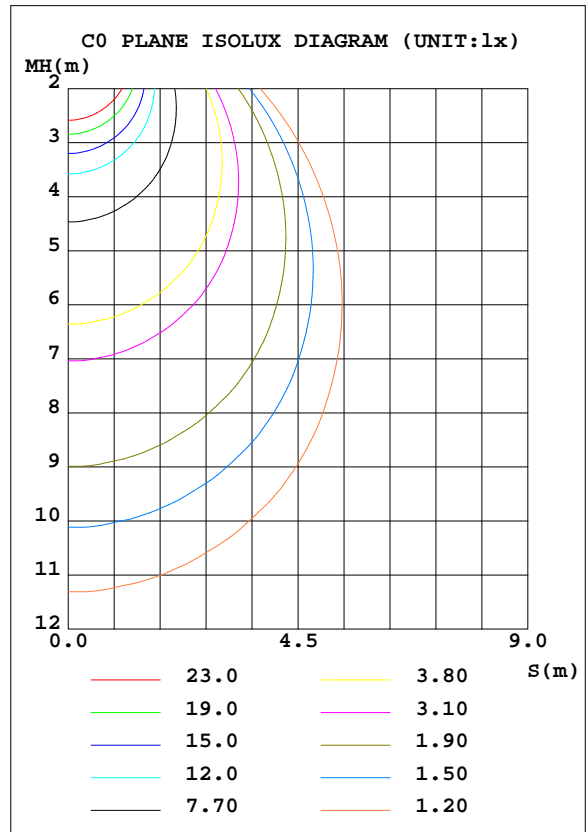
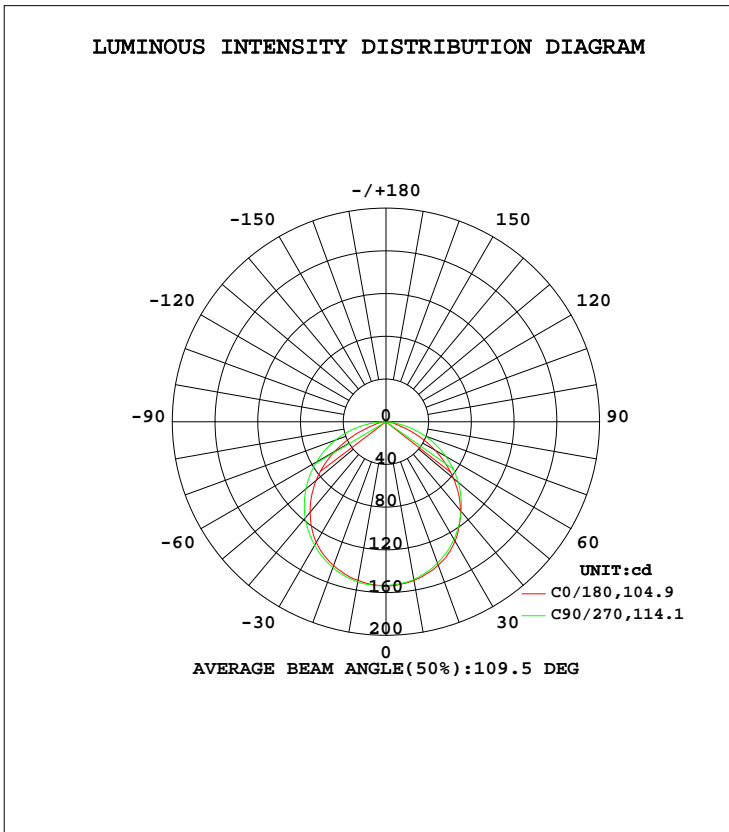


LUMINAIRE PHOTOMETRIC TEST REPORT

Test:U:230.84V I:0.0317A P:6.7795W PF:0.9252 Freq:50.00Hz Lamp Flux:415.373x1 lm		
NAME: 136-185_5700K	TYPE:7W	WEIGHT:
SPEC.:5700K	DIM.:	SERIAL No.:
MFR.:	SUR.:0.037	Shielding Angle:

DATA OF LAMP		PHOTOMETRIC DATA Eff: 61.27 lm/W			
MODEL	136-185_5700K	I _{max} (cd)	153.9	S/MH(C0/180)	1.26
NOMINAL POWER(W)	7	LOR(%)	100.0	S/MH(C90/270)	1.29
RATED VOLTAGE(V)	230	TOTAL FLUX(lm)	415.37	η UP, DN(C0-180)	0.0,48.1
NOMINAL FLUX(lm)	415.373	CIE CLASS	DIRECT	η UP, DN(C180-360)	0.0,51.9
LAMPS INSIDE	1	η up(%)	0.0	CIBSE SHR NOM	1.25
TEST VOLTAGE(V)		η down(%)	100.0	CIBSE SHR MAX	1.35



C Range: 0 - 360DEG
 C Interval: 45.0DEG
 Test Speed: HIGH
 Temperature:25.3DEG
 Operators:DAMIN
 Test Date:2020-01-12

γ Range: 0 - 90DEG
 γ Interval: 1.0DEG
 Test System:EVERFINE GO-2000H_V1 SYSTEM V2.0.404.7
 Humidity:65.0%
 Test Distance:9.900m [K=1.0000]
 Remarks:

ZONAL FLUX DIAGRAM

ZONAL FLUX DIAGRAM:

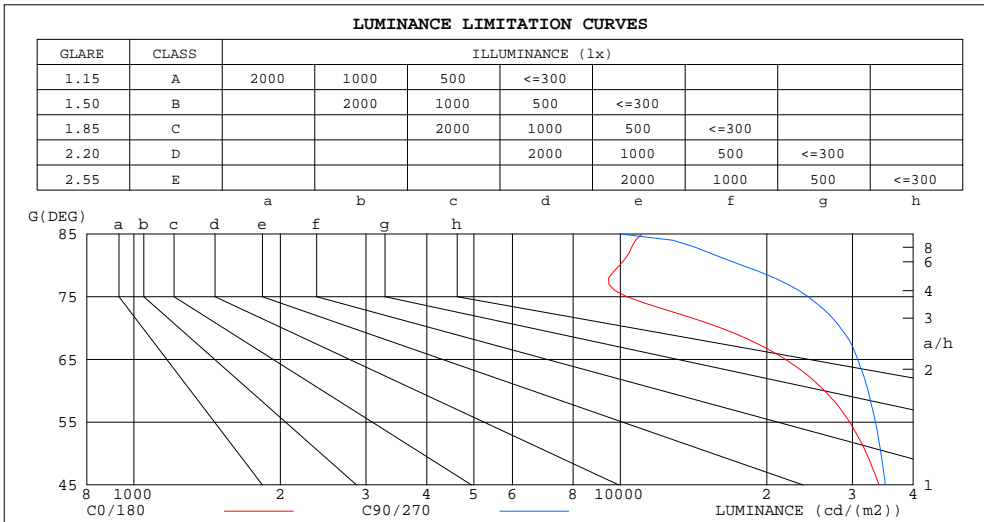
γ	C0	C45	C90	C135	C180	C225	C270	C315	γ	Φ zone	Φ total	Φ lum,lamp
10	150.8	149.9	149.9	149.9	150.9	151.7	152.2	151.7	0- 10	14.53	14.53	3.5,3.5
20	142.8	141.6	141.0	141.6	143.4	144.5	145.4	144.6	10- 20	41.67	56.20	13.5,13.5
30	129.4	127.0	127.2	128.1	130.6	132.5	133.7	131.9	20- 30	63.25	119.4	28.8,28.8
40	108.5	107.4	109.6	109.1	110.7	114.4	117.6	113.7	30- 40	75.84	195.3	47,47
50	82.46	83.51	88.29	85.45	85.33	91.74	97.85	90.68	40- 50	77.28	272.6	65.6,65.6
60	52.61	56.09	64.66	57.98	55.03	65.32	75.03	63.65	50- 60	67.05	339.6	81.8,81.8
70	22.01	27.85	38.82	28.82	22.79	36.16	50.33	34.85	60- 70	46.46	386.1	92.9,92.9
80	6.926	9.506	12.34	11.59	7.010	13.30	23.63	13.24	70- 80	22.30	408.4	98.3,98.3
90	1.521	3.034	1.899	3.592	1.392	3.798	1.777	3.250	80- 90	6.995	415.4	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: 45.0DEG
 Test Speed: HIGH
 Temperature:25.3DEG
 Operators:DAMIN
 Test Date:2020-01-12

γ Range: 0 - 90DEG
 γ Interval: 1.0DEG
 Test System:EVERFINE GO-2000H_V1 SYSTEM V2.0.404.7
 Humidity:65.0%
 Test Distance:9.900m [K=1.0000]
 Remarks:

LUMINANCE LIMITATION CURVES

Test:U:230.84V I:0.0317A P:6.7795W PF:0.9252 Freq:50.00Hz Lamp Flux:415.373x1 lm		
NAME: 136-185_5700K	TYPE:7W	WEIGHT:
SPEC.:5700K	DIM.:	SERIAL No.:
MFR.:	SUR.:0.037	Shielding Angle:



LUMINANCE cd/(m2)		
G (DEG)	C0/180	C90/270
85	11086	9948
80	9967	17756
75	10304	24299
70	16082	28369
65	21837	30764
60	26293	32320
55	29617	33426
50	32057	34331
45	34016	35048

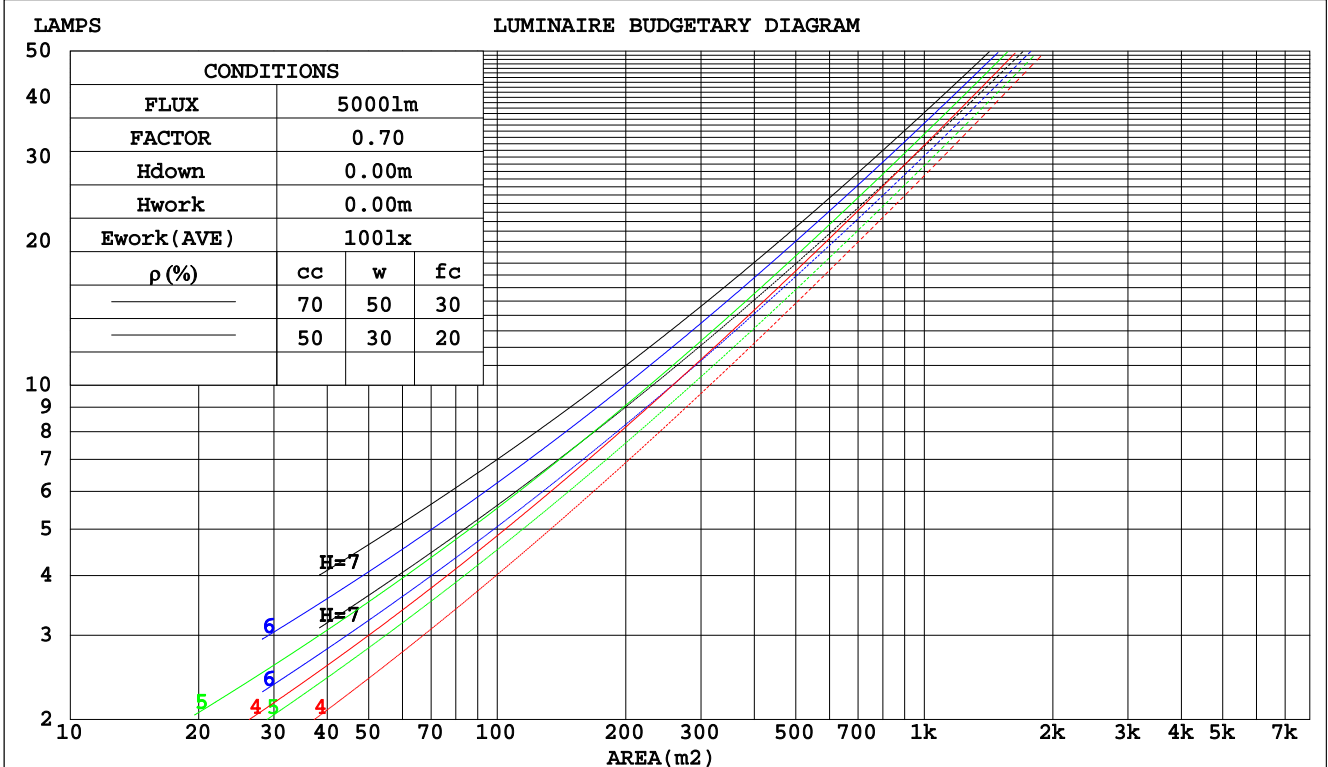
C Range: 0 - 360DEG
 C Interval: 45.0DEG
 Test Speed: HIGH
 Temperature: 25.3DEG
 Operators: DAMIN
 Test Date: 2020-01-12

γ Range: 0 - 90DEG
 γ Interval: 1.0DEG
 Test System: EVERFINE GO-2000H_V1 SYSTEM V2.0.404.7
 Humidity: 65.0%
 Test Distance: 9.900m [K=1.0000]
 Remarks:

CU AND LUMINAIRE BUDGETARY ESTIMATE DIAGRAM

Test:U:230.84V I:0.0317A P:6.7795W PF:0.9252 Freq:50.00Hz Lamp Flux:415.373x1 lm		
NAME: 136-185_5700K	TYPE:7W	WEIGHT:
SPEC.:5700K	DIM.:	SERIAL No.:
MFR.:	SUR.:0.037	Shielding Angle:

pcc	80%			70%			50%			30%			10%			0
	50%	30%	10%	50%	30%	10%	50%	30%	10%	50%	30%	10%	50%	30%	10%	0
pw																
pfc	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	.92	.85	.79	.90	.84	.78	.86	.81	.77	.83	.79	.75	.80	.76	.73	.71
3.0	.81	.73	.66	.79	.72	.66	.76	.70	.65	.73	.68	.64	.71	.66	.62	.60
4.0	.72	.63	.56	.70	.62	.56	.68	.61	.55	.66	.59	.55	.63	.58	.54	.52
5.0	.64	.55	.49	.63	.55	.48	.61	.54	.48	.59	.52	.47	.57	.51	.47	.45
6.0	.58	.49	.43	.57	.49	.42	.55	.48	.42	.53	.47	.42	.52	.46	.41	.39
7.0	.52	.44	.38	.52	.43	.38	.50	.43	.37	.49	.42	.37	.47	.41	.37	.35
8.0	.48	.39	.34	.47	.39	.34	.46	.39	.33	.45	.38	.33	.43	.37	.33	.31
9.0	.44	.36	.30	.43	.36	.30	.42	.35	.30	.41	.35	.30	.40	.34	.30	.28
10.0	.41	.33	.27	.40	.32	.27	.39	.32	.27	.38	.32	.27	.37	.31	.27	.25



C Range: 0 - 360DEG
 C Interval: 45.0DEG
 Test Speed: HIGH
 Temperature:25.3DEG
 Operators:DAMIN
 Test Date:2020-01-12

γ Range: 0 - 90DEG
 γ Interval: 1.0DEG
 Test System:EVERFINE GO-2000H_V1 SYSTEM V2.0.404.7
 Humidity:65.0%
 Test Distance:9.900m [K=1.0000]
 Remarks:

WEC AND CCEC

Test:U:230.84V I:0.0317A P:6.7795W PF:0.9252 Freq:50.00Hz Lamp Flux:415.373x1 lm		
NAME: 136-185_5700K	TYPE:7W	WEIGHT:
SPEC.:5700K	DIM.:	SERIAL No.:
MFR.:	SUR.:0.037	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						Wall Exitance Coefficients(WEC)									
0.0																
1.0	.296	.168	.053	.289	.165	.052	.276	.158	.051	.264	.152	.049	.253	.146	.047	
2.0	.281	.154	.047	.274	.151	.047	.263	.146	.045	.252	.141	.044	.242	.137	.043	
3.0	.261	.139	.042	.256	.137	.041	.246	.133	.040	.236	.129	.040	.227	.126	.039	
4.0	.242	.126	.037	.238	.124	.037	.229	.121	.036	.220	.118	.036	.212	.115	.035	
5.0	.225	.115	.033	.221	.113	.033	.213	.111	.033	.205	.108	.032	.198	.106	.032	
6.0	.209	.105	.030	.206	.104	.030	.198	.102	.030	.192	.100	.029	.185	.098	.029	
7.0	.195	.097	.027	.192	.096	.027	.186	.094	.027	.180	.092	.027	.174	.090	.027	
8.0	.183	.089	.025	.180	.089	.025	.174	.087	.025	.169	.085	.025	.164	.084	.024	
9.0	.172	.083	.023	.169	.082	.023	.164	.081	.023	.159	.080	.023	.154	.078	.023	
10.0	.162	.078	.022	.159	.077	.021	.155	.076	.021	.150	.075	.021	.146	.073	.021	

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						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	.146	.114	.086	.100	.079	.060	.058	.046	.035	.019	.015	.011	
3.0	.163	.114	.076	.140	.099	.065	.096	.068	.046	.055	.040	.027	.018	.013	.009	
4.0	.155	.101	.059	.133	.087	.052	.092	.061	.036	.053	.036	.021	.017	.012	.007	
5.0	.148	.090	.048	.127	.078	.042	.087	.055	.029	.051	.032	.017	.016	.010	.006	
6.0	.141	.082	.040	.121	.071	.035	.083	.050	.024	.048	.029	.015	.016	.010	.005	
7.0	.134	.075	.034	.115	.065	.029	.080	.046	.021	.046	.027	.012	.015	.009	.004	
8.0	.128	.069	.029	.110	.060	.025	.076	.042	.018	.044	.025	.011	.014	.008	.004	
9.0	.122	.064	.025	.105	.056	.022	.073	.039	.016	.042	.023	.009	.014	.008	.003	
10.0	.116	.060	.023	.100	.052	.020	.070	.037	.014	.041	.022	.008	.013	.007	.003	

C Range: 0 - 360DEG
 C Interval: 45.0DEG
 Test Speed: HIGH
 Temperature:25.3DEG
 Operators:DAMIN
 Test Date:2020-01-12

γ Range: 0 - 90DEG
 γ Interval: 1.0DEG
 Test System:EVERFINE GO-2000H_V1 SYSTEM V2.0.404.7
 Humidity:65.0%
 Test Distance:9.900m [K=1.0000]
 Remarks:

UGR(Unified Glare Rating) Table

Test:U:230.84V I:0.0317A P:6.7795W PF:0.9252 Freq:50.00Hz Lamp Flux:415.373x1 lm										
NAME: 136-185_5700K					TYPE:7W			WEIGHT:		
SPEC.:5700K					DIM.:			SERIAL No.:		
MFR.:					SUR.:0.037			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	24.3	25.8	24.5	26.0	26.2	24.9	26.3	25.1	26.5	26.8
3H	25.1	26.4	25.4	26.7	26.9	26.2	27.6	26.5	27.8	28.1
4H	25.2	26.5	25.5	26.7	27.0	26.7	28.0	27.0	28.3	28.5
6H	25.2	26.5	25.6	26.7	27.0	27.0	28.2	27.3	28.5	28.8
8H	25.3	26.5	25.6	26.7	27.0	27.0	28.2	27.4	28.5	28.8
12H	25.3	26.4	25.6	26.7	27.0	27.0	28.2	27.4	28.5	28.8
4H 2H	24.8	26.1	25.1	26.3	26.6	25.3	26.6	25.6	26.8	27.1
3H	25.7	26.8	26.0	27.1	27.4	26.8	27.9	27.1	28.2	28.5
4H	25.9	26.9	26.3	27.3	27.6	27.3	28.4	27.7	28.7	29.0
6H	26.0	27.0	26.4	27.3	27.7	27.7	28.6	28.1	29.0	29.3
8H	26.1	27.0	26.5	27.3	27.7	27.8	28.6	28.2	29.0	29.4
12H	26.2	27.0	26.6	27.3	27.7	27.8	28.6	28.2	29.0	29.4
8H 4H	26.1	26.9	26.5	27.3	27.7	27.4	28.2	27.8	28.6	29.0
6H	26.3	27.0	26.8	27.4	27.9	27.8	28.6	28.3	29.0	29.4
8H	26.4	27.1	26.9	27.5	27.9	28.0	28.6	28.5	29.0	29.5
12H	26.6	27.1	27.1	27.6	28.0	28.1	28.6	28.6	29.1	29.5
12H 4H	26.1	26.8	26.5	27.2	27.6	27.4	28.1	27.8	28.5	28.9
6H	26.4	27.0	26.8	27.4	27.9	27.8	28.5	28.3	28.9	29.3
8H	26.5	27.1	27.0	27.5	28.0	28.0	28.6	28.5	29.0	29.5
Variations with the observer position at spacings:										
S = 1.0H	+ 0.3 / - 0.4					+ 0.2 / - 0.2				
1.5H	+ 0.2 / - 0.5					+ 0.1 / - 0.3				
2.0H	+ 0.5 / - 0.5					+ 0.4 / - 0.4				

CIE Pub.117, 415.4 lm Total Lamp Luminous Flux Corrected (8log(F/F0) = -3.1)

C Range: 0 - 360DEG
 C Interval: 45.0DEG
 Test Speed: HIGH
 Temperature:25.3DEG
 Operators:DAMIN
 Test Date:2020-01-12

γ Range: 0 - 90DEG
 γ Interval: 1.0DEG
 Test System:EVERFINE GO-2000H_V1 SYSTEM V2.0.404.7
 Humidity:65.0%
 Test Distance:9.900m [K=1.0000]
 Remarks:

UTILIZATION FACTORS TABLE

Test:U:230.84V I:0.0317A P:6.7795W PF:0.9252 Freq:50.00Hz Lamp Flux:415.373x1 lm		
NAME: 136-185_5700K	TYPE:7W	WEIGHT:
SPEC.:5700K	DIM.:	SERIAL No.:
MFR.:	SUR.:0.037	Shielding Angle:

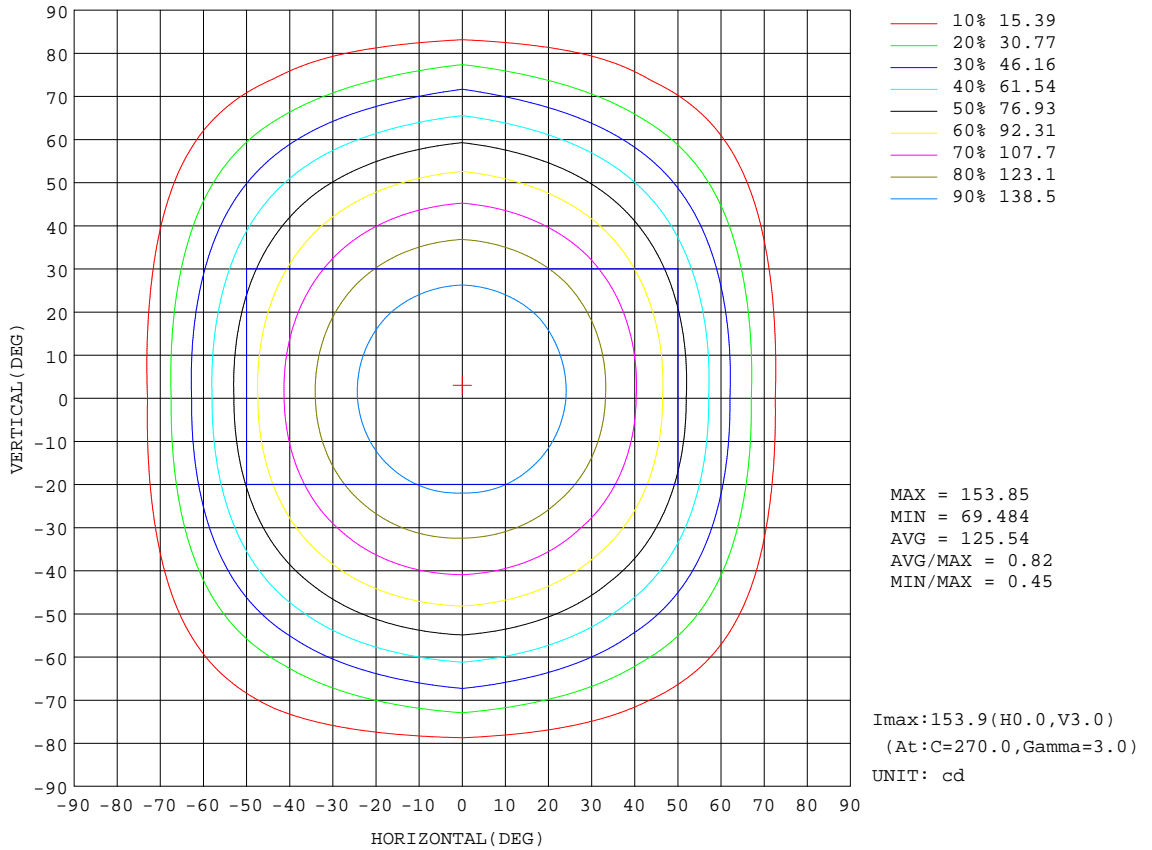
REFLECTANCE										
Ceiling	0.8	0.8	0.8	0.7	0.7	0.7	0.5	0.5	0.5	0
Walls	0.7	0.5	0.3	0.7	0.5	0.3	0.7	0.5	0.3	0
Working plane	0.2	0.2	0.2	0.2	0.2	0.2	0.2	0.2	0.2	0
ROOM INDEX	UTILIZATION FACTORS(PERCENT) $k(RI) \times RCR = 5$									
k = 0.60	59	47	40	58	47	40	57	47	40	34
0.80	69	58	50	68	57	50	66	56	50	43
1.00	77	67	60	76	66	59	74	67	59	52
1.25	85	74	67	83	74	67	80	72	66	59
1.50	89	80	73	88	79	73	85	77	72	64
2.00	96	88	82	94	87	81	91	85	79	72
2.50	100	92	87	98	91	86	94	88	84	76
3.00	103	97	91	101	95	90	97	92	88	80
4.00	107	101	97	105	100	96	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: 45.0DEG
 Test Speed: HIGH
 Temperature:25.3DEG
 Operators:DAMIN
 Test Date:2020-01-12

γ Range: 0 - 90DEG
 γ Interval: 1.0DEG
 Test System:EVERFINE GO-2000H_V1 SYSTEM V2.0.404.7
 Humidity:65.0%
 Test Distance:9.900m [K=1.0000]
 Remarks:

ISOCANDELA DIAGRAM

Test:U:230.84V I:0.0317A P:6.7795W PF:0.9252 Freq:50.00Hz Lamp Flux:415.373x1 lm		
NAME: 136-185_5700K	TYPE:7W	WEIGHT:
SPEC.:5700K	DIM.:	SERIAL No.:
MFR.:	SUR.:0.037	Shielding Angle:

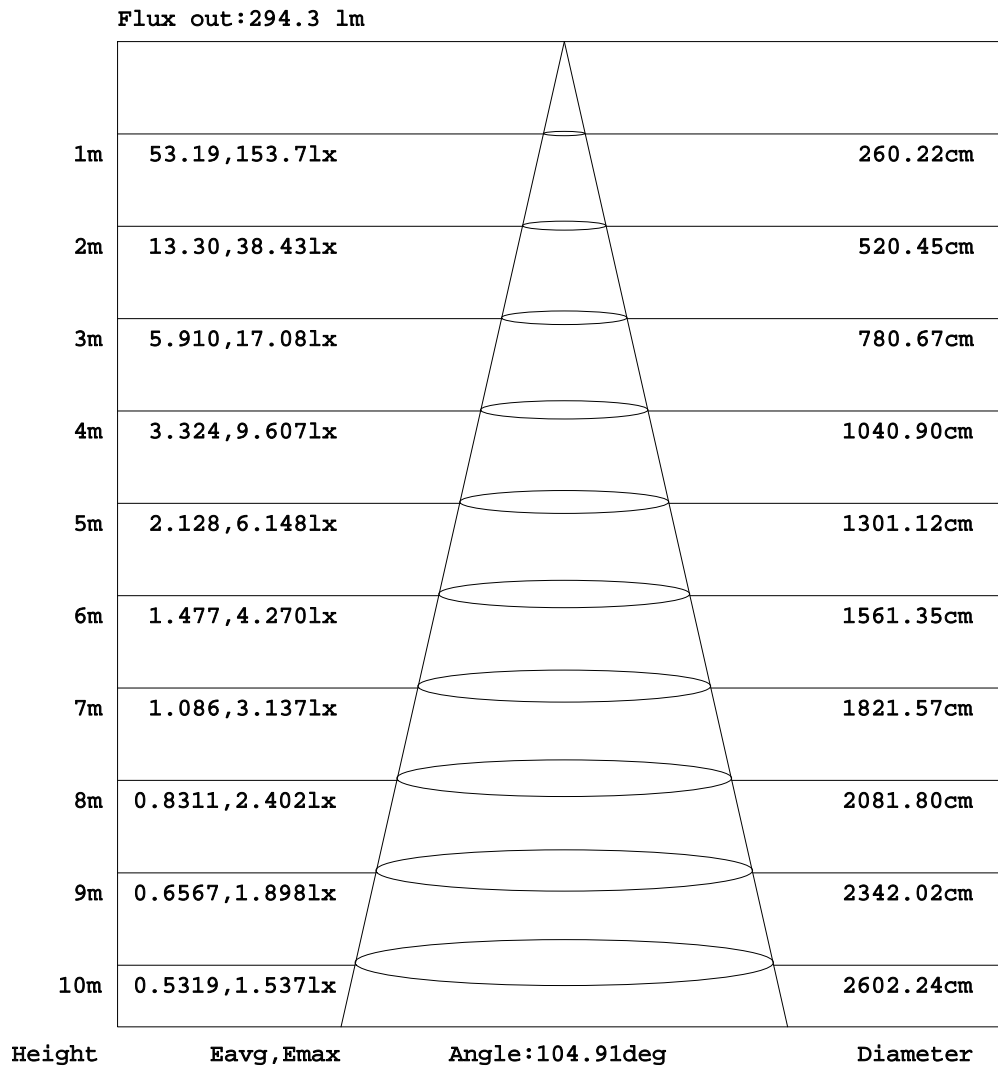


C Range: 0 - 360DEG
 C Interval: 45.0DEG
 Test Speed: HIGH
 Temperature:25.3DEG
 Operators:DAMIN
 Test Date:2020-01-12

γ Range: 0 - 90DEG
 γ Interval: 1.0DEG
 Test System:EVERFINE GO-2000H_V1 SYSTEM V2.0.404.7
 Humidity:65.0%
 Test Distance:9.900m [K=1.0000]
 Remarks:

AAI Figure

Test:U:230.84V I:0.0317A P:6.7795W PF:0.9252 Freq:50.00Hz Lamp Flux:415.373x1 lm		
NAME: 136-185_5700K	TYPE:7W	WEIGHT:
SPEC.:5700K	DIM.:	SERIAL No.:
MFR.:	SUR.:0.037	Shielding Angle:



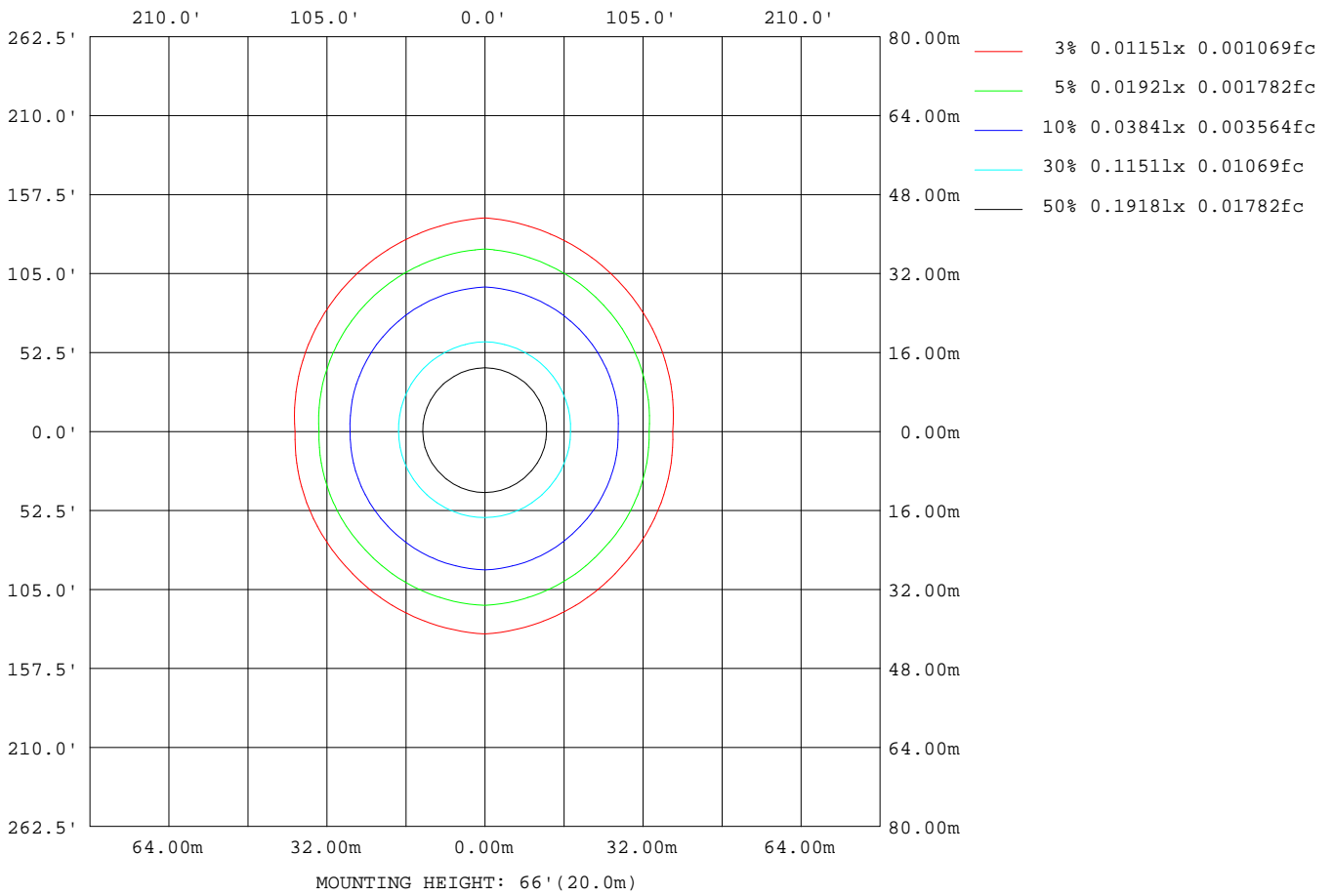
Note:The Curves indicate the illuminated area and the average illumination when the luminaire is at different distance.

C Range: 0 - 360DEG
 C Interval: 45.0DEG
 Test Speed: HIGH
 Temperature:25.3DEG
 Operators:DAMIN
 Test Date:2020-01-12

γ Range: 0 - 90DEG
 γ Interval: 1.0DEG
 Test System:EVERFINE GO-2000H_V1 SYSTEM V2.0.404.7
 Humidity:65.0%
 Test Distance:9.900m [K=1.0000]
 Remarks:

ISOLUX DIAGRAM

Test:U:230.84V I:0.0317A P:6.7795W PF:0.9252 Freq:50.00Hz Lamp Flux:415.373x1 lm		
NAME: 136-185_5700K	TYPE:7W	WEIGHT:
SPEC.:5700K	DIM.:	SERIAL No.:
MFR.:	SUR.:0.037	Shielding Angle:



C Range: 0 - 360DEG
 C Interval: 45.0DEG
 Test Speed: HIGH
 Temperature:25.3DEG
 Operators:DAMIN
 Test Date:2020-01-12

γ Range: 0 - 90DEG
 γ Interval: 1.0DEG
 Test System:EVERFINE GO-2000H_V1 SYSTEM V2.0.404.7
 Humidity:65.0%
 Test Distance:9.900m [K=1.0000]
 Remarks:

LED Avg.L Report

Test:U:230.84V I:0.0317A P:6.7795W PF:0.9252 Freq:50.00Hz Lamp Flux:415.373x1 lm		
NAME: 136-185_5700K	TYPE:7W	WEIGHT:
SPEC.:5700K	DIM.:	SERIAL No.:
MFR.:	SUR.:0.037	Shielding Angle:

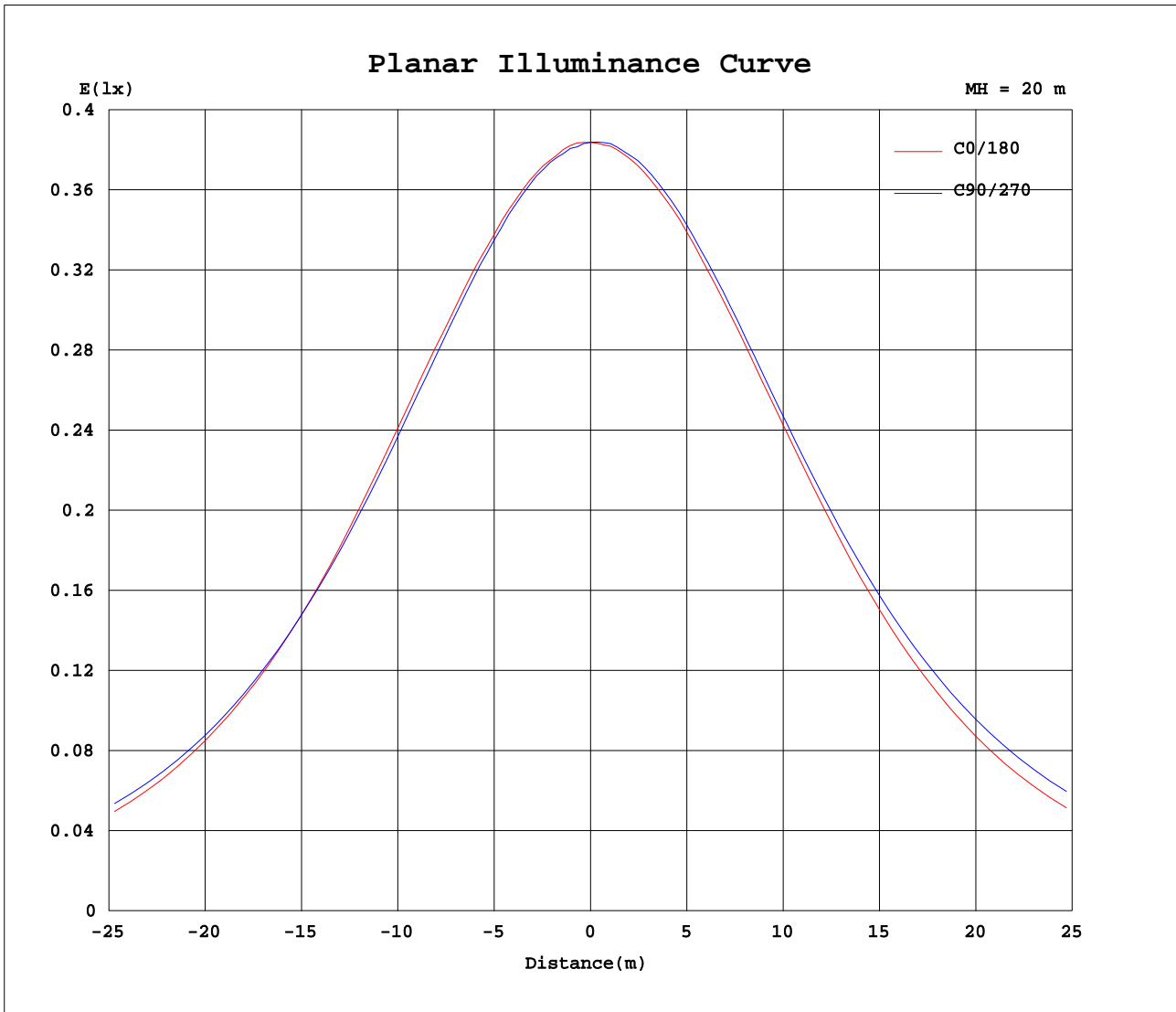
AvgL	cd/m2
L_0~180(65)av	22393
L_0~180(75)av	10797
L_0~180(85)av	10613
L_90~270(65)av	33990
L_90~270(75)av	30174
L_90~270(85)av	20542
L_45(65)av	27393
L_45(75)av	18981
L_45(85)av	19398

Standard: GB/T 29293-2012

C Range: 0 - 360DEG
 C Interval: 45.0DEG
 Test Speed: HIGH
 Temperature:25.3DEG
 Operators:DAMIN
 Test Date:2020-01-12

γ Range: 0 - 90DEG
 γ Interval: 1.0DEG
 Test System:EVERFINE GO-2000H_V1 SYSTEM V2.0.404.7
 Humidity:65.0%
 Test Distance:9.900m [K=1.0000]
 Remarks:

Planar Illuminance Curve



C Range: 0 - 360DEG
 C Interval: 45.0DEG
 Test Speed: HIGH
 Temperature: 25.3DEG
 Operators: DAMIN
 Test Date: 2020-01-12

γ Range: 0 - 90DEG
 γ Interval: 1.0DEG
 Test System: EVERFINE GO-2000H_V1 SYSTEM V2.0.404.7
 Humidity: 65.0%
 Test Distance: 9.900m [K=1.0000]
 Remarks:

