

Photometric Data of Luminaire

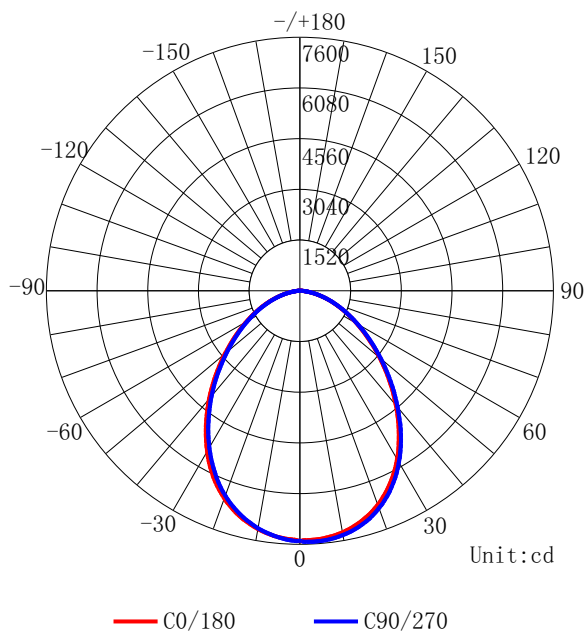
Lamp Description

Lamp Name:	800w led grow light	Lamp Des:	FLG05-4X200W	Lamp Weight:	0.000Kg
Manufac:		Lamp Size(cm):	32.0*32.0*8.0	Light Area(cm):	26.0*26.0
Electrical:	U:220.100V I:1.841A P:403.600W Pf:0.9960			LuminareFlux:	1*0.00 lm

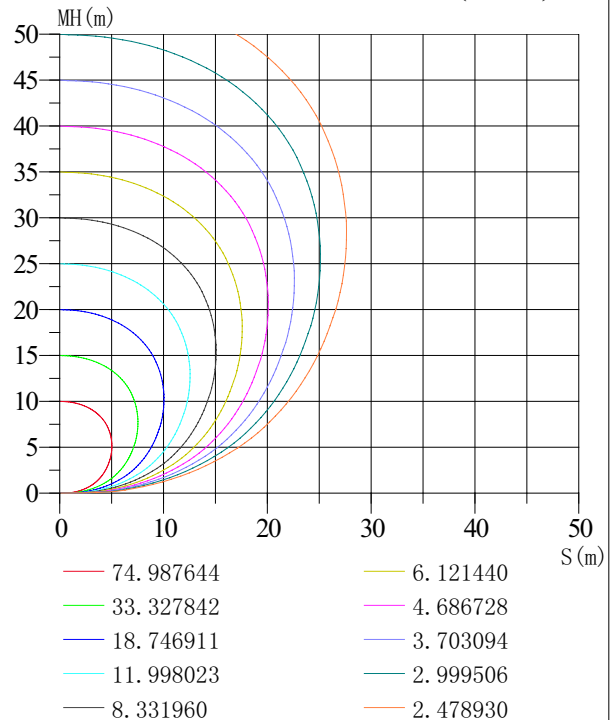
Lamp Test Data

Lamp Flux:	16063.85 lm	Center Cd.:	7498.8 cd
Max(C, φ):	(90, 3.0)	Maximum Cd.:	7532.8 cd
BeamAngle(50%):	88.0 Deg	BeamAngle(10%):	147.0 Deg
Flux(0-90):	16063.72 lm(100.0%)	Flux(90-180):	0.1 lm(0.0%)
LuminousEfficacy:	39.80 lm/W	S/MH(C0/180)	1.13
		S/MH(C90/270)	1.11

Luminous Intensity Distribution(C)



PLAN C0 ISOLUX DIAGRAM(Unit:lx)



C Angle Range: 0-360Deg

φ Range:

0-90Deg

Test No.:

C Precious: 10 Deg

φ Precious:

1 Deg

Tester:

Distance: 3.000 m

Date:

2014-10-24

Time:

10:13:42

Other:

Zonal Flux Diagram

Zonal Flux Diagram:

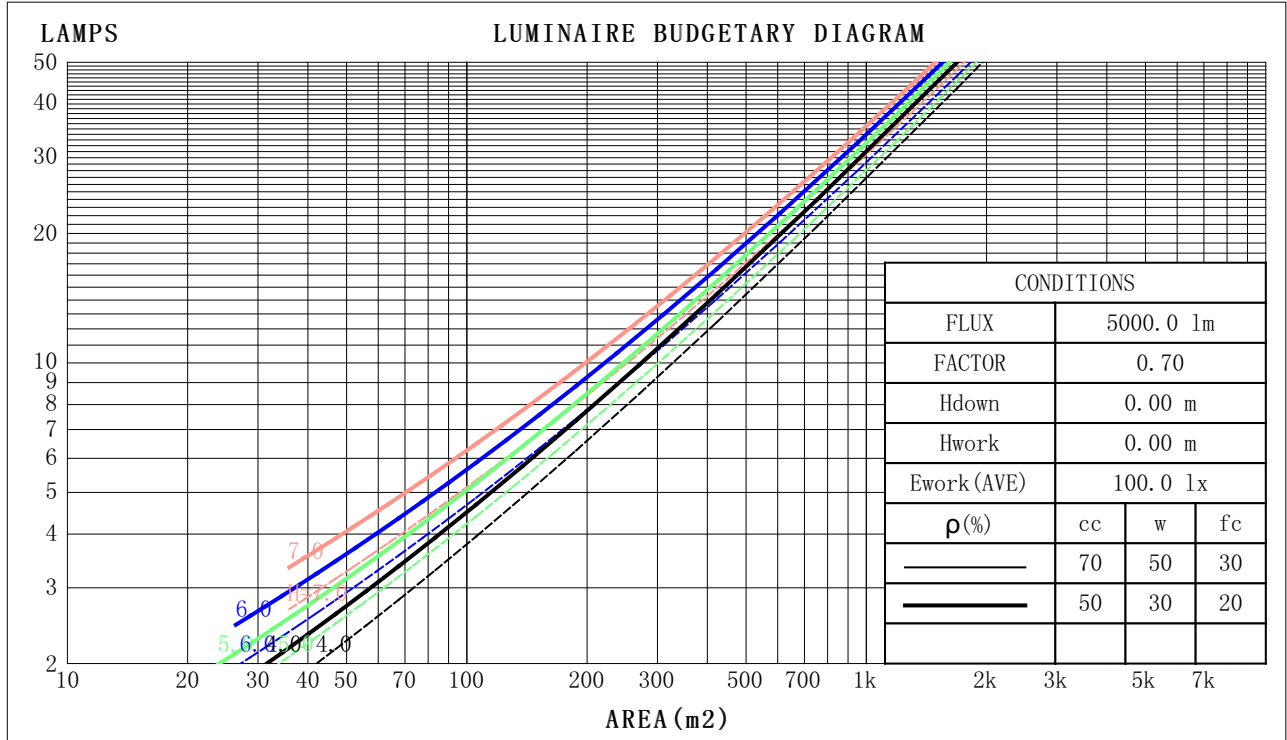
γ	C0	C45	C90	C135	C180	C225	C270	C315	γ	Fzone	Ftotal	%lamp	%lum
10	7353.8	7438.8	7434.3	7349.3	7250.8	7197.1	7228.4	7282.1	0-10	707.07	707.07	4.41	4.41
20	6825.6	6968.9	6933.0	6792.0	6624.2	6503.4	6534.7	6653.3	10-20	1992.35	2699.41	16.81	16.81
30	5827.5	6002.0	5934.9	5755.9	5558.9	5395.6	5429.2	5592.5	20-30	2875.20	5574.61	34.71	34.71
40	4475.8	4639.2	4556.4	4395.3	4234.2	4082.0	4117.8	4274.4	30-40	3141.29	8715.91	54.26	54.26
50	3124.1	3245.0	3173.4	3041.3	2931.7	2804.1	2846.6	2963.0	40-50	2826.67	11542.57	71.86	71.86
60	1973.8	2056.6	2000.7	1917.9	1848.5	1767.9	1803.7	1884.3	50-60	2178.76	13721.34	85.42	85.42
70	1087.6	1143.6	1101.0	1045.1	1007.1	944.4	975.7	1031.7	60-70	1440.78	15162.11	94.39	94.39
80	398.3	434.2	402.8	373.7	353.6	317.8	340.2	376.0	70-80	728.23	15890.34	98.92	98.92
90	0.0	13.4	0.0	0.0	0.0	0.0	0.0	0.0	80-90	173.39	16063.72	100.00	100.00
DEG	LUMINOUS INTENSITY:cd									UNIT:lm			

C Angle Range:	0-360Deg	γ Range:	0-90Deg	Test No. :	
C Precious:	10 Deg	γ Precious:	1 Deg	Tester:	
Distance:	3.000 m	Date:	2014-10-24	Time:	10:13:42
Other:					

CU AND LUMINAIRE BUDGETARY ESTIMATE DIAGRAM

Lamp Description					
Lamp Name:	800w led grow light	Lamp Des:	FLG05-4X200W	Lamp Weight:	0.000Kg
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Electrical:	U:220.100V I:1.841A P:403.600W Pf:0.9960			LuminareFlux:	1*0.00 lm

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 Coefficients of Utilization(CU)															
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	1.06	1.02	.99	1.04	1.00	.97	.99	.96	.94	.95	.93	.91	.92	.90	.88	.86
2.0	.94	.87	.82	.92	.86	.81	.88	.84	.79	.85	.81	.78	.82	.79	.76	.74
3.0	.83	.76	.70	.82	.75	.69	.79	.73	.68	.76	.71	.67	.74	.69	.66	.64
4.0	.75	.67	.60	.73	.66	.60	.71	.64	.59	.69	.63	.58	.67	.62	.58	.56
5.0	.67	.59	.53	.66	.58	.53	.64	.57	.52	.62	.56	.51	.61	.55	.51	.49
6.0	.61	.53	.47	.60	.52	.47	.58	.51	.46	.57	.51	.46	.55	.50	.45	.43
7.0	.56	.48	.42	.55	.47	.42	.54	.46	.41	.52	.46	.41	.51	.45	.41	.39
8.0	.51	.43	.38	.51	.43	.38	.49	.42	.37	.48	.42	.37	.47	.41	.37	.35
9.0	.47	.39	.34	.47	.39	.34	.46	.39	.34	.45	.38	.34	.44	.38	.34	.32
10.0	.44	.36	.31	.43	.36	.31	.42	.36	.31	.41	.35	.31	.41	.35	.31	.29



C Angle Range:	0-360Deg	γ Range:	0-90Deg	Test No. :	
C Precious:	10 Deg	γ Precious:	1 Deg	Tester:	
Distance:	3.000 m	Date:	2014-10-24	Time:	10:13:42
Other:					

WEC AND CCEC

Lamp Description					
Lamp Name:	800w led grow light	Lamp Des:	FLG05-4X200W	Lamp Weight:	0.000Kg
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Electrical:	U:220.100V I:1.841A P:403.600W Pf:0.9960			LuminareFlux:	1*0.00 lm

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	.274	.156	.049	.267	.152	.048	.253	.145	.046	.241	.139	.045	.230	.134	.043	
2.0	.261	.143	.044	.255	.140	.043	.244	.135	.042	.233	.131	.041	.223	.126	.040	
3.0	.244	.130	.039	.239	.128	.039	.229	.124	.038	.220	.120	.037	.211	.117	.036	
4.0	.228	.118	.035	.223	.117	.035	.214	.114	.034	.206	.111	.033	.198	.108	.033	
5.0	.213	.108	.031	.208	.107	.031	.201	.104	.031	.193	.102	.030	.186	.100	.030	
6.0	.199	.100	.028	.195	.098	.028	.188	.096	.028	.181	.094	.028	.175	.092	.027	
7.0	.186	.092	.026	.183	.091	.026	.176	.089	.026	.171	.087	.025	.165	.086	.025	
8.0	.175	.085	.024	.172	.085	.024	.166	.083	.024	.161	.081	.024	.156	.080	.023	
9.0	.164	.080	.022	.162	.079	.022	.157	.078	.022	.152	.076	.022	.148	.075	.022	
10.0	.155	.074	.021	.153	.074	.021	.148	.073	.020	.144	.072	.020	.140	.070	.020	

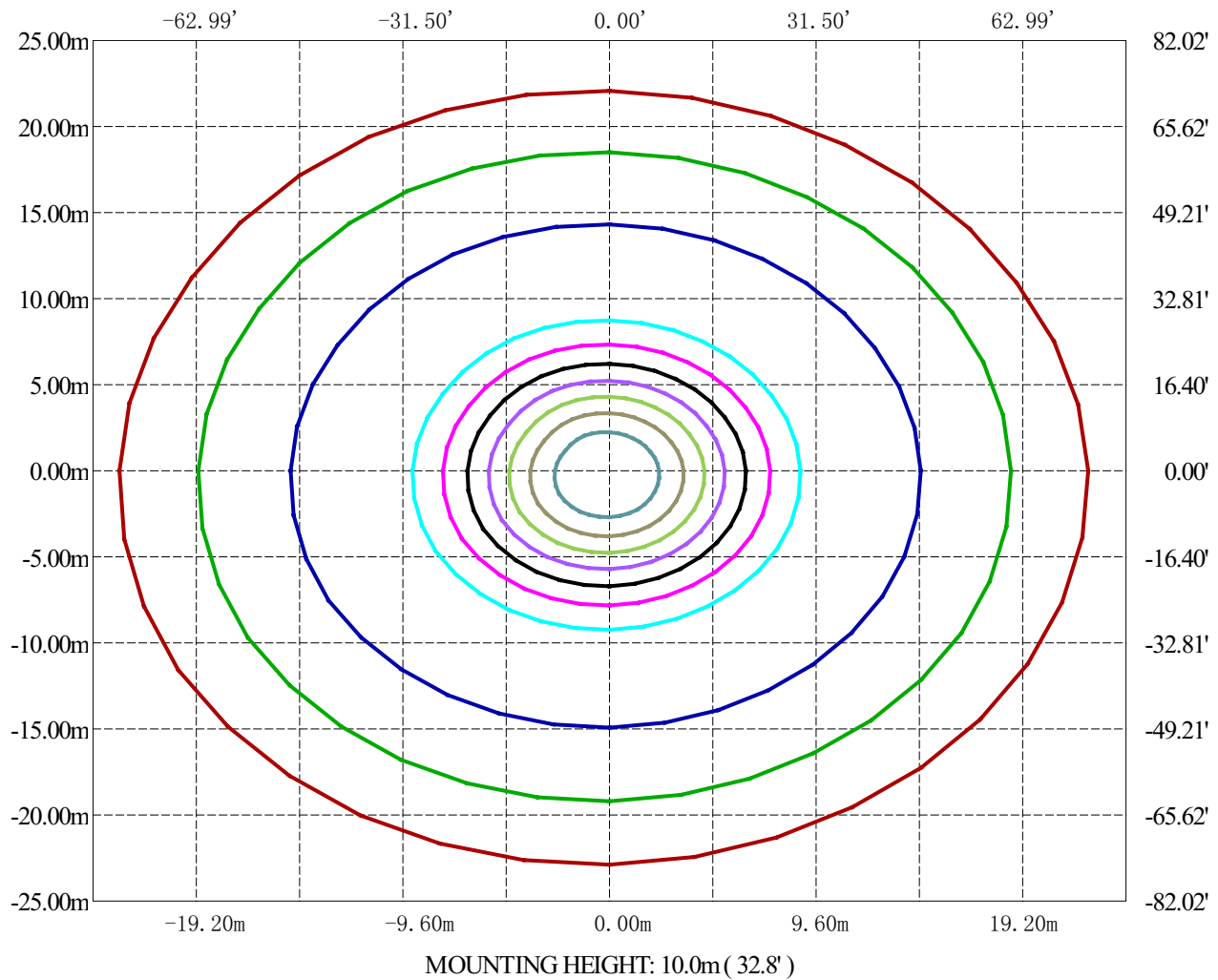
ρ_{cc}	80%			70%			50%			30%			10%			0
ρ_w	50%	30%	10%	50%	30%	10%	50%	30%	10%	50%	30%	10%	50%	30%	10%	0
ρ_{fc}	20%			20%			20%			20%			20%			0
RCR	RCR:Room Cavity Ratio Ceiling Cavity Exitance Coefficients(CCEC)															
0.0	.190	.190	.190	.163	.163	.163	.111	.111	.111	.064	.064	.064	.020	.020	.020	
1.0	.178	.156	.137	.152	.134	.118	.104	.092	.082	.060	.053	.048	.019	.017	.015	
2.0	.168	.132	.102	.144	.114	.088	.099	.079	.061	.057	.046	.036	.018	.015	.012	
3.0	.160	.114	.078	.137	.098	.068	.094	.068	.047	.054	.040	.028	.017	.013	.009	
4.0	.152	.101	.061	.130	.087	.053	.089	.061	.038	.052	.035	.022	.017	.012	.007	
5.0	.144	.090	.050	.124	.078	.043	.085	.054	.031	.049	.032	.018	.016	.010	.006	
6.0	.137	.081	.041	.118	.070	.036	.081	.049	.025	.047	.029	.015	.015	.009	.005	
7.0	.131	.074	.035	.112	.064	.030	.078	.045	.022	.045	.027	.013	.015	.009	.004	
8.0	.124	.069	.030	.107	.059	.026	.074	.042	.019	.043	.025	.011	.014	.008	.004	
9.0	.119	.064	.026	.102	.055	.023	.071	.039	.016	.041	.023	.010	.013	.008	.003	
10.0	.113	.059	.023	.098	.051	.020	.068	.036	.014	.040	.021	.009	.013	.007	.003	

C Angle Range: 0-360Deg γ Range: 0-90Deg Test No. :
 C Precious: 10 Deg γ Precious: 1 Deg Tester:
 Distance: 3.000 m Date: 2014-10-24 Time: 10:13:42
 Other:

ISOLUX Diagram

Lamp Description

Lamp Name:	800w led grow light	Lamp Des:	HYG05-4X200W-W	Lamp Weight:	0.000Kg
Manufac:		Lamp Size(cm):	32.0*32.0*8.0	Light Area(cm):	26.0*26.0
Electrical:	U:220.100V I:1.841A P:403.600W Pf:0.9960			LuminareFlux:	1*0.00 lm

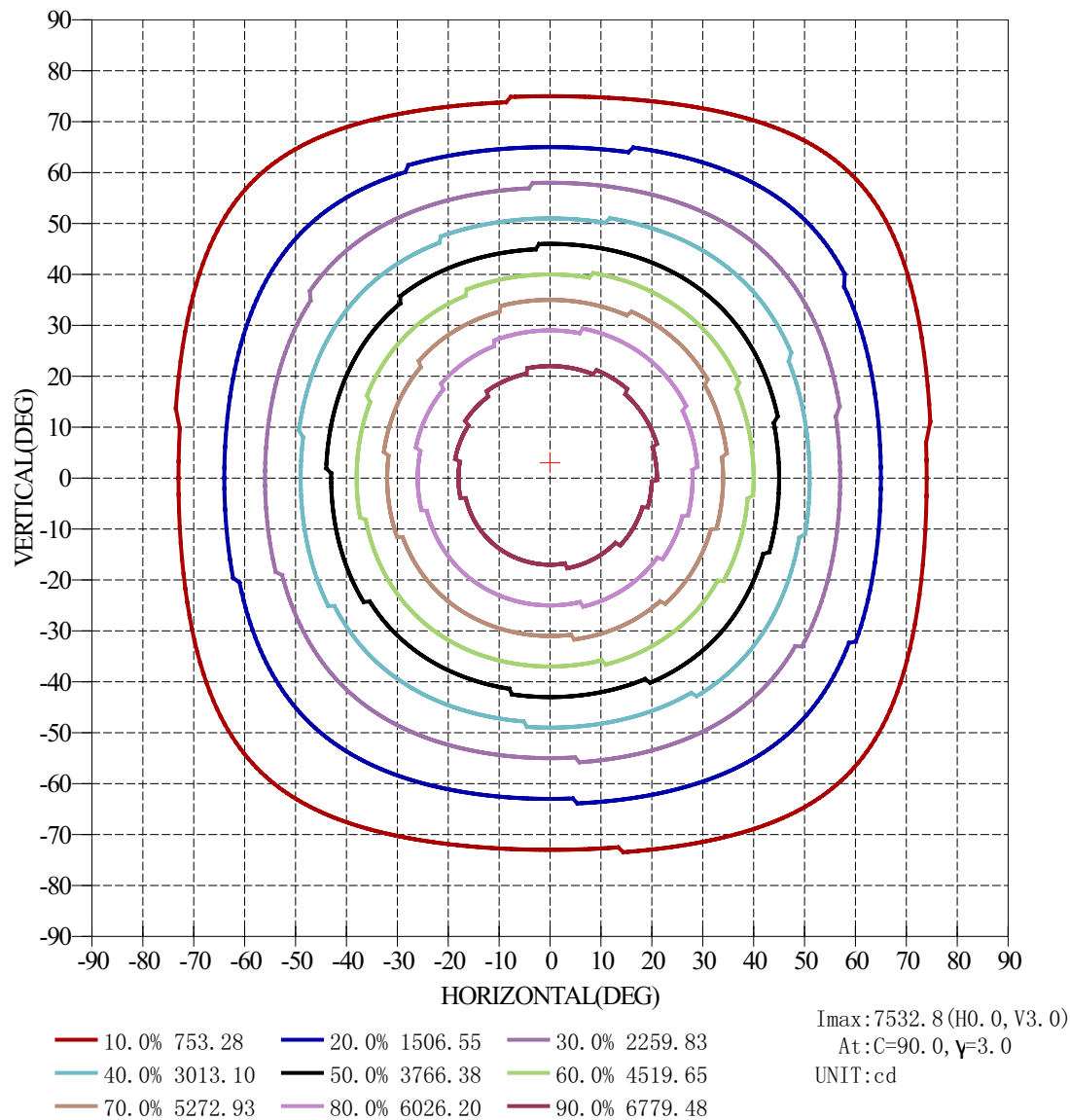


3.0% 2.2496lx 0.2090fc	5.0% 3.7494lx 0.3483fc	10.0% 7.4988lx 0.6966fc
30.0% 22.4961lx 2.0899fc	40.0% 29.9951lx 2.7865fc	50.0% 37.4941lx 3.4832fc
60.0% 44.9931lx 4.1798fc	70.0% 52.4911lx 4.8764fc	80.0% 59.9901lx 5.5731fc
90.0% 67.4891lx 6.2697fc		

C Angle Range:	0-360Deg	γ Range:	0-90Deg	Test No. :	
C Precious:	10 Deg	γ Precious:	1 Deg	Tester:	
Distance:	3.000 m	Date:	2014-10-24	Time:	10:13:42
Other:					

ISOCANDELA Diagram

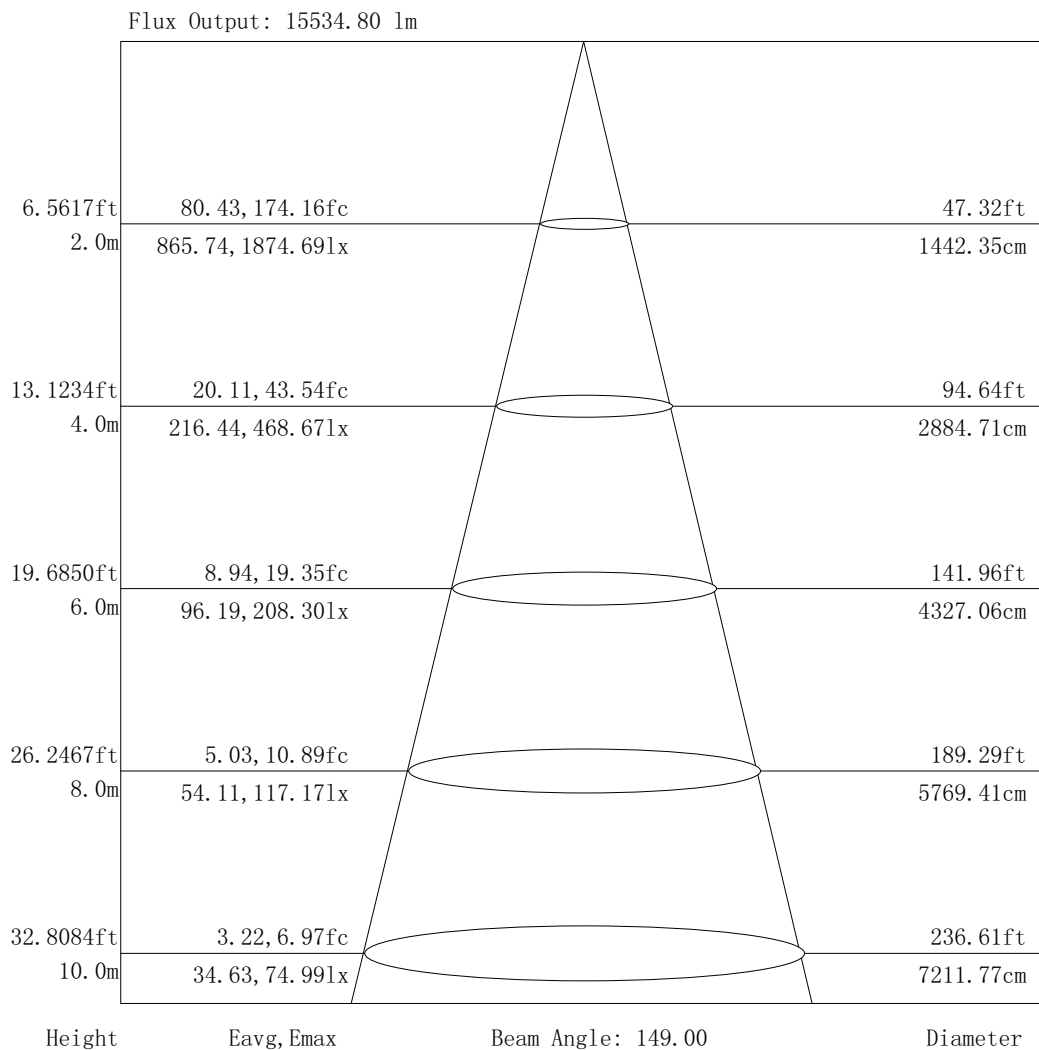
Lamp Description					
Lamp Name:	800w led grow light	Lamp Des:	FLG05-4X200W	Lamp Weight:	0.000Kg
Manufac:		Lamp Size(cm):	32.0*32.0*8.0	Light Area(cm):	26.0*26.0
Electrical:	U:220.100V I:1.841A P:403.600W Pf:0.9960			LuminareFlux:	1*0.00 lm



C Angle Range:	0-360Deg	γ Range:	0-90Deg	Test No. :	
C Precious:	10 Deg	γ Precious:	1 Deg	Tester:	
Distance:	3.000 m	Date:	2014-10-24	Time:	10:13:42
Other:					

Effective Average Illuminance Diagram

Lamp Description					
Lamp Name:	800w led grow light	Lamp Des:	FLG05-4X200W	Lamp Weight:	0.000Kg
Manufac:		Lamp Size(cm):	32.0*32.0*8.0	Light Area(cm):	26.0*26.0
Electrical:	U:220.100V I:1.841A P:403.600W Pf:0.9960			LuminareFlux:	1*0.00 lm



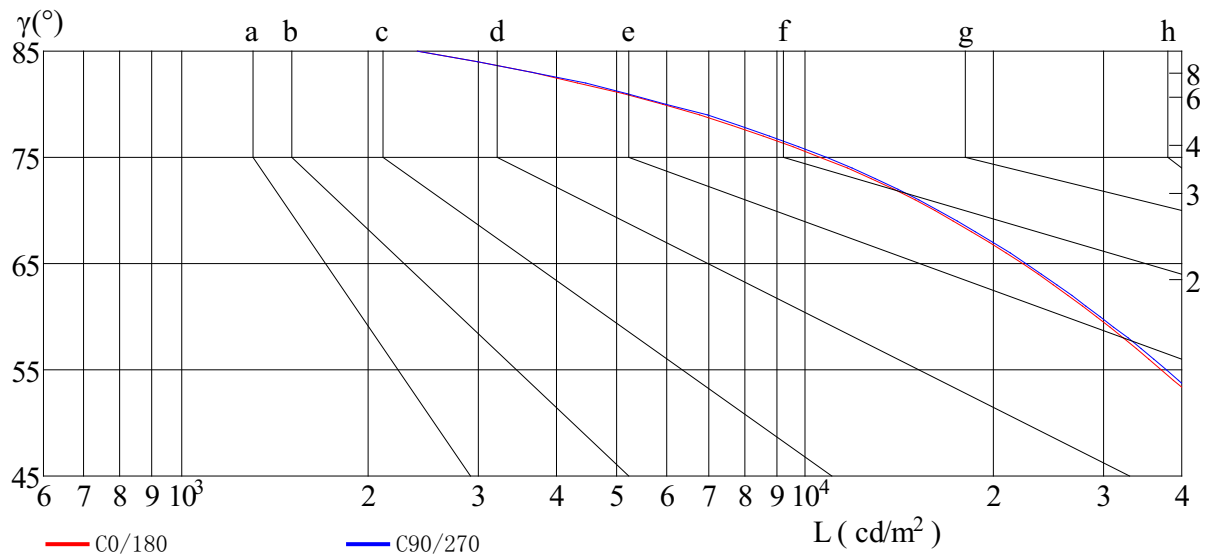
Note: The Curve indicate the illuminated area and the average illumination when the luminaire is at different distance.

C Angle Range:	0-360Deg	γ Range:	0-90Deg	Test No. :
C Precious:	10 Deg	γ Precious:	1 Deg	Tester:
Distance:	3.000 m	Date:	2014-10-24	Time: 10:13:42
Other:				

Luminance Limitation Curves

Lamp Description					
Lamp Name:	800w led grow light	Lamp Des:	FLG05-4X200W	Lamp Weight:	0.000Kg
Manufac:		Lamp Size(cm):	32.0*32.0*8.0	Light Area(cm):	26.0*26.0
Electrical:	U:220.100V I:1.841A P:403.600W Pf:0.9960			LuminareFlux:	1*0.00 lm

GLARE	CLASS	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



C/Gama	85	80	75	70	65	60	55	50	45	Unit
C0	2384	5893	10527	16089	22246	29199	37078	46215	55948	cd/m2
C90	2384	5959	10792	16288	22512	29596	37806	46943	56941	

C Angle Range:	0-360Deg	γ Range:	0-90Deg	Test No. :	
C Precious:	10 Deg	γ Precious:	1 Deg	Tester:	
Distance:	3.000 m	Date:	2014-10-24	Time:	10:13:42
Other:					

UTILIZATION FACTORS TABLE

Lamp Description					
Lamp Name:	800w led grow light	Lamp Des:	FLG05-4X200W	Lamp Weight:	0.000Kg
Manufac:		Lamp Size(cm):	32.0*32.0*8.0	Light Area(cm):	26.0*26.0
Electrical:	U:220.100V I:1.841A P:403.600W Pf:0.9960			LuminareFlux:	1*0.00 lm

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 (PERFECT) $k(RI) \times RCR = 5$									
$k = 0.60$	62	51	44	61	50	44	60	50	44	37
0.80	72	60	53	71	60	53	68	59	52	46
1.00	79	68	61	78	68	61	75	66	60	53
1.25	86	76	69	84	75	68	81	73	67	60
1.50	91	82	75	89	81	74	86	79	73	65
2.00	98	90	84	96	89	83	92	86	81	74
2.50	102	95	89	99	93	88	95	90	86	78
3.00	104	98	93	102	96	92	98	93	89	81
4.00	108	103	98	105	101	97	101	97	94	85
5.00	110	106	102	107	104	100	103	100	97	88
ROOM INDEX	UF(total)									Direct
According to BS EN 13032-2004			Suspended				SHRNOM=1.00			

C Angle Range: 0-360Deg γ Range: 0-90Deg Test No.:
 C Precious: 10 Deg γ Precious: 1 Deg Tester:
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