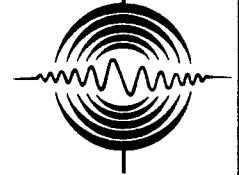


BUILDING ACOUSTICS & LIGHTING LABORATORIES, INC.

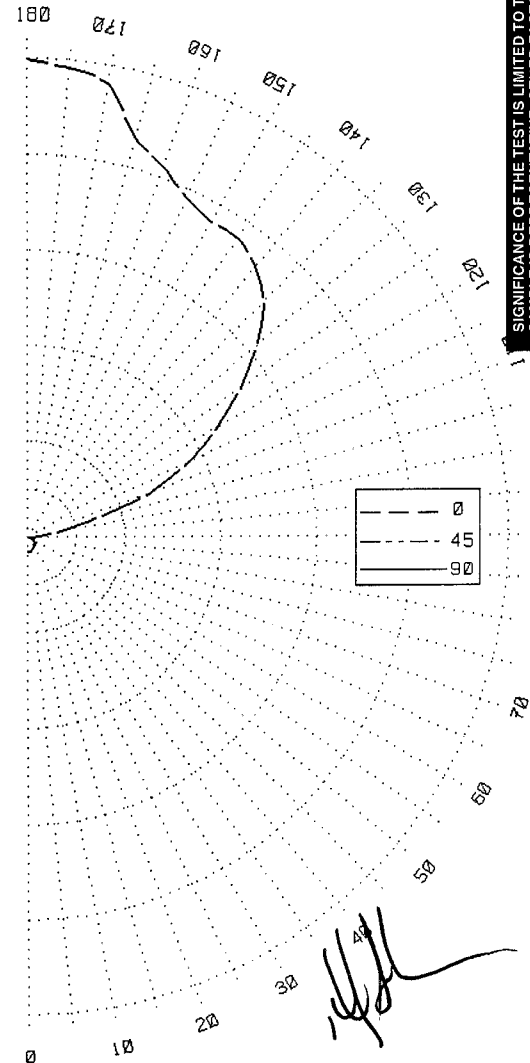
1618 HEADLAND DR.
FENTON, MO 63026
(636) 343-6006
(636) 343-6051 FAX



BALLABS CERTIFIED TEST REPORT NO.: 19469.0 DATE 08/30/16
PREPARED FOR: IMPACT ARCHITECTURAL LIGHTING - SAINT LOUIS, MO
DESCRIPTION: 16-24LED ARRAY 38"DIA MOD PEND LUMINAIRE w/WHITE REFL & 1/8
CLR ACRYLIC TOP LENS/WHITE CTR RND REFL & FROST ACRYLIC BTM
LENS w/.125"WHITE ACRYLIC BTM DOME 4ROAL STRATO #RSLD035-6A
CATALOG NBR: P1838-40HI-XX
LAMP TYPE : M700C840D24N06STC

CANDLEPOWER DISTRIBUTION

VERT ANG	AVERAGE CANDELA	ZONAL LUMENS
0	114.	
5	114.	10.9
10	113.	31.3
15	110.	46.7
20	106.	56.1
25	101.	58.8
30	95.	55.0
35	89.	44.3
40	83.	31.6
45	76.	20.0
50	68.	87.2
55	61.	494.4
60	53.	1370.7
65	45.	1806.5
70	36.	2002.9
75	30.	1779.1
80	24.	1345.8
85	18.	909.9
90	17.	349.3
95	80.	
100	206.	
105	467.	
110	971.	
115	1381.	
120	1700.	
125	2014.	
130	2319.	
135	2586.	
140	2733.	
145	2832.	
150	2833.	
155	2908.	
160	3061.	
165	3210.	
170	3581.	
175	3659.	
180	3718.	



NVLAP[®]
TESTING

NVLAP LAB CODE 200921-0

LUMEN SUMMARY

ZONE	LUMENS	%LAMP	%FIXT	ZONE	LUMENS	%LAMP	%FIXT
0- 30	89.	NA.	.8	90-120	1952.	NA.	18.6
0- 40	145.	NA.	1.4	90-130	3759.	NA.	35.8
0- 60	259.	NA.	2.5	90-150	7541.	NA.	71.8
0- 90	355.	NA.	3.4	90-180	10146.	NA.	96.6
TOTAL LUMINAIRE =				0-180	10501.	NA.	100.0

IES SPACING CRITERIA: ADJACENT= 1.2 DIAGONAL= .9

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LUMINANCES-CD/SQ-M
 HORIZONTAL ANGLE

VERT	0
ANGLE	
45	121.
55	111.
65	97.
75	84.
85	77.

MAXIMUM BRIGHTNESSES NOT MEASURED

ZONAL CAVITY COEFFICIENTS OF UTILIZATION

EFFECTIVE FLOOR CAVITY REFLECTANCE=.20

CEILING	.80				.70				.50				.30				.10				.00
WALL	.70	.50	.30	.10	.70	.50	.30	.10	.50	.30	.10	.50	.30	.10	.50	.30	.10	.50	.30	.10	.00
RCR																					
0	.96	.96	.96	.96	.83	.83	.83	.83	.57	.57	.57	.34	.34	.34	.13	.13	.13	.13	.13	.13	.03
1	.87	.83	.79	.76	.75	.72	.69	.66	.50	.48	.46	.30	.29	.28	.12	.11	.11	.11	.11	.11	.03
2	.79	.72	.67	.62	.68	.62	.58	.54	.44	.41	.38	.26	.25	.23	.10	.10	.10	.09	.09	.09	.02
3	.72	.63	.57	.51	.62	.55	.49	.45	.38	.35	.32	.23	.21	.20	.09	.08	.08	.08	.08	.08	.02
4	.66	.56	.49	.43	.56	.48	.42	.38	.34	.30	.27	.20	.18	.17	.08	.07	.07	.07	.07	.07	.02
5	.60	.50	.42	.37	.52	.43	.37	.32	.30	.26	.23	.18	.16	.14	.07	.06	.06	.06	.06	.06	.01
6	.55	.44	.37	.32	.47	.38	.32	.28	.27	.23	.20	.16	.14	.12	.06	.06	.06	.05	.05	.05	.01
7	.51	.40	.33	.28	.44	.35	.29	.24	.24	.20	.18	.15	.13	.11	.06	.05	.04	.04	.04	.04	.01
8	.47	.36	.29	.24	.41	.31	.25	.21	.22	.18	.15	.13	.11	.10	.05	.04	.04	.04	.04	.04	.01
9	.44	.33	.26	.22	.38	.29	.23	.19	.20	.16	.14	.12	.10	.09	.05	.04	.03	.03	.03	.03	.01
10	.41	.30	.24	.19	.35	.26	.21	.17	.19	.15	.12	.11	.09	.08	.04	.04	.03	.03	.03	.03	.01

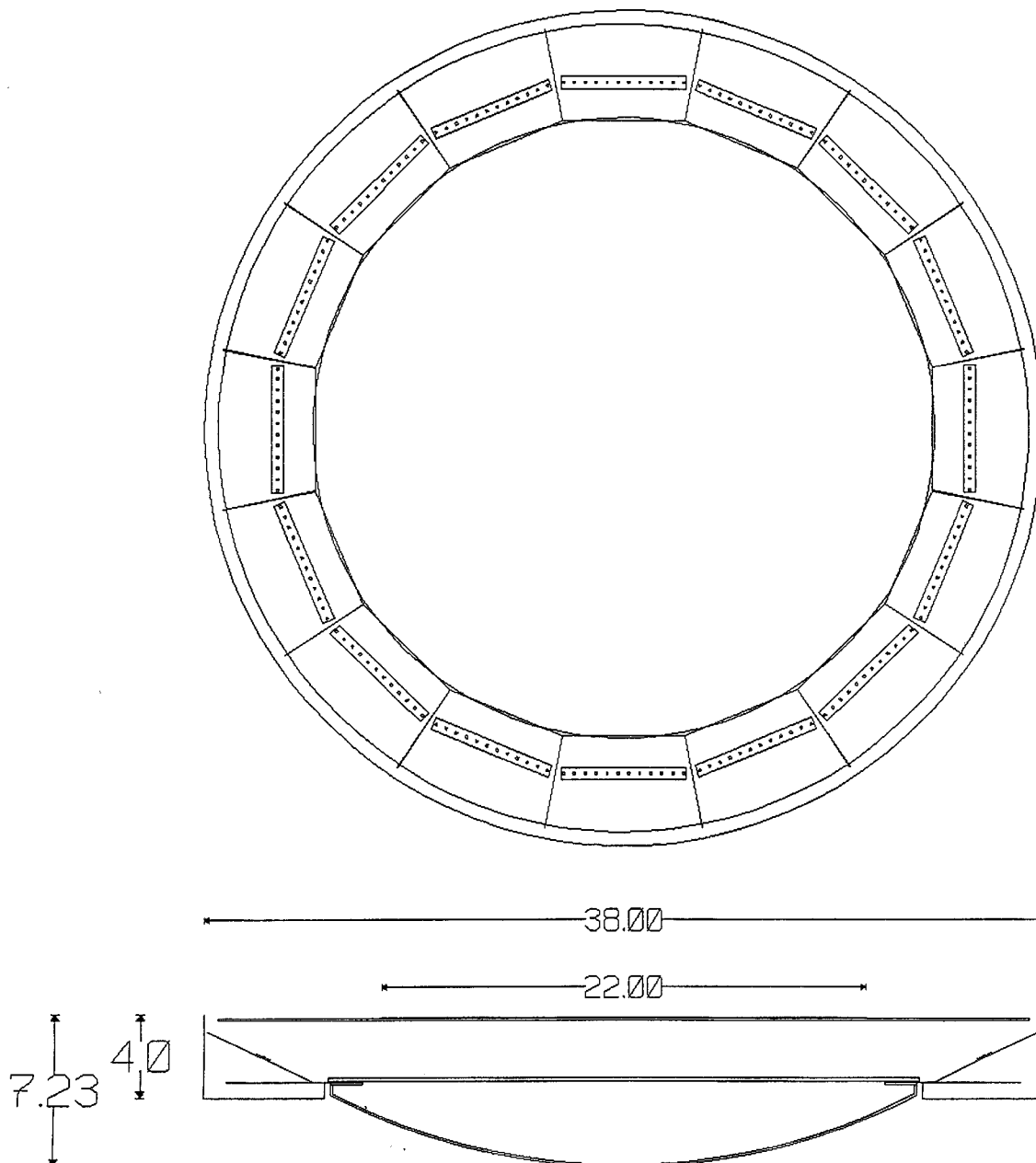
TESTED IN ACCORDANCE WITH CURRENT IES PROCEDURES

BALLABS CERTIFIED TEST REPORT NO.: 19469.0 DATE 08/30/16
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CATALOG NBR: P1838-40HI-XX
LAMP TYPE : M700C840D24N06STC

ELECTRICAL CHARACTERISTICS 120.0V .8557A 99.050W

LUMINOUS EFFICACY (LUMENS / WATTS) = 106.0

TESTED IN ACCORDANCE WITH CURRENT IES STANDARDS
UTILIZING ABSOLUTE PHOTOMETRY PER LM-79-08

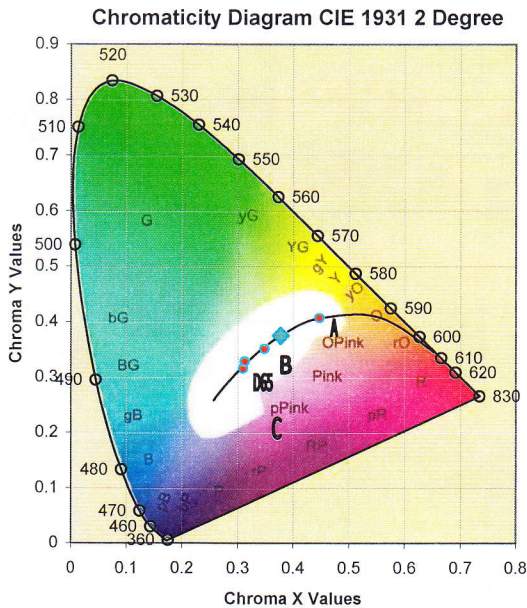




BALLABS CERTIFIED TEST REPORT NO.: 19469.0 A DATE 08/30/16
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CATALOG NBR: P1838-40HI-XX
LAMP TYPE : M700C840D24N06STC

INPUT VOLTAGE (V)	120.0
INPUT CURRENT (A)	0.8557
INPUT WATTS (W)	99.050
POWER FACTOR	0.9644
THDv (%)	0.165
THDi (%)	18.879
LUMINOUS EFFICACY-LPW	106.0
LUMINOUS FLUX- LUMENS	10501
CHROMA x	0.3776
CHROMA y	0.3755
CHROMA u	0.2238
CHROMA v	0.3337
DELTA uv (Duv)	0.0002
CORR COLOR TEMP (K)	4069
COLOR REND INDEX (RA)	86.32
COLOR REND INDEX (R9)	28.9

Wavelength (nm)	Spectral Flux mW/nm	Wavelength (nm)	Spectral Flux mW/nm
350	0.9394	610	168.8101
360	1.0622	620	158.7468
370	1.1029	630	144.1891
380	1.0668	640	126.0474
390	0.9952	650	107.2950
400	1.2545	660	88.2828
410	2.2571	670	70.8934
420	6.4724	680	55.7578
430	21.1275	690	43.0466
440	62.4495	700	32.9024
450	162.6630	710	24.7681
460	166.6092	720	18.7273
470	105.5204	730	13.8253
480	76.8872	740	10.2287
490	81.6184	750	7.5866
500	94.4291	760	5.6429
510	106.1308	770	4.2068
520	115.5614	780	3.0814
530	124.8945	790	2.3394
540	136.4062	800	1.7618
550	147.3901	810	1.3568
560	157.7995	820	1.0064
570	165.6800	830	0.7885
580	171.1527	840	0.6341
590	174.5249	850	0.4655
600	174.2692		

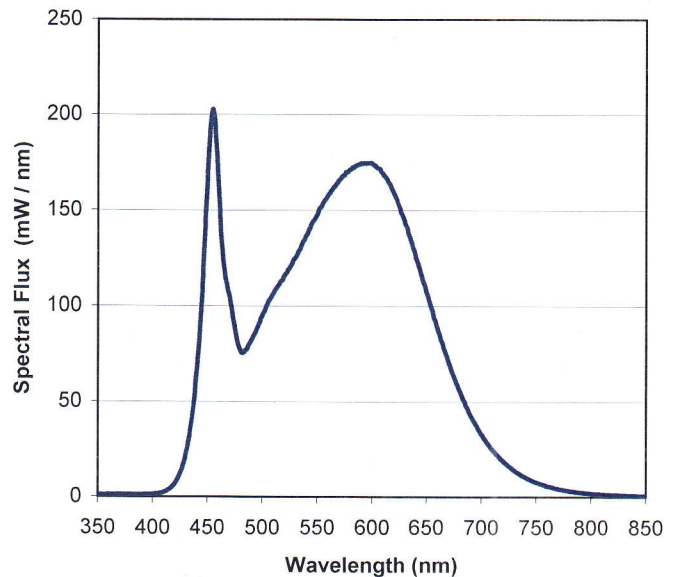


Data collected utilizing a Labsphere integrating sphere and 2100 spectroradiometer. Calibration of the spectroradiometer-sphere is traceable to the National Institute of Standards and Technology.



NVLAP LAB CODE 200921-0

[Signature]
Kelly C. Lerbs
Vice President



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