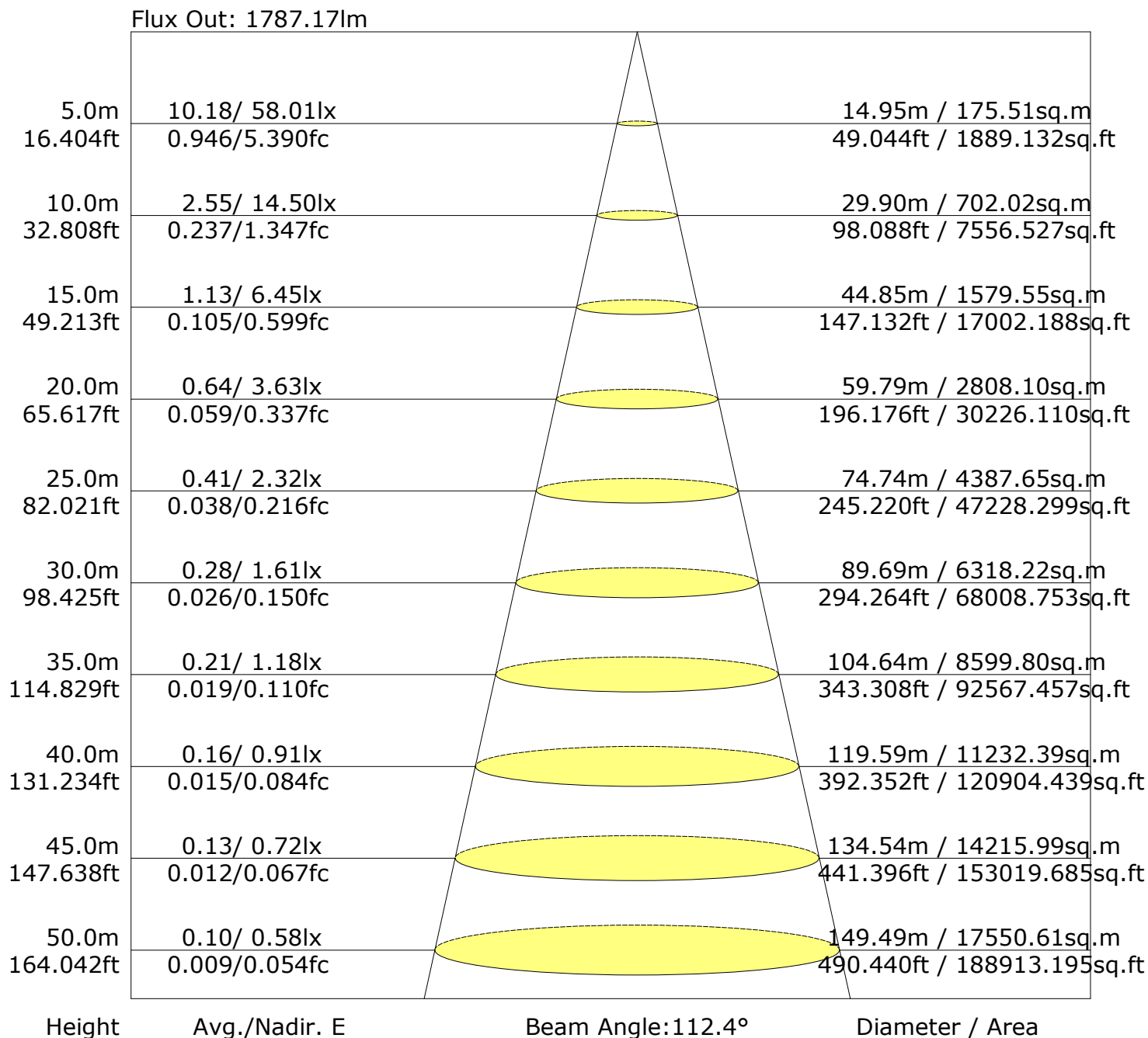
## Vertical IsoLux Plot



Lowest(m): 1.0m    Highest(m): 11.0m    Max Lux: 1450.3 lx  
— ( 1%): 14.5 lx                      — ( 2%): 29.0 lx  
— ( 5%): 72.5 lx                      — ( 10%): 145.0 lx  
— ( 20%): 290.1 lx                    — ( 50%): 725.2 lx  
— (100%):1450.3 lx

Gamma Plane (°):0.0-90.0:1.0  
Test Device:  
Distance: 11.655m [K=1.0000]  
Humidity: 45% R.H  
Inspector:

## The Average Illuminance Effective Figure



C Plane (°):0.0-360.0: 30.0  
Test Lab: EVERFINE  
Test Type: TYPE C  
Temperature: 25.3℃  
Operator:

Gamma Plane (°):0.0-90.0:1.0  
Test Device:  
Distance: 11.655m [K=1.0000]  
Humidity: 45% R.H  
Inspector:

## UGR Table

Reflectance:										
Ceiling (cavity)	0.7	0.7	0.5	0.5	0.3	0.7	0.7	0.5	0.5	0.3
Wall	0.5	0.3	0.5	0.3	0.3	0.5	0.3	0.5	0.3	0.3
Reference plane	0.2	0.2	0.2	0.2	0.2	0.2	0.2	0.2	0.2	0.2
Room dimensions	Viewed crosswise					Viewed endwise				
X=2H Y=2H	12.2	13.4	12.6	13.7	14.1	14.2	15.5	14.6	15.8	16.1
3H	12.1	13.2	12.5	13.5	13.9	14.1	15.2	14.5	15.5	15.9
4H	12.0	13.0	12.4	13.4	13.8	14.0	15.1	14.5	15.4	15.8
6H	11.9	12.8	12.3	13.2	13.6	14.0	14.9	14.4	15.3	15.7
8H	11.9	12.7	12.3	13.1	13.5	13.9	14.8	14.3	15.2	15.6
12H	11.8	12.7	12.3	13.0	13.5	13.9	14.7	14.3	15.1	15.5
X=4H Y=2H	12.0	13.0	12.4	13.4	13.8	14.1	15.1	14.5	15.4	15.8
3H	11.9	12.7	12.3	13.1	13.5	13.9	14.8	14.4	15.2	15.6
4H	11.8	12.5	12.3	13.0	13.4	13.8	14.6	14.3	15.0	15.4
6H	11.7	12.3	12.2	12.8	13.3	13.8	14.4	14.2	14.8	15.3
8H	11.7	12.2	12.1	12.7	13.2	13.7	14.3	14.2	14.7	15.2
12H	11.6	12.1	12.1	12.6	13.1	13.6	14.1	14.1	14.6	15.1
X=8H Y=4H	11.7	12.2	12.1	12.7	13.2	13.7	14.3	14.2	14.7	15.2
6H	11.5	12.0	12.1	12.5	13.0	13.6	14.1	14.1	14.5	15.0
8H	11.5	11.9	12.0	12.4	12.9	13.5	13.9	14.0	14.5	14.9
12H	11.4	11.8	11.9	12.3	12.9	13.5	13.8	14.0	14.3	14.9
X=12H Y=4H	11.6	12.1	12.1	12.6	13.1	13.6	14.1	14.1	14.6	15.1
6H	11.5	11.9	12.0	12.4	12.9	13.5	13.9	14.0	14.4	15.0
8H	11.4	11.8	11.9	12.3	12.9	13.5	13.8	14.0	14.3	14.9

Calculate in accordance with CIE 190:2010 The table is revised with  $1856lm$  ( $8\log(F/F_0) = 2.1$ ).

C Plane (°):0.0-360.0: 30.0  
Test Lab: EVERFINE  
Test Type: TYPE C  
Temperature: 25.3℃  
Operator:

Gamma Plane (°):0.0-90.0:1.0  
Test Device:  
Distance: 11.655m [K=1.0000]  
Humidity: 45% R.H  
Inspector:

**FLUX DISTRIBUTION TABLE BASED ON THE IESNA LUMINAIRE CLASSIFICATION SYSTEM**

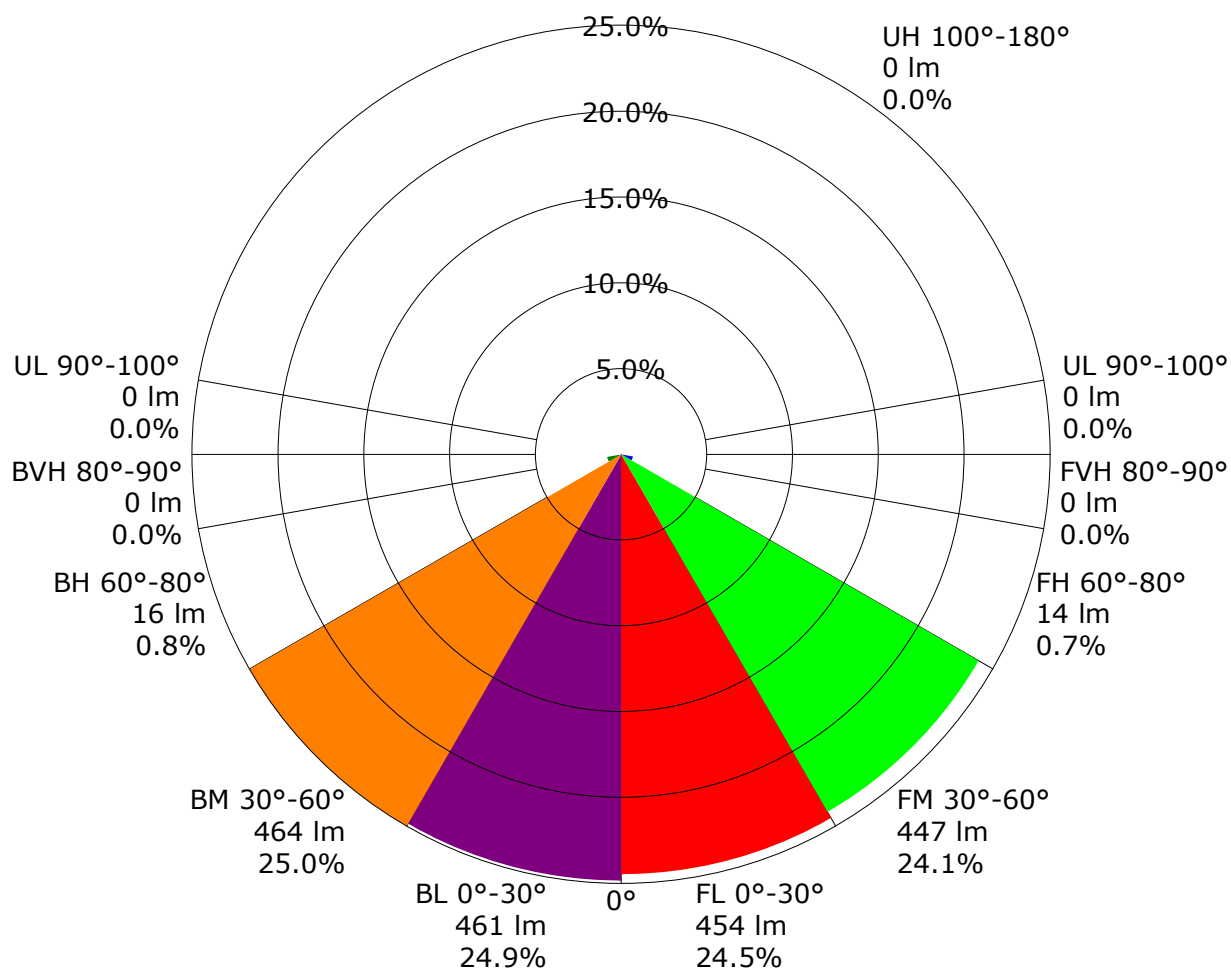
	ZONE	LUMENS	% LAMP LUMENS
	FORWARD LIGHT	915	49.3
	FL ( 0°-30°)	454	24.5
	FM (30°-60°)	447	24.1
	FH (60°-80°)	14	0.7
	FVH (80°-90°)	0	0.0
	BACK LIGHT	941	50.7
	BL ( 0°-30°)	461	24.9
	BM (30°-60°)	464	25.0
	BH (60°-80°)	16	0.8
	BVH (80°-90°)	0	0.0
	UP LIGHT	0	0.0
	UL (90°-100°)	0	0.0
	UH (100°-180°)	0	0.0
	TRAPPED LIGHT	NA	NA

BUG(Backlight,Uplight,Glare) Rating Base On TM-15-07	
Asymmetrical Luminaire Types (Type I,II,III,IV)	B1 U0 G0
Quadrilateral Symmetrical Luminaire Types (Type V,Area Light)	B1 U0 G0

C Plane (°):0.0-360.0: 30.0  
Test Lab: EVERFINE  
Test Type: TYPE C  
Temperature: 25.3℃  
Operator:

Gamma Plane (°):0.0-90.0:1.0  
Test Device:  
Distance: 11.655m [K=1.0000]  
Humidity: 45% R.H  
Inspector:

## LCS Graph



**Back Light**

**Forward Light**

Scale= MAX LCS%

Trapped Light:NA,NA



## Utilisation Factor Table(Floor cavity)

Utilisation Factors UF(F)			SHR NOM = 1.00									
Room Reflectance			Room Index(RI)									
Ceiling	Wall	Floor	0.75	1.00	1.25	1.50	2.00	2.50	3.00	4.00	5.00	
0.70	0.50	0.20	0.73	0.83	0.89	0.93	0.98	1.02	1.04	1.07	1.09	
	0.30		0.67	0.77	0.84	0.88	0.94	0.98	1.01	1.04	1.07	
	0.20		0.63	0.73	0.80	0.84	0.91	0.95	0.98	1.02	1.05	
0.50	0.50	0.20	0.72	0.81	0.87	0.90	0.95	0.98	1.00	1.03	1.05	
	0.30		0.67	0.76	0.82	0.86	0.92	0.95	0.98	1.01	1.03	
	0.20		0.63	0.72	0.79	0.83	0.89	0.93	0.95	0.99	1.01	
0.30	0.50	0.20	0.71	0.79	0.85	0.88	0.93	0.95	0.97	1.00	1.01	
	0.30		0.66	0.75	0.81	0.85	0.90	0.93	0.95	0.98	1.00	
	0.20		0.62	0.72	0.78	0.82	0.87	0.91	0.93	0.96	0.98	
0.00	0.00	0.00	0.61	0.70	0.75	0.79	0.84	0.87	0.89	0.92	0.94	
<p>Rating:37W Photometrically tested without ceiling board.</p> <p>Multiply UF values by service correction factors</p> <p>Calculate in accordance with CIBSE Technical Memorandum NO.5 1980</p>												

## Utilisation Factor Table(Wall)

Utilisation Factors UF(W)			SHR NOM = 1.00									
Room Reflectance			Room Index(RI)									
Ceiling	Wall	Floor	0.75	1.00	1.25	1.50	2.00	2.50	3.00	4.00	5.00	
0.70	0.50	0.20	0.75	0.59	0.49	0.42	0.32	0.27	0.23	0.17	0.14	
	0.30		0.62	0.50	0.43	0.37	0.29	0.24	0.21	0.16	0.13	
	0.20		0.53	0.44	0.38	0.33	0.27	0.22	0.19	0.15	0.13	
0.50	0.50	0.20	0.72	0.56	0.46	0.39	0.31	0.29	0.21	0.16	0.13	
	0.30		0.61	0.49	0.41	0.35	0.28	0.23	0.20	0.15	0.12	
	0.20		0.53	0.43	0.37	0.32	0.26	0.21	0.18	0.14	0.12	
0.30	0.50	0.20	0.69	0.53	0.44	0.37	0.29	0.23	0.20	0.15	0.12	
	0.30		0.59	0.47	0.39	0.34	0.26	0.22	0.18	0.14	0.12	
	0.20		0.52	0.42	0.36	0.31	0.25	0.20	0.17	0.14	0.11	
0.00	0.00	0.00	0.40	0.31	0.25	0.21	0.16	0.13	0.11	0.08	0.07	
Rating:37W Photometrically tested without ceiling board. Multiply UF values by service correction factors Calculate in accordance with CIBSE Technical Memorandum NO.5 1980												

## Utilisation Factor Table(Ceiling cavity)

Utilisation Factors UF(C)			SHR NOM = 1.00									
Room Reflectance			Room Index(RI)									
Ceiling	Wall	Floor	0.75	1.00	1.25	1.50	2.00	2.50	3.00	4.00	5.00	
0.70	0.50	0.20	0.14	0.15	0.16	0.17	0.18	0.19	0.20	0.20	0.21	
	0.30		0.09	0.11	0.12	0.13	0.15	0.16	0.17	0.19	0.19	
	0.20		0.05	0.07	0.09	0.10	0.12	0.14	0.15	0.17	0.18	
0.50	0.50	0.20	0.14	0.15	0.16	0.17	0.18	0.18	0.19	0.20	0.20	
	0.30		0.09	0.11	0.12	0.13	0.15	0.16	0.17	0.18	0.19	
	0.20		0.05	0.07	0.09	0.10	0.12	0.14	0.15	0.16	0.17	
0.30	0.50	0.20	0.13	0.14	0.15	0.16	0.17	0.18	0.18	0.19	0.19	
	0.30		0.09	0.10	0.12	0.13	0.14	0.15	0.16	0.17	0.18	
	0.20		0.05	0.07	0.09	0.10	0.12	0.13	0.14	0.16	0.17	
0.00	0.00	0.00	NA	NA	NA	NA	NA	NA	NA	NA	NA	
Rating:37W Photometrically tested without ceiling board. Multiply UF values by service correction factors Calculate in accordance with CIBSE Technical Memorandum NO.5 1980												

## Zonal Lumen

Gamma [°]	I <sub>mean</sub> [cd]	Zonal Flux [lm]	Sum Zonal Flux [lm]	Rel Zonal Flux [%]	Sum Rel Zonal Flux [%]
0.0-1.0	1449.6	1.4	1.4	0.07	0.07
1.0-2.0	1446.7	4.2	5.5	0.22	0.30
2.0-3.0	1440.9	6.9	12.4	0.37	0.67
3.0-4.0	1432.3	9.6	22.0	0.52	1.19
4.0-5.0	1421.1	12.2	34.2	0.66	1.85
5.0-6.0	1407.7	14.8	49.0	0.80	2.64
6.0-7.0	1392.5	17.3	66.3	0.93	3.57
7.0-8.0	1376.0	19.7	86.0	1.06	4.63
8.0-9.0	1358.1	22.0	108.0	1.19	5.82
9.0-10.0	1339.1	24.2	132.3	1.31	7.13
10.0-11.0	1319.2	26.4	158.6	1.42	8.55
11.0-12.0	1298.5	28.4	187.0	1.53	10.08
12.0-13.0	1277.1	30.3	217.3	1.63	11.71
13.0-14.0	1254.6	32.1	249.5	1.73	13.44
14.0-15.0	1231.7	33.8	283.3	1.82	15.26
15.0-16.0	1208.4	35.4	318.7	1.91	17.17
16.0-17.0	1184.4	36.9	355.6	1.99	19.16
17.0-18.0	1159.7	38.2	393.8	2.06	21.22
18.0-19.0	1134.7	39.5	433.3	2.13	23.34
19.0-20.0	1109.3	40.6	473.9	2.19	25.53
20.0-21.0	1083.6	41.6	515.5	2.24	27.77
21.0-22.0	1057.6	42.5	558.0	2.29	30.06
22.0-23.0	1031.1	43.3	601.3	2.33	32.39
23.0-24.0	1004.3	43.9	645.2	2.37	34.76
24.0-25.0	977.5	44.5	689.7	2.39	37.15
25.0-26.0	950.5	44.9	734.5	2.42	39.57
26.0-27.0	923.2	45.2	779.7	2.43	42.01
27.0-28.0	895.7	45.4	825.1	2.44	44.45
28.0-29.0	868.2	45.4	870.5	2.45	46.90
29.0-30.0	840.7	45.4	915.9	2.45	49.34
30.0-31.0	813.1	45.3	961.2	2.44	51.78
31.0-32.0	785.4	45.0	1006.2	2.42	54.21
32.0-33.0	757.9	44.7	1050.8	2.41	56.61
33.0-34.0	730.4	44.2	1095.0	2.38	58.99
34.0-35.0	702.9	43.7	1138.7	2.35	61.34
35.0-36.0	675.6	43.0	1181.7	2.32	63.66

C Plane (°):0.0-360.0: 30.0  
Test Lab: EVERFINE  
Test Type: TYPE C  
Temperature: 25.3℃  
Operator:

Gamma Plane (°):0.0-90.0:1.0  
Test Device:  
Distance: 11.655m [K=1.0000]  
Humidity: 45% R.H  
Inspector:

## Zonal Lumen (Continue 1)

Gamma [°]	Imean [cd]	Zonal Flux [lm]	Sum Zonal Flux [lm]	Rel Zonal Flux [%]	Sum Rel Zonal Flux [%]
36.0-37.0	648.2	42.3	1224.0	2.28	65.94
37.0-38.0	620.9	41.5	1265.4	2.23	68.17
38.0-39.0	594.0	40.5	1306.0	2.18	70.36
39.0-40.0	566.9	39.5	1345.5	2.13	72.49
40.0-41.0	539.7	38.4	1384.0	2.07	74.56
41.0-42.0	513.0	37.3	1421.3	2.01	76.57
42.0-43.0	486.4	36.0	1457.3	1.94	78.51
43.0-44.0	459.6	34.7	1492.0	1.87	80.38
44.0-45.0	433.2	33.3	1525.3	1.79	82.17
45.0-46.0	407.1	31.8	1557.1	1.72	83.89
46.0-47.0	381.0	30.3	1587.4	1.63	85.52
47.0-48.0	355.2	28.7	1616.1	1.55	87.07
48.0-49.0	329.7	27.1	1643.2	1.46	88.53
49.0-50.0	304.5	25.4	1668.6	1.37	89.89
50.0-51.0	279.9	23.7	1692.3	1.28	91.17
51.0-52.0	255.5	21.9	1714.2	1.18	92.35
52.0-53.0	231.6	20.1	1734.4	1.09	93.44
53.0-54.0	208.3	18.4	1752.7	0.99	94.43
54.0-55.0	185.8	16.6	1769.3	0.89	95.32
55.0-56.0	164.2	14.8	1784.2	0.80	96.12
56.0-57.0	143.5	13.1	1797.3	0.71	96.83
57.0-58.0	123.4	11.4	1808.7	0.62	97.44
58.0-59.0	104.3	9.8	1818.5	0.53	97.97
59.0-60.0	86.2	8.1	1826.6	0.44	98.41
60.0-61.0	69.4	6.6	1833.2	0.36	98.76
61.0-62.0	54.0	5.2	1838.4	0.28	99.04
62.0-63.0	40.3	3.9	1842.3	0.21	99.25
63.0-64.0	29.4	2.9	1845.2	0.16	99.41
64.0-65.0	21.9	2.2	1847.4	0.12	99.53
65.0-66.0	17.1	1.7	1849.1	0.09	99.62
66.0-67.0	13.9	1.4	1850.5	0.08	99.69
67.0-68.0	11.6	1.2	1851.7	0.06	99.76
68.0-69.0	9.6	1.0	1852.6	0.05	99.81
69.0-70.0	7.7	0.8	1853.4	0.04	99.85
70.0-71.0	6.1	0.6	1854.1	0.03	99.89
71.0-72.0	4.6	0.5	1854.5	0.03	99.91

C Plane (°):0.0-360.0: 30.0  
Test Lab: EVERFINE  
Test Type: TYPE C  
Temperature: 25.3℃  
Operator:

Gamma Plane (°):0.0-90.0:1.0  
Test Device:  
Distance: 11.655m [K=1.0000]  
Humidity: 45% R.H  
Inspector:

## Zonal Lumen (Continue 2)

[illegible]

C Plane (°):0.0-360.0: 30.0  
Test Lab: EVERFINE  
Test Type: TYPE C  
Temperature: 25.3°C  
Operator:

Gamma Plane (°):0.0-90.0:1.0  
Test Device:  
Distance: 11.655m [K=1.0000]  
Humidity: 45% R.H  
Inspector:

## Zonal Lumen (Continue 3)

cone flux(90°): 1525.27 lm

%lum = 82.2%

%lamp = 82.2%

cone flux(120°): 1826.59 lm

%lum = 98.4%

%lamp = 98.4%

## Candlepower Table

Unit: cd

G\C	C0.0	C30.0	C60.0	C90.0	C120.0	C150.0	C180.0	C210.0	C240.0
G0.0	1450.3	1450.3	1450.3	1450.3	1450.3	1450.3	1450.3	1450.3	1450.3
G1.0	1447.6	1448.1	1450.5	1451.5	1451.9	1452.0	1450.6	1448.9	1447.4
G2.0	1440.9	1442.5	1448.0	1450.1	1450.7	1450.3	1447.1	1445.2	1441.8
G3.0	1431.0	1434.4	1442.1	1446.2	1446.2	1445.6	1440.5	1438.1	1433.7
G4.0	1419.1	1423.3	1433.2	1439.1	1438.8	1436.8	1430.6	1428.0	1423.9
G5.0	1405.6	1409.9	1422.2	1428.7	1428.8	1425.9	1418.3	1415.4	1410.8
G6.0	1390.0	1394.3	1408.6	1416.7	1416.3	1412.4	1404.8	1400.8	1396.2
G7.0	1372.3	1378.2	1393.3	1403.0	1401.3	1397.5	1388.9	1385.1	1379.7
G8.0	1353.8	1360.3	1377.1	1387.6	1384.9	1381.0	1372.0	1367.5	1362.0
G9.0	1333.8	1341.5	1359.9	1370.7	1368.3	1363.0	1353.1	1349.0	1343.0
G10.0	1312.9	1321.6	1340.4	1353.5	1349.1	1344.5	1332.7	1329.4	1323.2
G11.0	1290.4	1301.3	1320.2	1334.8	1329.1	1324.8	1311.7	1309.4	1302.2
G12.0	1268.2	1280.0	1299.6	1316.3	1309.2	1304.4	1289.6	1288.8	1280.9
G13.0	1244.2	1258.2	1278.0	1296.6	1287.7	1283.2	1267.1	1266.7	1258.8
G14.0	1219.7	1235.0	1255.2	1275.7	1265.0	1260.7	1243.0	1243.7	1235.7
G15.0	1195.2	1211.5	1233.2	1254.4	1243.0	1237.8	1219.0	1220.5	1212.5
G16.0	1170.5	1187.6	1210.0	1233.0	1220.3	1214.8	1194.0	1197.3	1188.6
G17.0	1144.0	1163.2	1185.6	1209.8	1195.9	1190.6	1169.0	1172.6	1164.3
G18.0	1118.0	1138.3	1161.3	1187.0	1171.7	1166.1	1142.5	1147.5	1138.9
G19.0	1091.4	1112.4	1136.4	1163.3	1147.3	1140.9	1116.5	1121.9	1114.0
G20.0	1064.7	1087.0	1111.1	1139.3	1121.4	1115.6	1090.1	1096.2	1088.6
G21.0	1037.5	1060.8	1085.5	1115.2	1096.3	1090.0	1063.2	1070.5	1062.8
G22.0	1009.8	1034.4	1059.5	1090.5	1070.3	1063.5	1035.8	1043.9	1036.3
G23.0	982.1	1007.5	1033.0	1064.6	1043.6	1036.7	1008.4	1016.8	1009.9
G24.0	954.8	980.4	1006.8	1039.3	1017.6	1009.8	980.0	990.0	983.3
G25.0	926.8	953.3	980.4	1013.8	990.8	983.1	952.9	963.0	956.3
G26.0	898.3	925.9	953.4	987.9	964.0	955.6	924.8	935.3	930.0
G27.0	870.5	898.4	926.2	960.9	937.1	928.0	896.1	907.7	902.1
G28.0	842.3	870.5	899.3	934.5	909.5	899.7	868.5	879.4	875.2
G29.0	814.1	842.4	871.6	907.5	881.9	872.4	839.8	852.0	847.7
G30.0	787.1	814.6	844.5	880.9	855.1	844.3	812.1	824.2	820.8
G31.0	759.6	786.3	817.2	853.7	826.8	816.0	784.7	795.6	793.1
G32.0	732.5	758.2	789.2	826.0	799.9	787.8	757.4	767.3	765.9
G33.0	705.9	730.3	762.3	798.4	772.1	759.7	730.4	739.6	738.1
G34.0	679.1	702.8	734.8	771.1	744.3	731.3	703.5	711.2	711.2
G35.0	651.8	675.6	706.9	743.2	717.3	704.2	676.5	684.3	683.6

C Plane (°):0.0-360.0: 30.0  
Test Lab: EVERFINE  
Test Type: TYPE C  
Temperature: 25.3℃  
Operator:

Gamma Plane (°):0.0-90.0:1.0  
Test Device:  
Distance: 11.655m [K=1.0000]  
Humidity: 45% R.H  
Inspector:



## Candlepower Table(Continue 1)

Unit: cd

G\C	C0.0	C30.0	C60.0	C90.0	C120.0	C150.0	C180.0	C210.0	C240.0
G36.0	625.0	648.2	679.7	715.6	689.3	676.8	649.5	656.9	656.3
G37.0	598.5	620.6	652.4	687.4	662.1	649.1	622.8	629.1	629.0
G38.0	572.2	593.4	625.0	659.2	634.7	621.8	596.0	602.1	602.0
G39.0	546.0	566.4	598.3	631.7	607.4	595.2	570.0	575.5	575.7
G40.0	519.9	538.9	571.2	603.5	580.5	567.3	543.4	547.7	548.4
G41.0	493.7	512.2	543.9	574.6	553.4	539.6	517.4	520.5	521.9
G42.0	468.8	485.1	518.0	547.1	526.4	512.9	491.4	494.0	495.6
G43.0	443.0	457.7	491.3	519.3	500.2	485.8	465.8	467.2	469.5
G44.0	417.5	431.2	464.6	490.7	473.3	458.6	440.1	440.2	443.3
G45.0	392.9	404.6	439.0	462.9	447.2	431.9	414.9	414.0	417.8
G46.0	368.2	378.8	413.5	434.9	421.4	404.9	389.8	387.2	392.0
G47.0	343.8	352.2	387.3	406.3	395.8	378.7	365.7	361.0	367.1
G48.0	319.9	325.7	362.5	379.0	370.3	352.9	340.8	335.4	342.0
G49.0	296.0	299.8	337.4	351.0	345.7	326.0	317.3	308.7	318.0
G50.0	272.8	275.0	312.7	323.3	320.8	300.1	293.3	283.3	293.4
G51.0	249.7	250.0	289.4	296.8	297.0	274.9	270.1	258.9	270.0
G52.0	226.7	225.4	265.3	270.3	272.7	250.4	246.9	234.2	246.5
G53.0	203.7	201.7	241.7	244.7	249.6	225.8	224.5	209.6	223.9
G54.0	181.9	180.2	218.0	219.0	226.2	201.3	202.1	187.1	201.1
G55.0	160.5	159.3	195.1	194.2	203.6	178.6	180.5	165.1	179.1
G56.0	140.1	138.5	173.7	172.0	181.4	158.2	159.1	145.5	157.2
G57.0	119.7	120.0	151.8	150.5	159.4	138.1	138.5	126.4	136.1
G58.0	100.3	101.7	130.9	129.0	138.6	118.3	118.1	107.4	115.4
G59.0	81.8	84.8	111.2	110.1	117.9	101.1	97.8	91.0	94.6
G60.0	64.3	69.5	90.2	91.9	97.3	84.1	79.6	75.2	75.9
G61.0	49.8	56.3	72.0	75.5	77.2	69.2	62.6	61.3	56.8
G62.0	34.4	44.0	53.0	60.8	59.1	55.7	47.8	48.8	40.5
G63.0	22.0	34.0	36.5	47.4	41.0	43.5	32.8	37.6	26.4
G64.0	17.5	25.8	24.9	36.3	28.0	33.5	20.7	28.8	18.7
G65.0	15.2	19.5	17.0	26.9	18.7	25.4	17.2	21.8	15.0
G66.0	13.3	15.3	14.6	20.0	15.3	19.3	15.1	17.0	13.0
G67.0	11.4	12.7	12.6	15.0	13.1	14.9	13.0	13.7	11.1
G68.0	9.7	10.5	10.8	11.9	11.3	12.4	11.2	11.4	9.5
G69.0	8.0	8.4	9.2	9.7	9.6	10.2	9.4	9.2	7.9
G70.0	6.5	6.4	7.6	7.7	8.0	8.1	7.7	7.1	6.4
G71.0	5.1	4.7	6.2	5.8	6.4	6.1	6.1	5.3	5.0

C Plane (°):0.0-360.0: 30.0  
Test Lab: EVERFINE  
Test Type: TYPE C  
Temperature: 25.3℃  
Operator:

Gamma Plane (°):0.0-90.0:1.0  
Test Device:  
Distance: 11.655m [K=1.0000]  
Humidity: 45% R.H  
Inspector:

Gamma Plane (°):0.0-90.0:1.0  
Test Device:  
Distance: 11.655m [K=1.0000]  
Humidity: 45% R.H  
Inspector:

## Candlepower Table(Continue 3)

Unit: cd

G\C	C270.0	C300.0	C330.0	C360.0					
G0.0	1450.3	1450.3	1450.3	1450.3					
G1.0	1446.6	1446.6	1445.6	1447.6					
G2.0	1440.5	1439.4	1437.7	1440.9					
G3.0	1431.8	1430.1	1427.4	1431.0					
G4.0	1421.4	1418.2	1414.8	1419.1					
G5.0	1408.1	1404.3	1400.0	1405.6					
G6.0	1393.4	1388.7	1383.6	1390.0					
G7.0	1377.8	1371.7	1366.2	1372.3					
G8.0	1360.6	1353.9	1347.8	1353.8					
G9.0	1342.3	1334.3	1327.7	1333.8					
G10.0	1323.6	1313.9	1307.2	1312.9					
G11.0	1303.7	1293.8	1286.2	1290.4					
G12.0	1283.5	1272.0	1264.3	1268.2					
G13.0	1262.6	1248.9	1241.8	1244.2					
G14.0	1240.4	1225.2	1218.3	1219.7					
G15.0	1218.4	1202.4	1194.3	1195.2					
G16.0	1195.8	1178.4	1170.0	1170.5					
G17.0	1172.4	1153.0	1144.8	1144.0					
G18.0	1148.6	1128.1	1119.4	1118.0					
G19.0	1124.5	1103.2	1093.6	1091.4					
G20.0	1099.7	1077.0	1067.4	1064.7					
G21.0	1074.8	1050.7	1041.2	1037.5					
G22.0	1049.8	1025.2	1014.3	1009.8					
G23.0	1023.9	998.8	987.0	982.1					
G24.0	998.2	971.0	959.9	954.8					
G25.0	972.4	944.5	932.4	926.8					
G26.0	945.9	917.8	904.7	898.3					
G27.0	919.1	890.0	877.5	870.5					
G28.0	892.8	863.1	849.2	842.3					
G29.0	865.8	836.7	821.1	814.1					
G30.0	839.0	808.9	793.5	787.1					
G31.0	811.4	780.6	765.1	759.6					
G32.0	784.0	754.0	736.8	732.5					
G33.0	756.8	727.4	709.3	705.9					
G34.0	729.0	698.9	681.9	679.1					
G35.0	701.4	671.6	654.9	651.8					

C Plane (°):0.0-360.0: 30.0  
Test Lab: EVERFINE  
Test Type: TYPE C  
Temperature: 25.3℃  
Operator:

Gamma Plane (°):0.0-90.0:1.0  
Test Device:  
Distance: 11.655m [K=1.0000]  
Humidity: 45% R.H  
Inspector:

## Candlepower Table(Continue 4)

Unit: cd

G\C	C270.0	C300.0	C330.0	C360.0					
G36.0	674.0	644.8	627.5	625.0					
G37.0	645.7	617.3	600.2	598.5					
G38.0	618.0	590.7	573.4	572.2					
G39.0	590.4	564.3	546.0	546.0					
G40.0	562.2	536.8	519.0	519.9					
G41.0	534.8	510.9	492.4	493.7					
G42.0	506.8	485.2	465.4	468.8					
G43.0	479.0	458.7	438.8	443.0					
G44.0	450.8	432.4	412.1	417.5					
G45.0	423.1	407.7	385.5	392.9					
G46.0	396.1	381.9	359.9	368.2					
G47.0	368.3	356.9	333.6	343.8					
G48.0	340.3	333.3	307.2	319.9					
G49.0	313.2	308.3	281.7	296.0					
G50.0	287.4	284.7	257.6	272.8					
G51.0	260.8	261.7	233.1	249.7					
G52.0	235.1	238.1	209.3	226.7					
G53.0	210.3	214.4	186.6	203.7					
G54.0	187.6	192.1	165.8	181.9					
G55.0	165.3	169.6	145.6	160.5					
G56.0	143.2	149.3	125.7	140.1					
G57.0	123.6	127.9	108.3	119.7					
G58.0	104.1	107.8	90.8	100.3					
G59.0	86.3	88.8	74.9	81.8					
G60.0	70.6	68.6	60.9	64.3					
G61.0	56.4	51.4	48.5	49.8					
G62.0	43.6	35.0	37.3	34.4					
G63.0	33.3	23.3	28.9	22.0					
G64.0	24.7	17.4	22.0	17.5					
G65.0	18.3	14.5	16.9	15.2					
G66.0	14.1	12.5	13.8	13.3					
G67.0	11.4	10.7	11.5	11.4					
G68.0	9.2	9.1	9.3	9.7					
G69.0	7.2	7.5	7.3	8.0					
G70.0	5.5	6.0	5.4	6.5					
G71.0	3.9	4.7	3.9	5.1					

C Plane (°):0.0-360.0: 30.0  
Test Lab: EVERFINE  
Test Type: TYPE C  
Temperature: 25.3℃  
Operator:

Gamma Plane (°):0.0-90.0:1.0  
Test Device:  
Distance: 11.655m [K=1.0000]  
Humidity: 45% R.H  
Inspector:

### Candlepower Table(Continue 5)

Unit: cd

[illegible]

C Plane (°):0.0-360.0: 30.0  
Test Lab: EVERFINE  
Test Type: TYPE C  
Temperature: 25.3°C  
Operator:

Gamma Plane (°):0.0-90.0:1.0  
Test Device:  
Distance: 11.655m [K=1.0000]  
Humidity: 45% R.H  
Inspector:

## LED Average Luminance Report

Avg.L	cd/m <sup>2</sup>
L 0-180(65) av	506.59
L 0-180(75) av	88.88
L 0-180(85) av	35.89
L 90-270(65) av	707.94
L 90-270(75) av	74.18
L 90-270(85) av	47.20
L 45(65) av	582.16
L 45(75) av	80.00
L 45(85) av	42.04

Standard: GB/T 29293-2012