



Report No.: ARK-2-40K-010-WW

Test Time: 2020/9/12 13:50

## Luminaire Property

Luminaire Manufacturer: Rayhil

Luminaire Category: Anchor

Luminaire Description:

Luminous Length (mm): 605

Luminous Height (mm): 34

Current: 0.742 A

Power Factor: 1.000

Luminous Width (mm): 50

Voltage: 110 V

Power: 17.81 W

## Photometric Results

CIE Class: Direct

Measurement Flux: 1985.2 lm

Downward Ratio: 96%

Horizontal Diffuse Angle(10%,50%): H90.7,H57.7

Vertical Diffuse Angle(10%,50%): V29.4,V13

Luminaire Efficacy Rating (LER): 111

Max. Intensity: 6109.11 cd

Total Rated Lamp Lumens: 1985.2 lm

Efficiency: 100%

Upward Ratio: 4%

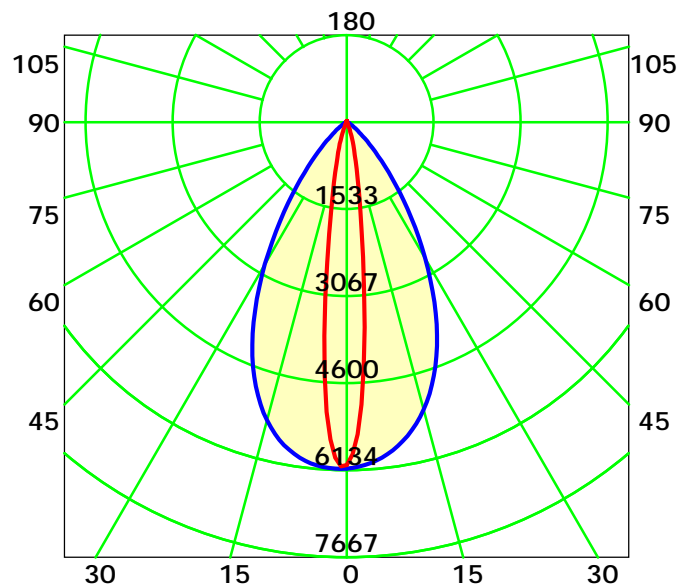
Central Intensity: 6103.36 cd

Pos of Max. Intensity: H180 V1

Picture Of Luminaire



Luminous Intensity Distribution Curve



Average Diffuse Angle(50%): 35.4° Unit: cd

— C0-C180 — C90-C270

C Plane (°):0.0-360.0: 30.0

Test Lab:

Test Type: TYPE C

Temperature: 25

Operator: Kerr

Gamma Plane (°):0.0-180.0: 1.0

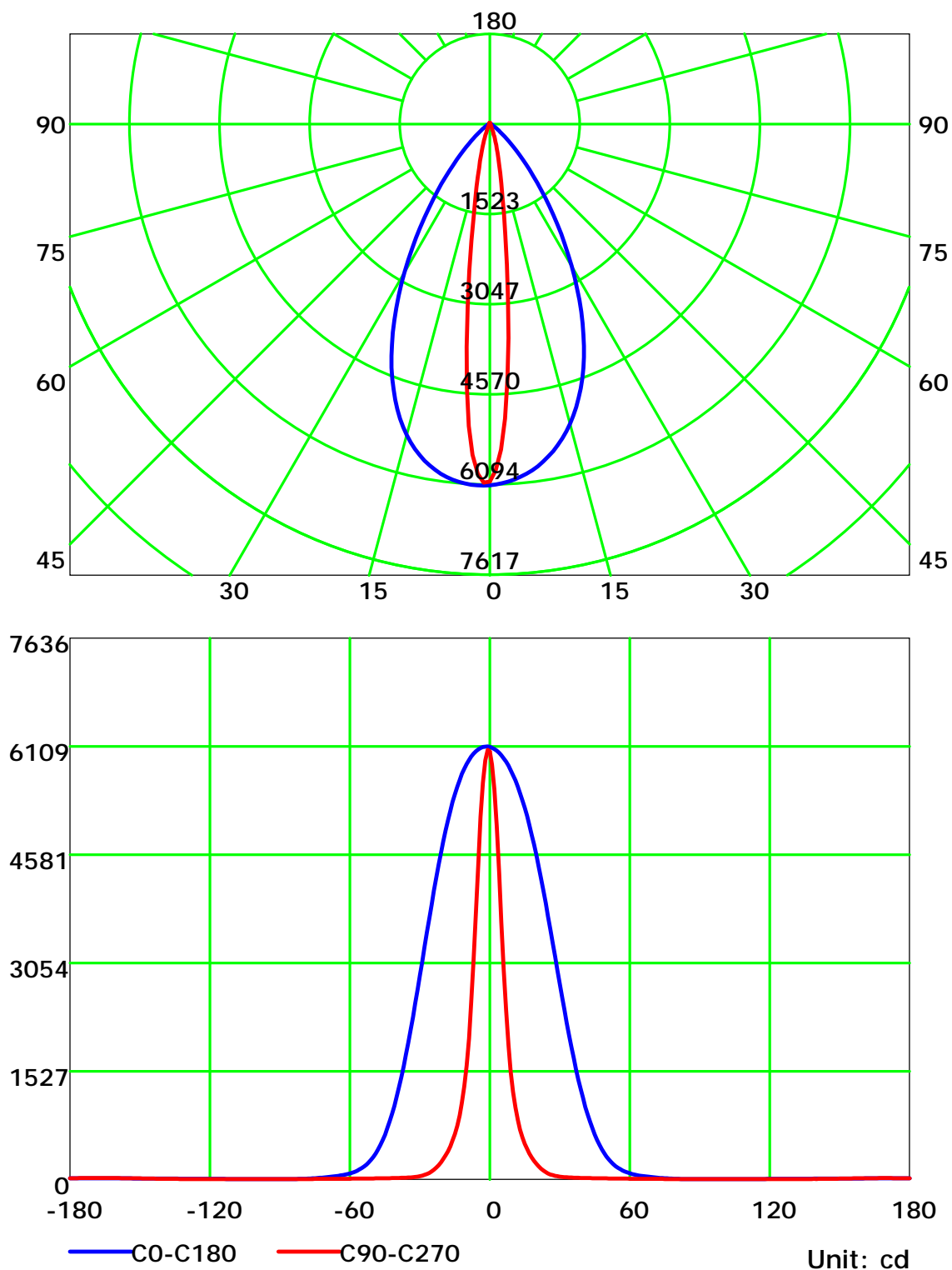
Test Device: GPM-1800B

Distance: 9.028 m

Humidity: 60%

Inspector:

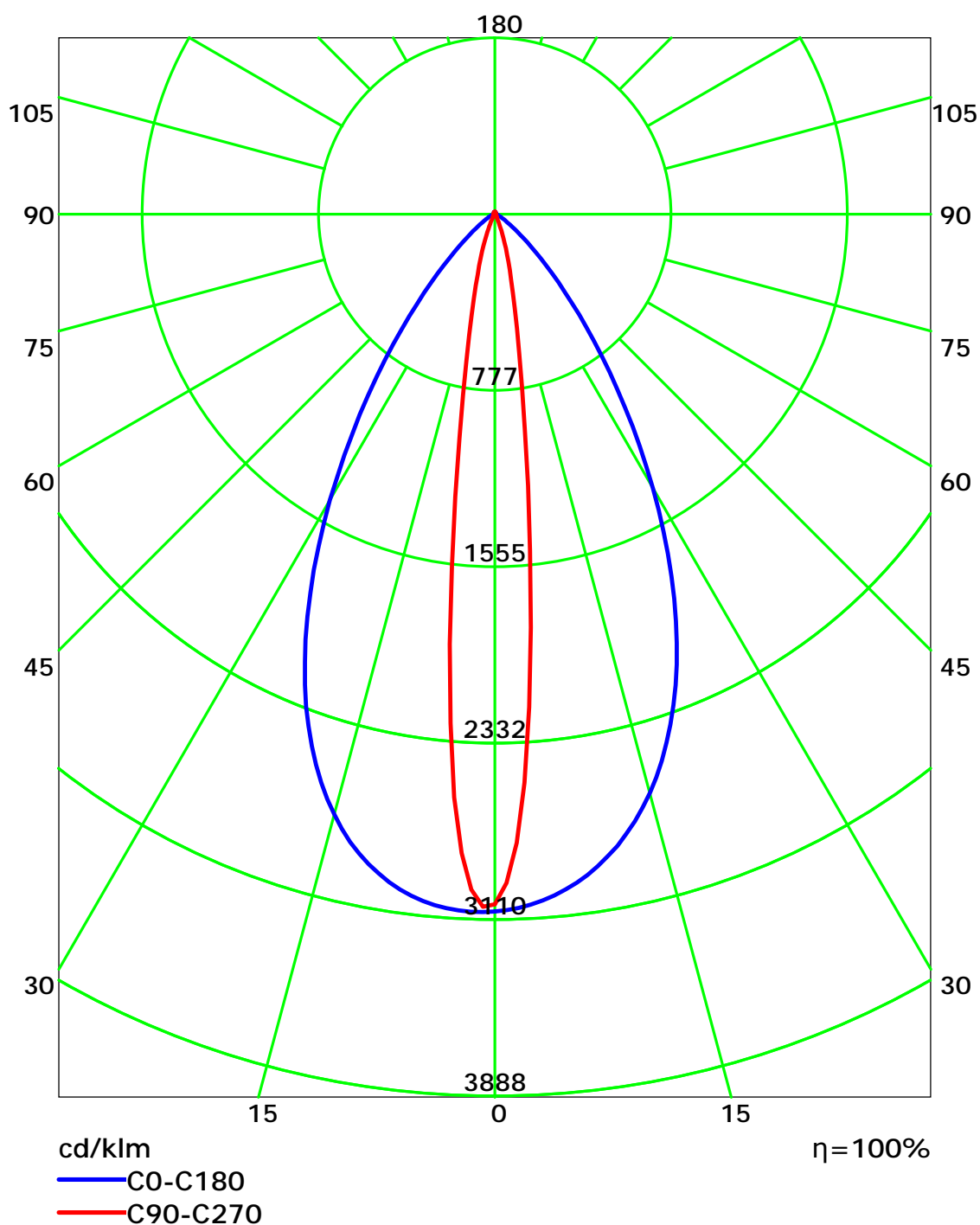
# Luminous Intensity Distribution Curve



C Plane (°):0.0-360.0: 30.0  
 Test Lab:  
 Test Type: TYPE C  
 Temperature: 25  
 Operator: Kerr

Gamma Plane (°):0.0-180.0:1.0  
 Test Device: GPM-1800B  
 Distance: 9.028 m  
 Humidity: 60%  
 Inspector:

## Luminous Intensity Distribution Curve(cd/klm)



C Plane (°):0.0-360.0: 30.0  
Test Lab:  
Test Type: TYPE C  
Temperature: 25  
Operator: Kerr

Gamma Plane (°):0.0-180.0:1.0  
Test Device: GPM-1800B  
Distance: 9.028 m  
Humidity: 60%  
Inspector:

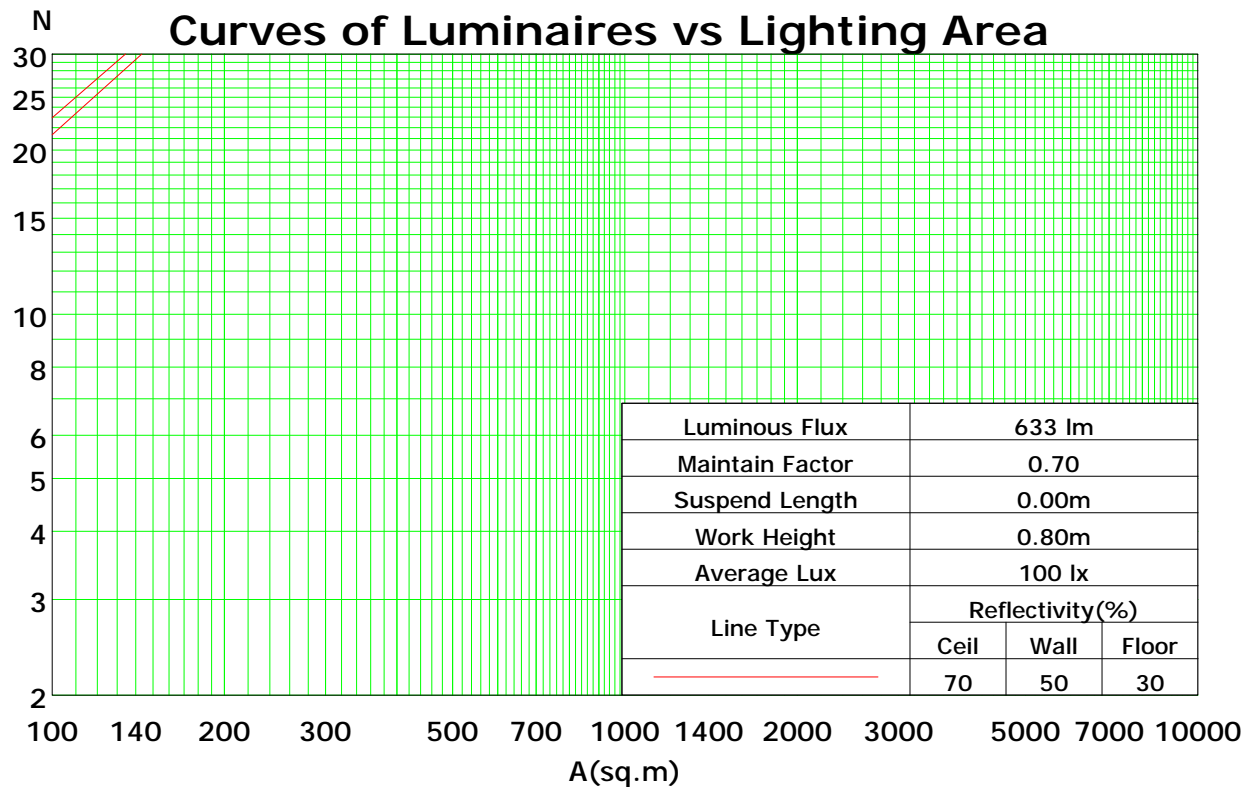
## Coefficients Of Utilization - Zonal Cavity Method

RC	0.8	0.8	0.8	0.8	0.7	0.7	0.7	0.7	0.5	0.5	0.5	0.3	0.3	0.3	0.1	0.1	0.1	0
RW	0.7	0.5	0.3	0.1	0.7	0.5	0.3	0.1	0.5	0.3	0.1	0.5	0.3	0.1	0.5	0.3	0.1	0
RCR	RF = 0.2																	
0	118	118	118	118	115	115	115	115	109	109	109	103	103	103	98	98	98	96
1	112	110	107	105	109	107	105	103	102	100	99	98	96	95	94	93	92	90
2	107	102	98	95	104	100	96	93	96	93	91	93	90	88	89	87	86	84
3	102	96	91	87	99	94	89	86	91	87	84	88	85	82	85	82	80	79
4	97	90	84	80	95	88	83	80	86	82	78	83	80	77	81	78	76	74
5	93	85	79	75	91	83	78	74	81	77	73	79	75	72	77	74	71	70
6	89	80	74	70	87	79	74	70	77	73	69	75	71	68	74	70	68	66
7	85	76	70	66	83	75	70	66	74	69	65	72	68	65	71	67	64	63
8	81	72	67	63	80	72	66	63	70	66	62	69	65	62	68	64	61	60
9	78	69	64	60	77	68	63	60	67	63	59	66	62	59	65	61	58	57
10	75	66	61	57	74	65	60	57	64	60	57	63	59	56	62	59	56	55

Spacing Criteria (0-180): 0.89

Spacing Criteria (90-270): 0.23

Spacing Criteria (Diagonal): 0.36



C Plane (°):0.0-360.0: 30.0

Test Lab:

Test Type: TYPE C

Temperature: 25

Operator: Kerr

Gamma Plane (°):0.0-180.0:1.0

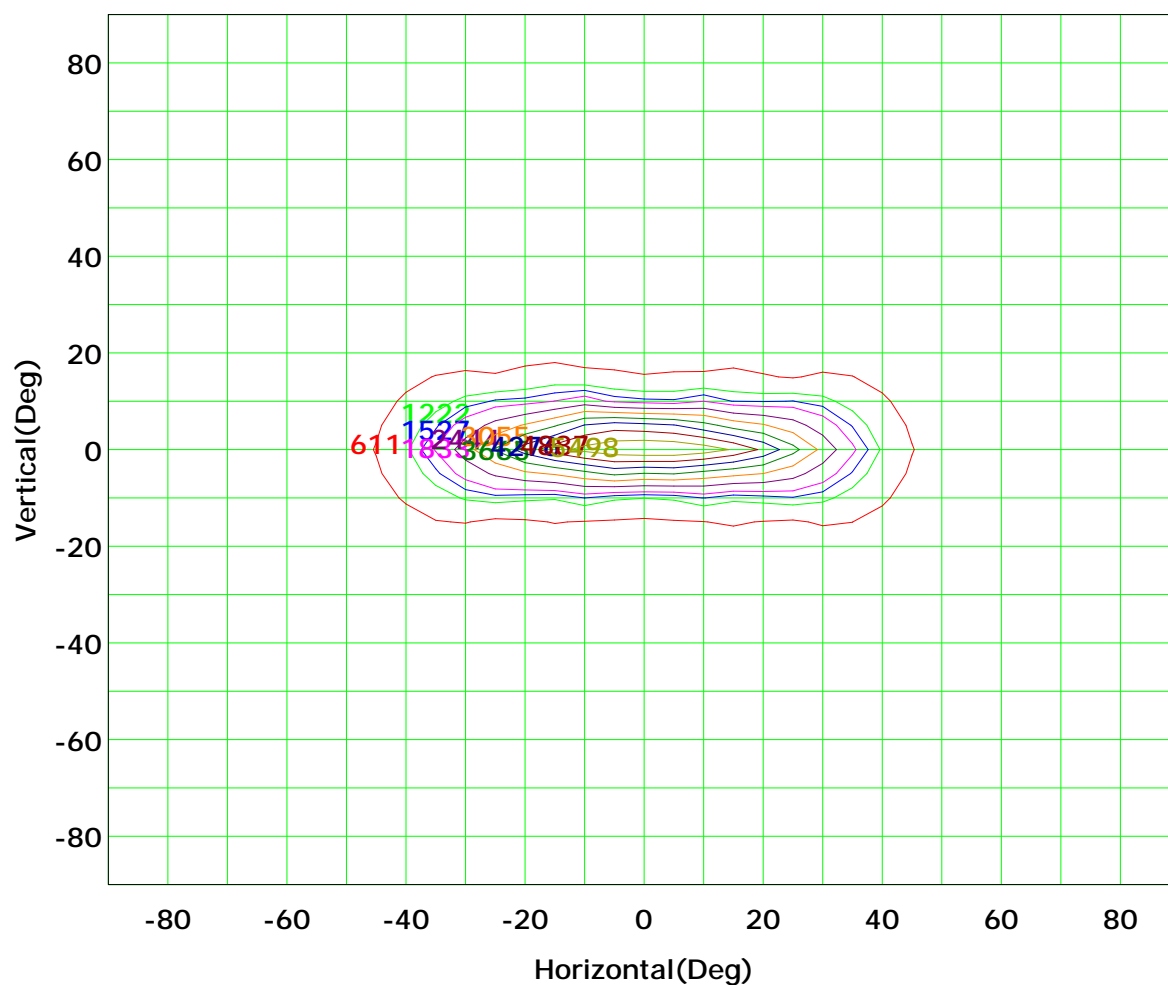
Test Device: GPM-1800B

Distance: 9.028 m

Humidity: 60%

Inspector:

## Isocandela (rectangle)



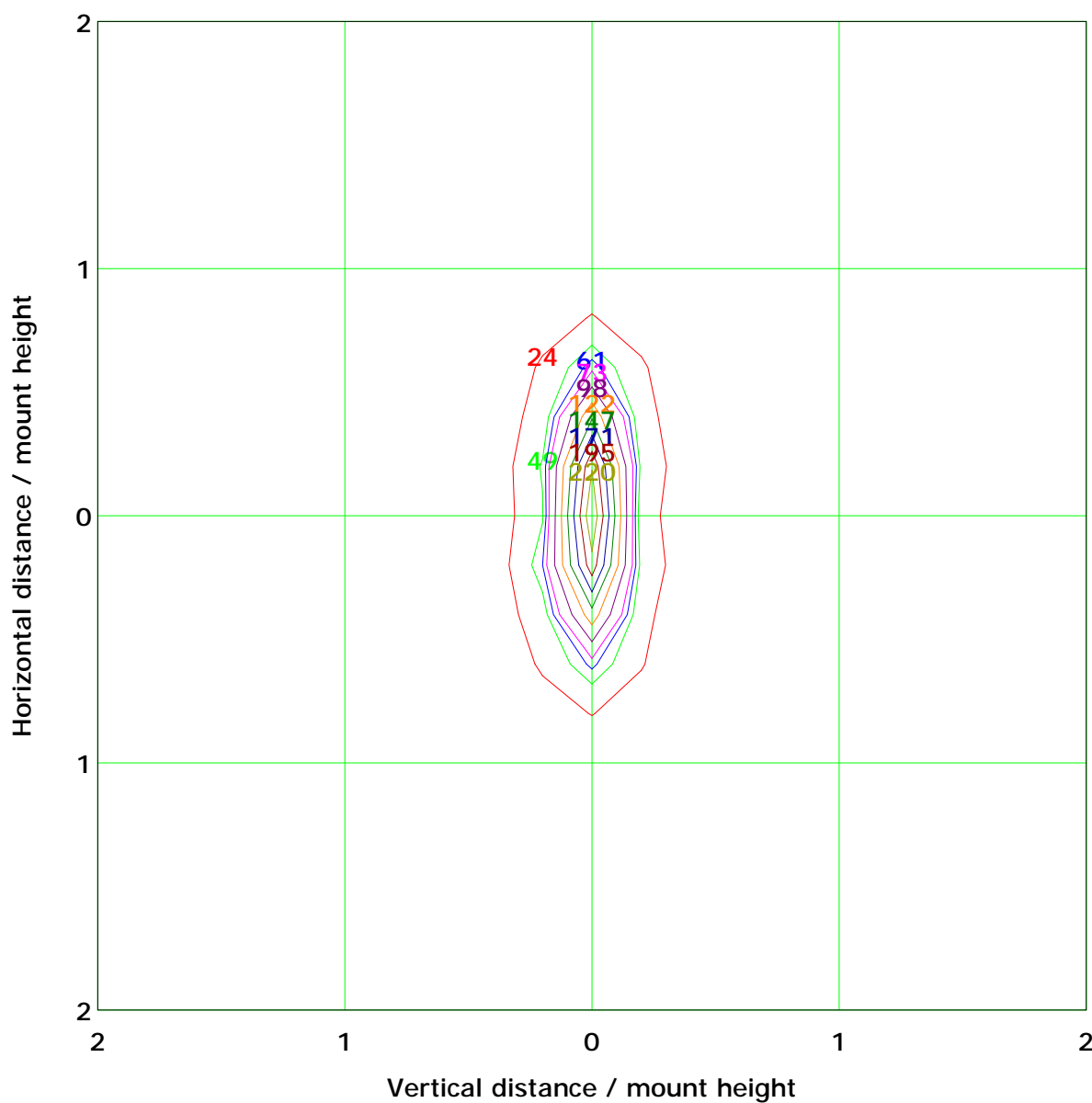
Imax (100%): 6109 cd

( 10%): 611 cd	( 20%): 1222 cd
( 25%): 1527 cd	( 30%): 1833 cd
( 40%): 2444 cd	( 50%): 3055 cd
( 60%): 3665 cd	( 70%): 4276 cd
( 80%): 4887 cd	( 90%): 5498 cd

C Plane (°):0.0-360.0: 30.0  
Test Lab:  
Test Type: TYPE C  
Temperature: 25  
Operator: Kerr

Gamma Plane (°):0.0-180.0:1.0  
Test Device: GPM-1800B  
Distance: 9.028 m  
Humidity: 60%  
Inspector:

## IsoLux Plot



Mounting Height: 5.0m    Max Lux(100%): 244.3 lx	
( 10%): 24.4 lx	( 20%): 48.9 lx
( 25%): 61.1 lx	( 30%): 73.3 lx
( 40%): 97.7 lx	( 50%): 122.1 lx
( 60%): 146.6 lx	( 70%): 171.0 lx
( 80%): 195.4 lx	( 90%): 219.8 lx

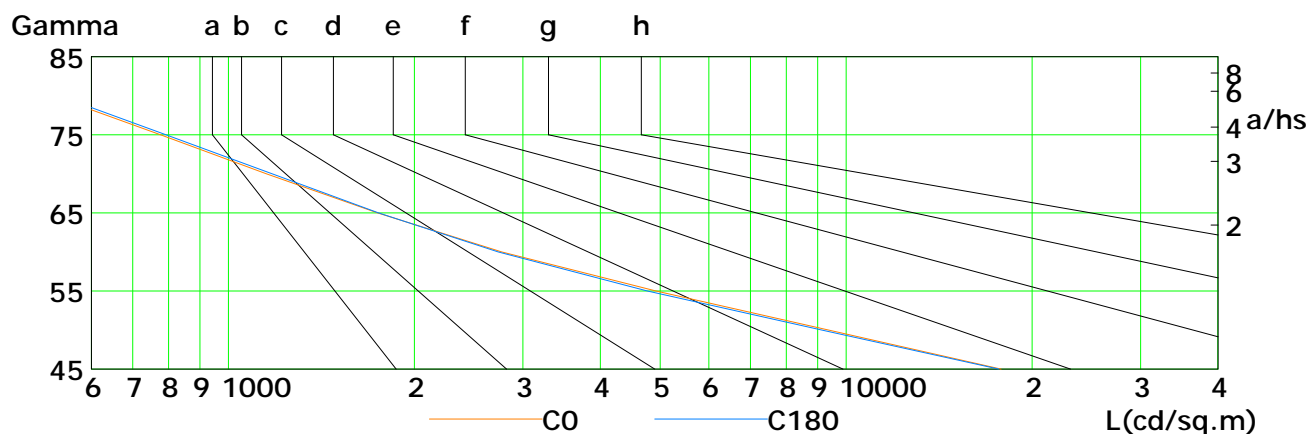
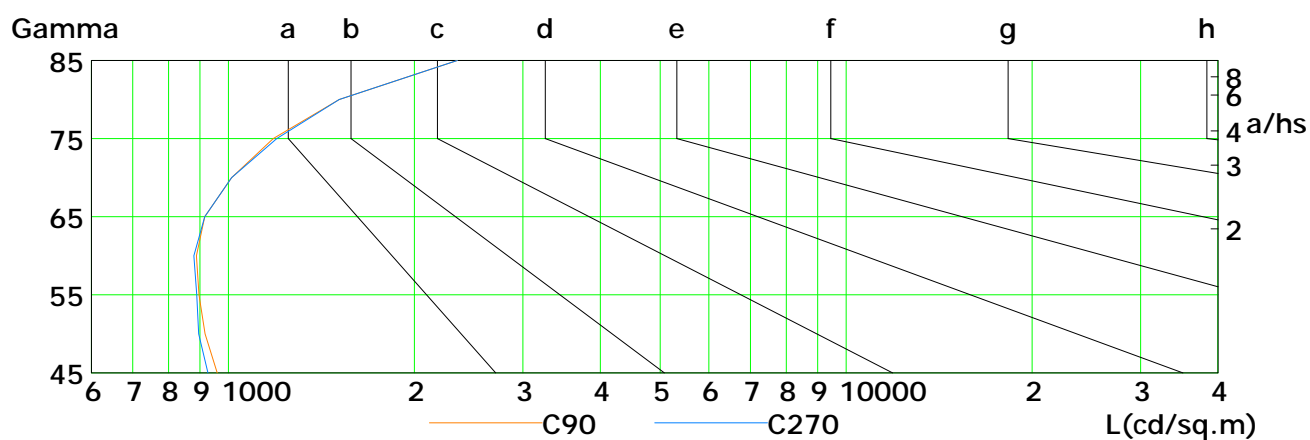
C Plane (°):0.0-360.0: 30.0  
 Test Lab:  
 Test Type: TYPE C  
 Temperature: 25  
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Gamma Plane (°):0.0-180.0:1.0  
 Test Device: GPM-1800B  
 Distance: 9.028 m  
 Humidity: 60%  
 Inspector:

## Lum Limit Curve

Dazzle	Quality	Illuminance (lx)							
1.15	A	2000	1000	500	<=300				
1.50	B		2000	1000	500	<=300			
1.85	C			2000	1000	500	<=300		
2.20	D				2000	1000	500	<=300	
2.55	E					2000	1000	500	<=300

a b c d e f g h



L(cd/sq.m)	G45	G50	G55	G60	G65	G70	G75	G80	G85
C0	17822	9373	4927	2771	1745	1152	777	520	446
C90	959	917	897	888	916	1012	1183	1511	2349
C180	17678	9138	4772	2735	1750	1177	793	532	446
C270	926	896	889	880	916	1012	1198	1511	2349

C Plane (°):0.0-360.0: 30.0

Test Lab:

Test Type: TYPE C

Temperature: 25

Operator: Kerr

Gamma Plane (°):0.0-180.0:1.0

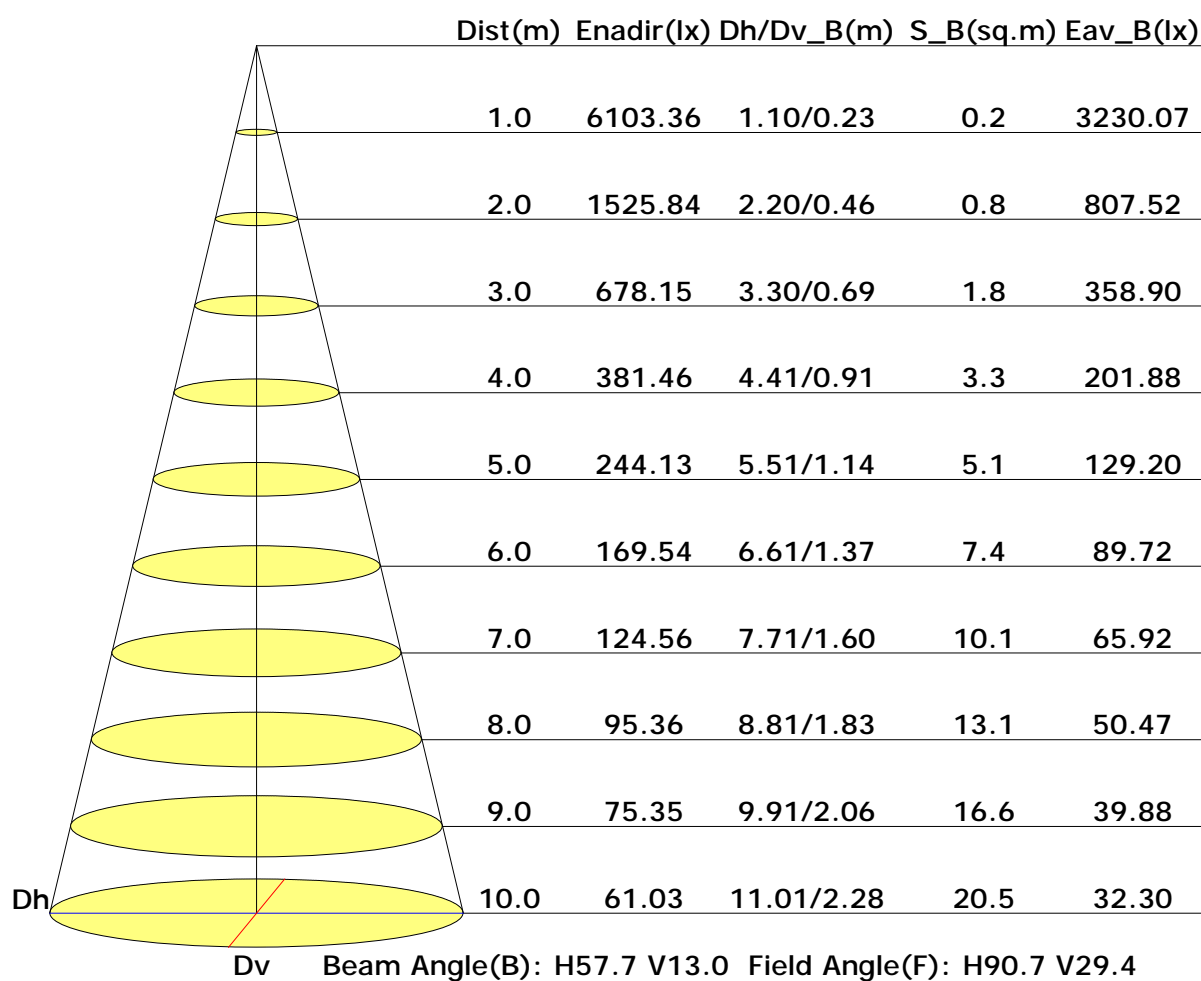
Test Device: GPM-1800B

Distance: 9.028 m

Humidity: 60%

Inspector:

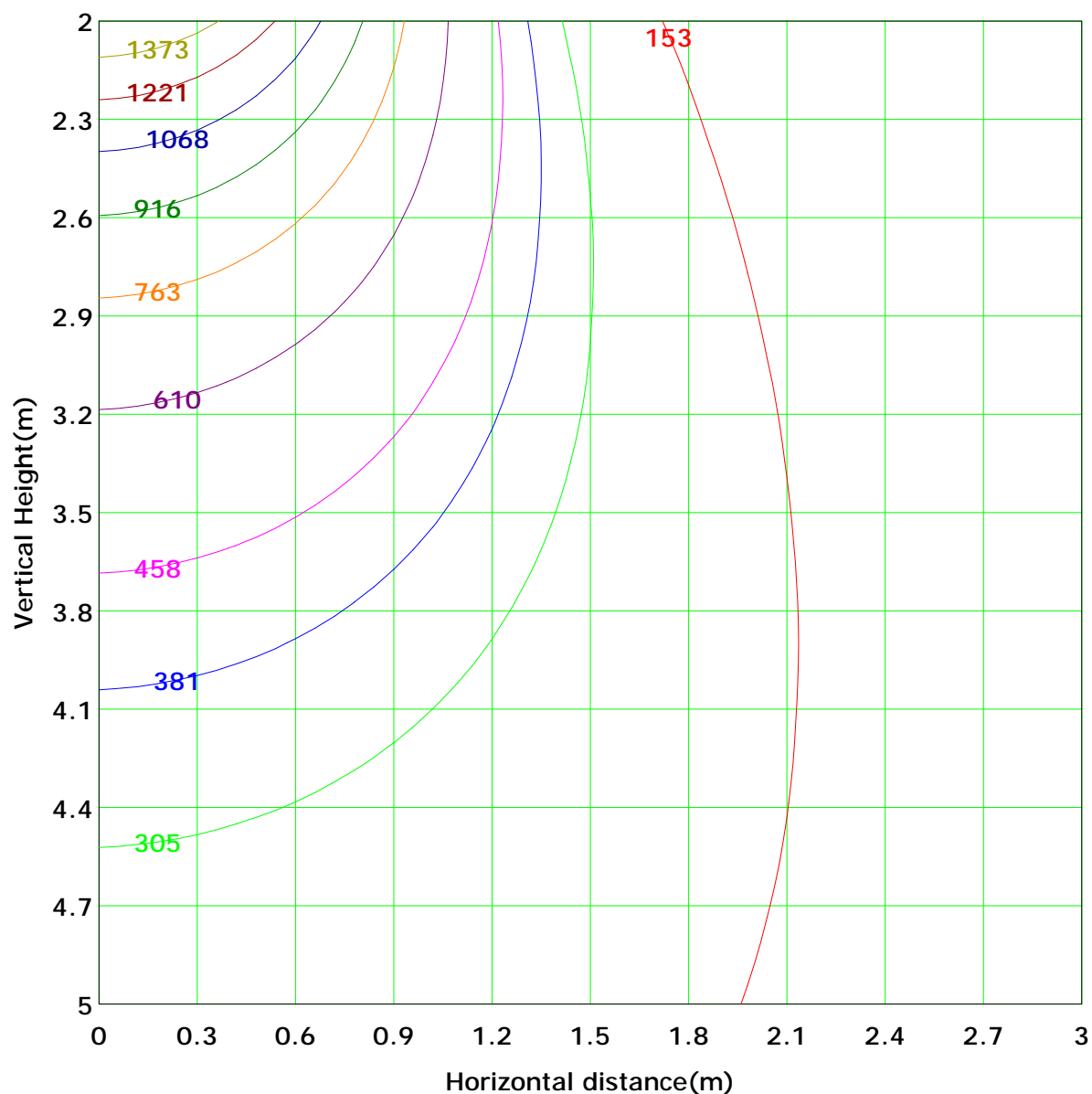
## Illuminance at a Distance



C Plane (°):0.0-360.0: 30.0  
 Test Lab:  
 Test Type: TYPE C  
 Temperature: 25  
 Operator: Kerr

Gamma Plane (°):0.0-180.0:1.0  
 Test Device: GPM-1800B  
 Distance: 9.028 m  
 Humidity: 60%  
 Inspector:

## Vertical IsoLux Plot



Lowest(m): 2.0m    Highest(m): 5.0m    Max Lux: 1525.8 lx

( 10%): 152.6 lx	( 20%): 305.2 lx
( 25%): 381.5 lx	( 30%): 457.8 lx
( 40%): 610.3 lx	( 50%): 762.9 lx
( 60%): 915.5 lx	( 70%): 1068.1 lx
( 80%): 1220.7 lx	( 90%): 1373.3 lx

C Plane (°): 0.0-360.0: 30.0  
Test Lab:  
Test Type: TYPE C  
Temperature: 25  
Operator: Kerr

Gamma Plane (°): 0.0-180.0: 1.0  
Test Device: GPM-1800B  
Distance: 9.028 m  
Humidity: 60%  
Inspector:

Area Flux Table

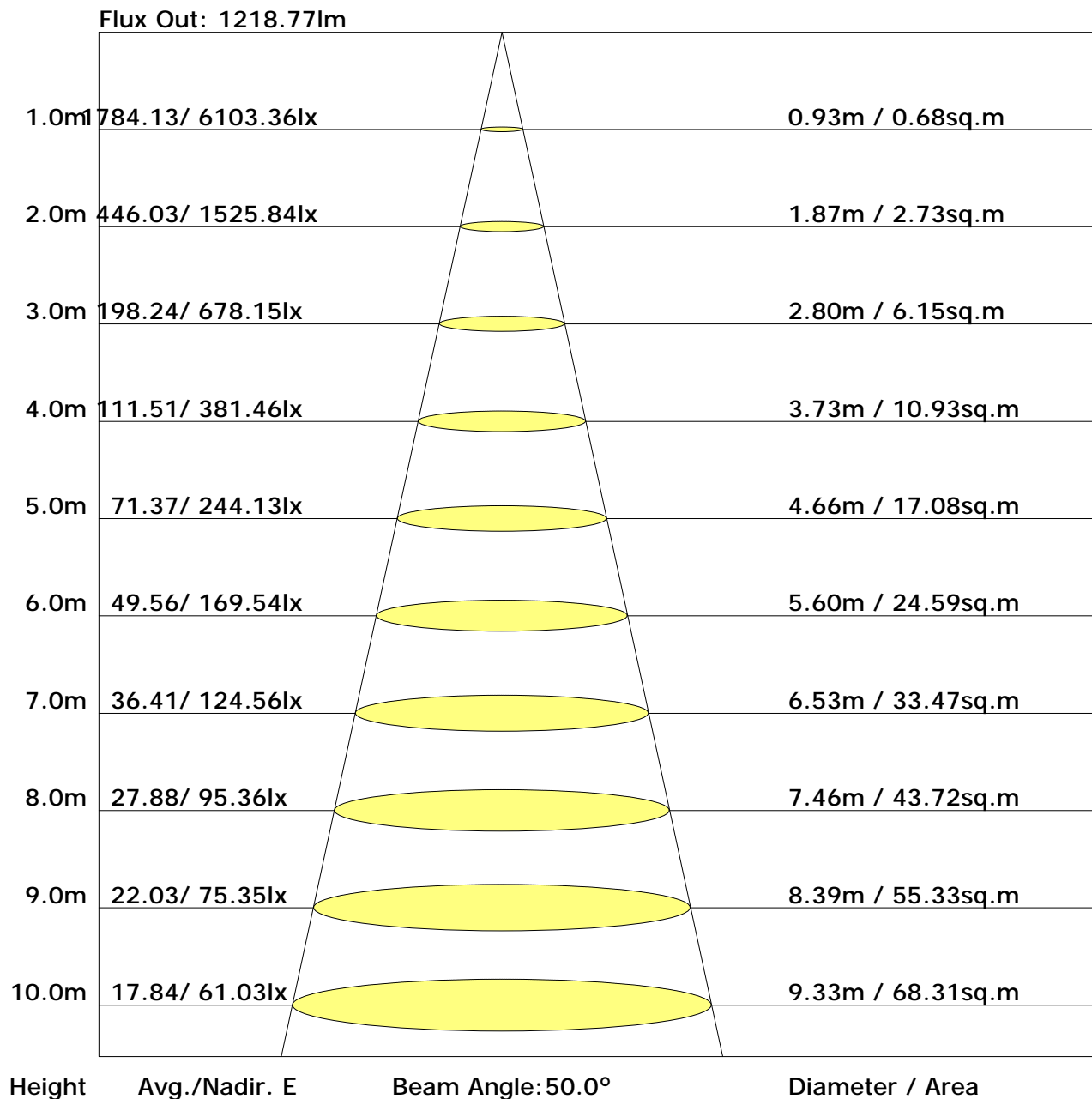
Unit: lm

		Vertical plane																				
		-90	-80	-70	-60	-50	-40	-30	-20	-10	0	10	20	30	40	50	60	70	80	90	Flux(T)	Flux(E)
Horizontal plane	-90	0.0	0.1	0.1	0.2	0.2	0.3	0.3	0.3	0.3	0.3	0.3	0.3	0.3	0.3	0.3	0.3	0.3	0.3	0.3	0.5	0.0
	-80	0.0	0.1	0.1	0.2	0.2	0.3	0.3	0.3	0.3	0.3	0.3	0.3	0.3	0.3	0.3	0.3	0.3	0.3	0.1	2.1	0.0
	-70	0.0	0.1	0.2	0.2	0.3	0.3	0.4	0.4	0.4	0.4	0.4	0.4	0.4	0.4	0.4	0.4	0.4	0.4	0.1	5.9	0.0
	-60	0.0	0.1	0.2	0.3	0.4	0.4	0.5	0.5	0.5	0.5	0.5	0.5	0.5	0.5	0.5	0.5	0.5	0.3	0.1	15.5	0.0
	-50	0.0	0.1	0.2	0.4	0.5	0.7	0.7	0.6	0.7	0.7	0.7	0.7	0.7	0.7	0.7	0.7	0.7	0.3	0.1	48.0	0.0
	-40	0.0	0.1	0.3	0.6	0.9	1.4	1.7	1.1	1.1	1.2	1.2	1.2	1.2	1.2	1.2	1.2	1.2	0.3	0.1	13.4	0.0
	-30	0.0	0.1	0.4	1.1	2.6	3.8	5.2	4.8	4.6	4.8	5.5	6.0	6.0	6.0	6.0	6.0	6.0	0.3	0.1	95.1	0.0
	-20	0.0	0.2	0.6	1.9	6.6	15.6	19.9	23.5	23.5	25.1	27.9	21.7	15.9	6.9	2.0	1.2	0.3	0.1	0.0	173.9	0.0
	-10	0.0	0.2	0.7	2.8	12.2	37.8	74.0	101.1	124.7	129.8	105.5	72.5	37.0	12.2	2.9	0.7	0.2	0.2	0.0	230.5	0.0
	0	0.0	0.2	0.7	2.8	12.2	37.7	73.3	96.2	111.1	112.4	93.4	69.9	36.4	12.1	2.9	0.7	0.2	0.2	0.0	265.7	0.0
	10	0.0	0.2	0.6	1.9	6.6	15.4	18.9	20.7	19.3	19.0	19.6	17.5	14.7	6.5	1.9	0.6	0.2	0.2	0.0	273.6	0.0
	20	0.0	0.1	0.5	1.1	2.6	3.7	4.8	4.2	3.7	3.6	3.9	4.3	3.3	2.5	1.1	0.4	0.1	0.1	0.0	235.9	0.0
	30	0.0	0.1	0.3	0.6	0.9	1.4	1.6	1.1	1.1	1.1	1.0	1.5	1.2	0.9	0.6	0.3	0.1	0.0	170.3	0.0	
	40	0.0	0.1	0.3	0.4	0.5	0.7	0.7	0.7	0.7	0.7	0.7	0.7	0.7	0.5	0.4	0.3	0.2	0.1	0.0	91.9	0.0
	50	0.0	0.1	0.3	0.4	0.5	0.7	0.7	0.7	0.7	0.7	0.7	0.7	0.7	0.5	0.4	0.3	0.2	0.1	0.0	13.2	0.0
	60	0.0	0.1	0.2	0.3	0.4	0.5	0.5	0.5	0.5	0.5	0.5	0.5	0.4	0.4	0.3	0.2	0.2	0.1	0.0	0.0	0.0
	70	0.0	0.1	0.2	0.2	0.3	0.4	0.4	0.4	0.4	0.4	0.4	0.4	0.3	0.3	0.3	0.2	0.2	0.1	0.0	0.0	0.0
	80	0.0	0.1	0.1	0.2	0.2	0.3	0.3	0.3	0.3	0.3	0.3	0.3	0.3	0.2	0.2	0.2	0.2	0.1	0.0	0.0	0.0
	90	0.0	0.1	0.1	0.2	0.2	0.3	0.3	0.3	0.3	0.3	0.3	0.3	0.3	0.2	0.2	0.2	0.2	0.1	0.0	0.0	0.0
		0.5	2.1	5.9	15.5	48.0	121.1	203.7	257.2	293.5	301.5	262.5	199.5	118.7	48.4	15.8	5.9	2.1	0.5	1903		
		0.0	0.0	0.0	0.0	13.4	95.1	173.9	230.5	265.7	273.6	235.9	170.3	91.9	13.2	0.0	0.0	0.0	0.0		1564	

C Plane (°):0.0-360.0: 30.0  
Test Lab:  
Test Type: TYPE C  
Temperature: 25  
Operator: Kerr

Gamma Plane (°):0.0-180.0:1.0  
Test Device: GPM-1800B  
Distance: 9.028 m  
Humidity: 60%  
Inspector:

## The Average Illuminance Effective Figure



C Plane (°): 0.0-360.0: 30.0  
 Test Lab:  
 Test Type: TYPE C  
 Temperature: 25  
 Operator: Kerr

Gamma Plane (°): 0.0-180.0: 1.0  
 Test Device: GPM-1800B  
 Distance: 9.028 m  
 Humidity: 60%  
 Inspector:

## 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	8.3	9.2	8.7	9.6	10.1	-2.3	-1.3	-1.9	-0.9	-0.5
3H	9.3	10.1	9.7	10.6	11.0	-0.4	0.4	0.0	0.9	1.3
4H	9.6	10.4	10.1	10.9	11.4	0.5	1.3	1.0	1.7	2.2
6H	9.9	10.7	10.4	11.1	11.6	1.4	2.1	1.9	2.6	3.1
8H	10.1	10.8	10.6	11.2	11.7	1.9	2.6	2.4	3.0	3.5
12H	10.2	10.9	10.7	11.4	11.9	2.3	3.0	2.8	3.5	4.0
X=4H Y=2H	8.0	8.8	8.5	9.3	9.8	-1.3	-0.5	-0.8	-0.1	0.4
3H	9.1	9.8	9.6	10.3	10.8	0.7	1.4	1.2	1.9	2.4
4H	9.5	10.1	10.1	10.6	11.2	1.7	2.3	2.2	2.8	3.4
6H	10.0	10.5	10.5	11.0	11.6	2.8	3.3	3.3	3.8	4.4
8H	10.2	10.6	10.7	11.2	11.7	3.3	3.8	3.9	4.3	4.9
12H	10.5	10.9	11.0	11.4	12.0	3.9	4.3	4.4	4.8	5.4
X=8H Y=4H	9.4	9.9	10.0	10.4	11.0	2.3	2.8	2.9	3.3	3.9
6H	9.9	10.3	10.5	10.9	11.5	3.6	4.0	4.2	4.5	5.1
8H	10.2	10.6	10.8	11.2	11.7	4.3	4.6	4.9	5.2	5.8
12H	10.6	10.9	11.2	11.5	12.2	5.0	5.3	5.6	5.9	6.5
X=12H Y=4H	9.4	9.8	10.0	10.4	10.9	2.5	2.9	3.0	3.4	4.0
6H	9.9	10.3	10.5	10.8	11.4	3.8	4.2	4.4	4.7	5.3
8H	10.2	10.5	10.8	11.1	11.8	4.6	4.9	5.2	5.4	6.1

Calculate in accordance with CIE 190:2010

C Plane (°):0.0-360.0: 30.0  
 Test Lab:  
 Test Type: TYPE C  
 Temperature: 25  
 Operator: Kerr

Gamma Plane (°):0.0-180.0:1.0  
 Test Device: GPM-1800B  
 Distance: 9.028 m  
 Humidity: 60%  
 Inspector:

## Utilisation Factor Table(Floor cavity)

Utilisation Factors UF(F)			SHR NOM = 0.50								
Room Reflectance			Room Index(RI)								
Ceiling	Wall	Floor	0.75	1.00	1.25	1.50	2.00	2.50	3.00	4.00	5.00
0.70	0.50	0.20	0.82	0.89	0.94	0.97	1.02	1.05	1.07	1.09	1.11
	0.30		0.77	0.84	0.89	0.93	0.98	1.01	1.03	1.07	1.09
	0.20		0.73	0.80	0.86	0.89	0.95	0.98	1.01	1.04	1.07
0.50	0.50	0.20	0.80	0.87	0.91	0.94	0.98	1.01	1.02	1.05	1.06
	0.30		0.76	0.83	0.87	0.90	0.95	0.98	1.00	1.02	1.04
	0.20		0.72	0.80	0.84	0.88	0.92	0.95	0.98	1.01	1.03
0.30	0.50	0.20	0.79	0.85	0.89	0.91	0.95	0.97	0.98	1.00	1.01
	0.30		0.75	0.81	0.85	0.88	0.92	0.95	0.96	0.99	1.00
	0.20		0.72	0.78	0.83	0.86	0.90	0.93	0.95	0.97	0.99
0.00	0.00	0.00	0.70	0.76	0.80	0.83	0.86	0.88	0.90	0.92	0.93
Rating: 18W Photometrically tested without ceiling board. Multiply UF values by service correction factors Calculate in accordance with CIBSE Technical Memorandum NO.5 1980											

C Plane (°):0.0-360.0: 30.0  
 Test Lab:  
 Test Type: TYPE C  
 Temperature: 25  
 Operator: Kerr

Gamma Plane (°):0.0-180.0: 1.0  
 Test Device: GPM-1800B  
 Distance: 9.028 m  
 Humidity: 60%  
 Inspector:

## Utilisation Factor Table(Wall)

Utilisation Factors UF(W)			SHR NOM = 0.50								
Room Reflectance			Room Index(RI)								
Ceiling	Wall	Floor	0.75	1.00	1.25	1.50	2.00	2.50	3.00	4.00	5.00
0.70	0.50	0.20	0.64	0.52	0.44	0.38	0.30	0.25	0.21	0.16	0.13
	0.30		0.54	0.44	0.38	0.33	0.27	0.23	0.19	0.15	0.13
	0.20		0.46	0.39	0.34	0.30	0.24	0.21	0.18	0.14	0.12
0.50	0.50	0.20	0.60	0.48	0.41	0.35	0.27	0.27	0.19	0.15	0.12
	0.30		0.51	0.42	0.36	0.31	0.25	0.21	0.18	0.14	0.12
	0.20		0.44	0.37	0.32	0.28	0.23	0.19	0.17	0.13	0.11
0.30	0.50	0.20	0.57	0.45	0.38	0.32	0.25	0.21	0.18	0.13	0.11
	0.30		0.49	0.40	0.34	0.29	0.23	0.19	0.16	0.13	0.11
	0.20		0.43	0.36	0.31	0.27	0.22	0.18	0.16	0.12	0.10
0.00	0.00	0.00	0.29	0.23	0.19	0.16	0.13	0.10	0.09	0.07	0.05
<p>Rating: 18W Photometrically tested without ceiling board.</p> <p>Multiply UF values by service correction factors</p> <p>Calculate in accordance with CIBSE Technical Memorandum NO.5 1980</p>											

C Plane (°):0.0-360.0: 30.0  
 Test Lab:  
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Gamma Plane (°):0.0-180.0: 1.0  
 Test Device: GPM-1800B  
 Distance: 9.028 m  
 Humidity: 60%  
 Inspector:

## Utilisation Factor Table(Ceiling cavity)

Utilisation Factors UF(C)			SHR NOM = 0.50								
Room Reflectance			Room Index(RI)								
Ceiling	Wall	Floor	0.75	1.00	1.25	1.50	2.00	2.50	3.00	4.00	5.00
0.70	0.50	0.20	0.18	0.19	0.20	0.21	0.22	0.23	0.24	0.25	0.25
	0.30		0.13	0.15	0.17	0.18	0.20	0.21	0.22	0.23	0.24
	0.20		0.10	0.12	0.14	0.15	0.17	0.19	0.20	0.21	0.22
0.50	0.50	0.20	0.17	0.18	0.20	0.20	0.22	0.22	0.23	0.24	0.24
	0.30		0.13	0.15	0.16	0.17	0.19	0.20	0.21	0.22	0.23
	0.20		0.10	0.12	0.13	0.15	0.17	0.18	0.19	0.21	0.22
0.30	0.50	0.20	0.16	0.18	0.19	0.20	0.21	0.22	0.22	0.23	0.23
	0.30		0.13	0.14	0.16	0.17	0.18	0.19	0.20	0.21	0.22
	0.20		0.10	0.12	0.13	0.14	0.16	0.18	0.19	0.20	0.21
0.00	0.00	0.00	0.04	0.04	0.04	0.04	0.04	0.04	0.04	0.04	0.04
<p>Rating: 18W Photometrically tested without ceiling board.</p> <p>Multiply UF values by service correction factors</p> <p>Calculate in accordance with CIBSE Technical Memorandum NO.5 1980</p>											

C Plane (°):0.0-360.0: 30.0  
 Test Lab:  
 Test Type: TYPE C  
 Temperature: 25  
 Operator: Kerr

Gamma Plane (°):0.0-180.0: 1.0  
 Test Device: GPM-1800B  
 Distance: 9.028 m  
 Humidity: 60%  
 Inspector:

## Zonal Lumen

Gamma [°]	I <sub>mean</sub> [cd]	Zonal Flux [lm]	Sum Zonal Flux [lm]	Rel Zonal Flux [%]	Sum Rel Zonal Flux [%]
0.0-1.0	6030.8	5.8	5.8	0.29	0.29
1.0-2.0	5945.4	17.1	22.8	0.86	1.15
2.0-3.0	5772.5	27.6	50.4	1.39	2.54
3.0-4.0	5513.7	36.9	87.4	1.86	4.40
4.0-5.0	5181.5	44.6	131.9	2.25	6.65
5.0-6.0	4799.7	50.4	182.4	2.54	9.19
6.0-7.0	4400.0	54.6	237.0	2.75	11.94
7.0-8.0	4005.5	57.3	294.3	2.89	14.83
8.0-9.0	3630.1	58.8	353.2	2.96	17.79
9.0-10.0	3292.1	59.6	412.8	3.00	20.79
10.0-11.0	2993.6	59.8	472.6	3.01	23.81
11.0-12.0	2726.5	59.6	532.2	3.00	26.81
12.0-13.0	2491.1	59.1	591.3	2.98	29.79
13.0-14.0	2283.5	58.5	649.8	2.94	32.73
14.0-15.0	2098.2	57.6	707.4	2.90	35.63
15.0-16.0	1932.5	56.6	764.0	2.85	38.49
16.0-17.0	1784.7	55.6	819.6	2.80	41.29
17.0-18.0	1651.1	54.4	874.1	2.74	44.03
18.0-19.0	1530.6	53.3	927.3	2.68	46.71
19.0-20.0	1421.4	52.0	979.4	2.62	49.33
20.0-21.0	1320.7	50.7	1030.1	2.55	51.89
21.0-22.0	1228.0	49.4	1079.4	2.49	54.37
22.0-23.0	1142.2	47.9	1127.4	2.41	56.79
23.0-24.0	1062.5	46.5	1173.8	2.34	59.13
24.0-25.0	988.3	44.9	1218.8	2.26	61.39
25.0-26.0	918.3	43.4	1262.1	2.18	63.58
26.0-27.0	852.7	41.7	1303.8	2.10	65.68
27.0-28.0	790.7	40.0	1343.9	2.02	67.70
28.0-29.0	732.6	38.3	1382.2	1.93	69.63
29.0-30.0	678.5	36.6	1418.9	1.85	71.47
30.0-31.0	625.9	34.8	1453.7	1.75	73.23
31.0-32.0	576.1	33.0	1486.7	1.66	74.89
32.0-33.0	530.1	31.2	1517.9	1.57	76.46
33.0-34.0	486.4	29.4	1547.4	1.48	77.95
34.0-35.0	445.0	27.6	1575.0	1.39	79.34
35.0-36.0	406.1	25.9	1600.9	1.30	80.64

C Plane (°): 0.0-360.0: 30.0  
 Test Lab:  
 Test Type: TYPE C  
 Temperature: 25  
 Operator: Kerr

Gamma Plane (°): 0.0-180.0: 1.0  
 Test Device: GPM-1800B  
 Distance: 9.028 m  
 Humidity: 60%  
 Inspector:

## Zonal Lumen (Continue 1)

Gamma [°]	I <sub>mean</sub> [cd]	Zonal Flux [lm]	Sum Zonal Flux [lm]	Rel Zonal Flux [%]	Sum Rel Zonal Flux [%]
36.0-37.0	370.0	24.1	1625.0	1.22	81.86
37.0-38.0	335.8	22.4	1647.4	1.13	82.99
38.0-39.0	304.2	20.8	1668.2	1.05	84.03
39.0-40.0	275.0	19.2	1687.4	0.97	85.00
40.0-41.0	247.4	17.6	1705.0	0.89	85.89
41.0-42.0	222.4	16.2	1721.2	0.81	86.70
42.0-43.0	199.8	14.8	1736.0	0.75	87.45
43.0-44.0	178.6	13.5	1749.4	0.68	88.12
44.0-45.0	159.3	12.2	1761.7	0.62	88.74
45.0-46.0	142.0	11.1	1772.8	0.56	89.30
46.0-47.0	126.5	10.1	1782.9	0.51	89.81
47.0-48.0	112.5	9.1	1791.9	0.46	90.27
48.0-49.0	100.1	8.2	1800.2	0.41	90.68
49.0-50.0	89.2	7.4	1807.6	0.37	91.05
50.0-51.0	79.6	6.7	1814.3	0.34	91.39
51.0-52.0	71.1	6.1	1820.4	0.31	91.70
52.0-53.0	63.7	5.5	1826.0	0.28	91.98
53.0-54.0	57.2	5.0	1831.0	0.25	92.23
54.0-55.0	51.6	4.6	1835.6	0.23	92.47
55.0-56.0	46.8	4.2	1839.9	0.21	92.68
56.0-57.0	42.6	3.9	1843.8	0.20	92.88
57.0-58.0	38.9	3.6	1847.4	0.18	93.06
58.0-59.0	35.8	3.3	1850.7	0.17	93.22
59.0-60.0	33.0	3.1	1853.8	0.16	93.38
60.0-61.0	30.6	2.9	1856.7	0.15	93.53
61.0-62.0	28.5	2.7	1859.5	0.14	93.67
62.0-63.0	26.6	2.6	1862.1	0.13	93.80
63.0-64.0	24.8	2.4	1864.5	0.12	93.92
64.0-65.0	23.3	2.3	1866.8	0.12	94.04
65.0-66.0	22.0	2.2	1869.0	0.11	94.15
66.0-67.0	20.8	2.1	1871.1	0.11	94.25
67.0-68.0	19.7	2.0	1873.1	0.10	94.35
68.0-69.0	18.6	1.9	1875.0	0.10	94.45
69.0-70.0	17.7	1.8	1876.8	0.09	94.54
70.0-71.0	16.8	1.7	1878.5	0.09	94.63
71.0-72.0	16.0	1.7	1880.2	0.08	94.71

C Plane (°): 0.0-360.0: 30.0  
 Test Lab:  
 Test Type: TYPE C  
 Temperature: 25  
 Operator: Kerr

Gamma Plane (°): 0.0-180.0: 1.0  
 Test Device: GPM-1800B  
 Distance: 9.028 m  
 Humidity: 60%  
 Inspector:

## Zonal Lumen (Continue 2)

Gamma [°]	I <sub>mean</sub> [cd]	Zonal Flux [lm]	Sum Zonal Flux [lm]	Rel Zonal Flux [%]	Sum Rel Zonal Flux [%]
72.0-73.0	15.3	1.6	1881.8	0.08	94.79
73.0-74.0	14.5	1.5	1883.3	0.08	94.87
74.0-75.0	13.9	1.5	1884.8	0.07	94.94
75.0-76.0	13.3	1.4	1886.2	0.07	95.01
76.0-77.0	12.8	1.4	1887.6	0.07	95.08
77.0-78.0	12.3	1.3	1888.9	0.07	95.15
78.0-79.0	11.8	1.3	1890.2	0.06	95.21
79.0-80.0	11.5	1.2	1891.4	0.06	95.27
80.0-81.0	11.2	1.2	1892.6	0.06	95.34
81.0-82.0	10.9	1.2	1893.8	0.06	95.39
82.0-83.0	10.7	1.2	1894.9	0.06	95.45
83.0-84.0	10.6	1.2	1896.1	0.06	95.51
84.0-85.0	10.4	1.1	1897.2	0.06	95.57
85.0-86.0	10.3	1.1	1898.4	0.06	95.63
86.0-87.0	10.3	1.1	1899.5	0.06	95.68
87.0-88.0	10.3	1.1	1900.6	0.06	95.74
88.0-89.0	10.2	1.1	1901.7	0.06	95.80
89.0-90.0	10.2	1.1	1902.8	0.06	95.85
90.0-91.0	10.2	1.1	1904.0	0.06	95.91
91.0-92.0	10.2	1.1	1905.1	0.06	95.96
92.0-93.0	10.2	1.1	1906.2	0.06	96.02
93.0-94.0	10.2	1.1	1907.3	0.06	96.08
94.0-95.0	10.2	1.1	1908.4	0.06	96.13
95.0-96.0	10.2	1.1	1909.6	0.06	96.19
96.0-97.0	10.3	1.1	1910.7	0.06	96.25
97.0-98.0	10.3	1.1	1911.8	0.06	96.30
98.0-99.0	10.3	1.1	1912.9	0.06	96.36
99.0-100.0	10.3	1.1	1914.0	0.06	96.42
100.0-101.0	10.3	1.1	1915.1	0.06	96.47
101.0-102.0	10.3	1.1	1916.3	0.06	96.53
102.0-103.0	10.3	1.1	1917.4	0.06	96.58
103.0-104.0	10.4	1.1	1918.5	0.06	96.64
104.0-105.0	10.4	1.1	1919.6	0.06	96.69
105.0-106.0	10.5	1.1	1920.7	0.06	96.75
106.0-107.0	10.5	1.1	1921.8	0.06	96.81
107.0-108.0	10.5	1.1	1922.9	0.06	96.86

C Plane (°): 0.0-360.0: 30.0  
 Test Lab:  
 Test Type: TYPE C  
 Temperature: 25  
 Operator: Kerr

Gamma Plane (°): 0.0-180.0: 1.0  
 Test Device: GPM-1800B  
 Distance: 9.028 m  
 Humidity: 60%  
 Inspector:

### Zonal Lumen (Continue 3)

Gamma [°]	I <sub>mean</sub> [cd]	Zonal Flux [lm]	Sum Zonal Flux [lm]	Rel Zonal Flux [%]	Sum Rel Zonal Flux [%]
108.0-109.0	10.5	1.1	1924.0	0.05	96.92
109.0-110.0	10.6	1.1	1925.1	0.06	96.97
110.0-111.0	10.7	1.1	1926.2	0.06	97.03
111.0-112.0	10.7	1.1	1927.2	0.05	97.08
112.0-113.0	10.8	1.1	1928.3	0.05	97.14
113.0-114.0	10.8	1.1	1929.4	0.05	97.19
114.0-115.0	10.9	1.1	1930.5	0.05	97.25
115.0-116.0	11.0	1.1	1931.6	0.05	97.30
116.0-117.0	11.0	1.1	1932.7	0.05	97.35
117.0-118.0	11.1	1.1	1933.8	0.05	97.41
118.0-119.0	11.2	1.1	1934.8	0.05	97.46
119.0-120.0	11.2	1.1	1935.9	0.05	97.52
120.0-121.0	11.3	1.1	1937.0	0.05	97.57
121.0-122.0	11.4	1.1	1938.0	0.05	97.62
122.0-123.0	11.5	1.1	1939.1	0.05	97.68
123.0-124.0	11.6	1.1	1940.2	0.05	97.73
124.0-125.0	11.8	1.1	1941.2	0.05	97.79
125.0-126.0	11.8	1.1	1942.3	0.05	97.84
126.0-127.0	12.0	1.1	1943.3	0.05	97.89
127.0-128.0	12.1	1.1	1944.4	0.05	97.94
128.0-129.0	12.3	1.1	1945.5	0.05	98.00
129.0-130.0	12.5	1.1	1946.5	0.05	98.05
130.0-131.0	12.7	1.1	1947.6	0.05	98.10
131.0-132.0	12.9	1.1	1948.6	0.05	98.16
132.0-133.0	13.1	1.1	1949.7	0.05	98.21
133.0-134.0	13.3	1.1	1950.7	0.05	98.26
134.0-135.0	13.5	1.1	1951.8	0.05	98.32
135.0-136.0	13.7	1.1	1952.9	0.05	98.37
136.0-137.0	14.0	1.1	1953.9	0.05	98.42
137.0-138.0	14.3	1.1	1955.0	0.05	98.48
138.0-139.0	14.6	1.1	1956.0	0.05	98.53
139.0-140.0	14.9	1.1	1957.1	0.05	98.58
140.0-141.0	15.2	1.1	1958.2	0.05	98.64
141.0-142.0	15.5	1.1	1959.2	0.05	98.69
142.0-143.0	15.8	1.1	1960.3	0.05	98.74
143.0-144.0	16.2	1.1	1961.3	0.05	98.80

C Plane (°):0.0-360.0: 30.0  
 Test Lab:  
 Test Type: TYPE C  
 Temperature: 25  
 Operator: Kerr

Gamma Plane (°):0.0-180.0:1.0  
 Test Device: GPM-1800B  
 Distance: 9.028 m  
 Humidity: 60%  
 Inspector:

## Zonal Lumen (Continue 4)

Gamma [°]	I <sub>mean</sub> [cd]	Zonal Flux [lm]	Sum Zonal Flux [lm]	Rel Zonal Flux [%]	Sum Rel Zonal Flux [%]
144.0-145.0	16.6	1.1	1962.4	0.05	98.85
145.0-146.0	16.9	1.1	1963.4	0.05	98.90
146.0-147.0	17.3	1.0	1964.5	0.05	98.96
147.0-148.0	17.7	1.0	1965.5	0.05	99.01
148.0-149.0	18.0	1.0	1966.6	0.05	99.06
149.0-150.0	18.4	1.0	1967.6	0.05	99.11
150.0-151.0	18.8	1.0	1968.6	0.05	99.16
151.0-152.0	19.1	1.0	1969.6	0.05	99.21
152.0-153.0	19.5	1.0	1970.6	0.05	99.26
153.0-154.0	19.8	1.0	1971.6	0.05	99.31
154.0-155.0	20.1	0.9	1972.5	0.05	99.36
155.0-156.0	20.3	0.9	1973.4	0.05	99.41
156.0-157.0	20.6	0.9	1974.3	0.05	99.45
157.0-158.0	20.9	0.9	1975.2	0.04	99.50
158.0-159.0	21.1	0.8	1976.1	0.04	99.54
159.0-160.0	21.3	0.8	1976.9	0.04	99.58
160.0-161.0	21.5	0.8	1977.7	0.04	99.62
161.0-162.0	21.6	0.8	1978.4	0.04	99.66
162.0-163.0	21.8	0.7	1979.1	0.04	99.69
163.0-164.0	21.9	0.7	1979.8	0.03	99.73
164.0-165.0	22.0	0.6	1980.5	0.03	99.76
165.0-166.0	22.1	0.6	1981.1	0.03	99.79
166.0-167.0	22.2	0.6	1981.6	0.03	99.82
167.0-168.0	22.2	0.5	1982.2	0.03	99.85
168.0-169.0	22.3	0.5	1982.6	0.02	99.87
169.0-170.0	22.3	0.4	1983.1	0.02	99.89
170.0-171.0	22.3	0.4	1983.5	0.02	99.91
171.0-172.0	22.3	0.4	1983.9	0.02	99.93
172.0-173.0	22.2	0.3	1984.2	0.02	99.95
173.0-174.0	22.1	0.3	1984.4	0.01	99.96
174.0-175.0	22.0	0.2	1984.7	0.01	99.97
175.0-176.0	21.9	0.2	1984.9	0.01	99.98
176.0-177.0	21.8	0.1	1985.0	0.01	99.99
177.0-178.0	21.8	0.1	1985.1	0.01	100.00
178.0-179.0	21.8	0.1	1985.2	0.00	100.00
179.0-180.0	21.8	0.0	1985.2	0.00	100.00

C Plane (°):0.0-360.0: 30.0  
 Test Lab:  
 Test Type: TYPE C  
 Temperature: 25  
 Operator: Kerr

Gamma Plane (°):0.0-180.0:1.0  
 Test Device: GPM-1800B  
 Distance: 9.028 m  
 Humidity: 60%  
 Inspector: