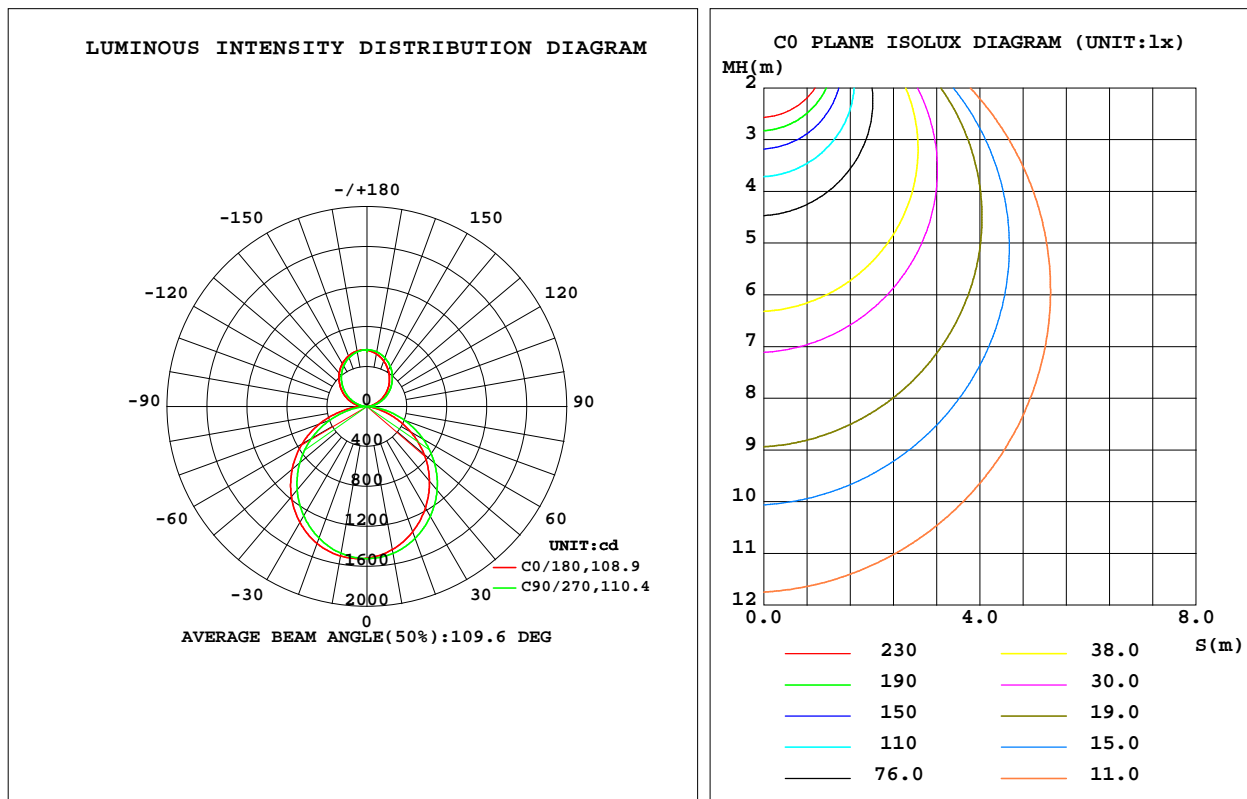


## LUMINAIRE PHOTOMETRIC TEST REPORT

Test:U:220.0V I:0.2517A P:54.40W PF:0.9680 Freq:50.00Hz Lamp Flux:5759.66x1 lm		
NAME: LLS-BH7977FD1200	TYPE:	WEIGHT:
SPEC.:LLS-BH7977FD1200	DIM.: 1200*79*77mm	SERIAL No.:
MFR.: COLORS	SUR.:1200*79mm	Shielding Angle:

DATA OF LAMP		PHOTOMETRIC DATA Eff: 105.88 lm/W			
MODEL	LLS-BH7977FD1200	I <sub>max</sub> (cd)	1526	S/MH(C0/180)	1.16
NOMINAL POWER(W)	54.4	LOR(%)	100.0	S/MH(C90/270)	1.24
RATED VOLTAGE(V)	220.0	TOTAL FLUX(lm)	5759.7	h UP,DN(C0-180)	13.6,36.3
NOMINAL FLUX(lm)	5759.66	CIE CLASS	SEMI-D.	h UP,DN(C180-360)	13.5,36.6
LAMPS INSIDE	1	h up(%)	27.1	CIBSE SHR NOM	1.25
TEST VOLTAGE(V)	220.0	h down(%)	72.9	CIBSE SHR MAX	1.35



C Range: 0 - 360DEG  
C Interval: 5.0DEG  
Test Speed: MEDIUM  
Temperature:25.3DEG  
Operators:JYH  
Test Date:

Range: 0 - 180DEG  
Interval: 0.5DEG  
Test System:EVERFINE GO-2000\_V1 SYSTEM V2.0.362  
Humidity:65.0%  
Test Distance:10.000m [K=1.0000]  
Remarks:

## ZONAL FLUX DIAGRAM

### ZONAL FLUX DIAGRAM:

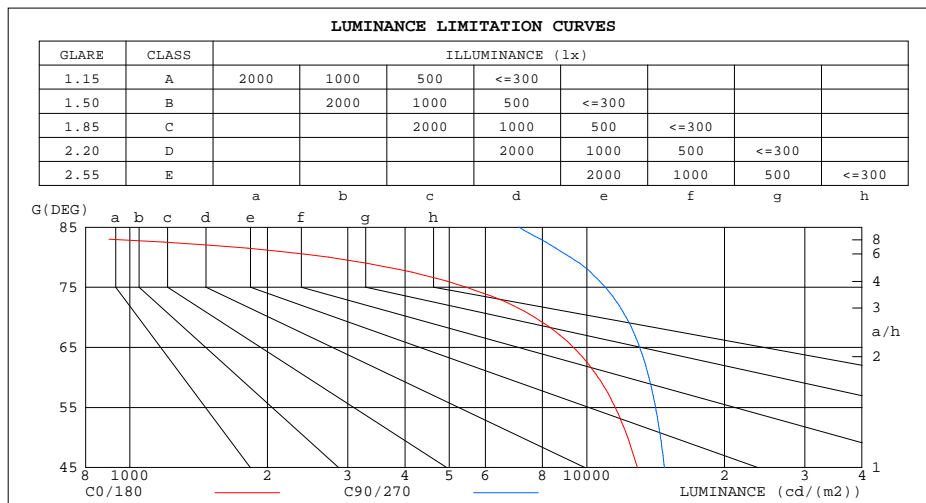
g	C0	C45	C90	C135	C180	C225	C270	C315	g	F zone	F total	%lum,lamp
10	1455	1478	1493	1504	1519	1505	1491	1477	0- 10	143.7	143.7	2.5,2.5
20	1336	1375	1406	1429	1460	1434	1403	1376	10- 20	410.1	553.9	9.62,9.62
30	1172	1225	1269	1299	1342	1300	1265	1227	20- 30	616.8	1171	20.3,20.3
40	974.0	1038	1093	1131	1178	1128	1088	1041	30- 40	737.5	1908	33.1,33.1
50	748.9	820.2	883.7	920.7	977.9	920.8	878.9	823.6	40- 50	757.7	2666	46.3,46.3
60	501.9	579.4	648.1	691.4	750.1	688.0	642.1	583.9	50- 60	677.2	3343	58,58
70	249.6	323.7	395.2	434.9	501.0	436.5	386.9	331.8	60- 70	505.9	3849	66.8,66.8
80	44.80	96.76	151.4	185.6	244.6	189.2	145.7	101.5	70- 80	275.5	4124	71.6,71.6
90	4.971	7.678	6.148	30.26	76.63	23.02	3.571	5.243	80- 90	73.10	4198	72.9,72.9
100	33.25	52.03	57.19	83.15	109.5	70.32	54.89	47.62	90-100	38.48	4236	73.5,73.5
110	101.1	133.7	142.1	166.9	195.5	155.5	141.7	124.9	100-110	109.3	4345	75.4,75.4
120	185.9	220.9	232.2	254.4	280.2	243.4	233.7	212.2	110-120	187.8	4533	78.7,78.7
130	273.1	303.5	317.7	336.5	360.0	327.2	320.2	298.2	120-130	247.1	4780	83,83
140	353.0	386.2	395.8	412.1	435.3	406.8	399.9	376.1	130-140	276.0	5056	87.8,87.8
150	425.5	455.2	466.8	477.5	496.2	474.1	470.0	447.9	140-150	270.3	5326	92.5,92.5
160	488.3	511.8	521.5	528.8	540.7	525.9	522.7	505.9	150-160	227.4	5554	96.4,96.4
170	537.1	553.0	556.9	561.1	565.7	559.8	557.3	548.3	160-170	152.1	5706	99.1,99.1
180	548.6	548.6	548.6	548.6	548.6	548.6	548.6	548.6	170-180	53.64	5760	100,100
DEG	LUMINOUS INTENSITY:cd									UNIT:lm		

C Range: 0 - 360DEG  
 C Interval: 5.0DEG  
 Test Speed: MEDIUM  
 Temperature:25.3DEG  
 Operators:JYH  
 Test Date:

g Range: 0 - 180DEG  
 g Interval: 0.5DEG  
 Test System:EVERFINE GO-2000\_V1 SYSTEM V2.0.362  
 Humidity:65.0%  
 Test Distance:10.000m [K=1.0000]  
 Remarks:

LUMINANCE LIMITATION CURVES

Test:U:220.0V I:0.2517A P:54.40W PF:0.9680 Freq:50.00Hz Lamp Flux:5759.66x1 lm		
NAME: LLS-BH7977FD1200	TYPE:	WEIGHT:
SPEC.:LLS-BH7977FD1200	DIM.: 1200*79*77mm	SERIAL No.:
MFR.: COLORS	SUR.:1200*79mm	Shielding Angle:



LUMINANCE cd/(m2)		
G( DEG)	C0/180	C90/270
85	514	7104
80	2721	9196
75	5449	10983
70	7697	12190
65	9345	13057
60	10589	13673
55	11542	14137
50	12290	14501
45	12901	14792

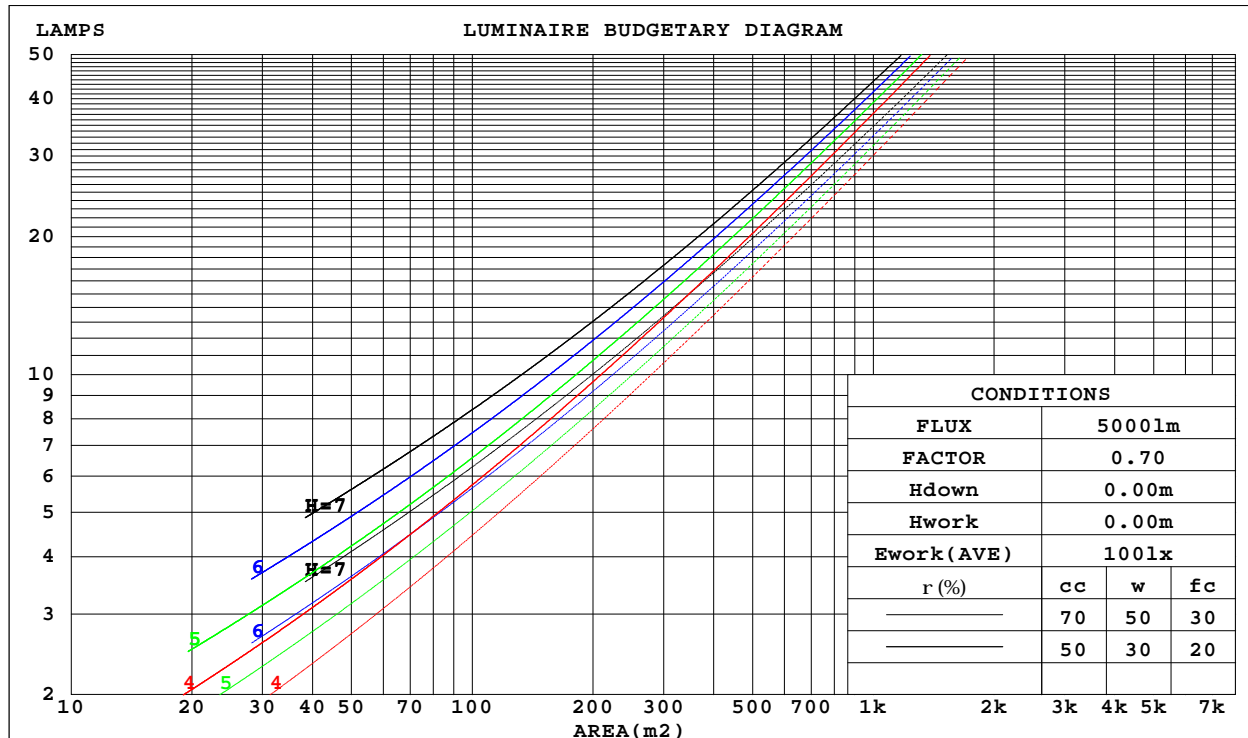
C Range: 0 - 360DEG  
C Interval: 5.0DEG  
Test Speed: MEDIUM  
Temperature:25.3DEG  
Operators:JYH  
Test Date:

g Range: 0 - 180DEG  
g Interval: 0.5DEG  
Test System:EVERFINE GO-2000\_V1 SYSTEM V2.0.362  
Humidity:65.0%  
Test Distance:10.000m [K=1.0000]  
Remarks:

## CU AND LUMINAIRE BUDGETARY ESTIMATE DIAGRAM

Test:U:220.0V I:0.2517A P:54.40W PF:0.9680 Freq:50.00Hz Lamp Flux:5759.66x1 lm		
NAME: LLS-BH7977FD1200	TYPE:	WEIGHT:
SPEC.:LLS-BH7977FD1200	DIM.: 1200*79*77mm	SERIAL No.:
MFR.: COLORS	SUR.:1200*79mm	Shielding Angle:

r <sub>cc</sub>	80%			70%			50%			30%			10%			0
r <sub>w</sub>	50%	30%	10%	50%	30%	10%	50%	30%	10%	50%	30%	10%	50%	30%	10%	0
r <sub>fc</sub>	20%			20%			20%			20%			20%			0
RCR	RCR:Room Cavity Ratio			Coefficients of Utilization(CU)												
0.0	1.13	1.13	1.13	1.07	1.07	1.07	.96	.96	.96	.86	.86	.86	.77	.77	.77	.73
1.0	.98	.94	.91	.93	.90	.87	.84	.81	.79	.76	.74	.72	.68	.66	.65	.61
2.0	.86	.79	.74	.82	.76	.71	.74	.69	.65	.66	.63	.60	.60	.57	.55	.51
3.0	.75	.68	.61	.72	.65	.59	.65	.59	.55	.59	.54	.50	.53	.49	.46	.43
4.0	.67	.58	.52	.64	.56	.50	.58	.51	.47	.52	.47	.43	.47	.43	.40	.37
5.0	.59	.51	.45	.57	.49	.43	.52	.45	.40	.47	.42	.37	.42	.38	.35	.32
6.0	.53	.45	.39	.51	.43	.38	.47	.40	.35	.42	.37	.33	.38	.34	.30	.28
7.0	.48	.40	.34	.46	.38	.33	.42	.36	.31	.39	.33	.29	.35	.30	.27	.25
8.0	.44	.36	.30	.42	.35	.29	.39	.32	.28	.35	.30	.26	.32	.28	.24	.22
9.0	.40	.32	.27	.39	.31	.26	.35	.29	.25	.32	.27	.23	.30	.25	.22	.20
10.0	.37	.29	.24	.35	.28	.24	.33	.27	.22	.30	.25	.21	.28	.23	.20	.18



C Range: 0 - 360DEG  
C Interval: 5.0DEG  
Test Speed: MEDIUM  
Temperature:25.3DEG  
Operators:JYH  
Test Date:

g Range: 0 - 180DEG  
g Interval: 0.5DEG  
Test System:EVERFINE GO-2000\_V1 SYSTEM V2.0.362  
Humidity:65.0%  
Test Distance:10.000m [K=1.0000]  
Remarks:

WEC AND CCEC

Test:U:220.0V I:0.2517A P:54.40W PF:0.9680 Freq:50.00Hz Lamp Flux:5759.66x1 lm		
NAME: LLS-BH7977FD1200	TYPE:	WEIGHT:
SPEC.:LLS-BH7977FD1200	DIM.: 1200*79*77mm	SERIAL No.:
MFR.: COLORS	SUR.:1200*79mm	Shielding Angle:

rcc	80%			70%			50%			30%			10%			0
rw	50%	30%	10%	50%	30%	10%	50%	30%	10%	50%	30%	10%	50%	30%	10%	0
rfc	20%			20%			20%			20%			20%			0
RCR	RCR:Room Cavity Ratio						Wall Exitance Coefficients(WEC)									
0.0																
1.0	.292	.166	.053	.277	.158	.050	.248	.142	.045	.222	.128	.041	.198	.115	.037	
2.0	.274	.150	.046	.260	.143	.044	.235	.130	.041	.211	.118	.037	.189	.107	.034	
3.0	.254	.135	.040	.241	.129	.039	.218	.118	.036	.196	.108	.033	.176	.098	.030	
4.0	.235	.122	.036	.224	.117	.035	.202	.107	.032	.182	.098	.030	.164	.089	.027	
5.0	.218	.111	.032	.207	.106	.031	.188	.098	.029	.169	.089	.027	.153	.081	.024	
6.0	.202	.101	.029	.193	.097	.028	.175	.090	.026	.158	.082	.024	.142	.075	.022	
7.0	.188	.093	.026	.180	.090	.026	.163	.083	.024	.148	.076	.022	.133	.069	.020	
8.0	.176	.086	.024	.168	.083	.023	.153	.076	.022	.139	.070	.020	.125	.064	.019	
9.0	.165	.080	.022	.158	.077	.022	.144	.071	.020	.130	.065	.019	.118	.060	.017	
10.0	.156	.075	.021	.149	.072	.020	.136	.066	.019	.123	.061	.017	.111	.056	.016	

rcc	80%			70%			50%			30%			10%			0	
rw	50%	30%	10%	50%	30%	10%	50%	30%	10%	50%	30%	10%	50%	30%	10%	0	
rfc	20%			20%			20%			20%			20%			0	
RCR	RCR:Room Cavity Ratio						Ceiling Cavity Exitance Coefficients(CCEC)										
0.0	.397	.397	.397	.339	.339	.339	.232	.232	.232	.133	.133	.133	.043	.043	.043		
1.0	.387	.365	.344	.332	.313	.296	.227	.215	.205	.131	.125	.119	.042	.040	.039		
2.0	.380	.342	.310	.325	.294	.268	.223	.204	.187	.128	.118	.110	.041	.038	.036		
3.0	.372	.325	.287	.319	.280	.249	.219	.195	.175	.127	.114	.103	.041	.037	.034		
4.0	.365	.312	.272	.313	.270	.237	.215	.188	.167	.125	.110	.099	.040	.036	.032		
5.0	.358	.303	.262	.308	.262	.228	.212	.183	.161	.123	.107	.095	.040	.035	.031		
6.0	.352	.295	.254	.302	.255	.221	.208	.179	.156	.121	.105	.093	.039	.034	.031		
7.0	.345	.288	.248	.297	.250	.216	.205	.175	.153	.119	.103	.091	.039	.034	.030		
8.0	.339	.283	.244	.292	.245	.213	.202	.172	.151	.118	.102	.090	.038	.033	.030		
9.0	.334	.278	.241	.287	.241	.210	.199	.170	.149	.116	.100	.089	.038	.033	.029		
10.0	.328	.274	.238	.283	.238	.208	.196	.167	.148	.114	.099	.088	.037	.033	.029		

C Range: 0 - 360DEG  
C Interval: 5.0DEG  
Test Speed: MEDIUM  
Temperature:25.3DEG  
Operators:JYH  
Test Date:

g Range: 0 - 180DEG  
g Interval: 0.5DEG  
Test System:EVERFINE GO-2000\_V1 SYSTEM V2.0.362  
Humidity:65.0%  
Test Distance:10.000m [K=1.0000]  
Remarks:

UGR(Unified Glare Rating) Table

Test:U:220.0V I:0.2517A P:54.40W PF:0.9680 Freq:50.00Hz Lamp Flux:5759.66x1 lm										
NAME: LLS-BH7977FD1200						TYPE:		WEIGHT:		
SPEC.:LLS-BH7977FD1200						DIM.: 1200*79*77mm		SERIAL No.:		
MFR.: COLORS						SUR.:1200*79mm		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	13.3	14.5	13.9	15.1	15.8	14.2	15.4	14.8	16.0	16.7
	3H	14.3	15.3	14.9	16.0	16.7	15.6	16.6	16.2	17.3
	4H	14.5	15.5	15.2	16.1	16.9	16.1	17.1	16.8	17.8
	6H	14.5	15.4	15.2	16.1	16.9	16.4	17.3	17.1	18.0
	8H	14.4	15.3	15.1	16.0	16.8	16.5	17.4	17.2	18.1
	12H	14.4	15.2	15.1	15.9	16.7	16.5	17.4	17.2	18.1
4H	2H	13.9	14.8	14.5	15.5	16.3	14.5	15.5	15.2	16.2
	3H	15.0	15.8	15.7	16.5	17.3	16.1	16.9	16.8	17.6
	4H	15.3	16.0	16.0	16.7	17.6	16.7	17.4	17.4	18.2
	6H	15.3	16.0	16.1	16.7	17.6	17.1	17.8	17.8	18.5
	8H	15.3	15.9	16.0	16.6	17.5	17.2	17.8	18.0	18.6
	12H	15.2	15.7	16.0	16.5	17.4	17.2	17.8	18.0	18.6
8H	4H	15.4	16.0	16.2	16.8	17.7	16.7	17.3	17.5	18.1
	6H	15.5	16.0	16.3	16.8	17.8	17.2	17.7	18.0	18.5
	8H	15.5	15.9	16.3	16.7	17.7	17.4	17.8	18.2	18.6
	12H	15.4	15.8	16.3	16.6	17.6	17.4	17.8	18.3	18.6
12H	4H	15.4	15.9	16.2	16.7	17.6	16.6	17.2	17.4	18.0
	6H	15.5	16.0	16.3	16.8	17.7	17.2	17.6	18.0	18.4
	8H	15.5	15.9	16.3	16.7	17.7	17.3	17.7	18.1	18.5
Variations with the observer position at spacings:										
S = 1.0H	+ 0.3 / - 0.4					+ 0.2 / - 0.2				
1.5H	+ 0.3 / - 0.5					+ 0.2 / - 0.3				
2.0H	+ 0.3 / - 0.6					+ 0.3 / - 0.4				

CIE Pub.117, 5760 lm Total Lamp Luminous Flux Correct (8log(F/F0) = 6.1)

C Range: 0 - 360DEG  
C Interval: 5.0DEG  
Test Speed: MEDIUM  
Temperature:25.3DEG  
Operators:JYH  
Test Date:

g Range: 0 - 180DEG  
g Interval: 0.5DEG  
Test System:EVERFINE GO-2000\_V1 SYSTEM V2.0.362  
Humidity:65.0%  
Test Distance:10.000m [K=1.0000]  
Remarks:

UTILIZATION FACTORS TABLE

Test:U:220.0V I:0.2517A P:54.40W PF:0.9680 Freq:50.00Hz Lamp Flux:5759.66x1 lm		
NAME: LLS-BH7977FD1200	TYPE:	WEIGHT:
SPEC.:LLS-BH7977FD1200	DIM.: 1200*79*77mm	SERIAL No.:
MFR.: COLORS	SUR.:1200*79mm	Shielding Angle:

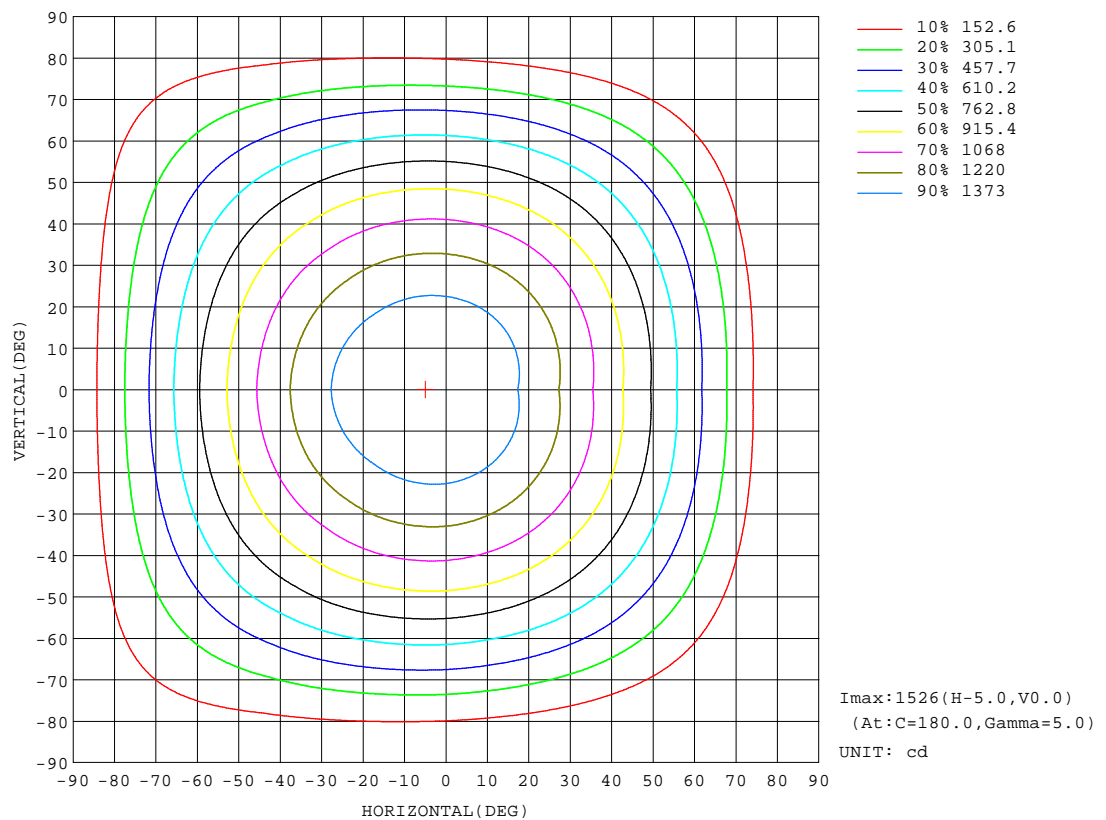
REFLECTANCE										
Ceiling	0.8	0.8	0.8	0.7	0.7	0.7	0.5	0.5	0.5	0
Walls	0.7	0.5	0.3	0.7	0.5	0.3	0.7	0.5	0.3	0
Working plane	0.2	0.2	0.2	0.2	0.2	0.2	0.2	0.2	0.2	0
ROOM INDEX	UTILIZATION FACTORS(PERCENT) $k(RI) \times RCR = 5$									
k = 0.60	50	39	33	49	38	32	46	37	31	24
0.80	60	49	41	58	47	41	54	45	39	30
1.00	68	57	50	66	55	49	61	54	46	37
1.25	75	65	57	72	62	56	66	59	53	42
1.50	80	70	63	77	68	61	70	63	58	46
2.00	87	78	72	83	75	69	76	70	65	51
2.50	91	83	77	87	80	74	79	74	69	54
3.00	95	88	82	90	84	79	82	77	73	57
4.00	99	93	88	94	89	85	85	81	78	61
5.00	102	96	92	97	92	88	87	84	81	63
ROOM INDEX	UF(total)									Direct
According to DIN EN 13032-2 2004			Suspended					SHRNOM = 1.25		

C Range: 0 - 360DEG  
C Interval: 5.0DEG  
Test Speed: MEDIUM  
Temperature:25.3DEG  
Operators:JYH  
Test Date:

g Range: 0 - 180DEG  
g Interval: 0.5DEG  
Test System:EVERFINE GO-2000\_V1 SYSTEM V2.0.362  
Humidity:65.0%  
Test Distance:10.000m [K=1.0000]  
Remarks:

### ISOCANDELA DIAGRAM

Test:U:220.0V I:0.2517A P:54.40W PF:0.9680 Freq:50.00Hz Lamp Flux:5759.66x1 lm		
NAME: LLS-BH7977FD1200	TYPE:	WEIGHT:
SPEC.:LLS-BH7977FD1200	DIM.: 1200*79*77mm	SERIAL No.:
MFR.: COLORS	SUR.:1200*79mm	Shielding Angle:



C Range: 0 - 360DEG  
C Interval: 5.0DEG  
Test Speed: MEDIUM  
Temperature:25.3DEG  
Operators:JYH  
Test Date:

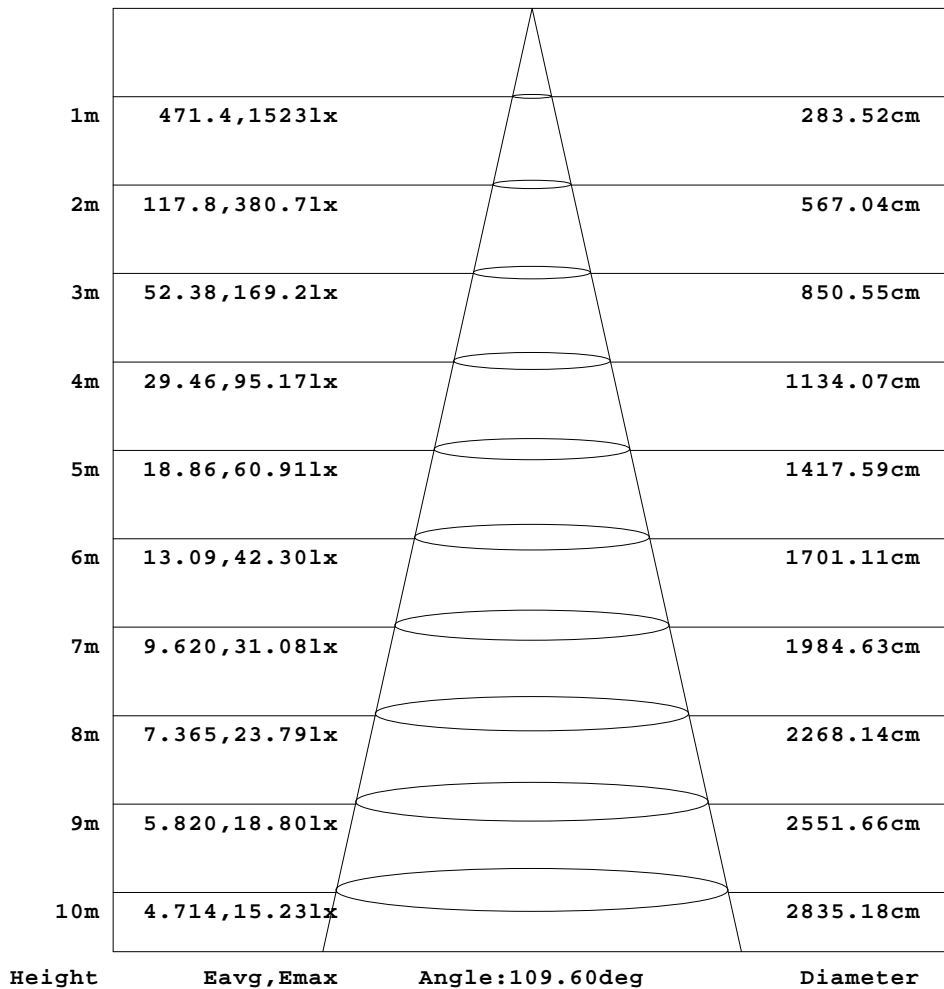
deg Range: 0 - 180DEG  
Interval: 0.5DEG  
Test System:EVERFINE GO-2000\_V1 SYSTEM V2.0.362  
Humidity:65.0%  
Test Distance:10.000m [K=1.0000]  
Remarks:



### AAI Figure

Test:U:220.0V I:0.2517A P:54.40W PF:0.9680 Freq:50.00Hz Lamp Flux:5759.66x1 lm		
NAME: LLS-BH7977FD1200	TYPE:	WEIGHT:
SPEC.:LLS-BH7977FD1200	DIM.: 1200*79*77mm	SERIAL No.:
MFR.: COLORS	SUR.:1200*79mm	Shielding Angle:

Flux out:3020 lm



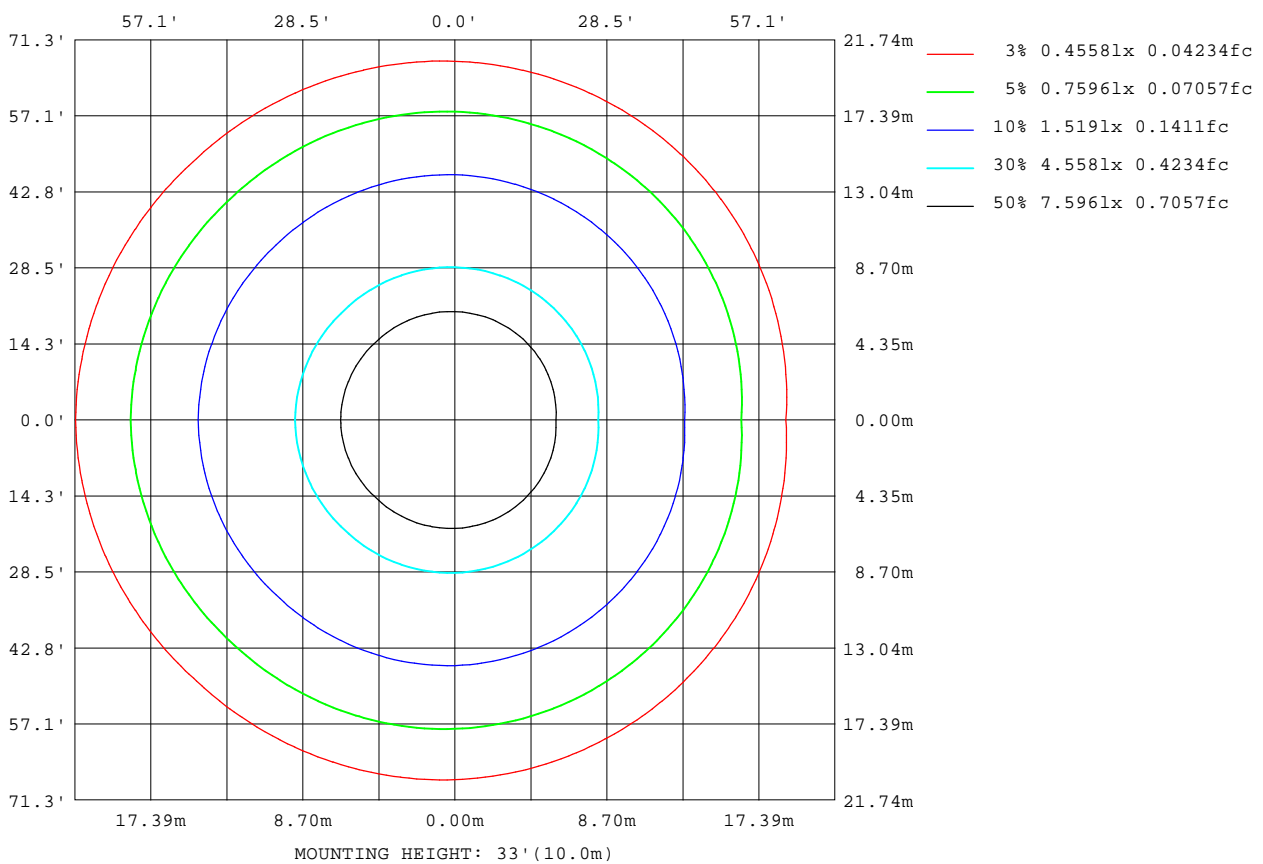
Note:The Curves indicate the illuminated area and the average illumination when the luminaire is at different distance.

C Range: 0 - 360DEG  
 C Interval: 5.0DEG  
 Test Speed: MEDIUM  
 Temperature:25.3DEG  
 Operators:JYH  
 Test Date:

g Range: 0 - 180DEG  
 g Interval: 0.5DEG  
 Test System:EVERFINE GO-2000\_V1 SYSTEM V2.0.362  
 Humidity:65.0%  
 Test Distance:10.000m [K=1.0000]  
 Remarks:

### ISOLUX DIAGRAM

Test:U:220.0V I:0.2517A P:54.40W PF:0.9680 Freq:50.00Hz Lamp Flux:5759.66x1 lm		
NAME: LLS-BH7977FD1200	TYPE:	WEIGHT:
SPEC.:LLS-BH7977FD1200	DIM.: 1200*79*77mm	SERIAL No.:
MFR.: COLORS	SUR.:1200*79mm	Shielding Angle:



C Range: 0 - 360DEG  
 C Interval: 5.0DEG  
 Test Speed: MEDIUM  
 Temperature:25.3DEG  
 Operators:JYH  
 Test Date:

g Range: 0 - 180DEG  
 g Interval: 0.5DEG  
 Test System:EVERFINE GO-2000\_V1 SYSTEM V2.0.362  
 Humidity:65.0%  
 Test Distance:10.000m [K=1.0000]  
 Remarks:

### LED Avg.L Report

Test:U:220.0V I:0.2517A P:54.40W PF:0.9680 Freq:50.00Hz Lamp Flux:5759.66x1 lm		
NAME: LLS-BH7977FD1200	TYPE:	WEIGHT:
SPEC.:LLS-BH7977FD1200	DIM.: 1200*79*77mm	SERIAL No.:
MFR.: COLORS	SUR.:1200*79mm	Shielding Angle:

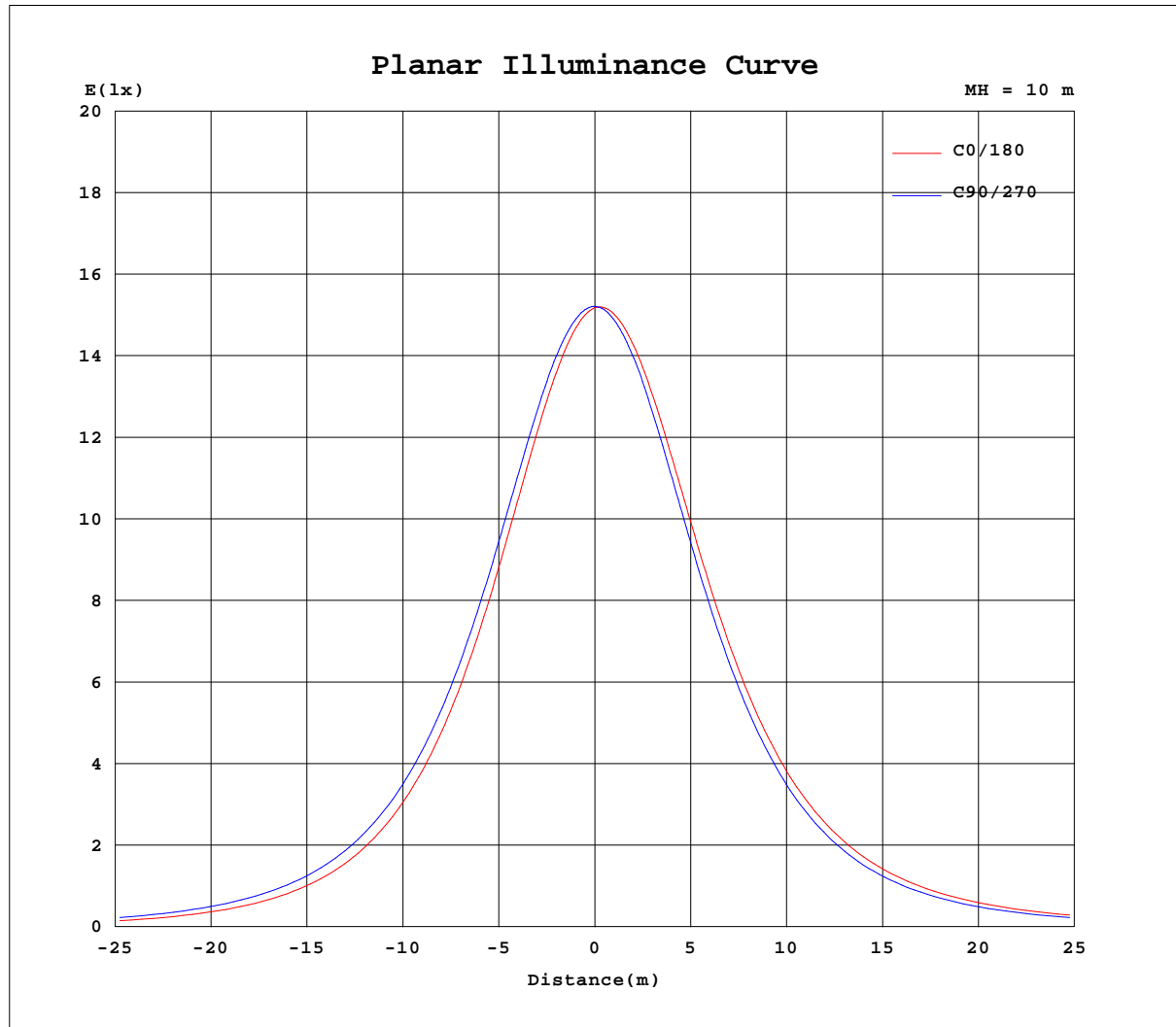
AvgL	cd/m2
L_0~180(65)av	12506
L_0~180(75)av	10250
L_0~180(85)av	8804
L_90~270(65)av	12975
L_90~270(75)av	10818
L_90~270(85)av	6815
L_45(65)av	12721
L_45(75)av	10477
L_45(85)av	6509

Standard: GB/T 29293-2012

C Range: 0 - 360DEG  
C Interval: 5.0DEG  
Test Speed: MEDIUM  
Temperature:25.3DEG  
Operators:JYH  
Test Date:

g Range: 0 - 180DEG  
g Interval: 0.5DEG  
Test System:EVERFINE GO-2000\_V1 SYSTEM V2.0.362  
Humidity:65.0%  
Test Distance:10.000m [K=1.0000]  
Remarks:

### Planar Illuminance Curve



C Range: 0 - 360DEG  
C Interval: 5.0DEG  
Test Speed: MEDIUM  
Temperature: 25.3DEG  
Operators: JYH  
Test Date:

Range: 0 - 180DEG  
Interval: 0.5DEG  
Test System: EVERFINE GO-2000\_V1 SYSTEM V2.0.362  
Humidity: 65.0%  
Test Distance: 10.000m [K=1.0000]  
Remarks:

LUMINOUS DISTRIBUTION INTENSITY DATA

Test:U:220.0V I:0.2517A P:54.40W PF:0.9680 Freq:50.00Hz Lamp Flux:5759.66x1 lm		
NAME: LLS-BH7977FD1200	TYPE:	WEIGHT:
SPEC.:LLS-BH7977FD1200	DIM.: 1200*79*77mm	SERIAL No.:
MFR.: COLORS	SUR.:1200*79mm	Shielding Angle:

Table--1

UNIT: cd

C(DEG) g (DEG)	0	5	10	15	20	25	30	35	40	45	50	55	60	65	70	75	80	85	90
0	1519	1520	1520	1521	1521	1522	1522	1522	1522	1523	1523	1523	1523	1522	1522	1522	1522	1522	1522
5	1494	1496	1498	1500	1501	1503	1504	1505	1507	1508	1509	1510	1510	1511	1512	1512	1513	1514	1514
10	1455	1458	1461	1463	1466	1468	1471	1473	1475	1478	1480	1481	1483	1485	1487	1488	1490	1492	1493
15	1402	1406	1409	1413	1417	1420	1424	1427	1430	1433	1436	1439	1441	1444	1447	1449	1451	1454	1456
20	1336	1340	1345	1350	1354	1359	1363	1367	1371	1375	1379	1383	1386	1390	1393	1396	1400	1403	1406
25	1259	1264	1270	1275	1280	1285	1290	1295	1300	1305	1310	1314	1319	1323	1327	1331	1335	1339	1343
30	1172	1178	1184	1191	1197	1202	1208	1214	1219	1225	1230	1236	1241	1246	1251	1256	1260	1265	1269
35	1077	1084	1091	1097	1104	1110	1117	1123	1129	1135	1142	1147	1153	1159	1165	1170	1175	1181	1186
40	974	981	989	996	1003	1010	1017	1024	1031	1038	1044	1051	1058	1064	1070	1076	1082	1087	1093
45	865	873	880	888	895	903	910	917	925	932	939	946	953	960	967	973	980	986	992
50	749	757	765	774	782	789	797	805	813	820	828	836	843	850	858	865	871	878	884
55	628	636	645	653	661	669	678	686	694	701	710	718	726	733	741	748	755	762	769
60	502	511	520	529	537	546	555	563	571	579	588	596	604	612	620	627	634	641	648
65	374	384	393	402	411	419	428	437	445	453	462	470	479	487	495	502	509	516	523
70	250	258	266	275	283	291	299	307	316	324	332	341	349	358	366	373	381	388	395
75	134	141	149	157	165	172	180	187	195	203	211	219	226	234	242	249	256	263	269
80	44.8	50.4	56.1	61.8	67.6	73.3	79.1	85.0	90.9	96.8	103	109	116	122	128	134	140	146	151
85	4.24	5.26	6.51	8.00	9.73	11.7	13.9	16.3	19.0	21.9	25.6	29.5	33.6	37.7	42.0	46.2	50.5	54.6	58.7
90	4.97	5.48	5.94	6.34	6.70	7.00	7.25	7.44	7.59	7.68	7.17	6.65	6.16	5.75	5.44	5.28	5.32	5.60	6.15
95	13.1	14.9	16.6	18.1	19.5	20.8	21.9	22.8	23.7	24.3	24.2	24.1	23.8	23.6	23.4	23.3	23.4	23.6	24.1
100	33.2	36.0	38.6	41.0	43.3	45.4	47.3	49.0	50.6	52.0	52.6	53.1	53.6	54.0	54.4	54.9	55.5	56.2	57.2
105	63.1	66.3	69.3	72.2	74.9	77.5	80.0	82.3	84.4	86.5	87.8	89.1	90.3	91.5	92.6	93.8	95.1	96.4	97.9
110	101	106	110	115	119	122	125	129	131	134	135	136	137	138	139	139	140	141	142
115	143	148	152	157	161	165	168	171	174	177	179	180	181	182	183	184	185	186	187
120	186	191	196	200	204	208	212	215	218	221	223	224	226	227	228	229	230	231	232
125	231	235	240	244	248	251	255	258	261	263	265	267	268	270	271	272	273	274	276
130	273	277	281	285	289	292	295	298	301	304	306	307	309	311	312	314	315	316	318
135	314	318	323	327	330	334	337	340	343	346	348	349	351	352	353	355	356	357	358
140	353	358	362	367	371	374	378	381	384	386	388	389	391	392	392	393	394	395	396
145	390	395	399	403	407	411	414	417	420	422	424	426	428	429	430	431	432	433	434
150	425	430	434	437	441	444	447	450	453	455	457	459	460	462	463	464	465	466	467
155	458	462	466	469	472	475	478	481	483	485	487	489	490	491	492	493	494	495	496
160	488	492	495	498	500	503	505	508	510	512	513	515	516	517	518	519	520	521	521
165	515	518	520	523	525	527	529	531	533	534	536	537	538	539	539	540	541	541	542
170	537	539	542	544	546	547	549	551	552	553	554	554	555	556	556	556	556	557	557
175	554	556	557	559	560	561	563	564	565	565	566	566	566	566	566	567	567	566	566
180	549	549	549	549	549	549	549	549	549	549	549	549	549	549	549	549	549	549	549

C Range: 0 - 360DEG  
C Interval: 5.0DEG  
Test Speed: MEDIUM  
Temperature:25.3DEG  
Operators:JYH  
Test Date:

g Range: 0 - 180DEG  
g Interval: 0.5DEG  
Test System:EVERFINE GO-2000\_V1 SYSTEM V2.0.362  
Humidity:65.0%  
Test Distance:10.000m [K=1.0000]  
Remarks:

LUMINOUS DISTRIBUTION INTENSITY DATA

Test:U:220.0V I:0.2517A P:54.40W PF:0.9680 Freq:50.00Hz Lamp Flux:5759.66x1 lm		
NAME: LLS-BH7977FD1200	TYPE:	WEIGHT:
SPEC.:LLS-BH7977FD1200	DIM.: 1200*79*77mm	SERIAL No.:
MFR.: COLORS	SUR.:1200*79mm	Shielding Angle:

Table--2

UNIT: cd

C(DEC) g (DEC)	95	100	105	110	115	120	125	130	135	140	145	150	155	160	165	170	175	180	185
0	1522	1522	1522	1522	1522	1522	1522	1521	1521	1521	1521	1520	1520	1520	1519	1519	1519	1519	1519
5	1515	1516	1516	1517	1517	1518	1518	1519	1520	1521	1521	1522	1523	1524	1524	1525	1525	1526	1525
10	1494	1495	1497	1498	1499	1500	1501	1502	1504	1506	1508	1510	1512	1514	1515	1517	1518	1519	1518
15	1458	1460	1462	1464	1466	1468	1470	1472	1474	1478	1481	1484	1487	1490	1492	1494	1496	1497	1496
20	1408	1411	1413	1416	1419	1421	1424	1426	1429	1433	1437	1442	1445	1449	1453	1455	1458	1460	1459
25	1346	1349	1352	1355	1358	1361	1364	1367	1370	1375	1380	1386	1390	1395	1399	1403	1405	1407	1406
30	1273	1276	1280	1283	1286	1289	1293	1296	1299	1305	1311	1317	1323	1328	1332	1336	1340	1342	1340
35	1190	1194	1199	1203	1207	1211	1215	1219	1223	1229	1235	1241	1246	1251	1256	1260	1263	1265	1262
40	1097	1102	1106	1110	1114	1118	1122	1126	1131	1137	1144	1151	1157	1163	1168	1172	1175	1178	1175
45	996	1000	1004	1008	1012	1016	1019	1023	1028	1035	1042	1050	1057	1063	1069	1074	1078	1081	1079
50	888	893	897	901	904	908	912	916	921	928	936	944	952	959	965	970	975	978	975
55	774	778	783	787	791	795	799	804	808	816	824	832	840	847	854	859	864	867	864
60	653	658	663	668	673	677	682	687	691	700	708	716	724	731	737	743	747	750	747
65	528	533	537	541	546	550	554	559	563	572	581	590	598	606	613	619	624	628	624
70	400	405	409	413	417	422	426	430	435	444	453	462	470	478	486	492	497	501	498
75	274	278	282	286	290	293	297	301	306	314	323	331	340	347	354	361	366	369	366
80	155	159	163	166	170	174	177	181	186	193	201	209	217	224	231	237	241	245	242
85	61.2	63.7	66.1	68.5	71.1	73.8	76.7	79.9	83.5	91.0	98.7	106	114	121	127	133	138	141	138
90	7.62	9.41	11.5	13.9	16.6	19.6	22.9	26.4	30.3	36.5	42.9	49.3	55.4	61.1	66.2	70.7	74.2	76.6	73.2
95	26.0	28.1	30.4	32.9	35.6	38.4	41.3	44.3	47.3	50.9	54.4	57.8	60.9	63.7	66.0	67.9	69.3	70.0	67.4
100	59.4	61.9	64.5	67.4	70.4	73.4	76.6	79.9	83.1	87.3	91.3	95.2	98.8	102	105	107	109	110	107
105	100	103	106	109	111	115	118	121	124	128	133	137	141	144	147	149	151	152	149
110	144	147	149	152	155	158	161	164	167	171	175	180	183	187	190	192	194	195	193
115	190	192	194	197	200	202	205	208	211	215	219	223	227	230	233	235	237	238	236
120	234	236	239	241	244	246	249	252	254	258	262	266	269	273	275	278	279	280	278
125	278	280	282	284	286	289	291	294	296	300	304	307	311	314	316	318	320	321	318
130	320	321	323	325	328	330	332	334	337	340	343	347	350	353	355	357	359	360	358
135	360	361	363	365	367	369	371	373	375	379	382	385	388	391	393	395	396	397	395
140	397	399	400	402	404	406	408	410	412	415	419	422	425	428	430	433	434	435	433
145	436	437	438	439	441	442	444	445	447	450	452	455	458	461	463	465	466	467	466
150	468	469	470	471	472	474	475	476	478	480	483	485	488	490	492	494	495	496	495
155	497	498	499	500	501	502	503	504	505	508	510	512	514	516	517	519	520	521	519
160	522	523	524	525	525	526	527	528	529	530	532	534	535	537	538	539	540	541	540
165	542	543	544	544	545	546	546	547	548	549	550	551	552	553	554	555	556	556	555
170	557	558	558	559	559	560	560	561	561	562	562	563	564	564	565	565	565	566	565
175	567	567	567	567	568	568	568	568	568	569	569	569	569	569	569	569	569	568	568
180	549	549	549	549	549	549	549	549	549	549	549	549	549	549	549	549	549	549	549

C Range: 0 - 360DEG  
C Interval: 5.0DEG  
Test Speed: MEDIUM  
Temperature:25.3DEG  
Operators:JYH  
Test Date:

g Range: 0 - 180DEG  
g Interval: 0.5DEG  
Test System:EVERFINE GO-2000\_V1 SYSTEM V2.0.362  
Humidity:65.0%  
Test Distance:10.000m [K=1.0000]  
Remarks:

LUMINOUS DISTRIBUTION INTENSITY DATA

Test:U:220.0V I:0.2517A P:54.40W PF:0.9680 Freq:50.00Hz Lamp Flux:5759.66x1 lm		
NAME: LLS-BH7977FD1200	TYPE:	WEIGHT:
SPEC.:LLS-BH7977FD1200	DIM.: 1200*79*77mm	SERIAL No.:
MFR.: COLORS	SUR.:1200*79mm	Shielding Angle:

Table--3

UNIT: cd

C(DEG) g (DEG)	190	195	200	205	210	215	220	225	230	235	240	245	250	255	260	265	270	275	280
0	1520	1520	1520	1521	1521	1522	1522	1523	1523	1523	1523	1522	1522	1522	1522	1522	1522	1522	1522
5	1525	1525	1524	1524	1523	1523	1522	1521	1520	1520	1519	1518	1517	1516	1515	1515	1514	1513	1512
10	1517	1516	1515	1513	1511	1509	1507	1505	1504	1502	1500	1499	1497	1496	1494	1493	1491	1490	1488
15	1495	1493	1490	1488	1485	1482	1478	1475	1473	1470	1468	1466	1463	1461	1459	1456	1454	1452	1449
20	1457	1455	1452	1449	1445	1442	1438	1434	1430	1427	1423	1420	1416	1413	1410	1406	1403	1400	1397
25	1403	1400	1396	1392	1387	1382	1377	1371	1368	1364	1361	1357	1353	1350	1346	1343	1339	1336	1332
30	1337	1333	1328	1323	1318	1312	1306	1300	1296	1292	1288	1284	1280	1277	1273	1269	1265	1261	1257
35	1259	1255	1250	1244	1238	1232	1226	1219	1215	1211	1206	1202	1198	1194	1189	1185	1181	1177	1172
40	1171	1167	1161	1155	1149	1142	1135	1128	1124	1119	1114	1110	1106	1101	1097	1092	1088	1083	1079
45	1075	1070	1064	1058	1051	1043	1036	1028	1023	1019	1014	1009	1005	1000	996	991	986	981	976
50	971	965	959	952	945	937	929	921	916	911	907	902	897	893	888	884	879	874	868
55	859	854	847	840	832	824	816	807	802	797	792	787	783	778	773	768	763	757	752
60	742	736	729	722	714	705	697	688	683	677	672	667	662	657	652	647	642	636	631
65	619	613	607	599	590	582	573	564	558	553	548	542	537	532	527	522	517	511	505
70	493	487	480	472	464	455	446	436	431	425	419	414	408	403	398	392	387	381	376
75	362	356	350	343	335	327	318	310	304	298	293	288	282	277	272	267	261	256	251
80	238	233	227	220	213	205	197	189	184	179	174	169	164	160	155	150	146	141	136
85	134	128	122	115	108	100	92.7	85.2	80.9	76.9	73.2	69.6	66.2	63.0	59.9	56.9	53.9	50.4	47.0
90	68.6	63.2	57.2	50.6	43.7	36.7	29.7	23.0	19.4	16.2	13.4	10.9	8.83	7.06	5.61	4.45	3.57	3.14	2.93
95	64.2	60.5	56.4	52.1	47.5	43.0	38.5	34.1	31.7	29.6	27.7	26.1	24.6	23.5	22.5	21.7	21.1	20.9	20.8
100	103	99.3	94.9	90.1	85.2	80.1	75.1	70.3	67.7	65.4	63.3	61.5	59.8	58.4	57.1	55.9	54.9	54.0	53.1
105	146	142	137	132	127	122	117	112	109	107	105	103	102	100	99.1	97.9	96.8	95.4	94.1
110	189	185	181	176	171	165	160	156	153	151	149	148	147	145	144	143	142	140	138
115	232	228	224	219	214	209	204	200	198	196	194	193	192	190	189	188	187	185	184
120	274	270	266	262	257	252	248	243	242	240	239	238	237	236	235	235	234	232	230
125	315	311	307	303	299	294	290	286	284	283	282	281	281	280	279	279	278	276	274
130	355	351	347	343	339	335	331	327	326	325	324	323	323	322	322	321	320	318	316
135	392	389	386	382	378	375	371	367	366	365	365	364	364	363	363	362	361	359	357
140	431	428	425	421	417	414	410	407	406	405	404	403	403	402	402	401	400	398	395
145	464	461	458	455	452	449	446	443	442	442	441	440	440	439	439	438	437	435	432
150	493	490	488	485	482	480	477	474	473	473	473	472	472	472	471	471	470	468	466
155	518	516	514	511	509	506	504	502	501	501	501	500	500	500	500	499	498	497	495
160	538	537	535	533	531	530	528	526	525	525	525	525	524	524	524	523	523	521	520
165	554	553	552	551	550	548	547	546	545	545	545	544	544	544	543	543	542	541	540
170	565	564	564	563	562	561	561	560	560	559	559	559	559	558	558	558	557	557	556
175	568	568	568	568	568	568	568	568	568	568	568	568	568	567	567	567	567	566	566
180	549	549	549	549	549	549	549	549	549	549	549	549	549	549	549	549	549	549	549

C Range: 0 - 360DEG  
C Interval: 5.0DEG  
Test Speed: MEDIUM  
Temperature:25.3DEG  
Operators:JYH  
Test Date:

g Range: 0 - 180DEG  
g Interval: 0.5DEG  
Test System:EVERFINE GO-2000\_V1 SYSTEM V2.0.362  
Humidity:65.0%  
Test Distance:10.000m [K=1.0000]  
Remarks:

LUMINOUS DISTRIBUTION INTENSITY DATA

Test:U:220.0V I:0.2517A P:54.40W PF:0.9680 Freq:50.00Hz Lamp Flux:5759.66x1 lm		
NAME: LLS-BH7977FD1200	TYPE:	WEIGHT:
SPEC.:LLS-BH7977FD1200	DIM.: 1200*79*77mm	SERIAL No.:
MFR.: COLORS	SUR.:1200*79mm	Shielding Angle:

Table--4

UNIT: cd

C(DEG) g (DEG)	285	290	295	300	305	310	315	320	325	330	335	340	345	350	355				
0	1522	1522	1522	1522	1522	1521	1521	1521	1521	1521	1521	1520	1520	1520	1519				
5	1512	1511	1510	1509	1509	1508	1507	1506	1505	1503	1502	1501	1499	1498	1496				
10	1487	1485	1484	1482	1481	1479	1477	1475	1473	1471	1468	1466	1463	1461	1458				
15	1447	1445	1443	1440	1438	1435	1433	1430	1427	1424	1420	1417	1413	1409	1406				
20	1394	1391	1388	1385	1382	1379	1376	1372	1368	1364	1359	1355	1350	1346	1341				
25	1329	1325	1322	1318	1314	1310	1306	1302	1297	1292	1287	1282	1276	1270	1265				
30	1253	1249	1245	1241	1236	1231	1227	1221	1216	1210	1204	1198	1192	1186	1179				
35	1168	1163	1159	1154	1149	1144	1138	1132	1126	1120	1113	1106	1099	1092	1084				
40	1074	1069	1063	1058	1053	1047	1041	1034	1028	1021	1014	1006	999	991	982				
45	971	966	960	954	948	942	936	929	922	914	907	899	891	882	874				
50	862	856	850	844	837	831	824	816	809	801	793	785	776	767	758				
55	746	740	734	727	720	713	706	698	691	682	674	665	656	647	637				
60	625	618	612	605	598	591	584	576	568	559	550	541	532	522	512				
65	499	493	486	480	473	466	458	450	442	433	424	415	405	395	385				
70	370	364	358	352	346	339	332	324	316	307	299	289	280	270	260				
75	246	240	235	229	223	217	210	203	196	188	180	171	162	153	144				
80	132	127	122	117	112	107	102	95.9	90.0	84.0	77.9	71.6	65.1	58.5	51.7				
85	43.5	40.2	36.9	33.6	30.5	27.4	24.5	21.8	19.2	16.7	14.4	12.1	9.97	7.95	6.04				
90	2.96	3.15	3.38	3.76	4.23	4.73	5.24	5.31	5.35	5.37	5.36	5.33	5.28	5.20	5.10				
95	20.9	21.0	21.2	21.4	21.5	21.7	21.7	21.2	20.6	19.9	19.0	18.1	17.0	15.8	14.5				
100	52.3	51.6	50.8	50.1	49.3	48.5	47.6	46.4	45.0	43.6	42.1	40.5	38.8	37.1	35.2				
105	92.7	91.3	89.9	88.5	87.0	85.4	83.8	81.8	79.8	77.7	75.5	73.2	70.8	68.3	65.8				
110	137	135	133	131	129	127	125	123	120	118	115	112	110	107	104				
115	182	180	178	175	173	171	168	166	163	161	158	155	152	149	146				
120	227	225	223	220	218	215	212	210	207	204	201	198	195	192	189				
125	271	269	267	264	261	258	256	253	250	248	245	242	239	237	234				
130	314	312	309	306	304	301	298	296	293	290	287	285	282	279	276				
135	355	352	349	347	344	341	338	335	333	330	327	325	322	319	316				
140	393	390	388	385	382	379	376	373	371	368	366	363	361	358	355				
145	430	427	424	421	418	415	412	410	407	405	402	400	397	395	393				
150	464	461	459	456	453	451	448	445	443	440	438	435	433	430	428				
155	493	491	488	486	483	481	478	476	474	472	469	467	465	463	461				
160	518	516	514	512	510	508	506	504	502	500	498	496	494	492	490				
165	539	537	536	534	533	531	530	528	526	525	523	522	520	518	517				
170	555	554	553	552	551	549	548	547	546	545	544	542	541	540	538				
175	566	565	565	565	564	563	563	562	561	560	559	558	557	556	555				
180	549	549	549	549	549	549	549	549	549	549	549	549	549	549	549				

C Range: 0 - 360DEG  
C Interval: 5.0DEG  
Test Speed: MEDIUM  
Temperature:25.3DEG  
Operators:JYH  
Test Date:

g Range: 0 - 180DEG  
g Interval: 0.5DEG  
Test System:EVERFINE GO-2000\_V1 SYSTEM V2.0.362  
Humidity:65.0%  
Test Distance:10.000m [K=1.0000]  
Remarks: