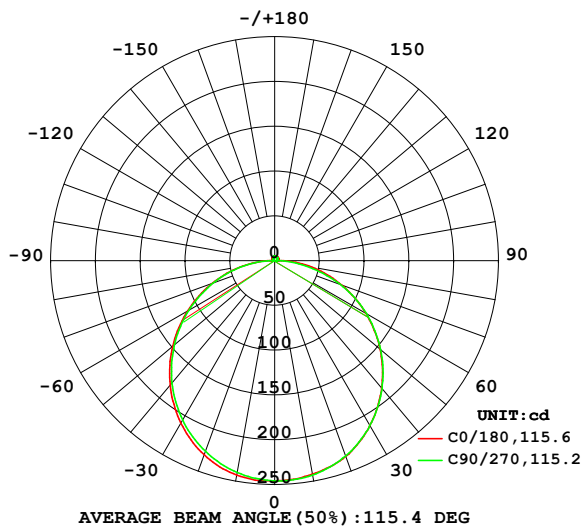


LUMINAIRE PHOTOMETRIC TEST REPORT

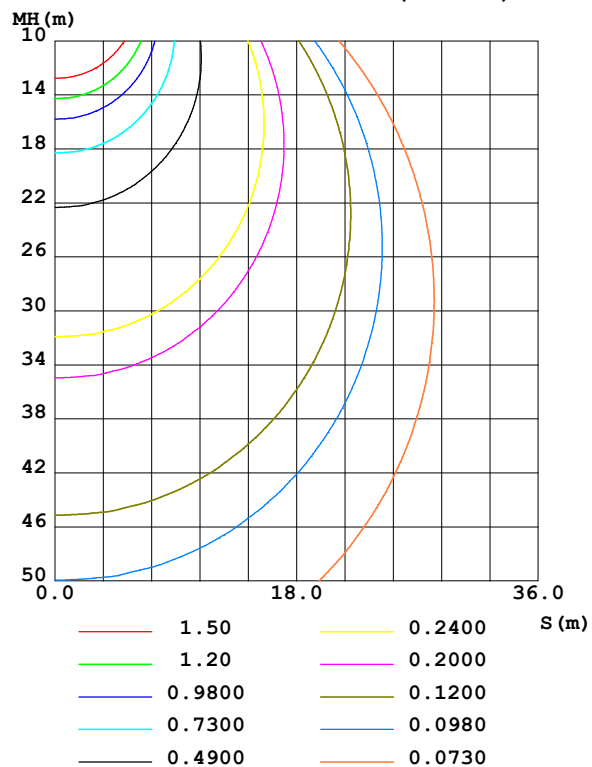
Test:U:101.40V I:0.1790A P:16.000W PF:0.8840 Freq:50.00Hz Lamp Flux:762.007x1 lm		
NAME:	TYPE:	WEIGHT:
SPEC.:	DIM.:	SERIAL No.:
MFR.: EVERFINE	SUR.:	Shielding Angle:

DATA OF LAMP		PHOTOMETRIC DATA				Eff: 47.63 lm/W
MODEL	80018-60P	I _{max} (cd)	246.0	S/MH(C0/180)	1.28	
NOMINAL POWER(W)	15	LOR(%)	100.0	S/MH(C90/270)	1.29	
RATED VOLTAGE(V)	100	TOTAL FLUX(lm)	762.01	η UP,DN(C0-180)	1.4,47.5	
NOMINAL FLUX(lm)	762.007	CIE CLASS	DIRECT	η UP,DN(C180-360)	1.6,49.5	
LAMPS INSIDE	1	η up (%)	3.0	CIBSE SHR NOM	1.25	
TEST VOLTAGE(V)	100	η down (%)	97.0	CIBSE SHR MAX	1.35	

LUMINOUS INTENSITY DISTRIBUTION DIAGRAM



C0 PLANE ISOLUX DIAGRAM (UNIT:lx)



C Range: 0 - 360DEG
C Interval: 90.0DEG
Test Speed: HIGH
Temperature:25.3℃
Operators:DAMIN
Test Date:02 January 2025

γ Range: 0 - 180DEG
γ Interval: 1.0DEG
Test System:EVERFINE GO-2000B_V1 SYSTEM V2.00.459
Humidity:65.0%
Test Distance:8.186m [K=1.0000]
Remarks:

ZONAL FLUX DIAGRAM

ZONAL FLUX DIAGRAM:

γ	C0	C90	C180	C270					γ	Φ zone	Φ total	%lum, lamp
10	243.2	240.4	242.2	243.0					0- 10	23.30	23.30	3.06,3.06
20	230.5	226.4	232.6	232.1					10- 20	66.99	90.29	11.8,11.8
30	209.5	205.6	212.8	212.7					20- 30	102.0	192.2	25.2,25.2
40	181.5	178.4	186.1	186.7					30- 40	123.5	315.7	41.4,41.4
50	148.6	146.1	153.8	154.5					40- 50	129.2	444.9	58.4,58.4
60	112.1	110.5	117.6	118.5					50- 60	118.9	563.8	74,74
70	74.07	72.84	79.61	78.01					60- 70	94.54	658.3	86.4,86.4
80	36.48	35.19	42.12	35.65					70- 80	59.76	718.1	94.2,94.2
90	4.905	2.303	7.648	3.390					80- 90	21.05	739.2	97,97
100	3.441	1.859	3.689	2.327					90-100	3.193	742.4	97.4,97.4
110	3.503	2.340	4.030	2.829					100-110	3.156	745.5	97.8,97.8
120	3.725	2.751	4.394	3.254					110-120	3.318	748.8	98.3,98.3
130	4.003	3.246	4.455	3.691					120-130	3.310	752.1	98.7,98.7
140	4.322	3.758	4.655	3.998					130-140	3.102	755.2	99.1,99.1
150	4.522	4.256	4.903	4.387					140-150	2.733	758.0	99.5,99.5
160	4.810	4.711	5.031	4.728					150-160	2.164	760.1	99.8,99.8
170	4.973	5.052	4.947	4.925					160-170	1.385	761.5	99.9,99.9
180	5.124	5.205	5.133	5.183					170-180	0.4798	762.0	100,100
DEG	LUMINOUS INTENSITY:cd									UNIT:lm		

Conical surface Flux(90deg): 380.62 lm

%lum = 49.9%

%lamp = 49.9%

Conical surface Flux(130deg): 614.89 lm

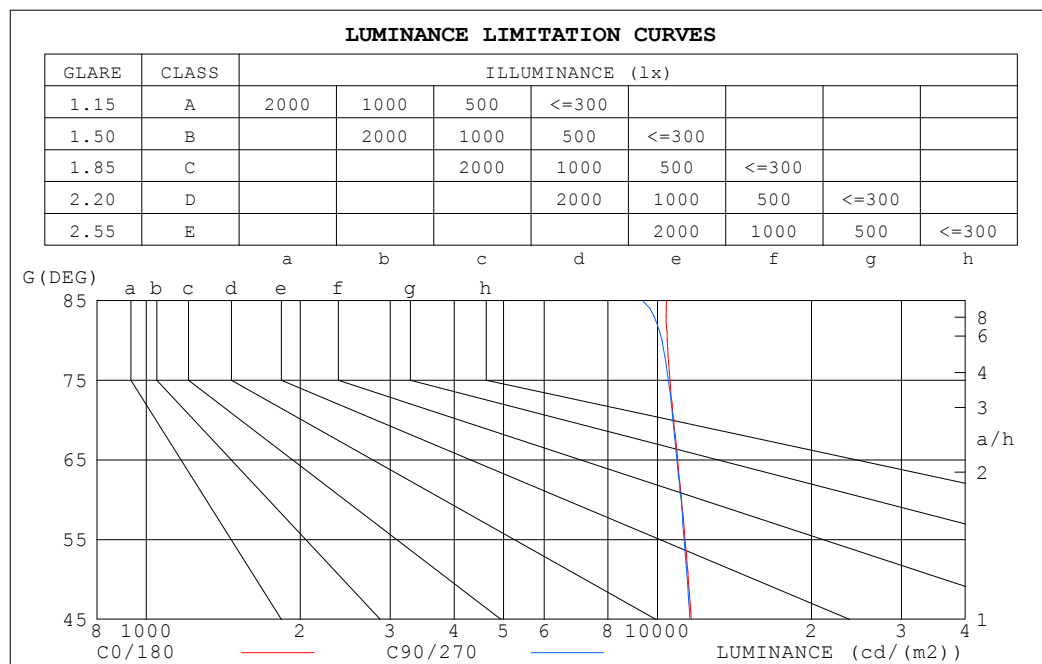
%lum = 80.7%

%lamp = 80.7%

C Range: 0 - 360DEG
 C Interval: 90.0DEG
 Test Speed: HIGH
 Temperature:25.3°C
 Operators:DAMIN
 Test Date:02 January 2025

γ Range: 0 - 180DEG
 γ Interval: 1.0DEG
 Test System:EVERFINE GO-2000B_V1 SYSTEM V2.00.459
 Humidity:65.0%
 Test Distance:8.186m [K=1.0000]
 Remarks:

LUMINANCE LIMITATION CURVES



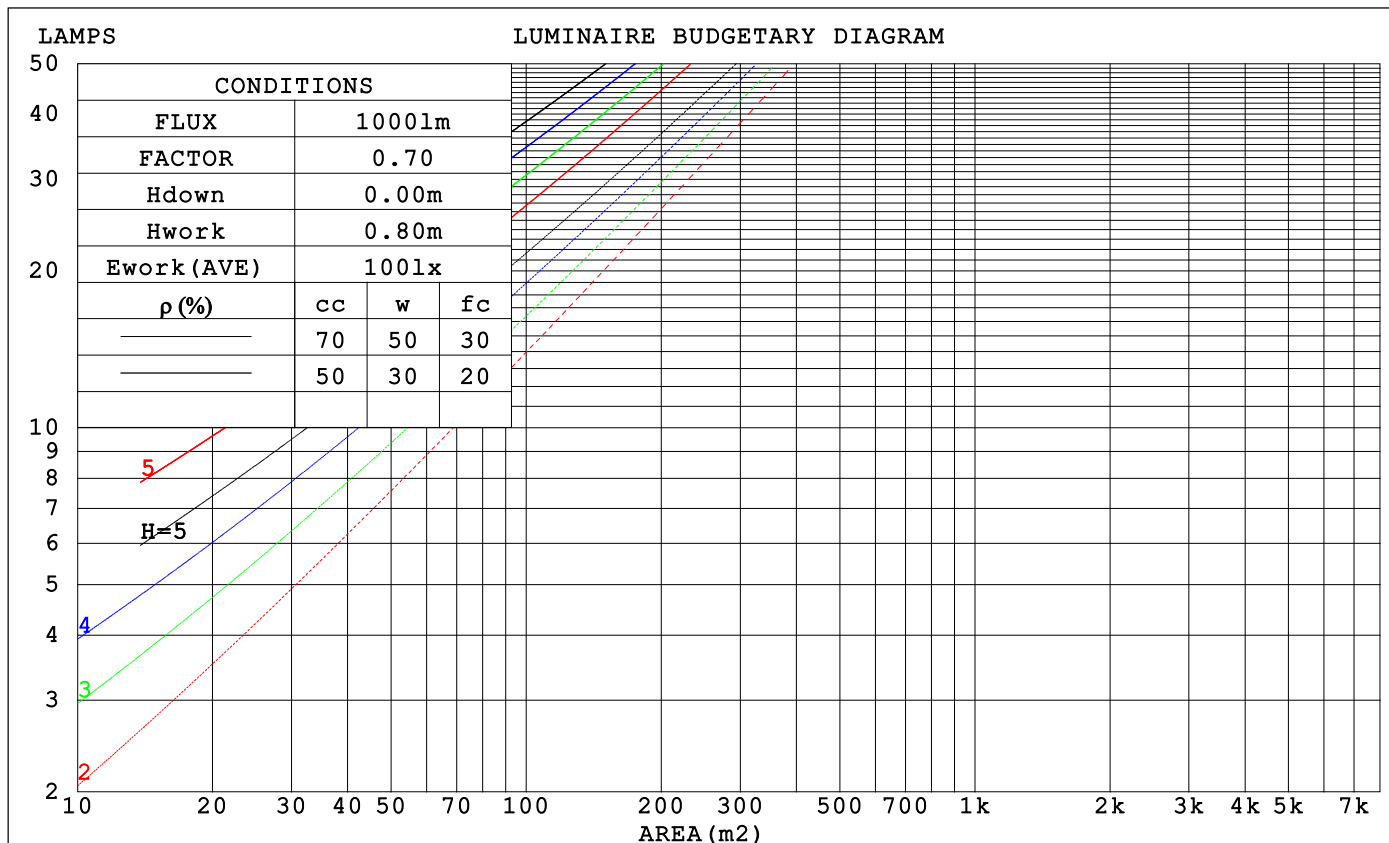
LUMINANCE cd/(m2)		
G (DEG)	C0/180	C90/270
85	10414	9339
80	10439	10197
75	10580	10504
70	10760	10715
65	10957	10912
60	11140	11117
55	11323	11274
50	11487	11433
45	11636	11574

C Range: 0 - 360DEG
C Interval: 90.0DEG
Test Speed: HIGH
Temperature: 25.3°C
Operators: DAMIN
Test Date: 02 January 2025

γ Range: 0 - 180DEG
γ Interval: 1.0DEG
Test System: EVERFINE GO-2000B_V1 SYSTEM V2.00.459
Humidity: 65.0%
Test Distance: 8.186m [K=1.0000]
Remarks:

CU AND LUMINAIRE BUDGETARY ESTIMATE DIAGRAM

pcc	80%			70%			50%			30%			10%			0
pw	50%	30%	10%	50%	30%	10%	50%	30%	10%	50%	30%	10%	50%	30%	10%	0
pfc	20%			20%			20%			20%			20%			0
RCR	RCR:Room Cavity Ratio			Coefficients of Utilization(CU)												
0.0	1.18	1.18	1.18	1.15	1.15	1.15	1.09	1.09	1.09	1.04	1.04	1.04	.99	.99	.99	.97
1.0	1.02	.98	.94	.90	.96	.92	.95	.92	.89	.91	.88	.85	.86	.84	.82	.80
2.0	.89	.82	.76	.87	.80	.75	.83	.77	.72	.79	.74	.70	.75	.72	.68	.66
3.0	.78	.69	.63	.76	.68	.62	.72	.66	.60	.69	.64	.59	.66	.62	.57	.55
4.0	.69	.60	.53	.67	.59	.52	.64	.57	.51	.61	.55	.50	.59	.54	.49	.47
5.0	.61	.52	.45	.60	.51	.45	.57	.50	.44	.55	.48	.43	.53	.47	.43	.40
6.0	.55	.46	.39	.54	.45	.39	.52	.44	.38	.50	.43	.38	.48	.42	.37	.35
7.0	.50	.41	.35	.49	.40	.34	.47	.39	.34	.45	.39	.34	.44	.38	.33	.31
8.0	.45	.37	.31	.45	.36	.31	.43	.36	.30	.41	.35	.30	.40	.34	.30	.28
9.0	.42	.33	.28	.41	.33	.28	.40	.32	.27	.38	.32	.27	.37	.31	.27	.25
10.0	.38	.30	.25	.38	.30	.25	.37	.30	.25	.35	.29	.24	.34	.28	.24	.22



C Range: 0 - 360DEG
C Interval: 90.0DEG
Test Speed: HIGH
Temperature:25.3℃
Operators:DAMIN
Test Date:02 January 2025

γ Range: 0 - 180DEG
γ Interval: 1.0DEG
Test System:EVERFINE GO-2000B_V1 SYSTEM V2.00.459
Humidity:65.0%
Test Distance:8.186m [K=1.0000]
Remarks:

WEC AND CCEC

pcc	80%			70%			50%			30%			10%			0
pw	50%	30%	10%	50%	30%	10%	50%	30%	10%	50%	30%	10%	50%	30%	10%	0
pfc	20%			20%			20%			20%			20%			0
RCR	RCR:Room Cavity Ratio						Wall Exitance Coefficients (WEC)									
0.0																
1.0	.325	.185	.058	.317	.181	.057	.302	.173	.055	.288	.166	.053	.275	.159	.051	
2.0	.301	.165	.051	.294	.162	.050	.280	.156	.048	.268	.150	.047	.257	.145	.046	
3.0	.276	.147	.044	.270	.145	.044	.258	.140	.042	.247	.135	.042	.237	.131	.041	
4.0	.254	.132	.039	.248	.130	.038	.237	.126	.038	.227	.122	.037	.218	.119	.036	
5.0	.234	.119	.034	.229	.117	.034	.219	.114	.034	.210	.111	.033	.202	.108	.032	
6.0	.216	.108	.031	.212	.107	.031	.203	.104	.030	.195	.101	.030	.188	.099	.029	
7.0	.201	.099	.028	.197	.098	.028	.189	.096	.028	.182	.093	.027	.175	.091	.027	
8.0	.187	.091	.026	.183	.090	.026	.177	.088	.025	.170	.086	.025	.164	.084	.025	
9.0	.175	.085	.024	.172	.084	.024	.166	.082	.023	.160	.080	.023	.154	.078	.023	
10.0	.164	.079	.022	.161	.078	.022	.156	.076	.021	.150	.075	.021	.145	.073	.021	

pcc	80%			70%			50%			30%			10%			0
pw	50%	30%	10%	50%	30%	10%	50%	30%	10%	50%	30%	10%	50%	30%	10%	0
pfc	20%			20%			20%			20%			20%			0
RCR	RCR:Room Cavity Ratio						Ceiling Cavity Exitance Coefficients (CCEC)									
0.0	.213	.213	.213	.182	.182	.182	.124	.124	.124	.071	.071	.071	.023	.023	.023	
1.0	.204	.179	.156	.175	.154	.134	.120	.106	.093	.069	.061	.054	.022	.020	.017	
2.0	.197	.155	.120	.168	.133	.104	.115	.092	.072	.067	.054	.042	.021	.017	.014	
3.0	.189	.138	.097	.162	.119	.084	.111	.082	.059	.064	.048	.035	.021	.016	.011	
4.0	.181	.124	.081	.156	.108	.070	.107	.075	.050	.062	.044	.029	.020	.014	.010	
5.0	.174	.114	.070	.149	.099	.061	.103	.069	.043	.060	.041	.026	.019	.013	.008	
6.0	.167	.106	.062	.143	.092	.054	.099	.064	.038	.057	.038	.023	.018	.012	.008	
7.0	.160	.099	.057	.137	.086	.049	.095	.060	.035	.055	.035	.021	.018	.012	.007	
8.0	.153	.093	.052	.132	.081	.046	.091	.057	.032	.053	.034	.019	.017	.011	.006	
9.0	.147	.088	.049	.127	.077	.043	.088	.054	.030	.051	.032	.018	.017	.010	.006	
10.0	.141	.084	.046	.122	.073	.040	.085	.051	.029	.049	.030	.017	.016	.010	.006	

C Range: 0 - 360DEG
C Interval: 90.0DEG
Test Speed: HIGH
Temperature:25.3℃
Operators:DAMIN
Test Date:02 January 2025

γ Range: 0 - 180DEG
γ Interval: 1.0DEG
Test System:EVERFINE GO-2000B_V1 SYSTEM V2.00.459
Humidity:65.0%
Test Distance:8.186m [K=1.0000]
Remarks:

UGR(Unified Glare Rating) Table

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	21.1	22.6	21.4	22.8	23.1	21.0	22.5	21.4	22.8	23.1
3H	22.7	24.1	23.1	24.4	24.7	22.7	24.1	23.0	24.4	24.7
4H	23.4	24.8	23.8	25.1	25.4	23.4	24.7	23.8	25.0	25.4
6H	24.0	25.3	24.4	25.6	25.9	24.0	25.2	24.4	25.6	25.9
8H	24.2	25.5	24.6	25.8	26.1	24.2	25.4	24.6	25.7	26.1
12H	24.4	25.6	24.8	25.9	26.3	24.3	25.5	24.7	25.8	26.2
4H 2H	21.7	23.0	22.0	23.3	23.6	21.7	23.0	22.0	23.3	23.6
3H	23.5	24.7	23.9	25.1	25.4	23.5	24.7	23.9	25.0	25.4
4H	24.4	25.5	24.8	25.8	26.2	24.4	25.4	24.8	25.8	26.2
6H	25.1	26.1	25.6	26.5	26.9	25.1	26.0	25.5	26.5	26.9
8H	25.4	26.3	25.9	26.7	27.2	25.4	26.3	25.8	26.7	27.1
12H	25.6	26.5	26.1	26.9	27.4	25.6	26.4	26.0	26.8	27.3
8H 4H	24.7	25.6	25.2	26.0	26.5	24.7	25.6	25.2	26.0	26.5
6H	25.6	26.4	26.1	26.8	27.3	25.6	26.3	26.1	26.8	27.3
8H	26.0	26.7	26.5	27.2	27.7	26.0	26.6	26.5	27.1	27.6
12H	26.4	26.9	26.9	27.4	28.0	26.3	26.8	26.8	27.3	27.9
12H 4H	24.7	25.6	25.2	26.0	26.5	24.7	25.5	25.2	26.0	26.5
6H	25.7	26.4	26.2	26.9	27.4	25.7	26.3	26.2	26.8	27.3
8H	26.2	26.7	26.7	27.2	27.8	26.1	26.7	26.6	27.2	27.7
Variations with the observer position at spacings(CIE Pub.117):										
S = 1.0H	+ 0.1 / - 0.2					+ 0.1 / - 0.2				
1.5H	+ 0.2 / - 0.3					+ 0.2 / - 0.3				
2.0H	+ 0.1 / - 0.3					+ 0.1 / - 0.3				

CIE Pub.117, 762.0 lm Total Lamp Luminous Flux Corrected ($8\log(F/F_0) = -0.9$)
Area: 0.02 m²

C Range: 0 - 360DEG
C Interval: 90.0DEG
Test Speed: HIGH
Temperature:25.3℃
Operators:DAMIN
Test Date:02 January 2025

γ Range: 0 - 180DEG
 γ Interval: 1.0DEG
Test System:EVERFINE GO-2000B_V1 SYSTEM V2.00.459
Humidity:65.0%
Test Distance:8.186m [K=1.0000]
Remarks:

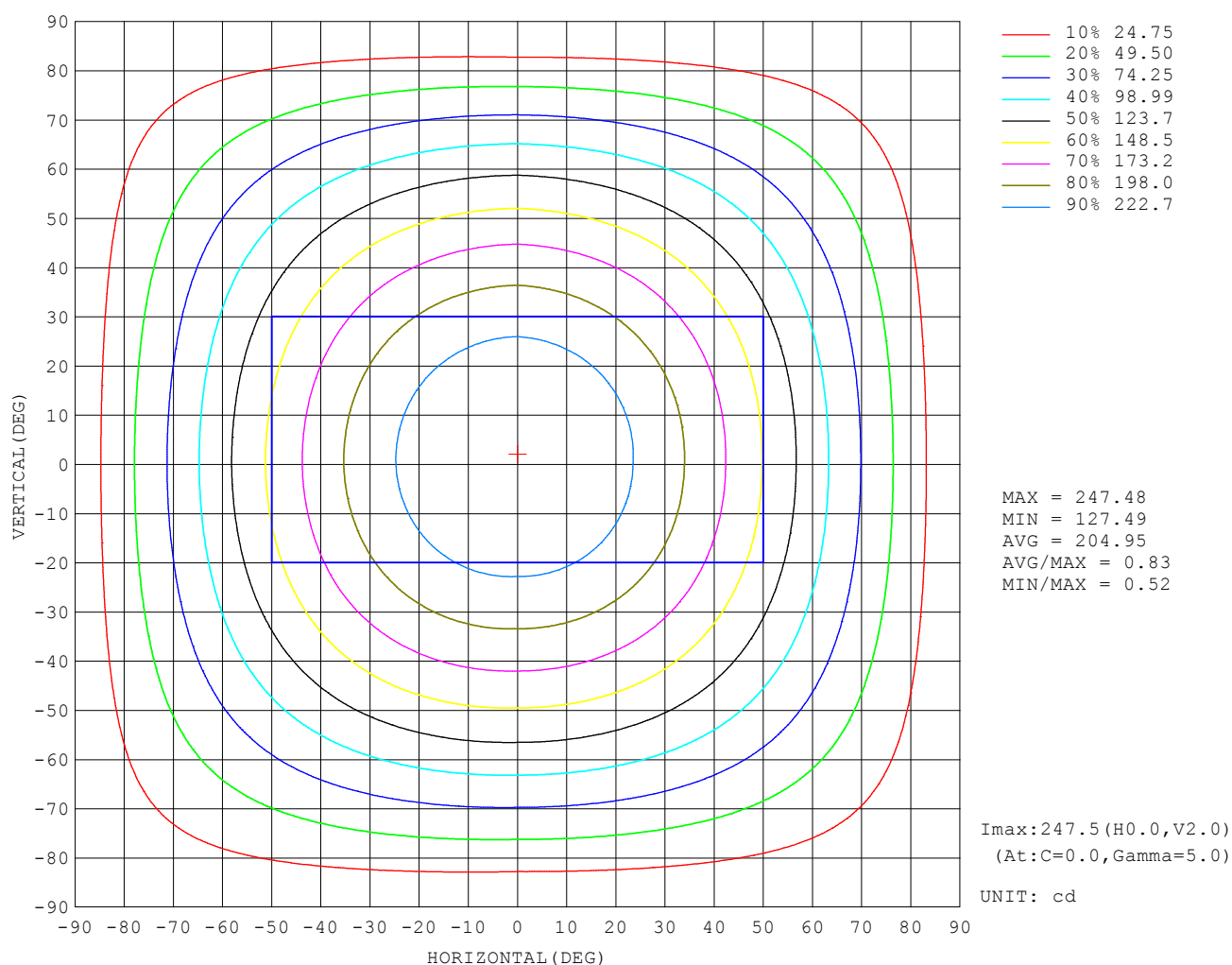
UTILIZATION FACTORS TABLE

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) $k(RI) \times RCR = 5$									
$k = 0.60$	56	44	37	55	44	37	54	43	36	30
0.80	66	54	46	64	53	46	62	52	45	38
1.00	74	62	55	73	62	55	70	63	54	46
1.25	81	70	63	79	69	62	76	68	61	53
1.50	86	76	68	84	75	68	81	73	66	58
2.00	93	84	77	91	83	76	87	80	74	66
2.50	97	89	82	95	87	81	90	84	79	70
3.00	100	93	87	98	91	86	93	88	84	74
4.00	105	99	94	102	97	92	97	93	89	79
5.00	107	102	98	104	100	96	99	96	92	82
ROOM INDEX	UF (total)									Direct
According to DIN EN 13032-2 2004			Suspended					SHRNOM = 1.25		

C Range: 0 - 360DEG
 C Interval: 90.0DEG
 Test Speed: HIGH
 Temperature: 25.3°C
 Operators: DAMIN
 Test Date: 02 January 2025

γ Range: 0 - 180DEG
 γ Interval: 1.0DEG
 Test System: EVERFINE GO-2000B_V1 SYSTEM V2.00.459
 Humidity: 65.0%
 Test Distance: 8.186m [K=1.0000]
 Remarks:

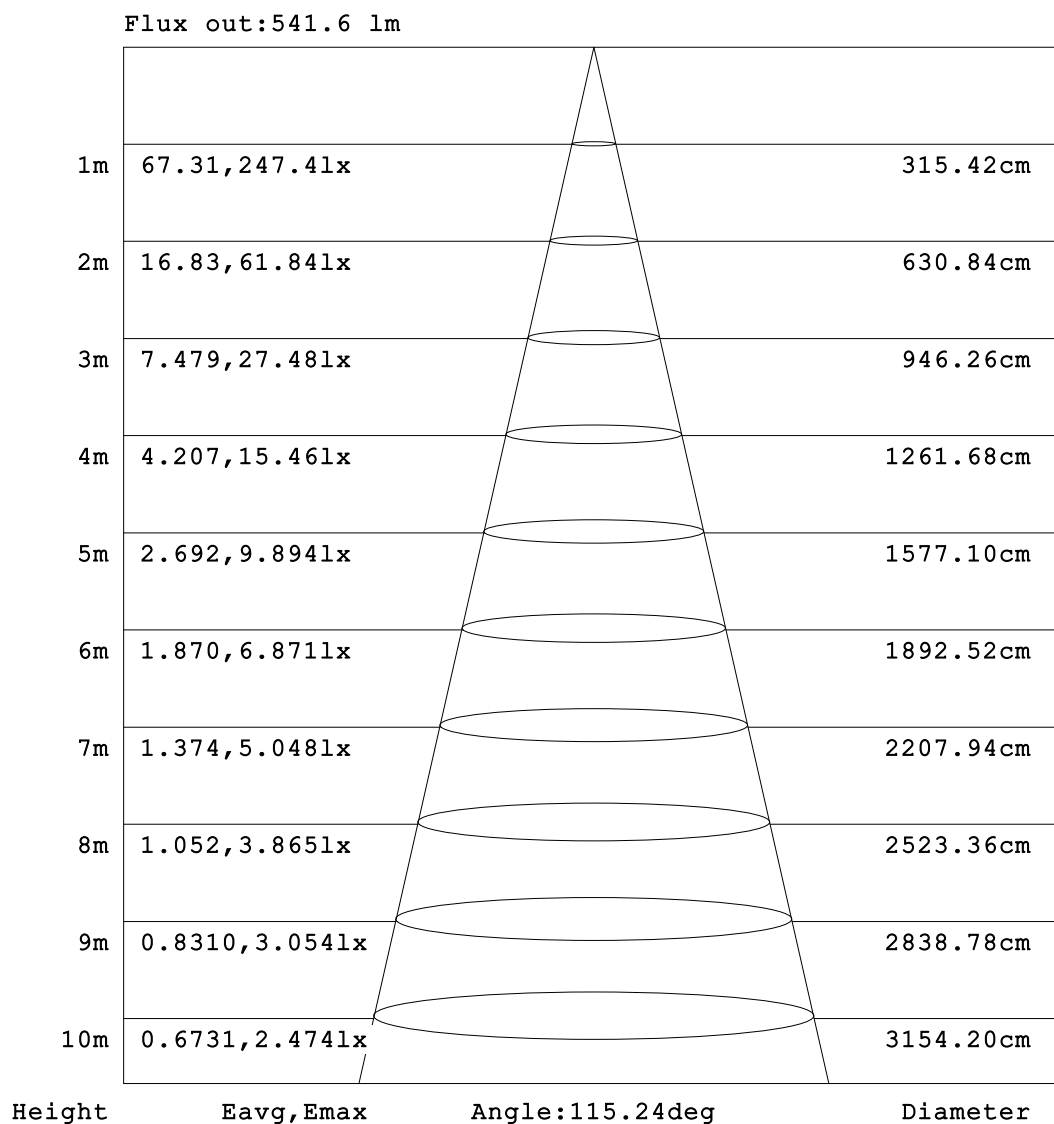
ISOCANDELA DIAGRAM



C Range: 0 - 360DEG
 C Interval: 90.0DEG
 Test Speed: HIGH
 Temperature:25.3°C
 Operators:DAMIN
 Test Date:02 January 2025

γ Range: 0 - 180DEG
 γ Interval: 1.0DEG
 Test System:EVERFINE GO-2000B_V1 SYSTEM V2.00.459
 Humidity:65.0%
 Test Distance:8.186m [K=1.0000]
 Remarks:

AAI Figure

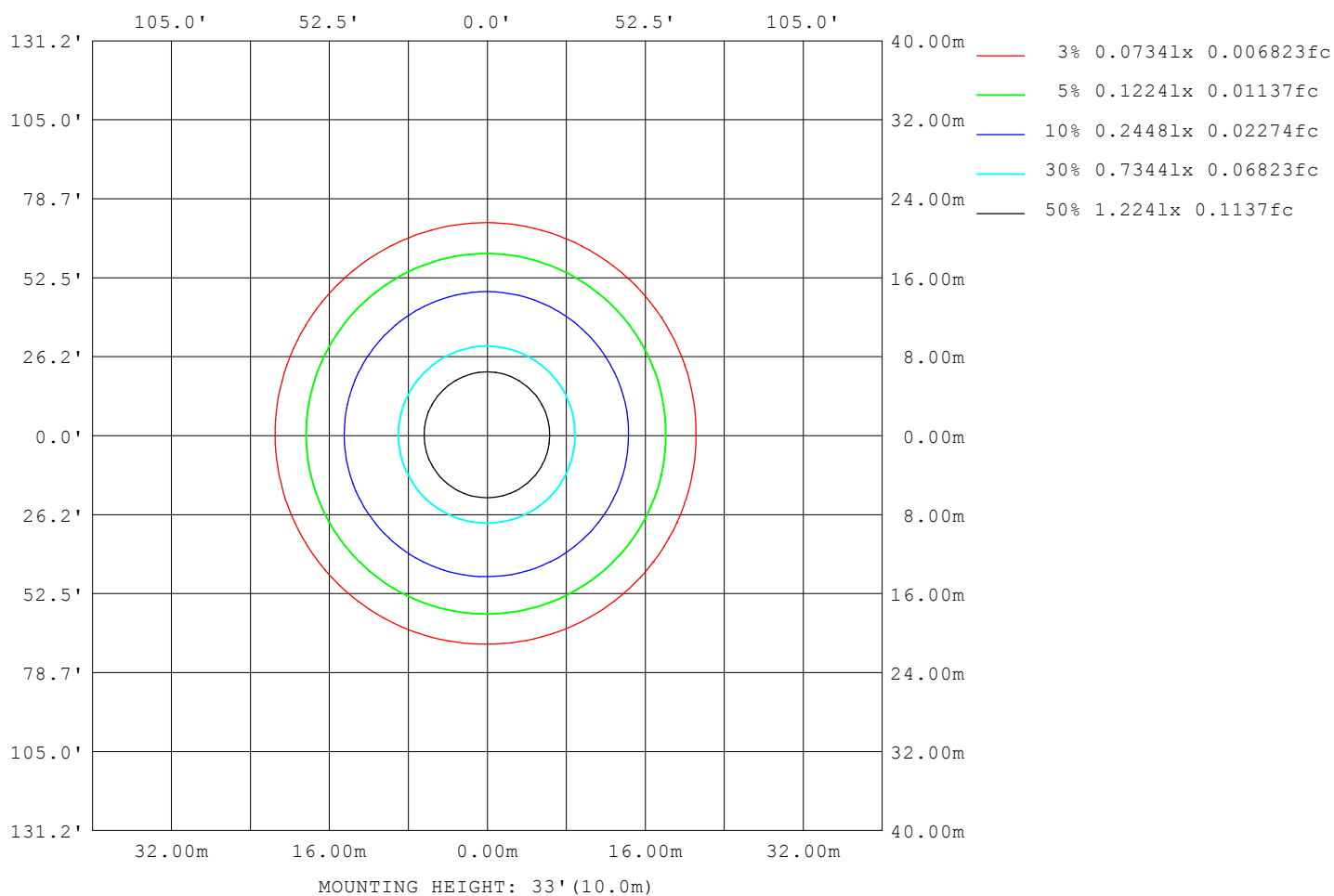


Note:The Curves indicate the illuminated area and the average illumination when the luminaire is at different distance.

C Range: 0 - 360DEG
 C Interval: 90.0DEG
 Test Speed: HIGH
 Temperature:25.3°C
 Operators:DAMIN
 Test Date:02 January 2025

γ Range: 0 - 180DEG
 γ Interval: 1.0DEG
 Test System:EVERFINE GO-2000B_V1 SYSTEM V2.00.459
 Humidity:65.0%
 Test Distance:8.186m [K=1.0000]
 Remarks:

ISOLUX DIAGRAM



C Range: 0 - 360DEG
 C Interval: 90.0DEG
 Test Speed: HIGH
 Temperature: 25.3°C
 Operators: DAMIN
 Test Date: 02 January 2025

γ Range: 0 - 180DEG
 γ Interval: 1.0DEG
 Test System: EVERFINE GO-2000B_V1 SYSTEM V2.00.459
 Humidity: 65.0%
 Test Distance: 8.186m [K=1.0000]
 Remarks:

LED Avg.L Report

Test:U:101.40V I:0.1790A P:16.000W PF:0.8840 Freq:50.00Hz Lamp Flux:762.007x1 lm		
NAME:	TYPE:	WEIGHT:
SPEC.:	DIM.:	SERIAL No.:
MFR.: EVERFINE	SUR.:	Shielding Angle:

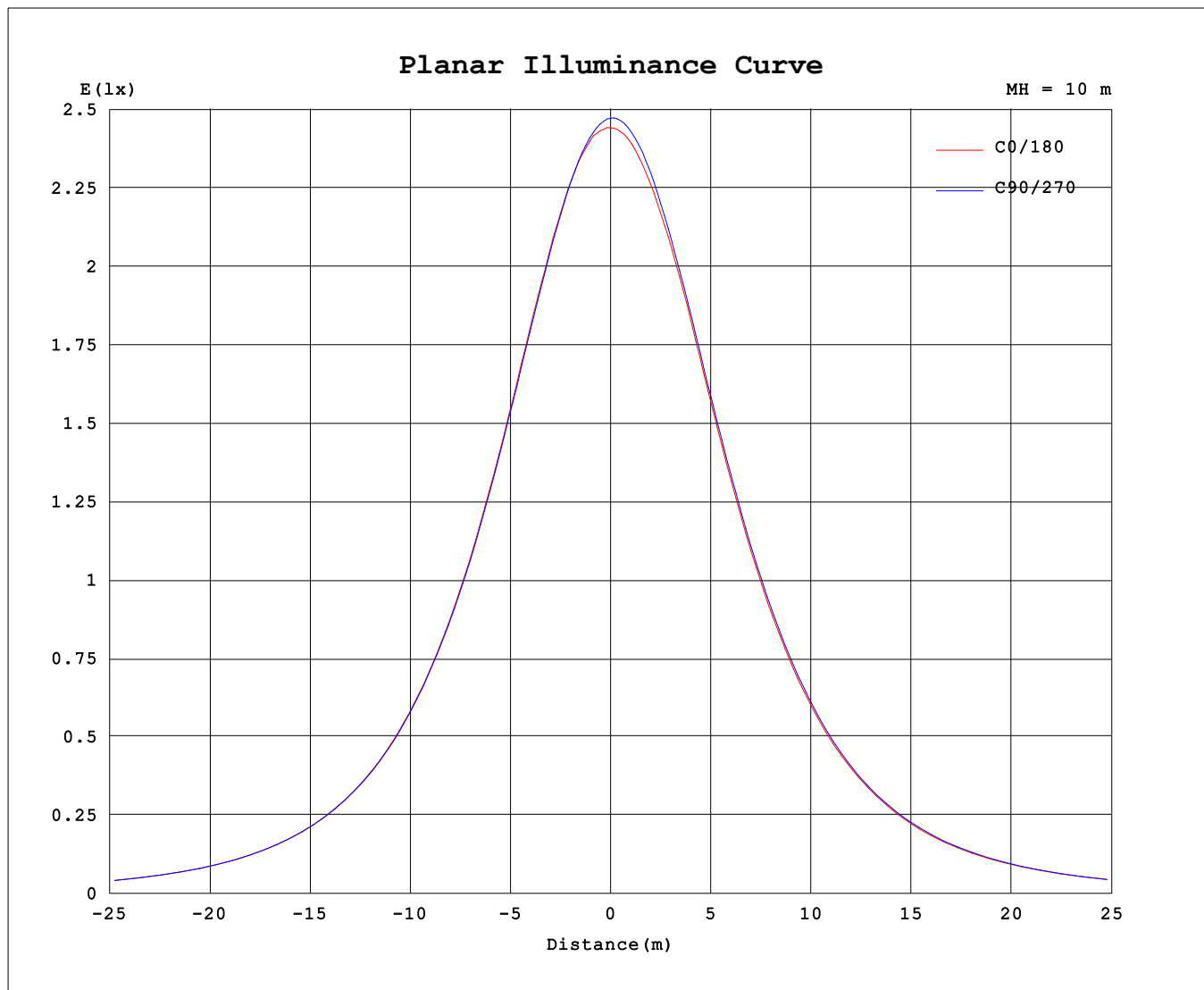
AvgL	cd/m2
L_0~180 (65) av	11350
L_0~180 (75) av	11197
L_0~180 (85) av	12120
L_90~270 (65) av	11269
L_90~270 (75) av	10660
L_90~270 (85) av	9281
L_45 (65) av	11320
L_45 (75) av	10895
L_45 (85) av	10441

Standard: GB/T 29293-2012

C Range: 0 - 360DEG
C Interval: 90.0DEG
Test Speed: HIGH
Temperature:25.3℃
Operators:DAMIN
Test Date:02 January 2025

γ Range: 0 - 180DEG
γ Interval: 1.0DEG
Test System:EVERFINE GO-2000B_V1 SYSTEM V2.00.459
Humidity:65.0%
Test Distance:8.186m [K=1.0000]
Remarks:

Planar Illuminance Curve



C Range: 0 - 360DEG
C Interval: 90.0DEG
Test Speed: HIGH
Temperature: 25.3°C
Operators: DAMIN
Test Date: 02 January 2025

γ Range: 0 - 180DEG
 γ Interval: 1.0DEG
Test System: EVERFINE GO-2000B_V1 SYSTEM V2.00.459
Humidity: 65.0%
Test Distance: 8.186m [K=1.0000]
Remarks:

LUMINOUS DISTRIBUTION INTENSITY DATA

Table--1

UNIT: cd

C (DEG) γ (DEG)	0	90	180	270															
0	246	246	246	246															
5	246	244	245	246															
10	243	240	242	243															
15	238	234	238	239															
20	230	226	233	232															
25	221	217	224	223															
30	210	206	213	213															
35	196	193	200	200															
40	182	178	186	187															
45	166	163	171	171															
50	149	146	154	155															
55	131	129	136	137															
60	112	110	118	118															
65	93.2	91.7	98.7	98.8															
70	74.1	72.8	79.6	78.0															
75	55.1	54.0	60.8	56.3															
80	36.5	35.2	42.1	35.6															
85	18.3	16.2	24.0	16.2															
90	4.91	2.30	7.65	3.39															
95	3.47	1.67	3.53	2.00															
100	3.44	1.86	3.69	2.33															
105	3.41	2.07	3.84	2.58															
110	3.50	2.34	4.03	2.83															
115	3.61	2.55	4.22	3.03															
120	3.72	2.75	4.39	3.25															
125	3.86	3.00	4.47	3.44															
130	4.00	3.25	4.46	3.69															
135	4.15	3.53	4.54	3.85															
140	4.32	3.76	4.65	4.00															
145	4.43	4.02	4.78	4.21															
150	4.52	4.26	4.90	4.39															
155	4.71	4.49	5.03	4.56															
160	4.81	4.71	5.03	4.73															
165	4.88	4.88	5.00	4.82															
170	4.97	5.05	4.95	4.93															
175	5.09	5.15	4.96	4.98															
180	5.12	5.20	5.13	5.18															

C Range: 0 - 360DEG
C Interval: 90.0DEG
Test Speed: HIGH
Temperature:25.3℃
Operators:DAMIN
Test Date:02 January 2025

γ Range: 0 - 180DEG
γ Interval: 1.0DEG
Test System:EVERFINE GO-2000B_V1 SYSTEM V2.00.459
Humidity:65.0%
Test Distance:8.186m [K=1.0000]
Remarks: