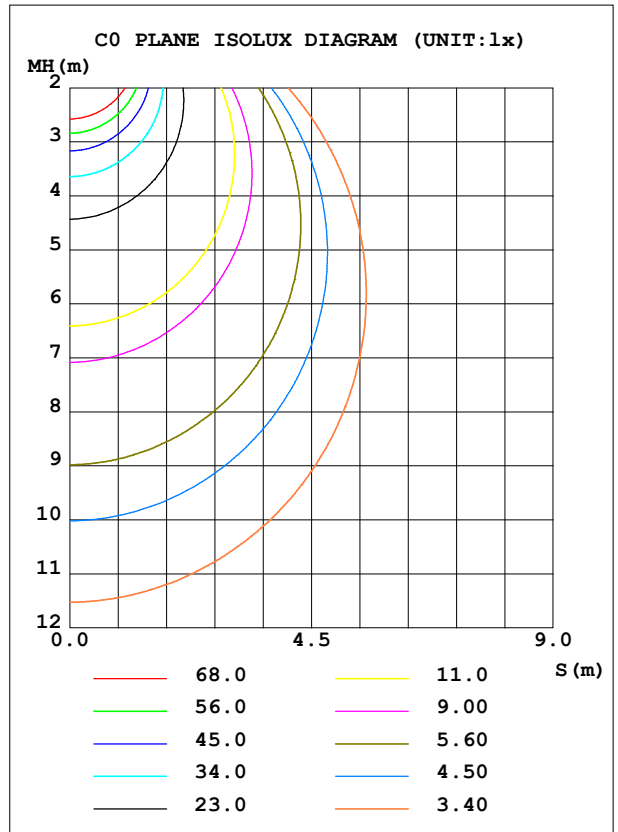
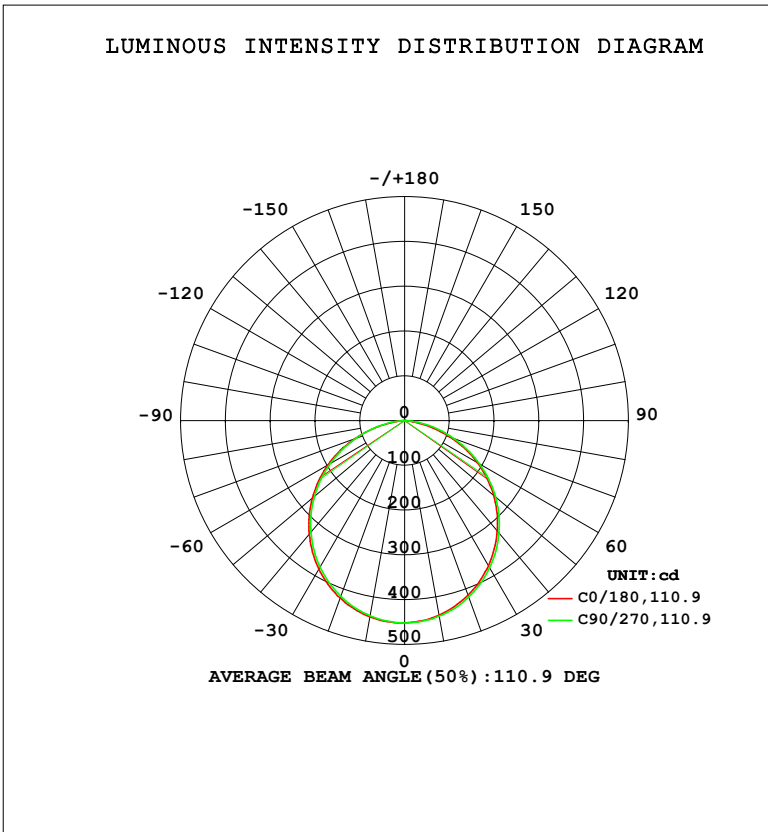


LUMINAIRE PHOTOMETRIC TEST REPORT

Test:U:120.01V I:0.0914A P:10.746W PF:0.9801 Freq:59.98Hz UTHDi:0.00% ITHDi:0.00% KDisp:0 Lamp Flux:1248.08x1 lm		
NAME: RGL-FR-5CCT-4-WH	TYPE:	WEIGHT:
SPEC.: 3500K	DIM.:	SERIAL No.:
MFR.: MAGICLITE	SUR.:	Shielding Angle:

DATA OF LAMP		PHOTOMETRIC DATA			
MODEL	RGL-FR-5CCT-4-WH	Imax (cd)	452.0	S/MH (C0/180)	1.26
NOMINAL POWER (W)	12	LOR (%)	100.0	S/MH (C90/270)	1.24
RATED VOLTAGE (V)	120	TOTAL FLUX (lm)	1248.1	$\eta$ UP, DN (C0-180)	0.0, 50.1
NOMINAL FLUX (lm)	1248.08	CIE CLASS	DIRECT	$\eta$ UP, DN (C180-360)	0.0, 49.9
LAMPS INSIDE	1	$\eta$ up (%)	0.0	CIBSE SHR NOM	1.25
TEST VOLTAGE (V)	120	$\eta$ down (%)	100.0	CIBSE SHR MAX	1.35



C Range: 0 - 360DEG  
 C Interval: 22.5DEG  
 Test Speed: HIGH  
 Temperature: 24.3 °C  
 Operators:  
 Test Date: 2024-12-11

$\gamma$  Range: 0 - 90DEG  
 $\gamma$  Interval: 1.0DEG  
 Test System: EVERFINE GO-SPEX500\_V1 SYSTEM V2.00.460  
 Humidity: 65.0%  
 Test Distance: 3.087m [K=1.0000]  
 Remarks:

**ZONAL FLUX DIAGRAM**

ZONAL FLUX DIAGRAM:

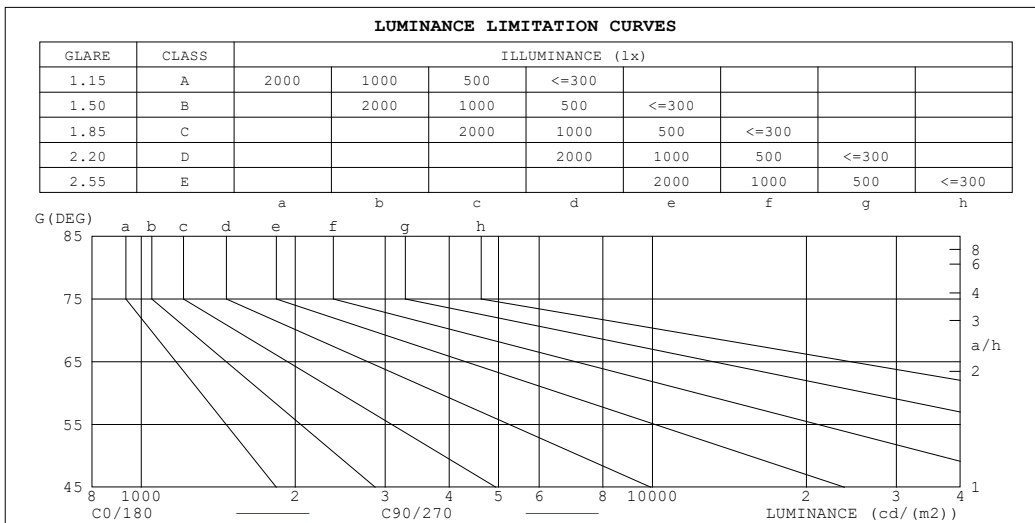
$\gamma$	C0	C45	C90	C135	C180	C225	C270	C315	$\gamma$	$\Phi$ zone	$\Phi$ total	%lum,lamp
10	441.5	442.4	443.7	445.1	445.1	444.1	442.9	441.7	0- 10	42.72	42.72	3.42,3.42
20	415.0	416.6	419.3	420.8	421.7	419.9	417.5	415.8	10- 20	122.1	164.8	13.2,13.2
30	374.5	376.8	379.9	382.3	383.0	380.8	377.8	375.4	20- 30	184.4	349.3	28,28
40	322.2	324.5	328.0	330.5	331.3	329.1	325.9	323.7	30- 40	221.6	570.8	45.7,45.7
50	259.7	261.8	265.4	268.1	269.1	266.1	262.8	261.0	40- 50	228.8	799.7	64.1,64.1
60	187.9	189.9	193.1	196.0	197.2	194.3	191.1	189.4	50- 60	204.7	1004	80.5,80.5
70	107.4	112.2	117.0	119.2	117.7	117.4	114.9	112.2	60- 70	152.3	1157	92.7,92.7
80	26.90	34.06	44.20	40.17	34.49	38.00	42.53	34.12	70- 80	79.62	1236	99.1,99.1
90	0.4260	0.4684	0.6481	0.4739	0.2808	0.2789	0.3840	0.2830	80- 90	11.76	1248	100,100
100									90-100			
110									100-110			
120									110-120			
130									120-130			
140									130-140			
150									140-150			
160									150-160			
170									160-170			
180									170-180			
DEG	LUMINOUS INTENSITY:cd									UNIT:lm		

C Range: 0 - 360DEG  
 C Interval: 22.5DEG  
 Test Speed: HIGH  
 Temperature:24.3 °C  
 Operators:  
 Test Date:2024-12-11

$\gamma$  Range: 0 - 90DEG  
 $\gamma$  Interval: 1.0DEG  
 Test System:EVERFINE GO-SPEX500\_V1 SYSTEM V2.00.460  
 Humidity:65.0%  
 Test Distance:3.087m [K=1.0000]  
 Remarks:

**LUMINANCE LIMITATION CURVES**

Test:U:120.01V I:0.0914A P:10.746W PF:0.9801 Freq:59.98Hz UTHDi:0.00% ITHDi:0.00% KDisp:0 Lamp Flux:1248.08x1 lm		
NAME: RGL-FR-5CCT-4-WH	TYPE:	WEIGHT:
SPEC.: 3500K	DIM.:	SERIAL No.:
MFR.: MAGICLITE	SUR.:	Shielding Angle:



LUMINANCE cd/(m2)		
G (DEG)	C0/180	C90/270
85	87883	434024
80	493261	810649
75	820945	982460
70	999791	1089563
65	1118024	1169459
60	1196728	1230082
55	1245935	1276960
50	1286722	1314804
45	1315793	1342252

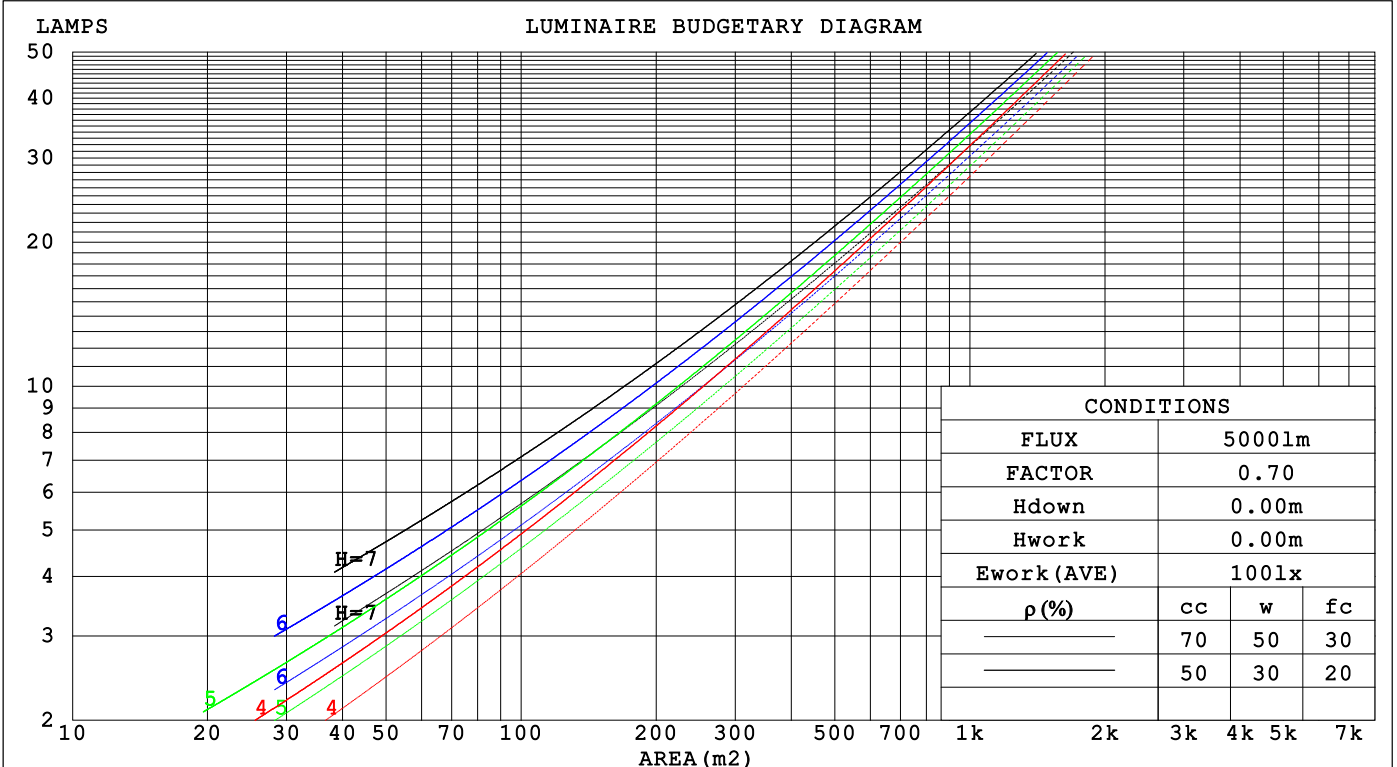
C Range: 0 - 360DEG  
 C Interval: 22.5DEG  
 Test Speed: HIGH  
 Temperature: 24.3°C  
 Operators:  
 Test Date: 2024-12-11

γ Range: 0 - 90DEG  
 γ Interval: 1.0DEG  
 Test System: EVERFINE GO-SPEX500\_V1 SYSTEM V2.00.460  
 Humidity: 65.0%  
 Test Distance: 3.087m [K=1.0000]  
 Remarks:

**CU AND LUMINAIRE BUDGETARY ESTIMATE DIAGRAM**

Test:U:120.01V I:0.0914A P:10.746W PF:0.9801 Freq:59.98Hz		
UTHDi:0.00% ITHDi:0.00% KDisp:0 Lamp Flux:1248.08x1 lm		
NAME: RGL-FR-5CCT-4-WH	TYPE:	WEIGHT:
SPEC.: 3500K	DIM.:	SERIAL No.:
MFR.: MAGICLITE	SUR.:	Shielding Angle:

ρcc	80%			70%			50%			30%			10%			0
ρw	50%	30%	10%	50%	30%	10%	50%	30%	10%	50%	30%	10%	50%	30%	10%	0
ρfc	20%			20%			20%			20%			20%			0
RCR	RCR:Room Cavity Ratio															
	Coefficients of Utilization(CU)															
0.0	1.19	1.19	1.19	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
1.0	1.05	1.00	.97	1.02	.99	.95	.98	.95	.92	.94	.92	.89	.91	.89	.87	.85
2.0	.91	.85	.79	.89	.83	.78	.86	.81	.76	.83	.78	.74	.80	.76	.73	.71
3.0	.80	.72	.66	.79	.71	.65	.76	.69	.64	.73	.67	.63	.70	.66	.62	.60
4.0	.71	.62	.56	.70	.62	.55	.67	.60	.55	.65	.59	.54	.63	.57	.53	.51
5.0	.63	.55	.48	.62	.54	.48	.60	.53	.47	.58	.52	.47	.56	.51	.46	.44
6.0	.57	.48	.42	.56	.48	.42	.54	.47	.41	.53	.46	.41	.51	.45	.41	.38
7.0	.52	.43	.37	.51	.43	.37	.49	.42	.37	.48	.41	.36	.47	.41	.36	.34
8.0	.47	.39	.33	.47	.38	.33	.45	.38	.33	.44	.37	.32	.43	.37	.32	.30
9.0	.43	.35	.30	.43	.35	.30	.42	.34	.29	.41	.34	.29	.40	.34	.29	.27
10.0	.40	.32	.27	.40	.32	.27	.39	.32	.27	.38	.31	.27	.37	.31	.26	.25



C Range: 0 - 360DEG  
 C Interval: 22.5DEG  
 Test Speed: HIGH  
 Temperature:24.3°C  
 Operators:  
 Test Date:2024-12-11

γ Range: 0 - 90DEG  
 γ Interval: 1.0DEG  
 Test System:EVERFINE GO-SPEX500\_V1 SYSTEM V2.00.460  
 Humidity:65.0%  
 Test Distance:3.087m [K=1.0000]  
 Remarks:

**WEC AND CCEC**

Test:U:120.01V I:0.0914A P:10.746W PF:0.9801 Freq:59.98Hz		
UTHDi:0.00% ITHDi:0.00% KDisp:0 Lamp Flux:1248.08x1 lm		
NAME: RGL-FR-5CCT-4-WH	TYPE:	WEIGHT:
SPEC.: 3500K	DIM.:	SERIAL No.:
MFR.: MAGICLITE	SUR.:	Shielding Angle:

$\rho_{CC}$	80%			70%			50%			30%			10%			0
$\rho_w$	50%	30%	10%	50%	30%	10%	50%	30%	10%	50%	30%	10%	50%	30%	10%	0
$\rho_{fc}$	20%			20%			20%			20%			20%			0
RCR	RCR:Room Cavity Ratio						Wall Exitance Coefficients(WEC)									
0.0																
1.0	.296	.169	.053	.289	.165	.052	.276	.158	.051	.264	.152	.049	.253	.147	.047	
2.0	.284	.155	.048	.278	.153	.047	.266	.148	.046	.255	.143	.045	.245	.139	.044	
3.0	.265	.141	.042	.259	.139	.042	.249	.135	.041	.239	.131	.040	.230	.128	.039	
4.0	.245	.127	.037	.240	.126	.037	.231	.123	.037	.223	.120	.036	.215	.117	.036	
5.0	.227	.116	.034	.223	.115	.033	.215	.112	.033	.208	.110	.033	.201	.107	.032	
6.0	.211	.106	.030	.208	.105	.030	.200	.103	.030	.194	.101	.030	.187	.099	.029	
7.0	.197	.097	.028	.194	.096	.027	.187	.095	.027	.181	.093	.027	.176	.091	.027	
8.0	.184	.090	.025	.181	.089	.025	.175	.088	.025	.170	.086	.025	.165	.085	.025	
9.0	.173	.084	.023	.170	.083	.023	.165	.082	.023	.160	.080	.023	.155	.079	.023	
10.0	.163	.078	.022	.160	.077	.022	.156	.076	.021	.151	.075	.021	.147	.074	.021	

$\rho_{CC}$	80%			70%			50%			30%			10%			0
$\rho_w$	50%	30%	10%	50%	30%	10%	50%	30%	10%	50%	30%	10%	50%	30%	10%	0
$\rho_{fc}$	20%			20%			20%			20%			20%			0
RCR	RCR:Room Cavity Ratio						Ceiling Cavity Exitance Coefficients(CCEC)									
0.0	.190	.190	.190	.163	.163	.163	.111	.111	.111	.064	.064	.064	.020	.020	.020	
1.0	.179	.156	.135	.153	.134	.117	.105	.092	.081	.060	.053	.047	.019	.017	.015	
2.0	.171	.132	.099	.147	.114	.086	.100	.079	.060	.058	.046	.035	.019	.015	.011	
3.0	.163	.114	.075	.140	.099	.065	.096	.068	.046	.056	.040	.027	.018	.013	.009	
4.0	.156	.101	.059	.134	.087	.051	.092	.061	.036	.053	.036	.021	.017	.012	.007	
5.0	.149	.090	.048	.128	.078	.041	.088	.055	.029	.051	.032	.017	.016	.010	.006	
6.0	.141	.082	.039	.122	.071	.034	.084	.050	.024	.049	.029	.014	.016	.010	.005	
7.0	.135	.075	.033	.116	.065	.029	.080	.046	.021	.047	.027	.012	.015	.009	.004	
8.0	.128	.069	.029	.111	.060	.025	.076	.042	.018	.044	.025	.011	.014	.008	.004	
9.0	.122	.064	.025	.105	.056	.022	.073	.039	.016	.043	.023	.009	.014	.008	.003	
10.0	.117	.060	.023	.101	.052	.020	.070	.037	.014	.041	.022	.008	.013	.007	.003	

C Range: 0 - 360DEG  
 C Interval: 22.5DEG  
 Test Speed: HIGH  
 Temperature:24.3°C  
 Operators:  
 Test Date:2024-12-11

$\gamma$  Range: 0 - 90DEG  
 $\gamma$  Interval: 1.0DEG  
 Test System:EVERFINE GO-SPEX500\_V1 SYSTEM V2.00.460  
 Humidity:65.0%  
 Test Distance:3.087m [K=1.0000]  
 Remarks:

**UGR(Unified Glare Rating) Table**

Test:U:120.01V I:0.0914A P:10.746W PF:0.9801 Freq:59.98Hz		
UTHDi:0.00% ITHDi:0.00% KDisp:0 Lamp Flux:1248.08x1 lm		
NAME: RGL-FR-5CCT-4-WH	TYPE:	WEIGHT:
SPEC.: 3500K	DIM.:	SERIAL No.:
MFR.: MAGICLITE	SUR.:	Shielding Angle:

ceiling/cavity	0.7	0.7	0.5	0.5	0.3	0.7	0.7	0.5	0.5	0.3
walls	0.5	0.3	0.5	0.3	0.3	0.5	0.3	0.5	0.3	0.3
working 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	37.6	39.1	37.9	39.3	39.5	37.7	39.3	38.0	39.5	39.7
3H	39.0	40.4	39.3	40.6	40.8	39.2	40.6	39.5	40.8	41.1
4H	39.4	40.7	39.7	41.0	41.2	39.7	41.1	40.1	41.3	41.6
6H	39.6	40.8	39.9	41.1	41.4	40.1	41.3	40.4	41.6	41.9
8H	39.6	40.8	39.9	41.0	41.3	40.2	41.4	40.5	41.6	41.9
12H	39.5	40.7	39.9	41.0	41.3	40.2	41.3	40.5	41.6	41.9
4H 2H	38.2	39.5	38.5	39.8	40.1	38.3	39.6	38.6	39.9	40.1
3H	39.7	40.9	40.1	41.2	41.5	39.9	41.1	40.3	41.4	41.7
4H	40.3	41.3	40.6	41.6	42.0	40.6	41.6	41.0	42.0	42.3
6H	40.5	41.4	40.9	41.8	42.2	41.0	42.0	41.4	42.3	42.7
8H	40.5	41.4	40.9	41.7	42.1	41.1	42.0	41.6	42.4	42.8
12H	40.5	41.3	40.9	41.6	42.1	41.2	42.0	41.6	42.3	42.7
8H 4H	40.5	41.3	40.9	41.7	42.1	40.8	41.6	41.2	42.0	42.4
6H	40.8	41.5	41.2	41.9	42.3	41.3	42.0	41.7	42.4	42.9
8H	40.8	41.4	41.3	41.9	42.3	41.5	42.1	41.9	42.5	43.0
12H	40.8	41.3	41.3	41.8	42.2	41.5	42.1	42.0	42.5	43.0
12H 4H	40.5	41.3	40.9	41.6	42.1	40.8	41.5	41.2	41.9	42.3
6H	40.8	41.4	41.3	41.9	42.3	41.3	41.9	41.8	42.4	42.8
8H	40.8	41.4	41.3	41.8	42.3	41.5	42.0	41.9	42.5	42.9

Variations with the observer position at spacings(CIE Pub.117):		
S = 1.0H	+ 0.2 / - 0.3	+ 0.2 / - 0.2
1.5H	+ 0.2 / - 0.4	+ 0.2 / - 0.3
2.0H	+ 0.3 / - 0.3	+ 0.2 / - 0.3

CIE Pub.117, 1248 lm Total Lamp Luminous Flux Corrected (8log(F/F0) = 0.8)  
 Area: 0.000314 m2

C Range: 0 - 360DEG  
 C Interval: 22.5DEG  
 Test Speed: HIGH  
 Temperature:24.3°C  
 Operators:  
 Test Date:2024-12-11

γ Range: 0 - 90DEG  
 γ Interval: 1.0DEG  
 Test System:EVERFINE GO-SPEX500\_V1 SYSTEM V2.00.460  
 Humidity:65.0%  
 Test Distance:3.087m [K=1.0000]  
 Remarks:

**UTILIZATION FACTORS TABLE**

Test:U:120.01V I:0.0914A P:10.746W PF:0.9801 Freq:59.98Hz UTHDi:0.00% ITHDi:0.00% KDisp:0 Lamp Flux:1248.08x1 lm		
NAME: RGL-FR-5CCT-4-WH	TYPE:	WEIGHT:
SPEC.: 3500K	DIM.:	SERIAL No.:
MFR.: MAGICLITE	SUR.:	Shielding Angle:

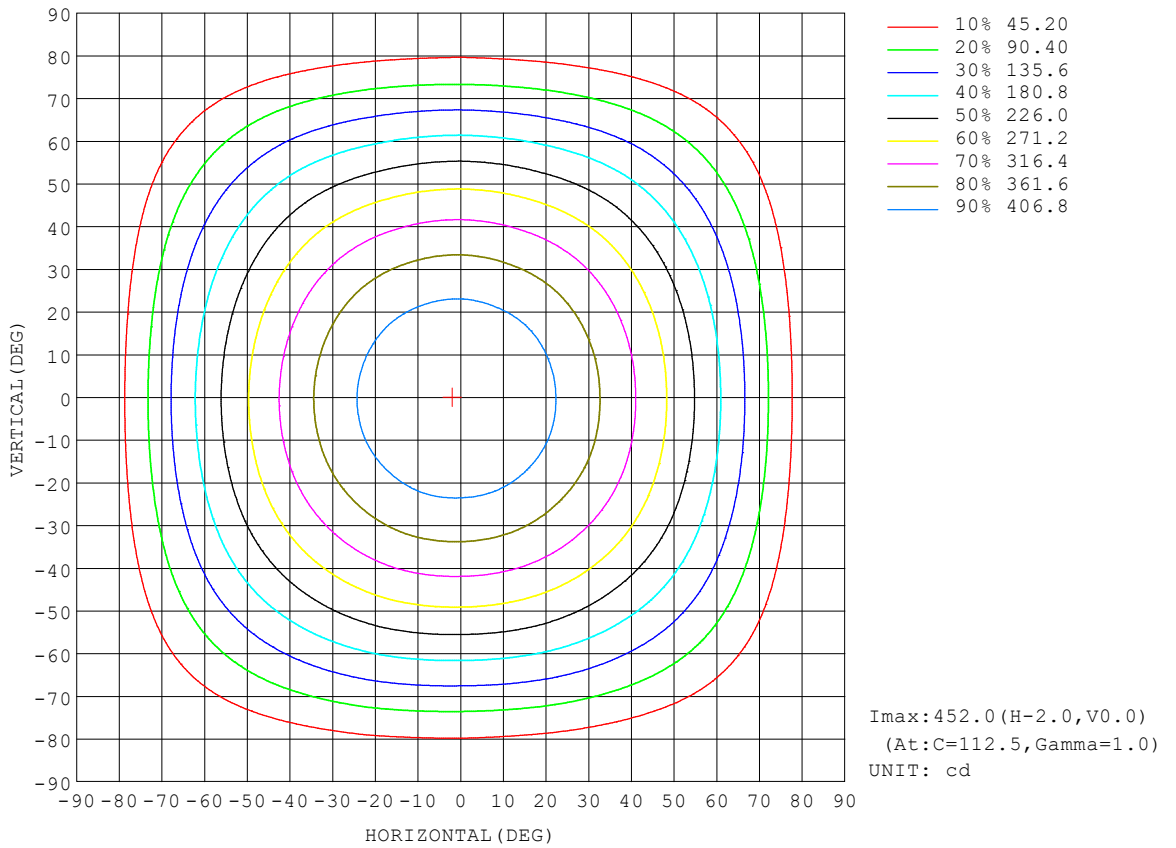
REFLECTANCE										
Ceiling	0.8	0.8	0.8	0.7	0.7	0.7	0.5	0.5	0.5	0
Walls	0.7	0.5	0.3	0.7	0.5	0.3	0.7	0.5	0.3	0
Working plane	0.2	0.2	0.2	0.2	0.2	0.2	0.2	0.2	0.2	0
ROOM INDEX	UTILIZATION FACTORS (PERCENT) $k(RI) \times RCR = 5$									
k = 0.60	58	47	40	57	46	40	56	46	39	33
0.80	68	57	49	67	56	49	65	56	49	42
1.00	77	66	59	76	65	58	73	67	58	51
1.25	84	74	67	82	73	66	80	71	65	58
1.50	89	79	72	87	78	72	84	77	71	63
2.00	96	87	81	94	86	80	90	84	79	71
2.50	100	92	86	98	91	85	94	88	83	75
3.00	103	96	91	101	95	90	97	92	88	79
4.00	107	101	97	104	100	95	100	96	93	84
5.00	109	105	101	107	103	99	102	99	96	87
ROOM INDEX	UF(total)									Direct
According to DIN EN 13032-2 2004			Suspended				SHRNOM = 1.25			

C Range: 0 - 360DEG  
 C Interval: 22.5DEG  
 Test Speed: HIGH  
 Temperature:24.3°C  
 Operators:  
 Test Date:2024-12-11

γ Range: 0 - 90DEG  
 γ Interval: 1.0DEG  
 Test System:EVERFINE GO-SPEX500\_V1 SYSTEM V2.00.460  
 Humidity:65.0%  
 Test Distance:3.087m [K=1.0000]  
 Remarks:

**ISOCANDELA DIAGRAM**

Test:U:120.01V I:0.0914A P:10.746W PF:0.9801 Freq:59.98Hz UTHDi:0.00% ITHDi:0.00% KDisp:0 Lamp Flux:1248.08x1 lm		
NAME: RGL-FR-5CCT-4-WH	TYPE:	WEIGHT:
SPEC.: 3500K	DIM.:	SERIAL No.:
MFR.: MAGICLITE	SUR.:	Shielding Angle:

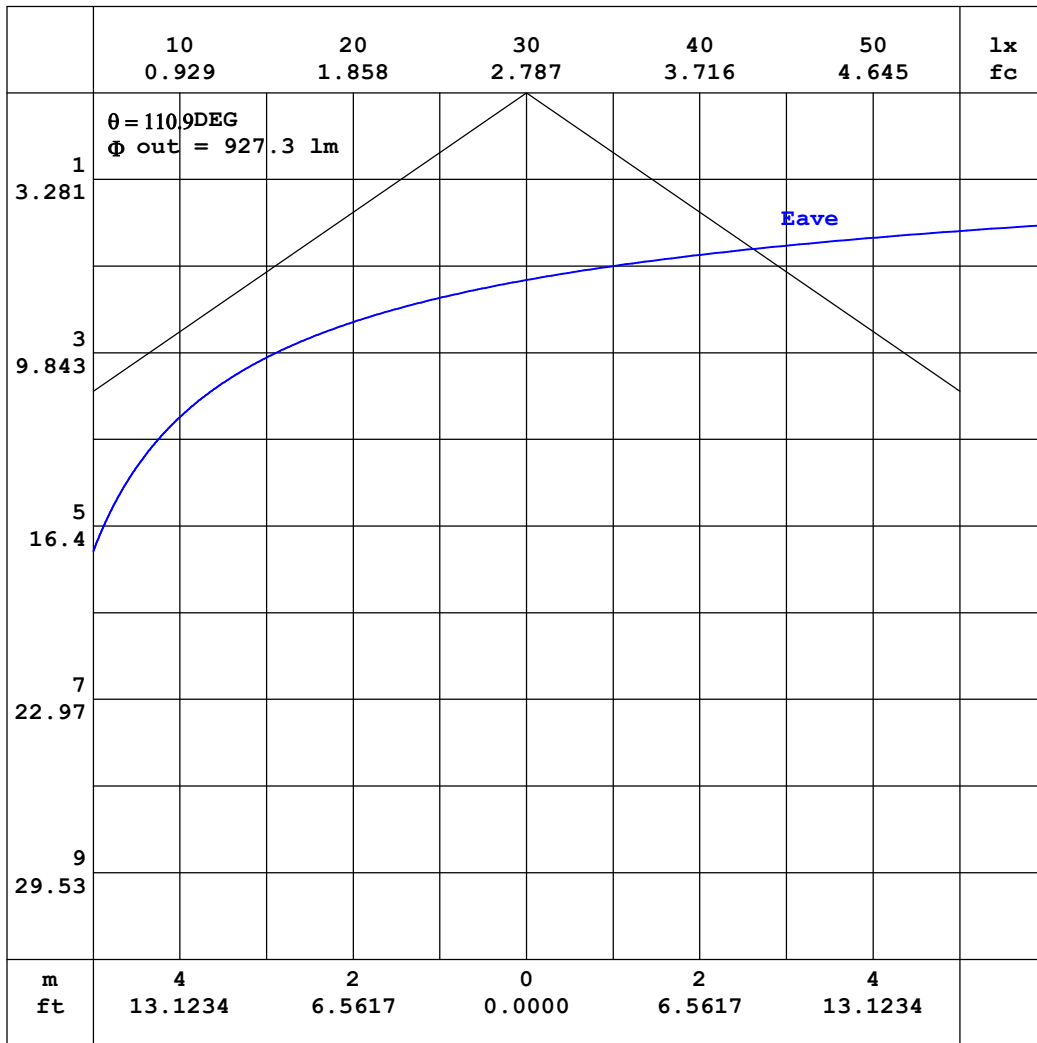


C Range: 0 - 360DEG  
 C Interval: 22.5DEG  
 Test Speed: HIGH  
 Temperature:24.3°C  
 Operators:  
 Test Date:2024-12-11

γ Range: 0 - 90DEG  
 γ Interval: 1.0DEG  
 Test System:EVERFINE GO-SPEX500\_V1 SYSTEM V2.00.460  
 Humidity:65.0%  
 Test Distance:3.087m [K=1.0000]  
 Remarks:

**AAI CURVES**

Test:U:120.01V I:0.0914A P:10.746W PF:0.9801 Freq:59.98Hz		
UTHDi:0.00% ITHDi:0.00% KDisp:0 Lamp Flux:1248.08x1 lm		
NAME: RGL-FR-5CCT-4-WH	TYPE:	WEIGHT:
SPEC.: 3500K	DIM.:	SERIAL No.:
MFR.: MAGICLITE	SUR.:	Shielding Angle:



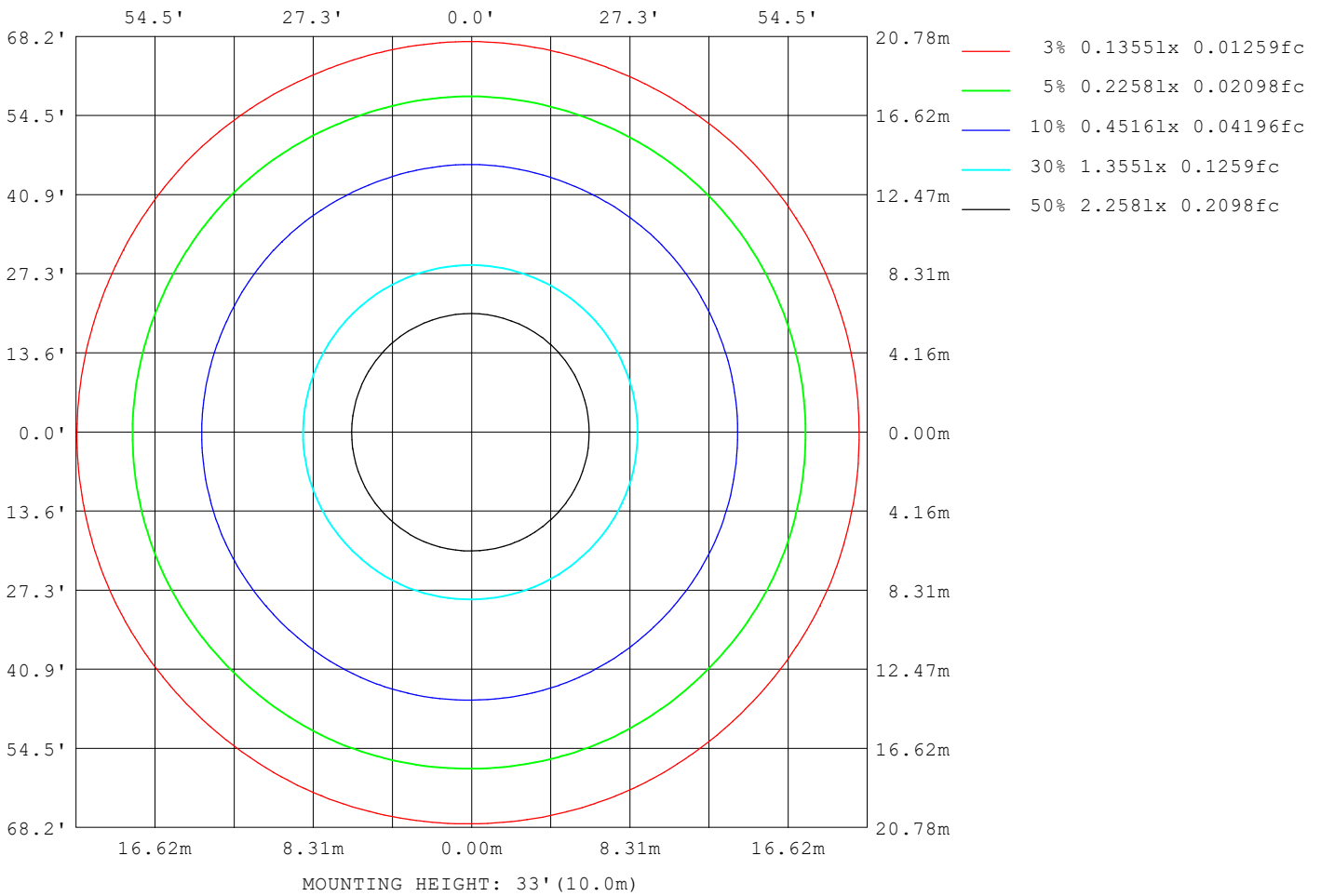
Note: The Curves indicate the illuminated area and the average illumination when the luminaire is at different distance.

C Range: 0 - 360DEG  
 C Interval: 22.5DEG  
 Test Speed: HIGH  
 Temperature: 24.3°C  
 Operators:  
 Test Date: 2024-12-11

$\gamma$  Range: 0 - 90DEG  
 $\gamma$  Interval: 1.0DEG  
 Test System: EVERFINE GO-SPEX500\_V1 SYSTEM V2.00.460  
 Humidity: 65.0%  
 Test Distance: 3.087m [K=1.0000]  
 Remarks:

**ISOLUX DIAGRAM**

Test:U:120.01V I:0.0914A P:10.746W PF:0.9801 Freq:59.98Hz UTHDi:0.00% ITHDi:0.00% KDisp:0 Lamp Flux:1248.08x1 lm		
NAME: RGL-FR-5CCT-4-WH	TYPE:	WEIGHT:
SPEC.: 3500K	DIM.:	SERIAL No.:
MFR.: MAGICLITE	SUR.:	Shielding Angle:



C Range: 0 - 360DEG  
 C Interval: 22.5DEG  
 Test Speed: HIGH  
 Temperature: 24.3°C  
 Operators:  
 Test Date: 2024-12-11

γ Range: 0 - 90DEG  
 γ Interval: 1.0DEG  
 Test System: EVERFINE GO-SPEX500\_V1 SYSTEM V2.00.460  
 Humidity: 65.0%  
 Test Distance: 3.087m [K=1.0000]  
 Remarks:

**LED Avg.L Report**

Test:U:120.01V I:0.0914A P:10.746W PF:0.9801 Freq:59.98Hz UTHDi:0.00% ITHDi:0.00% KDisp:0 Lamp Flux:1248.08x1 lm		
NAME: RGL-FR-5CCT-4-WH	TYPE:	WEIGHT:
SPEC.: 3500K	DIM.:	SERIAL No.:
MFR.: MAGICLITE	SUR.:	Shielding Angle:

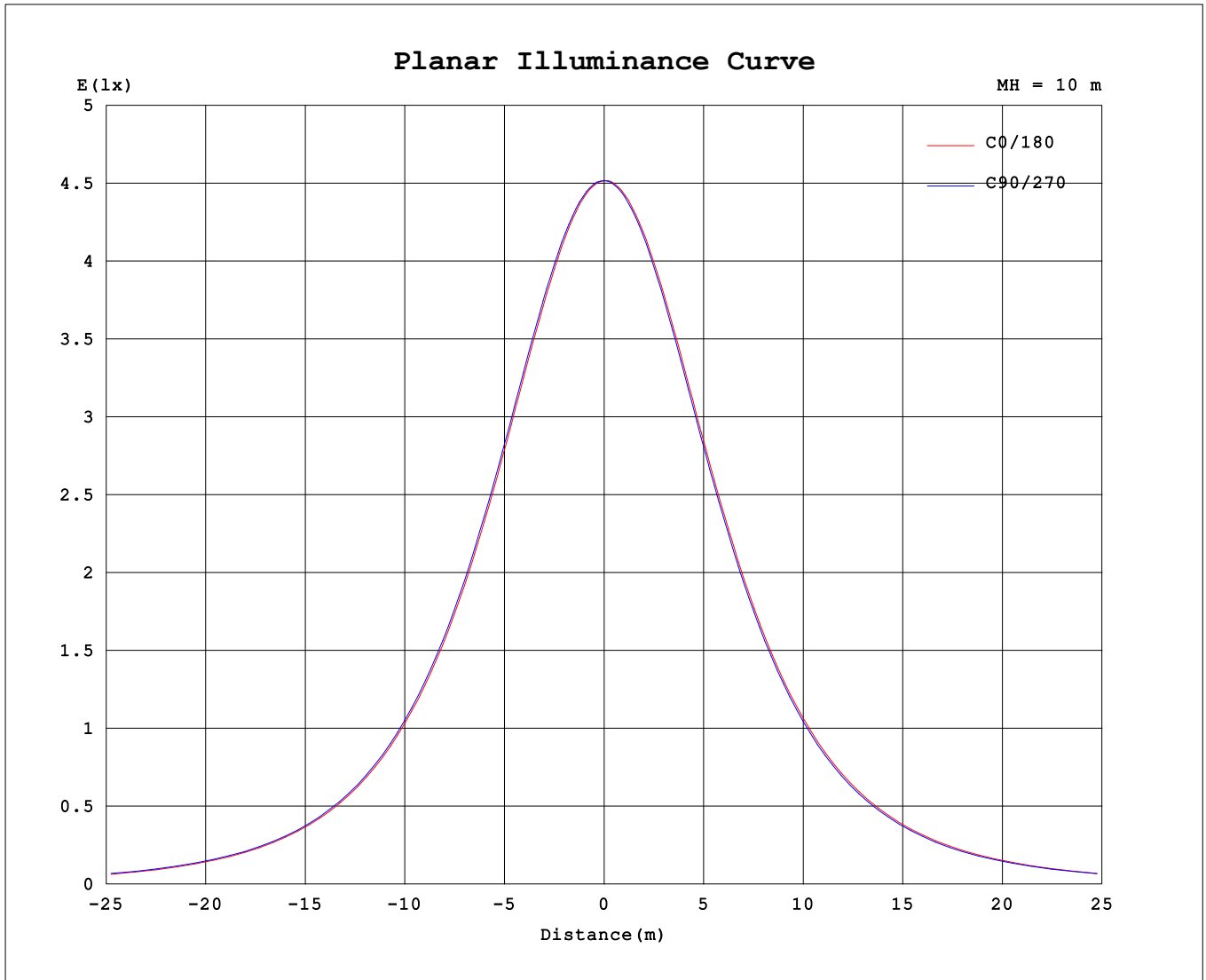
AvgL	cd/m2
L_0~180 (65) av	1157514
L_0~180 (75) av	877011
L_0~180 (85) av	101691
L_90~270 (65) av	1161514
L_90~270 (75) av	969072
L_90~270 (85) av	409888
L_45 (65) av	1163439
L_45 (75) av	930760
L_45 (85) av	160441

Standard: GB/T 29293-2012

C Range: 0 - 360DEG  
 C Interval: 22.5DEG  
 Test Speed: HIGH  
 Temperature:24.3℃  
 Operators:  
 Test Date:2024-12-11

γ Range: 0 - 90DEG  
 γ Interval: 1.0DEG  
 Test System:EVERFINE GO-SPEX500\_V1 SYSTEM V2.00.460  
 Humidity:65.0%  
 Test Distance:3.087m [K=1.0000]  
 Remarks:

**Planar Illuminance Curve**



C Range: 0 - 360DEG  
 C Interval: 22.5DEG  
 Test Speed: HIGH  
 Temperature: 24.3 °C  
 Operators:  
 Test Date: 2024-12-11

γ Range: 0 - 90DEG  
 γ Interval: 1.0DEG  
 Test System: EVERFINE GO-SPEX500\_V1 SYSTEM V2.00.460  
 Humidity: 65.0%  
 Test Distance: 3.087m [K=1.0000]  
 Remarks:

