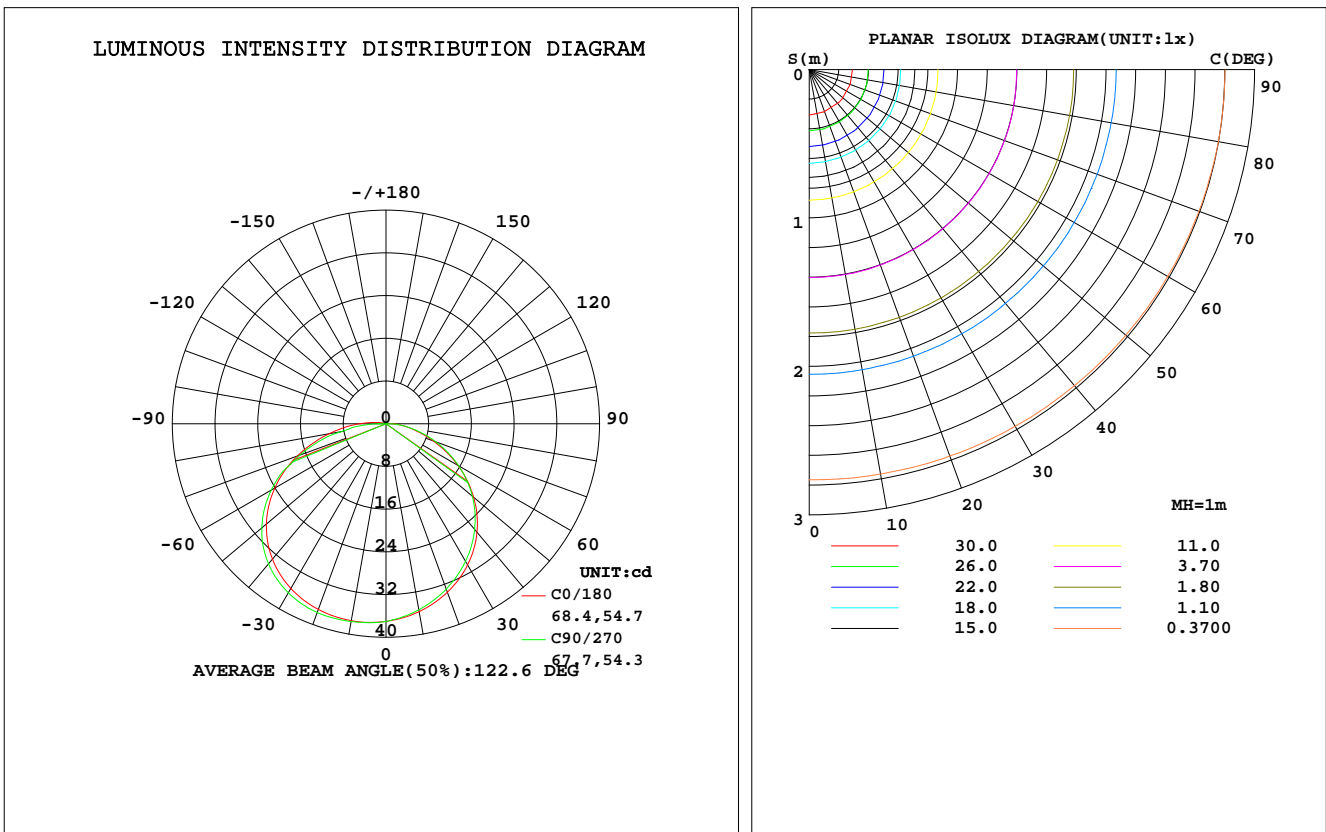


LUMINAIRE PHOTOMETRIC TEST REPORT

Test:U:24.000V I:0.1000A P:2.4000W PF:1.0000 Freq:0Hz Lamp Flux:125.805x1 lm		
NAME: CB-RGB150	TYPE: LED Strip	WEIGHT:
SPEC.: 7.2W	DIM.: 1000*10*2(MM)	SERIAL No.: 001
MFR.: Flexfire LEDs, Inc.	SUR.: 0.02*1	Shielding Angle: 120

DATA OF LAMP		PHOTOMETRIC DATA			
MODEL		Imax(cd)	37.71	S/MH(C0/180)	1.43
NOMINAL POWER(W)		LOR(%)	100.0	S/MH(C90/270)	1.47
RATED VOLTAGE(V)		TOTAL FLUX(lm)	125.81	η UP, DN(C0-180)	0.5,41.0
NOMINAL FLUX(lm)	125.805	CIE CLASS	DIRECT	η UP, DN(C180-360)	1.1,57.4
LAMPS INSIDE	1	η up(%)	1.6	CIBSE SHR NOM	1.50
TEST VOLTAGE(V)		η down(%)	98.4	CIBSE SHR MAX	1.55



C Range: 0 - 360DEG
 C Interval: 90.0DEG
 Test Speed: HIGH
 Temperature:25.3DEG
 Test Date:2021-11-17

γ Range: 0 - 180DEG
 γ Interval: 1.0DEG
 Test System:EVERFINE GO-2000B_V1 SYSTEM V2.00.429
 Humidity:65.0%
 Test Distance:8.270m [K=1.0000]
 Remarks:

ZONAL FLUX DIAGRAM

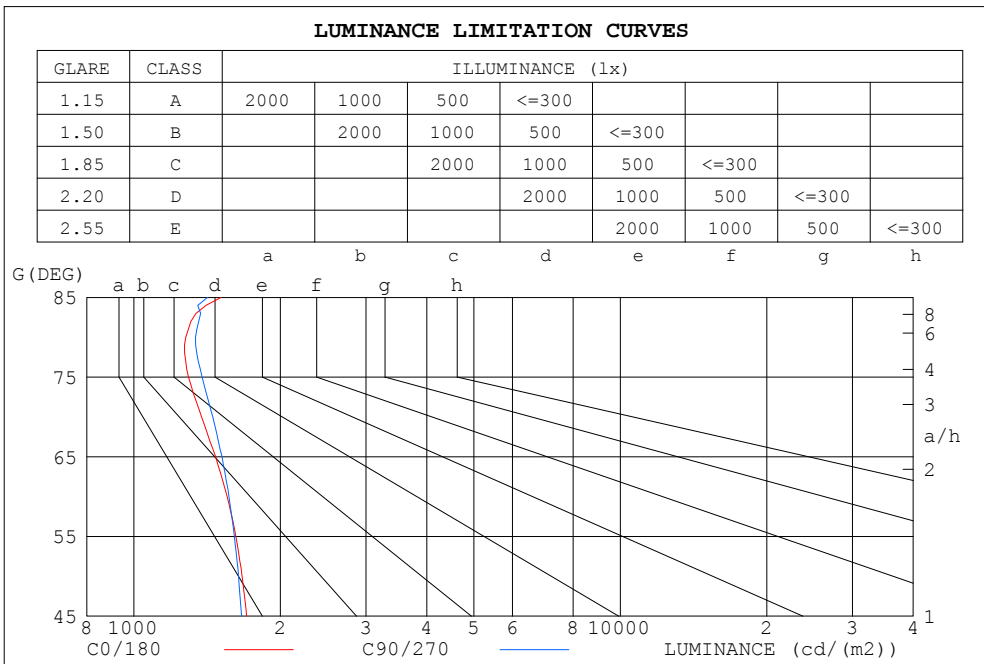
ZONAL FLUX DIAGRAM:

γ	C0	C90	C180	C270				γ	Φ zone	Φ total	%lum, lamp
10	35.72	35.39	37.45	37.60				0- 10	3.509	3.509	2.79,2.79
20	33.58	32.96	37.01	37.63				10- 20	10.18	13.69	10.9,10.9
30	30.54	29.78	35.62	36.57				20- 30	15.84	29.53	23.5,23.5
40	26.51	25.83	33.08	34.23				30- 40	19.82	49.35	39.2,39.2
50	21.44	21.12	29.23	30.37				40- 50	21.50	70.85	56.3,56.3
60	15.55	15.69	24.03	24.78				50- 60	20.46	91.31	72.6,72.6
70	9.419	9.944	17.66	17.13				60- 70	16.67	108.0	85.8,85.8
80	4.436	4.653	10.82	8.381				70- 80	10.90	118.9	94.5,94.5
90	1.436	0.5950	4.981	1.324				80- 90	4.926	123.8	98.4,98.4
100	0.3101	0.1034	1.394	0.0109				90-100	1.146	124.9	99.3,99.3
110	0.1117	0.1468	0.1083	0.0272				100-110	0.2368	125.2	99.5,99.5
120	0.1303	0.1687	0.1022	0.0598				110-120	0.1018	125.3	99.6,99.6
130	0.1682	0.1940	0.1358	0.0925				120-130	0.1184	125.4	99.7,99.7
140	0.1838	0.2122	0.1576	0.1153				130-140	0.1212	125.5	99.8,99.8
150	0.1937	0.2247	0.1786	0.1414				140-150	0.1114	125.6	99.9,99.9
160	0.2079	0.2278	0.2065	0.1855				150-160	0.0905	125.7	99.9,99.9
170	0.2370	0.2282	0.2381	0.1946				160-170	0.0608	125.8	100,100
180	0.2498	0.2285	0.2553	0.2230				170-180	0.0219	125.8	100,100
DEG	LUMINOUS INTENSITY:cd								UNIT:lm		

C Range: 0 - 360DEG
C Interval: 90.0DEG
Test Speed: HIGH
Temperature:25.3DEG
Test Date:2021-11-17

γ Range: 0 - 180DEG
 γ Interval: 1.0DEG
Test System:EVERFINE GO-2000B_V1 SYSTEM V2.00.429
Humidity:65.0%
Test Distance:8.270m [K=1.0000]
Remarks:

LUMINANCE LIMITATION CURVES



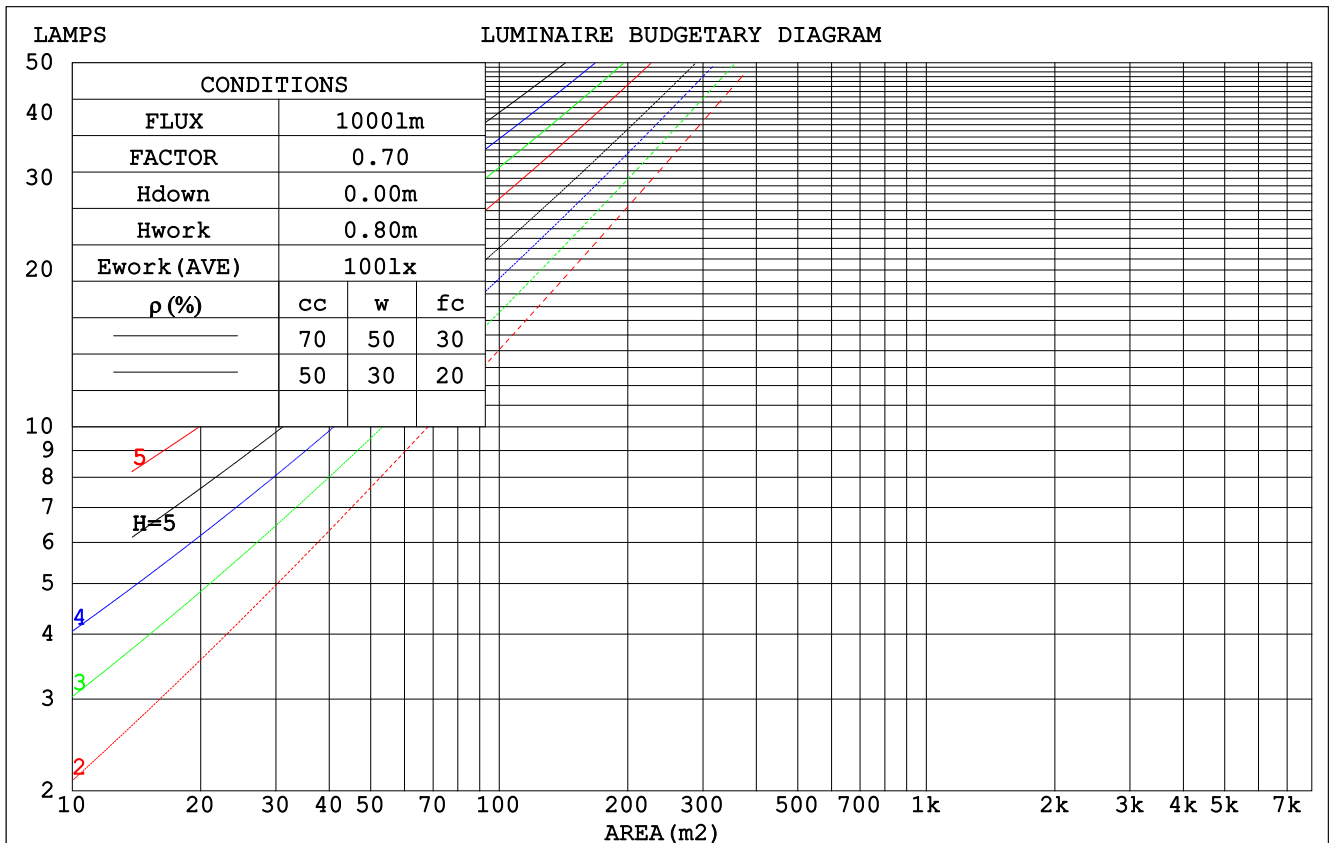
LUMINANCE cd/(m2)		
G (DEG)	C0/180	C90/270
85	1511	1417
80	1278	1339
75	1295	1381
70	1378	1453
65	1473	1518
60	1556	1568
55	1620	1609
50	1669	1641
45	1705	1665

C Range: 0 - 360DEG
 C Interval: 90.0DEG
 Test Speed: HIGH
 Temperature: 25.3DEG
 Test Date: 2021-11-17

γ Range: 0 - 180DEG
 γ Interval: 1.0DEG
 Test System: EVERFINE GO-2000B_V1 SYSTEM V2.00.429
 Humidity: 65.0%
 Test Distance: 8.270m [K=1.0000]
 Remarks:

CU AND LUMINAIRE BUDGETARY ESTIMATE DIAGRAM

ρ_{cc}	80%			70%			50%			30%			10%			0
ρ_w	50%	30%	10%	50%	30%	10%	50%	30%	10%	50%	30%	10%	50%	30%	10%	0
ρ_{fc}	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	1.10	1.10	1.10	1.05	1.05	1.05	1.01	1.01	1.01	.98
1.0	1.02	.97	.93	.99	.95	.91	.95	.91	.88	.90	.87	.85	.87	.84	.82	.80
2.0	.88	.80	.74	.86	.79	.73	.82	.76	.71	.78	.73	.69	.75	.71	.67	.65
3.0	.76	.68	.61	.75	.67	.60	.71	.65	.59	.68	.62	.58	.66	.61	.56	.54
4.0	.67	.58	.51	.66	.57	.50	.63	.56	.50	.61	.54	.49	.58	.52	.48	.46
5.0	.60	.50	.43	.59	.50	.43	.56	.48	.42	.54	.47	.42	.52	.46	.41	.39
6.0	.54	.44	.38	.53	.44	.37	.51	.43	.37	.49	.42	.36	.47	.41	.36	.34
7.0	.49	.39	.33	.48	.39	.33	.46	.38	.32	.44	.37	.32	.43	.37	.32	.30
8.0	.44	.35	.29	.43	.35	.29	.42	.34	.29	.40	.34	.29	.39	.33	.28	.26
9.0	.40	.32	.26	.40	.32	.26	.38	.31	.26	.37	.30	.26	.36	.30	.25	.24
10.0	.37	.29	.24	.37	.29	.24	.36	.28	.23	.34	.28	.23	.33	.27	.23	.21



C Range: 0 - 360DEG
 C Interval: 90.0DEG
 Test Speed: HIGH
 Temperature: 25.3DEG
 Test Date: 2021-11-17

γ Range: 0 - 180DEG
 γ Interval: 1.0DEG
 Test System: EVERFINE GO-2000B_V1 SYSTEM V2.00.429
 Humidity: 65.0%
 Test Distance: 8.270m [K=1.0000]
 Remarks:

WEC AND CCEC

ρ_{cc}	80%			70%			50%			30%			10%			0
ρ_w	50%	30%	10%	50%	30%	10%	50%	30%	10%	50%	30%	10%	50%	30%	10%	0
ρ_{fc}	20%			20%			20%			20%			20%			0
RCR	RCR:Room Cavity Ratio						Wall Exitance Coefficients(WEC)									
0.0																
1.0	.344	.196	.062	.336	.192	.061	.322	.185	.059	.309	.178	.057	.297	.172	.055	
2.0	.314	.172	.053	.307	.169	.052	.295	.164	.051	.283	.159	.050	.272	.154	.049	
3.0	.286	.152	.046	.280	.150	.045	.269	.146	.044	.258	.142	.043	.249	.138	.043	
4.0	.262	.136	.040	.256	.134	.040	.246	.130	.039	.237	.127	.038	.228	.124	.038	
5.0	.240	.122	.035	.235	.121	.035	.226	.118	.035	.218	.115	.034	.210	.112	.034	
6.0	.221	.111	.032	.217	.110	.032	.209	.107	.031	.202	.105	.031	.195	.102	.030	
7.0	.205	.101	.029	.201	.100	.029	.194	.098	.028	.187	.096	.028	.181	.094	.028	
8.0	.191	.093	.026	.188	.092	.026	.181	.090	.026	.175	.089	.026	.169	.087	.025	
9.0	.178	.086	.024	.175	.085	.024	.170	.084	.024	.164	.082	.024	.159	.081	.023	
10.0	.167	.080	.022	.165	.079	.022	.159	.078	.022	.154	.077	.022	.150	.075	.022	

ρ_{cc}	80%			70%			50%			30%			10%			0
ρ_w	50%	30%	10%	50%	30%	10%	50%	30%	10%	50%	30%	10%	50%	30%	10%	0
ρ_{fc}	20%			20%			20%			20%			20%			0
RCR	RCR:Room Cavity Ratio						Ceiling Cavity Exitance Coefficients(CCEC)									
0.0	.203	.203	.203	.173	.173	.173	.118	.118	.118	.068	.068	.068	.022	.022	.022	
1.0	.195	.168	.144	.167	.144	.124	.114	.099	.086	.066	.057	.050	.021	.018	.016	
2.0	.188	.144	.108	.161	.124	.093	.110	.086	.065	.063	.050	.038	.020	.016	.012	
3.0	.180	.127	.084	.154	.109	.073	.106	.076	.051	.061	.044	.030	.020	.014	.010	
4.0	.172	.114	.069	.148	.098	.060	.102	.068	.042	.059	.040	.025	.019	.013	.008	
5.0	.165	.103	.058	.142	.090	.051	.097	.063	.036	.056	.037	.021	.018	.012	.007	
6.0	.157	.095	.051	.135	.082	.044	.093	.058	.031	.054	.034	.019	.017	.011	.006	
7.0	.150	.088	.045	.129	.077	.039	.089	.054	.028	.052	.032	.017	.017	.010	.005	
8.0	.144	.083	.041	.124	.072	.035	.086	.050	.025	.050	.030	.015	.016	.010	.005	
9.0	.137	.078	.037	.118	.067	.033	.082	.047	.023	.048	.028	.014	.015	.009	.005	
10.0	.132	.073	.035	.113	.064	.030	.079	.045	.021	.046	.027	.013	.015	.009	.004	

C Range: 0 - 360DEG
 C Interval: 90.0DEG
 Test Speed: HIGH
 Temperature:25.3DEG
 Test Date:2021-11-17

γ Range: 0 - 180DEG
 γ Interval: 1.0DEG
 Test System:EVERFINE GO-2000B_V1 SYSTEM V2.00.429
 Humidity:65.0%
 Test Distance:8.270m [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	12.7	14.3	13.1	14.7	15.0	13.6	15.2	14.0	15.6	15.9
3H	14.4	15.9	14.8	16.3	16.7	15.4	16.9	15.8	17.3	17.7
4H	15.1	16.5	15.5	16.9	17.3	16.1	17.5	16.5	17.9	18.3
6H	15.6	17.0	16.1	17.4	17.8	16.7	18.0	17.1	18.4	18.8
8H	15.9	17.1	16.3	17.6	18.0	16.9	18.2	17.3	18.6	19.0
12H	16.1	17.3	16.5	17.7	18.2	17.1	18.3	17.5	18.7	19.2
4H 2H	13.2	14.7	13.7	15.1	15.5	14.5	16.0	15.0	16.4	16.8
3H	15.2	16.4	15.6	16.8	17.3	16.6	17.8	17.1	18.3	18.7
4H	16.0	17.1	16.4	17.5	18.0	17.5	18.6	17.9	19.0	19.5
6H	16.7	17.6	17.1	18.1	18.6	18.2	19.2	18.7	19.7	20.1
8H	16.9	17.9	17.4	18.3	18.8	18.5	19.4	19.0	19.9	20.4
12H	17.2	18.1	17.7	18.6	19.1	18.7	19.6	19.2	20.1	20.6
8H 4H	16.3	17.2	16.7	17.6	18.1	18.1	19.1	18.6	19.5	20.0
6H	17.1	17.8	17.6	18.3	18.9	19.1	19.9	19.6	20.4	20.9
8H	17.4	18.1	18.0	18.7	19.2	19.5	20.2	20.0	20.7	21.2
12H	17.8	18.4	18.3	19.0	19.5	19.9	20.5	20.4	21.0	21.6
12H 4H	16.3	17.1	16.8	17.6	18.1	18.3	19.1	18.8	19.6	20.1
6H	17.1	17.8	17.7	18.3	18.9	19.3	20.0	19.9	20.5	21.1
8H	17.6	18.2	18.1	18.7	19.3	19.8	20.5	20.4	21.0	21.6
CIE190: 2010										

CIE190: 2010
Area: 0.02 m2

C Range: 0 - 360DEG
C Interval: 90.0DEG
Test Speed: HIGH
Temperature:25.3DEG
Test Date:2021-11-17

γ Range: 0 - 180DEG
 γ Interval: 1.0DEG
Test System:EVERFINE GO-2000B_V1 SYSTEM V2.00.429
Humidity:65.0%
Test Distance:8.270m [K=1.0000]
Remarks:

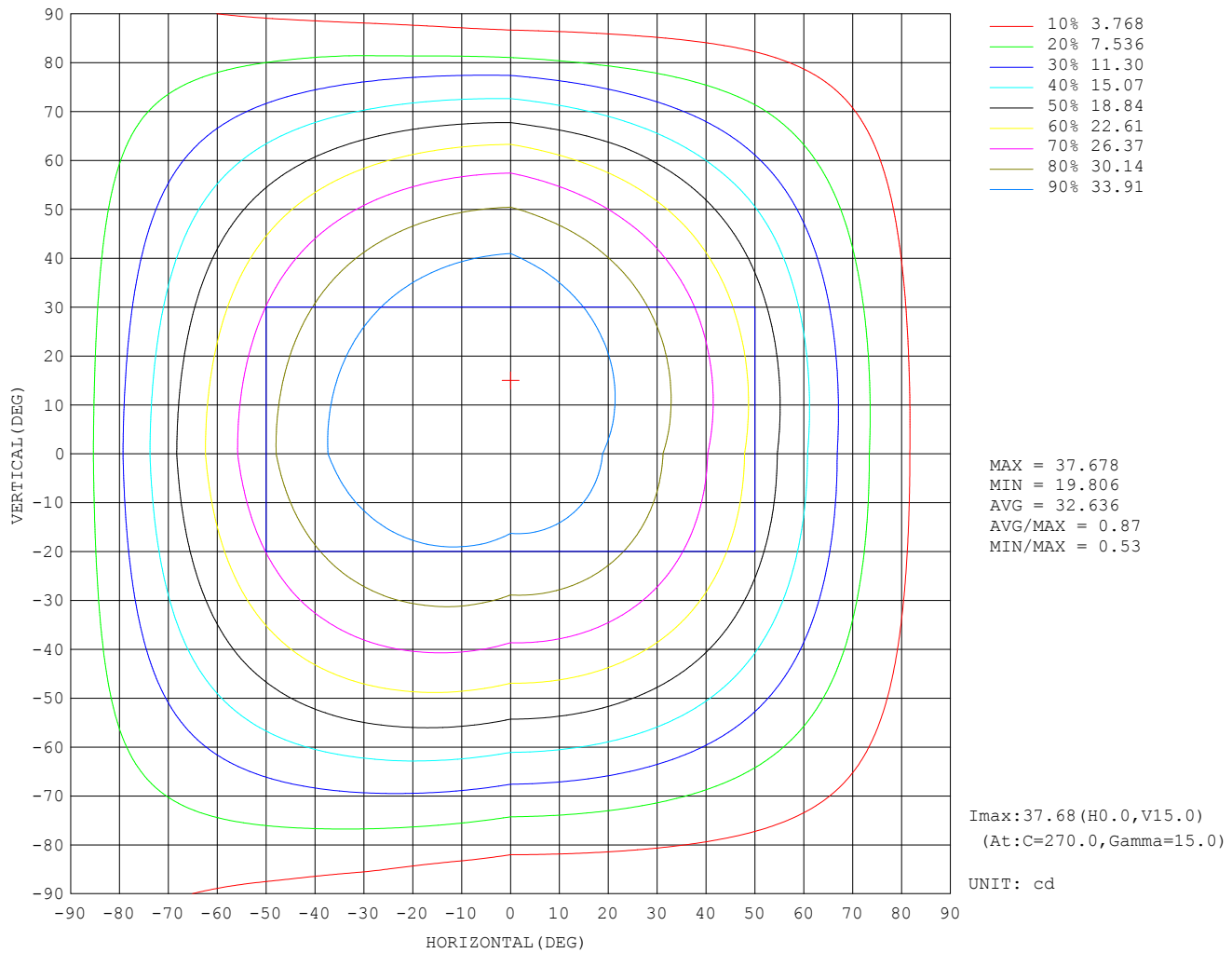
UTILIZATION FACTORS TABLE

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) $k(RI) \times RCR = 5$									
$k = 0.60$	54	42	35	54	42	35	52	42	35	28
0.80	64	52	44	63	52	44	61	51	44	36
1.00	73	61	53	71	60	53	69	62	52	45
1.25	80	69	61	78	68	60	75	66	60	52
1.50	85	74	67	83	73	66	80	71	65	57
2.00	92	83	76	90	81	75	86	79	73	65
2.50	96	88	81	94	86	80	90	83	78	69
3.00	100	92	86	97	90	85	93	87	83	73
4.00	104	98	92	102	96	91	97	92	88	78
5.00	107	101	97	104	99	95	99	95	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: 25.3DEG
 Test Date: 2021-11-17

γ Range: 0 - 180DEG
 γ Interval: 1.0DEG
 Test System: EVERFINE GO-2000B_V1 SYSTEM V2.00.429
 Humidity: 65.0%
 Test Distance: 8.270m [K=1.0000]
 Remarks:

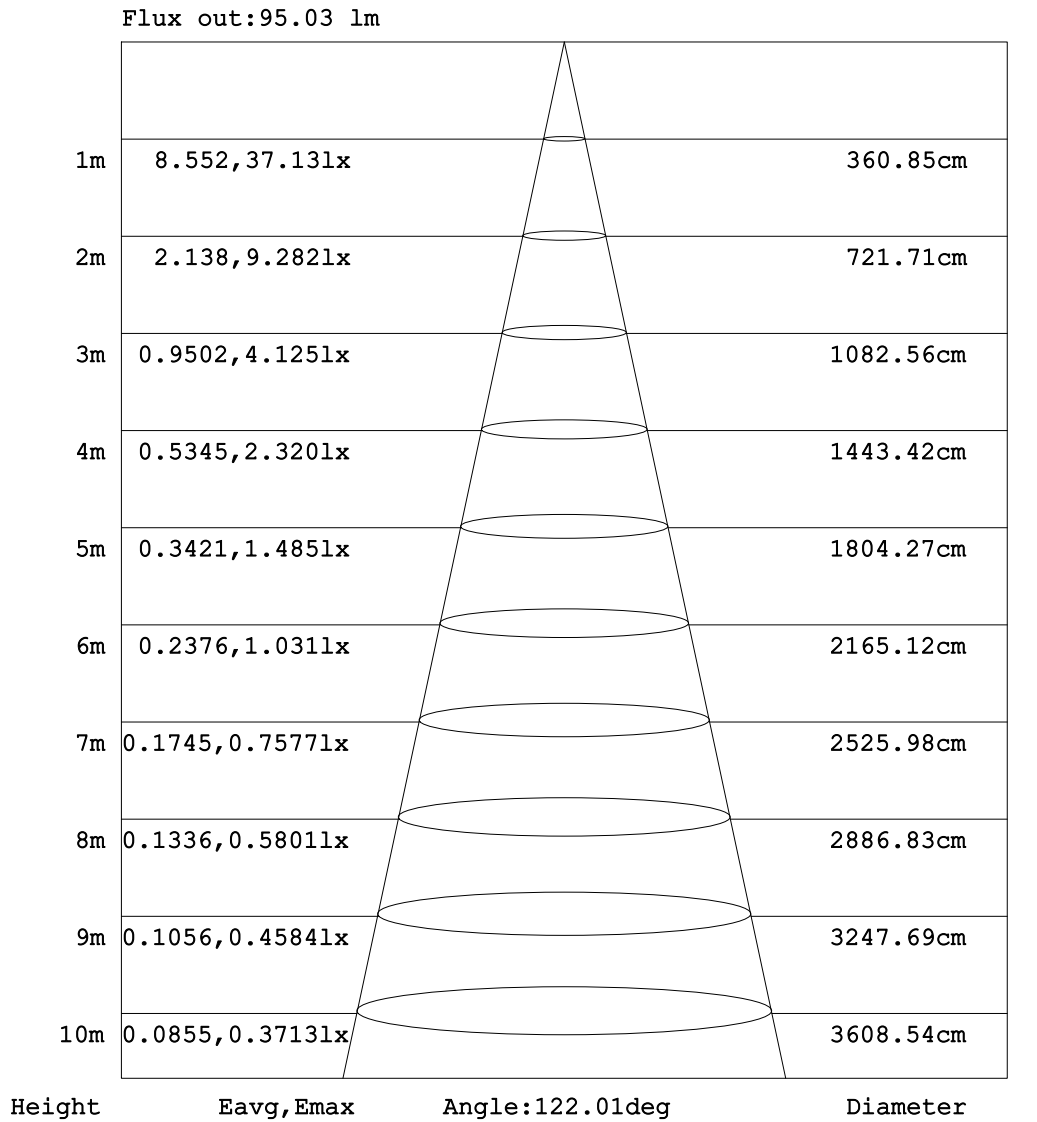
ISOCANDELA DIAGRAM



C Range: 0 - 360DEG
 C Interval: 90.0DEG
 Test Speed: HIGH
 Temperature: 25.3DEG
 Test Date: 2021-11-17

γ Range: 0 - 180DEG
 γ Interval: 1.0DEG
 Test System: EVERFINE GO-2000B_V1 SYSTEM V2.00.429
 Humidity: 65.0%
 Test Distance: 8.270m [K=1.0000]
 Remarks:

AAI Figure

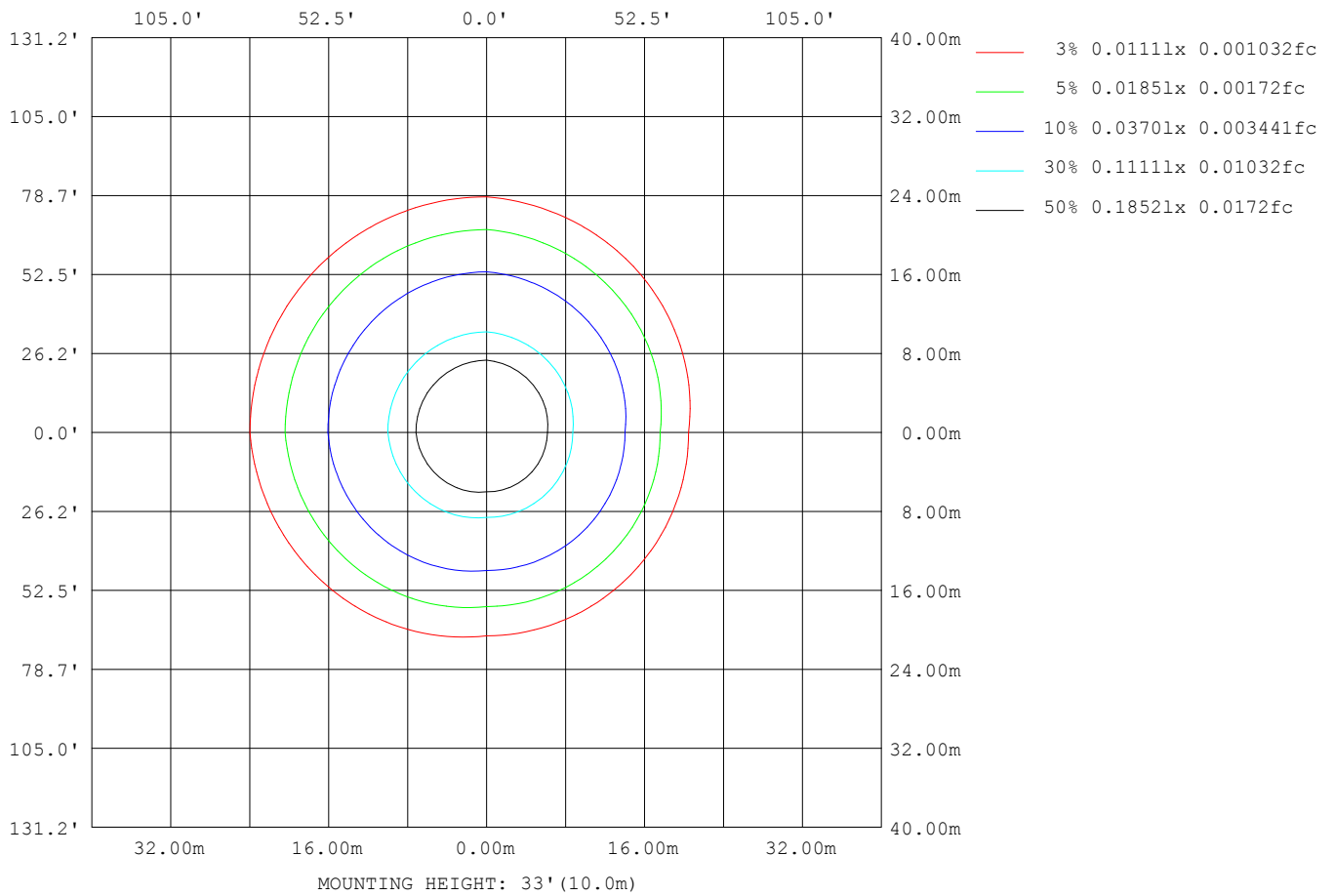


Note:The Curves indicate the illuminated area and the average illumination when the luminaire is at different distance.

C Range: 0 - 360DEG
 C Interval: 90.0DEG
 Test Speed: HIGH
 Temperature:25.3DEG
 Test Date:2021-11-17

γ Range: 0 - 180DEG
 γ Interval: 1.0DEG
 Test System:EVERFINE GO-2000B_V1 SYSTEM V2.00.429
 Humidity:65.0%
 Test Distance:8.270m [K=1.0000]
 Remarks:

ISOLUX DIAGRAM



C Range: 0 - 360DEG
 C Interval: 90.0DEG
 Test Speed: HIGH
 Temperature: 25.3DEG
 Test Date: 2021-11-17

γ Range: 0 - 180DEG
 γ Interval: 1.0DEG
 Test System: EVERFINE GO-2000B_V1 SYSTEM V2.00.429
 Humidity: 65.0%
 Test Distance: 8.270m [K=1.0000]
 Remarks:

LED Avg.L Report

Test:U:24.000V I:0.1000A P:2.4000W PF:1.0000 Freq:0Hz Lamp Flux:125.805x1 lm		
NAME: CB-RGB150	TYPE: LED Strip	WEIGHT:
SPEC.: 7.2W	DIM.: 1000*10*2 (MM)	SERIAL No.: 001
MFR.: Flexfire LEDs, Inc.	SUR.: 0.02*1	Shielding Angle: 120

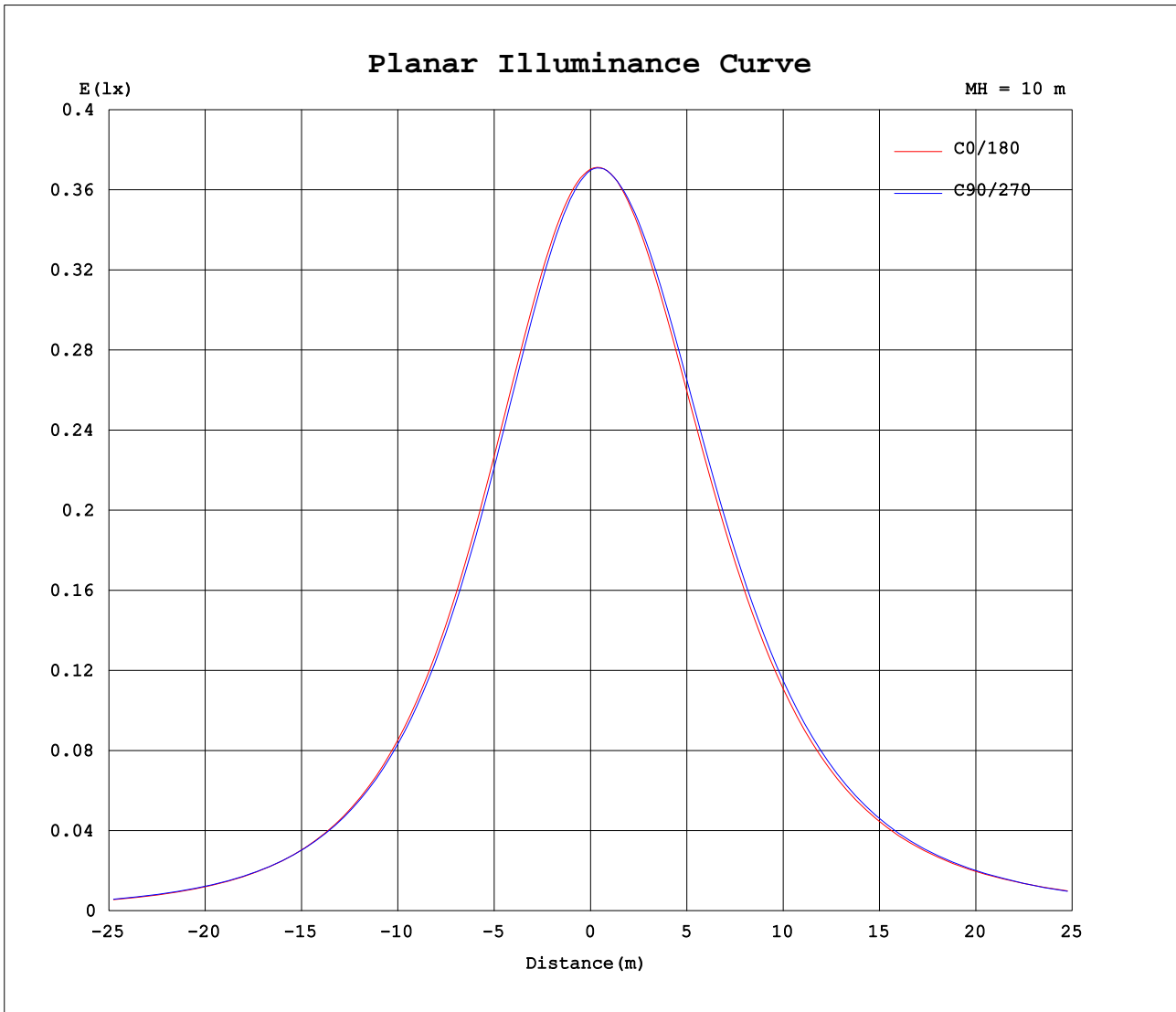
AvgL	cd/m2
L_0~180(65)av	1978
L_0~180(75)av	2019
L_0~180(85)av	2969
L_90~270(65)av	2027
L_90~270(75)av	1962
L_90~270(85)av	2204
L_45(65)av	2040
L_45(75)av	2029
L_45(85)av	2582

Standard: GB/T 29293-2012

C Range: 0 - 360DEG
C Interval: 90.0DEG
Test Speed: HIGH
Temperature:25.3DEG
Test Date:2021-11-17

γ Range: 0 - 180DEG
 γ Interval: 1.0DEG
Test System:EVERFINE GO-2000B_V1 SYSTEM V2.00.429
Humidity:65.0%
Test Distance:8.270m [K=1.0000]
Remarks:

Planar Illuminance Curve



C Range: 0 - 360DEG
 C Interval: 90.0DEG
 Test Speed: HIGH
 Temperature: 25.3DEG
 Test Date: 2021-11-17

γ Range: 0 - 180DEG
 γ Interval: 1.0DEG
 Test System: EVERFINE GO-2000B_V1 SYSTEM V2.00.429
 Humidity: 65.0%
 Test Distance: 8.270m [K=1.0000]
 Remarks:

LUMINOUS DISTRIBUTION INTENSITY DATA

Table--1

UNIT: cd

C(DEG) γ (DEG)	0	90	180	270															
0	37.0	37.0	37.0	37.0															
5	36.5	36.3	37.3	37.4															
10	35.7	35.4	37.4	37.6															
15	34.8	34.3	37.3	37.7															
20	33.6	33.0	37.0	37.6															
25	32.2	31.5	36.5	37.2															
30	30.5	29.8	35.6	36.6															
35	28.7	27.9	34.5	35.6															
40	26.5	25.8	33.1	34.2															
45	24.1	23.6	31.3	32.5															
50	21.4	21.1	29.2	30.4															
55	18.6	18.5	26.8	27.8															
60	15.5	15.7	24.0	24.8															
65	12.4	12.8	21.0	21.4															
70	9.42	9.94	17.7	17.1															
75	6.70	7.15	14.2	13.2															
80	4.44	4.65	10.8	8.38															
85	2.63	2.47	7.72	5.21															
90	1.44	0.60	4.98	1.32															
95	0.73	0.08	2.77	0.03															
100	0.31	0.10	1.39	0.01															
105	0.11	0.12	0.54	0.02															
110	0.11	0.15	0.11	0.03															
115	0.11	0.16	0.09	0.04															
120	0.13	0.17	0.10	0.06															
125	0.14	0.18	0.12	0.08															
130	0.17	0.19	0.14	0.09															
135	0.18	0.20	0.15	0.10															
140	0.18	0.21	0.16	0.12															
145	0.19	0.22	0.18	0.13															
150	0.19	0.22	0.18	0.14															
155	0.20	0.23	0.19	0.17															
160	0.21	0.23	0.21	0.19															
165	0.22	0.23	0.22	0.19															
170	0.24	0.23	0.24	0.19															
175	0.24	0.23	0.25	0.21															
180	0.25	0.23	0.26	0.22															

C Range: 0 - 360DEG
 C Interval: 90.0DEG
 Test Speed: HIGH
 Temperature:25.3DEG
 Test Date:2021-11-17

γ Range: 0 - 180DEG
 γ Interval: 1.0DEG
 Test System:EVERFINE GO-2000B_V1 SYSTEM V2.00.429
 Humidity:65.0%
 Test Distance:8.270m [K=1.0000]
 Remarks: