



REPORT NUMBER: ITL87383-GONIOPHOTOMETRY  
ISSUE DATE: 05/17/16  
PREPARED FOR: OXYGEN LIGHTING  
CATALOG NUMBER: 3-624

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LUMINAIRE: FORMED SPECULAR METAL HOUSING WITH WHITE PAINTED OPTICAL COMPARTMENT, 2 FABRICATED WHITE PAINTED METAL DRIVER COVERS, 2 WHITE CIRCUIT BOARDS EACH WITH 30 LEDS, FROSTED GLASS DIFFUSER WITH TRANSLUCENT WHITE FINISHED INTERIOR. DRIVERS ARE ALIGNED WITH THE 0-DEGREE PLANE OF OPTICAL COMPARTMENT.

LAMPS: SIXTY WHITE LIGHT EMITTING DIODES (LEDS), VERTICAL BASE-UP POSITION.

INPUT ELECTRICAL: 120.0 VOLTS, 25.9 WATTS, 0.221 AMPS

MOUNTING: SURFACE

LED DRIVERS: TWO L.T.F. DA12W350C1834D010-0000, DRIVERS HAVE MULTIPLE LEADS, ONLY LINE INPUT AND LED OUTPUT LEADS CONNECTED FOR THIS TEST.

NOTE: DATA SHOWN IS ABSOLUTE FOR THE SAMPLE PROVIDED AT RATED INPUT VOLTAGE (120VAC, 60Hz) TO THE DRIVERS.

TEST PROCEDURE: IESNA LM-79-08

TEST DISTANCE = 35.0 FEET



CANDELA DISTRIBUTION						FLUX
	0.0	22.5	45.0	67.5	90.0	
0	427	427	427	427	427	
5	425	426	425	426	426	40
15	412	412	412	412	411	116
25	385	384	385	385	384	177
35	345	346	346	346	346	216
45	295	295	295	296	296	228
55	237	237	238	238	238	213
65	175	175	175	175	175	173
75	110	110	111	111	111	117
85	50	49	50	51	50	56
90	29	29	30	31	31	
95	19	19	19	20	20	23
105	14	14	14	14	14	15
115	10	10	10	10	11	10
125	7	7	7	7	7	6
135	4	4	4	4	4	3
145	2	2	2	2	2	1
155	0	0	0	0	0	0
165	0	0	0	0	0	0
175	0	0	0	0	0	0
180	0	0	0	0	0	0

ZONAL ZONE	LUMEN LUMENS	SUMMARY %FIXT
0- 30	334	23.9
0- 40	550	39.4
0- 60	991	71.0
0- 90	1337	95.8
90-120	48	3.4
90-130	54	3.9
90-150	58	4.2
90-180	58	4.2
0-180	1395	100.0

EFFICACY = 53.9 lm/W

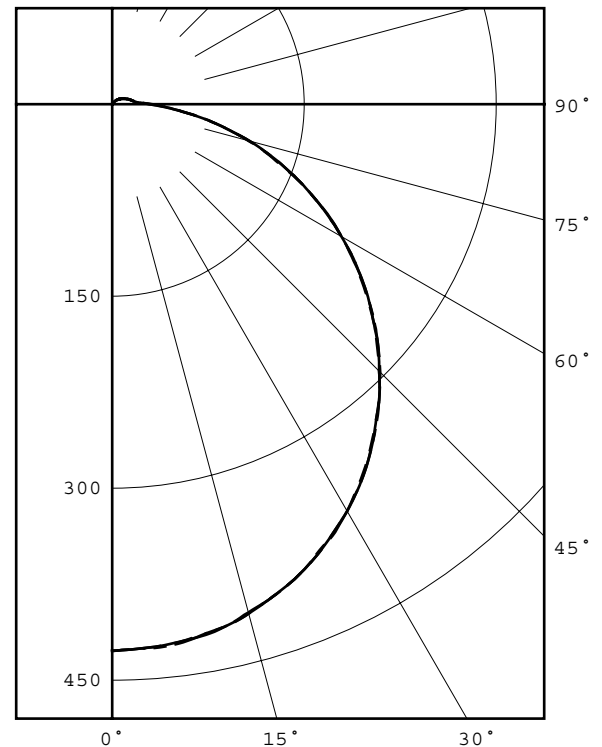
CIE TYPE - DIRECT

PLANE : 0-DEG 90-DEG

SPACING CRITERIA : 1.27 1.28

BEAM ANGLE (50%) : 118.0 X 118.0 DEGREES

FIELD ANGLE (10%) : 173.0 X 173.6 DEGREES



LEGEND:  
0-deg - - - - -  
45-deg = = = = =  
90-deg - - - - -

Checked J. VILLANUEVA  
Approved R. BEATTIE  
Lighting Engineer



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LUMINANCE DATA IN CANDELA/SQ M			
ANGLE IN DEG	AVERAGE 0-DEG	AVERAGE 45-DEG	AVERAGE 90-DEG
45	4480.	4480.	4495.
55	4393.	4411.	4411.
65	4306.	4306.	4306.
75	4165.	4203.	4203.
85	3825.	3825.	3825.



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CANDELA DISTRIBUTION  
LATERAL ANGLE

	0.0	22.5	45.0	67.5	90.0
0.0	427	427	427	427	427
5.0	425	426	425	426	426
10.0	420	421	421	420	420
15.0	412	412	412	412	411
20.0	400	400	400	400	400
25.0	385	384	385	385	384
30.0	367	366	367	367	367
35.0	345	346	346	346	346
40.0	321	321	321	322	322
45.0	295	295	295	296	296
50.0	267	267	267	268	268
55.0	237	237	238	238	238
60.0	207	206	207	207	207
65.0	175	175	175	175	175
70.0	141	142	143	143	143
75.0	110	110	111	111	111
80.0	79	78	79	79	79
85.0	50	49	50	51	50
90.0	29	29	30	31	31
95.0	19	19	19	20	20
100.0	16	16	16	16	16
105.0	14	14	14	14	14
110.0	12	12	12	12	12
115.0	10	10	10	10	11
120.0	8	9	9	9	9
125.0	7	7	7	7	7
130.0	5	5	6	6	6
135.0	4	4	4	4	4
140.0	3	3	3	3	3
145.0	2	2	2	2	2
150.0	1	1	1	1	1
155.0	0	0	0	0	0
160.0	0	0	0	0	0
165.0	0	0	0	0	0
170.0	0	0	0	0	0
175.0	0	0	0	0	0
180.0	0	0	0	0	0



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5-DEGREE  
ZONAL LUMEN SUMMARY

0- 5	10
5- 10	30
10- 15	49
15- 20	67
20- 25	82
25- 30	95
30- 35	105
35- 40	111
40- 45	114
45- 50	114
50- 55	110
55- 60	103
60- 65	93
65- 70	80
70- 75	66
75- 80	51
80- 85	35
85- 90	22
90- 95	13
95-100	9
100-105	8
105-110	7
110-115	6
115-120	5
120-125	4
125-130	3
130-135	2
135-140	1
140-145	1
145-150	0
150-155	0
155-160	0
160-165	0
165-170	0
170-175	0
175-180	0

10-DEGREE  
ZONAL LUMEN SUMMARY

0- 10	40
0- 20	157
0- 30	334
0- 40	550
0- 50	778
0- 60	991
0- 70	1164
0- 80	1281
0- 90	1337
0-100	1360
0-110	1375
0-120	1385
0-130	1391
0-140	1394
0-150	1395
0-160	1395
0-170	1395
0-180	1395



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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	118	118	118	118	118	115	115	115	115	109	109	109	103	103	103	98	98	98	96
1	107	101	96	92	103	99	94	90	93	90	87	89	86	83	84	82	80	78	78
2	96	88	80	74	93	85	79	73	81	75	70	77	72	68	73	69	66	64	64
3	88	76	68	61	85	74	67	60	71	64	59	67	62	57	64	60	55	53	53
4	80	67	58	51	77	66	57	51	63	55	50	60	54	48	57	52	47	45	45
5	73	60	51	44	71	59	50	43	56	48	43	54	47	42	51	46	41	39	39
6	68	54	45	38	65	53	44	38	51	43	37	48	42	36	46	40	36	34	34
7	63	49	40	34	61	48	39	33	46	38	33	44	37	32	42	36	32	30	30
8	58	44	36	30	56	44	35	30	42	34	29	40	34	29	39	33	28	26	26
9	54	41	32	27	53	40	32	27	39	31	26	37	31	26	36	30	25	24	24
10	51	38	30	24	49	37	29	24	36	29	24	34	28	23	33	27	23	21	21

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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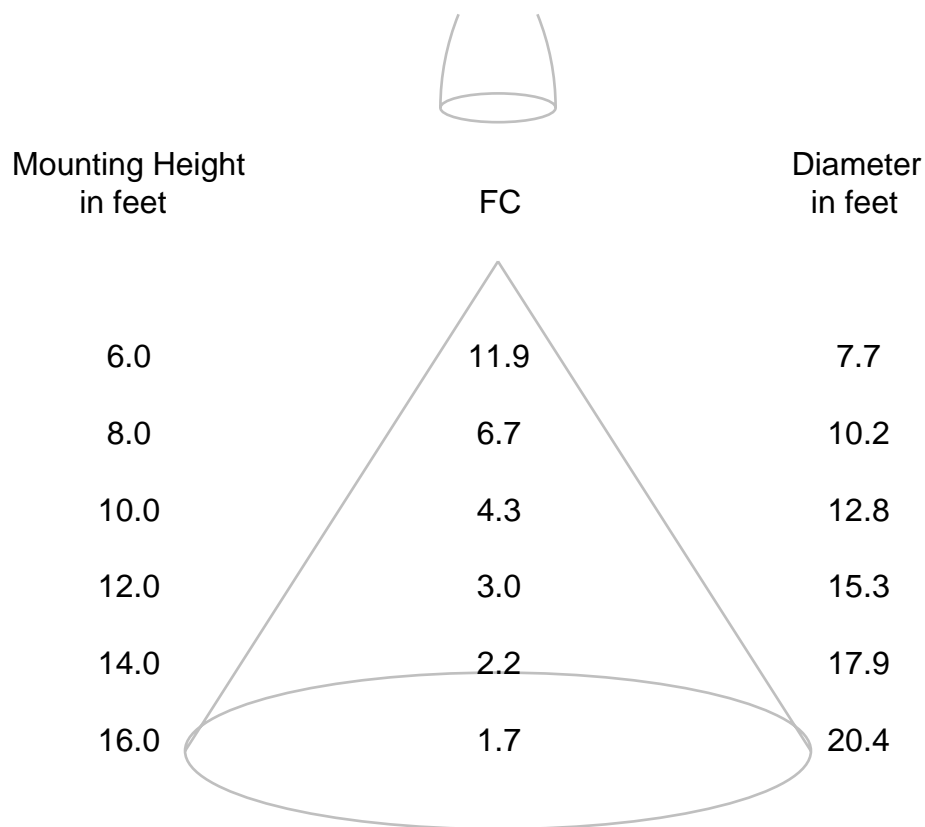
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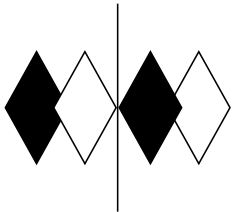
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## CONE OF LIGHT DIAGRAM

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



Note: The candela values used to generate this diagram were obtained by averaging the photometric data into a single plane.



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NVLAP LAB CODE: 200925-0

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