

Report No.: 1

Test Time: 12.12.2019 21:12

Luminaire Property

Luminaire Manufacturer:

Luminaire Description: FG 180 4x24LED 0.35A 37W 5000K bez stekla

Luminous Length (mm): 1200

Luminous Width (mm): 180

Luminous Height (mm): 35

Voltage: 221.4 V

Current: 0.166 A

Power: 35.84 W

Power Factor: 0.974

Photometric Results

CIE Class: Direct

Measurement Flux: 5108.9 lm

Downward Ratio: 100%

Total Rated Lamp Lumens: 5108.9 lm

Efficiency: 100%

Upward Ratio: 0%

Field Angle(C0/C180,C90/C270,C45/C225,C135/315): 161.0, 144.4, 152.1, 153.2

Beam Angle(C0/C180,C90/C270,C45/C225,C135/315): 118.8, 114.6, 118.4, 117.8

Luminaire Efficacy Rating (LER): 142.60

Central Intensity: 1790.66 cd

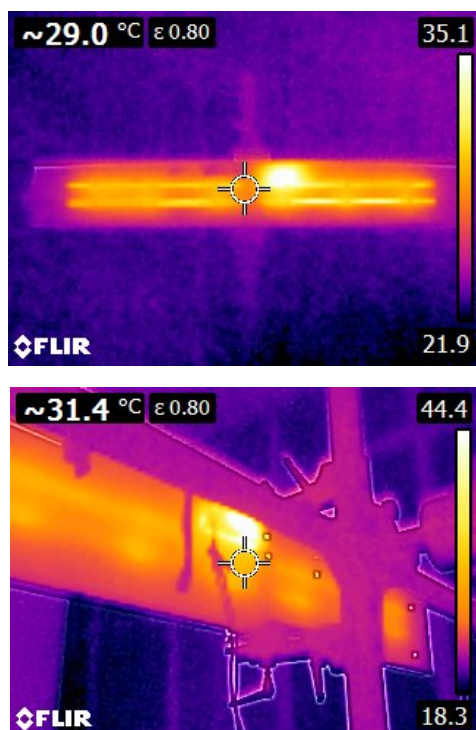
Max. Intensity: 1793.89 cd

Pos of Max. Intensity: H202.5 V1

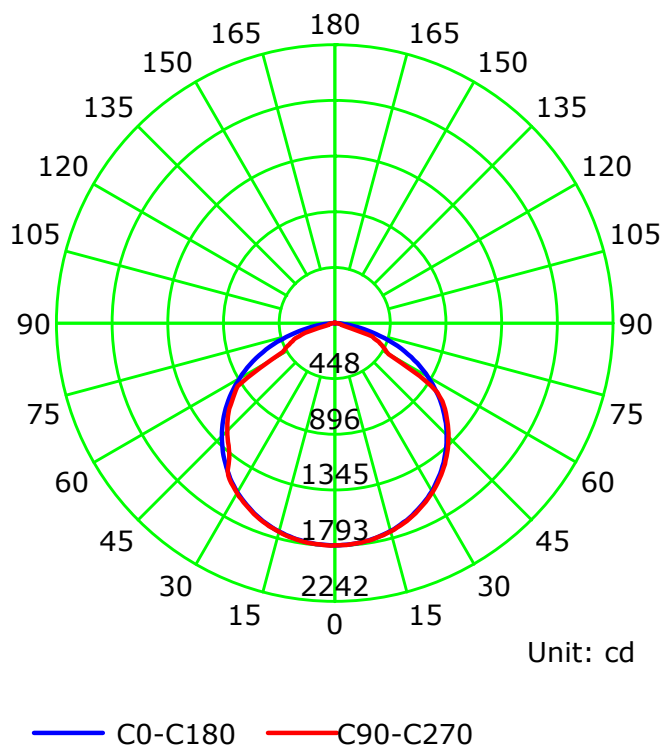
S/MH(C0/C180): 1.30

S/MH(C90/C270): 1.31

Termogramma



Luminous Intensity Distribution Curve



C Plane (°):0.0-360.0: 22.5

Test Lab:

Test Type: TYPE C

Temperature:

Operator:

Gamma Plane (°):0.0-180.0:1.0

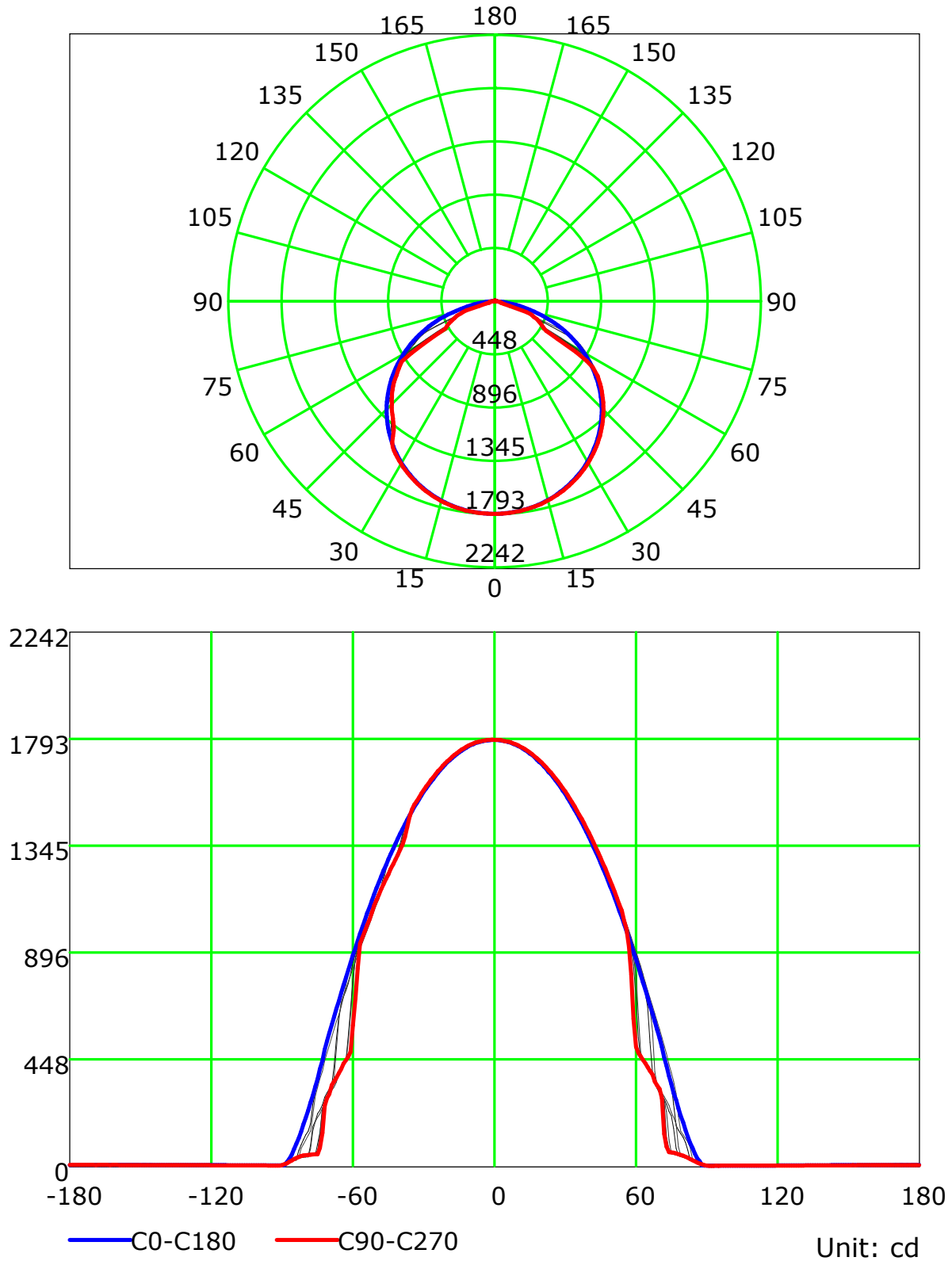
Test Device: LSG-1800B

Distance: 12.677 m

Humidity:

Inspector:

Luminous Intensity Distribution Curve



C Plane (°):0.0-360.0: 22.5

Test Lab:

Test Type: TYPE C

Temperature:

Operator:

Gamma Plane (°):0.0-180.0:1.0

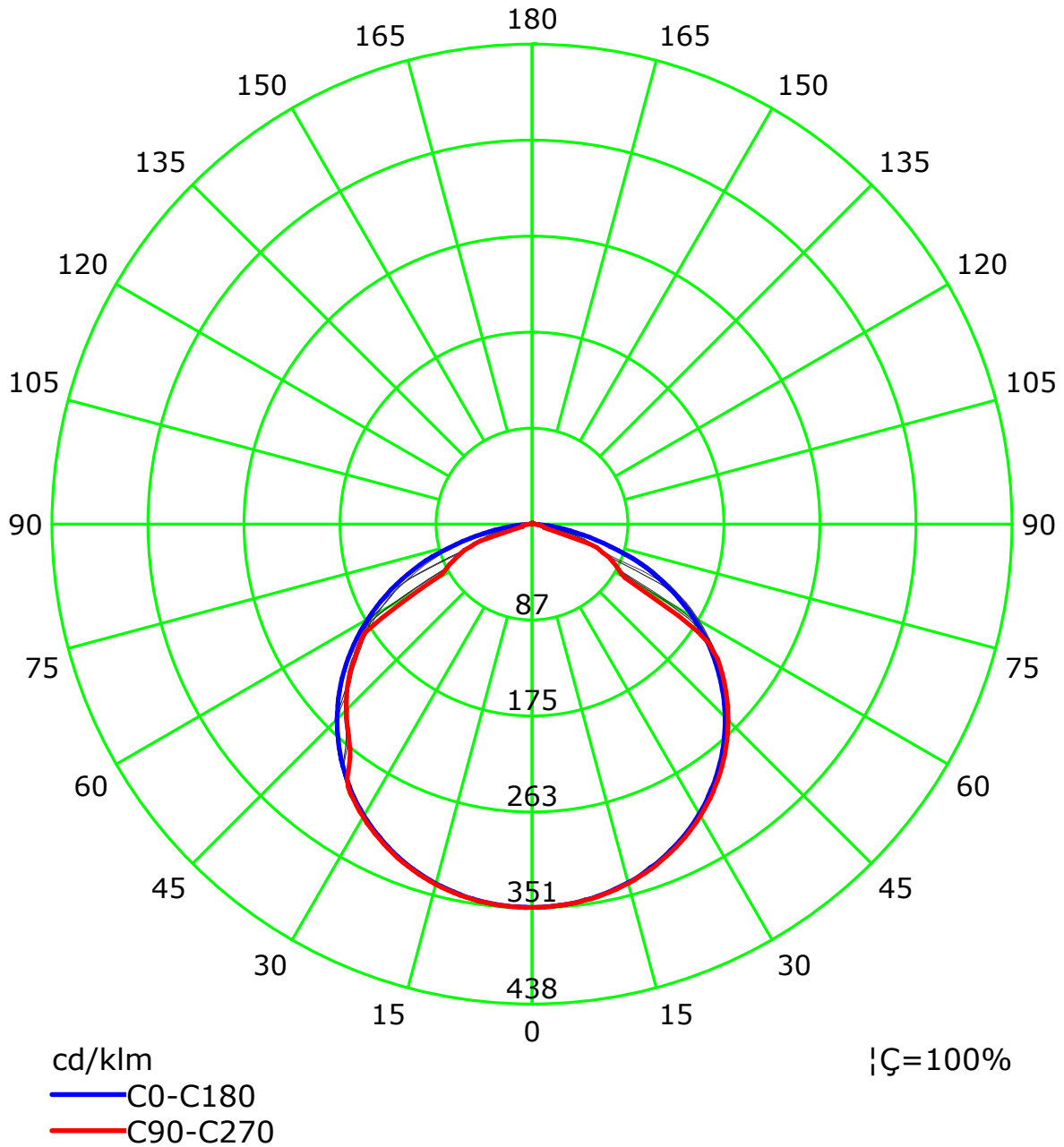
Test Device: LSG-1800B

Distance: 12.677 m

Humidity:

Inspector:

Luminous Intensity Distribution Curve(cd/klm)



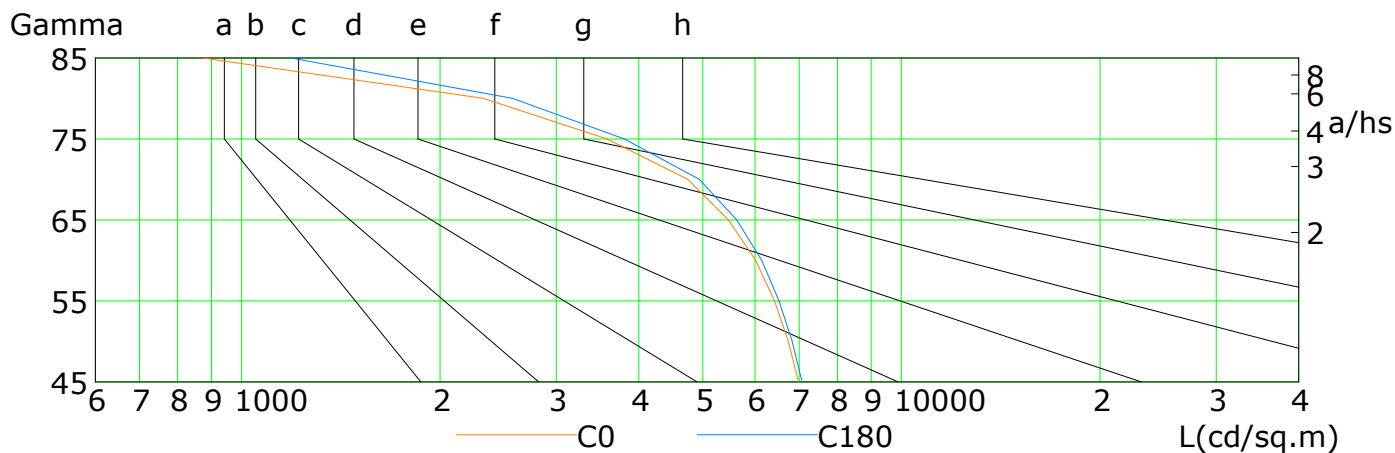
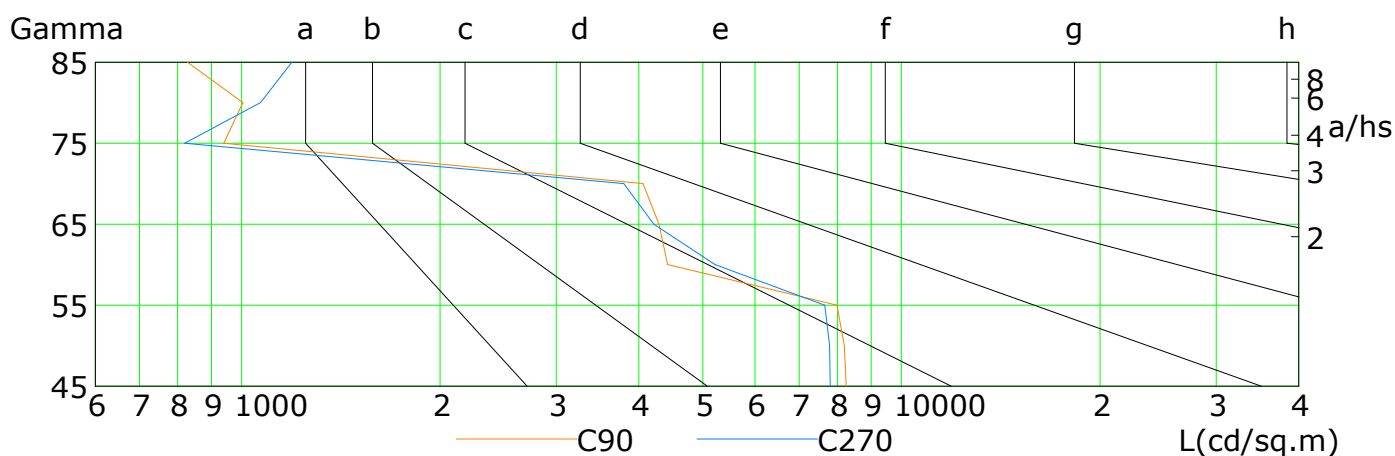
C Plane (°):0.0-360.0: 22.5
Test Lab:
Test Type: TYPE C
Temperature:
Operator:

Gamma Plane (°):0.0-180.0:1.0
Test Device: LSG-1800B
Distance: 12.677 m
Humidity:
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

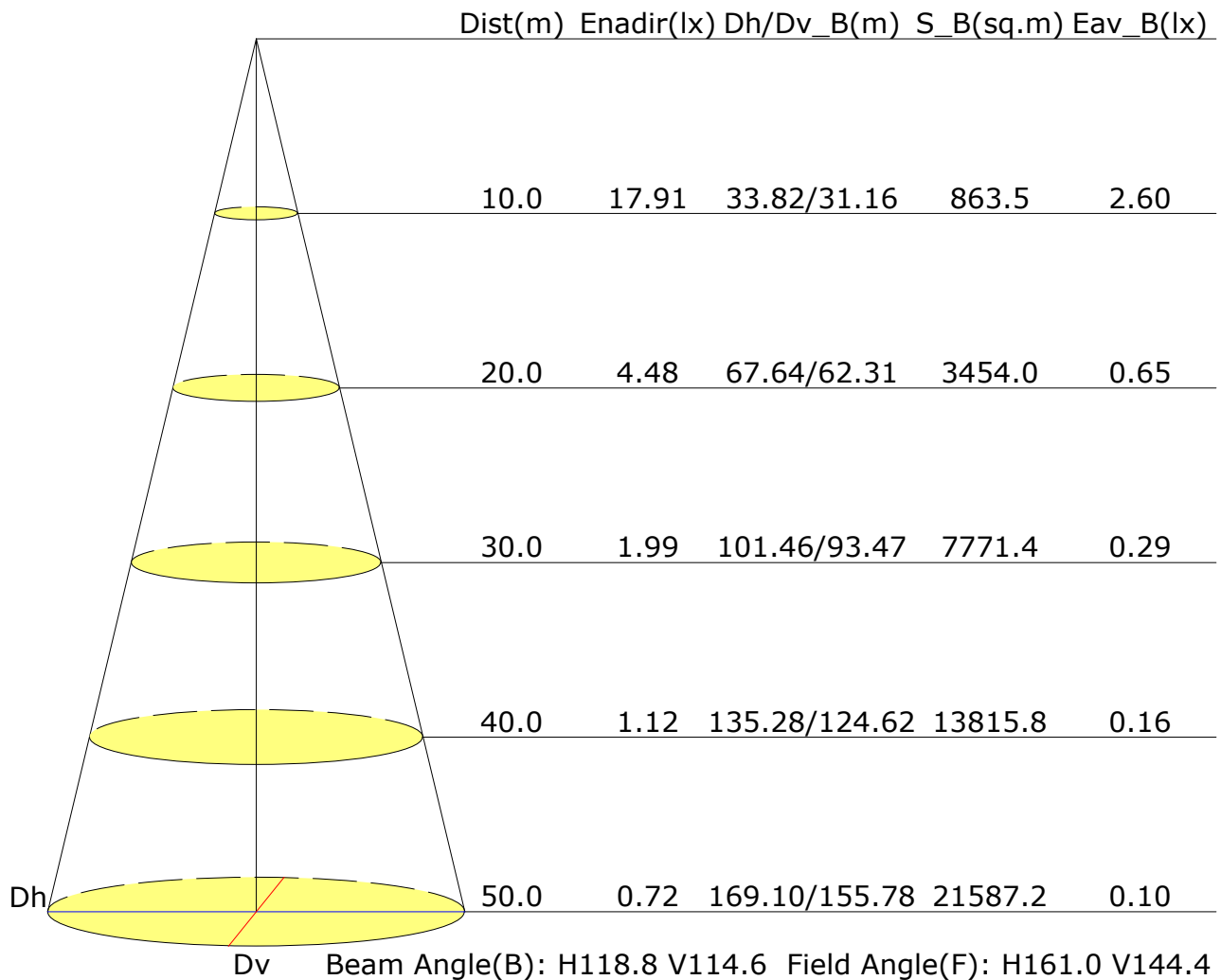


L(cd/sq.m)	G45	G50	G55	G60	G65	G70	G75	G80	G85
C0	6988	6741	6425	6014	5469	4744	3580	2324	874
C90	8245	8193	7989	4421	4290	4058	940	1004	828
C180	7068	6827	6524	6142	5630	4938	3803	2574	1188
C270	7797	7784	7651	5216	4216	3794	819	1069	1192

C Plane (°):0.0-360.0: 22.5
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Gamma Plane (°):0.0-180.0:1.0
 Test Device: LSG-1800B
 Distance: 12.677 m
 Humidity:
 Inspector:

Illuminance at a Distance



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	19.4	20.7	19.7	21.0	21.2	19.0	20.3	19.3	20.6	20.8
3H	20.7	22.0	21.1	22.2	22.5	19.6	20.9	20.0	21.1	21.4
4H	21.2	22.3	21.5	22.6	22.9	19.6	20.8	20.0	21.1	21.4
6H	21.3	22.4	21.7	22.7	23.1	19.6	20.7	20.0	21.0	21.3
8H	21.4	22.4	21.7	22.7	23.1	19.6	20.6	19.9	20.9	21.3
12H	21.4	22.3	21.7	22.7	23.0	19.5	20.5	19.9	20.9	21.2
X=4H Y=2H	19.9	21.0	20.2	21.3	21.6	19.5	20.7	19.9	21.0	21.3
3H	21.4	22.4	21.8	22.7	23.0	20.3	21.2	20.6	21.6	21.9
4H	21.9	22.8	22.3	23.1	23.5	20.3	21.2	20.7	21.5	21.9
6H	22.1	22.9	22.5	23.3	23.7	20.3	21.0	20.7	21.4	21.8
8H	22.1	22.8	22.6	23.3	23.7	20.2	21.0	20.7	21.4	21.8
12H	22.1	22.8	22.6	23.2	23.7	20.2	20.9	20.7	21.3	21.8
X=8H Y=4H	21.9	22.6	22.3	23.0	23.4	20.4	21.1	20.8	21.5	21.9
6H	22.1	22.7	22.6	23.1	23.6	20.4	20.9	20.8	21.4	21.8
8H	22.2	22.7	22.7	23.1	23.6	20.4	20.9	20.9	21.3	21.8
12H	22.2	22.6	22.7	23.1	23.6	20.4	20.8	20.9	21.3	21.8
X=12H Y=4H	21.9	22.5	22.3	22.9	23.4	20.4	21.0	20.8	21.4	21.9
6H	22.1	22.6	22.6	23.1	23.6	20.3	20.8	20.8	21.3	21.8
8H	22.2	22.6	22.7	23.1	23.6	20.4	20.8	20.9	21.3	21.8
Variations with the observer position at spacings:										
S=1.0H	+0.2/-0.2					+0.3/-0.3				
S=1.5H	+0.4/-0.7					+1.2/-2.4				
S=2.0H	+0.7/-1.2					+1.8/-2.5				

Calculate in accordance with CIE Pub.117. The table is revised with 5109lm ($8\log(F/F_0) = 5.7$).

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 Test Device: LSG-1800B
 Distance: 12.677 m
 Humidity:
 Inspector:

Utilisation Factor Table(Floor cavity)

Utilisation Factors UF(F)			SHR NOM = 1.25									
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	0.57	0.68	0.76	0.82	0.89	0.94	0.97	1.02	1.05	
	0.30		0.50	0.61	0.69	0.75	0.83	0.89	0.93	0.98	1.01	
	0.20		0.44	0.55	0.63	0.70	0.78	0.84	0.89	0.95	0.98	
0.50	0.50	0.20	0.56	0.66	0.74	0.79	0.86	0.90	0.94	0.98	1.00	
	0.30		0.49	0.60	0.67	0.73	0.81	0.86	0.90	0.95	0.98	
	0.20		0.44	0.55	0.63	0.68	0.77	0.82	0.86	0.92	0.95	
0.30	0.50	0.20	0.54	0.64	0.71	0.76	0.83	0.87	0.90	0.94	0.96	
	0.30		0.48	0.59	0.66	0.71	0.79	0.84	0.87	0.91	0.94	
	0.20		0.43	0.54	0.62	0.67	0.75	0.80	0.84	0.89	0.92	
0.00	0.00	0.00	0.41	0.52	0.59	0.64	0.72	0.77	0.80	0.85	0.87	
Rating:36W Photometrically tested without ceiling board. Multiply UF values by service correction factors Calculate in accordance with CIBSE Technical Memorandum NO.5 1980												

Utilisation Factor Table(Wall)

Utilisation Factors UF(W)			SHR NOM = 1.25									
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	0.99	0.80	0.68	0.59	0.46	0.38	0.32	0.25	0.20	
	0.30		0.82	0.69	0.59	0.52	0.42	0.35	0.30	0.23	0.19	
	0.20		0.71	0.60	0.52	0.46	0.38	0.32	0.28	0.22	0.18	
0.50	0.50	0.20	0.95	0.77	0.65	0.56	0.44	0.40	0.31	0.23	0.19	
	0.30		0.81	0.67	0.57	0.50	0.40	0.33	0.29	0.22	0.18	
	0.20		0.70	0.59	0.51	0.45	0.37	0.31	0.27	0.21	0.18	
0.30	0.50	0.20	0.92	0.74	0.62	0.54	0.42	0.34	0.29	0.22	0.18	
	0.30		0.79	0.65	0.56	0.49	0.39	0.32	0.27	0.21	0.17	
	0.20		0.69	0.58	0.50	0.44	0.36	0.30	0.26	0.20	0.17	
0.00	0.00	0.00	0.59	0.48	0.41	0.36	0.28	0.23	0.20	0.15	0.12	
Rating:36W Photometrically tested without ceiling board. Multiply UF values by service correction factors Calculate in accordance with CIBSE Technical Memorandum NO.5 1980												

Utilisation Factor Table(Ceiling cavity)

Utilisation Factors UF(C)			SHR NOM = 1.25									
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	0.17	0.18	0.19	0.19	0.20	0.21	0.21	0.22	0.22	
	0.30		0.10	0.12	0.13	0.14	0.16	0.17	0.18	0.19	0.20	
	0.20		0.05	0.07	0.08	0.10	0.12	0.13	0.15	0.16	0.17	
0.50	0.50	0.20	0.16	0.17	0.18	0.19	0.19	0.20	0.20	0.21	0.21	
	0.30		0.10	0.11	0.13	0.14	0.15	0.16	0.17	0.18	0.19	
	0.20		0.05	0.07	0.08	0.10	0.11	0.13	0.14	0.16	0.17	
0.30	0.50	0.20	0.16	0.17	0.17	0.18	0.19	0.19	0.20	0.20	0.20	
	0.30		0.10	0.11	0.12	0.13	0.15	0.16	0.17	0.18	0.18	
	0.20		0.05	0.07	0.08	0.09	0.11	0.13	0.14	0.15	0.16	
0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	
Rating:36W Photometrically tested without ceiling board. Multiply UF values by service correction factors Calculate in accordance with CIBSE Technical Memorandum NO.5 1980												