

PHONE: (303) 442-1255 • FAX: (970) 535-3114 • E-MAIL: itl@itlboulder.com • WEBSITE: www.itlboulder.com

REPORT NUMBER: ITL88147-GONIOPHOTOMETRY

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ISSUE DATE: 08/23/16

PREPARED FOR: BOYD LIGHTING COMPANY

CATALOG NUMBER: C-10621

LUMINAIRE: FABRICATED BROWN PAINTED METAL MOUNTING BASE AND SUPPORT ROD, FABRICATED BROWN PAINTED METAL 0.75" WIDE RING HOUSING, 117 LEDS, 3-PIECE TRANSLUCENT WHITE FROSTED PLASTIC DIFFUSER. DIFFUSER FROSTED SIDE OUT.

LAMPS: ONE HUNDRED SEVENTEEN WHITE LIGHT EMITTING DIODES (LEDs), VERTICAL BASE-UP POSITION.

INPUT ELECTRICAL: 120.0 VOLTS, 30.6 WATTS, 0.256 AMPS

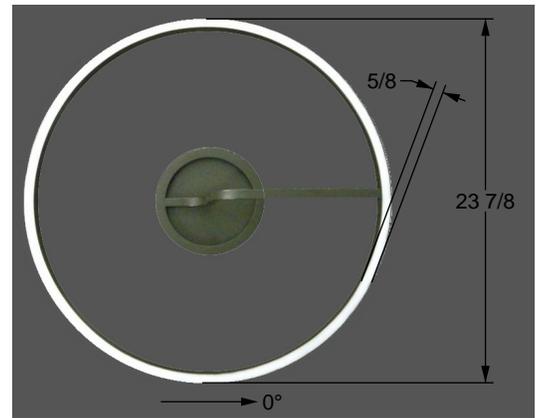
MOUNTING: PENDANT

LED DRIVER: OSRAM OT40W/PRG1400C/UNV/DIM-1, DRIVER HAS MULTIPLE LEADS, ONLY LINE INPUT AND LED OUTPUT LEADS CONNECTED FOR THIS TEST. CLIENT STATES DRIVER PROGRAMMED FOR 675mA OUTPUT.

NOTE: DATA SHOWN IS ABSOLUTE FOR THE SAMPLE PROVIDED AT RATED INPUT VOLTAGE (120VAC, 60Hz) TO THE DRIVER. LED INFORMATION PROVIDED BY CLIENT.

TEST PROCEDURE: IESNA LM-79-08

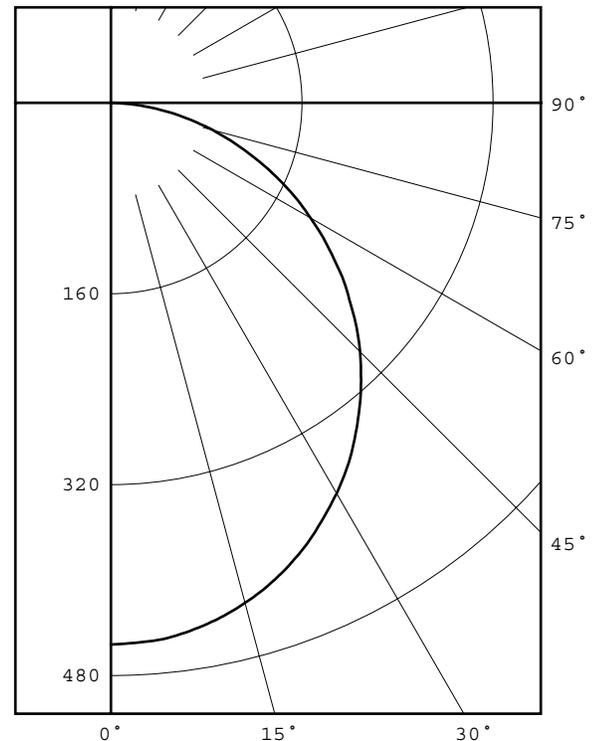
TEST DISTANCE = 35.0 FEET



DEG	CANDELA	LUMENS
0	454	
5	452	43
15	434	122
25	400	184
35	353	221
45	295	227
55	228	204
65	158	156
75	88	93
85	23	27
90	0	

ZONAL LUMEN SUMMARY		
ZONE	LUMENS	%FIXT
0- 30	350	27.4
0- 40	570	44.6
0- 60	1002	78.4
0- 90	1277	100.0
90-180	0	0.0
0-180	1277	100.0

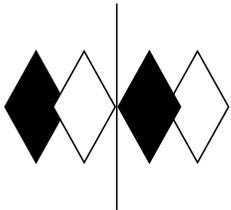
EFFICACY = 41.7 lm/W  
CIE TYPE - DIRECT  
LUMINAIRE SPACING CRITERION = 1.24  
BEAM ANGLE (50%) : 110.3 DEGREES  
FIELD ANGLE (10%) : 162.8 DEGREES



LUMINANCE DATA IN CANDELA/SQ M  
ANGLE AVERAGE  
IN DEG

45	14893.
55	14190.
65	13346.
75	12138.
85	9421.

Checked J. VILLANUEVA  
Approved R. BEATTIE  
Lighting Engineer



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CANDELA DISTRIBUTION

0.0	454
2.5	453
5.0	452
7.5	449
10.0	445
12.5	440
15.0	434
17.5	427
20.0	419
22.5	410
25.0	400
27.5	389
30.0	378
32.5	366
35.0	353
37.5	339
40.0	325
42.5	310
45.0	295
47.5	279
50.0	262
52.5	246
55.0	228
57.5	211
60.0	193
62.5	176
65.0	158
67.5	140
70.0	122
72.5	105
75.0	88
77.5	71
80.0	55
82.5	38
85.0	23
87.5	9
90.0	0



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5-DEGREE  
ZONAL LUMEN SUMMARY

0- 5	11
5- 10	32
10- 15	52
15- 20	70
20- 25	86
25- 30	98
30- 35	108
35- 40	113
40- 45	115
45- 50	113
50- 55	107
55- 60	97
60- 65	85
65- 70	71
70- 75	55
75- 80	38
80- 85	21
85- 90	6

10-DEGREE  
ZONAL LUMEN SUMMARY

0- 10	43
0- 20	165
0- 30	350
0- 40	570
0- 50	798
0- 60	1002
0- 70	1158
0- 80	1251
0- 90	1277



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COEFFICIENTS OF UTILIZATION - ZONAL CAVITY METHOD

EFFECTIVE FLOOR CAVITY REFLECTANCE 0.20

RC	80				70				50			30			10			0		
	RW	70	50	30	10	70	50	30	10	50	30	10	50	30	10	50	30	10	0	
0	119	119	119	119	119	116	116	116	116	111	111	111	111	106	106	106	102	102	102	100
1	109	104	99	95	106	101	97	94	97	94	91	93	91	88	90	88	86	86	86	83
2	99	90	83	78	96	88	82	77	85	79	75	82	77	73	79	75	71	71	71	69
3	90	79	71	64	87	78	70	64	75	68	63	72	66	62	69	65	60	60	60	58
4	82	70	61	55	80	69	61	54	66	59	53	64	58	53	62	56	52	52	52	50
5	76	63	54	47	74	62	53	47	59	52	46	57	51	46	56	50	45	45	45	43
6	70	56	47	41	68	55	47	41	54	46	40	52	45	40	50	44	40	40	40	38
7	65	51	42	36	63	50	42	36	49	41	36	47	41	35	46	40	35	35	35	33
8	60	47	38	32	59	46	38	32	45	37	32	43	37	32	42	36	32	32	32	30
9	56	43	35	29	55	42	34	29	41	34	29	40	33	29	39	33	28	28	28	27
10	53	40	32	26	52	39	31	26	38	31	26	37	31	26	36	30	26	26	26	24

ALL CANDELA, LUMENS, LUMINANCE, AND VCP VALUES IN THIS REPORT ARE BASED ON ABSOLUTE PHOTOMETRY. THE COEFFICIENT OF UTILIZATION VALUES ARE BASED ON THE TOTAL ABSOLUTE LUMEN OUTPUT OF THIS TEST SAMPLE.

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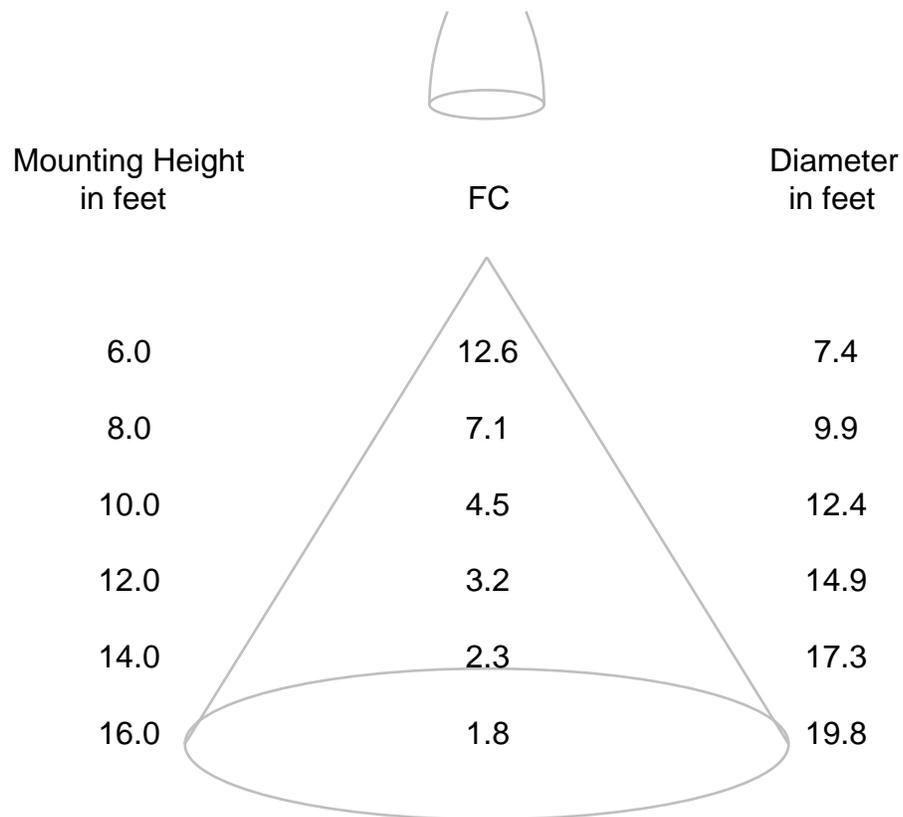
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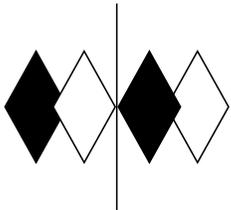
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## CONE OF LIGHT DIAGRAM

(diameter shown is where fc value is half the fc at nadir)





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