

Photometric Test Report

Relevant Standards

- ☒ ANSI/IES LM-79-2019
- ☒ ANSI C82.77-2017

Prepared For

RAB Lighting Inc.

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Issue Date: 2025-08-21

Revised Date: N/A

1.0 Test Summary

Wall mount Luminaire					
Requirement Category		Test Method	Requirements		Test Value
Luminaire Output (lm) (Goniophotometer – Section 4.2)		ANSI/IES LM-79:2019	N/A		1725
Minimum Luminaire Efficacy (lm/W) (Goniophotometer – Section 4.2)		ANSI/IES LM-79:2019	Standard	Premium	115.8
			N/A	N/A	
Power (Input Wattage) (W) (Goniophotometer – Section 4.2)		ANSI/IES LM-79:2019	Worst Case		14.9
Total Harmonic Distortion (A%) (THD & PF – Section 4.3)		ANSI C82.77:2002 ANSI C82-77-10:2020	N/A	120V	4.80
				277V	21.11
Power Factor (THD & PF – Section 4.3)		ANSI C82.77:2002 ANSI C82-77-10:2020	N/A	120V	0.994
				277V	0.917
Allowable CCTs* (K) (Integrating Sphere – Section 4.1)		ANSI/IES LM-79:2019	7 steps	3465±245	3480
			4 steps	3465±124	
Minimum CRI (Integrating Sphere – Section 4.1)		ANSI/IES LM-79:2019 CIE13.3-1995	≥80		92.3
Minimum R9 (Integrating Sphere – Section 4.1)		ANSI/IES LM-79-2019 CIE13.3-1995	≥0		78
Minimum Rf (Integrating Sphere – Section 4.1)		ANSI/IES TM-30-18	≥70		89
Minimum Rg (Integrating Sphere – Section 4.1)		ANSI/IES TM-30-18	≥89		96
IES Rcs,h1 (Integrating Sphere – Section 4.1)		ANSI/IES TM-30-18	-12%≤IES Rcs,h1≤+23%		-3%
Zonal Lumen Requirement (0°-60°) (Goniophotometer – Section 4.2)		ANSI/IES LM-79:2019	N/A		26.7%
Backlight, Uplight and Glare (BUG) Ratings (Goniophotometer – Section 4.2)		ANSI/IES LM-79:2019 IES TM-15-11	N/A		B0-U4-G2
Input Voltage (V)					
(Goniophotometer – Section 4.2)		ANSI/IES LM-79:2019	Worst Cast		277.0
(Goniophotometer – Section 4.2)			Non-Worst Case		120.0
Input Current (A)					
(Goniophotometer – Section 4.2)		ANSI/IES LM-79:2019	Worst Case		0.059
(Goniophotometer – Section 4.2)			Non-Worst Case		0.121
Power (Input Wattage – W)					
(Goniophotometer – Section 4.2)		ANSI/IES LM-79:2019	Worst Case		14.9
(Goniophotometer – Section 4.2)			Non-Worst Case		14.4

2.0 Test List

Test Item	Test	Test Date	Model Number	Build Level	Sample No.
1	Integrating Sphere Test	2025-08-07	V1-24 @15W3500K	-	250728007-S1
2	Goniophotometer Test	2025-08-07	V1-24 @15W3500K	-	250728007-S1
3	THD and PF Test	2025-08-07	V1-24 @15W3500K	-	250728007-S1

Remark (If any):

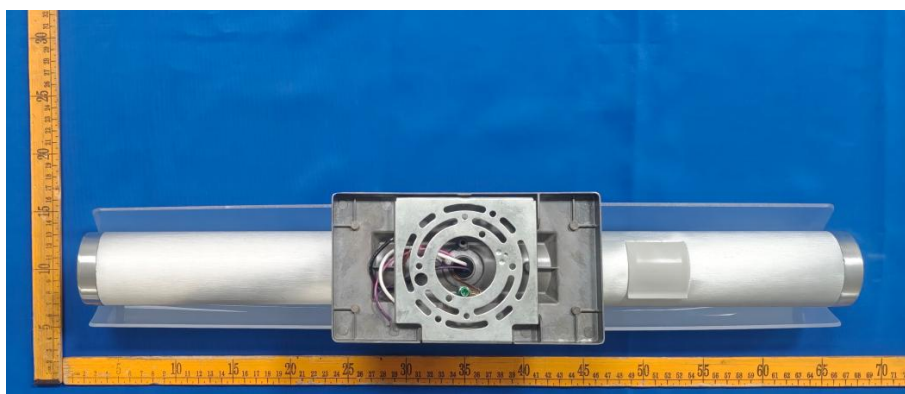
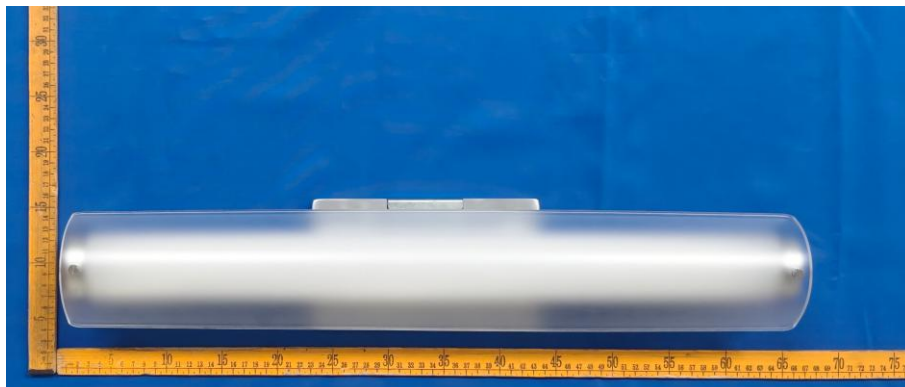
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3. This report must not be used by the client to claim product certification, approval, or endorsement by NVLAP, NIST or any agency of the U.S. Government.

3.0 Product Description

Luminaire Description: Model No. V1-24 @15W3500K, color tunable from 2700K, 3000K, 3500K, 4000K and 5000K.

Electrical Specification: 120-277Vac, 50/60Hz

Photos of Luminaire Characteristics



4.0 LM-79 Measurement and Test Results

4.1 Integrating Sphere Test

Model No.	V1-24 @15W3500K	Sample ID	250728007-S1
Operate time (Min.)	10	Stabilization time (Min.)	60
Temperature (°C)	25.4	Humidity (%RH)	41.0

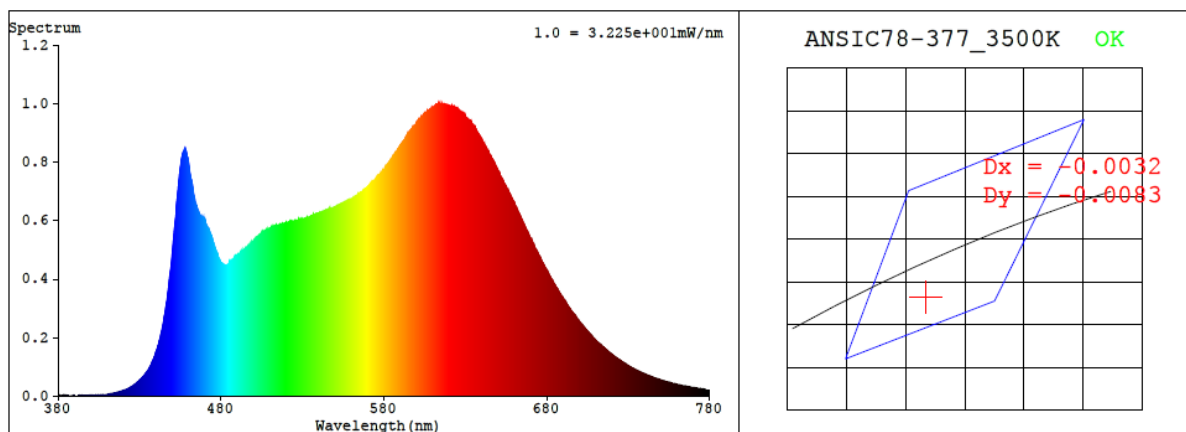
Test Method
<p>The Samples were tested according to the ANSI/IES LM-79:2019.</p> <p>Photometric parameters were measured using an integrating sphere, a spectroradiometer and software. The ambient temperature condition inside the sphere was maintained at $25\pm 1^{\circ}\text{C}$.</p> <p>The sample measurements were made using a spectroradiometer connected by a fiber optic cable and detector through the detector port of the integrating sphere.</p> <p>The voltage of an AC power supply (RMS voltage) or DC power supply (instantaneous voltage) applied to the device under test shall be regulated to within ± 0.2 percent under load.</p> <p>The sample was measured using 4π geometry and operated at rated voltage and was stabilized before measurement. Chromaticity coordinates, correlated color temperature and color rendering index were calculated from the spectral radiant flux measurements taken at 1 nm intervals over the range of 380 to 780nm.</p>

Test Result

Voltage (Vac)	Frequency (Hz)	Current (A)	Power (W)	Power Factor
120.0	60	0.121	14.4	0.994
277.0	60	0.059	14.9	0.917

CCT (K)	CRI	R9	Duv	SDCM	Rf	Rg	IES Rcs,h1
3480	92.3	78	-0.0030	3.8	89	96	-3%

4.1 Integrating Sphere Test



Colorimetric Parameters

Chromaticity Coordinate: $x = 0.4032$ $y = 0.3830$ / $u' = 0.2376$ $v' = 0.5077$ ($duv = -2.98e-03$)

CCT= 3480K Prp WL: Ld=582.3nm Purity=36.0%

Peak WL: Lp=614nm FWHM: =179.4nm Ratio:R=23.0% G=72.3% B=4.7%

Render Index: Ra = 92.3 AvgR = 91.3 TM30:Rf=90 Rg=98

EEL: 0.12262 A+

R1 =97 R2 =94 R3 =92 R4 =94 R5 =95 R6 =90 R7 =89

R8 =87 R9 =78 R10=89 R11=97 R12=78 R13=96 R14=96 R15=96

4.1 Integrating Sphere Test

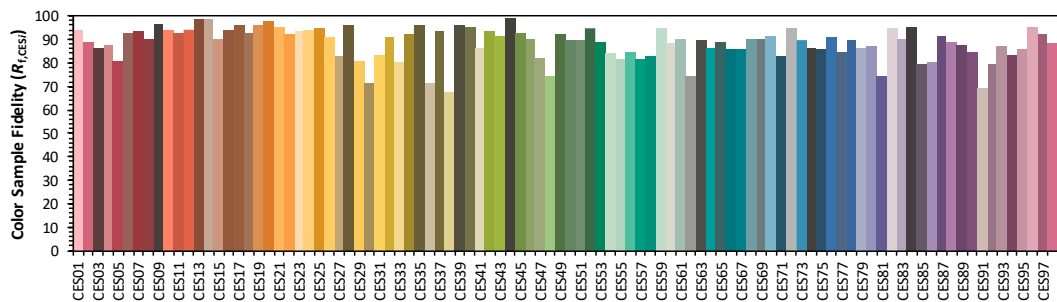
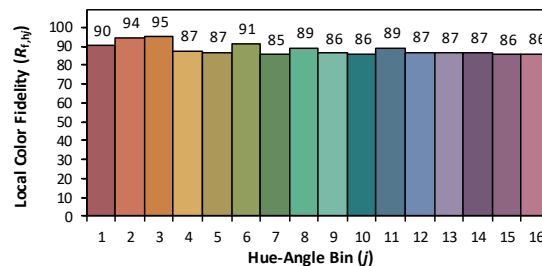
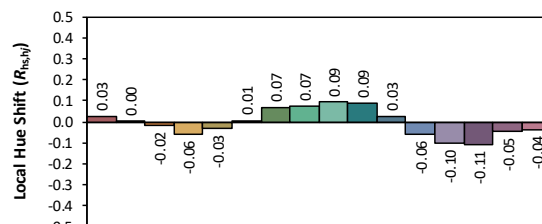
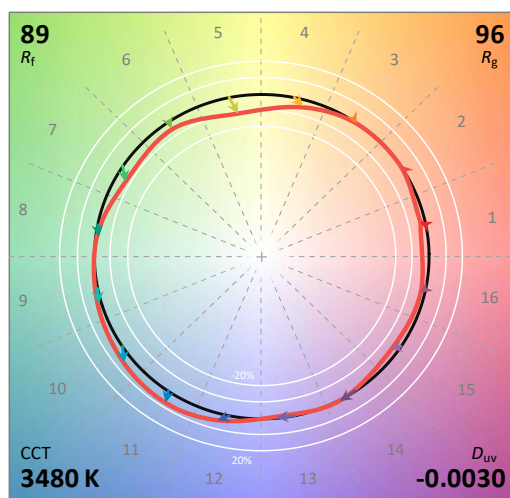
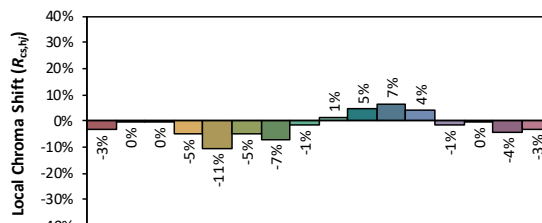
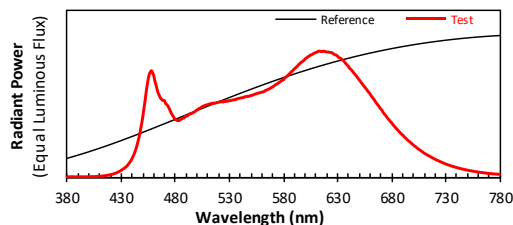
ANSI/IES TM-30-18 Color Rendition Report

Source: 1 CIE F1

Manufacturer: RAB Lighting Inc

Date: 2025/8/21

Model: V1-24 @15W3500K



Notes: This is a recommended method for displaying ANSI/IES TM-30-18 information.

x 0.4032
 y 0.3829
 u' 0.2376
 v' 0.5076

CIE 13.3-1995
(CRI)
 R_a 92
 R_g 79

4.1 Integrating Sphere Test

Spectral Distribution over Visible Wavelength											
WL (nm)	Radiant (W/nm)	WL (nm)	Radiant (W/nm)	WL (nm)	Radiant (W/nm)	WL (nm)	Radiant (W/nm)	WL (nm)	Radiant (W/nm)	WL (nm)	Radiant (W/nm)
380	3.20E-06	447	3.40E-04	514	5.86E-04	581	7.84E-04	648	7.96E-04	715	1.67E-04
381	3.20E-06	448	3.88E-04	515	5.84E-04	582	7.91E-04	649	7.82E-04	716	1.62E-04
382	1.20E-06	449	4.33E-04	516	5.87E-04	583	7.97E-04	650	7.71E-04	717	1.57E-04
383	3.10E-06	450	4.88E-04	517	5.86E-04	584	8.06E-04	651	7.62E-04	718	1.51E-04
384	2.70E-06	451	5.51E-04	518	5.90E-04	585	8.13E-04	652	7.47E-04	719	1.47E-04
385	3.20E-06	452	6.08E-04	519	5.91E-04	586	8.23E-04	653	7.39E-04	720	1.43E-04
386	2.40E-06	453	6.77E-04	520	5.95E-04	587	8.33E-04	654	7.26E-04	721	1.38E-04
387	2.00E-06	454	7.34E-04	521	5.94E-04	588	8.39E-04	655	7.16E-04	722	1.34E-04
388	2.00E-06	455	7.84E-04	522	5.97E-04	589	8.48E-04	656	7.04E-04	723	1.31E-04
389	2.30E-06	456	8.18E-04	523	5.99E-04	590	8.57E-04	657	6.94E-04	724	1.26E-04
390	2.70E-06	457	8.35E-04	524	5.96E-04	591	8.65E-04	658	6.81E-04	725	1.23E-04
391	1.80E-06	458	8.43E-04	525	5.98E-04	592	8.73E-04	659	6.72E-04	726	1.19E-04
392	1.90E-06	459	8.25E-04	526	6.00E-04	593	8.81E-04	660	6.61E-04	727	1.15E-04
393	2.90E-06	460	8.03E-04	527	6.00E-04	594	8.91E-04	661	6.46E-04	728	1.12E-04
394	2.20E-06	461	7.61E-04	528	6.04E-04	595	8.98E-04	662	6.35E-04	729	1.07E-04
395	2.00E-06	462	7.33E-04	529	6.02E-04	596	9.07E-04	663	6.24E-04	730	1.04E-04
396	1.90E-06	463	6.98E-04	530	6.07E-04	597	9.13E-04	664	6.12E-04	731	1.01E-04
397	2.40E-06	464	6.67E-04	531	6.07E-04	598	9.19E-04	665	5.99E-04	732	9.80E-05
398	2.30E-06	465	6.50E-04	532	6.09E-04	599	9.27E-04	666	5.86E-04	733	9.51E-05
399	2.90E-06	466	6.30E-04	533	6.12E-04	600	9.36E-04	667	5.75E-04	734	9.21E-05
400	3.10E-06	467	6.19E-04	534	6.12E-04	601	9.43E-04	668	5.65E-04	735	8.89E-05
401	3.50E-06	468	6.10E-04	535	6.14E-04	602	9.48E-04	669	5.52E-04	736	8.62E-05
402	3.50E-06	469	6.08E-04	536	6.14E-04	603	9.56E-04	670	5.40E-04	737	8.36E-05
403	3.70E-06	470	6.05E-04	537	6.21E-04	604	9.60E-04	671	5.31E-04	738	8.15E-05
404	3.70E-06	471	5.82E-04	538	6.22E-04	605	9.68E-04	672	5.16E-04	739	7.86E-05
405	4.20E-06	472	5.75E-04	539	6.24E-04	606	9.69E-04	673	5.03E-04	740	7.63E-05
406	4.40E-06	473	5.64E-04	540	6.26E-04	607	9.75E-04	674	4.94E-04	741	7.42E-05
407	4.90E-06	474	5.48E-04	541	6.28E-04	608	9.81E-04	675	4.83E-04	742	7.09E-05
408	5.80E-06	475	5.31E-04	542	6.29E-04	609	9.83E-04	676	4.71E-04	743	6.95E-05
409	6.00E-06	476	5.10E-04	543	6.31E-04	610	9.89E-04	677	4.60E-04	744	6.71E-05
410	6.40E-06	477	4.94E-04	544	6.36E-04	611	9.90E-04	678	4.51E-04	745	6.49E-05
411	7.30E-06	478	4.82E-04	545	6.37E-04	612	9.97E-04	679	4.39E-04	746	6.26E-05
412	8.30E-06	479	4.67E-04	546	6.39E-04	613	9.99E-04	680	4.31E-04	747	6.10E-05
413	9.20E-06	480	4.56E-04	547	6.40E-04	614	9.95E-04	681	4.18E-04	748	5.91E-05
414	1.05E-05	481	4.53E-04	548	6.40E-04	615	9.97E-04	682	4.09E-04	749	5.73E-05
415	1.13E-05	482	4.47E-04	549	6.45E-04	616	9.94E-04	683	3.99E-04	750	5.54E-05
416	1.25E-05	483	4.48E-04	550	6.47E-04	617	9.99E-04	684	3.89E-04	751	5.34E-05
417	1.43E-05	484	4.51E-04	551	6.48E-04	618	9.96E-04	685	3.80E-04	752	5.22E-05
418	1.55E-05	485	4.58E-04	552	6.53E-04	619	9.93E-04	686	3.70E-04	753	5.02E-05
419	1.72E-05	486	4.63E-04	553	6.55E-04	620	9.93E-04	687	3.60E-04	754	4.86E-05
420	1.92E-05	487	4.67E-04	554	6.59E-04	621	9.91E-04	688	3.52E-04	755	4.74E-05
421	2.11E-05	488	4.69E-04	555	6.60E-04	622	9.90E-04	689	3.42E-04	756	4.61E-05
422	2.36E-05	489	4.81E-04	556	6.64E-04	623	9.89E-04	690	3.35E-04	757	4.41E-05
423	2.60E-05	490	4.83E-04	557	6.66E-04	624	9.87E-04	691	3.26E-04	758	4.31E-05
424	2.89E-05	491	4.85E-04	558	6.69E-04	625	9.85E-04	692	3.18E-04	759	4.18E-05
425	3.20E-05	492	4.93E-04	559	6.70E-04	626	9.78E-04	693	3.09E-04	760	4.05E-05
426	3.57E-05	493	4.99E-04	560	6.74E-04	627	9.72E-04	694	3.01E-04	761	3.88E-05
427	3.99E-05	494	5.01E-04	561	6.75E-04	628	9.69E-04	695	2.92E-04	762	3.77E-05
428	4.46E-05	495	5.06E-04	562	6.78E-04	629	9.66E-04	696	2.85E-04	763	3.64E-05
429	4.92E-05	496	5.09E-04	563	6.85E-04	630	9.58E-04	697	2.79E-04	764	3.54E-05
430	5.49E-05	497	5.14E-04	564	6.89E-04	631	9.49E-04	698	2.71E-04	765	3.43E-05
431	6.00E-05	498	5.18E-04	565	6.92E-04	632	9.45E-04	699	2.62E-04	766	3.33E-05
432	6.61E-05	499	5.27E-04	566	6.97E-04	633	9.41E-04	700	2.56E-04	767	3.21E-05
433	7.21E-05	500	5.32E-04	567	6.99E-04	634	9.33E-04	701	2.48E-04	768	3.13E-05
434	7.95E-05	501	5.38E-04	568	7.06E-04	635	9.25E-04	702	2.42E-04	769	2.96E-05
435	8.60E-05	502	5.44E-04	569	7.10E-04	636	9.19E-04	703	2.36E-04	770	2.93E-05
436	9.67E-05	503	5.47E-04	570	7.16E-04	637	9.06E-04	704	2.28E-04	771	2.82E-05
437	1.08E-04	504	5.54E-04	571	7.21E-04	638	8.96E-04	705	2.22E-04	772	2.76E-05
438	1.19E-04	505	5.59E-04	572	7.27E-04	639	8.88E-04	706	2.16E-04	773	2.63E-05
439	1.33E-04	506	5.63E-04	573	7.34E-04	640	8.78E-04	707	2.10E-04	774	2.55E-05
440	1.49E-04	507	5.65E-04	574	7.37E-04	641	8.65E-04	708	2.03E-04	775	2.48E-05
441	1.67E-04	508	5.71E-04	575	7.44E-04	642	8.56E-04	709	1.97E-04	776	2.44E-05
442	1.86E-04	509	5.72E-04	576	7.50E-04	643	8.47E-04	710	1.91E-04	777	2.31E-05
443	2.11E-04	510	5.75E-04	577	7.56E-04	644	8.38E-04	711	1.85E-04	778	2.28E-05
444	2.37E-04	511	5.78E-04	578	7.63E-04	645	8.25E-04	712	1.81E-04	779	2.28E-05
445	2.69E-04	512	5.81E-04	579	7.68E-04	646	8.16E-04	713	1.76E-04	780	2.29E-05
446	3.03E-04	513	5.81E-04	580	7.71E-04	647	8.06E-04	714	1.71E-04	N/A	N/A

4.0 LM-79 Measurement and Test Results

4.2 Goniophotometer Test

Model No.	V1-24 @15W3500K	Sample ID	250728007-S1
Operate time (Min.)	30	Stabilization time (Min.)	60
Temperature (°C)	24.9	Humidity (%RH)	42.1

Test Method
<p>The Samples were tested according to the ANSI/IES LM-79:2019.</p> <p>Photometric parameters were measured using a type C goniophotometer and software.</p> <p>The ambient temperature shall be maintained at $25 \pm 1^\circ\text{C}$, measured at a point not more than 1 m from the sample and at the same height as the sample.</p> <p>The voltage of an AC power supply (RMS voltage) or DC power supply (instantaneous voltage) applied to the device under test shall be regulated to within ± 0.2 percent under load.</p> <p>The samples were operated at rated voltage and was stabilized before measurement. Luminous flux, luminaire efficacy, zonal lumen were calculated from the software taken at 1.0° vertical intervals and 15° horizontal intervals.</p>

Test Conditions

Condition	Voltage (Vac)	Frequency (Hz)	Current (A)	Power (W)	Power Factor
WORST CASE	277.0	60	0.059	14.9	0.917
NON-WORST CASE	120.0	60	0.121	14.4	0.994

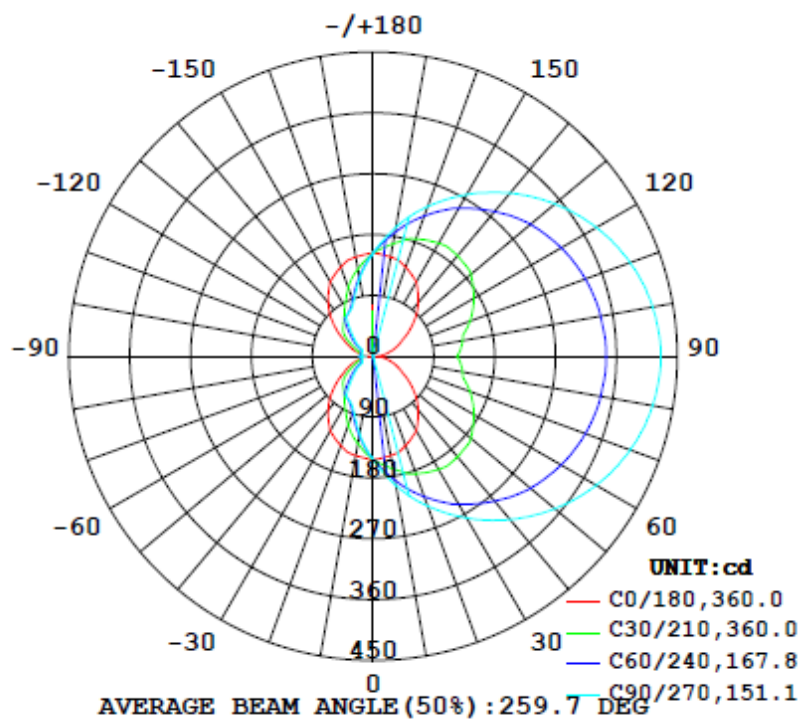
Test Result

Flux (lm)	Field Angle (10%)		Beam Angle (50%)		Luminous Efficacy (lm/W)	Zonal Lumen Requirement	BUG
	C0-180	C90-270	C0-180	C90-270		(0°-60°)	
1725	90.8	155.3	180.0	98.1	115.8	26.7%	B0-U4-G2

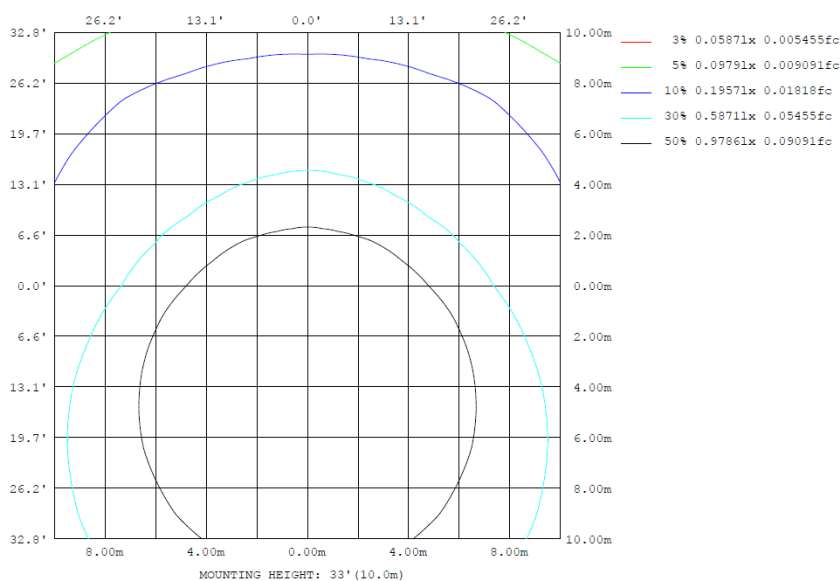
4.2 Goniophotometer Test

Lighting Distribution Curve

LUMINOUS INTENSITY DISTRIBUTION DIAGRAM



Isolux Plot



4.2 Goniophotometer Test

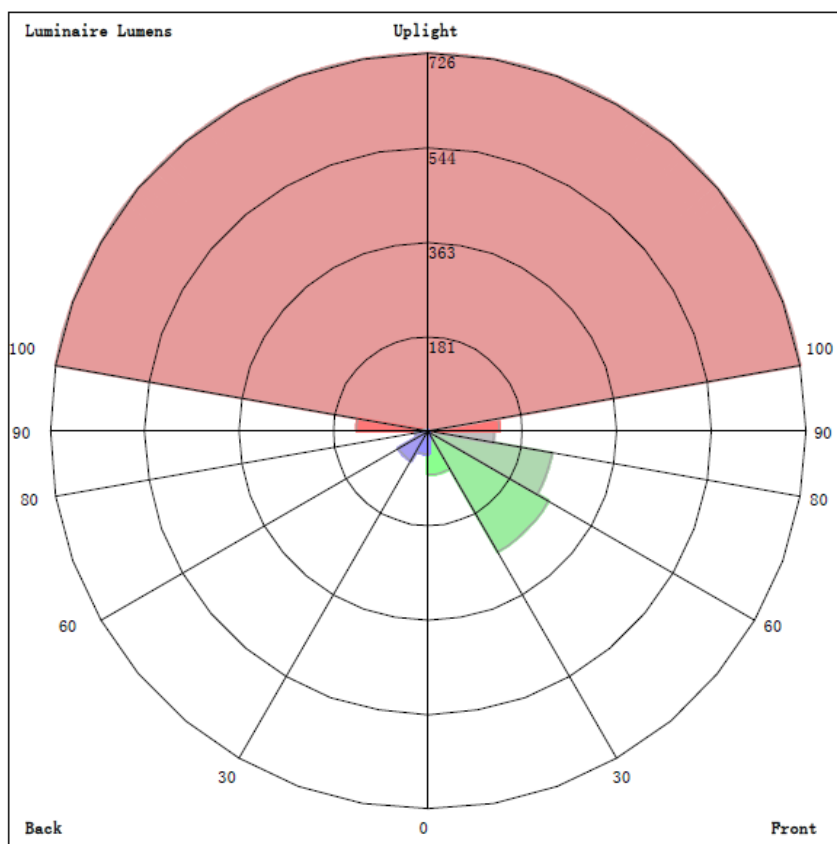
Zonal Lumen Summary

γ	C0	C45	C90	C135	C180	C225	C270	C315	γ	zone	total	lum, lamp
10	149.1	178.4	193.9	178.4	149.1	124.4	116.5	124.4	0- 10	14.50	14.50	0.84, 0.84
20	140.6	206.2	235.8	206.2	140.6	97.47	85.66	97.47	10- 20	42.91	57.41	3.33, 3.33
30	127.4	225.0	276.3	225.0	127.4	75.95	73.89	75.95	20- 30	69.65	127.1	7.37, 7.37
40	103.6	241.4	315.4	241.4	103.6	67.61	54.42	67.61	30- 40	94.56	221.6	12.8, 12.8
50	78.14	250.2	351.0	250.2	78.14	49.00	33.64	49.00	40- 50	113.4	335.0	19.4, 19.4
60	51.20	254.0	381.1	254.0	51.20	30.35	18.73	30.35	50- 60	124.9	459.9	26.7, 26.7
70	33.69	253.5	404.4	253.5	33.69	19.60	17.67	19.60	60- 70	131.3	591.2	34.3, 34.3
80	17.82	248.5	419.7	248.5	17.82	19.20	17.15	19.20	70- 80	134.7	725.9	42.1, 42.1
90	3.608	245.3	425.1	245.3	3.608	20.92	19.80	20.92	80- 90	136.7	862.6	50.50
100	17.82	248.5	419.7	248.5	17.82	19.20	17.15	19.20	90-100	136.7	999.3	57.9, 57.9
110	33.69	253.5	404.4	253.5	33.69	19.60	17.67	19.60	100-110	134.7	1134	65.7, 65.7
120	51.20	254.0	381.1	254.0	51.20	30.35	18.73	30.35	110-120	131.3	1265	73.3, 73.3
130	78.14	250.2	351.0	250.2	78.14	49.00	33.64	49.00	120-130	124.9	1390	80.6, 80.6
140	103.6	241.4	315.4	241.4	103.6	67.61	54.42	67.61	130-140	113.4	1504	87.2, 87.2
150	127.4	225.0	276.3	225.0	127.4	75.95	73.89	75.95	140-150	94.56	1598	92.6, 92.6
160	140.6	206.2	235.8	206.2	140.6	97.47	85.66	97.47	150-160	69.65	1668	96.7, 96.7
170	149.1	178.4	193.9	178.4	149.1	124.4	116.5	124.4	160-170	42.91	1711	99.2, 99.2
180	153.2	153.2	153.2	153.2	153.2	153.2	153.2	153.2	170-180	14.50	1725	100, 100
DEG	LUMINOUS INTENSITY:cd									UNIT:lm		

Zonal (lm)		Total (lm)		Percent
0-10	14.50	0-10	14.50	0.85%
10-20	42.91	0-20	57.41	3.36%
20-30	69.65	0-30	127.06	7.43%
30-40	94.56	0-40	221.62	12.95%
40-50	113.37	0-50	334.99	19.58%
50-60	124.93	0-60	459.92	26.88%
60-70	131.26	0-70	591.18	34.56%
70-80	134.72	0-80	725.90	42.43%
80-90	136.71	0-90	862.61	50.42%
90-100	136.71	0-100	999.32	58.42%
100-110	134.72	0-110	1134.04	66.29%
110-120	131.26	0-120	1265.30	73.96%
120-130	124.93	0-130	1390.23	81.27%
130-140	113.37	0-140	1503.60	87.89%
140-150	94.56	0-150	1598.16	93.42%
150-160	69.65	0-160	1667.81	97.49%
160-170	42.91	0-170	1710.72	100.00%
170-180	14.50	0-180	1725.22	100.85%

4.2 Goniophotometer Test

LCS/BUG

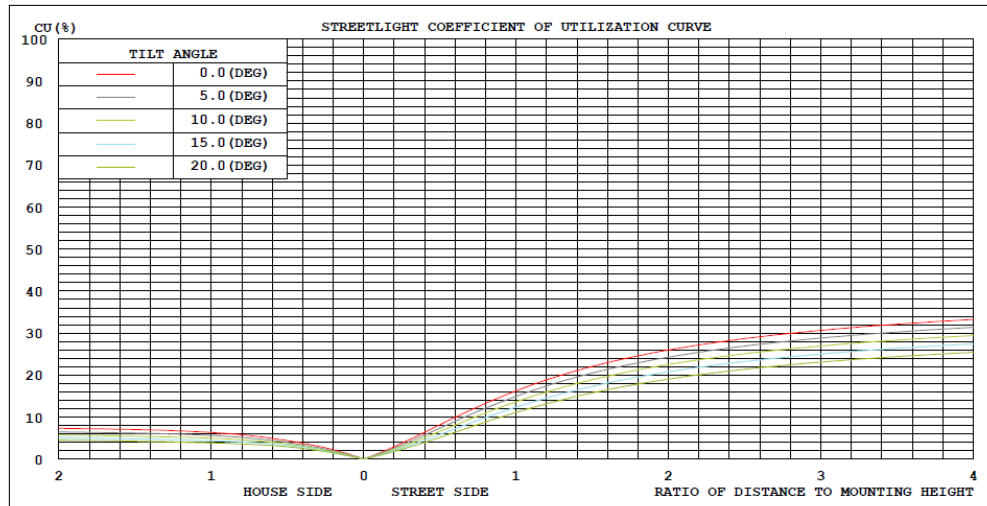


LUMINAIRE CLASSIFICATION SYSTEM (LCS)

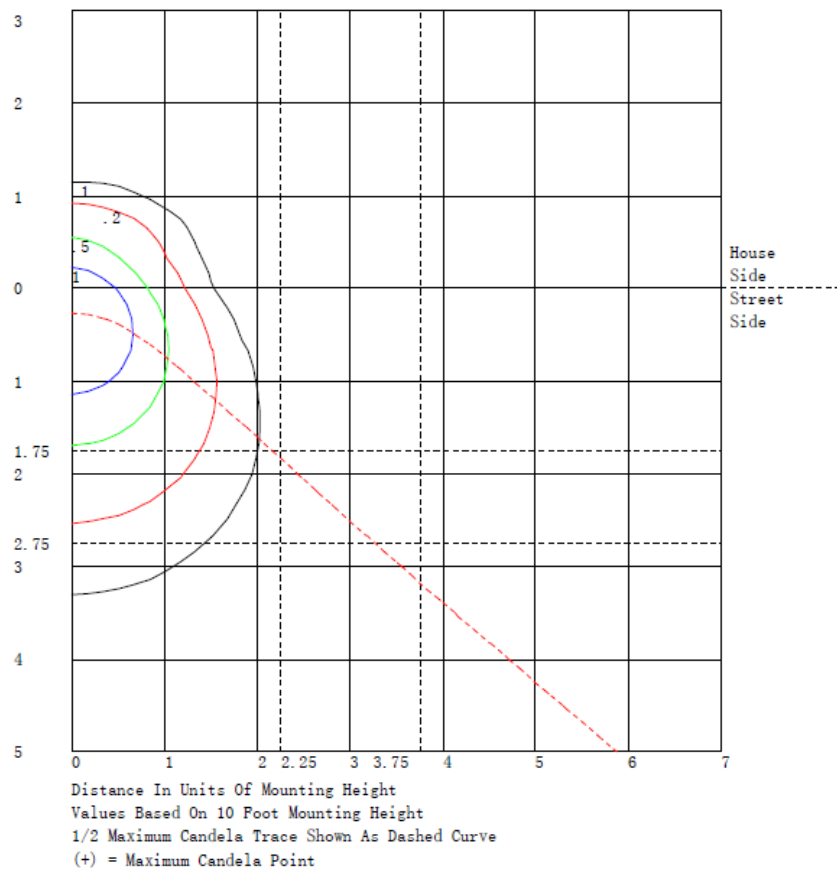
	Lumens	% Lamp	% Luminaire
FL - Front-Low (0-30)	83.1	N.A.	4.8
FM - Front-Medium (30-60)	267.6	N.A.	15.5
FH - Front-High (60-80)	241.8	N.A.	14.0
FVH - Front-Very High (80-90)	126.9	N.A.	7.4
BL - Back-Low (0-30)	44.0	N.A.	2.5
BM - Back-Medium (30-60)	65.2	N.A.	3.8
BH - Back-High (60-80)	24.1	N.A.	1.4
BVH - Back-Very High (80-90)	9.8	N.A.	0.6
UL - Uplight-Low (90-100)	136.7	N.A.	7.9
UH - Uplight-High (100-180)	725.9	N.A.	42.1
Total	1725.1	N.A.	100.0
BUG Rating	B0-U4-G2		

4.2 Goniophotometer Test

Coefficients of Utilization



Isolines



4.2 Goniophotometer Test

Luminous Distribution Intensity Data

Table--1

UNIT: cd

C (DEG) γ (DEG)	0	15	30	45	60	75	90	105	120	135	150	165	180	195	210	225	240	255	270
0	153	153	153	153	153	153	153	153	153	153	153	153	153	153	153	153	153	153	153
5	151	156	161	165	169	171	172	171	169	165	161	156	151	146	142	139	136	135	135
10	149	159	169	178	186	191	194	191	186	178	169	159	149	140	131	124	119	117	116
15	147	162	178	193	204	212	215	212	204	193	178	162	147	133	121	110	103	99.5	99.2
20	141	161	185	206	221	231	236	231	221	206	185	161	141	123	108	97.5	89.5	85.8	85.7
25	134	160	189	216	237	250	256	250	237	216	189	160	134	112	95.2	84.9	79.6	77.2	77.3
30	127	159	193	225	253	269	276	269	253	225	193	159	127	102	84.2	76.0	74.0	73.4	73.9
35	116	154	196	234	266	288	296	288	266	234	196	154	116	89.6	75.0	70.7	70.9	69.9	68.5
40	104	147	194	241	280	306	315	306	280	241	194	147	104	77.9	67.8	67.6	63.0	56.4	54.4
45	91.6	139	192	246	292	323	334	323	292	246	192	139	91.6	67.5	62.8	60.8	50.3	45.0	43.0
50	78.1	127	189	250	304	339	351	339	304	250	189	127	78.1	59.2	58.3	49.0	40.2	35.4	33.6
55	64.7	112	180	254	313	353	367	353	313	254	180	112	64.7	52.1	50.2	38.7	31.5	27.5	26.3
60	51.2	97.5	172	254	321	366	381	366	321	254	172	97.5	51.2	45.6	40.5	30.4	23.4	19.7	18.7
65	42.4	85.3	163	254	328	378	394	378	328	254	163	85.3	42.4	38.4	31.3	23.0	19.2	18.1	17.8
70	33.7	73.0	153	253	334	387	404	387	334	253	153	73.0	33.7	30.6	25.1	19.6	19.0	18.0	17.7
75	24.9	59.9	141	251	339	394	414	394	339	251	141	59.9	24.9	22.7	19.6	19.3	19.1	18.1	17.3
80	17.8	56.6	134	248	342	400	420	400	342	248	134	56.6	17.8	20.7	18.2	19.2	18.8	17.8	17.1
85	10.7	53.9	130	248	344	404	424	404	344	248	130	53.9	10.7	19.6	19.1	20.0	19.4	15.9	15.3
90	3.61	50.8	124	245	345	406	425	406	345	245	124	50.8	3.61	18.6	19.9	20.9	20.8	16.7	19.8
95	10.7	53.9	130	248	344	404	424	404	344	248	130	53.9	10.7	19.6	19.1	20.0	19.4	15.9	15.3
100	17.8	56.6	134	248	342	400	420	400	342	248	134	56.6	17.8	20.7	18.2	19.2	18.8	17.8	17.1
105	24.9	59.9	141	251	339	394	414	394	339	251	141	59.9	24.9	22.7	19.6	19.3	19.1	18.1	17.3
110	33.7	73.0	153	253	334	387	404	387	334	253	153	73.0	33.7	30.6	25.1	19.6	19.0	18.0	17.7
115	42.4	85.3	163	254	328	378	394	378	328	254	163	85.3	42.4	38.4	31.3	23.0	19.2	18.1	17.8
120	51.2	97.5	172	254	321	366	381	366	321	254	172	97.5	51.2	45.6	40.5	30.4	23.4	19.7	18.7
125	64.7	112	180	254	313	353	367	353	313	254	180	112	64.7	52.1	50.2	38.7	31.5	27.5	26.3
130	78.1	127	189	250	304	339	351	339	304	250	189	127	78.1	59.2	58.3	49.0	40.2	35.4	33.6
135	91.6	139	192	246	292	323	334	323	292	246	139	91.6	67.5	62.8	60.8	50.3	45.0	43.0	
140	104	147	194	241	280	306	315	306	280	241	194	147	104	77.9	67.8	67.6	63.0	56.4	54.4
145	116	154	196	234	266	288	296	288	266	234	196	154	116	89.6	75.0	70.7	70.9	69.9	68.5
150	127	159	193	225	253	269	276	269	253	225	193	159	127	102	84.2	76.0	74.0	73.4	73.9
155	134	160	189	216	237	250	256	250	237	216	189	160	134	112	95.2	84.9	79.6	77.2	77.3
160	141	161	185	206	221	231	236	231	221	206	185	161	141	123	108	97.5	89.5	85.8	85.7
165	147	162	178	193	204	212	215	212	204	193	178	162	147	133	121	110	103	99.5	99.2
170	149	159	169	178	186	191	194	191	186	178	169	159	149	140	131	124	119	117	116
175	151	156	161	165	169	171	172	171	169	165	161	156	151	146	142	139	136	135	135
180	153	153	153	153	153	153	153	153	153	153	153	153	153	153	153	153	153	153	153

Table--2

UNIT: cd

C (DEG) γ (DEG)	285	300	315	330	345														
0	153	153	153	153	153														
5	135	136	139	142	146														
10	117	119	124	131	140														
15	99.5	103	110	121	133														
20	85.8	89.5	97.5	108	123														
25	77.2	79.6	84.9	95.2	112														
30	73.4	74.0	76.0	84.2	102														
35	69.9	70.9	70.7	75.0	89.6														
40	56.4	63.0	67.6	67.8	77.9														
45	45.0	50.3	60.8	62.8	67.5														
50	35.4	40.2	49.0	58.3	59.2														
55	27.5	31.5	38.7	50.2	52.1														
60	19.7	23.4	30.4	40.5	45.6														
65	18.1	19.2	23.0	31.3	38.4														
70	18.0	19.0	19.6	25.1	30.6														
75	18.1	19.1	19.3	19.6	22.7														
80	17.8	18.8	19.2	18.2	20.7														
85	15.9	19.4	20.0	19.1	19.6														
90	16.7	20.8	20.9	19.9	18.6														
95	15.9	19.4	20.0	19.1	19.6														
100	17.8	18.8	19.2	18.2	20.7														
105	18.1	19.1	19.3	19.6	22.7														
110	18.0	19.0	19.6	25.1	30.6														
115	18.1	19.2	23.0	31.3	38.4														
120	19.7	23.4	30.4	40.5	45.6														
125	27.5	31.5	38.7	50.2	52.1														
130	35.4	40.2	49.0	58.3	59.2														
135	45.0	50.3	60.8	62.8	67.5														
140	56.4	63.0	67.6	67.8	77.9														
145	69.9	70.9	70.7	75.0	89.6														
150	73.4	74.0	76.0	84.2	102														
155	77.2	79.6	84.9	95.2	112														
160	85.8	89.5	97.5	108	123														
165	99.5	103	110	121	133														
170	117	119	124	131	140														
175	135	136	139	142	146														
180	153	153	153	153	153														

4.0 LM-79 Measurement and Test Results

4.3 THD and PF Test

Model No.	V1-24 @15W3500K	Sample ID	250728007-S1
Temperature (°C)	25.4	Humidity (%RH)	41.0

Test Method
<p>The samples were tested according to the and Ansi C82.77: 2002 and ANSI C82.77-10:2020</p> <p>The total harmonic distortion shall be measured to the 40th order.</p> <p>The ambient temperature shall be maintained at $25 \pm 1^{\circ}\text{C}$. The sample measurements were made using a digital power meter and power supply. The sample was operated at rated voltage and was stabilized before measurement. The total harmonic distortion was calculated.</p>

Test Results

Voltage (Vac)	Frequency (Hz)	Current (A)	Power (W)	Power Factor	iTHD(%)
120.0	60	0.121	14.4	0.994	4.80
277.0	60	0.059	14.9	0.917	21.11

5.0 Equipment List:

Equipment ID	Equipment Name	Last Cal.	Due Cal.
NTC-F01-001	Goniophotometer System	2024-11-07	2025-11-06
NTC-F01-006	2.0 meter Integrating Sphere	2024-11-07	2025-11-06
NTC-F01-012	Standard Lamp	2024-10-28	2025-10-27
NTC-F01-013	Standard Lamp	2024-10-28	2025-10-27
NTC-F01-031	Digital Power Meter	2025-08-04	2026-08-03
NTC-F01-019	Temperature & Humidity Meter	2024-10-29	2025-10-28

*****End of Report*****