



NATA LIGHTING CO.,LTD.
www.nata.cn
Email:info@nata.com
Tel:+86-750-3770000 Fax:+86-750-3771111
Address:380JinOu Road,GaoXin Zone,Jiang Men City,Guangdong,China

Nata

LumCAT: 3-1543-E
Luminaire: 92.76.263.00
Report No: NATA0100
Test No: 2017010601
LampCAT: brideglux VERO 13
Lamp flux(lm): 1556.0
Number of Lamps: 1
Length(mm): 88
Phm Type: C

Voltage(V): 30.0000
Current(A): 0.9500
Power (W): 28.5000
PF: 0.0000
Ballast type:
Width(mm): 88
Height(mm): 0

Photometric Results

Lumens(lm): 1436.74
Efficiency(%): 92.34%
Lumens(lm)/Power(W): 51.13
Central intensity(cd): 3642.944
Maximum intensity(cd): 3642.944
Angle of maximum intensity: C=0.0 γ =0.0
Beam Angle(50%Imax): [C0/180]Total=29.7
[C90/270]Total=29.7
Field angle(10%Imax): [C0/180]Total=73.6
[C90/270]Total=73.6
Maximum s/h(1/2): C0_180=0.50 C90_270=0.50
Maximum s/h(1/4): C0_180=0.51 C90_270=0.51
Up flux rate of lamp(%): 0.00%
Down flux rate of lamp(%): 93.65%
Up flux rate of LUM(%): - -
Down flux rate of LUM(%): 100.00%
CIE Type : Direct lighting
Output flux ratio in π solid angle : 97.298%

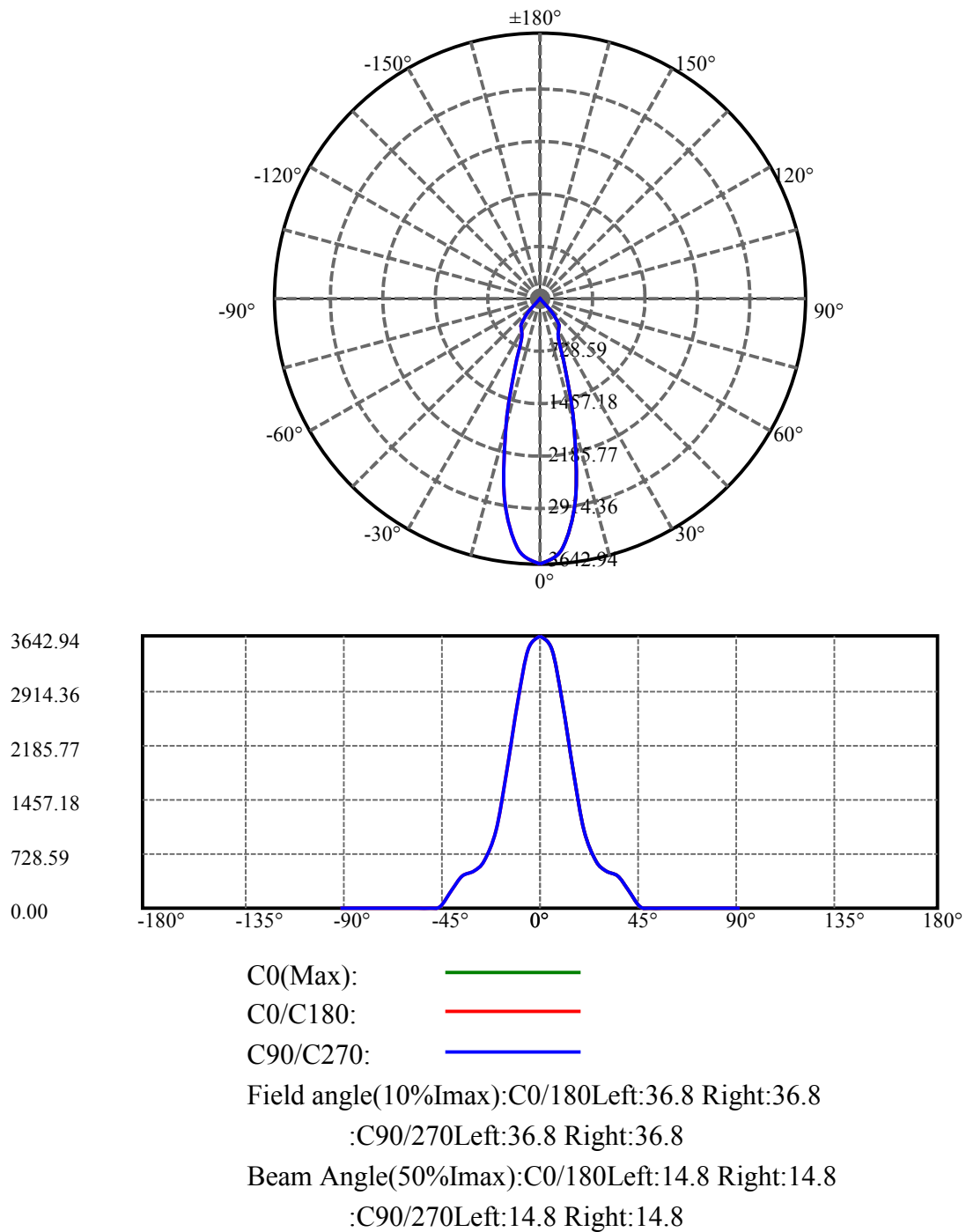
$\gamma(^{\circ})$	Average I(cd)	Zonal F(lm)	Sum F(lm)	Eff Flux(%)	Eff Sum(%)
0.0	3642.944	21.786	21.786	1.400%	1.516%
5.0	3458.781	165.237	187.023	10.619%	13.017%
10.0	2781.174	264.721	451.744	17.013%	31.442%
15.0	1787.406	253.576	705.32	16.297%	49.092%
20.0	1043.470	195.624	900.944	12.572%	62.708%
25.0	622.640	144.236	1045.18	9.270%	72.747%
30.0	494.159	135.433	1180.613	8.704%	82.173%
35.0	430.032	135.201	1315.815	8.689%	91.584%
40.0	245.978	86.667	1402.482	5.570%	97.616%
45.0	16.393	6.354	1408.836	.408%	98.058%
50.0	7.082	2.974	1411.809	.191%	98.265%
55.0	6.565	2.948	1414.757	.189%	98.470%
60.0	6.373	3.025	1417.782	.194%	98.681%
65.0	6.338	3.149	1420.931	.202%	98.900%
70.0	6.331	3.261	1424.192	.210%	99.127%
75.0	6.331	3.352	1427.544	.215%	99.360%
80.0	6.930	3.741	1431.285	.240%	99.621%
85.0	6.985	3.814	1435.1	.245%	99.886%
90.0	5.974	1.637	1436.737	.105%	100.000%

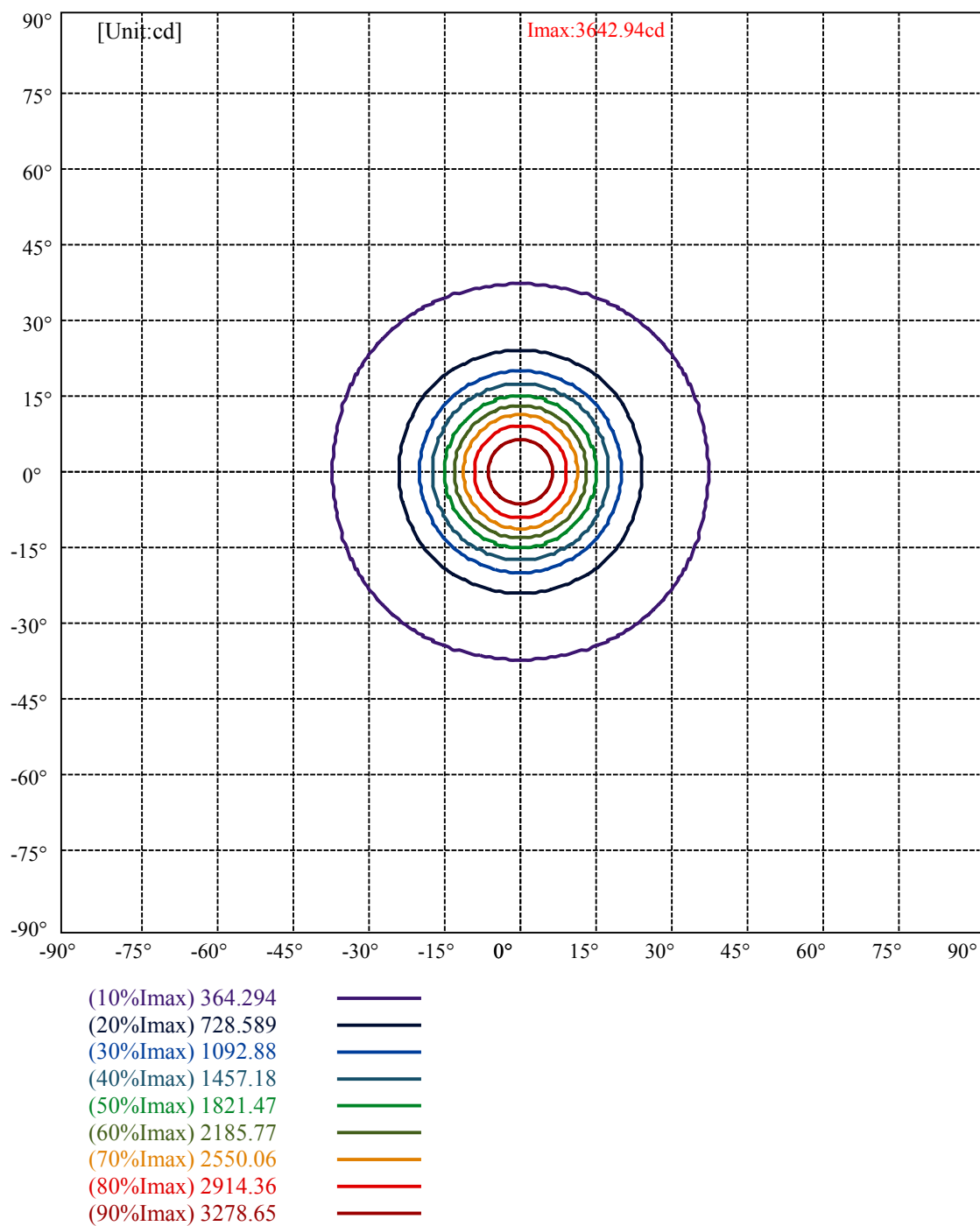
ZONAL LUMEN SUMMARY

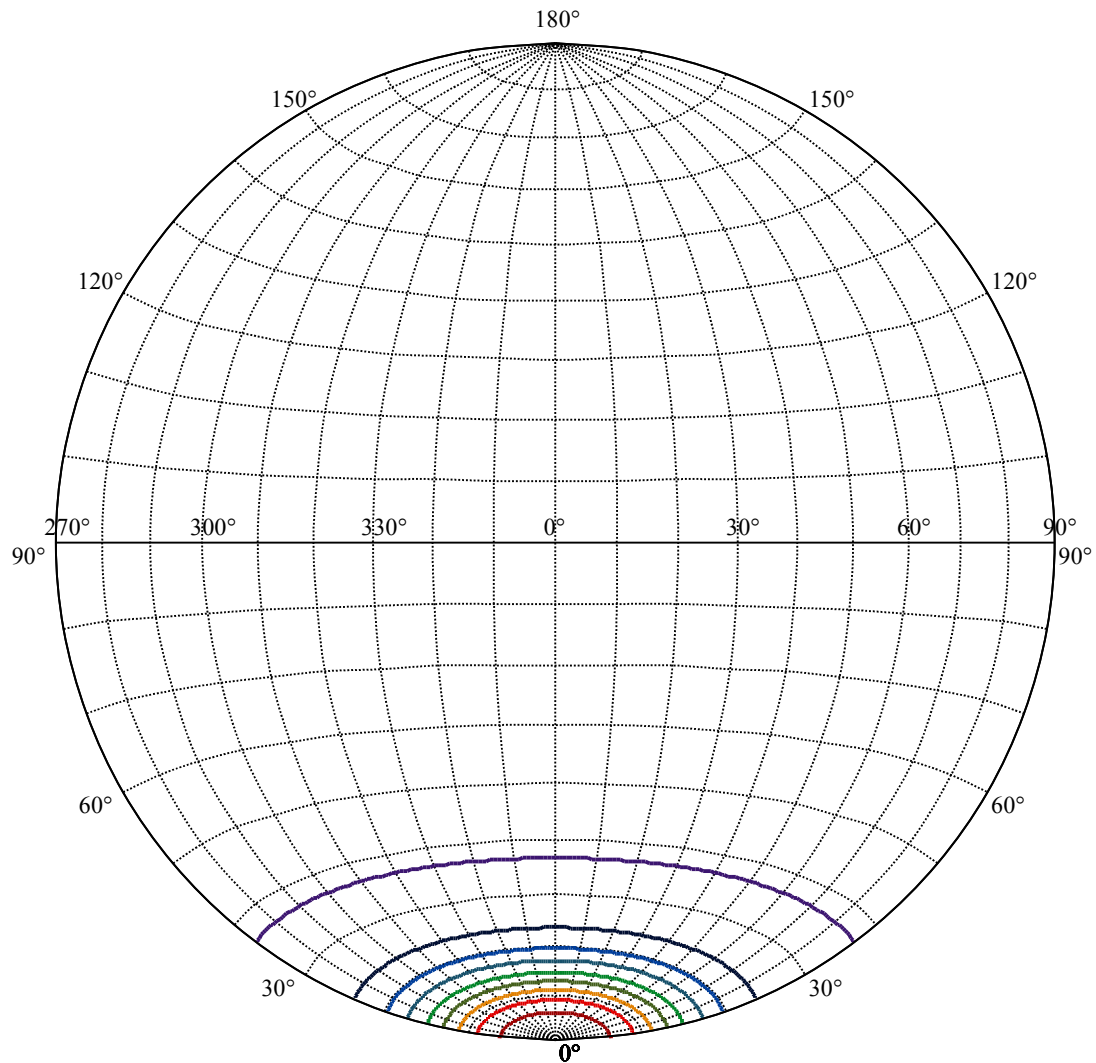
Zone	Lumens	%Lamp	%Fixt
0-30	1180.61	75.87%	82.17%
0-40	1402.48	90.13%	97.62%
0-60	1417.78	91.12%	98.68%
0-90	1435.10	92.23%	99.89%
0-120	1435.10	92.23%	99.89%
0-180	1436.74	92.34%	100.00%
60-90	20.34	1.31%	1.42%
90-120	0.00	0.00%	0.00%
90-130	0.00	0.00%	0.00%
90-150	0.00	0.00%	0.00%
90-180	0.00	0.00%	0.00%
0-28.85	1149.39	73.87%	80.00%

ZONAL LUMEN SUMMARY

0-10	451.74
10-20	449.20
20-30	279.67
30-40	221.87
40-50	9.33
50-60	5.97
60-70	6.41
70-80	7.09
80-90	3.81
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







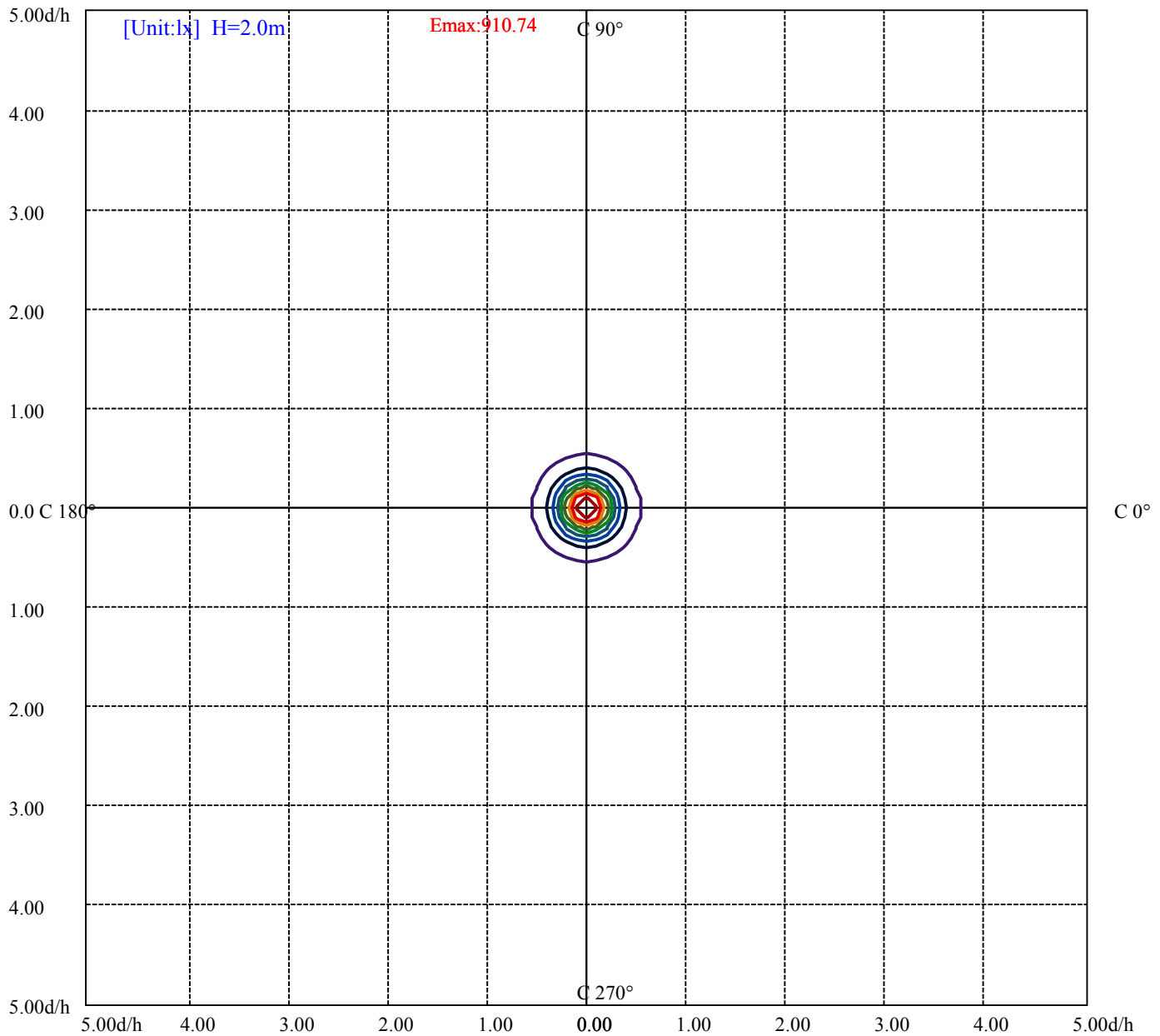
House

[Unit:cd]

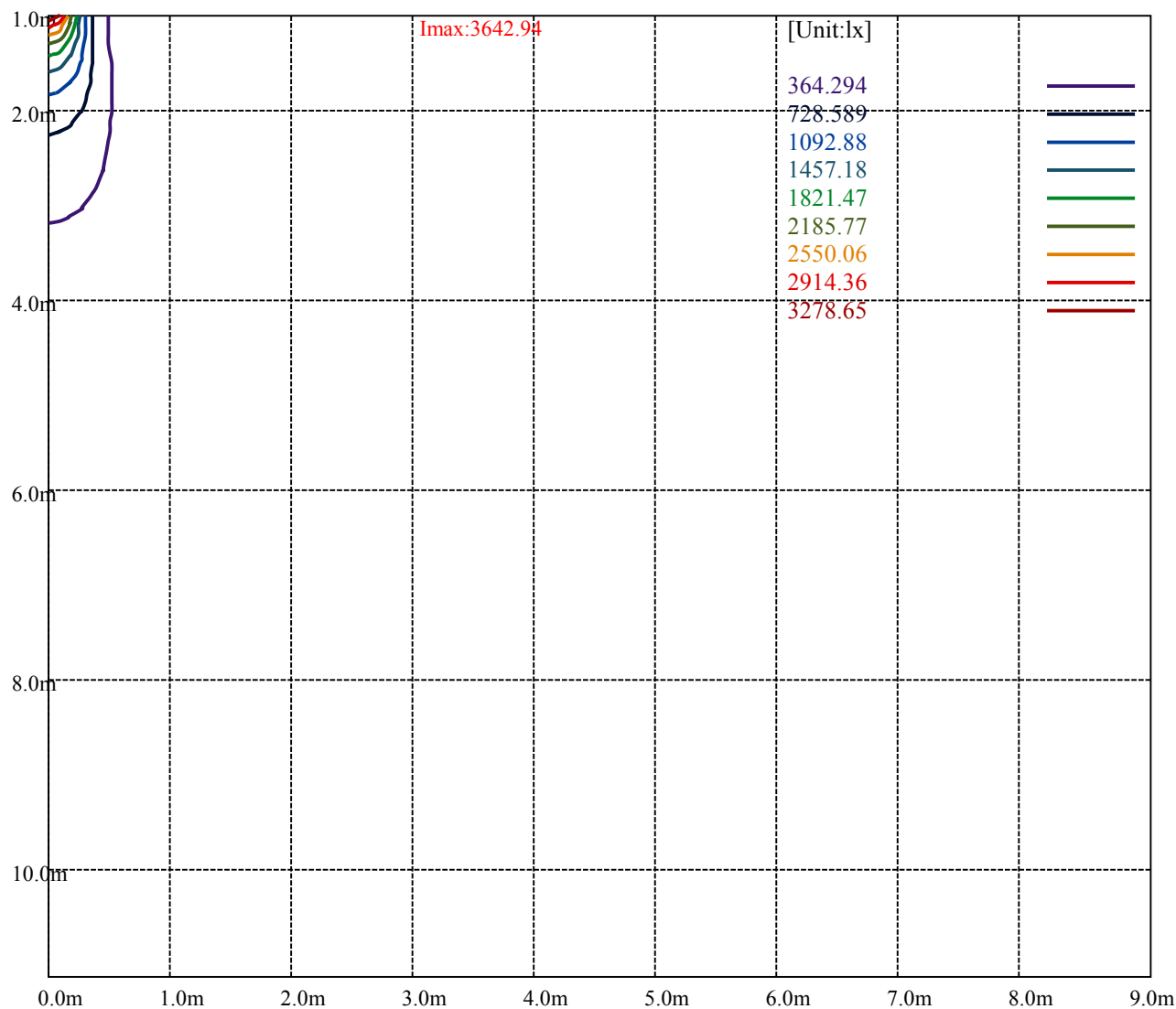
Road

Imax:3642.94

(10%Imax)	364.294	—
(20%Imax)	728.589	—
(30%Imax)	1092.88	—
(40%Imax)	1457.18	—
(50%Imax)	1821.47	—
(60%Imax)	2185.77	—
(70%Imax)	2550.06	—
(80%Imax)	2914.36	—
(90%Imax)	3278.65	—



(10%Emax)	91.0735	—
(20%Emax)	182.147	—
(30%Emax)	273.22	—
(40%Emax)	364.295	—
(50%Emax)	455.3675	—
(60%Emax)	546.44	—
(70%Emax)	637.515	—
(80%Emax)	728.5875	—
(90%Emax)	819.66	—



Luminance Table

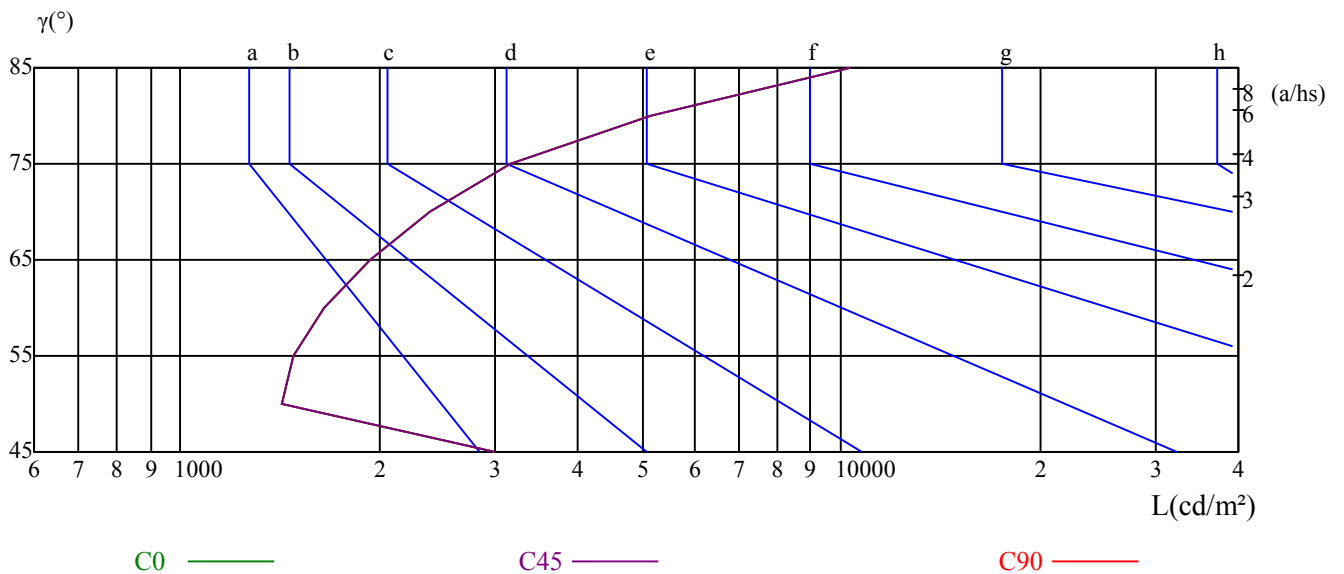
γ	45	50	55	60	65	70	75	80	85
C0	2994	1423	1478	1646	1937	2390	3159	5154	10350
C45	2994	1423	1478	1646	1937	2390	3159	5154	10350
C90	2994	1423	1478	1646	1937	2390	3159	5154	10350

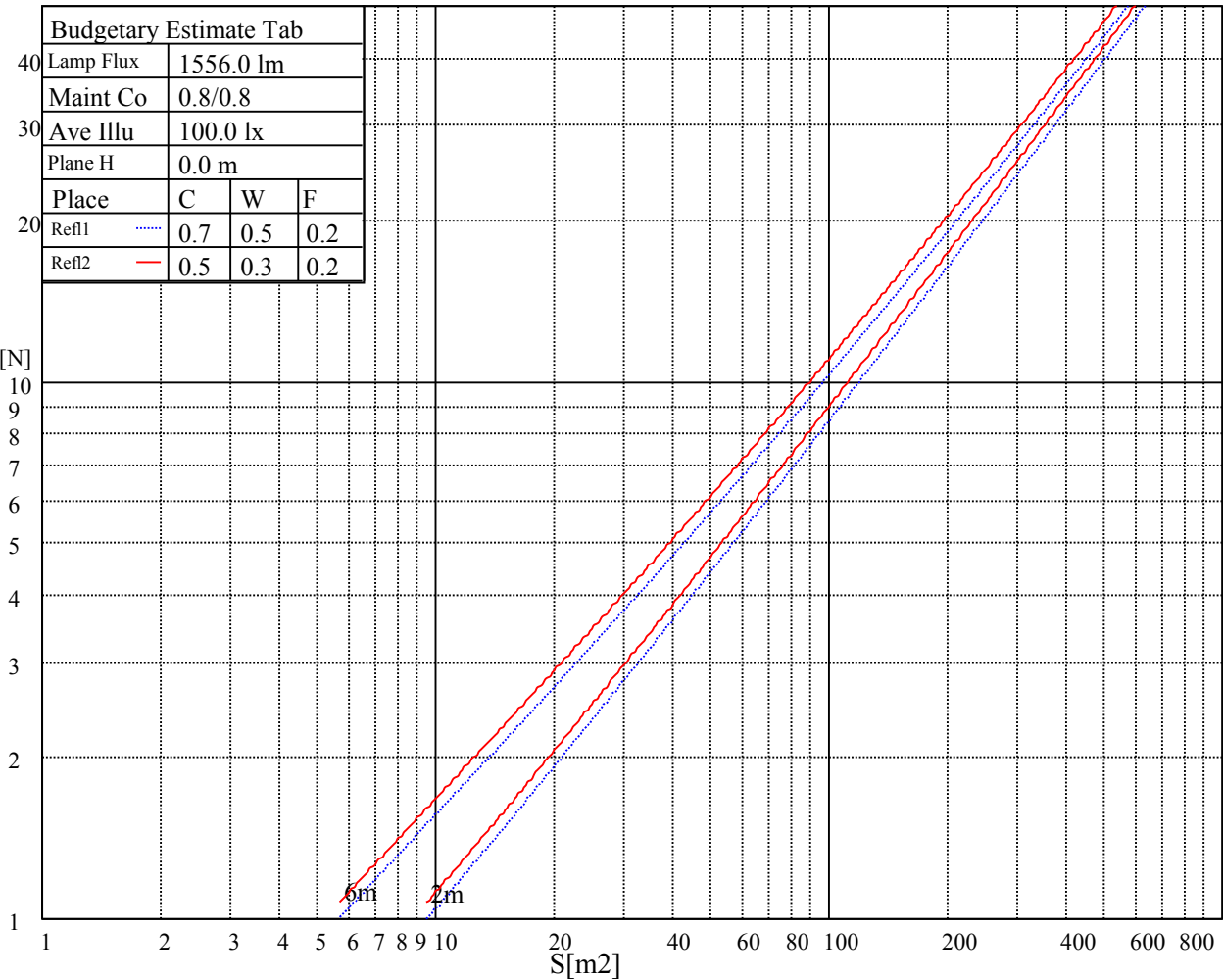
L(Hor)(65)	L(Ver)(65)	L45(65)	L(Hor)(75)	L(Ver)(75)	L45(75)	L(Hor)(85)	L(Ver)(85)	L45(85)
1937	1937	1937	3159	3159	3159	10350	10350	10350

Glare Table

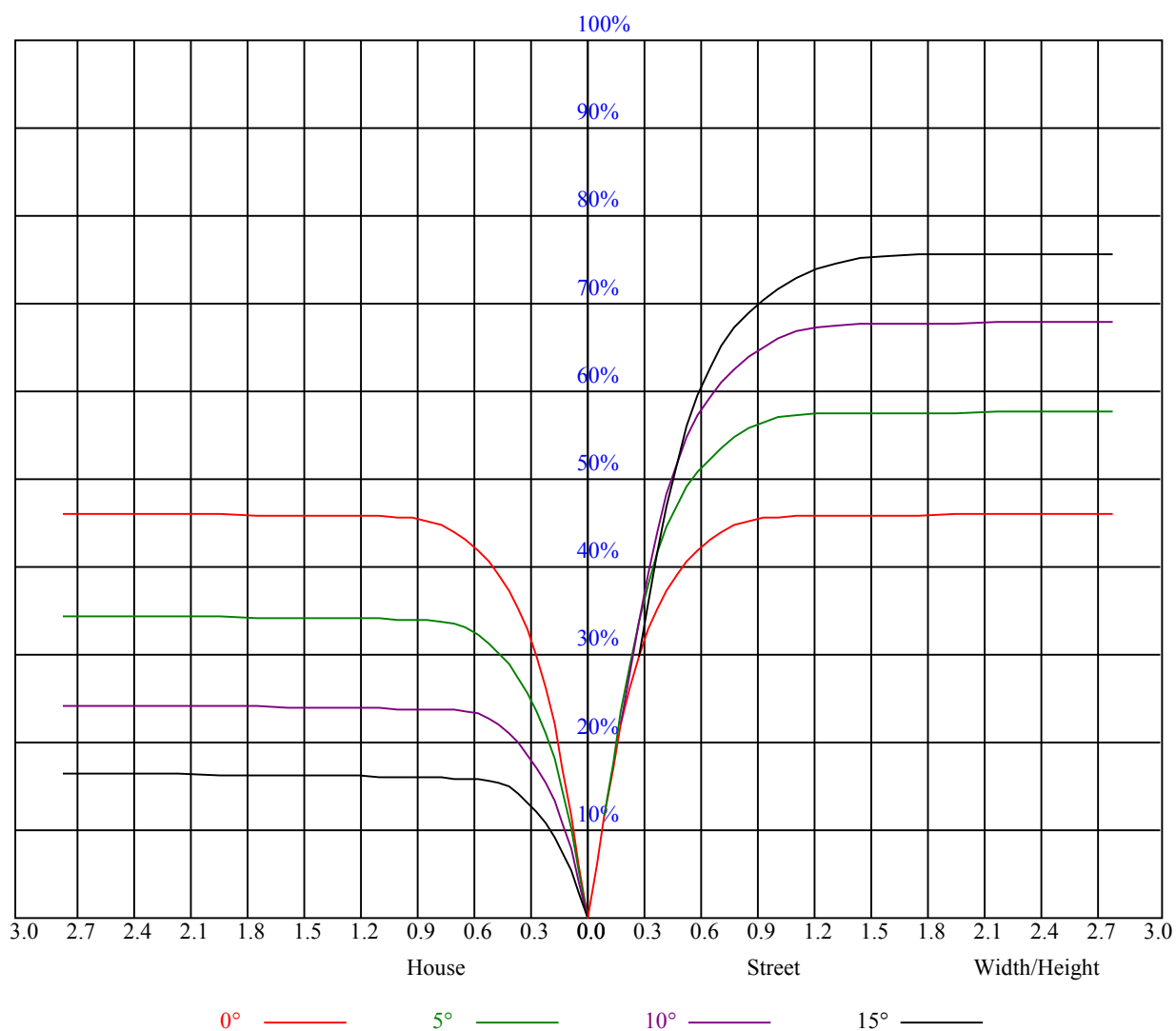
Glare	Quality	Service Values Illuminance(lx)							
1.15	A	2000	1000	500	≤ 300				
1.5	B		2000	1000	500	≤ 300			
1.85	C			2000	1000	500	≤ 300		
2.2	D				2000	1000	500	≤ 300	
2.55	E					2000	1000	500	≤ 300
		a	b	c	d	e	f	g	h

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	1.00	1.00	1.00	0.96	0.96	0.96	0.94
1	1.03	1.00	0.98	1.01	0.99	0.97	0.97	0.95	0.94	0.94	0.92	0.91	0.90	0.89	0.88	0.86
2	0.97	0.93	0.90	0.95	0.92	0.89	0.92	0.90	0.87	0.90	0.87	0.86	0.87	0.85	0.84	0.82
3	0.92	0.88	0.84	0.91	0.87	0.84	0.88	0.85	0.82	0.86	0.83	0.81	0.84	0.82	0.80	0.78
4	0.87	0.83	0.79	0.86	0.82	0.79	0.84	0.81	0.78	0.83	0.80	0.77	0.81	0.78	0.76	0.75
5	0.83	0.79	0.75	0.83	0.78	0.75	0.81	0.77	0.74	0.80	0.76	0.74	0.78	0.75	0.73	0.72
6	0.80	0.75	0.72	0.79	0.75	0.71	0.78	0.74	0.71	0.77	0.73	0.70	0.75	0.72	0.70	0.69
7	0.77	0.72	0.68	0.76	0.71	0.68	0.75	0.71	0.68	0.74	0.70	0.68	0.73	0.70	0.67	0.66
8	0.74	0.69	0.66	0.73	0.69	0.65	0.72	0.68	0.65	0.71	0.68	0.65	0.70	0.67	0.65	0.64
9	0.71	0.66	0.63	0.70	0.66	0.63	0.70	0.66	0.63	0.69	0.65	0.63	0.68	0.65	0.62	0.61
10	0.68	0.64	0.61	0.68	0.64	0.61	0.67	0.63	0.61	0.67	0.63	0.60	0.66	0.63	0.60	0.59



Intensity data(cd)										Appendix Page: 14 Total:14	
C/ γ (°)	0.0	5.0	10.0	15.0	20.0	25.0	30.0	35.0	40.0		
0.0	3630.42	3483.42	2844.76	1788.23	1017.44	636.45	501.56	442.10	291.25		
45.0	3662.35	3497.73	2805.12	1782.73	1100.03	629.29	493.31	426.69	286.29		
90.0	3635.92	3382.67	2645.46	1671.51	997.07	599.62	480.09	409.40	188.90		
135.0	3643.08	3477.36	2878.90	1978.73	1153.98	652.97	502.11	441.00	285.74		
180.0	3630.42	3417.90	2729.70	1806.95	1035.34	589.49	487.25	420.47	205.53		
225.0	3662.35	3450.38	2759.43	1773.92	1060.50	626.38	493.14	430.82	221.16		
270.0	3635.92	3539.58	2888.81	1865.86	1095.62	654.07	508.17	452.01	278.03		
315.0	3643.08	3421.20	2697.21	1631.32	887.78	592.85	487.63	417.77	210.92		
360.0	3630.42	3483.42	2844.76	1788.23	1017.44	636.45	501.56	442.10	291.25		
C/ γ (°)	45.0	50.0	55.0	60.0	65.0	70.0	75.0	80.0	85.0		
0.0	20.26	7.10	6.44	6.22	6.11	6.00	6.00	6.00	6.11		
45.0	13.71	7.05	6.55	6.39	6.28	6.17	6.39	7.43	7.27		
90.0	9.14	6.94	6.50	6.28	6.22	6.17	6.50	8.97	8.81		
135.0	27.25	7.16	6.66	6.44	6.33	6.44	6.28	6.33	7.05		
180.0	13.27	7.16	6.77	6.77	7.38	7.49	7.10	7.32	7.49		
225.0	10.02	7.16	6.55	6.33	6.11	6.00	6.17	6.77	6.50		
270.0	25.27	7.21	6.61	6.33	6.17	6.17	6.11	6.33	6.55		
315.0	12.22	6.88	6.44	6.22	6.11	6.22	6.11	6.28	6.11		
360.0	20.26	7.10	6.44	6.22	6.11	6.00	6.00	6.00	6.11		
C/ γ (°)	90.0										
0.0	5.89										
45.0	5.95										
90.0	6.00										
135.0	5.95										
180.0	6.00										
225.0	6.06										
270.0	6.00										
315.0	5.95										
360.0	5.89										