

Cooper Lighting Solutions Photometric Lab
1121 Highway 74 South
Peachtree City, GA 30269

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Peachtree City, GA 30269

Scaled data based on original data using
LM-79-2024 Approved Method: Electrical and Photometric Measurements of Solid-
State Lighting Products

Test Report Prepared for

Cooper Lighting Solutions

Brand: McGRAW-EDISON

Report Number: P1445253

Luminaire Tested: TPTN-VA0-830-U-DL-CG-GM

Issue Date: 05/21/2026

Test Information

Test Method: LM-79-2024
Report Number: P1445253
Test Lab: INNOVATION CENTER(G1)
Issue Date: 5/21/2026
Manufacturer: COOPER LIGHTING SOLUTIONS
Product Line: MCGRAW-EDISON
Catalog Number: TPTN-VA0-830-U-DL-CG-GM
Description: TOPTIER NANO SPIDER MOUNT VISUAL COMFORT LED LUMINAIRE 9W 80CRI 3000K w/
DRIVE LANE TYPE IV DISTRIBUTION OPTIC AND GLASS
Light Source: 3000K CCT, 80 CRI LEDS
Ballast/Driver: ELECTRONIC DRIVER

Summary

Lumens per Lamp: N/A
Luminaire Lumens: 699.4 lumens
Efficiency: N/A
Efficacy: 80.4 lumens/watt
Luminous Opening: Circular (Dia: 0.71' x H: 0')
IES Classification: Type IV - Short
BUG Rating: B0 - U0 - G1

Input Watts (W): 8.7
Input Voltage (V): 120
Input Current (Ain): NR
Voltage Rise (V): NR
Power Factor: 0.98
Total Harmonic Distortion (THDi): 29.6%
Frequency (hertz): 60
Stabilization Time: NR
Operation Time: NR
Ambient Temperature (°C): NR
Test Distance: 28.75 FT

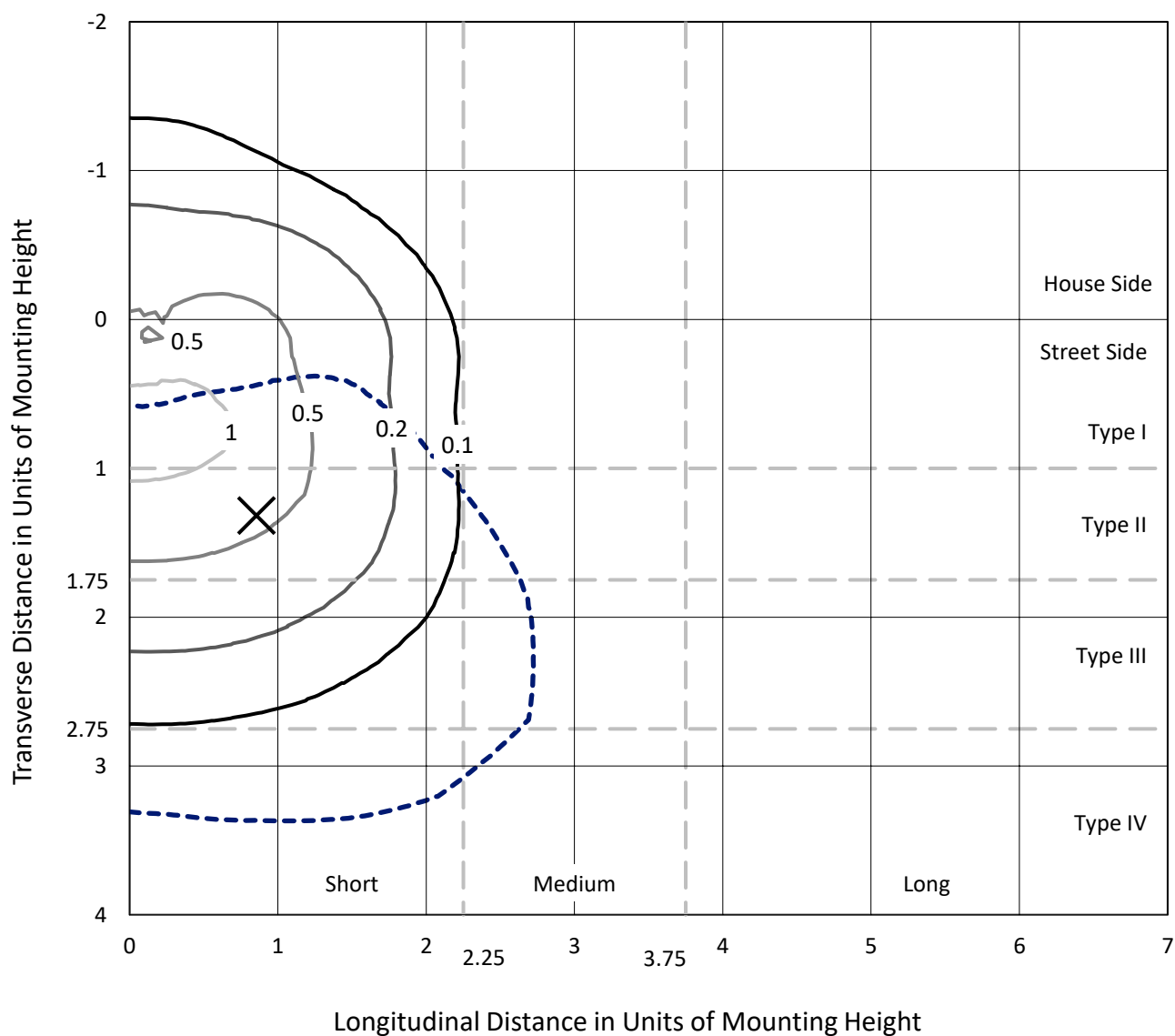
REPORT NUMBER: P1445253

CATALOG NUMBER: TPTN-VA0-830-U-DL-CG-GM

Iso-Footcandle Lines of Horizontal Illumination

× Max cd

--- 1/2 Max cd



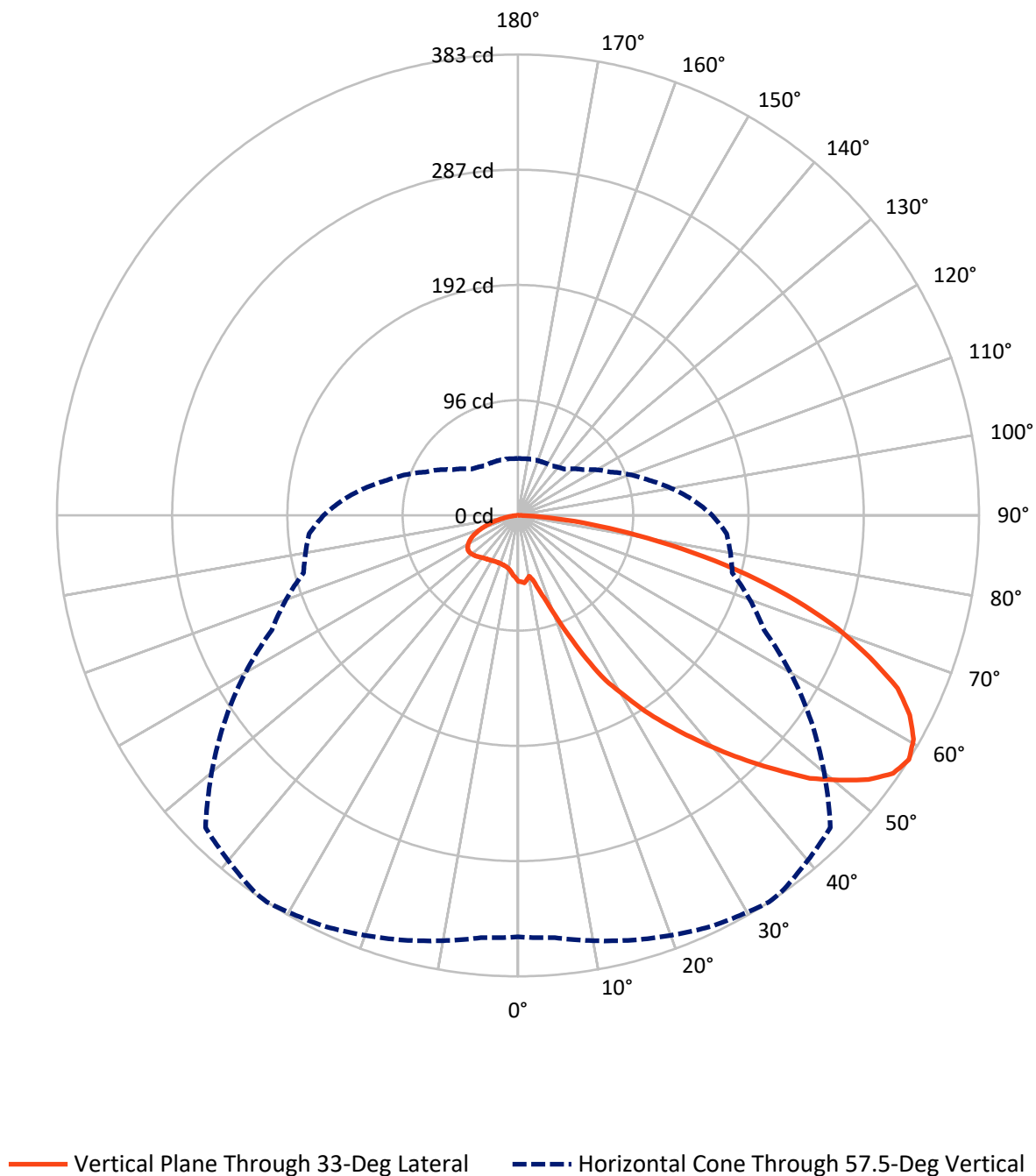
Based on 10 foot mounting height. Maximum calculated value = 1.3 fc

Type IV - Short - N/A

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Luminous Intensity Polar Plot



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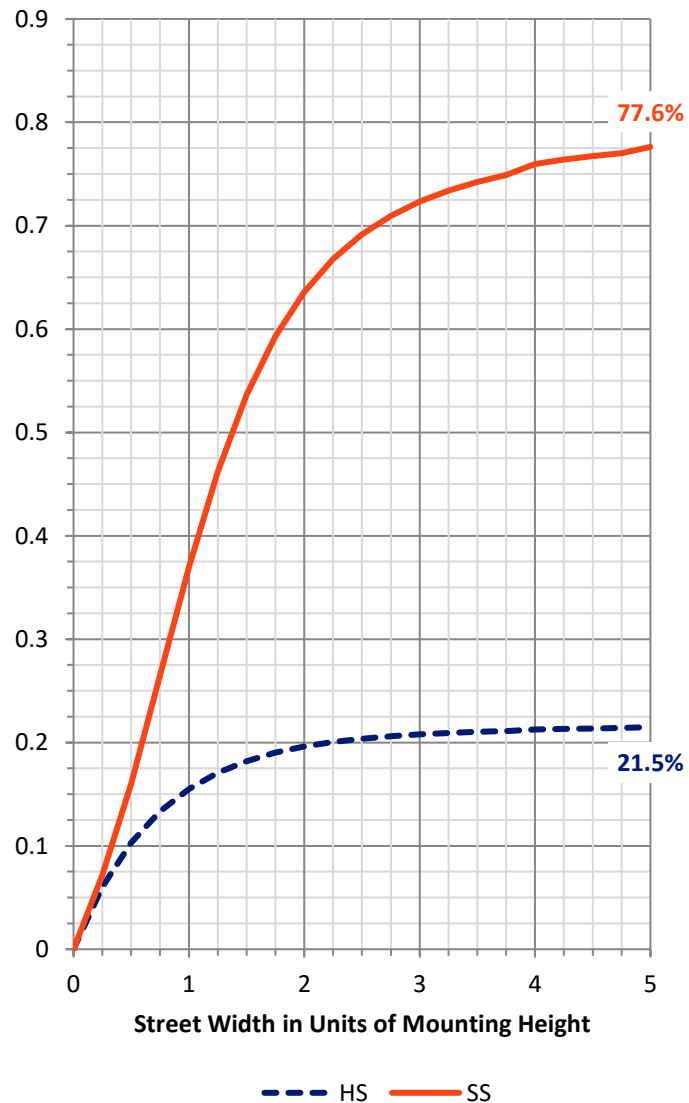
FLUX DISTRIBUTION:

		Downward	Upward	Total
House Side	Lumens	151.5	0.0	151.5
	% Fixture	21.7	0.0	21.7
Street Side	Lumens	548.0	0.0	548.0
	% Fixture	78.3	0.0	78.3
Total	Lumens	699.4	0.0	699.4
	% Fixture	100.0	0.0	100.0

ZONAL LUMENS:

Zone	Lumens	% Fixture
0°-10°	5.0	0.7
10°-20°	15.8	2.3
20°-30°	39.0	5.6
30°-40°	75.6	10.8
40°-50°	123.0	17.6
50°-60°	166.3	23.8
60°-70°	161.9	23.1
70°-80°	95.4	13.6
80°-90°	17.6	2.5
90°-100°	0.0	0.0
100°-110°	0.0	0.0
110°-120°	0.0	0.0
120°-130°	0.0	0.0
130°-140°	0.0	0.0
140°-150°	0.0	0.0
150°-160°	0.0	0.0
160°-170°	0.0	0.0
170°-180°	0.0	0.0
0°-90°	699.4	100.0
0°-180°	699.4	100.0

Coefficient of Utilization



REPORT NUMBER: P1445253

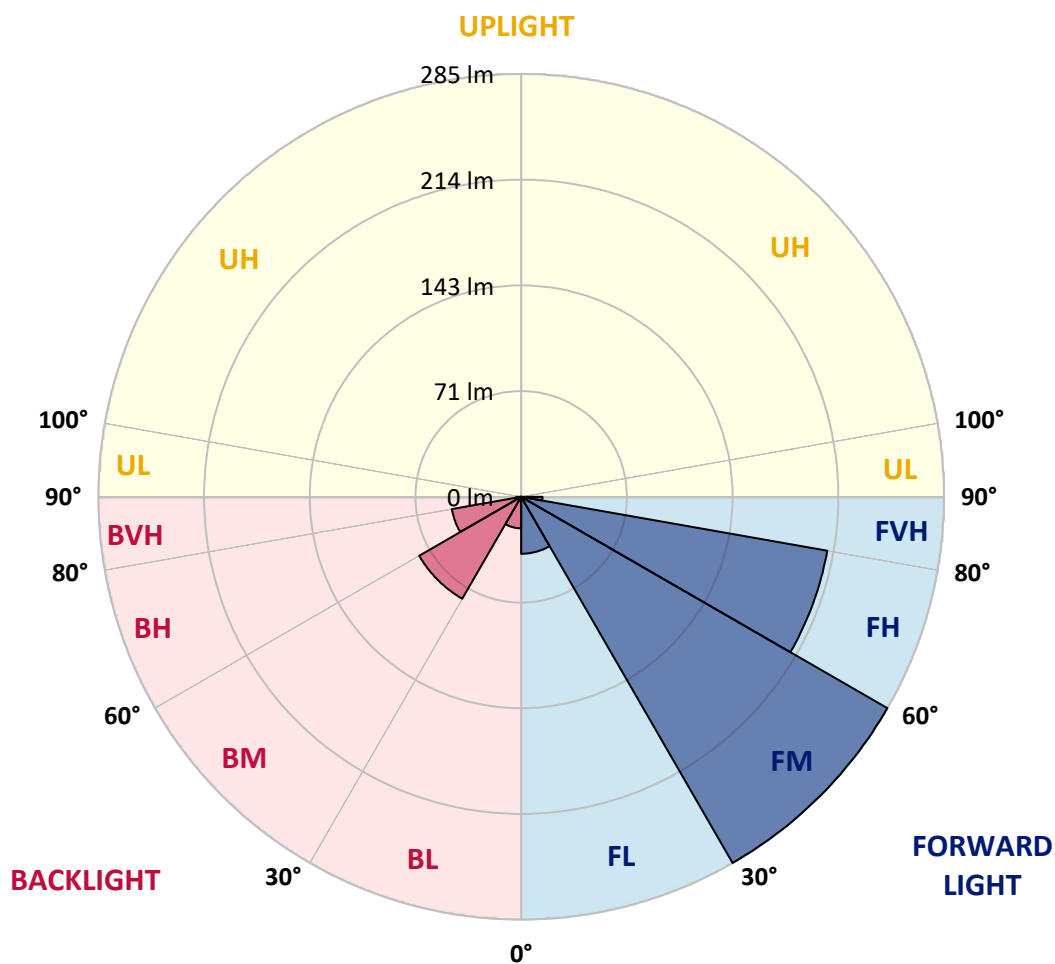
CATALOG NUMBER: TPTN-VA0-830-U-DL-CG-GM

LUMINAIRE CLASSIFICATION SYSTEM LUMEN TABLE AND BUG RATING:

Zone		Lumens	% Fixture	Zone Rating/Lumen Limit		
				B	U	G
FL	(0°-30°)	38.4	5.5			
FM	(30°-60°)	285.4	40.8			
FH	(60°-80°)	209.8	30.0			G0/660
FVH	(80°-90°)	14.4	2.1			G1/100
BL	(0°-30°)	21.3	3.0	B0/110		
BM	(30°-60°)	79.5	11.4	B0/220		
BH	(60°-80°)	47.5	6.8	B0/110		G0/110
BVH	(80°-90°)	3.2	0.5			G0/10
UL	(90°-100°)	0.0	0.0		U0/0	
UH	(100°-180°)	0.0	0.0		U0/0	

BUG Rating: B0-U0-G1

Type IV Short



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CATALOG NUMBER: TPTN-VA0-830-U-DL-CG-GM

CANDELA DISTRIBUTION (FULL):

	0°	5°	15°	25°	33°	35°	45°	55°	65°	75°	85°
0°	54.9	54.9	54.9	54.9	54.9	54.9	54.9	54.9	54.9	54.9	54.9
2.5°	55.6	55.5	55.5	55.3	55.2	55.2	55.1	54.9	54.7	54.4	54.1
5°	58.3	58.0	57.4	56.9	56.3	56.3	56.0	55.9	55.6	55.5	55.2
7.5°	55.6	55.6	55.3	54.7	53.8	53.7	52.4	52.0	52.4	52.3	52.4
10°	56.9	56.7	55.2	53.4	51.3	50.9	49.8	49.4	50.2	51.0	51.7
12.5°	61.2	61.2	59.5	57.2	54.9	54.4	52.0	51.2	51.3	52.3	53.1
15°	68.3	68.3	67.0	65.1	63.0	61.9	58.3	55.9	55.2	55.6	56.5
17.5°	79.1	78.6	79.3	76.5	73.7	72.7	67.0	62.7	60.9	61.1	61.3
20°	95.8	95.5	95.5	93.7	88.9	86.9	79.3	71.6	68.4	68.0	67.7
22.5°	117.1	116.4	116.7	114.5	108.5	106.8	95.0	84.3	77.7	75.8	75.7
25°	141.6	141.7	142.0	138.9	131.8	130.3	114.6	99.0	88.7	85.0	84.0
27.5°	166.3	166.3	164.7	160.2	155.1	152.4	135.3	115.3	101.0	95.4	92.8
30°	188.6	188.4	184.8	178.3	173.0	171.2	152.3	130.6	112.6	104.3	101.0
32.5°	210.1	209.7	203.3	197.6	193.9	191.1	170.6	145.3	123.9	112.8	108.6
35°	232.1	229.6	222.2	217.5	213.5	210.3	190.0	160.3	135.0	121.8	116.5
37.5°	251.4	250.7	242.1	238.5	233.9	232.2	210.7	175.8	146.9	130.9	125.2
40°	270.4	270.1	263.3	259.6	255.6	253.2	232.7	192.6	159.8	140.7	134.3
42.5°	287.3	287.9	284.3	281.9	278.4	276.6	255.1	210.3	172.3	150.1	143.2
45°	306.4	306.5	305.8	304.8	301.6	301.8	279.1	229.0	186.4	160.2	152.6
47.5°	323.9	325.0	326.7	326.8	326.5	325.1	304.7	247.0	199.6	169.4	161.3
50°	336.4	338.2	344.3	346.3	345.7	345.3	325.1	265.2	210.1	177.5	167.4
52.5°	348.4	349.8	358.7	364.9	364.8	363.8	344.5	281.1	220.4	183.2	173.1
55°	354.2	355.0	366.6	376.6	378.4	378.5	362.0	292.6	226.3	186.8	176.1
57.5°	350.3	352.3	365.5	377.3	383.1	381.9	367.1	297.2	225.7	184.4	174.1
60°	341.3	344.1	356.7	370.2	377.7	375.9	362.1	295.4	220.7	178.4	169.8
62.5°	327.5	331.0	343.4	356.4	365.3	365.9	353.0	290.0	211.4	171.1	163.0
65°	301.1	305.7	324.0	338.4	346.8	348.9	334.9	277.0	199.3	159.9	150.3
67.5°	272.2	275.2	290.0	311.0	315.4	318.3	310.1	255.6	183.6	142.4	134.9
70°	239.2	243.9	255.6	276.2	282.0	284.1	279.3	229.2	161.0	123.1	118.9
72.5°	202.3	204.3	217.5	232.9	241.8	244.5	239.3	198.7	136.3	102.6	99.4
75°	158.7	161.7	171.9	187.2	196.9	196.2	195.4	162.7	107.9	81.8	78.6
77.5°	117.8	119.5	129.3	140.5	148.4	149.1	148.8	124.0	80.9	59.5	57.3
80°	76.9	79.0	86.2	95.0	100.3	102.6	101.8	86.5	55.5	40.1	38.4
82.5°	43.5	44.1	49.5	54.2	60.8	60.4	62.0	52.7	33.8	23.5	21.4
85°	15.4	16.4	19.2	24.2	26.8	28.6	28.9	24.8	15.2	10.6	7.9
87.5°	1.5	1.5	2.6	3.9	5.0	5.3	5.4	5.6	4.5	3.5	1.1
90°	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0

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CATALOG NUMBER: TPTN-VA0-830-U-DL-CG-GM

CANDELA DISTRIBUTION (continued):

	90°	95°	105°	115°	125°	135°	145°	155°	165°	175°	180°
0°	54.9	54.9	54.9	54.9	54.9	54.9	54.9	54.9	54.9	54.9	54.9
2.5°	54.1	53.8	53.3	52.7	52.6	52.0	51.9	51.7	51.5	51.5	51.3
5°	54.7	54.4	53.5	52.6	51.6	50.8	50.1	49.4	48.8	48.4	48.4
7.5°	52.7	52.8	52.8	52.2	50.8	49.2	47.4	46.0	44.8	44.2	43.9
10°	51.9	52.3	52.2	51.5	50.1	48.0	45.6	43.4	41.6	40.5	40.3
12.5°	53.4	53.4	53.0	51.9	49.9	47.3	44.5	41.6	39.5	38.2	38.1
15°	56.7	56.6	55.1	53.0	50.2	47.1	43.9	40.7	38.1	36.7	36.6
17.5°	61.5	60.8	58.3	54.7	50.9	47.1	43.5	40.1	37.3	35.6	35.3
20°	67.3	65.9	62.0	56.7	51.7	47.4	43.3	39.5	36.7	34.9	34.8
22.5°	74.5	72.3	66.2	59.1	53.1	48.0	43.3	39.2	36.6	35.2	35.2
25°	81.8	78.7	70.9	61.7	54.5	48.4	43.3	39.5	37.3	36.3	36.2
27.5°	89.7	85.4	75.5	64.8	55.9	49.0	43.5	39.6	38.0	37.3	37.3
30°	96.9	92.1	80.2	67.7	57.4	49.6	44.1	40.1	38.4	38.1	37.8
32.5°	103.7	98.0	84.7	70.5	59.2	50.3	44.5	40.5	38.9	38.7	38.5
35°	111.3	105.0	88.7	73.2	60.6	51.5	45.1	41.2	39.6	39.4	39.4
37.5°	119.3	111.5	93.5	75.9	62.0	52.6	45.6	42.1	40.6	40.3	40.2
40°	127.1	118.5	98.2	78.7	63.7	53.4	46.3	43.0	41.7	41.4	41.3
42.5°	135.5	125.6	102.8	81.2	65.4	54.2	47.3	44.2	43.1	42.6	42.4
45°	143.1	132.4	106.9	83.9	66.9	55.2	48.4	45.8	44.6	44.1	43.9
47.5°	150.5	138.2	110.8	85.8	68.1	55.9	49.5	47.0	46.2	45.6	45.3
50°	156.5	143.0	113.6	87.1	69.0	56.3	50.3	48.1	47.4	46.6	46.4
52.5°	160.8	146.7	115.6	88.0	69.1	56.3	50.9	49.4	48.5	47.7	47.4
55°	162.8	148.1	115.4	87.6	68.3	55.9	50.9	49.6	49.0	48.0	47.8
57.5°	161.5	146.2	112.8	85.2	66.3	54.4	50.1	48.8	48.1	47.3	47.3
60°	157.1	142.1	108.6	81.6	63.3	51.9	48.3	47.3	46.6	45.9	45.9
62.5°	150.3	136.3	103.3	76.2	59.5	49.0	45.9	45.1	44.6	43.9	43.8
65°	138.5	124.9	95.8	70.5	54.5	45.2	42.6	42.3	41.7	40.7	40.6
67.5°	124.9	112.4	84.8	63.4	48.7	40.5	38.5	38.2	37.7	36.9	37.0
70°	109.6	98.5	73.4	54.7	41.6	35.3	33.7	33.2	32.8	32.7	32.5
72.5°	92.3	82.9	61.5	44.6	34.8	29.8	28.4	28.1	27.8	27.7	27.5
75°	71.8	65.4	49.1	35.2	27.5	23.9	22.7	22.5	22.5	22.3	22.0
77.5°	52.8	47.6	35.7	25.6	19.9	17.4	17.0	17.0	17.1	17.0	16.5
80°	35.0	31.7	23.4	17.0	13.2	11.5	11.5	11.7	11.8	11.7	11.8
82.5°	18.6	17.5	13.2	9.9	7.8	6.8	7.0	7.1	7.4	7.1	7.4
85°	6.8	7.0	5.8	4.5	3.8	3.5	3.6	3.8	3.9	3.8	3.8
87.5°	0.4	1.4	2.4	2.1	1.8	1.8	1.8	1.8	1.8	1.7	1.5
90°	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0

LM-79-2019: Approved Method: Electrical and Photometric Measurements of Solid-State Lighting Products

Report Prepared for

Cooper Lighting Solutions

MCGRAW EDISON

Report Number: SP1-2411-284-4

Test Date: 11/22/2024

Luminaire Tested: TTN-D0-830-U-WQ

Data in this report applies to families of products including TTN-D0-830-U-WQ

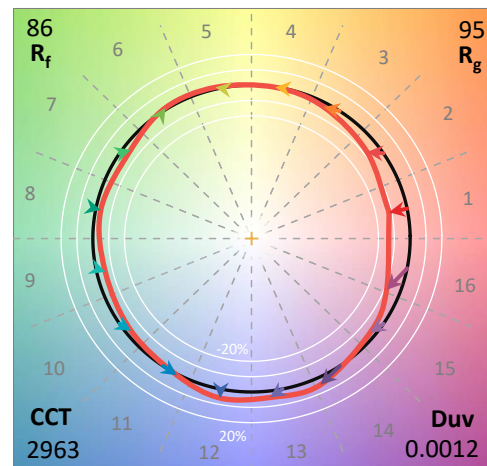
Test Information

Test Method: LM-79-2019
 Report Number: SP1-2411-284-4
 Test Lab: COOPER LIGHTING SOLUTIONS
 Photometer: SP1 - 76IN SPHERE
 Measurement Geometry: 4π
 Issue Date: 11/22/2024
 Manufacturer: COOPER LIGHTING SOLUTIONS
 Product Line: MCGRAW EDISON
 Catalog Number: **TTN-D0-830-U-WQ**
 Description: TOPTIER NANO LED PARKING GARAGE LUMINAIRE. 3000K, 80 CRI LEDS AND WIDE DISTRIBUTION

Spectral Parameters

CCT (K): 2963
 CIE u' : 0.2515
 CIE v' : 0.5238
 Duv: 0.0012
 CIE x: 0.4414
 CIE y: 0.4086
 CIE z: 0.1501
 Peak Wavelength (nm): 603
 Dominant Wavelength (nm): 582
 Purity: 55.12798
 R_f: 86.1
 R_g: 94.9

CRI (Ra): 82.9
 R1: 81.4
 R2: 91.9
 R3: 95.2
 R4: 81.6
 R5: 82.3
 R6: 91.4
 R7: 82.0
 R8: 57.2
 R9: 3.9
 R10: 82.5
 R11: 82.3
 R12: 76.5
 R13: 83.9
 R14: 97.8
 R15: 72.6



Test Conditions

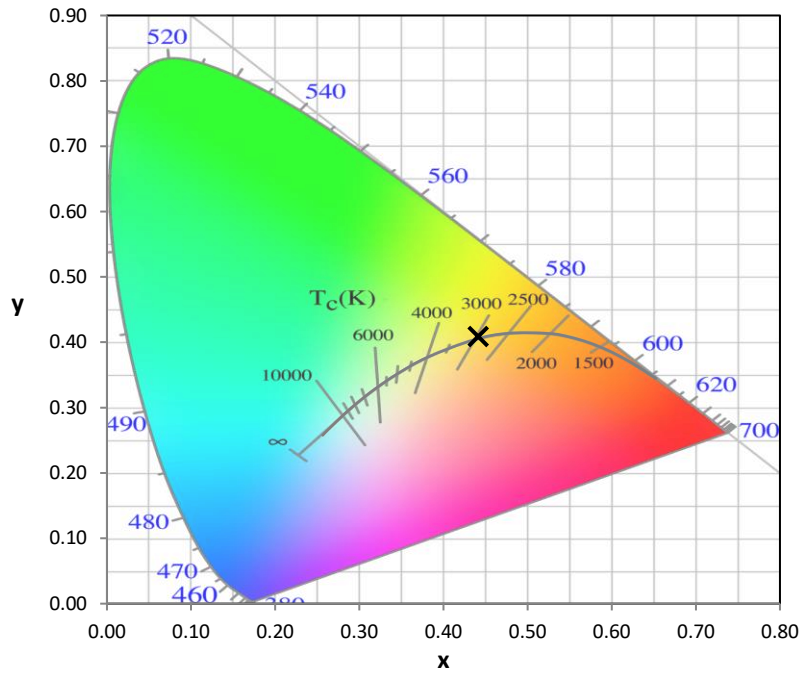
Stabilization Time: 37M
 Operation Time: 1H 37M
 Sphere Temperature (°C): 25.0

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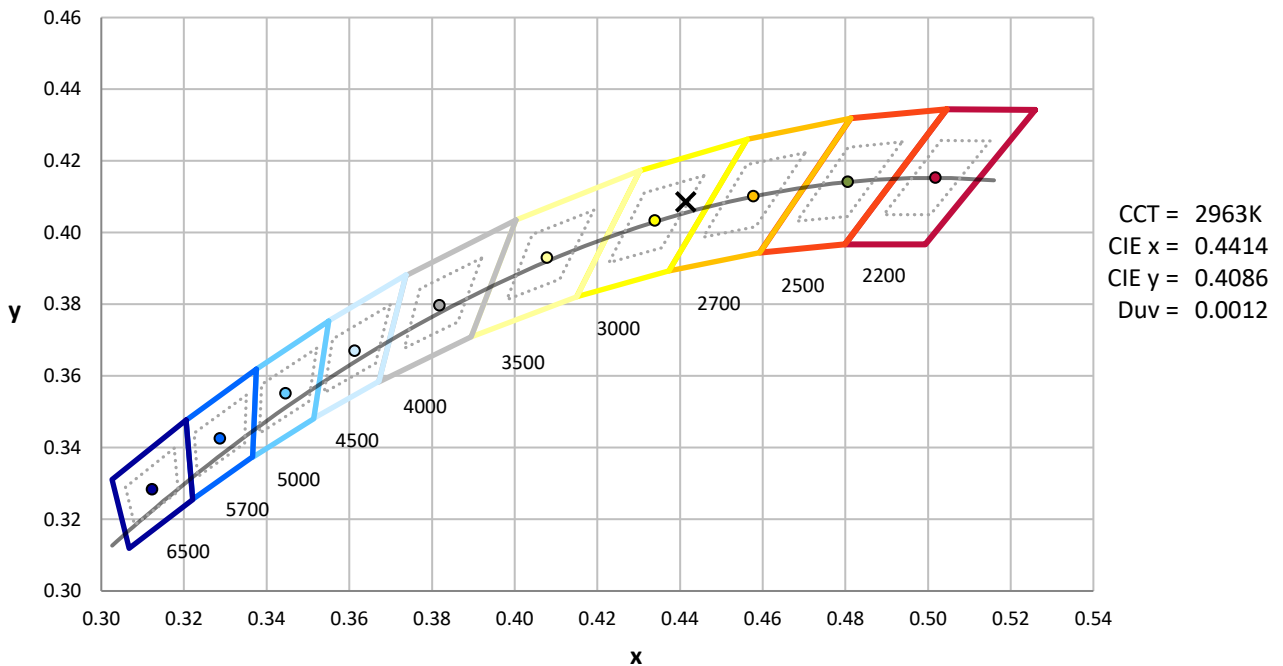
Measurement and Test Equipment			
Instrument	Identification Number	Calibration Date	Calibration Due Date
Photometer	IN0058	6/18/2024	12/18/2024
Power Meter	INXT2011004	2/8/2024	2/8/2025
AC Power Source	IN0063	10/22/2024	10/22/2025
DC Power Source	IN0208	10/22/2024	10/22/2025
Sphere Thermometer	IN0085	10/22/2024	10/22/2025
Room Thermometer	IN0046	10/22/2024	10/22/2025

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CIE 1931 Chromaticity Diagram



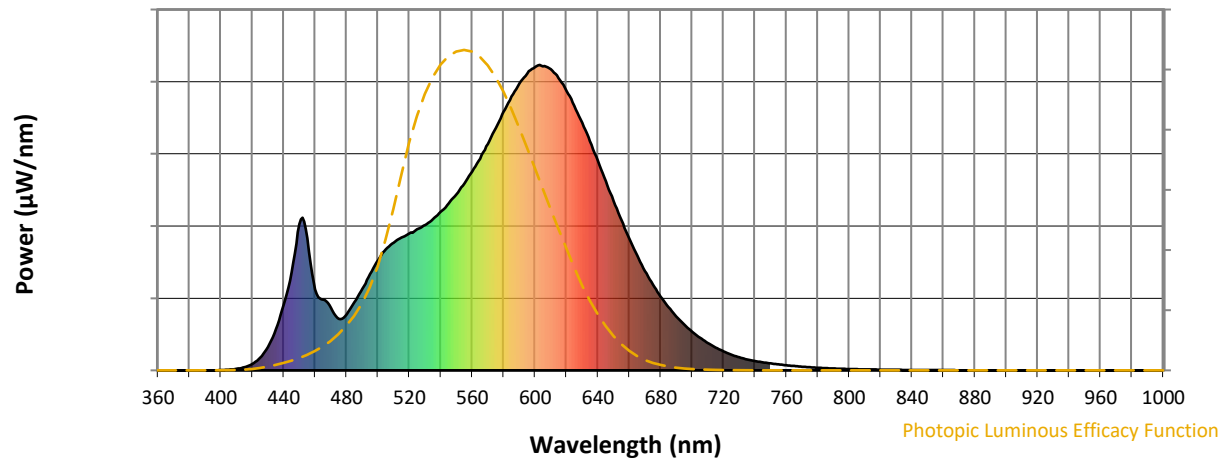
CIE 1931 Chromaticity Diagram with 2017 ANSI 7-Step and 4-Step Quadrangles



Point lies inside the ANSI 3000K 4-step quadrangle

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Photopic Flux vs. Wavelength

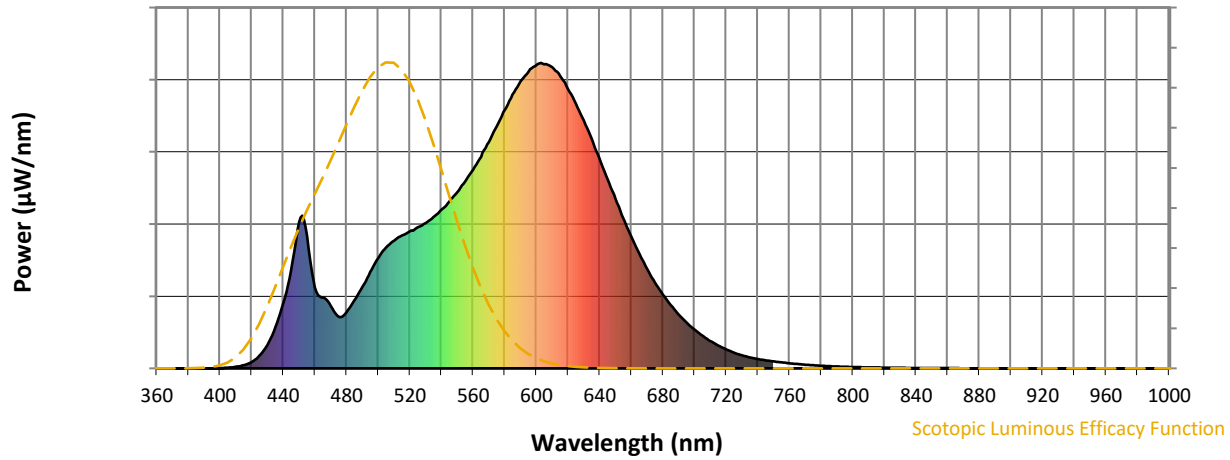


Photopic Lumens: NR

λ (nm)	Power $\text{W}^{\wedge}/\text{nm}$	Lumens (ϕ/nm)	λ (nm)	Power $\text{W}^{\wedge}/\text{nm}$	Lumens (ϕ/nm)	λ (nm)	Power $\text{W}^{\wedge}/\text{nm}$	Lumens (ϕ/nm)	λ (nm)	Power $\text{W}^{\wedge}/\text{nm}$	Lumens (ϕ/nm)	λ (nm)	Power $\text{W}^{\wedge}/\text{nm}$	Lumens (ϕ/nm)
360	0	NR	490	267	NR	620	915	NR	750	23	NR	880	0	NR
365	0	NR	495	315	NR	625	866	NR	755	20	NR	885	0	NR
370	0	NR	500	360	NR	630	811	NR	760	17	NR	890	0	NR
375	0	NR	505	396	NR	635	750	NR	765	14	NR	895	0	NR
380	0	NR	510	418	NR	640	686	NR	770	12	NR	900	0	NR
385	0	NR	515	435	NR	645	619	NR	775	10	NR	905	0	NR
390	0	NR	520	448	NR	650	554	NR	780	9	NR	910	0	NR
395	0	NR	525	462	NR	655	491	NR	785	7	NR	915	0	NR
400	1	NR	530	476	NR	660	431	NR	790	6	NR	920	0	NR
405	2	NR	535	495	NR	665	376	NR	795	5	NR	925	0	NR
410	5	NR	540	520	NR	670	325	NR	800	4	NR	930	0	NR
415	10	NR	545	547	NR	675	280	NR	805	4	NR	935	0	NR
420	21	NR	550	576	NR	680	241	NR	810	3	NR	940	0	NR
425	42	NR	555	612	NR	685	207	NR	815	3	NR	945	0	NR
430	77	NR	560	651	NR	690	176	NR	820	2	NR	950	0	NR
435	135	NR	565	693	NR	695	149	NR	825	2	NR	955	0	NR
440	215	NR	570	741	NR	700	127	NR	830	2	NR	960	0	NR
445	321	NR	575	793	NR	705	107	NR	835	2	NR	965	0	NR
450	479	NR	580	847	NR	710	89	NR	840	1	NR	970	0	NR
455	432	NR	585	897	NR	715	75	NR	845	1	NR	975	0	NR
460	265	NR	590	940	NR	720	62	NR	850	1	NR	980	0	NR
465	231	NR	595	971	NR	725	51	NR	855	1	NR	985	0	NR
470	204	NR	600	993	NR	730	43	NR	860	1	NR	990	0	NR
475	168	NR	605	996	NR	735	36	NR	865	1	NR	995	0	NR
480	183	NR	610	986	NR	740	31	NR	870	1	NR	1000	0	NR
485	223	NR	615	957	NR	745	26	NR	875	0	NR			

REPORT NUMBER: SP1-2411-284-4

Scotopic Flux vs. Wavelength



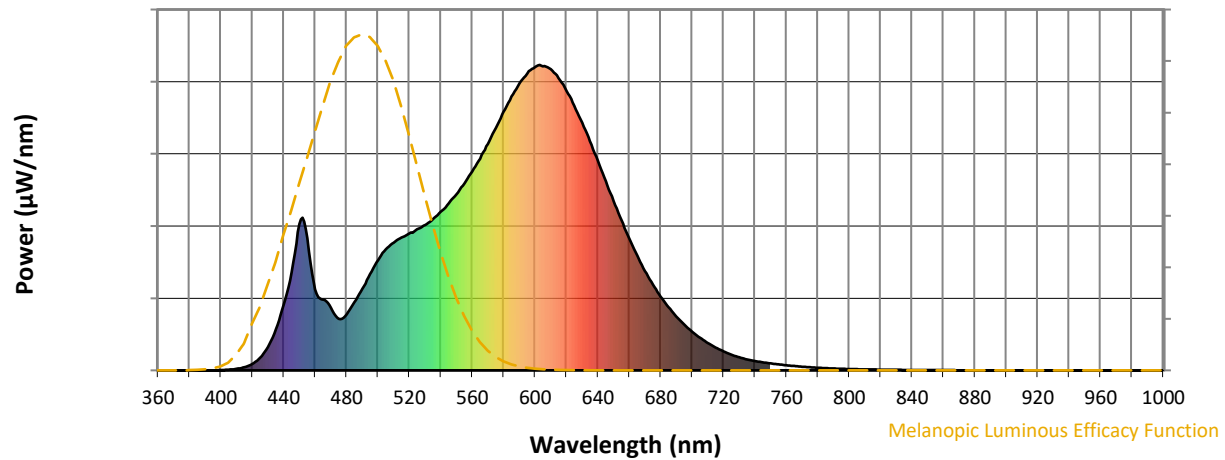
Scotopic Lumens: NR

S/P: 1.34

λ (nm)	Power $\text{W}^\wedge/\text{nm}$	Lumens (ϕ/nm)	λ (nm)	Power $\text{W}^\wedge/\text{nm}$	Lumens (ϕ/nm)	λ (nm)	Power $\text{W}^\wedge/\text{nm}$	Lumens (ϕ/nm)	λ (nm)	Power $\text{W}^\wedge/\text{nm}$	Lumens (ϕ/nm)	λ (nm)	Power $\text{W}^\wedge/\text{nm}$	Lumens (ϕ/nm)
360	0	NR	490	267	NR	620	915	NR	750	23	NR	880	0	NR
365	0	NR	495	315	NR	625	866	NR	755	20	NR	885	0	NR
370	0	NR	500	360	NR	630	811	NR	760	17	NR	890	0	NR
375	0	NR	505	396	NR	635	750	NR	765	14	NR	895	0	NR
380	0	NR	510	418	NR	640	686	NR	770	12	NR	900	0	NR
385	0	NR	515	435	NR	645	619	NR	775	10	NR	905	0	NR
390	0	NR	520	448	NR	650	554	NR	780	9	NR	910	0	NR
395	0	NR	525	462	NR	655	491	NR	785	7	NR	915	0	NR
400	1	NR	530	476	NR	660	431	NR	790	6	NR	920	0	NR
405	2	NR	535	495	NR	665	376	NR	795	5	NR	925	0	NR
410	5	NR	540	520	NR	670	325	NR	800	4	NR	930	0	NR
415	10	NR	545	547	NR	675	280	NR	805	4	NR	935	0	NR
420	21	NR	550	576	NR	680	241	NR	810	3	NR	940	0	NR
425	42	NR	555	612	NR	685	207	NR	815	3	NR	945	0	NR
430	77	NR	560	651	NR	690	176	NR	820	2	NR	950	0	NR
435	135	NR	565	693	NR	695	149	NR	825	2	NR	955	0	NR
440	215	NR	570	741	NR	700	127	NR	830	2	NR	960	0	NR
445	321	NR	575	793	NR	705	107	NR	835	2	NR	965	0	NR
450	479	NR	580	847	NR	710	89	NR	840	1	NR	970	0	NR
455	432	NR	585	897	NR	715	75	NR	845	1	NR	975	0	NR
460	265	NR	590	940	NR	720	62	NR	850	1	NR	980	0	NR
465	231	NR	595	971	NR	725	51	NR	855	1	NR	985	0	NR
470	204	NR	600	993	NR	730	43	NR	860	1	NR	990	0	NR
475	168	NR	605	996	NR	735	36	NR	865	1	NR	995	0	NR
480	183	NR	610	986	NR	740	31	NR	870	1	NR	1000	0	NR
485	223	NR	615	957	NR	745	26	NR	875	0	NR			

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Melanopic Flux vs. Wavelength



Melanopic Lumens: NR

M/P: 2.58

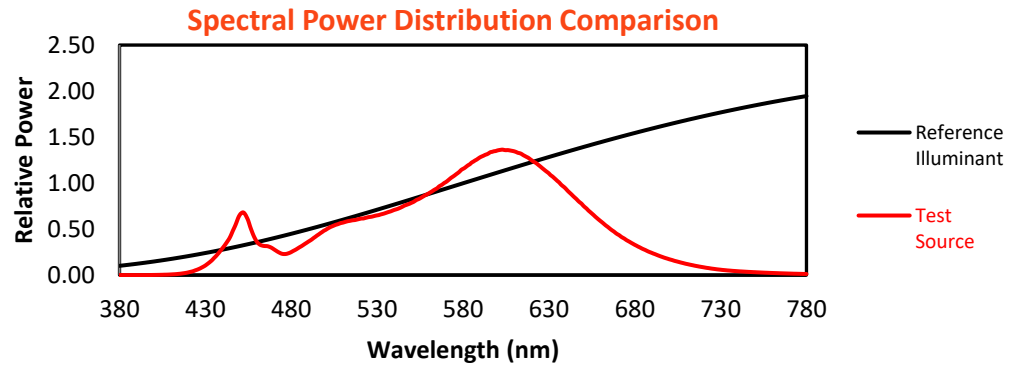
λ (nm)	Power $\text{W}^\wedge/\text{nm}$	Lumens (ϕ/nm)	λ (nm)	Power $\text{W}^\wedge/\text{nm}$	Lumens (ϕ/nm)	λ (nm)	Power $\text{W}^\wedge/\text{nm}$	Lumens (ϕ/nm)	λ (nm)	Power $\text{W}^\wedge/\text{nm}$	Lumens (ϕ/nm)	λ (nm)	Power $\text{W}^\wedge/\text{nm}$	Lumens (ϕ/nm)
360	0	NR	490	267	NR	620	915	NR	750	23	NR	880	0	NR
365	0	NR	495	315	NR	625	866	NR	755	20	NR	885	0	NR
370	0	NR	500	360	NR	630	811	NR	760	17	NR	890	0	NR
375	0	NR	505	396	NR	635	750	NR	765	14	NR	895	0	NR
380	0	NR	510	418	NR	640	686	NR	770	12	NR	900	0	NR
385	0	NR	515	435	NR	645	619	NR	775	10	NR	905	0	NR
390	0	NR	520	448	NR	650	554	NR	780	9	NR	910	0	NR
395	0	NR	525	462	NR	655	491	NR	785	7	NR	915	0	NR
400	1	NR	530	476	NR	660	431	NR	790	6	NR	920	0	NR
405	2	NR	535	495	NR	665	376	NR	795	5	NR	925	0	NR
410	5	NR	540	520	NR	670	325	NR	800	4	NR	930	0	NR
415	10	NR	545	547	NR	675	280	NR	805	4	NR	935	0	NR
420	21	NR	550	576	NR	680	241	NR	810	3	NR	940	0	NR
425	42	NR	555	612	NR	685	207	NR	815	3	NR	945	0	NR
430	77	NR	560	651	NR	690	176	NR	820	2	NR	950	0	NR
435	135	NR	565	693	NR	695	149	NR	825	2	NR	955	0	NR
440	215	NR	570	741	NR	700	127	NR	830	2	NR	960	0	NR
445	321	NR	575	793	NR	705	107	NR	835	2	NR	965	0	NR
450	479	NR	580	847	NR	710	89	NR	840	1	NR	970	0	NR
455	432	NR	585	897	NR	715	75	NR	845	1	NR	975	0	NR
460	265	NR	590	940	NR	720	62	NR	850	1	NR	980	0	NR
465	231	NR	595	971	NR	725	51	NR	855	1	NR	985	0	NR
470	204	NR	600	993	NR	730	43	NR	860	1	NR	990	0	NR
475	168	NR	605	996	NR	735	36	NR	865	1	NR	995	0	NR
480	183	NR	610	986	NR	740	31	NR	870	1	NR	1000	0	NR
485	223	NR	615	957	NR	745	26	NR	875	0	NR			

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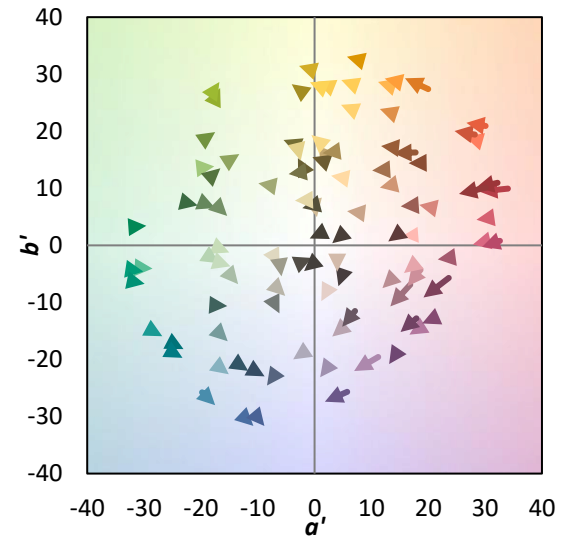
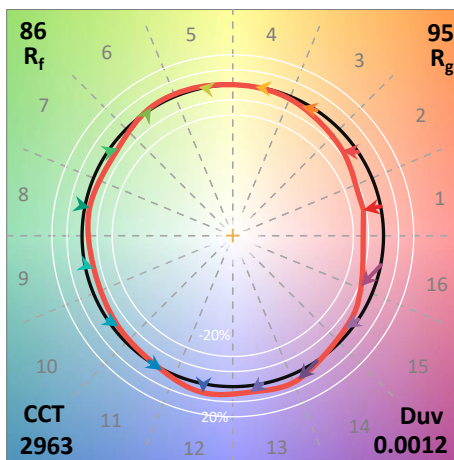
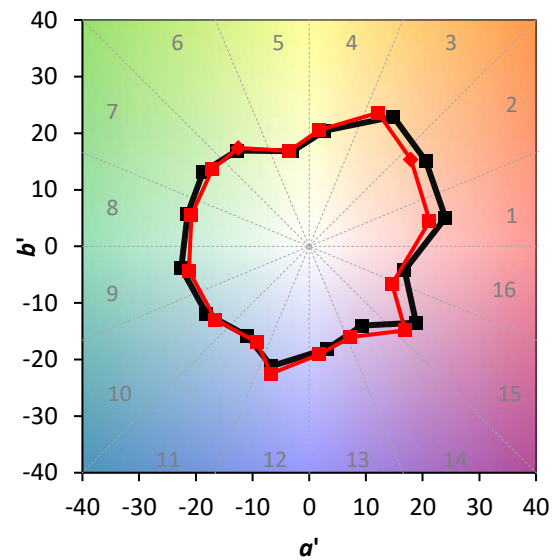
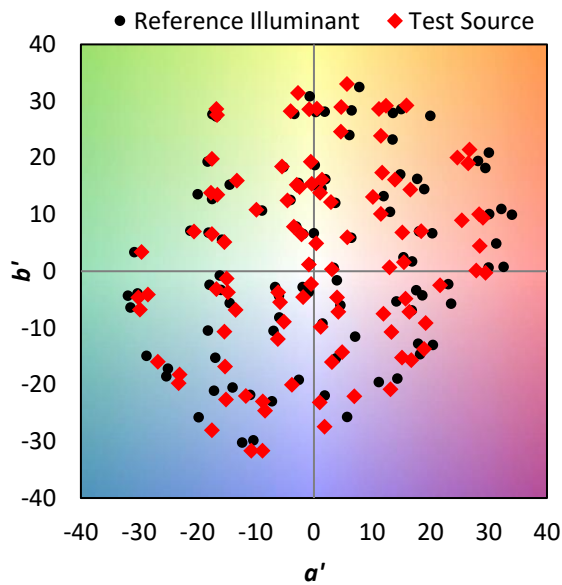
TM-30-18

Summary

$R_f = 86.1$
 $R_g = 94.9$
 $CIE R_a = 82.9$
 $R_9 = 3.9$

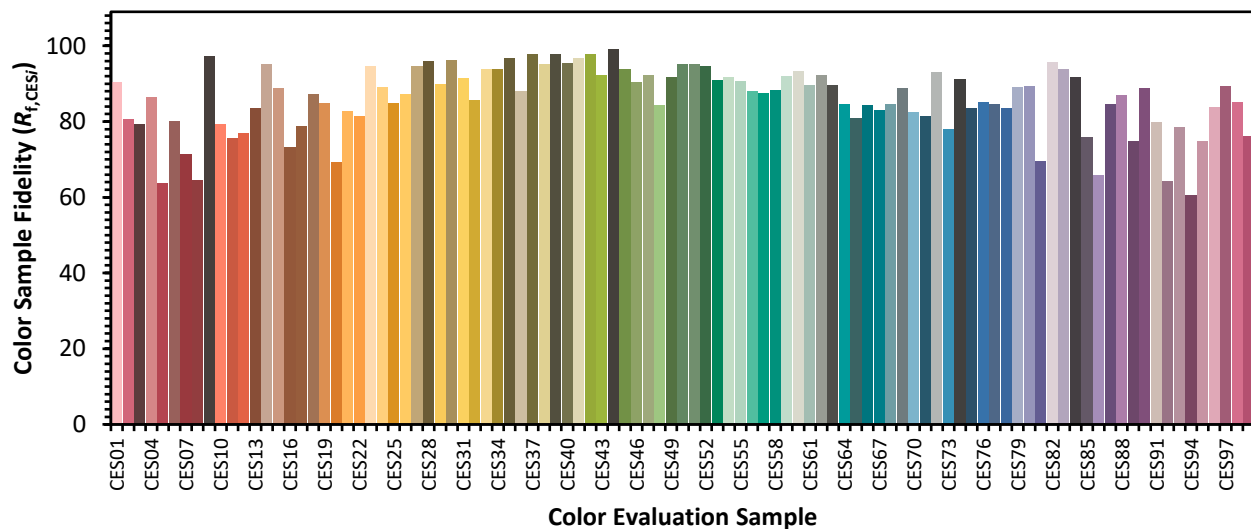


Color Vector Graphics

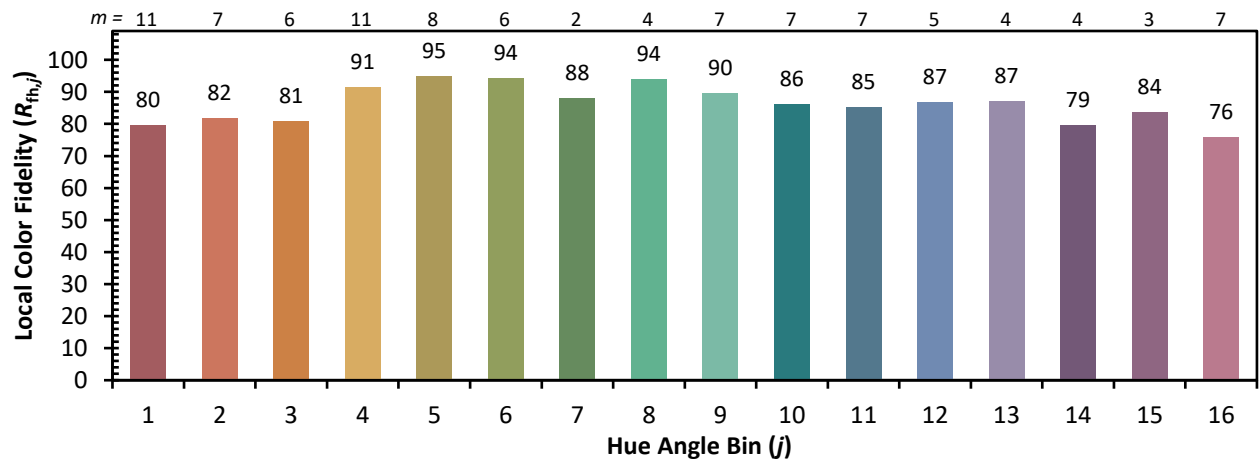
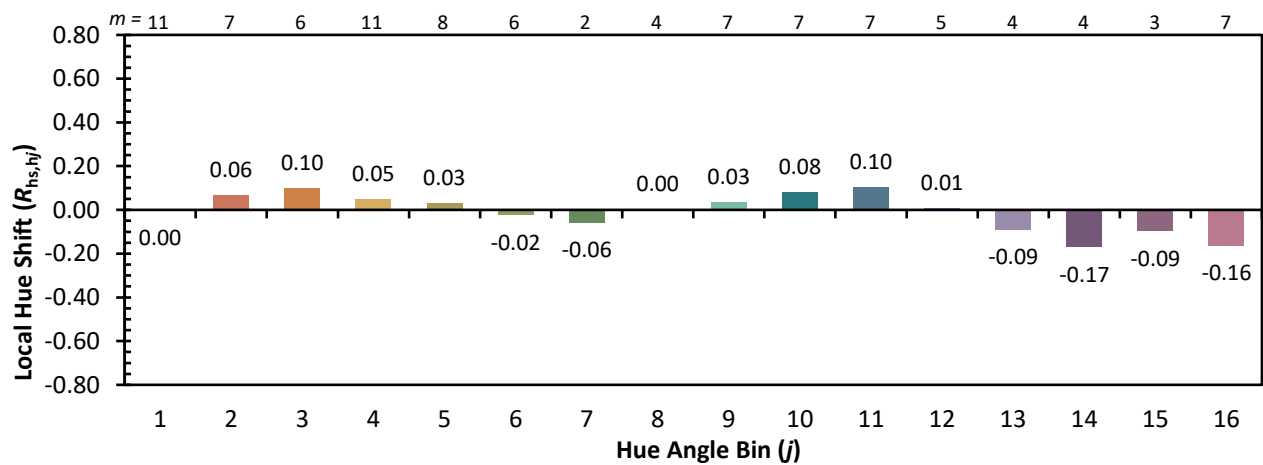
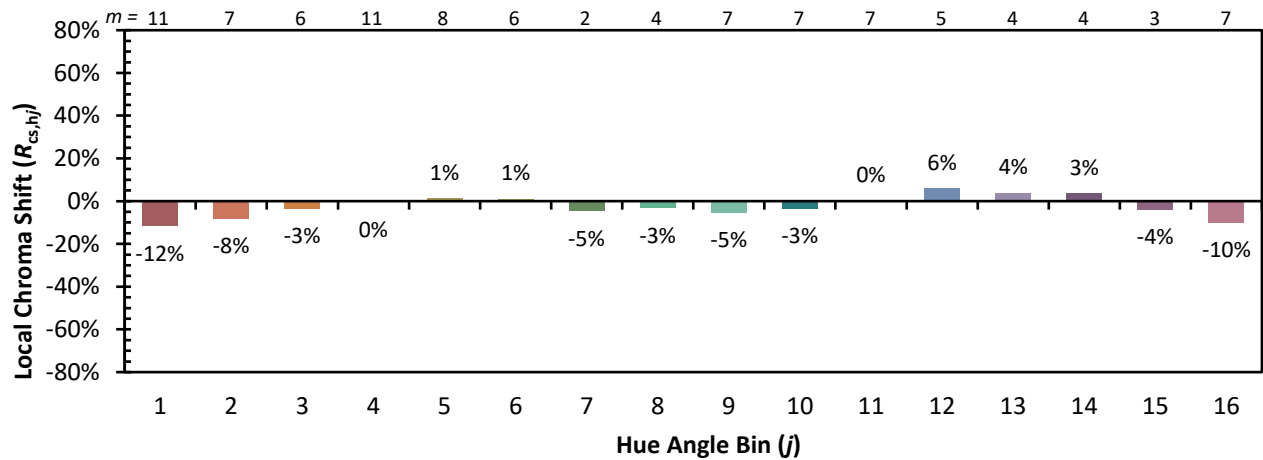


Individual Sample Fidelity Index ($R_{f,i}$)

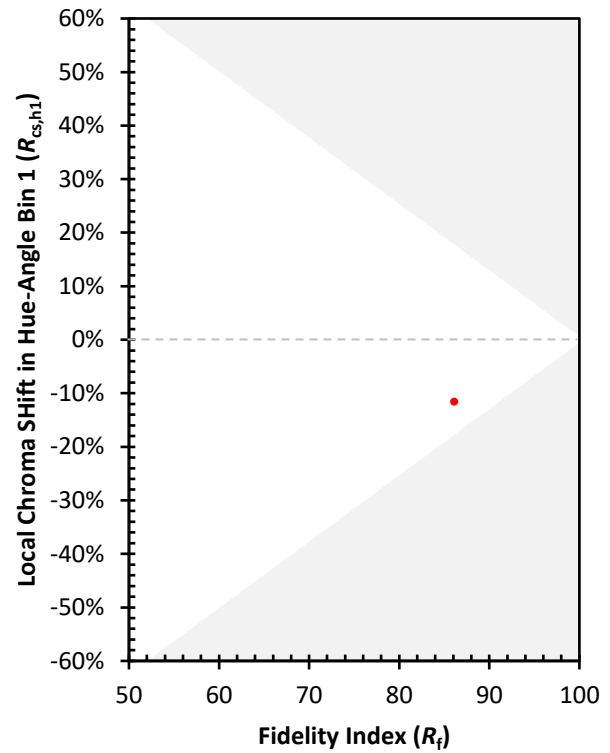
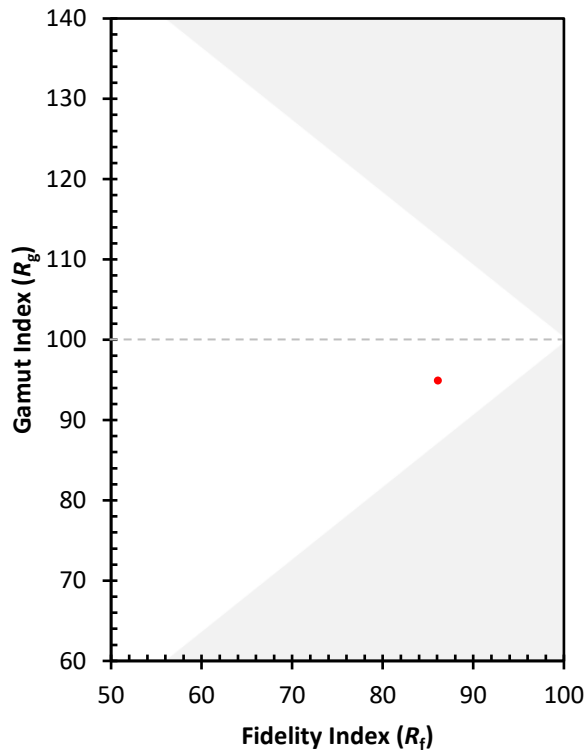
CES01 = 86	CES26 = 87	CES51 = 95	CES76 = 85
CES02 = 63	CES27 = 95	CES52 = 95	CES77 = 85
CES03 = 31	CES28 = 96	CES53 = 91	CES78 = 83
CES04 = 70	CES29 = 90	CES54 = 92	CES79 = 89
CES05 = 50	CES30 = 96	CES55 = 91	CES80 = 89
CES06 = 51	CES31 = 92	CES56 = 88	CES81 = 70
CES07 = 42	CES32 = 86	CES57 = 87	CES82 = 96
CES08 = 41	CES33 = 94	CES58 = 88	CES83 = 94
CES09 = 29	CES34 = 94	CES59 = 92	CES84 = 92
CES10 = 76	CES35 = 97	CES60 = 93	CES85 = 76
CES11 = 59	CES36 = 88	CES61 = 90	CES86 = 66
CES12 = 65	CES37 = 98	CES62 = 92	CES87 = 85
CES13 = 44	CES38 = 95	CES63 = 90	CES88 = 87
CES14 = 74	CES39 = 98	CES64 = 85	CES89 = 75
CES15 = 72	CES40 = 96	CES65 = 81	CES90 = 89
CES16 = 48	CES41 = 97	CES66 = 84	CES91 = 80
CES17 = 50	CES42 = 98	CES67 = 83	CES92 = 64
CES18 = 57	CES43 = 92	CES68 = 85	CES93 = 79
CES19 = 72	CES44 = 99	CES69 = 89	CES94 = 61
CES20 = 67	CES45 = 94	CES70 = 83	CES95 = 75
CES21 = 87	CES46 = 91	CES71 = 81	CES96 = 84
CES22 = 79	CES47 = 92	CES72 = 93	CES97 = 89
CES23 = 92	CES48 = 84	CES73 = 78	CES98 = 85
CES24 = 91	CES49 = 92	CES74 = 91	CES99 = 76
CES25 = 72	CES50 = 95	CES75 = 84	



Color Rendition by Hue-Angle Bin



Measure Comparisons



(END OF REPORT)