

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



Scaled data based on original data using
LM-79-2019 Approved Method: Electrical and Photometric Measurements of Solid-
State Lighting Products

Test Report Prepared for
Cooper Lighting Solutions

Brand: FAIL-SAFE

Report Number: P1356892

Luminaire Tested: 2ASL4-20VHE-3-A59-UNV

Issue Date: 2/17/2026

Test Information

Test Method: LM-79-2019
Report Number: P1356892
TEST IS SCALED FROM IESNA LM-79-08 TEST DATA (G2-2511-597-12)
Test Lab: INNOVATION CENTER
Issue Date: 2/17/2026
Manufacturer: COOPER LIGHTING SOLUTIONS
Product Line: FAIL-SAFE
Catalog Number: 2ASL4-20VHE-3-A59-UNV
Description: 2FT 2000 LUMEN PER FOOT 4ASL LED LUMINAIRE WITH OPL LENS AND A59 LEDS 3 ROW
Light Source: -
Ballast/Driver: -

Summary

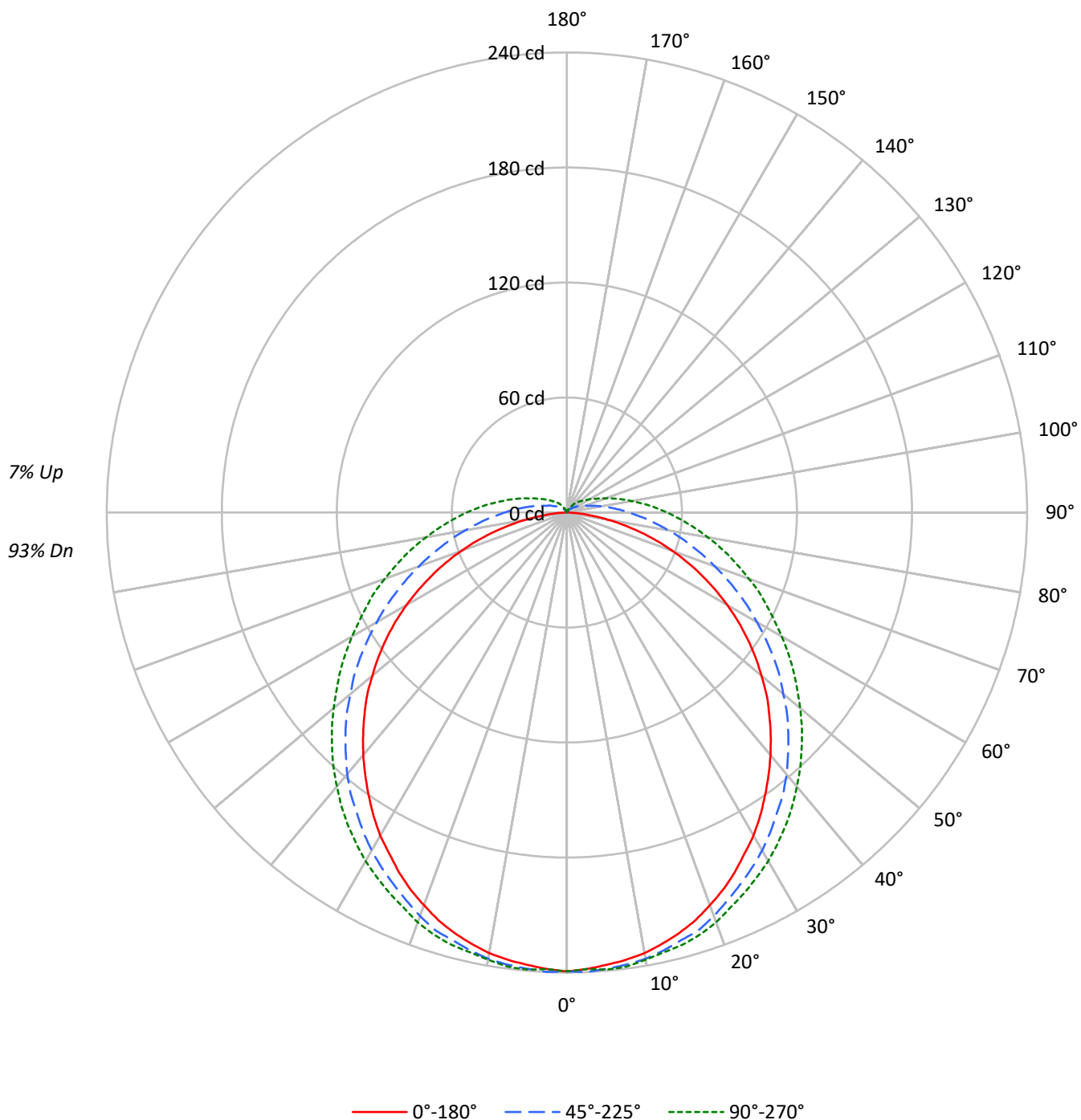
Lumens per Lamp: N/A
Luminaire Lumens: 814.0 lumens
Efficiency: N/A
Efficacy: 34.9 lumens/watt
Spacing Criteria (0/90/45): 1.21 / 1.3 / 1.39
Luminous Opening: Rectangular w/ Sides (W: 0.33' x L: 1.98' x H: 0.1')
CIE Type: Direct

Input Watts (W): 23.3
Input Voltage (V): NR
Input Current (Ain): NR
Voltage Rise (V): NR
Power Factor: NR
Total Harmonic Distortion (THDi): NR
Frequency (hertz): 60
Stabilization Time: NR
Operation Time: NR
Ambient Temperature (°C): NR
Test Distance: 24 FT

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CATALOG NUMBER: 2ASL4-20VHE-3-A59-UNV

Luminous Intensity Polar Plot



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CATALOG NUMBER: 2ASL4-20VHE-3-A59-UNV

COEFFICIENT OF UTILIZATION - ZONAL CAVITY METHOD:

RF	20				20				20				20				20
RC	80				70				50				30				10
RW	70	50	30	10	70	50	30	10	50	30	10		50	30	10		50
RCR																	
0	117	117	117	117	114	114	114	114	107	107	107		101	101	101		96
1	105	100	95	91	102	97	92	88	91	88	84		86	83	80		81
2	95	86	79	72	92	84	77	71	79	73	68		75	70	66		71
3	86	75	67	60	83	73	65	59	69	62	57		65	60	55		62
4	79	66	57	50	76	65	56	49	61	54	48		58	52	47		55
5	73	59	50	43	70	58	49	42	55	47	41		52	45	40		49
6	67	53	44	37	64	52	43	37	49	42	36		47	40	35		45
7	62	48	39	33	60	47	38	32	45	37	32		43	36	31		41
8	58	44	35	29	56	43	35	29	41	34	28		39	32	28		37
9	54	40	32	26	52	39	31	26	38	30	25		36	30	25		35
10	50	37	29	24	49	36	29	23	35	28	23		33	27	23		32

AVERAGE LUMINANCE (cd/sqm):

	0°	45°	90°
0°	3906	3906	3906
5°	3862	3826	3817
10°	3831	3746	3720
15°	3781	3648	3638
20°	3714	3555	3547
25°	3639	3439	3441
30°	3558	3338	3352
35°	3462	3224	3254
40°	3370	3120	3149
45°	3273	2995	3045
50°	3162	2859	2937
55°	3043	2731	2838
60°	2889	2582	2740
65°	2692	2438	2658
70°	2446	2291	2592
75°	2097	2157	2549
80°	1585	2051	2532
85°	877	2004	2567

MAXIMUM LUMINANCE 45°-90°:

Horizontal Angle: 0°

Vertical Angle: 45°

Luminance: 3273 cd/sqm

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ZONAL LUMENS:

Zone	Lumens	% Fixture
0°-10°	22.7	2.8
10°-20°	65.2	8.0
20°-30°	98.5	12.1
30°-40°	119.3	14.7
40°-50°	125.3	15.4
50°-60°	116.9	14.4
60°-70°	96.6	11.9
70°-80°	69.6	8.5
80°-90°	43.2	5.3
90°-100°	25.3	3.1
100°-110°	14.5	1.8
110°-120°	8.2	1.0
120°-130°	4.7	0.6
130°-140°	2.5	0.3
140°-150°	1.1	0.1
150°-160°	0.2	0.0
160°-170°	0.0	0.0
170°-180°	0.0	0.0
0°-30°	186.4	22.9
0°-40°	305.8	37.6
0°-60°	548.0	67.3
0°-90°	757.5	93.1
90°-120°	48.0	5.9
90°-150°	56.4	6.9
90°-180°	57.0	7.0
0°-180°	814.0	100.0

CANDELA DISTRIBUTION:

	0°	22.5°	45°	67.5°	90°	Flux
0°	239	239	239	239	239	
5°	237	239	239	239	239	23
15°	227	230	231	232	233	64
25°	207	210	214	217	219	95
35°	180	185	191	197	199	113
45°	149	155	163	170	173	115
55°	115	121	131	141	144	103
65°	78	85	98	110	115	77
75°	40	50	67	82	88	42
85°	8	22	42	57	63	9
90°	0	13	32	46	52	0
95°	0	8	24	37	43	0
105°	0	3	13	23	27	0
115°	0	2	8	14	17	0
125°	0	1	5	10	11	0
135°	0	0	3	6	8	0
145°	0	0	2	4	4	0
155°	0	0	0	1	2	0
165°	0	0	0	0	0	0
175°	0	0	0	0	0	0
180°	0	0	0	0	0	0

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CANDELA DISTRIBUTION (FULL):

	0°	22.5°	45°	67.5°	90°
0°	239.4	239.4	239.4	239.4	239.4
2.5°	238.4	239.9	239.9	238.4	238.4
5°	236.9	238.9	238.9	238.9	239.4
7.5°	235.4	237.9	237.9	237.9	238.9
10°	233.4	235.9	236.4	236.4	236.9
12.5°	230.4	233.4	233.9	234.4	234.9
15°	227.0	230.0	230.9	232.4	233.4
17.5°	223.0	226.5	228.5	230.0	230.9
20°	218.0	221.5	224.0	226.0	227.5
22.5°	213.0	216.0	219.0	221.5	223.0
25°	207.1	210.5	214.0	217.0	219.0
27.5°	200.6	204.6	209.0	212.5	214.5
30°	194.6	198.6	203.6	208.1	210.0
32.5°	187.6	192.1	197.6	202.1	204.6
35°	180.2	185.2	191.1	196.6	199.1
37.5°	172.7	177.7	185.2	190.6	193.1
40°	165.2	170.2	178.2	184.2	186.6
42.5°	157.3	162.3	170.7	177.2	180.2
45°	149.3	154.8	163.3	170.2	173.2
47.5°	141.4	146.8	155.8	163.3	166.2
50°	132.4	138.4	147.3	155.8	158.8
52.5°	123.9	129.9	139.9	148.3	151.3
55°	115.0	121.4	131.4	140.9	144.3
57.5°	106.0	112.5	122.9	132.9	136.9
60°	96.6	103.5	114.5	124.9	129.4
62.5°	87.1	94.6	106.5	117.5	121.9
65°	77.6	85.1	98.1	110.5	115.0
67.5°	68.2	76.2	90.1	103.0	108.5
70°	58.7	67.2	82.1	95.6	101.0
72.5°	49.3	58.2	74.7	88.6	94.1
75°	39.8	49.8	67.2	81.6	87.6
77.5°	30.4	41.8	60.7	75.2	81.1
80°	21.9	34.8	53.8	68.7	74.7
82.5°	13.9	27.9	47.8	62.7	68.7
85°	7.5	22.4	42.3	57.2	62.7
87.5°	2.5	17.4	36.8	51.8	57.2
90°	0.0	13.4	32.4	46.3	52.3
92.5°	0.0	10.5	28.4	41.8	47.3
95°	0.0	8.5	24.4	37.3	42.8
97.5°	0.0	7.0	21.4	33.3	38.3
100°	0.0	5.5	18.4	29.9	34.3
102.5°	0.0	4.5	15.9	26.4	30.9
105°	0.0	3.0	13.4	23.4	27.4
107.5°	0.0	2.5	11.4	20.9	24.4
110°	0.0	2.0	10.5	17.9	21.4

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CANDELA DISTRIBUTION (continued):

	0°	22.5°	45°	67.5°	90°
112.5°	0.0	1.5	9.5	15.9	19.4
115°	0.0	1.5	8.0	14.4	16.9
117.5°	0.0	1.5	7.0	12.9	15.4
120°	0.0	1.0	6.5	11.4	13.9
122.5°	0.0	1.0	5.5	10.5	12.4
125°	0.0	1.0	5.0	9.5	11.0
127.5°	0.0	0.5	4.5	8.5	10.0
130°	0.0	0.5	4.0	7.5	9.0
132.5°	0.0	0.5	3.5	7.0	8.5
135°	0.0	0.0	3.0	6.0	7.5
137.5°	0.0	0.0	2.5	5.5	6.5
140°	0.0	0.0	2.0	4.5	6.0
142.5°	0.0	0.0	1.5	4.0	5.0
145°	0.0	0.0	1.5	3.5	4.0
147.5°	0.0	0.0	1.0	2.5	3.5
150°	0.0	0.0	0.5	2.0	2.5
152.5°	0.0	0.0	0.0	1.5	2.0
155°	0.0	0.0	0.0	1.0	1.5
157.5°	0.0	0.0	0.0	0.0	0.5
160°	0.0	0.0	0.0	0.0	0.0
162.5°	0.0	0.0	0.0	0.0	0.0
165°	0.0	0.0	0.0	0.0	0.0
167.5°	0.0	0.0	0.0	0.0	0.0
170°	0.0	0.0	0.0	0.0	0.0
172.5°	0.0	0.0	0.0	0.0	0.0
175°	0.0	0.0	0.0	0.0	0.0
177.5°	0.0	0.0	0.0	0.0	0.0
180°	0.0	0.0	0.0	0.0	0.0

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CIE UGR TABLE:

Reflectances:											
Ceiling		0.7	0.7	0.5	0.5	0.3	0.7	0.7	0.5	0.5	0.3
Wall		0.5	0.3	0.5	0.3	0.3	0.5	0.3	0.5	0.3	0.3
Reference plane		0.2	0.2	0.2	0.2	0.2	0.2	0.2	0.2	0.2	0.2
Room dimensions		Viewed crosswise					Viewed endwise				
X=2H	Y=2H	14.04	15.58	14.50	16.03	16.51	15.98	17.52	16.45	17.97	18.46
	3H	15.54	16.94	16.02	17.40	17.93	18.41	19.81	18.89	20.27	20.80
	4H	16.02	17.35	16.52	17.83	18.37	19.57	20.90	20.07	21.39	21.92
	6H	16.29	17.53	16.81	18.03	18.58	20.78	22.02	21.29	22.51	23.07
	8H	16.35	17.53	16.87	18.05	18.61	21.39	22.57	21.91	23.09	23.65
	12H	16.36	17.50	16.89	18.01	18.60	22.04	23.18	22.57	23.69	24.28
4H	2H	14.90	16.23	15.40	16.71	17.25	16.42	17.75	16.92	18.23	18.77
	3H	16.63	17.77	17.15	18.29	18.85	19.07	20.21	19.59	20.73	21.29
	4H	17.24	18.28	17.77	18.81	19.41	20.41	21.45	20.94	21.98	22.58
	6H	17.64	18.55	18.19	19.12	19.72	21.81	22.72	22.36	23.29	23.89
	8H	17.73	18.59	18.29	19.16	19.78	22.52	23.38	23.08	23.95	24.57
	12H	17.78	18.56	18.36	19.15	19.78	23.30	24.08	23.88	24.67	25.29
8H	4H	17.90	18.76	18.46	19.33	19.95	20.63	21.49	21.19	22.05	22.67
	6H	18.48	19.21	19.07	19.81	20.44	22.20	22.93	22.79	23.53	24.16
	8H	18.66	19.32	19.27	19.94	20.57	23.05	23.71	23.66	24.33	24.97
	12H	18.78	19.37	19.38	19.97	20.67	24.01	24.60	24.62	25.21	25.91
12H	4H	18.09	18.87	18.67	19.46	20.08	20.64	21.42	21.22	22.01	22.64
	6H	18.76	19.42	19.37	20.04	20.68	22.24	22.90	22.84	23.51	24.15
	8H	19.04	19.63	19.65	20.23	20.94	23.16	23.75	23.77	24.35	25.06

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

Report Prepared for

Cooper Lighting Solutions

Fail-Safe

Report Number: SP1-2511-597-9

Test Date: 01/22/2026

Luminaire Tested: 4ASL-2-A590-UNV-OPL-1_600mA

Data in this report applies to families of products including 4ASL

Test Information

Test Method: LM-79-2019
 Report Number: SP1-2511-597-9
 Test Lab: COOPER LIGHTING SOLUTIONS
 Photometer: SP1 - 76IN SPHERE
 Measurement Geometry: 4π
 Issue Date: 01/29/2026
 Manufacturer: COOPER LIGHTING SOLUTIONS
 Product Line: Fail-Safe
 Catalog Number: **4ASL-2-A590-UNV-OPL-1_600mA**
 Description: 2foot 4ASL LED LUMINAIRE WITH OPL LENS AND AMBER 590 LEDS with 1 rows at 600mA

Spectral Parameters

CCT (K):	1535	CRI (Ra):	-20.0		
CIE u':	0.3534	R1:	-32.1	R9:	-380.5
CIE v':	0.5468	R2:	53.1	R10:	29.9
Duv:	0.0117	R3:	18.5	R11:	-92.0
CIE x:	0.5921	R4:	-65.7	R12:	-8.5
CIE y:	0.4072	R5:	-38.6	R13:	-13.5
CIE z:	0.0007	R6:	42.8	R14:	47.1
Peak Wavelength (nm):	598	R7:	-6.2	R15:	-65.4
Dominant Wavelength (nm):	592	R8:	-132.3		
Purity:	99.97894				
Rf:	1.3				
Rg:	0.1				



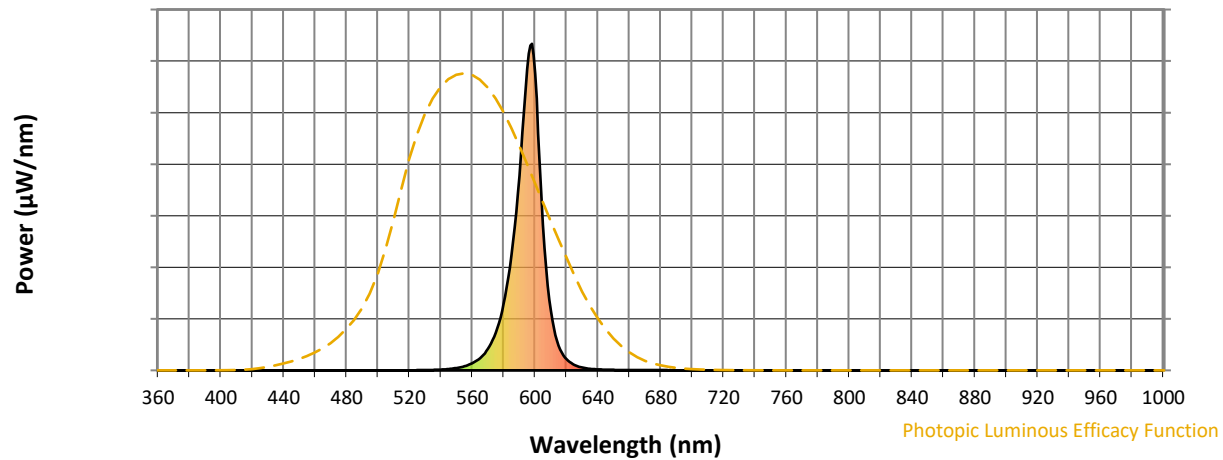
Test Conditions

Stabilization Time: 77M
 Operation Time: 2H 17M
 Sphere Temperature (°C): 25.1

REPORT NUMBER: SP1-2511-597-9

Measurement and Test Equipment			
Instrument	Identification Number	Calibration Date	Calibration Due Date
Photometer	76INCH SPHERE IN0058	12/16/2025	6/16/2026
Power Meter	XITRON INXT2011004	10/21/2025	10/21/2026
AC Power Source	CHROMA 61603 IN0063	10/21/2025	10/21/2026
DC Power Source	AGILENT E3634A IN0208	10/21/2025	10/21/2026
Sphere Thermometer	ONSET IN0085	10/21/2025	10/21/2026
Room Thermometer	ONSET IN0046	10/21/2025	10/21/2026

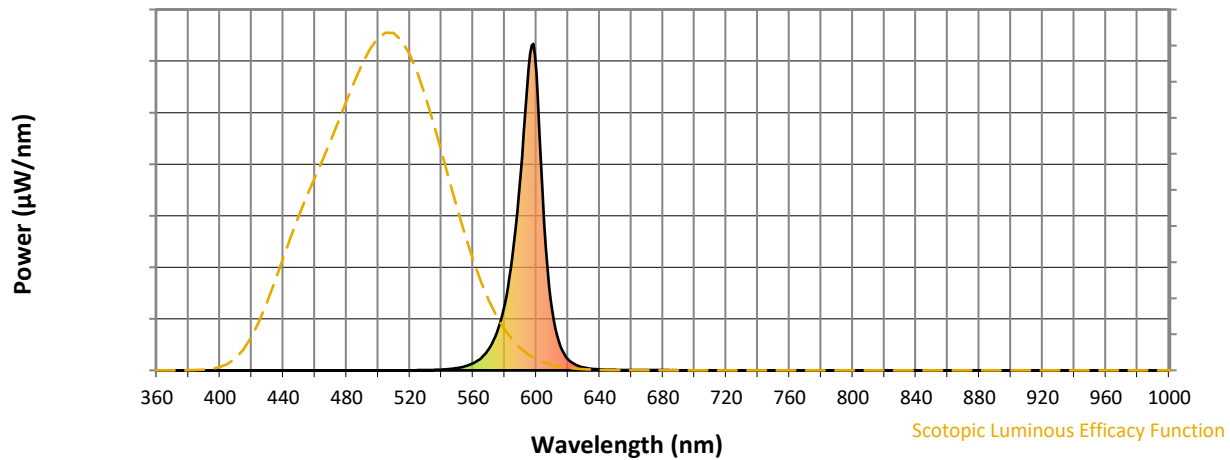
REPORT NUMBER: SP1-2511-597-9

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	0	NR	620	35	NR	750	0	NR	880	0	NR
365	0	NR	495	0	NR	625	17	NR	755	0	NR	885	0	NR
370	0	NR	500	0	NR	630	9	NR	760	0	NR	890	0	NR
375	0	NR	505	0	NR	635	5	NR	765	0	NR	895	0	NR
380	0	NR	510	0	NR	640	3	NR	770	0	NR	900	0	NR
385	0	NR	515	0	NR	645	2	NR	775	0	NR	905	0	NR
390	0	NR	520	0	NR	650	2	NR	780	0	NR	910	0	NR
395	0	NR	525	1	NR	655	1	NR	785	0	NR	915	0	NR
400	0	NR	530	1	NR	660	1	NR	790	0	NR	920	0	NR
405	0	NR	535	1	NR	665	1	NR	795	0	NR	925	0	NR
410	0	NR	540	2	NR	670	1	NR	800	0	NR	930	0	NR
415	0	NR	545	4	NR	675	1	NR	805	0	NR	935	0	NR
420	0	NR	550	7	NR	680	1	NR	810	0	NR	940	0	NR
425	0	NR	555	12	NR	685	0	NR	815	0	NR	945	0	NR
430	0	NR	560	22	NR	690	0	NR	820	0	NR	950	0	NR
435	0	NR	565	38	NR	695	0	NR	825	0	NR	955	0	NR
440	0	NR	570	66	NR	700	0	NR	830	0	NR	960	0	NR
445	0	NR	575	115	NR	705	0	NR	835	0	NR	965	0	NR
450	0	NR	580	203	NR	710	0	NR	840	0	NR	970	0	NR
455	0	NR	585	354	NR	715	0	NR	845	0	NR	975	0	NR
460	0	NR	590	596	NR	720	0	NR	850	0	NR	980	0	NR
465	0	NR	595	923	NR	725	0	NR	855	0	NR	985	0	NR
470	0	NR	600	909	NR	730	0	NR	860	0	NR	990	0	NR
475	0	NR	605	447	NR	735	0	NR	865	0	NR	995	0	NR
480	0	NR	610	183	NR	740	0	NR	870	0	NR	1000	0	NR
485	0	NR	615	75	NR	745	0	NR	875	0	NR			

REPORT NUMBER: SP1-2511-597-9

Scotopic Flux vs. Wavelength



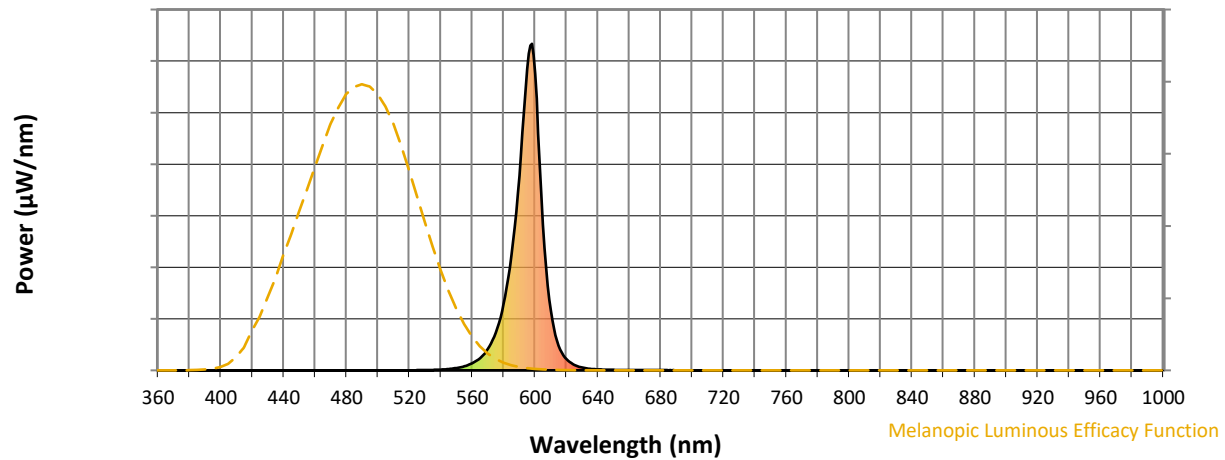
Scotopic Lumens: NR

S/P: 0.22

λ (nm)	Power W [^] /nm	Lumens (Φ/nm)	λ (nm)	Power W [^] /nm	Lumens (Φ/nm)	λ (nm)	Power W [^] /nm	Lumens (Φ/nm)	λ (nm)	Power W [^] /nm	Lumens (Φ/nm)	λ (nm)	Power W [^] /nm	Lumens (Φ/nm)
360	0	NR	490	0	NR	620	35	NR	750	0	NR	880	0	NR
365	0	NR	495	0	NR	625	17	NR	755	0	NR	885	0	NR
370	0	NR	500	0	NR	630	9	NR	760	0	NR	890	0	NR
375	0	NR	505	0	NR	635	5	NR	765	0	NR	895	0	NR
380	0	NR	510	0	NR	640	3	NR	770	0	NR	900	0	NR
385	0	NR	515	0	NR	645	2	NR	775	0	NR	905	0	NR
390	0	NR	520	0	NR	650	2	NR	780	0	NR	910	0	NR
395	0	NR	525	1	NR	655	1	NR	785	0	NR	915	0	NR
400	0	NR	530	1	NR	660	1	NR	790	0	NR	920	0	NR
405	0	NR	535	1	NR	665	1	NR	795	0	NR	925	0	NR
410	0	NR	540	2	NR	670	1	NR	800	0	NR	930	0	NR
415	0	NR	545	4	NR	675	1	NR	805	0	NR	935	0	NR
420	0	NR	550	7	NR	680	1	NR	810	0	NR	940	0	NR
425	0	NR	555	12	NR	685	0	NR	815	0	NR	945	0	NR
430	0	NR	560	22	NR	690	0	NR	820	0	NR	950	0	NR
435	0	NR	565	38	NR	695	0	NR	825	0	NR	955	0	NR
440	0	NR	570	66	NR	700	0	NR	830	0	NR	960	0	NR
445	0	NR	575	115	NR	705	0	NR	835	0	NR	965	0	NR
450	0	NR	580	203	NR	710	0	NR	840	0	NR	970	0	NR
455	0	NR	585	354	NR	715	0	NR	845	0	NR	975	0	NR
460	0	NR	590	596	NR	720	0	NR	850	0	NR	980	0	NR
465	0	NR	595	923	NR	725	0	NR	855	0	NR	985	0	NR
470	0	NR	600	909	NR	730	0	NR	860	0	NR	990	0	NR
475	0	NR	605	447	NR	735	0	NR	865	0	NR	995	0	NR
480	0	NR	610	183	NR	740	0	NR	870	0	NR	1000	0	NR
485	0	NR	615	75	NR	745	0	NR	875	0	NR			

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Melanopic Flux vs. Wavelength



Melanopic Lumens: NR

M/P: 0.12

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	0	NR	620	35	NR	750	0	NR	880	0	NR
365	0	NR	495	0	NR	625	17	NR	755	0	NR	885	0	NR
370	0	NR	500	0	NR	630	9	NR	760	0	NR	890	0	NR
375	0	NR	505	0	NR	635	5	NR	765	0	NR	895	0	NR
380	0	NR	510	0	NR	640	3	NR	770	0	NR	900	0	NR
385	0	NR	515	0	NR	645	2	NR	775	0	NR	905	0	NR
390	0	NR	520	0	NR	650	2	NR	780	0	NR	910	0	NR
395	0	NR	525	1	NR	655	1	NR	785	0	NR	915	0	NR
400	0	NR	530	1	NR	660	1	NR	790	0	NR	920	0	NR
405	0	NR	535	1	NR	665	1	NR	795	0	NR	925	0	NR
410	0	NR	540	2	NR	670	1	NR	800	0	NR	930	0	NR
415	0	NR	545	4	NR	675	1	NR	805	0	NR	935	0	NR
420	0	NR	550	7	NR	680	1	NR	810	0	NR	940	0	NR
425	0	NR	555	12	NR	685	0	NR	815	0	NR	945	0	NR
430	0	NR	560	22	NR	690	0	NR	820	0	NR	950	0	NR
435	0	NR	565	38	NR	695	0	NR	825	0	NR	955	0	NR
440	0	NR	570	66	NR	700	0	NR	830	0	NR	960	0	NR
445	0	NR	575	115	NR	705	0	NR	835	0	NR	965	0	NR
450	0	NR	580	203	NR	710	0	NR	840	0	NR	970	0	NR
455	0	NR	585	354	NR	715	0	NR	845	0	NR	975	0	NR
460	0	NR	590	596	NR	720	0	NR	850	0	NR	980	0	NR
465	0	NR	595	923	NR	725	0	NR	855	0	NR	985	0	NR
470	0	NR	600	909	NR	730	0	NR	860	0	NR	990	0	NR
475	0	NR	605	447	NR	735	0	NR	865	0	NR	995	0	NR
480	0	NR	610	183	NR	740	0	NR	870	0	NR	1000	0	NR
485	0	NR	615	75	NR	745	0	NR	875	0	NR			

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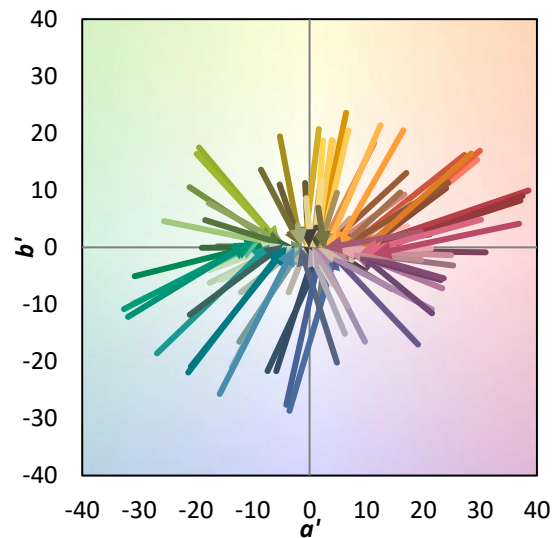
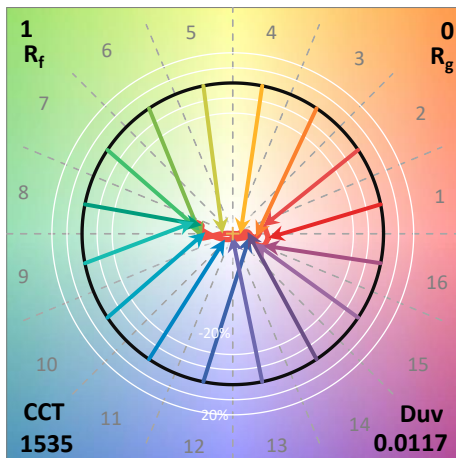
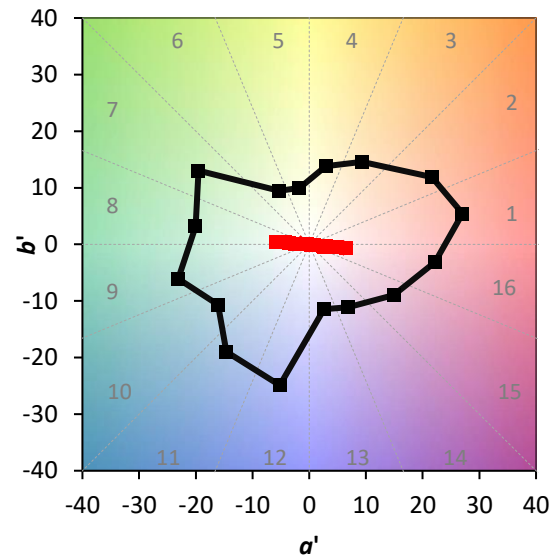
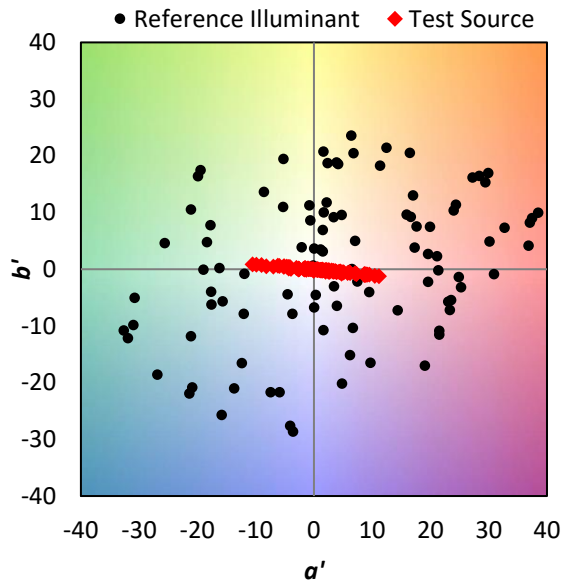
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Summary

$R_f = 1.3$
 $R_g = 0.1$
 $CIE\ R_a = -20.0$
 $R_g = -380.5$

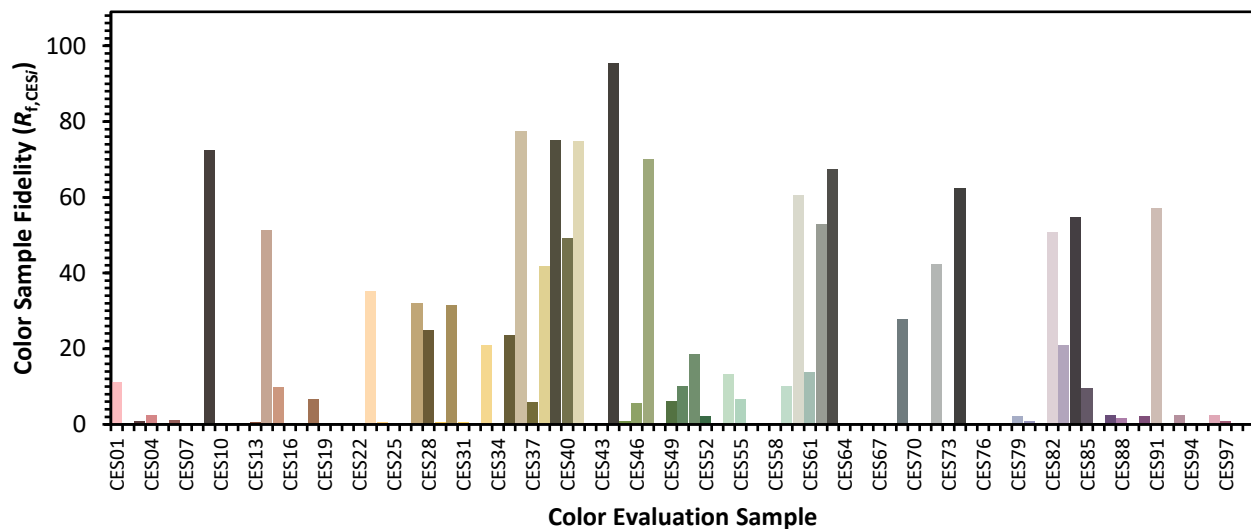


Color Vector Graphics

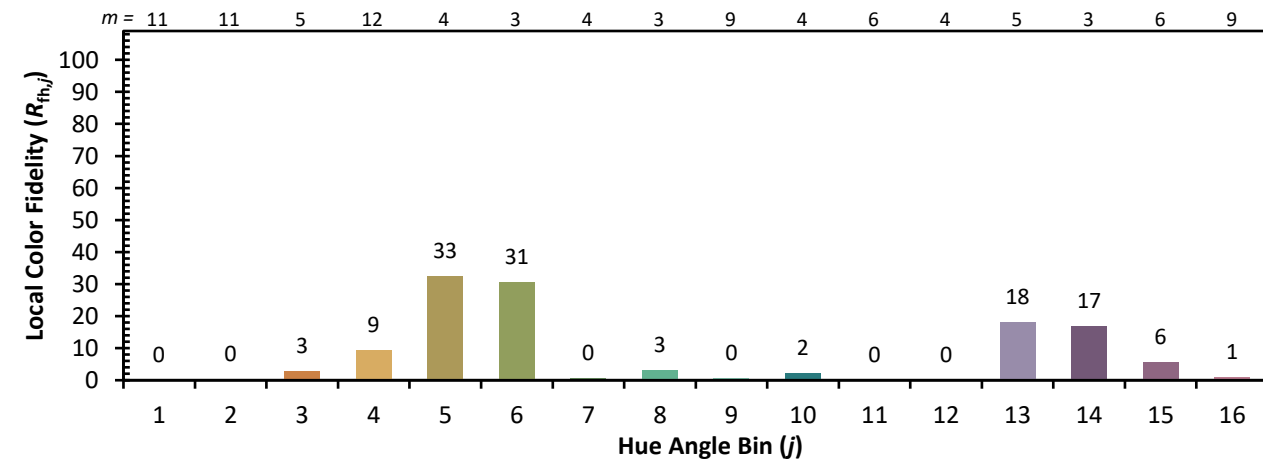
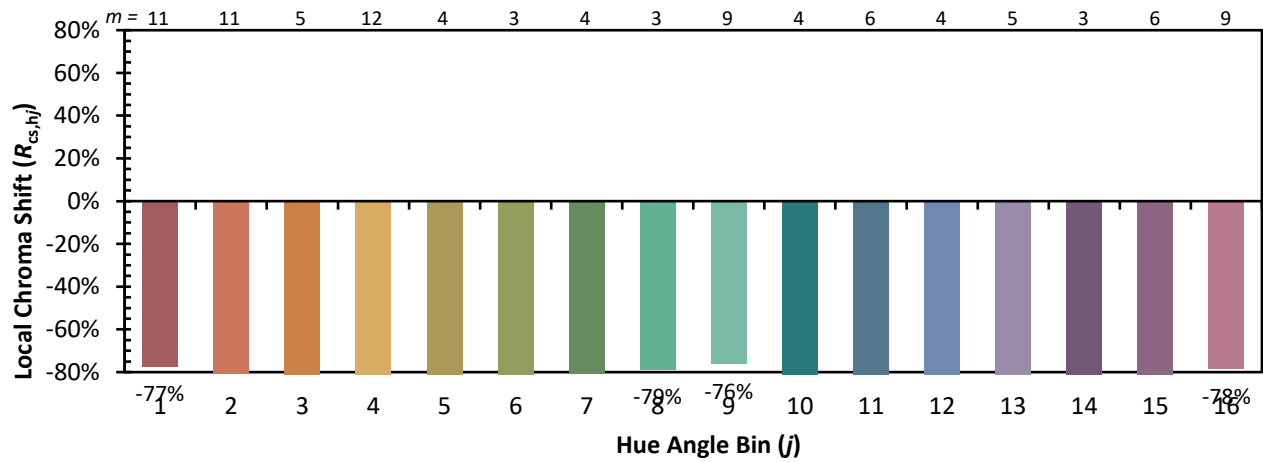


Individual Sample Fidelity Index ($R_{f,i}$)

CES01 = 90	CES26 = 0	CES51 = 19	CES76 = 0
CES02 = 70	CES27 = 32	CES52 = 2	CES77 = 0
CES03 = 31	CES28 = 25	CES53 = 0	CES78 = 0
CES04 = 77	CES29 = 1	CES54 = 13	CES79 = 2
CES05 = 52	CES30 = 31	CES55 = 7	CES80 = 1
CES06 = 56	CES31 = 1	CES56 = 0	CES81 = 0
CES07 = 41	CES32 = 0	CES57 = 0	CES82 = 51
CES08 = 39	CES33 = 21	CES58 = 0	CES83 = 21
CES09 = 29	CES34 = 0	CES59 = 10	CES84 = 55
CES10 = 87	CES35 = 24	CES60 = 60	CES85 = 10
CES11 = 70	CES36 = 77	CES61 = 14	CES86 = 0
CES12 = 76	CES37 = 6	CES62 = 53	CES87 = 2
CES13 = 47	CES38 = 42	CES63 = 68	CES88 = 2
CES14 = 77	CES39 = 75	CES64 = 0	CES89 = 0
CES15 = 74	CES40 = 49	CES65 = 0	CES90 = 2
CES16 = 49	CES41 = 75	CES66 = 0	CES91 = 57
CES17 = 56	CES42 = 0	CES67 = 0	CES92 = 0
CES18 = 60	CES43 = 0	CES68 = 0	CES93 = 3
CES19 = 80	CES44 = 95	CES69 = 28	CES94 = 0
CES20 = 71	CES45 = 1	CES70 = 0	CES95 = 0
CES21 = 94	CES46 = 6	CES71 = 0	CES96 = 2
CES22 = 87	CES47 = 70	CES72 = 42	CES97 = 1
CES23 = 94	CES48 = 0	CES73 = 0	CES98 = 0
CES24 = 95	CES49 = 6	CES74 = 62	CES99 = 0
CES25 = 79	CES50 = 10	CES75 = 0	



Color Rendition by Hue-Angle Bin



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Measure Comparisons



(END OF REPORT)