

Report No.:

Test Time: 2025-09-28 15:59

Luminaire Property

Luminaire Manufacturer:

Luminaire Description: 50D

Luminous Width (mm): -45

Current: 0.111 A

Power Factor: 0.541

Luminous Length (mm): -45

Voltage: 223.7 V

Power: 13.50 W

Photometric Results

CIE Class: Direct

Measurement Flux: 1443.8 lm

Downward Ratio: 100%

Horizontal Diffuse Angle(50%): H58.1

Vertical Diffuse Angle(50%): V58.1

Luminaire Efficacy Rating (LER): 106.99

Max. Intensity: 1694.68 cd

S/MH(C0/C180): 0.95

Total Rated Lamp Lumens: 1443.8 lm

Efficiency: 100%

Upward Ratio: 0%

Central Intensity: 1673.28 cd

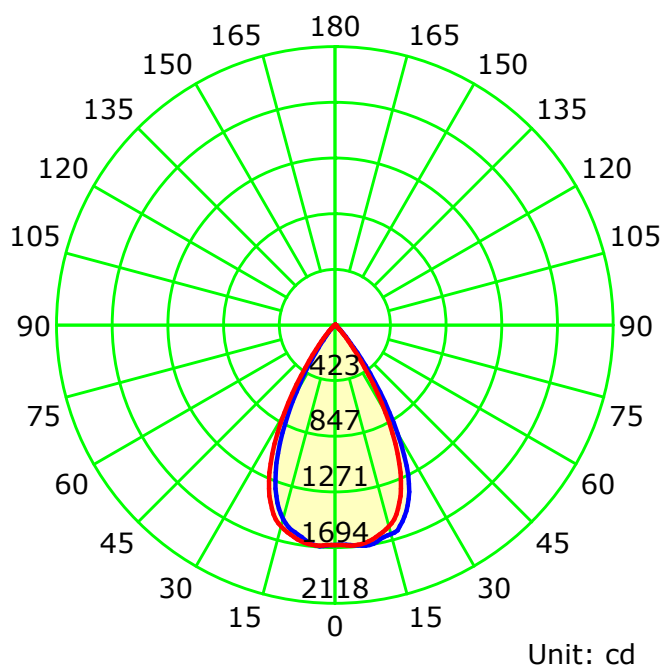
Pos of Max. Intensity: H0 V8

S/MH(C90/C270): 0.95

Picture Of Luminaire



Luminous Intensity Distribution Curve



— C0-C180 — C90-C270

C Plane (°):0.0-180.0: 180.0

Test Lab:

Test Type: TYPE C

Temperature:

Operator:

Gamma Plane (°):0.0-90.0:1.0

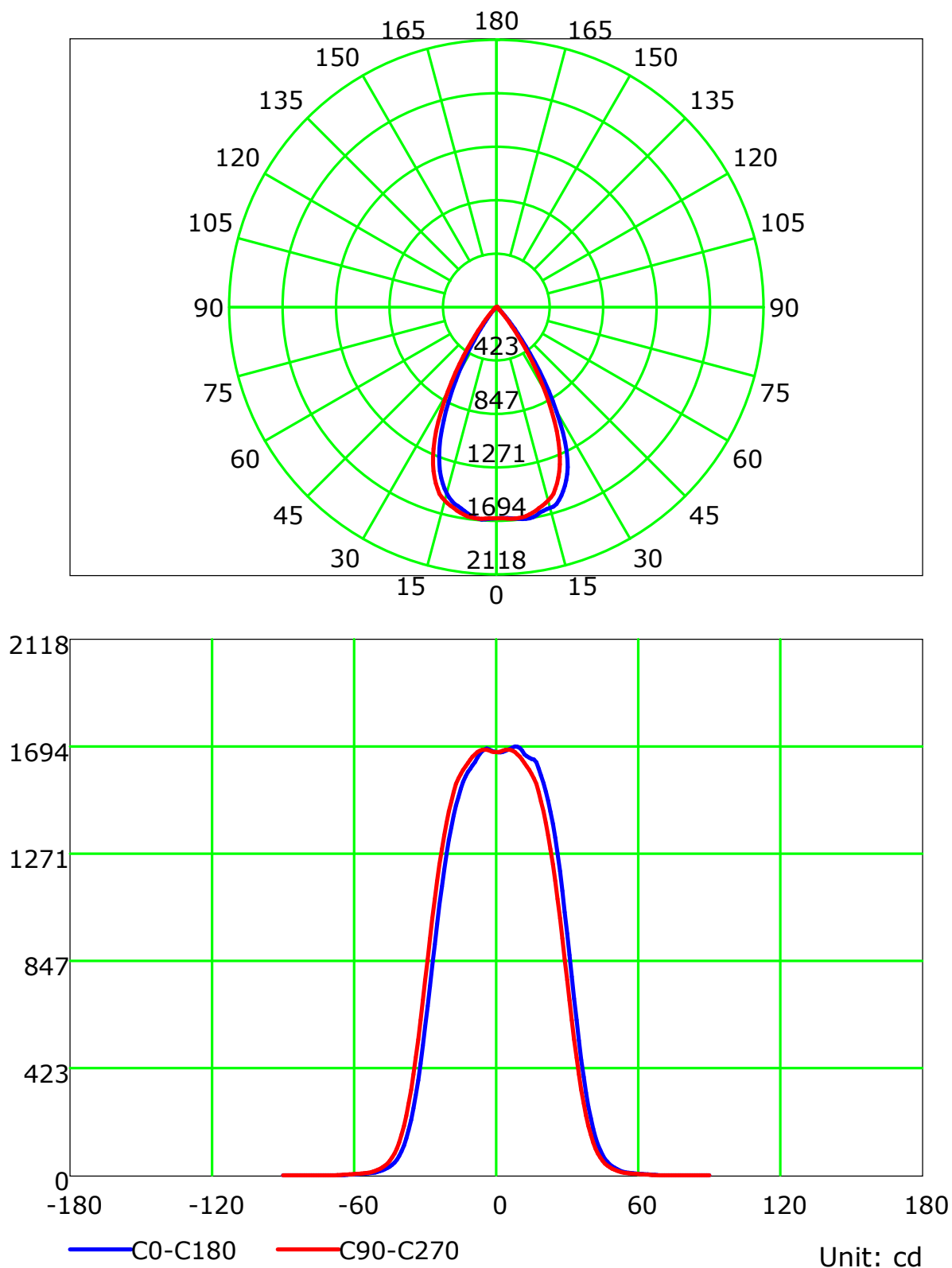
Test Device: CHL-6E

Distance: 2.905 m

Humidity:

Inspector:

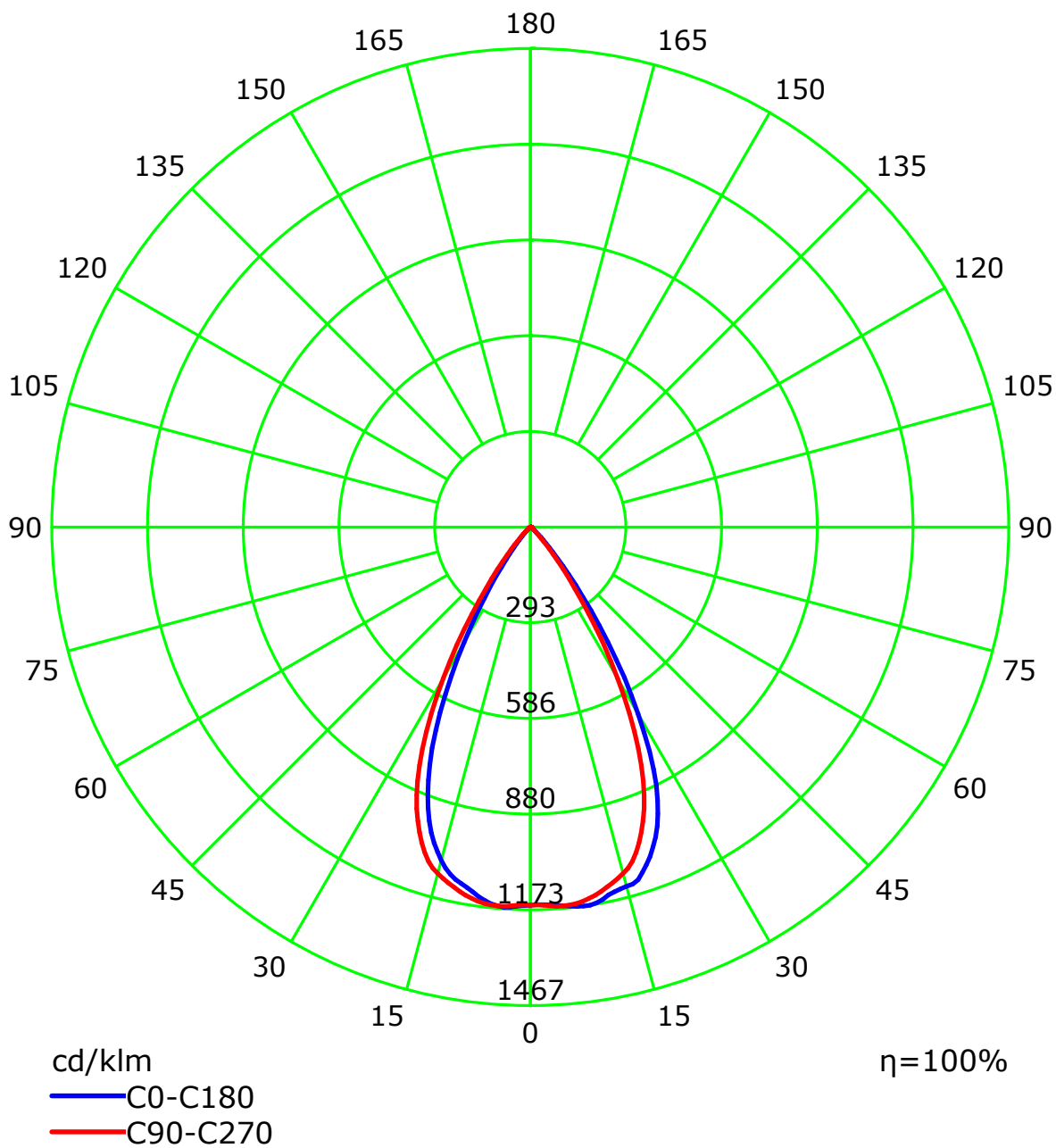
Luminous Intensity Distribution Curve



C Plane (°):0.0-180.0: 180.0
Test Lab:
Test Type: TYPE C
Temperature:
Operator:

Gamma Plane (°):0.0-90.0:1.0
Test Device: CHL-6E
Distance: 2.905 m
Humidity:
Inspector:

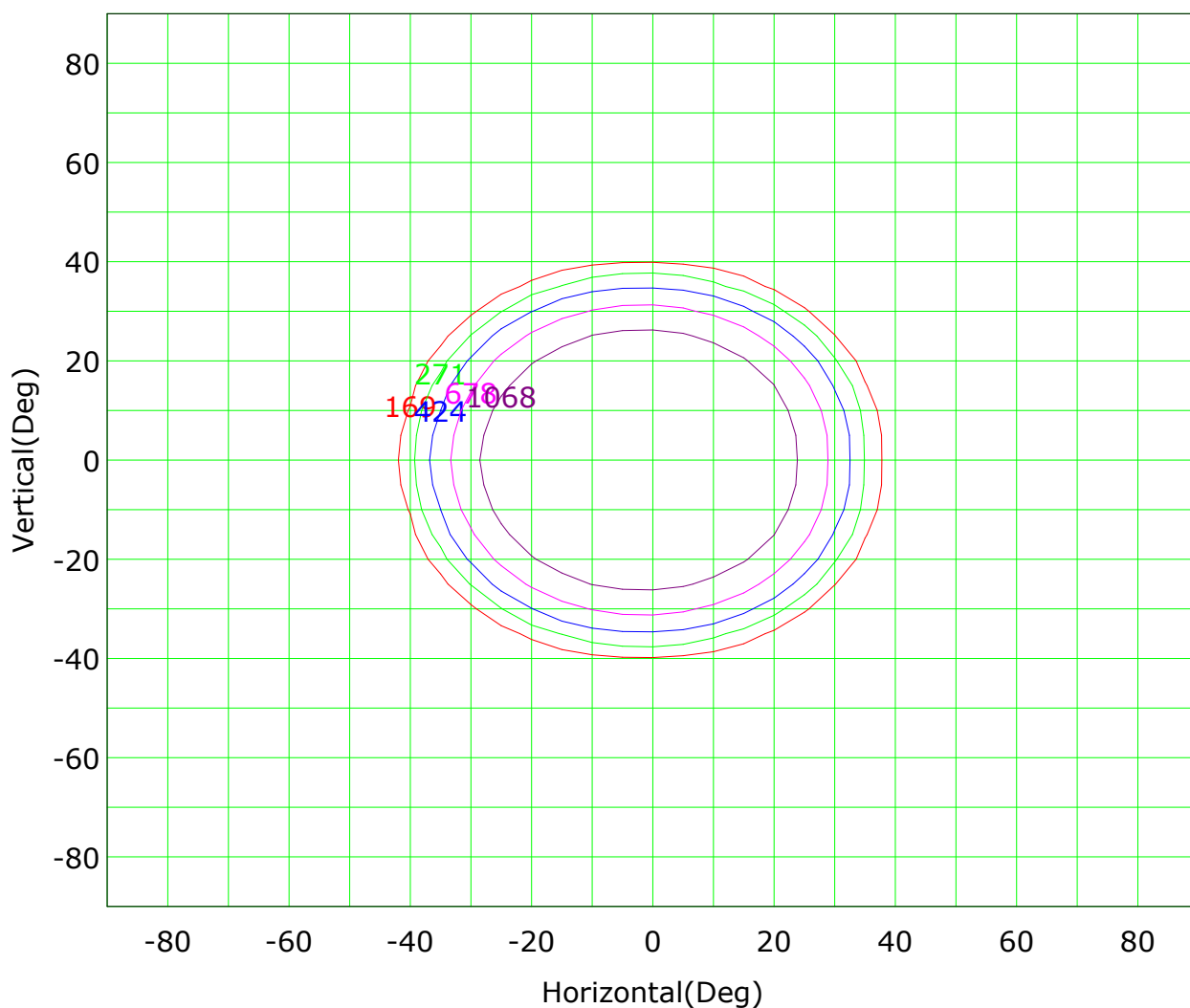
Luminous Intensity Distribution Curve(cd/klm)



C Plane (°):0.0-180.0: 180.0
Test Lab:
Test Type: TYPE C
Temperature:
Operator:

Gamma Plane (°):0.0-90.0:1.0
Test Device: CHL-6E
Distance: 2.905 m
Humidity:
Inspector:

Isocandela (rectangle)



Imax (100%): 1695 cd

(10%): 169 cd	(16%): 271 cd
(25%): 424 cd	(40%): 678 cd
(63%): 1068 cd	(100%): 1695 cd

C Plane (°):0.0-180.0: 180.0

Test Lab:

Test Type: TYPE C

Temperature:

Operator:

Gamma Plane (°):0.0-90.0:1.0

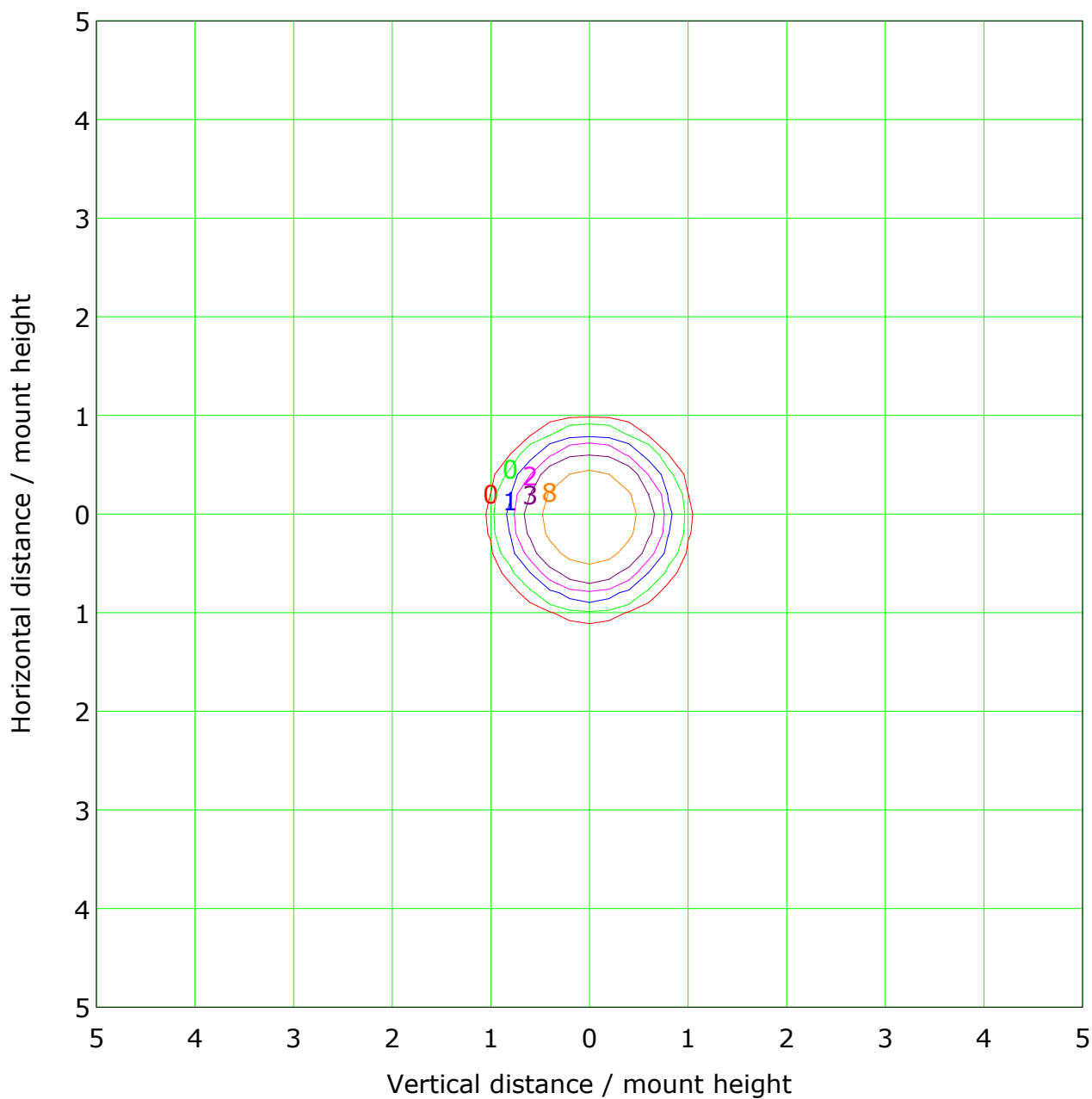
Test Device: CHL-6E

Distance: 2.905 m

Humidity:

Inspector:

IsoLux Plot



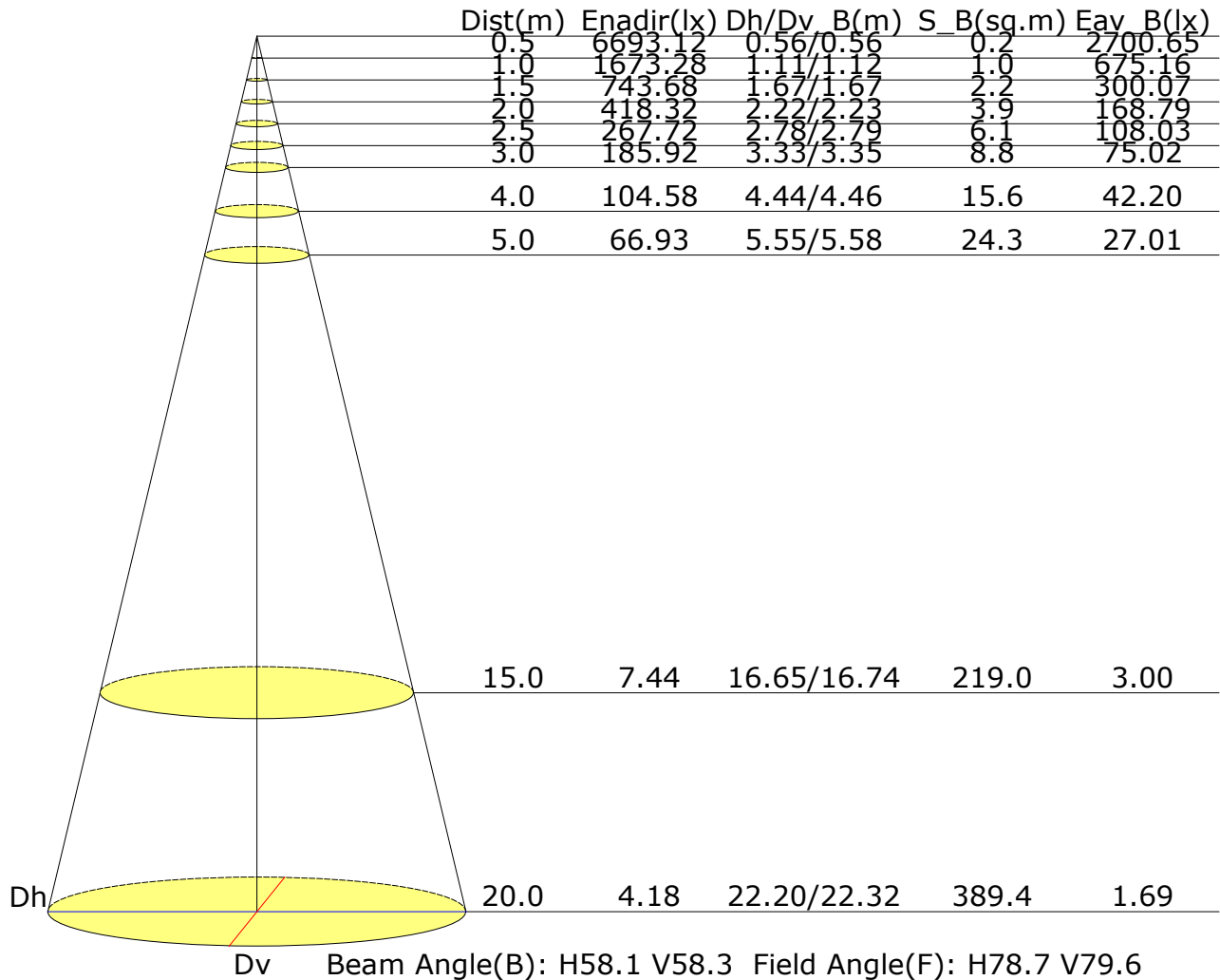
Mounting Height: 10.0m Max Lux(100%): 16.8 lx

(1%): 0.2 lx	(2%): 0.3 lx
(5%): 0.8 lx	(10%): 1.7 lx
(20%): 3.4 lx	(50%): 8.4 lx
(100%): 16.8 lx	

C Plane (°):0.0-180.0: 180.0
Test Lab:
Test Type: TYPE C
Temperature:
Operator:

Gamma Plane (°):0.0-90.0:1.0
Test Device: CHL-6E
Distance: 2.905 m
Humidity:
Inspector:

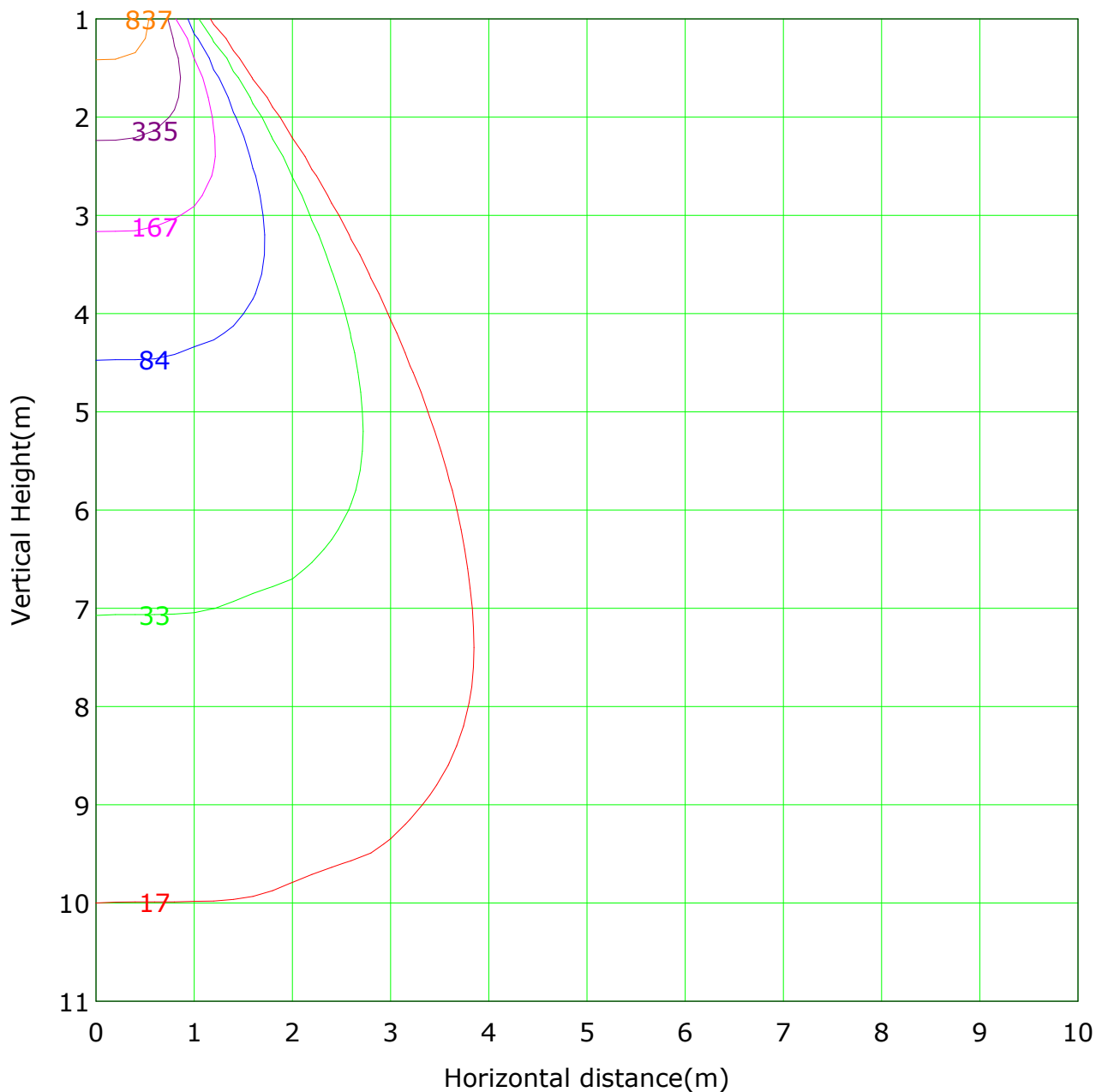
Illuminance at a Distance



C Plane (°):0.0-180.0: 180.0
Test Lab:
Test Type: TYPE C
Temperature:
Operator:

Gamma Plane (°):0.0-90.0:1.0
Test Device: CHL-6E
Distance: 2.905 m
Humidity:
Inspector:

Vertical IsoLux Plot



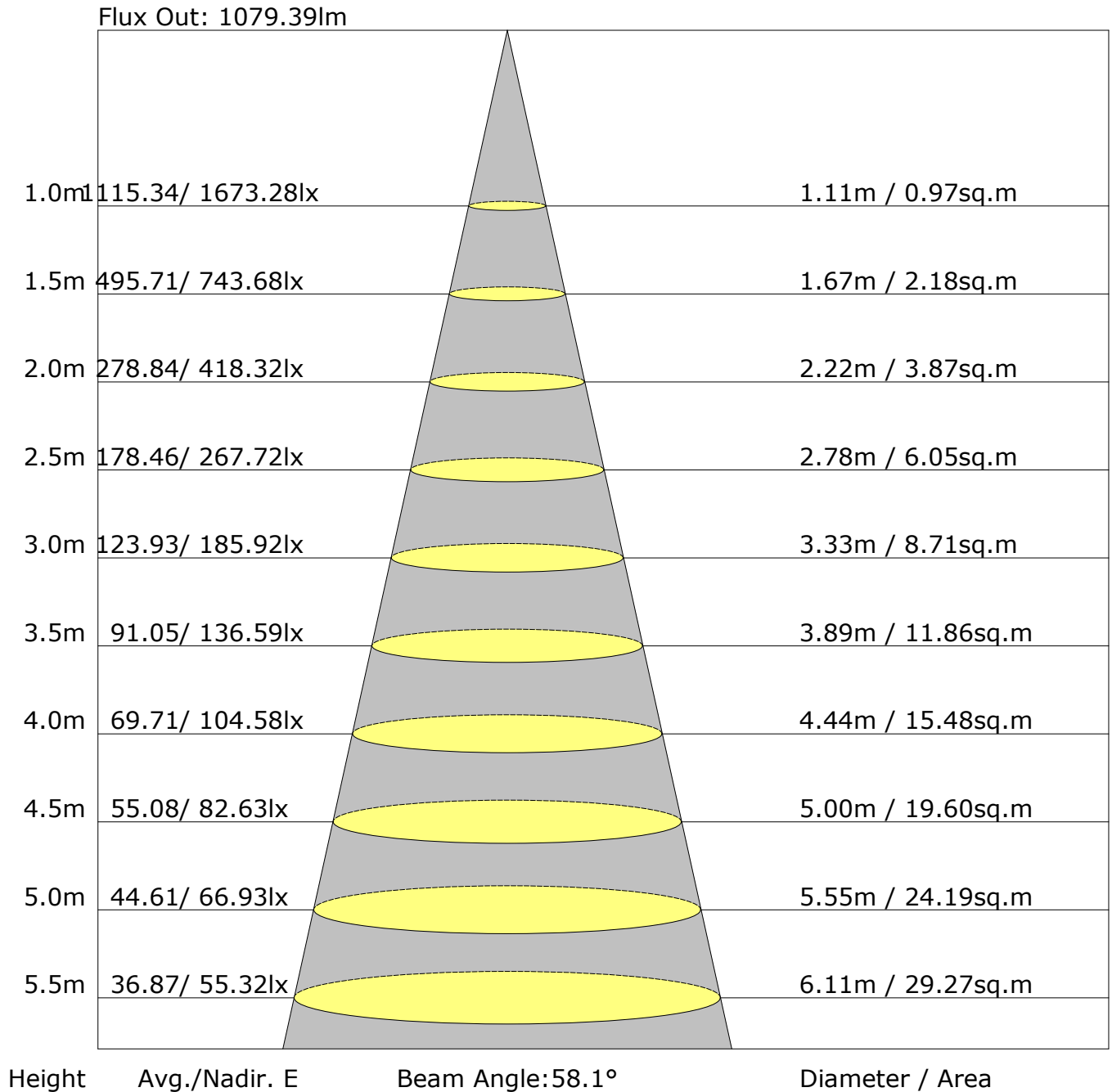
Lowest(m): 1.0m Highest(m): 11.0m Max Lux: 1673.3 lx
— (1%): 16.7 lx — (2%): 33.5 lx
— (5%): 83.7 lx — (10%): 167.3 lx
— (20%): 334.7 lx — (50%): 836.6 lx
— (100%):1673.3 lx

C Plane (°):0.0-180.0: 180.0
Test Lab:
Test Type: TYPE C
Temperature:
Operator:

Gamma Plane (°):0.0-90.0:1.0
Test Device: CHL-6E
Distance: 2.905 m
Humidity:
Inspector:

Gamma Plane (°):0.0-90.0:1.0
Test Device: CHL-6E
Distance: 2.905 m
Humidity:
Inspector:

The Average Illuminance Effective Figure



UGR Table

Reflectance:										
Ceiling (cavity)	0.7	0.7	0.5	0.5	0.3	0.7	0.7	0.5	0.5	0.3
Wall	0.5	0.3	0.5	0.3	0.3	0.5	0.3	0.5	0.3	0.3
Reference 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	24.2	25.1	24.5	25.3	25.5	23.1	23.9	23.3	24.1	24.3
3H	24.1	24.8	24.4	25.1	25.3	22.9	23.7	23.2	23.9	24.2
4H	24.0	24.7	24.3	25.0	25.2	22.9	23.6	23.2	23.8	24.1
6H	23.9	24.6	24.3	24.9	25.2	22.8	23.4	23.1	23.7	24.0
8H	23.9	24.5	24.2	24.8	25.1	22.7	23.4	23.1	23.7	24.0
12H	23.9	24.5	24.2	24.8	25.1	22.7	23.3	23.1	23.6	23.9
X=4H Y=2H	24.0	24.7	24.3	25.0	25.2	22.9	23.6	23.2	23.8	24.1
3H	23.9	24.5	24.2	24.8	25.1	22.7	23.3	23.1	23.6	23.9
4H	23.8	24.3	24.2	24.7	25.0	22.6	23.2	23.0	23.5	23.9
6H	23.7	24.2	24.1	24.5	24.9	22.6	23.0	23.0	23.4	23.8
8H	23.7	24.1	24.1	24.5	24.9	22.5	22.9	22.9	23.3	23.7
12H	23.6	24.0	24.1	24.4	24.8	22.5	22.8	22.9	23.3	23.7
X=8H Y=4H	23.7	24.1	24.1	24.5	24.9	22.5	22.9	22.9	23.3	23.7
6H	23.6	23.9	24.0	24.3	24.8	22.4	22.8	22.9	23.2	23.6
8H	23.5	23.8	24.0	24.3	24.7	22.4	22.7	22.8	23.1	23.6
12H	23.5	23.7	24.0	24.2	24.7	22.3	22.6	22.8	23.1	23.6
X=12H Y=4H	23.6	24.0	24.1	24.4	24.8	22.5	22.8	22.9	23.3	23.7
6H	23.5	23.8	24.0	24.3	24.7	22.4	22.7	22.8	23.1	23.6
8H	23.5	23.7	24.0	24.2	24.7	22.3	22.6	22.8	23.1	23.6
Variations with the observer position at spacings:										
S=1.0H	+5.5/-14.1					+5.3/-13.9				
S=1.5H	+8.3/-16.7					+8.1/-16.9				
S=2.0H	+10.3/-24.2					+10.1/-25.3				

Calculate in accordance with CIE Pub.117. The table is revised with 1444lm ($8\log(F/F_0) = 1.3$).

C Plane (°):0.0-180.0: 180.0
Test Lab:
Test Type: TYPE C
Temperature:
Operator:

Gamma Plane (°):0.0-90.0:1.0
Test Device: CHL-6E
Distance: 2.905 m
Humidity:
Inspector:

FLUX DISTRIBUTION TABLE BASED ON THE IESNA LUMINAIRE CLASSIFICATION SYSTEM

	ZONE	LUMENS	% LAMP LUMENS
	FORWARD LIGHT	773	53.5
	FL (0°-30°)	585	40.5
	FM (30°-60°)	186	12.9
	FH (60°-80°)	2	0.1
	FVH (80°-90°)	0	0.0
	BACK LIGHT	671	46.5
	BL (0°-30°)	537	37.2
	BM (30°-60°)	134	9.3
	BH (60°-80°)	1	0.1
	BVH (80°-90°)	0	0.0
	UP LIGHT	0	0.0
	UL (90°-100°)	0	0.0
	UH (100°-180°)	0	0.0
	TRAPPED LIGHT	NA	NA

BUG(Backlight,Uplight,Glare) Rating Base On TM-15-07	
Asymmetrical Luminaire Types (Type I,II,III,IV)	B2 U0 G0
Quadrilateral Symmetrical Luminaire Types (Type V,Area Light)	B2 U0 G0

C Plane (°):0.0-180.0: 180.0
Test Lab:
Test Type: TYPE C
Temperature:
Operator:

Gamma Plane (°):0.0-90.0:1.0
Test Device: CHL-6E
Distance: 2.905 m
Humidity:
Inspector:

Zonal Lumen

Gamma [°]	I _{mean} [cd]	Zonal Flux [lm]	Sum Zonal Flux [lm]	Rel Zonal Flux [%]	Sum Rel Zonal Flux [%]
0.0-1.0	1673.3	1.6	1.6	0.11	0.11
1.0-2.0	1674.3	4.8	6.4	0.33	0.44
2.0-3.0	1676.9	8.0	14.4	0.56	1.00
3.0-4.0	1680.5	11.3	25.7	0.78	1.78
4.0-5.0	1682.5	14.5	40.2	1.00	2.78
5.0-6.0	1682.1	17.7	57.8	1.22	4.01
6.0-7.0	1679.9	20.9	78.7	1.44	5.45
7.0-8.0	1675.6	24.0	102.7	1.66	7.11
8.0-9.0	1668.6	27.0	129.7	1.87	8.98
9.0-10.0	1659.4	30.0	159.8	2.08	11.07
10.0-11.0	1648.8	33.0	192.7	2.28	13.35
11.0-12.0	1636.1	35.8	228.5	2.48	15.83
12.0-13.0	1623.2	38.5	267.0	2.67	18.49
13.0-14.0	1610.0	41.2	308.2	2.85	21.35
14.0-15.0	1594.9	43.8	352.0	3.03	24.38
15.0-16.0	1578.3	46.3	398.3	3.20	27.58
16.0-17.0	1558.4	48.5	446.8	3.36	30.95
17.0-18.0	1530.8	50.5	497.3	3.50	34.44
18.0-19.0	1496.3	52.1	549.3	3.61	38.05
19.0-20.0	1458.1	53.4	602.7	3.70	41.75
20.0-21.0	1415.6	54.4	657.1	3.77	45.51
21.0-22.0	1368.8	55.0	712.1	3.81	49.32
22.0-23.0	1317.1	55.3	767.4	3.83	53.15
23.0-24.0	1259.6	55.1	822.4	3.82	56.97
24.0-25.0	1196.5	54.4	876.9	3.77	60.73
25.0-26.0	1128.0	53.3	930.1	3.69	64.42
26.0-27.0	1054.3	51.6	981.7	3.57	68.00
27.0-28.0	976.1	49.4	1031.1	3.42	71.42
28.0-29.0	895.2	46.8	1078.0	3.24	74.66
29.0-30.0	813.4	43.9	1121.9	3.04	77.71
30.0-31.0	732.3	40.8	1162.7	2.82	80.53
31.0-32.0	652.7	37.4	1200.1	2.59	83.12
32.0-33.0	575.4	33.9	1234.0	2.35	85.47
33.0-34.0	501.4	30.3	1264.3	2.10	87.57
34.0-35.0	432.2	26.8	1291.2	1.86	89.43
35.0-36.0	368.3	23.5	1314.6	1.62	91.05

C Plane (°):0.0-180.0: 180.0
Test Lab:
Test Type: TYPE C
Temperature:
Operator:

Gamma Plane (°):0.0-90.0:1.0
Test Device: CHL-6E
Distance: 2.905 m
Humidity:
Inspector:

Zonal Lumen (Continue 1)

Gamma [°]	I _{mean} [cd]	Zonal Flux [lm]	Sum Zonal Flux [lm]	Rel Zonal Flux [%]	Sum Rel Zonal Flux [%]
36.0-37.0	310.9	20.3	1334.9	1.40	92.46
37.0-38.0	260.3	17.4	1352.3	1.20	93.66
38.0-39.0	215.9	14.7	1367.0	1.02	94.68
39.0-40.0	178.0	12.4	1379.4	0.86	95.54
40.0-41.0	145.7	10.4	1389.8	0.72	96.26
41.0-42.0	118.6	8.6	1398.4	0.60	96.86
42.0-43.0	96.6	7.2	1405.6	0.50	97.35
43.0-44.0	78.6	5.9	1411.5	0.41	97.77
44.0-45.0	64.2	4.9	1416.4	0.34	98.11
45.0-46.0	52.5	4.1	1420.5	0.28	98.39
46.0-47.0	43.1	3.4	1424.0	0.24	98.63
47.0-48.0	35.7	2.9	1426.9	0.20	98.83
48.0-49.0	29.8	2.4	1429.3	0.17	99.00
49.0-50.0	24.8	2.1	1431.4	0.14	99.14
50.0-51.0	20.5	1.7	1433.1	0.12	99.26
51.0-52.0	17.0	1.5	1434.5	0.10	99.36
52.0-53.0	14.3	1.2	1435.8	0.09	99.45
53.0-54.0	12.0	1.1	1436.8	0.07	99.52
54.0-55.0	10.2	0.9	1437.8	0.06	99.59
55.0-56.0	9.0	0.8	1438.6	0.06	99.64
56.0-57.0	8.1	0.7	1439.3	0.05	99.69
57.0-58.0	7.4	0.7	1440.0	0.05	99.74
58.0-59.0	6.7	0.6	1440.6	0.04	99.78
59.0-60.0	6.0	0.6	1441.2	0.04	99.82
60.0-61.0	5.3	0.5	1441.7	0.04	99.86
61.0-62.0	4.7	0.4	1442.2	0.03	99.89
62.0-63.0	3.9	0.4	1442.5	0.03	99.92
63.0-64.0	3.3	0.3	1442.9	0.02	99.94
64.0-65.0	2.7	0.3	1443.1	0.02	99.96
65.0-66.0	2.0	0.2	1443.3	0.01	99.97
66.0-67.0	1.4	0.1	1443.5	0.01	99.98
67.0-68.0	0.9	0.1	1443.6	0.01	99.99
68.0-69.0	0.6	0.1	1443.6	0.00	99.99
69.0-70.0	0.4	0.0	1443.7	0.00	99.99
70.0-71.0	0.1	0.0	1443.7	0.00	99.99
71.0-72.0	0.1	0.0	1443.7	0.00	100.00

C Plane (°):0.0-180.0: 180.0
Test Lab:
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Gamma Plane (°):0.0-90.0:1.0
Test Device: CHL-6E
Distance: 2.905 m
Humidity:
Inspector:

Gamma Plane (°):0.0-90.0:1.0
Test Device: CHL-6E
Distance: 2.905 m
Humidity:
Inspector:

Candlepower Table

Unit: cd

G\C	C0.0	C180.0								
G0.0	1673.3	1673.3								
G1.0	1671.6	1675.2								
G2.0	1671.7	1678.4								
G3.0	1674.3	1683.1								
G4.0	1678.2	1686.7								
G5.0	1682.2	1682.8								
G6.0	1686.3	1676.9								
G7.0	1691.6	1664.9								
G8.0	1694.7	1651.3								
G9.0	1694.1	1634.3								
G10.0	1689.1	1620.3								
G11.0	1679.3	1606.7								
G12.0	1664.1	1594.5								
G13.0	1656.5	1577.6								
G14.0	1650.6	1555.1								
G15.0	1646.2	1527.7								
G16.0	1643.6	1495.5								
G17.0	1632.6	1461.7								
G18.0	1607.1	1422.0								
G19.0	1580.3	1376.0								
G20.0	1550.5	1325.6								
G21.0	1516.8	1269.7								
G22.0	1480.4	1208.4								
G23.0	1437.5	1142.0								
G24.0	1389.0	1070.1								
G25.0	1334.4	992.6								
G26.0	1272.8	912.4								
G27.0	1202.4	829.6								
G28.0	1124.1	748.3								
G29.0	1039.9	668.6								
G30.0	956.0	589.2								
G31.0	871.1	512.8								
G32.0	785.2	441.8								
G33.0	698.8	375.8								
G34.0	614.2	316.9								
G35.0	532.5	265.1								
G36.0	456.2	219.3								

C Plane (°):0.0-180.0: 180.0
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Gamma Plane (°):0.0-90.0:1.0
Test Device: CHL-6E
Distance: 2.905 m
Humidity:
Inspector:

Candlepower Table (Continue 1)

Unit: cd

G\C	C0.0	C180.0								
G37.0	388.5	179.6								
G38.0	326.8	146.1								
G39.0	272.1	118.4								
G40.0	226.0	95.5								
G41.0	184.6	76.8								
G42.0	150.8	62.1								
G43.0	123.1	50.3								
G44.0	99.7	41.4								
G45.0	80.7	34.8								
G46.0	65.3	29.2								
G47.0	53.4	24.6								
G48.0	43.9	20.8								
G49.0	36.8	17.5								
G50.0	30.5	14.5								
G51.0	25.2	11.6								
G52.0	20.8	10.2								
G53.0	16.8	9.4								
G54.0	13.1	8.5								
G55.0	11.5	7.7								
G56.0	10.2	6.7								
G57.0	9.4	6.2								
G58.0	8.4	5.6								
G59.0	7.7	5.0								
G60.0	6.8	4.6								
G61.0	6.2	3.8								
G62.0	5.4	3.2								
G63.0	4.8	2.2								
G64.0	4.5	1.7								
G65.0	3.6	1.0								
G66.0	2.9	0.4								
G67.0	2.1	0.1								
G68.0	1.4	0.1								
G69.0	1.0	0.0								
G70.0	0.4	0.0								
G71.0	0.1	0.0								
G72.0	0.1	0.1								
G73.0	0.1	0.0								

C Plane (°):0.0-180.0: 180.0

Test Lab:

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Gamma Plane (°):0.0-90.0:1.0

Test Device: CHL-6E

Distance: 2.905 m

Humidity:

Inspector:

Unit: cd

Inspector: