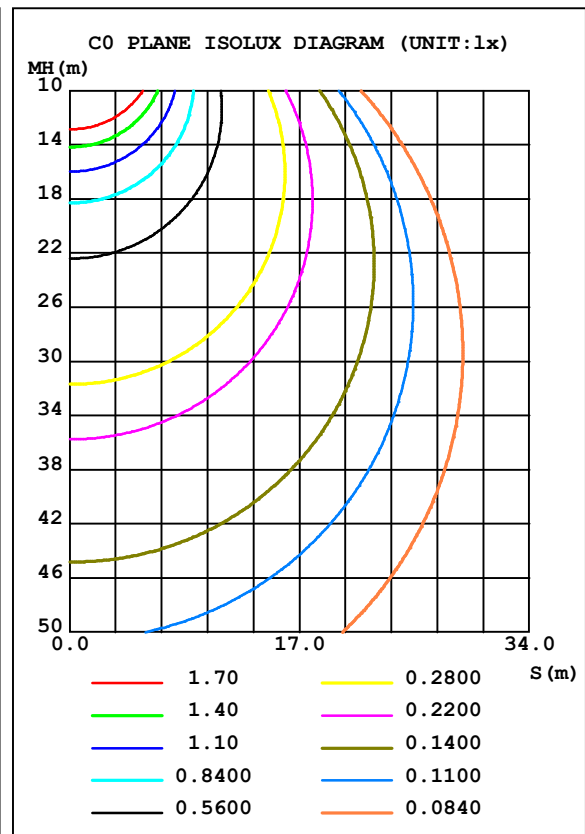
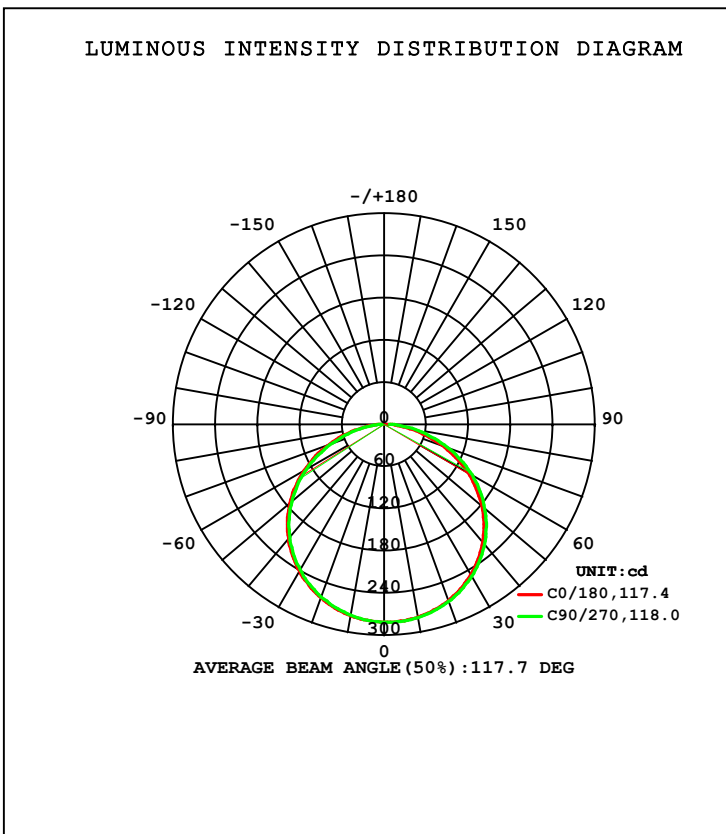


LUMINAIRE PHOTOMETRIC TEST REPORT

Test:U:24.00V I:0.3636A P:8.726W PF:1.000 Freq:49.99Hz Lamp Flux:853.206x1 lm		
NAME: Flexible LED Strip	TYPE:	WEIGHT:
SPEC.:SMD2216,4000K,Ra>90,Step 3	DIM.:	SERIAL No.:
MFR.:	SUR.:	Shielding Angle:

DATA OF LAMP		PHOTOMETRIC DATA Eff: 97.78 lm/W			
MODEICIL2216-140-8.6W-4000K		I _{max} (cd)	281.6	S/MH (C0/180)	1.28
NOMINAL POWER (W)	8.6	LOR (%)	100.0	S/MH (C90/270)	1.26
RATED VOLTAGE (V)	24	TOTAL FLUX (lm)	853.21	η UP, DN (C0-180)	0.0, 51.7
NOMINAL FLUX (lm)	853.206	CIE CLASS	DIRECT	η UP, DN (C180-360)	0.0, 48.3
LAMPS INSIDE	1	η up (%)	0.0	CIBSE SHR NOM	1.25
TEST VOLTAGE (V)	24	η down (%)	100.0	CIBSE SHR MAX	1.35



C Range: 0 - 360DEG
 C Interval: 90.0DEG
 Test Speed: HIGH
 Temperature: 25.3DEG
 Operators:
 Test Date: 2018-07-11

γ Range: 0 - 90DEG
 γ Interval: 1.0DEG
 Test System: EVERFINE GO-2000A_V1 SYSTEM V2.0.362
 Humidity: 65.0%
 Test Distance: 9.690m [K=1.0000]
 Remarks:

ZONAL FLUX DIAGRAM

ZONAL FLUX DIAGRAM:

γ	C0	C90	C180	C270					γ	Φ zone	Φ total	%lum, lamp
10	278.4	279.0	276.2	275.4					0- 10	26.66	26.66	3.13,3.13
20	267.0	268.4	262.8	261.3					10- 20	76.84	103.5	12.1,12.1
30	247.0	249.5	241.3	239.1					20- 30	117.8	221.3	25.9,25.9
40	218.5	222.4	212.0	209.2					30- 40	144.4	365.8	42.9,42.9
50	181.9	187.3	175.3	171.8					40- 50	152.9	518.7	60.8,60.8
60	137.8	144.9	131.5	127.6					50- 60	141.2	659.9	77.3,77.3
70	87.50	96.17	82.61	78.23					60- 70	110.0	769.8	90.2,90.2
80	37.36	45.40	34.02	30.08					70- 80	64.26	834.1	97.8,97.8
90	2.003	7.616	1.222	3.528					80- 90	19.10	853.2	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			

Conical surface Flux(90deg): 442.4 lm

%lum = 51.9%

%lamp = 51.9%

Conical surface Flux(120deg): 659.86 lm

%lum = 77.3%

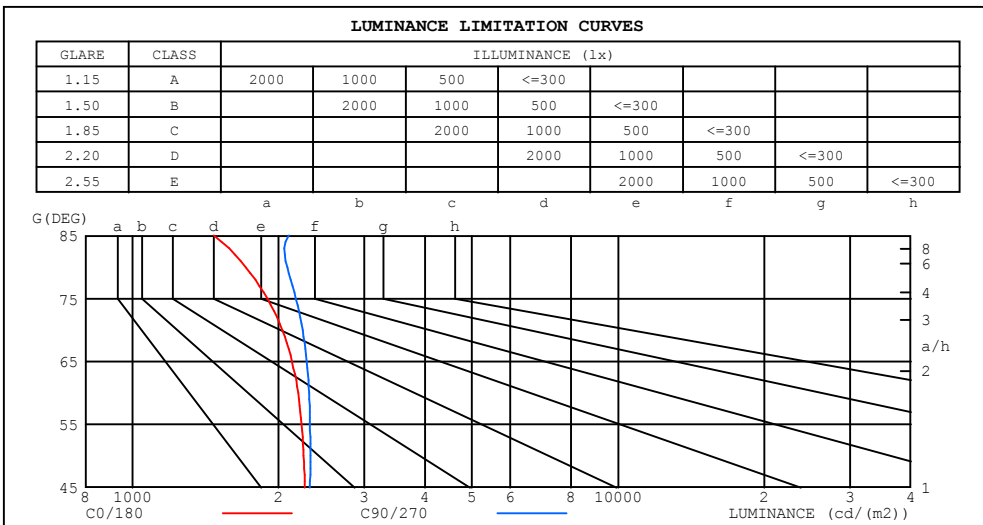
%lamp = 77.3%

C Range: 0 - 360DEG
 C Interval: 90.0DEG
 Test Speed: HIGH
 Temperature:25.3DEG
 Operators:
 Test Date:2018-07-11

γ Range: 0 - 90DEG
 γ Interval: 1.0DEG
 Test System:EVERFINE GO-2000A_V1 SYSTEM V2.0.362
 Humidity:65.0%
 Test Distance:9.690m [K=1.0000]
 Remarks:

LUMINANCE LIMITATION CURVES

Test:U:24.00V I:0.3636A P:8.726W PF:1.000 Freq:49.99Hz Lamp Flux:853.206x1 lm		
NAME: Flexible LED Strip	TYPE:	WEIGHT:
SPEC.:SMD2216,4000K,Ra>90,Step 3	DIM.:	SERIAL No.:
MFR.:	SUR.:	Shielding Angle:



LUMINANCE cd/(m2)		
G (DEG)	C0/180	C90/270
85	1469	2099
80	1712	2083
75	1895	2169
70	2035	2241
65	2131	2285
60	2192	2309
55	2229	2319
50	2251	2322
45	2263	2320

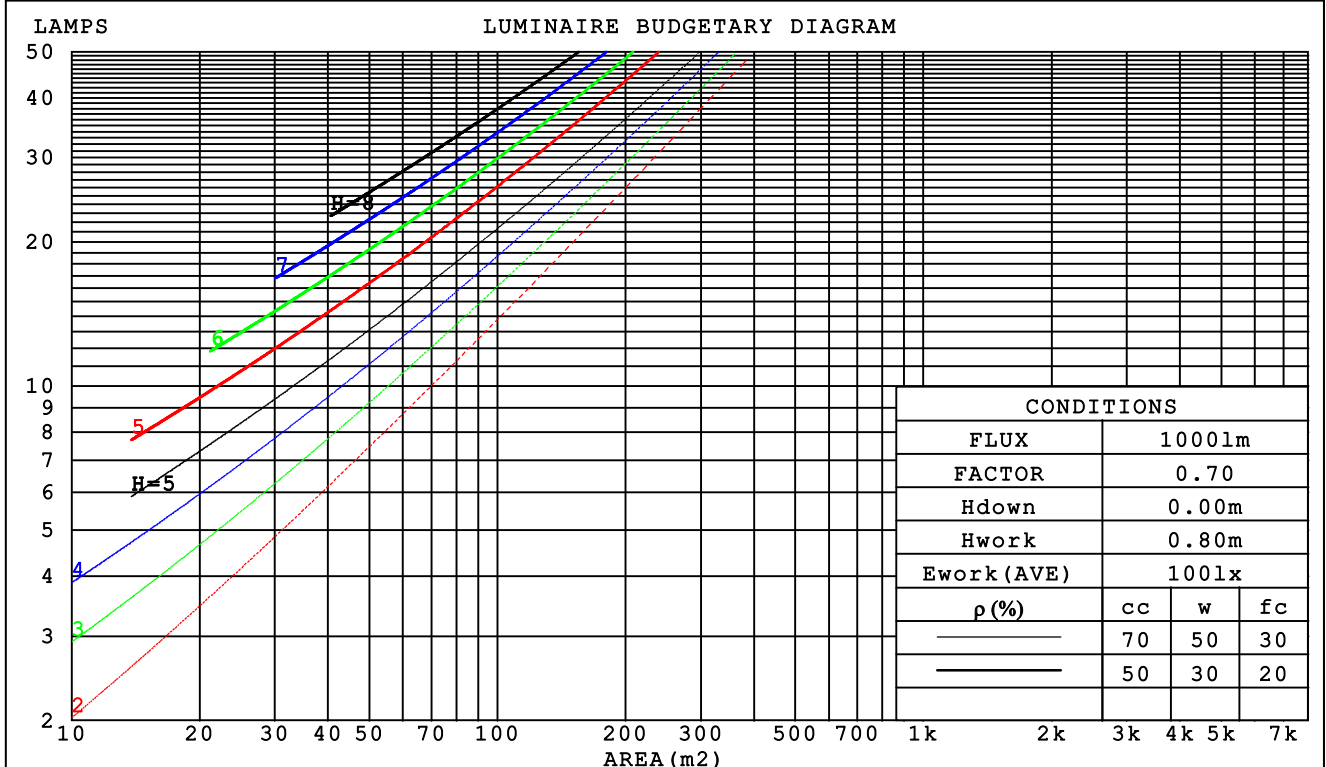
C Range: 0 - 360DEG
 C Interval: 90.0DEG
 Test Speed: HIGH
 Temperature:25.3DEG
 Operators:
 Test Date:2018-07-11

γ Range: 0 - 90DEG
 γ Interval: 1.0DEG
 Test System:EVERFINE GO-2000A_V1 SYSTEM V2.0.362
 Humidity:65.0%
 Test Distance:9.690m [K=1.0000]
 Remarks:

CU AND LUMINAIRE BUDGETARY ESTIMATE DIAGRAM

Test:U:24.00V I:0.3636A P:8.726W PF:1.000 Freq:49.99Hz Lamp Flux:853.206x1 lm		
NAME: Flexible LED Strip	TYPE:	WEIGHT:
SPEC.:SMD2216,4000K,Ra>90,Step 3	DIM.:	SERIAL No.:
MFR.:	SUR.:	Shielding Angle:

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	1.19	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	1.03	.99	.95	1.01	.97	.93	.97	.94	.90	.93	.90	.88	.89	.87	.85	.83
2.0	.90	.83	.77	.88	.81	.76	.84	.79	.74	.81	.76	.72	.78	.74	.71	.69
3.0	.79	.70	.63	.77	.69	.63	.74	.67	.62	.71	.65	.61	.69	.64	.60	.57
4.0	.69	.60	.53	.68	.60	.53	.65	.58	.52	.63	.57	.52	.61	.55	.51	.49
5.0	.62	.53	.46	.61	.52	.46	.59	.51	.45	.57	.50	.45	.55	.49	.44	.42
6.0	.56	.46	.40	.55	.46	.40	.53	.45	.39	.51	.44	.39	.49	.43	.39	.37
7.0	.50	.41	.35	.49	.41	.35	.48	.40	.35	.46	.40	.34	.45	.39	.34	.32
8.0	.46	.37	.31	.45	.37	.31	.44	.36	.31	.43	.36	.31	.41	.35	.31	.29
9.0	.42	.34	.28	.41	.33	.28	.40	.33	.28	.39	.32	.28	.38	.32	.27	.26
10.0	.39	.31	.25	.38	.30	.25	.37	.30	.25	.36	.30	.25	.35	.29	.25	.23



C Range: 0 - 360DEG
 C Interval: 90.0DEG
 Test Speed: HIGH
 Temperature:25.3DEG
 Operators:
 Test Date:2018-07-11

γ Range: 0 - 90DEG
 γ Interval: 1.0DEG
 Test System:EVERFINE GO-2000A_V1 SYSTEM V2.0.362
 Humidity:65.0%
 Test Distance:9.690m [K=1.0000]
 Remarks:

WEC AND CCEC

Test:U:24.00V I:0.3636A P:8.726W PF:1.000 Freq:49.99Hz Lamp Flux:853.206x1 lm		
NAME: Flexible LED Strip	TYPE:	WEIGHT:
SPEC.:SMD2216,4000K,Ra>90,Step 3	DIM.:	SERIAL No.:
MFR.:	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						Wall Exitance Coefficients (WEC)									
0.0																
1.0	.319	.181	.057	.312	.178	.056	.298	.171	.055	.286	.165	.053	.275	.159	.051	
2.0	.298	.164	.050	.292	.161	.050	.280	.156	.048	.270	.151	.047	.259	.147	.046	
3.0	.275	.147	.044	.270	.144	.043	.259	.141	.043	.250	.137	.042	.241	.133	.041	
4.0	.253	.132	.039	.249	.130	.038	.239	.127	.038	.231	.124	.037	.223	.121	.037	
5.0	.234	.119	.035	.230	.118	.034	.221	.115	.034	.214	.113	.034	.207	.110	.033	
6.0	.217	.109	.031	.213	.107	.031	.205	.105	.031	.199	.103	.030	.192	.101	.030	
7.0	.201	.100	.028	.198	.099	.028	.191	.097	.028	.185	.095	.028	.179	.093	.027	
8.0	.188	.092	.026	.185	.091	.026	.179	.089	.026	.173	.088	.025	.168	.086	.025	
9.0	.176	.085	.024	.173	.084	.024	.168	.083	.024	.163	.082	.023	.158	.080	.023	
10.0	.165	.079	.022	.163	.079	.022	.158	.077	.022	.154	.076	.022	.149	.075	.022	

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	.181	.156	.134	.155	.134	.115	.106	.092	.080	.061	.053	.046	.020	.017	.015	
2.0	.173	.132	.097	.148	.114	.084	.102	.079	.059	.059	.046	.034	.019	.015	.011	
3.0	.166	.114	.074	.142	.099	.064	.097	.069	.045	.056	.040	.026	.018	.013	.009	
4.0	.158	.101	.058	.135	.087	.050	.093	.061	.035	.054	.036	.021	.017	.012	.007	
5.0	.150	.091	.047	.129	.078	.041	.089	.055	.029	.052	.032	.017	.017	.011	.006	
6.0	.143	.082	.039	.123	.071	.034	.085	.050	.024	.049	.029	.014	.016	.010	.005	
7.0	.136	.076	.033	.117	.065	.029	.081	.046	.020	.047	.027	.012	.015	.009	.004	
8.0	.130	.070	.028	.112	.060	.025	.077	.042	.018	.045	.025	.010	.015	.008	.003	
9.0	.124	.065	.025	.107	.056	.022	.074	.040	.015	.043	.023	.009	.014	.008	.003	
10.0	.118	.060	.022	.102	.053	.019	.071	.037	.014	.041	.022	.008	.013	.007	.003	

C Range: 0 - 360DEG
 C Interval: 90.0DEG
 Test Speed: HIGH
 Temperature:25.3DEG
 Operators:
 Test Date:2018-07-11

γ Range: 0 - 90DEG
 γ Interval: 1.0DEG
 Test System:EVERFINE GO-2000A_V1 SYSTEM V2.0.362
 Humidity:65.0%
 Test Distance:9.690m [K=1.0000]
 Remarks:

UGR(Unified Glare Rating) Table

Test:U:24.00V I:0.3636A P:8.726W PF:1.000 Freq:49.99Hz Lamp Flux:853.206x1 lm										
NAME: Flexible LED Strip					TYPE:			WEIGHT:		
SPEC.:SMD2216,4000K,Ra>90,Step 3					DIM.:			SERIAL No.:		
MFR.:					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	16.4	17.9	16.7	18.1	18.4	16.6	18.1	16.8	18.3	18.5
3H	18.0	19.4	18.3	19.7	19.9	18.3	19.7	18.6	20.0	20.2
4H	18.6	20.0	19.0	20.3	20.5	19.0	20.4	19.3	20.6	20.9
6H	19.1	20.4	19.4	20.7	20.9	19.6	20.9	19.9	21.1	21.4
8H	19.2	20.5	19.6	20.8	21.1	19.8	21.0	20.1	21.3	21.6
12H	19.3	20.5	19.7	20.8	21.1	19.9	21.1	20.3	21.4	21.7
4H 2H	17.1	18.4	17.4	18.7	19.0	17.2	18.6	17.5	18.8	19.1
3H	18.9	20.1	19.2	20.4	20.7	19.1	20.3	19.5	20.6	20.9
4H	19.6	20.7	20.0	21.0	21.4	20.0	21.1	20.3	21.4	21.7
6H	20.2	21.2	20.6	21.5	21.9	20.7	21.6	21.1	22.0	22.4
8H	20.4	21.3	20.8	21.7	22.1	20.9	21.8	21.4	22.2	22.6
12H	20.6	21.4	21.0	21.8	22.2	21.2	22.0	21.6	22.4	22.8
8H 4H	20.0	20.9	20.4	21.2	21.6	20.3	21.2	20.7	21.5	21.9
6H	20.7	21.5	21.1	21.9	22.3	21.1	21.9	21.6	22.3	22.7
8H	21.0	21.7	21.5	22.1	22.5	21.5	22.2	21.9	22.6	23.0
12H	21.2	21.8	21.7	22.2	22.7	21.8	22.4	22.3	22.8	23.3
12H 4H	20.0	20.8	20.4	21.2	21.6	20.3	21.1	20.7	21.5	21.9
6H	20.8	21.5	21.3	21.9	22.3	21.2	21.9	21.6	22.3	22.7
8H	21.1	21.7	21.6	22.2	22.6	21.6	22.2	22.1	22.6	23.1
Variations with the observer position at spacings:										
S = 1.0H	+ 0.1 / - 0.2					+ 0.1 / - 0.2				
1.5H	+ 0.2 / - 0.3					+ 0.2 / - 0.3				
2.0H	+ 0.2 / - 0.4					+ 0.1 / - 0.3				

CIE Pub.117, 853.2 lm Total Lamp Luminous Flux Correct (8log(F/F0) = -0.6)

C Range: 0 - 360DEG
 C Interval: 90.0DEG
 Test Speed: HIGH
 Temperature:25.3DEG
 Operators:
 Test Date:2018-07-11

γ Range: 0 - 90DEG
 γ Interval: 1.0DEG
 Test System:EVERFINE GO-2000A_V1 SYSTEM V2.0.362
 Humidity:65.0%
 Test Distance:9.690m [K=1.0000]
 Remarks:

UTILIZATION FACTORS TABLE

Test:U:24.00V I:0.3636A P:8.726W PF:1.000 Freq:49.99Hz Lamp Flux:853.206x1 lm		
NAME: Flexible LED Strip	TYPE:	WEIGHT:
SPEC.:SMD2216,4000K,Ra>90,Step 3	DIM.:	SERIAL No.:
MFR.:	SUR.:	Shielding Angle:

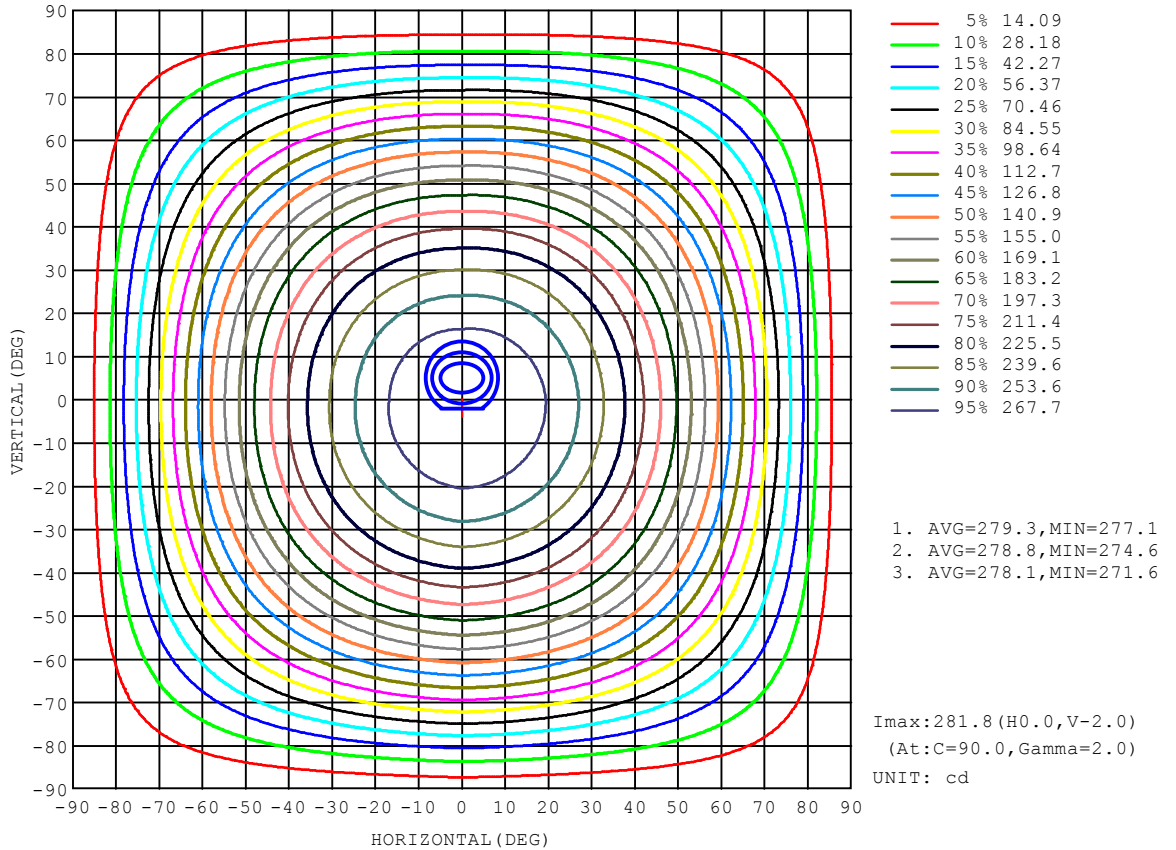
REFLECTANCE										
Ceiling	0.8	0.8	0.8	0.7	0.7	0.7	0.5	0.5	0.5	0
Walls	0.7	0.5	0.3	0.7	0.5	0.3	0.7	0.5	0.3	0
Working plane	0.2	0.2	0.2	0.2	0.2	0.2	0.2	0.2	0.2	0
ROOM INDEX	UTILIZATION FACTORS (PERCENT) $k(RI) \times RCR = 5$									
k = 0.60	57	45	38	56	44	38	55	44	37	31
0.80	67	55	47	66	54	47	64	53	47	40
1.00	75	64	56	74	63	56	72	65	55	48
1.25	82	71	64	81	71	64	78	69	63	55
1.50	87	77	70	86	76	69	82	74	68	61
2.00	94	85	79	92	84	78	89	82	77	69
2.50	98	90	84	96	89	83	92	86	81	73
3.00	102	95	89	100	93	88	95	90	86	77
4.00	106	100	95	103	98	94	99	95	91	82
5.00	108	103	99	106	101	98	101	98	94	85
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
 Operators:
 Test Date:2018-07-11

γ Range: 0 - 90DEG
 γ Interval: 1.0DEG
 Test System:EVERFINE GO-2000A_V1 SYSTEM V2.0.362
 Humidity:65.0%
 Test Distance:9.690m [K=1.0000]
 Remarks:

ISOCANDELA DIAGRAM

Test:U:24.00V I:0.3636A P:8.726W PF:1.000 Freq:49.99Hz Lamp Flux:853.206x1 lm		
NAME: Flexible LED Strip	TYPE:	WEIGHT:
SPEC.:SMD2216,4000K,Ra>90,Step 3	DIM.:	SERIAL No.:
MFR.:	SUR.:	Shielding Angle:

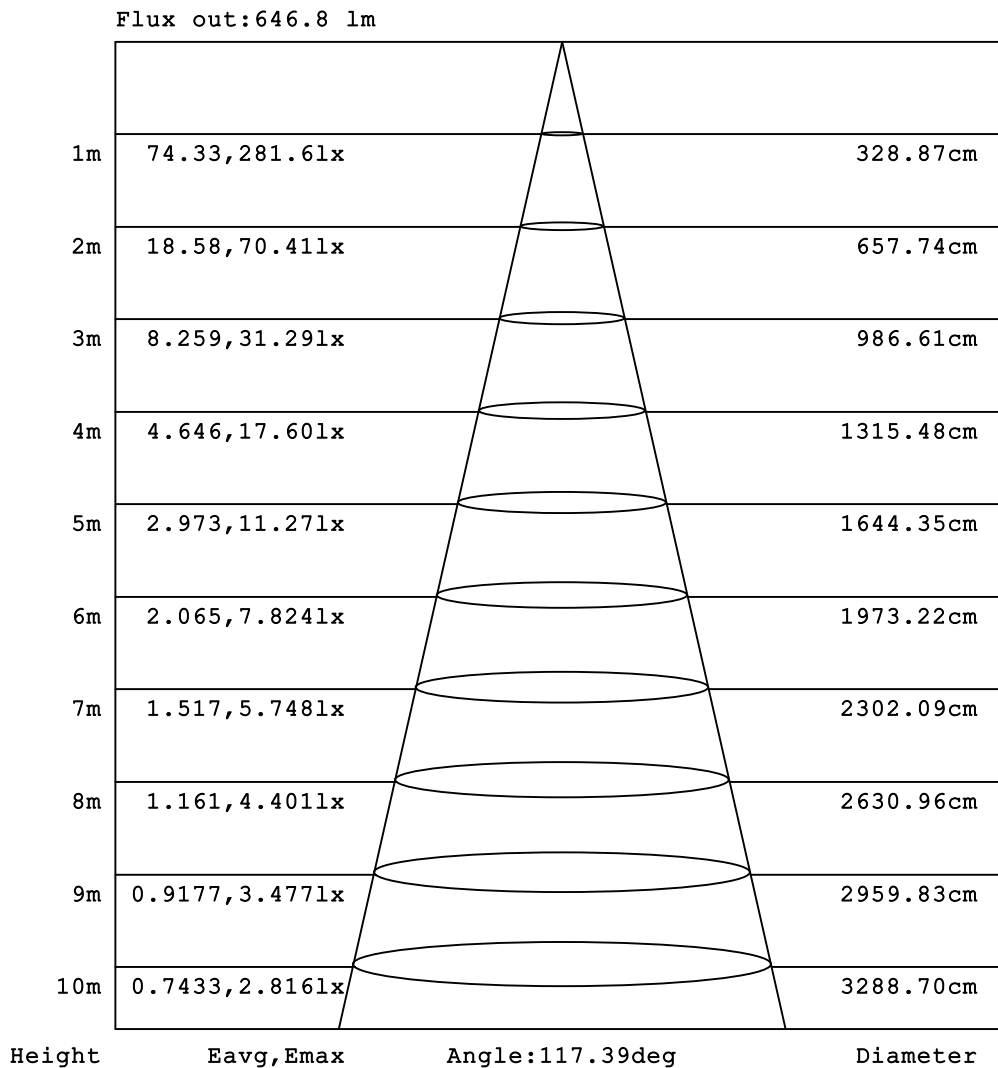


C Range: 0 - 360DEG
 C Interval: 90.0DEG
 Test Speed: HIGH
 Temperature:25.3DEG
 Operators:
 Test Date:2018-07-11

γ Range: 0 - 90DEG
 γ Interval: 1.0DEG
 Test System:EVERFINE GO-2000A_V1 SYSTEM V2.0.362
 Humidity:65.0%
 Test Distance:9.690m [K=1.0000]
 Remarks:

AAI Figure

Test:U:24.00V I:0.3636A P:8.726W PF:1.000 Freq:49.99Hz Lamp Flux:853.206x1 lm		
NAME: Flexible LED Strip	TYPE:	WEIGHT:
SPEC.:SMD2216,4000K,Ra>90,Step 3	DIM.:	SERIAL No.:
MFR.:	SUR.:	Shielding Angle:



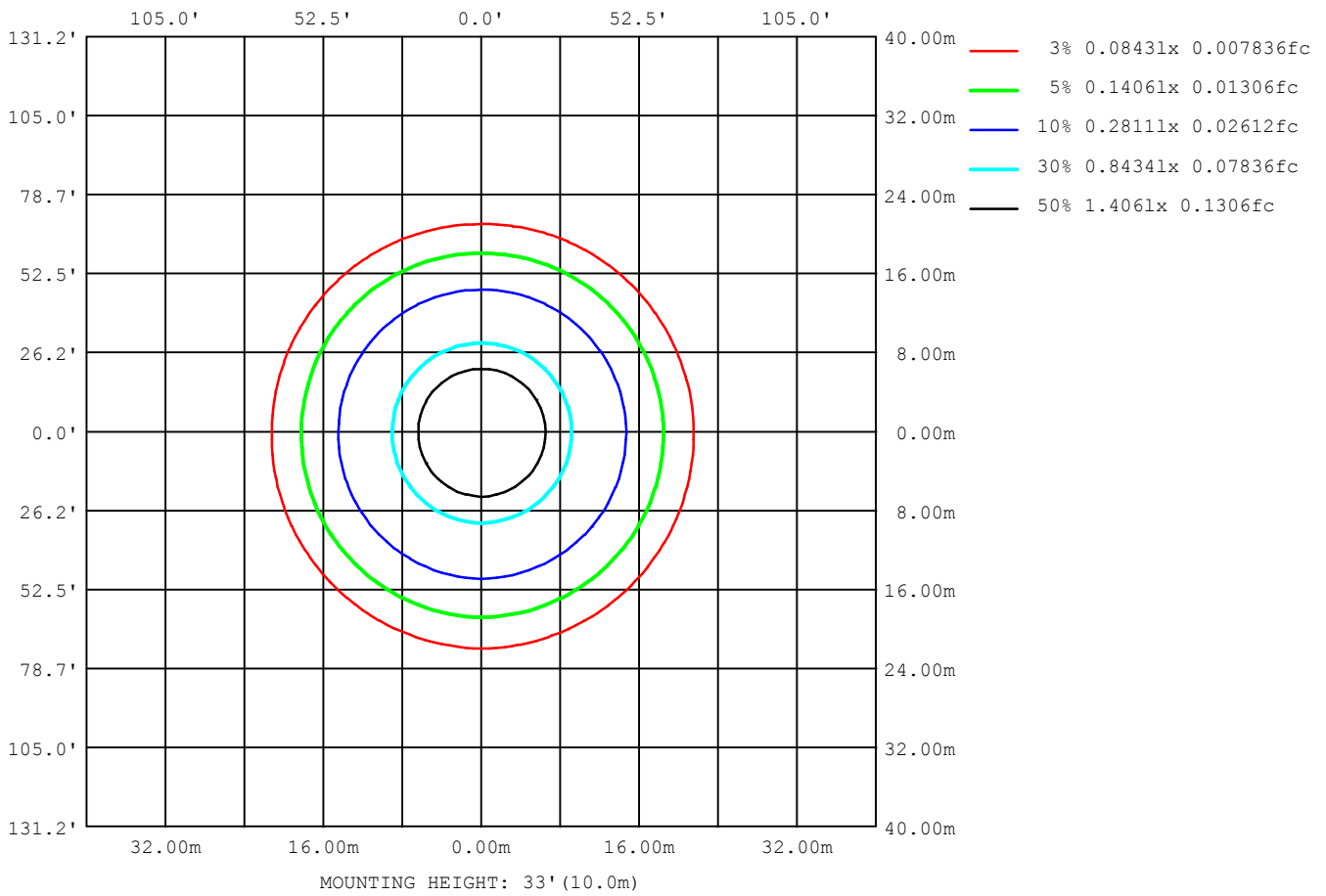
Note:The Curves indicate the illuminated area and the average illumination when the luminaire is at different distance.

C Range: 0 - 360DEG
 C Interval: 90.0DEG
 Test Speed: HIGH
 Temperature:25.3DEG
 Operators:
 Test Date:2018-07-11

γ Range: 0 - 90DEG
 γ Interval: 1.0DEG
 Test System:EVERFINE GO-2000A_V1 SYSTEM V2.0.362
 Humidity:65.0%
 Test Distance:9.690m [K=1.0000]
 Remarks:

ISOLUX DIAGRAM

Test:U:24.00V I:0.3636A P:8.726W PF:1.000 Freq:49.99Hz Lamp Flux:853.206x1 lm		
NAME: Flexible LED Strip	TYPE:	WEIGHT:
SPEC.:SMD2216,4000K,Ra>90,Step 3	DIM.:	SERIAL No.:
MFR.:	SUR.:	Shielding Angle:



C Range: 0 - 360DEG
 C Interval: 90.0DEG
 Test Speed: HIGH
 Temperature:25.3DEG
 Operators:
 Test Date:2018-07-11

γ Range: 0 - 90DEG
 γ Interval: 1.0DEG
 Test System:EVERFINE GO-2000A_V1 SYSTEM V2.0.362
 Humidity:65.0%
 Test Distance:9.690m [K=1.0000]
 Remarks:

LED Avg.L Report

Test:U:24.00V I:0.3636A P:8.726W PF:1.000 Freq:49.99Hz Lamp Flux:853.206x1 lm		
NAME: Flexible LED Strip	TYPE:	WEIGHT:
SPEC.:SMD2216,4000K,Ra>90,Step 3	DIM.:	SERIAL No.:
MFR.:	SUR.:	Shielding Angle:

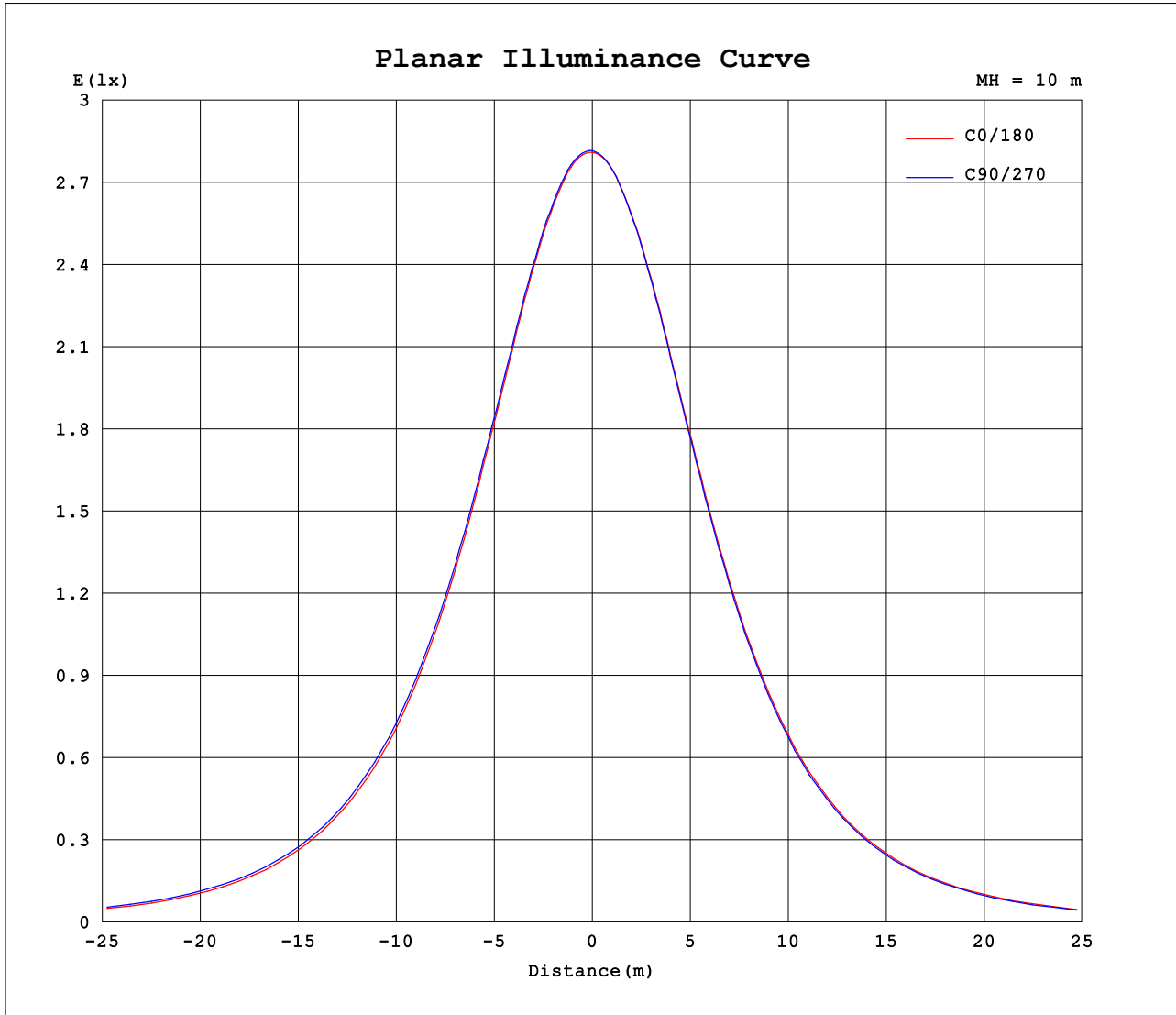
AvgL	cd/m2
L_0~180 (65) av	2079
L_0~180 (75) av	1837
L_0~180 (85) av	1383
L_90~270 (65) av	2115
L_90~270 (75) av	1899
L_90~270 (85) av	1585
L_45 (65) av	2098
L_45 (75) av	1872
L_45 (85) av	1504

Standard: GB/T 29293-2012

C Range: 0 - 360DEG
 C Interval: 90.0DEG
 Test Speed: HIGH
 Temperature:25.3DEG
 Operators:
 Test Date:2018-07-11

γ Range: 0 - 90DEG
 γ Interval: 1.0DEG
 Test System:EVERFINE GO-2000A_V1 SYSTEM V2.0.362
 Humidity:65.0%
 Test Distance:9.690m [K=1.0000]
 Remarks:

Planar Illuminance Curve



C Range: 0 - 360DEG
 C Interval: 90.0DEG
 Test Speed: HIGH
 Temperature: 25.3DEG
 Operators:
 Test Date: 2018-07-11

γ Range: 0 - 90DEG
 γ Interval: 1.0DEG
 Test System: EVERFINE GO-2000A_V1 SYSTEM V2.0.362
 Humidity: 65.0%
 Test Distance: 9.690m [K=1.0000]
 Remarks:

