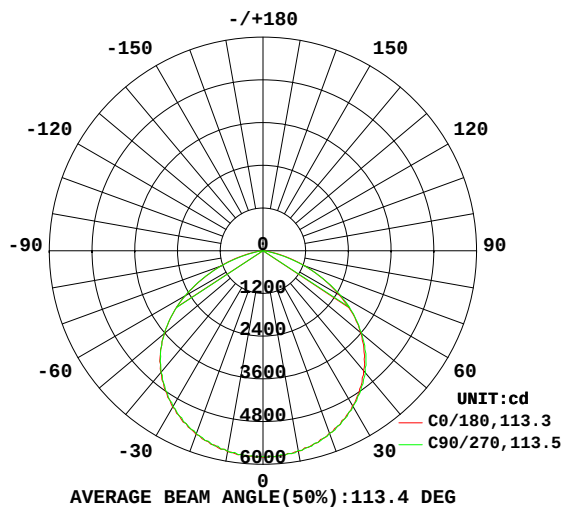


LUMINAIRE PHOTOMETRIC TEST REPORT

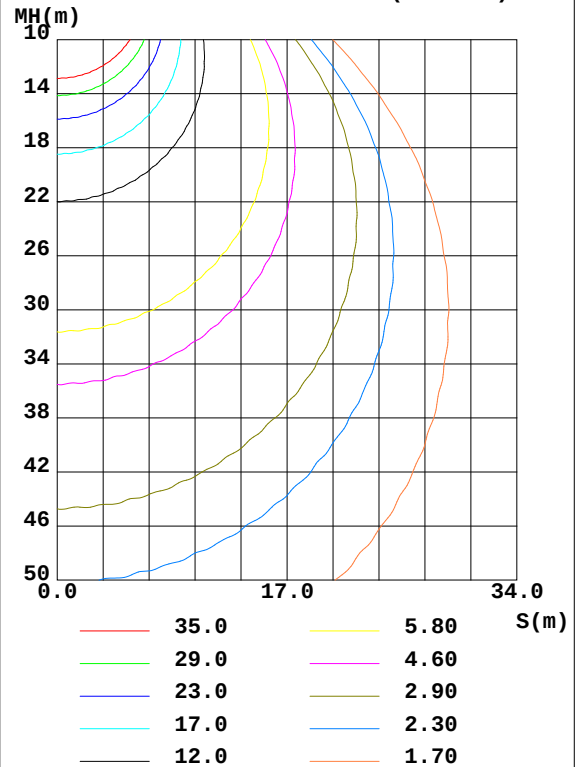
Test:U:230.54V I:0.4393A P:96.213W PF:0.9500 Freq:49.99Hz Lamp Flux:16051.7x1 lm		
NAME: KD008-BKTCTP200-100	TYPE:	WEIGHT:
SPEC.: black RA80 3000K+6000K	DIM.:	SERIAL No.:
MFR.:	SUR.: 295mm	Shielding Angle:

DATA OF LAMP		PHOTOMETRIC DATA Eff: 166.84 lm/W			
MODEL	2835 6000K	I _{max} (cd)	5805	S/MH(C0/180)	1.30
NOMINAL POWER(W)	100	LOR(%)	100.0	S/MH(C90/270)	1.30
RATED VOLTAGE(V)	220-240	TOTAL FLUX(lm)	16052	η UP, DN(C0-180)	0.0, 50.0
NOMINAL FLUX(lm)	16051.7	CIE CLASS	DIRECT	η UP, DN(C180-360)	0.0, 50.0
LAMPS INSIDE	1	η up(%)	0.0	CIBSE SHR NOM	1.25
TEST VOLTAGE(V)	220	η down(%)	100.0	CIBSE SHR MAX	1.35

LUMINOUS INTENSITY DISTRIBUTION DIAGRAM



C0 PLANE ISOLUX DIAGRAM (UNIT: lx)



C Range: 0 - 360DEG
C Interval: 22.5DEG
Test Speed: HIGH
Temperature: 25DEG
Operators:
Test Date: 2025-02-27

γ Range: 0 - 90DEG
γ Interval: 1.0DEG
Test System: EVERFINE G0-2000B_V1 SYSTEM V2.00.428
Humidity: 65.0%
Test Distance: 7.880m [K=1.0000]
Remarks:

ZONAL FLUX DIAGRAM

ZONAL FLUX DIAGRAM:

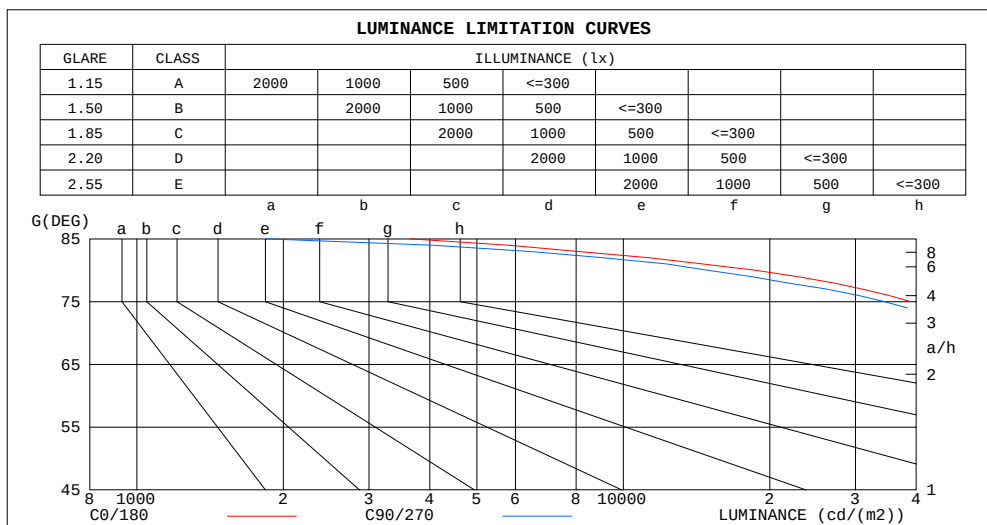
γ	C0	C45	C90	C135	C180	C225	C270	C315	γ	Φ zone	Φ total	%lum, lamp
10	5717	5734	5697	5695	5732	5701	5714	5720	0- 10	549.3	549.3	3.42, 3.42
20	5453	5487	5462	5454	5491	5449	5474	5477	10- 20	1586	2135	13.3, 13.3
30	5026	5066	5058	5047	5075	5034	5057	5059	20- 30	2436	4571	28.5, 28.5
40	4396	4453	4475	4460	4455	4447	4455	4442	30- 40	2985	7556	47.1, 47.1
50	3583	3599	3624	3636	3606	3637	3627	3598	40- 50	3128	10684	66.6, 66.6
60	2473	2451	2524	2489	2510	2507	2518	2471	50- 60	2751	13435	83.7, 83.7
70	1254	1243	1231	1247	1276	1262	1246	1258	60- 70	1844	15279	95.2, 95.2
80	221.2	189.8	176.5	192.9	238.8	206.7	195.8	208.3	70- 80	719.5	15998	99.7, 99.7
90	6.257	6.119	5.944	6.091	6.831	6.744	6.491	6.748	80- 90	53.37	16052	100, 100
100									90-100			
110									100-110			
120									110-120			
130									120-130			
140									130-140			
150									140-150			
160									150-160			
170									160-170			
180									170-180			
DEG	LUMINOUS INTENSITY:cd									UNIT: lm		

C Range: 0 - 360DEG
 C Interval: 22.5DEG
 Test Speed: HIGH
 Temperature: 25DEG
 Operators:
 Test Date: 2025-02-27

γ Range: 0 - 90DEG
 γ Interval: 1.0DEG
 Test System: EVERFINE G0-2000B_V1 SYSTEM V2.00.428
 Humidity: 65.0%
 Test Distance: 7.880m [K=1.0000]
 Remarks:

LUMINANCE LIMITATION CURVES

Test:U:230.54V I:0.4393A P:96.213W PF:0.9500 Freq:49.99Hz Lamp Flux:16051.7x1 lm		
NAME: KD008-BKTCTP200-100	TYPE:	WEIGHT:
SPEC.: black RA80 3000K+6000K	DIM.:	SERIAL No.:
MFR.:	SUR.: 295mm	Shielding Angle:



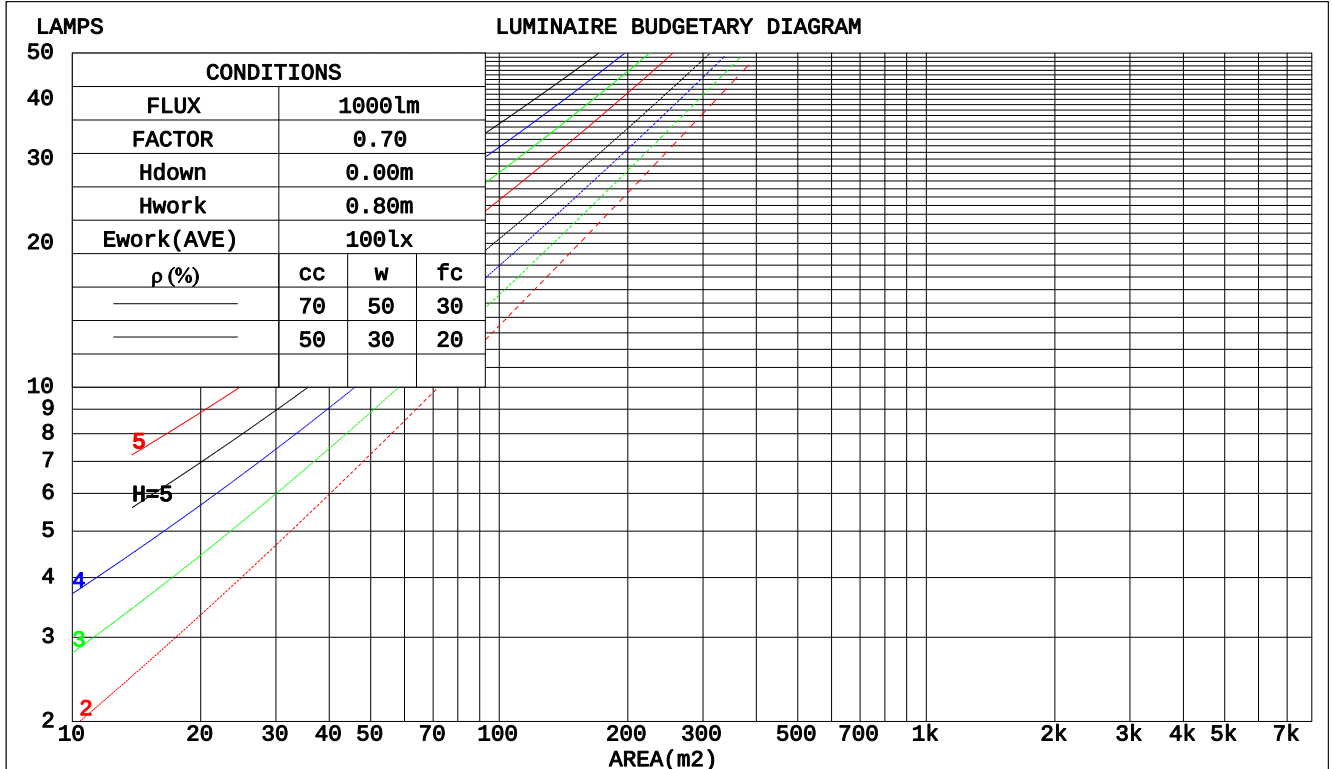
C Range: 0 - 360DEG
C Interval: 22.5DEG
Test Speed: HIGH
Temperature: 25DEG
Operators:
Test Date: 2025-02-27

γ Range: 0 - 90DEG
γ Interval: 1.0DEG
Test System: EVERFINE G0-2000B_V1 SYSTEM V2.00.428
Humidity: 65.0%
Test Distance: 7.880m [K=1.0000]
Remarks:

CU AND LUMINAIRE BUDGETARY ESTIMATE DIAGRAM

Test:U:230.54V I:0.4393A P:96.213W PF:0.9500 Freq:49.99Hz Lamp Flux:16051.7x1 lm		
NAME: KD008-BKTCTP200-100	TYPE:	WEIGHT:
SPEC.: black RA80 3000K+6000K	DIM.:	SERIAL No.:
MFR.:	SUR.: 295mm	Shielding Angle:

ρ_{CC}	80%			70%			50%			30%			10%			0
ρ_W	50%	30%	10%	50%	30%	10%	50%	30%	10%	50%	30%	10%	50%	30%	10%	0
ρ_{fc}	20%			20%			20%			20%			20%			0
RCR	Coefficients of Utilization(CU)															
RCR:Room Cavity Ratio																
0.0	1.19	1.19	1.19	1.16	1.16	1.16	1.11	1.11	1.11	1.06	1.06	1.06	1.02	1.02	1.02	1.00
1.0	1.05	1.02	.98	1.03	.99	.96	.99	.96	.93	.95	.93	.91	.92	.90	.88	.86
2.0	.92	.86	.81	.91	.85	.80	.87	.82	.78	.84	.80	.76	.81	.77	.74	.72
3.0	.81	.74	.67	.80	.73	.67	.77	.71	.66	.74	.69	.65	.72	.67	.63	.61
4.0	.72	.64	.57	.71	.63	.57	.68	.62	.56	.66	.60	.55	.64	.59	.55	.52
5.0	.65	.56	.49	.63	.55	.49	.61	.54	.49	.59	.53	.48	.58	.52	.47	.45
6.0	.58	.49	.43	.57	.49	.43	.55	.48	.42	.54	.47	.42	.52	.46	.42	.40
7.0	.53	.44	.38	.52	.44	.38	.50	.43	.38	.49	.42	.37	.48	.42	.37	.35
8.0	.48	.40	.34	.47	.39	.34	.46	.39	.34	.45	.38	.33	.44	.38	.33	.31
9.0	.44	.36	.30	.43	.36	.30	.42	.35	.30	.41	.35	.30	.40	.34	.30	.28
10.0	.41	.33	.28	.40	.33	.27	.39	.32	.27	.38	.32	.27	.37	.31	.27	.25



C Range: 0 - 360DEG
C Interval: 22.5DEG
Test Speed: HIGH
Temperature: 25DEG
Operators:
Test Date: 2025-02-27

γ Range: 0 - 90DEG
 γ Interval: 1.0DEG
Test System: EVERFINE G0-2000B_V1 SYSTEM V2.00.428
Humidity: 65.0%
Test Distance: 7.880m [K=1.0000]
Remarks:

WEC AND CCEC

Test:U:230.54V I:0.4393A P:96.213W PF:0.9500 Freq:49.99Hz Lamp Flux:16051.7x1 lm					
NAME: KD008-BKTCTP200-100			TYPE:		WEIGHT:
SPEC.: black RA80 3000K+6000K			DIM.:		SERIAL No.:
MFR.:			SUR.: 295mm		Shielding Angle:

ρ_{cc}	80%			70%			50%			30%			10%			0	
ρ_w	50%	30%	10%	50%	30%	10%	50%	30%	10%	50%	30%	10%	50%	30%	10%	0	
ρ_{fc}	20%			20%			20%			20%			20%			0	
RCR	RCR:Room Cavity Ratio						Wall Exitance Coefficients(WEC)										
0.0																	
1.0	.280	.159	.050	.273	.156	.049	.260	.149	.048	.248	.143	.046	.237	.137	.044		
2.0	.272	.149	.046	.266	.147	.045	.255	.142	.044	.244	.137	.043	.234	.132	.042		
3.0	.256	.137	.041	.251	.134	.040	.241	.131	.040	.231	.127	.039	.223	.123	.038		
4.0	.240	.124	.037	.235	.123	.036	.226	.120	.036	.217	.117	.035	.210	.114	.035		
5.0	.223	.114	.033	.219	.112	.033	.211	.110	.032	.204	.107	.032	.197	.105	.032		
6.0	.208	.104	.030	.205	.103	.030	.197	.101	.029	.191	.099	.029	.184	.097	.029		
7.0	.195	.096	.027	.191	.095	.027	.185	.094	.027	.179	.092	.027	.173	.090	.026		
8.0	.183	.089	.025	.179	.088	.025	.174	.087	.025	.168	.085	.025	.163	.084	.024		
9.0	.171	.083	.023	.169	.082	.023	.164	.081	.023	.159	.080	.023	.154	.078	.023		
10.0	.162	.077	.022	.159	.077	.021	.154	.076	.021	.150	.075	.021	.146	.073	.021		

ρ_{cc}	80%			70%			50%			30%			10%			0
ρ_w	50%	30%	10%	50%	30%	10%	50%	30%	10%	50%	30%	10%	50%	30%	10%	0
ρ_{fc}	20%			20%			20%			20%			20%			0
RCR	RCR:Room Cavity Ratio						Ceiling Cavity Exitance Coefficients(CCEC)									
0.0	.190	.190	.190	.163	.163	.163	.111	.111	.111	.064	.064	.064	.020	.020	.020	
1.0	.178	.156	.137	.153	.134	.118	.104	.092	.081	.060	.053	.047	.019	.017	.015	
2.0	.170	.132	.100	.145	.114	.087	.100	.079	.061	.057	.046	.035	.018	.015	.012	
3.0	.162	.114	.076	.139	.099	.066	.095	.068	.046	.055	.040	.027	.018	.013	.009	
4.0	.154	.101	.060	.133	.087	.052	.091	.061	.037	.053	.036	.022	.017	.012	.007	
5.0	.147	.090	.048	.127	.078	.042	.087	.055	.030	.050	.032	.018	.016	.010	.006	
6.0	.140	.082	.040	.121	.071	.035	.083	.050	.025	.048	.029	.015	.016	.010	.005	
7.0	.134	.075	.034	.115	.065	.029	.080	.046	.021	.046	.027	.012	.015	.009	.004	
8.0	.128	.069	.029	.110	.060	.025	.076	.042	.018	.044	.025	.011	.014	.008	.004	
9.0	.122	.064	.025	.105	.056	.022	.073	.039	.016	.042	.023	.009	.014	.008	.003	
10.0	.116	.060	.023	.100	.052	.020	.069	.037	.014	.041	.022	.008	.013	.007	.003	

C Range: 0 - 360DEG
C Interval: 22.5DEG
Test Speed: HIGH
Temperature:25DEG
Operators:
Test Date:2025-02-27

γ Range: 0 - 90DEG
 γ Interval: 1.0DEG
Test System:EVERFINE G0-2000B_V1 SYSTEM V2.00.428
Humidity:65.0%
Test Distance:7.880m [K=1.0000]
Remarks:

UGR(Unified Glare Rating) Table

Test:U:230.54V I:0.4393A P:96.213W PF:0.9500 Freq:49.99Hz Lamp Flux:16051.7x1 lm											
NAME: KD008-BKTCTP200-100						TYPE:			WEIGHT:		
SPEC.: black RA80 3000K+6000K						DIM.:			SERIAL No.:		
MFR.:						SUR.: 295mm			Shielding Angle:		
ceiling/cavity	0.7	0.7	0.5	0.5	0.3	0.7	0.7	0.5	0.5	0.3	
walls	0.5	0.3	0.5	0.3	0.3	0.5	0.3	0.5	0.3	0.3	
working 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		18.4	19.9	18.7	20.1	20.3	18.5	20.0	18.8	20.2	20.4
	3H	19.5	20.9	19.8	21.1	21.3	19.5	20.9	19.8	21.1	21.4
	4H	19.8	21.1	20.1	21.3	21.6	19.7	21.0	20.1	21.3	21.5
	6H	19.8	21.0	20.1	21.3	21.6	19.7	20.9	20.1	21.2	21.5
	8H	19.8	20.9	20.1	21.2	21.5	19.7	20.9	20.0	21.1	21.4
	12H	19.7	20.8	20.1	21.1	21.4	19.6	20.8	20.0	21.1	21.4
4H	2H	18.9	20.2	19.2	20.5	20.7	19.0	20.3	19.3	20.5	20.8
	3H	20.1	21.3	20.5	21.5	21.8	20.1	21.3	20.5	21.6	21.9
	4H	20.5	21.5	20.8	21.8	22.1	20.4	21.4	20.8	21.7	22.1
	6H	20.5	21.4	20.9	21.8	22.1	20.4	21.3	20.8	21.7	22.0
	8H	20.5	21.3	20.9	21.7	22.1	20.4	21.2	20.8	21.6	22.0
	12H	20.5	21.2	20.9	21.6	22.0	20.4	21.1	20.8	21.5	21.9
8H	4H	20.5	21.4	20.9	21.7	22.1	20.5	21.3	20.9	21.7	22.0
	6H	20.6	21.3	21.1	21.7	22.1	20.5	21.2	21.0	21.6	22.0
	8H	20.6	21.2	21.1	21.6	22.1	20.5	21.1	21.0	21.5	22.0
	12H	20.6	21.1	21.1	21.5	22.0	20.5	21.0	20.9	21.4	21.9
12H	4H	20.5	21.2	20.9	21.6	22.0	20.4	21.2	20.9	21.6	22.0
	6H	20.6	21.2	21.1	21.6	22.1	20.5	21.1	21.0	21.5	22.0
	8H	20.6	21.1	21.1	21.5	22.0	20.5	21.0	21.0	21.4	21.9
Variations with the observer position at spacings(CIE Pub.117):											
S = 1.0H	+ 0.3 / - 0.3					+ 0.3 / - 0.3					
1.5H	+ 0.3 / - 0.5					+ 0.3 / - 0.5					
2.0H	+ 0.5 / - 0.5					+ 0.5 / - 0.5					

CIE Pub.117, 16052 lm Total Lamp Luminous Flux Correct (8log(F/F0) = 9.6)
Area: 0.06835 m2

C Range: 0 - 360DEG
C Interval: 22.5DEG
Test Speed: HIGH
Temperature:25DEG
Operators:
Test Date:2025-02-27

γ Range: 0 - 90DEG
γ Interval: 1.0DEG
Test System:EVERFINE G0-2000B_V1 SYSTEM V2.00.428
Humidity:65.0%
Test Distance:7.880m [K=1.0000]
Remarks:

UTILIZATION FACTORS TABLE

Test:U:230.54V I:0.4393A P:96.213W PF:0.9500 Freq:49.99Hz Lamp Flux:16051.7x1 lm		
NAME: KD008-BKTCTP200-100	TYPE:	WEIGHT:
SPEC.: black RA80 3000K+6000K	DIM.:	SERIAL No.:
MFR.:	SUR.: 295mm	Shielding Angle:

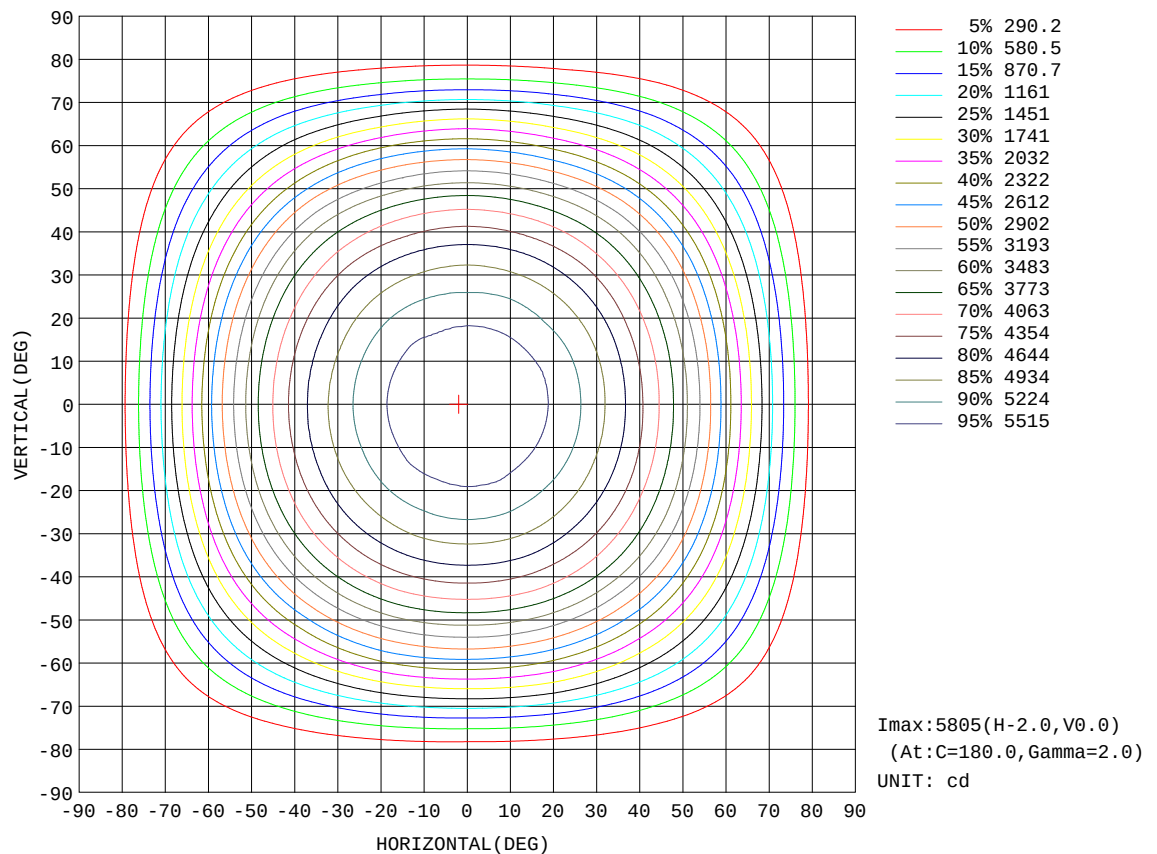
REFLECTANCE										
Ceiling	0.8	0.8	0.8	0.7	0.7	0.7	0.5	0.5	0.5	0
Walls	0.7	0.5	0.3	0.7	0.5	0.3	0.7	0.5	0.3	0
Working plane	0.2	0.2	0.2	0.2	0.2	0.2	0.2	0.2	0.2	0
ROOM INDEX	UTILIZATION FACTORS(PERCENT) k(RI) x RCR = 5									
k = 0.60	59	47	40	58	47	40	57	46	40	34
0.80	69	58	50	68	57	50	66	56	50	43
1.00	78	67	60	77	67	60	74	68	59	52
1.25	85	75	68	84	74	68	81	73	67	60
1.50	90	81	74	88	80	74	85	78	72	65
2.00	97	89	83	95	88	82	92	85	81	73
2.50	101	93	88	99	92	87	95	89	85	77
3.00	104	97	92	102	96	91	98	93	89	81
4.00	108	102	98	105	101	97	101	97	94	85
5.00	110	105	102	107	103	100	103	100	97	88
ROOM INDEX	UF(total)									Direct
According to DIN EN 13032-2 2004										
Suspended										
SHRNOM = 1.25										

C Range: 0 - 360DEG
C Interval: 22.5DEG
Test Speed: HIGH
Temperature:25DEG
Operators:
Test Date:2025-02-27

γ Range: 0 - 90DEG
 γ Interval: 1.0DEG
Test System:EVERFINE G0-2000B_V1 SYSTEM V2.00.428
Humidity:65.0%
Test Distance:7.880m [K=1.0000]
Remarks:

ISOCANDELA DIAGRAM

Test:U:230.54V I:0.4393A P:96.213W PF:0.9500 Freq:49.99Hz Lamp Flux:16051.7x1 lm		
NAME: KD008-BKTCTP200-100	TYPE:	WEIGHT:
SPEC.: black RA80 3000K+6000K	DIM.:	SERIAL No.:
MFR.:	SUR.: 295mm	Shielding Angle:

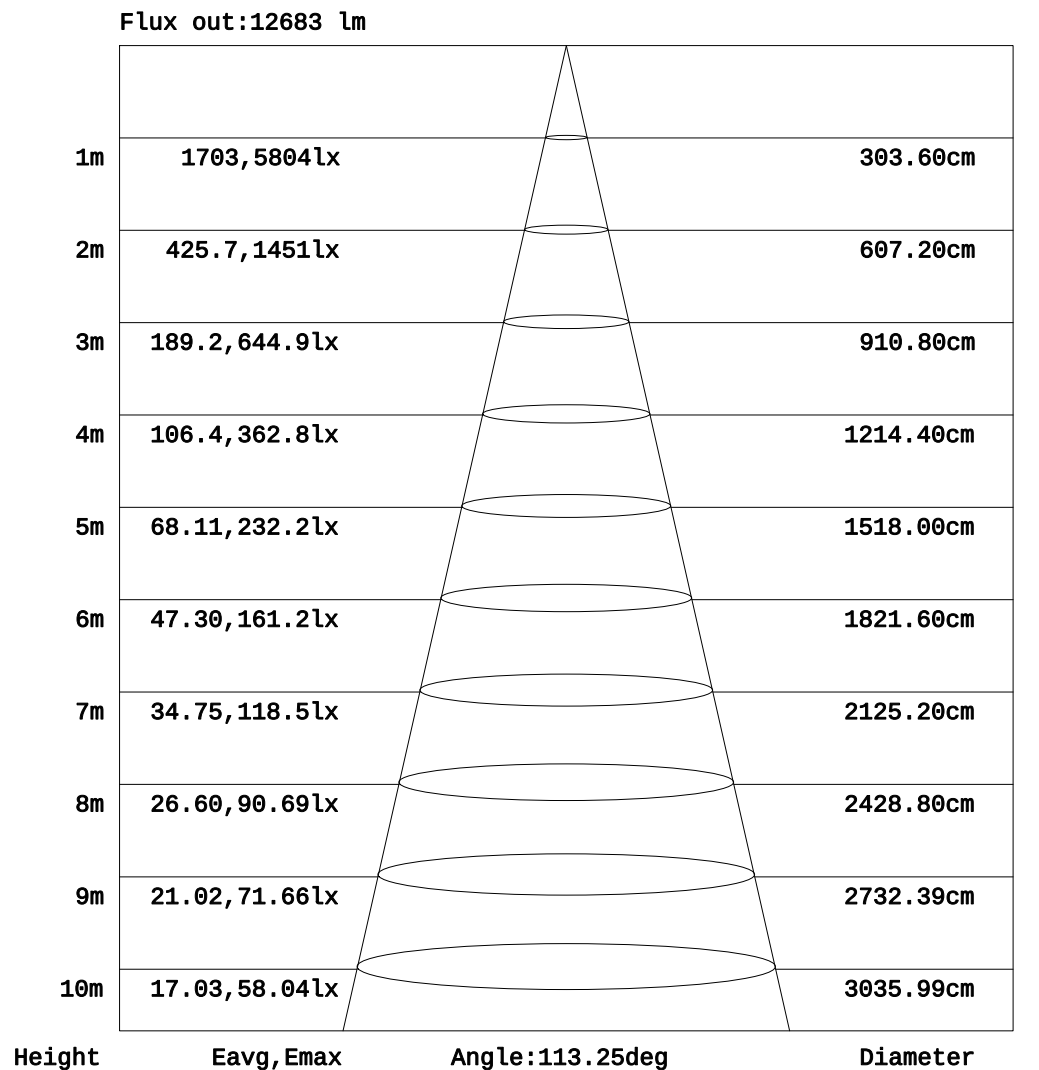


C Range: 0 - 360DEG
C Interval: 22.5DEG
Test Speed: HIGH
Temperature:25DEG
Operators:
Test Date:2025-02-27

γ Range: 0 - 90DEG
 γ Interval: 1.0DEG
Test System:EVERFINE G0-2000B_V1 SYSTEM V2.00.428
Humidity:65.0%
Test Distance:7.880m [K=1.0000]
Remarks:

AAI Figure

Test:U:230.54V I:0.4393A P:96.213W PF:0.9500 Freq:49.99Hz Lamp Flux:16051.7x1 lm		
NAME: KD008-BKTCTP200-100	TYPE:	WEIGHT:
SPEC.: black RA80 3000K+6000K	DIM.:	SERIAL No.:
MFR.:	SUR.: 295mm	Shielding Angle:



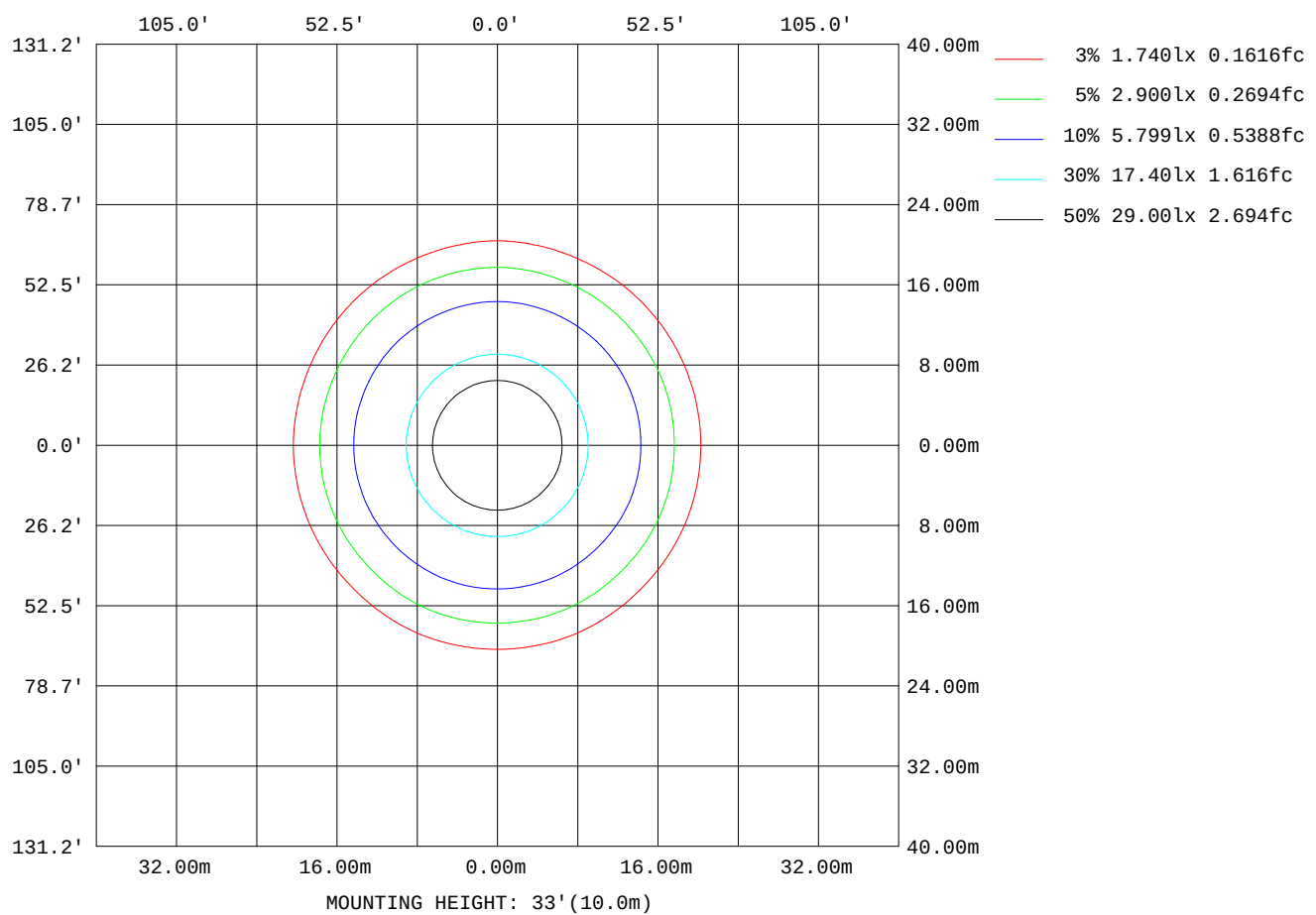
Note:The Curves indicate the illuminated area and the average illumination when the luminaire is at different distance.

C Range: 0 - 360DEG
C Interval: 22.5DEG
Test Speed: HIGH
Temperature:25DEG
Operators:
Test Date:2025-02-27

γ Range: 0 - 90DEG
γ Interval: 1.0DEG
Test System:EVERFINE G0-2000B_V1 SYSTEM V2.00.428
Humidity:65.0%
Test Distance:7.880m [K=1.0000]
Remarks:

ISOLUX DIAGRAM

Test:U:230.54V I:0.4393A P:96.213W PF:0.9500 Freq:49.99Hz Lamp Flux:16051.7x1 lm		
NAME: KD008-BKTCTP200-100	TYPE:	WEIGHT:
SPEC.: black RA80 3000K+6000K	DIM.:	SERIAL No.:
MFR.:	SUR.: 295mm	Shielding Angle:



C Range: 0 - 360DEG
C Interval: 22.5DEG
Test Speed: HIGH
Temperature: 25DEG
Operators:
Test Date: 2025-02-27

γ Range: 0 - 90DEG
γ Interval: 1.0DEG
Test System: EVERFINE G0-2000B_V1 SYSTEM V2.00.428
Humidity: 65.0%
Test Distance: 7.880m [K=1.0000]
Remarks:

LED Avg.L Report

Test:U:230.54V I:0.4393A P:96.213W PF:0.9500 Freq:49.99Hz Lamp Flux:16051.7x1 lm		
NAME: KD008-BKTCTP200-100	TYPE:	WEIGHT:
SPEC.: black RA80 3000K+6000K	DIM.:	SERIAL No.:
MFR.:	SUR.: 295mm	Shielding Angle:

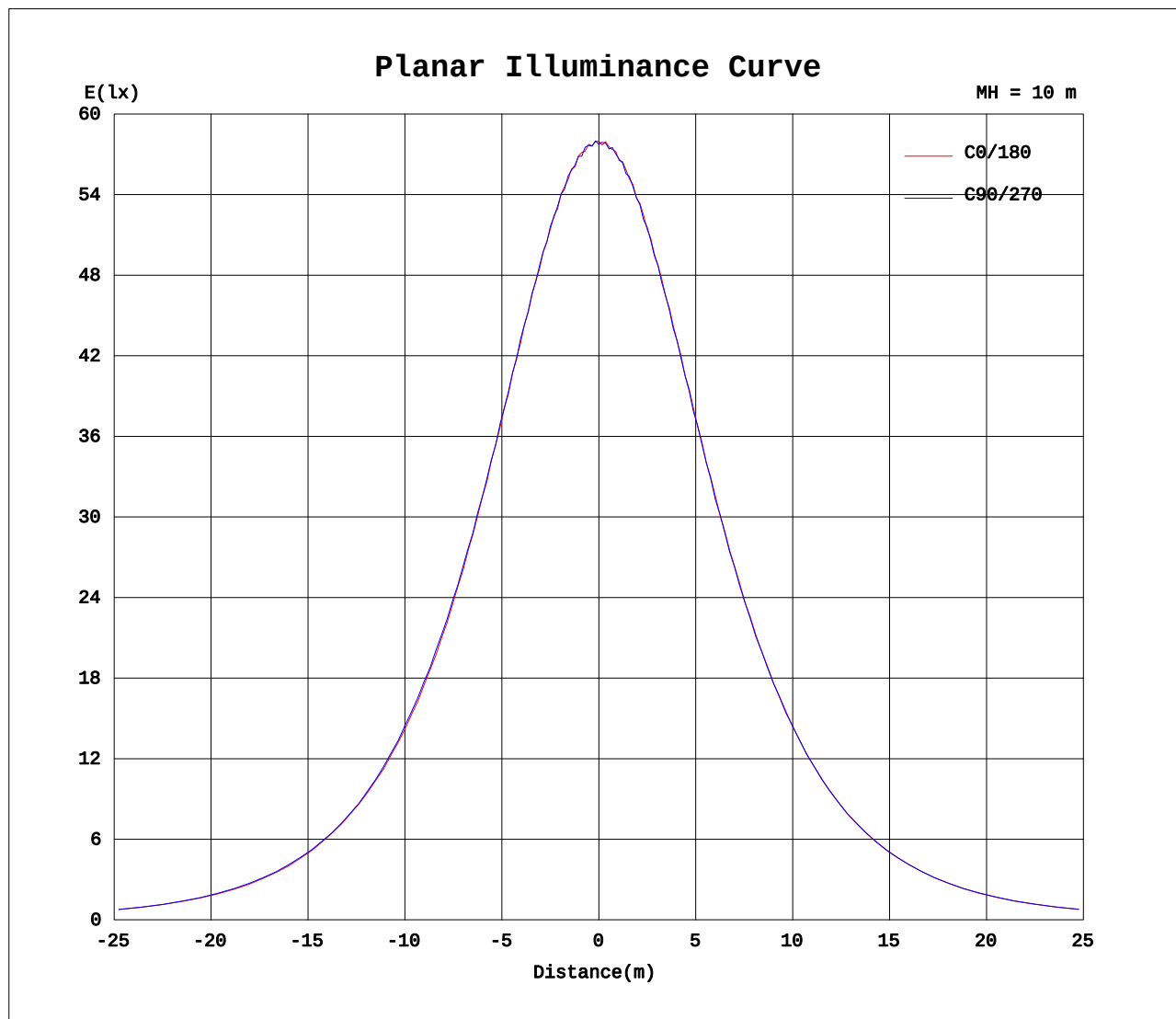
AvgL	cd/m2
L_0~180(65)av	64510
L_0~180(75)av	39342
L_0~180(85)av	3933
L_90~270(65)av	65082
L_90~270(75)av	34744
L_90~270(85)av	2341
L_45(65)av	64071
L_45(75)av	37554
L_45(85)av	3044

Standard: GB/T 29293-2012

C Range: 0 - 360DEG
C Interval: 22.5DEG
Test Speed: HIGH
Temperature:25DEG
Operators:
Test Date:2025-02-27

γ Range: 0 - 90DEG
γ Interval: 1.0DEG
Test System:EVERFINE G0-2000B_V1 SYSTEM V2.00.428
Humidity:65.0%
Test Distance:7.880m [K=1.0000]
Remarks:

Planar Illuminance Curve



C Range: 0 - 360DEG
C Interval: 22.5DEG
Test Speed: HIGH
Temperature: 25DEG
Operators:
Test Date: 2025-02-27

γ Range: 0 - 90DEG
 γ Interval: 1.0DEG
Test System: EVERFINE G0-2000B_V1 SYSTEM V2.00.428
Humidity: 65.0%
Test Distance: 7.880m [K=1.0000]
Remarks:

```

Range: 0 - 90DEG
Interval: 1.0DEG
Test System:EVERFINE GO-2000B_V1 SYSTEM V2.00.428
Humidity:65.0%
Test Distance:7.880m [K=1.0000]
Remarks:

```