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Nata

LumCAT: 3-1943-M
Luminaire: BJB 47.319.2011
Report No: GC20170406118
Test No: NT-0010
LampCAT: LUMILEDS LUXEON CoB 1205
Lamp flux(lm): 2428.0
Number of Lamps: 1
Length(mm): 86
Phm Type: C

Voltage(V): 217.5000
Current(A): 0.1030
Power (W): 20.4000
PF: 0.9070
Ballast type: DC
Width(mm): 86
Height(mm): 0

Photometric Results

Lumens(lm): 2269.21
Efficiency(%): 93.46%
Lumens(lm)/Power(W): 111.24
Central intensity(cd): 8154.954
Maximum intensity(cd): 8154.954
Angle of maximum intensity: C=0.0 γ =0.0
Beam Angle(50%Imax): [C0/180]Total=26.0
 [C90/270]Total=26.0
Field angle(10%Imax): [C0/180]Total=54.8
 [C90/270]Total=54.8
Maximum s/h(1/2): C0_180=0.44 C90_270=0.44
Maximum s/h(1/4): C0_180=0.43 C90_270=0.43
Up flux rate of lamp(%): 0.00%
Down flux rate of lamp(%): 93.46%
Up flux rate of LUM(%): - -
Down flux rate of LUM(%): 100.00%
CIE Type : Direct lighting
Output flux ratio in π solid angle : 98.727%

Equipment: gms1980
Temperature(°C): 25.0

Date: 2017/4/6
Humidity(%): 60.0%

Operator: NT07
Distance(m): 7.42

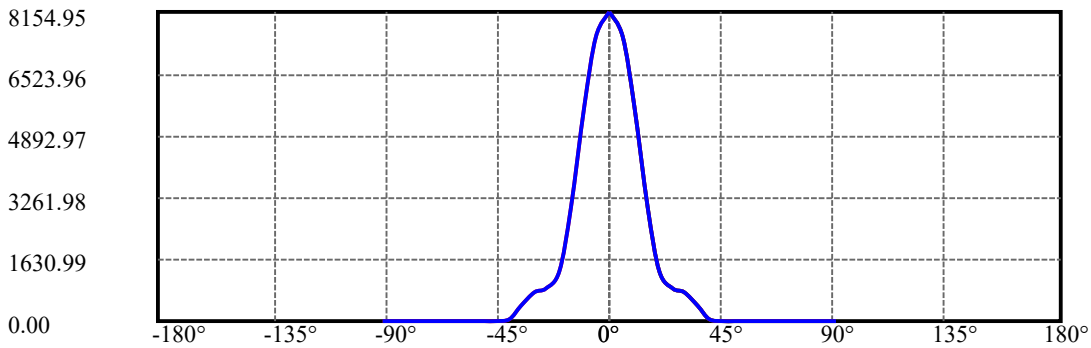
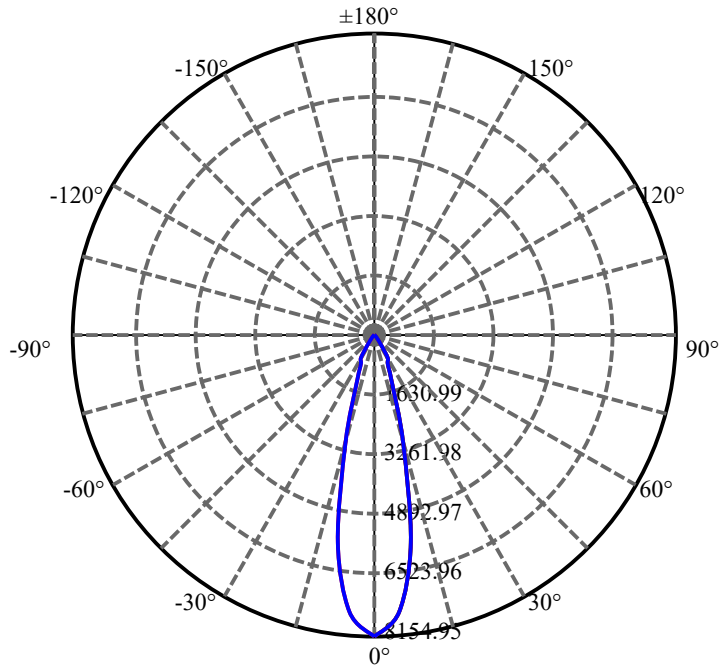
$\gamma(^{\circ})$	Average I(cd)	Zonal F(lm)	Sum F(lm)	Eff Flux(%)	Eff Sum(%)
0.0	8154.954	0.000	0	.000%	.000%
5.0	7501.366	187.167	187.167	7.709%	8.248%
10.0	5691.455	471.949	659.116	19.438%	29.046%
15.0	2989.563	514.952	1174.068	21.209%	51.739%
20.0	1318.092	355.011	1529.079	14.622%	67.384%
25.0	878.962	230.430	1759.509	9.491%	77.538%
30.0	747.473	205.827	1965.336	8.477%	86.609%
35.0	404.740	169.671	2135.007	6.988%	94.086%
40.0	60.837	77.678	2212.686	3.199%	97.509%
45.0	13.207	13.710	2226.395	.565%	98.113%
50.0	10.743	4.839	2231.235	.199%	98.327%
55.0	10.068	4.525	2235.76	.186%	98.526%
60.0	9.697	4.569	2240.329	.188%	98.727%
65.0	9.442	4.653	2244.981	.192%	98.932%
70.0	9.277	4.740	2249.721	.195%	99.141%
75.0	9.160	4.819	2254.54	.198%	99.354%
80.0	9.050	4.872	2259.413	.201%	99.568%
85.0	8.974	4.898	2264.31	.202%	99.784%
90.0	8.919	4.899	2269.21	.202%	100.000%

ZONAL LUMEN SUMMARY

Zone	Lumens	%Lamp	%Fixt
0-30	1965.34	80.94%	86.61%
0-40	2212.69	91.13%	97.51%
0-60	2240.33	92.27%	98.73%
0-90	2264.31	93.26%	99.78%
0-120	2264.31	93.26%	99.78%
0-180	2269.21	93.46%	100.00%
60-90	28.55	1.18%	1.26%
90-120	0.00	0.00%	0.00%
90-130	0.00	0.00%	0.00%
90-150	0.00	0.00%	0.00%
90-180	0.00	0.00%	0.00%
0-26.36	1815.37	74.77%	80.00%

ZONAL LUMEN SUMMARY

0-10	659.12
10-20	869.96
20-30	436.26
30-40	247.35
40-50	18.55
50-60	9.09
60-70	9.39
70-80	9.69
80-90	4.90
90-100	0.00
100-110	0.00
110-120	0.00
120-130	0.00
130-140	0.00
140-150	0.00
150-160	0.00
160-170	0.00
170-180	0.00



C0(Max): —————

C0/C180: —————

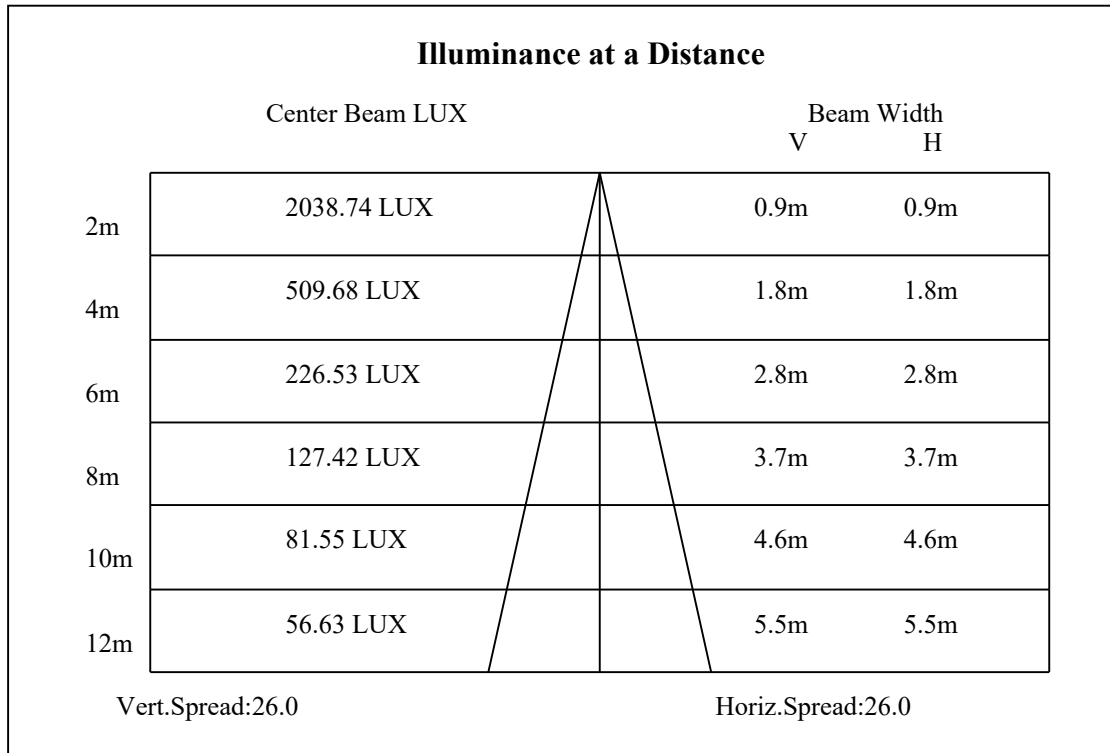
C90/C270: —————

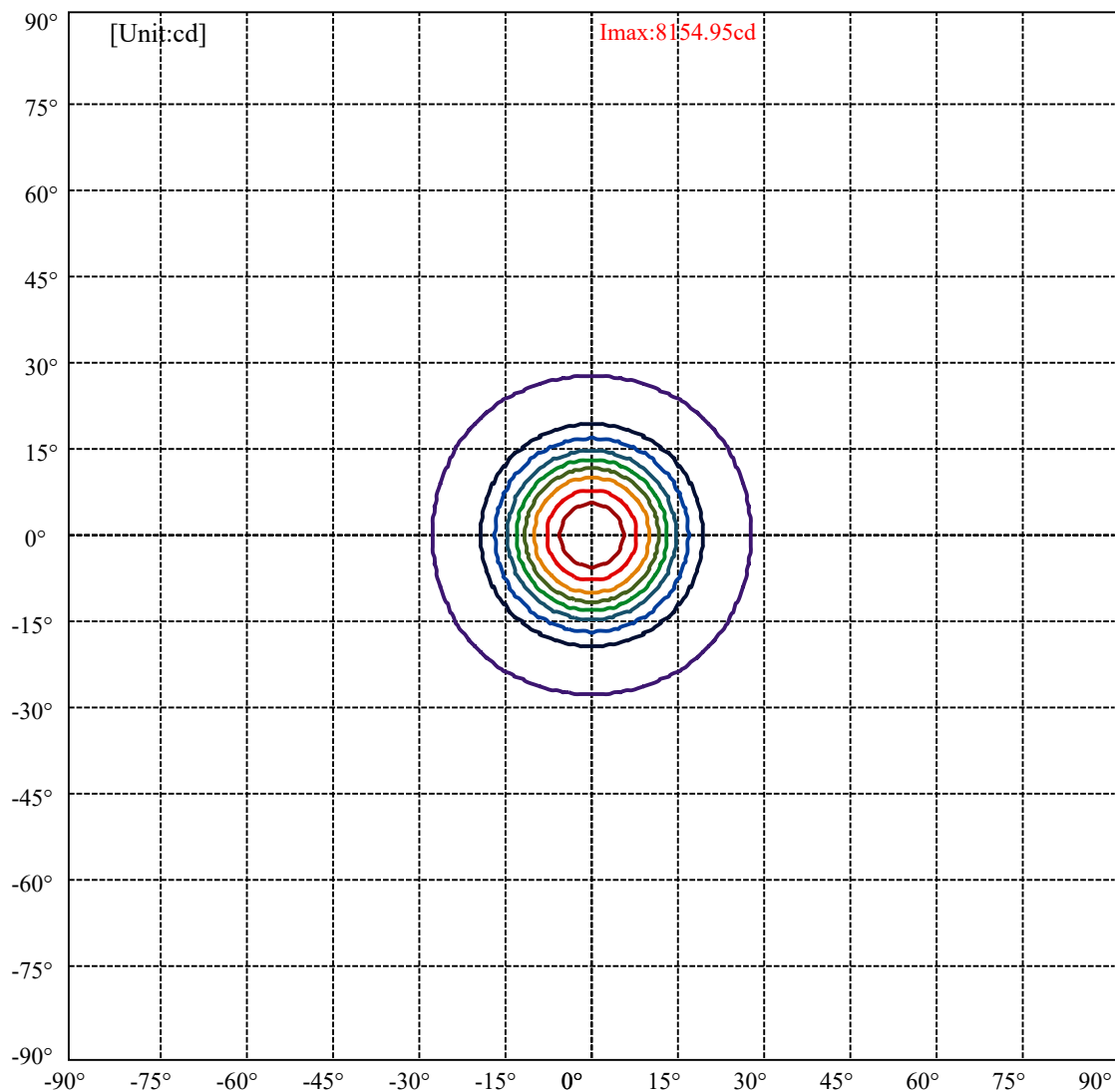
Field angle(10%Imax):C0/180Left:27.4 Right:27.4

:C90/270Left:27.4 Right:27.4

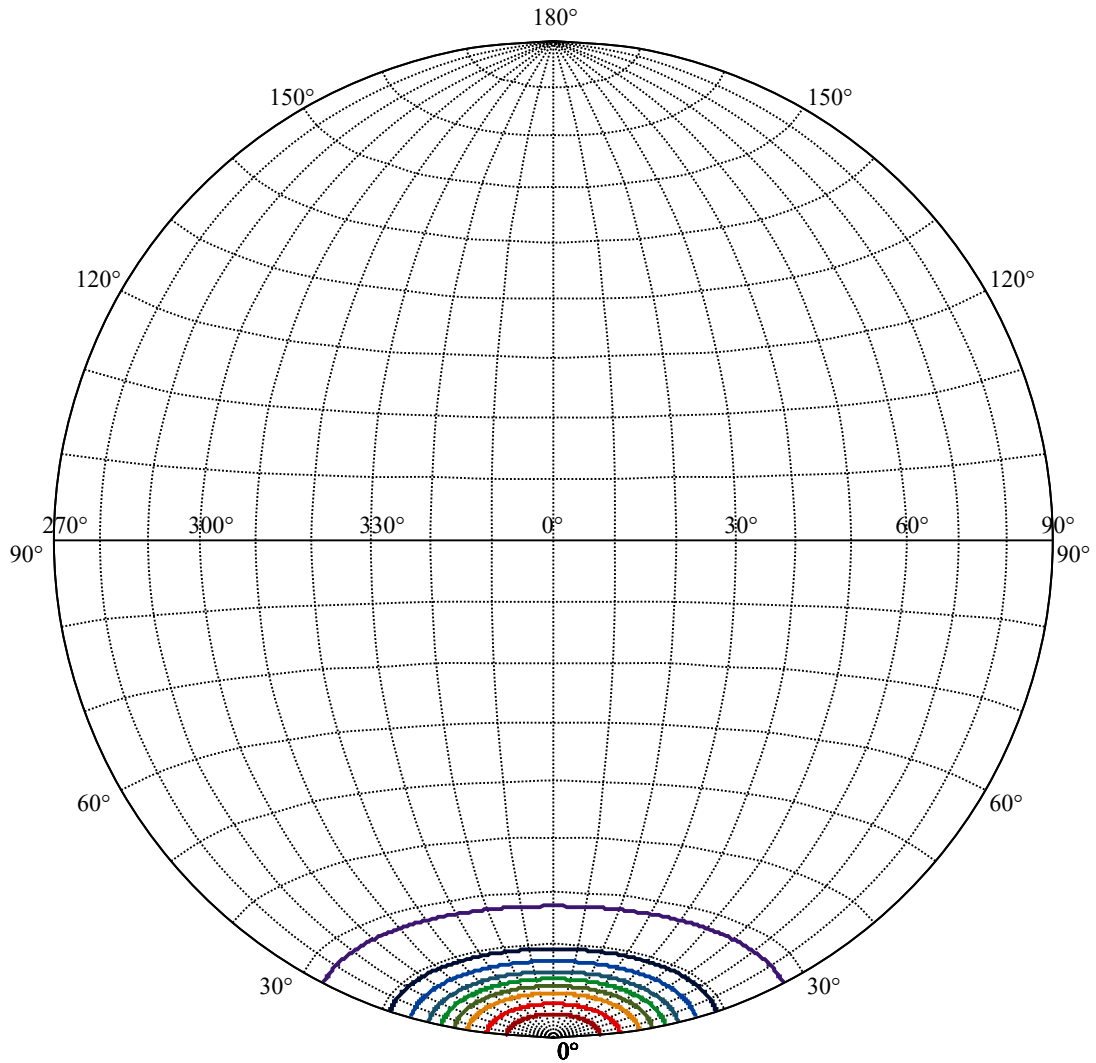
Beam Angle(50%Imax):C0/180Left:13.0 Right:13.0

:C90/270Left:13.0 Right:13.0





(10%Imax)	815.495	—
(20%Imax)	1630.99	—
(30%Imax)	2446.49	—
(40%Imax)	3261.98	—
(50%Imax)	4077.48	—
(60%Imax)	4892.97	—
(70%Imax)	5708.47	—
(80%Imax)	6523.96	—
(90%Imax)	7339.46	—



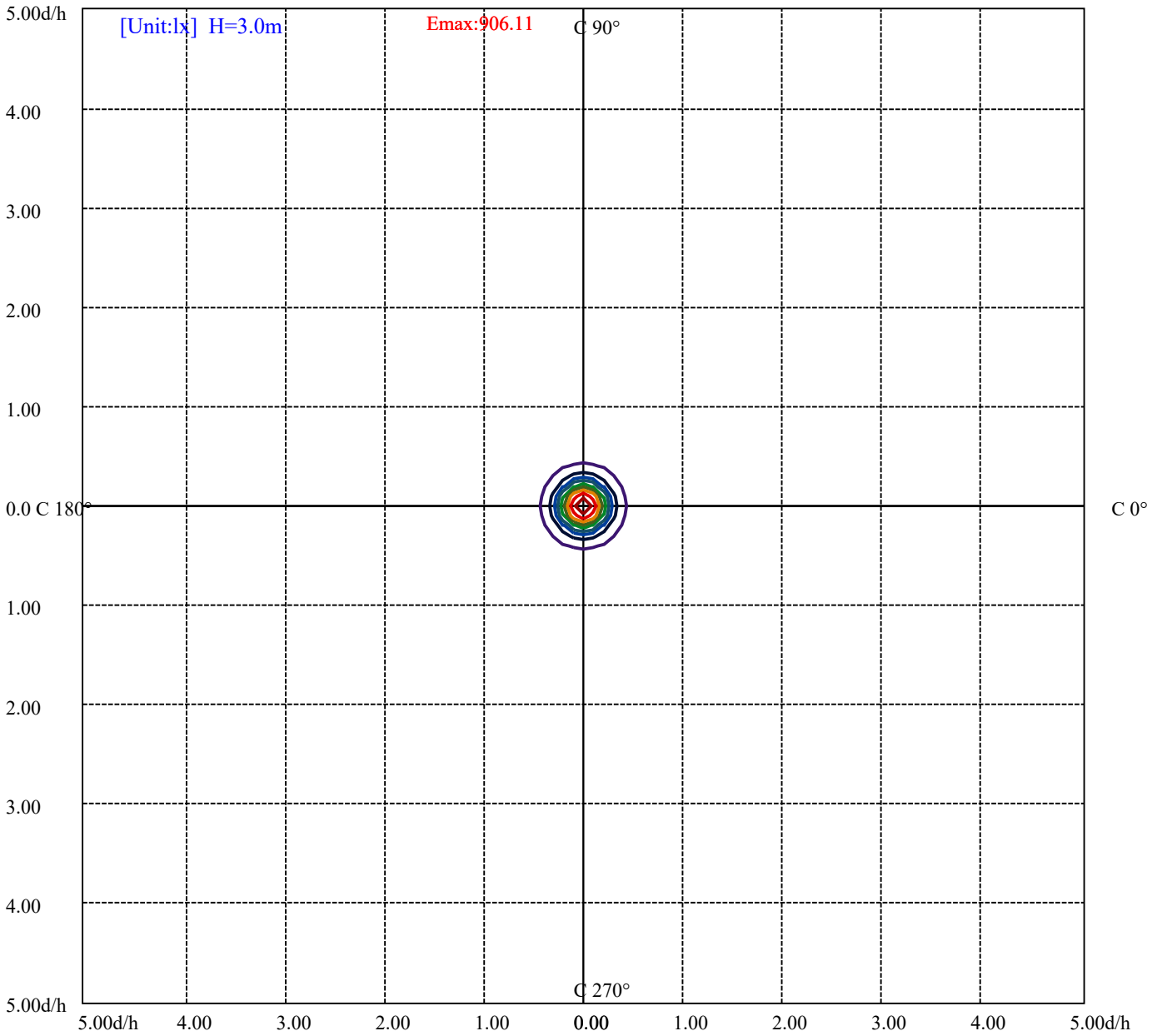
House

[Unit:cd]

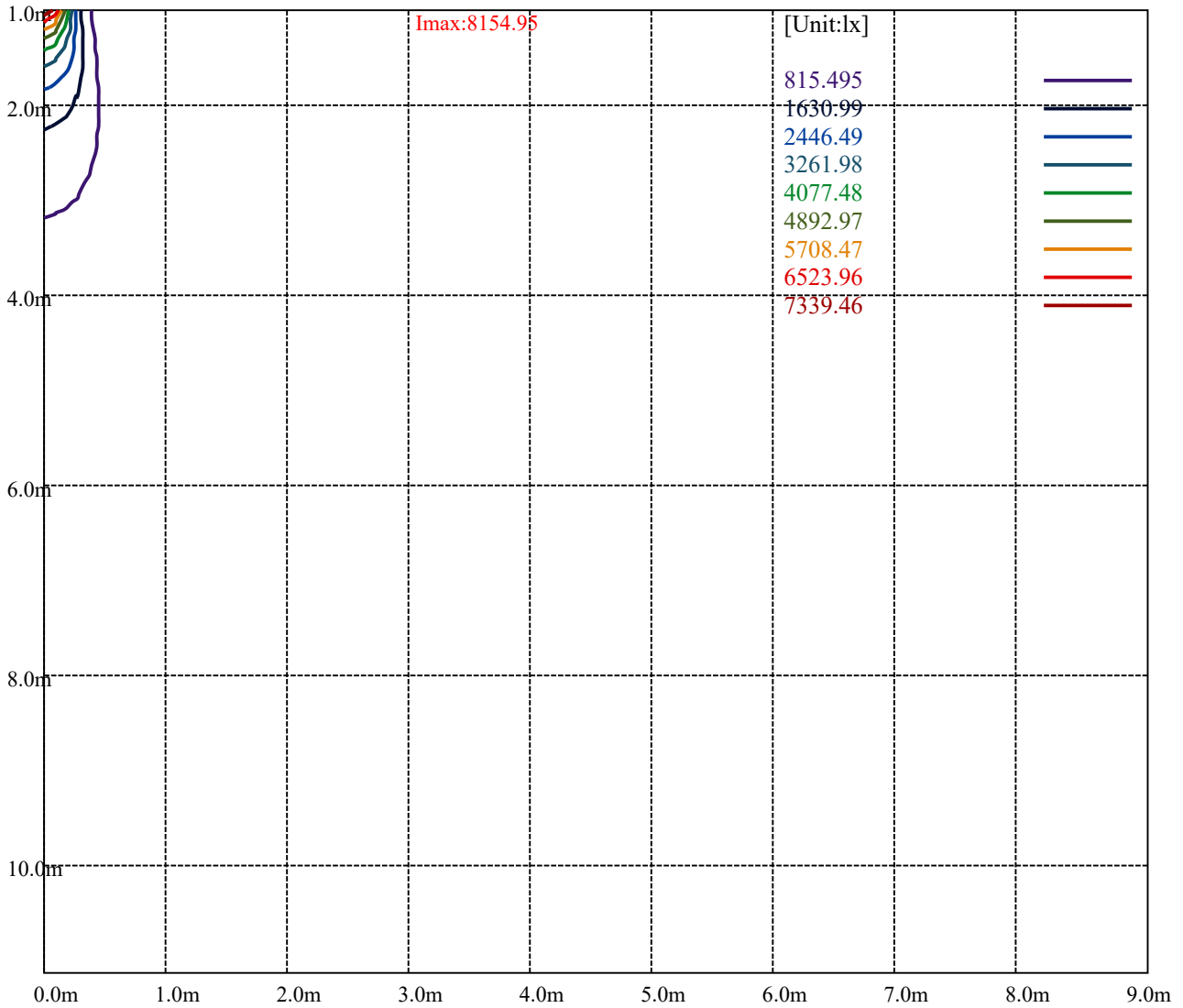
Road

Imax:8154.95

(10%Imax)	815.495	—
(20%Imax)	1630.99	—
(30%Imax)	2446.49	—
(40%Imax)	3261.98	—
(50%Imax)	4077.48	—
(60%Imax)	4892.97	—
(70%Imax)	5708.47	—
(80%Imax)	6523.96	—
(90%Imax)	7339.46	—



- (10%Emax) 90.61033
- (20%Emax) 181.2211
- (30%Emax) 271.8311
- (40%Emax) 362.4411
- (50%Emax) 453.0522
- (60%Emax) 543.6622
- (70%Emax) 634.2722
- (80%Emax) 724.8834
- (90%Emax) 815.4933



Luminance Table

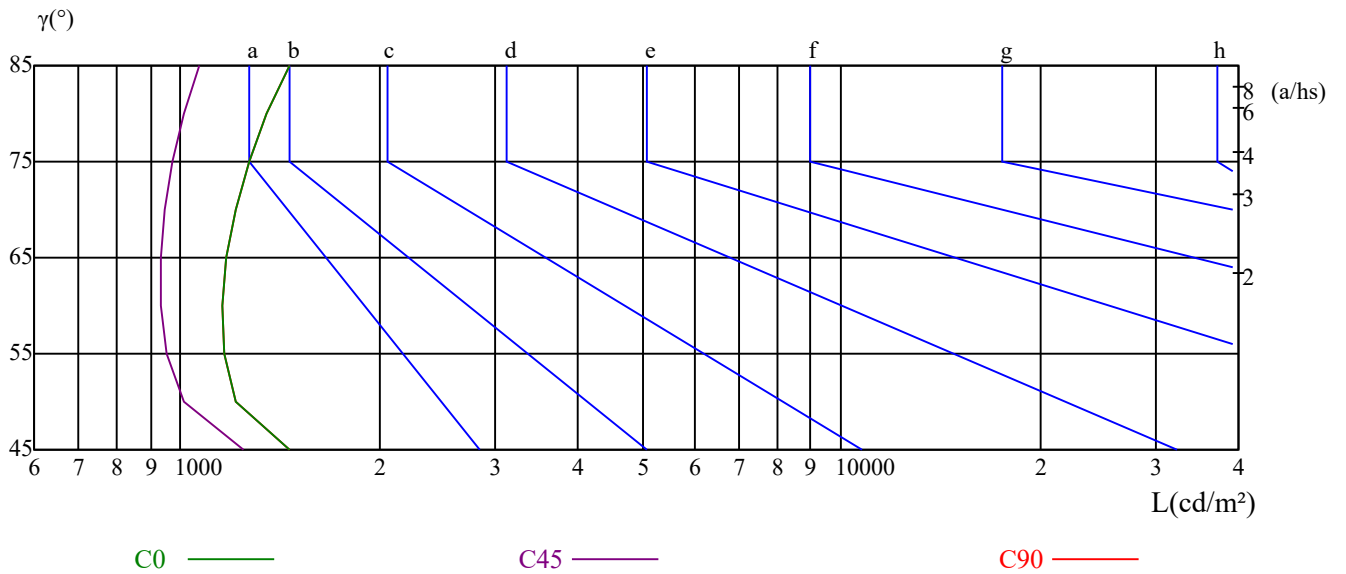
γ	45	50	55	60	65	70	75	80	85
C0	1465	1210	1161	1155	1171	1211	1271	1352	1463
C45	1242	1011	955	934	932	945	973	1011	1067
C90	1465	1210	1161	1155	1171	1211	1271	1352	1463

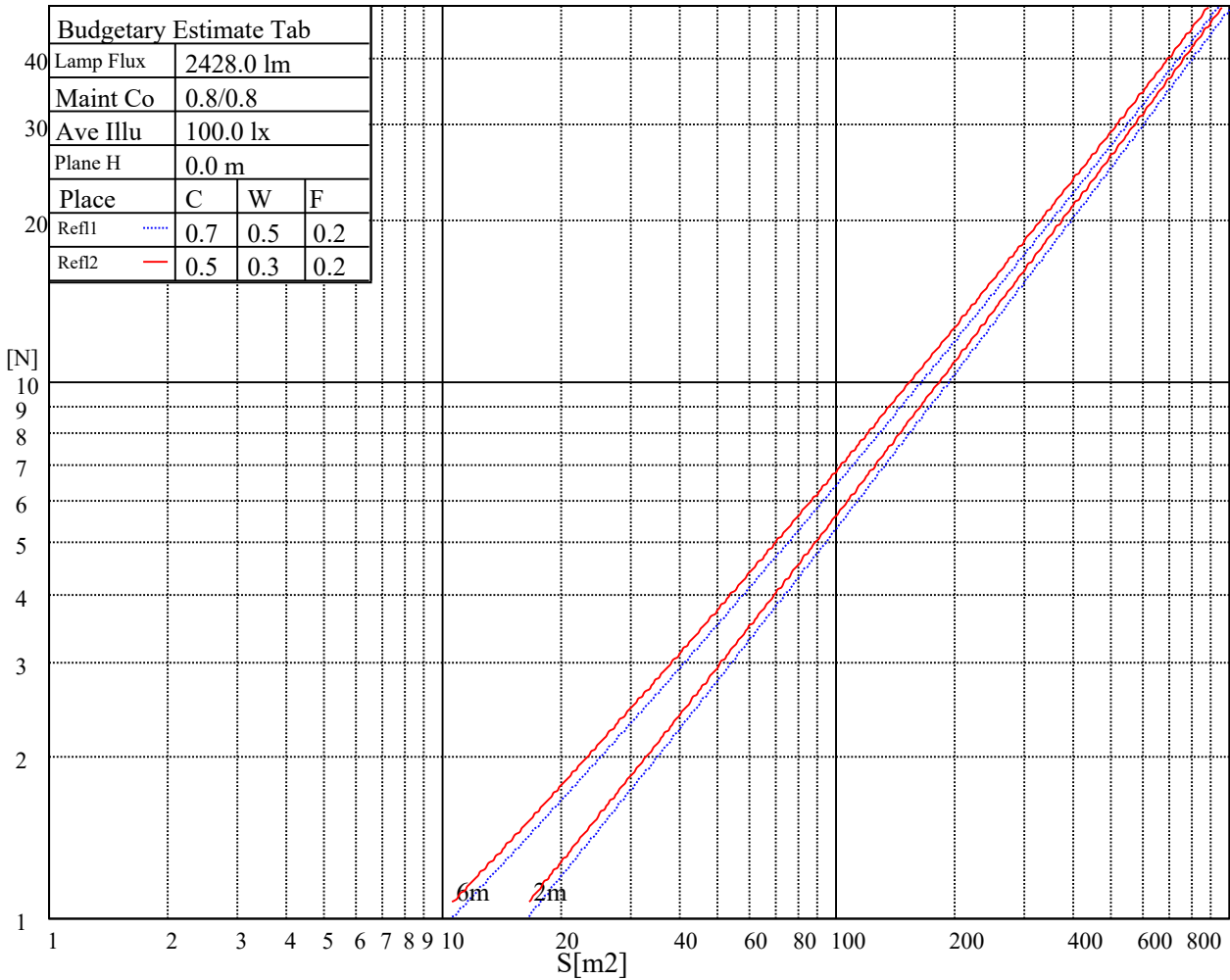
L(Hor)(65)	L(Ver)(65)	L45(65)	L(Hor)(75)	L(Ver)(75)	L45(75)	L(Hor)(85)	L(Ver)(85)	L45(85)
3092	3092	3092	4898	4898	4898	14252	14252	14252

Glare Table

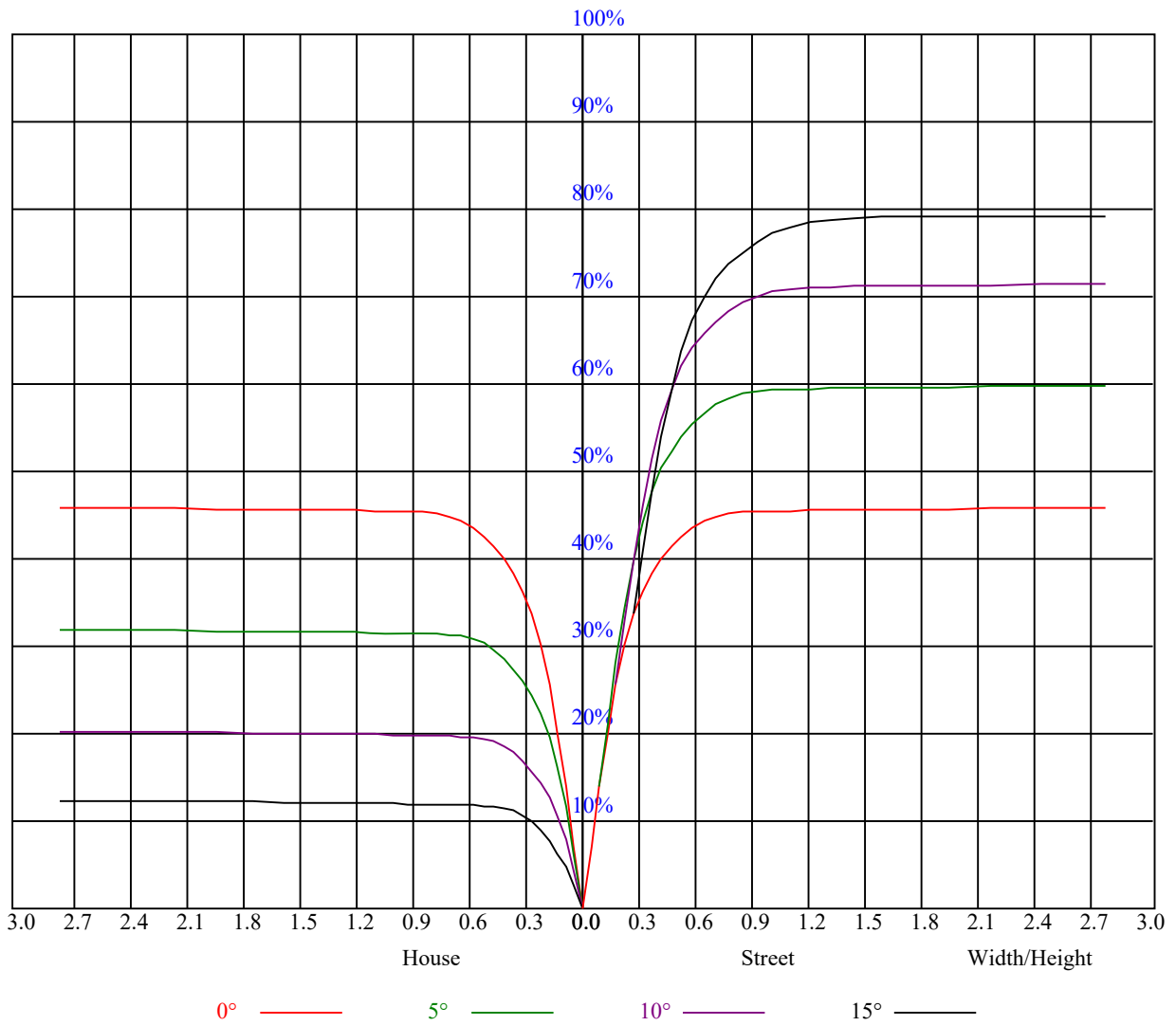
Glare	Quality	Service Values Illuminance(lx)							
1.15	A	2000	1000	500	<=300				
1.5	B		2000	1000	500	<=300			
1.85	C			2000	1000	500	<=300		
2.2	D				2000	1000	500	<=300	
2.55	E					2000	1000	500	<=300
		a	b	c	d	e	f	g	h

Luminance Limiting Curve





RHOCC	80			70			50			30			10			0
RHOW	50	30	10	50	30	10	50	30	10	50	30	10	50	30	10	0
RCR	COEFFICIENTS OF UTILIZATION RHOFC=20 CU															
0	1.11	1.11	1.11	1.09	1.09	1.09	1.04	1.04	1.04	0.99	0.99	0.99	0.95	0.95	0.95	0.93
1	1.05	1.03	1.01	1.03	1.01	0.99	0.99	0.97	0.96	0.95	0.94	0.93	0.92	0.91	0.91	0.89
2	0.99	0.96	0.93	0.97	0.95	0.92	0.94	0.92	0.90	0.92	0.90	0.88	0.89	0.88	0.86	0.85
3	0.94	0.90	0.87	0.93	0.89	0.87	0.90	0.88	0.85	0.88	0.86	0.84	0.86	0.84	0.83	0.81
4	0.90	0.86	0.82	0.89	0.85	0.82	0.87	0.84	0.81	0.85	0.82	0.80	0.83	0.81	0.79	0.78
5	0.86	0.81	0.78	0.85	0.81	0.78	0.83	0.80	0.77	0.82	0.79	0.77	0.81	0.78	0.76	0.75
6	0.82	0.78	0.75	0.82	0.77	0.74	0.80	0.77	0.74	0.79	0.76	0.74	0.78	0.75	0.73	0.72
7	0.79	0.75	0.72	0.78	0.74	0.71	0.77	0.74	0.71	0.76	0.73	0.71	0.75	0.73	0.70	0.69
8	0.76	0.72	0.69	0.76	0.71	0.69	0.75	0.71	0.68	0.74	0.71	0.68	0.73	0.70	0.68	0.67
9	0.73	0.69	0.66	0.73	0.69	0.66	0.72	0.69	0.66	0.71	0.68	0.66	0.71	0.68	0.66	0.65
10	0.71	0.67	0.64	0.71	0.67	0.64	0.70	0.66	0.64	0.69	0.66	0.64	0.69	0.66	0.63	0.62



Nata 3-1943-M

Intensity data(cd)

C/\u03b3(\u00b0)	0.0	5.0	10.0	15.0	20.0	25.0	30.0	35.0	40.0
0.0	8180.83	7907.75	6269.82	3585.27	1495.33	931.55	769.69	548.91	46.85
45.0	8021.72	8036.03	6724.04	4279.53	1733.18	959.63	787.31	633.70	291.25
90.0	8186.34	7693.03	6099.15	3366.15	1405.04	885.03	753.12	473.15	29.35
135.0	8230.93	7584.02	5992.89	3376.61	1505.24	877.05	746.01	458.62	32.76
180.0	8180.83	7182.11	5127.95	2317.87	1073.60	820.56	725.81	274.35	21.42
225.0	8021.72	6860.58	4632.45	1917.06	1026.31	800.85	702.35	174.58	18.94
270.0	8186.34	7274.60	5388.92	2523.23	1221.15	897.97	751.52	341.35	23.34
315.0	8230.93	7472.81	5296.43	2550.76	1084.89	859.05	743.98	333.26	22.79
360.0	8180.83	7907.75	6269.82	3585.27	1495.33	931.55	769.69	548.91	46.85
C/\u03b3(\u00b0)	45.0	50.0	55.0	60.0	65.0	70.0	75.0	80.0	85.0
0.0	14.76	11.18	10.35	9.86	9.58	9.36	9.19	9.08	9.03
45.0	16.57	11.07	10.30	9.86	9.52	9.36	9.19	9.08	8.97
90.0	13.54	10.63	9.97	9.63	9.36	9.19	9.03	8.97	8.92
135.0	13.65	10.79	10.08	9.69	9.47	9.25	9.08	8.97	8.92
180.0	11.62	10.57	10.02	9.63	9.41	9.25	9.08	9.03	8.97
225.0	11.73	10.41	9.86	9.63	9.41	9.36	9.47	9.08	8.97
270.0	12.06	10.63	10.02	9.63	9.41	9.25	9.14	9.19	9.08
315.0	11.73	10.68	9.97	9.63	9.36	9.19	9.08	8.97	8.92
360.0	14.76	11.18	10.35	9.86	9.58	9.36	9.19	9.08	9.03
C/\u03b3(\u00b0)	90.0								
0.0	8.97								
45.0	8.97								
90.0	8.86								
135.0	8.92								
180.0	8.97								
225.0	8.92								
270.0	8.86								
315.0	8.86								
360.0	8.97								