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: P1357491

Luminaire Tested: 8ASL4-20HE-2-R63-UNV

Issue Date: 2/17/2026

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

Scaled Data Report

Test Information

Test Method:	LM-79-2019
Report Number:	P1357491
	TEST IS SCALED FROM IESNA LM-79-08 TEST DATA (G2-2511-597-7)
Test Lab:	INNOVATION CENTER
Issue Date:	2/17/2026
Manufacturer:	COOPER LIGHTING SOLUTIONS
Product Line:	FAIL-SAFE
Catalog Number:	8ASL4-20HE-2-R63-UNV
Description:	8FT 2000 LUMEN PER FOOT 4ASL LED LUMINAIRE WITH OPL LENS AND R63 LEDS 2 ROW
Light Source:	-
Ballast/Driver:	-

Summary

Lumens per Lamp:	N/A
Luminaire Lumens:	4243.0 lumens
Efficiency:	N/A
Efficacy:	40.0 lumens/watt
Spacing Criteria (0/90/45):	1.21 / 1.3 / 1.4
Luminous Opening:	Rectangular w/ Sides (W: 0.33' x L: 7.98' x H: 0.1')
CIE Type:	Direct

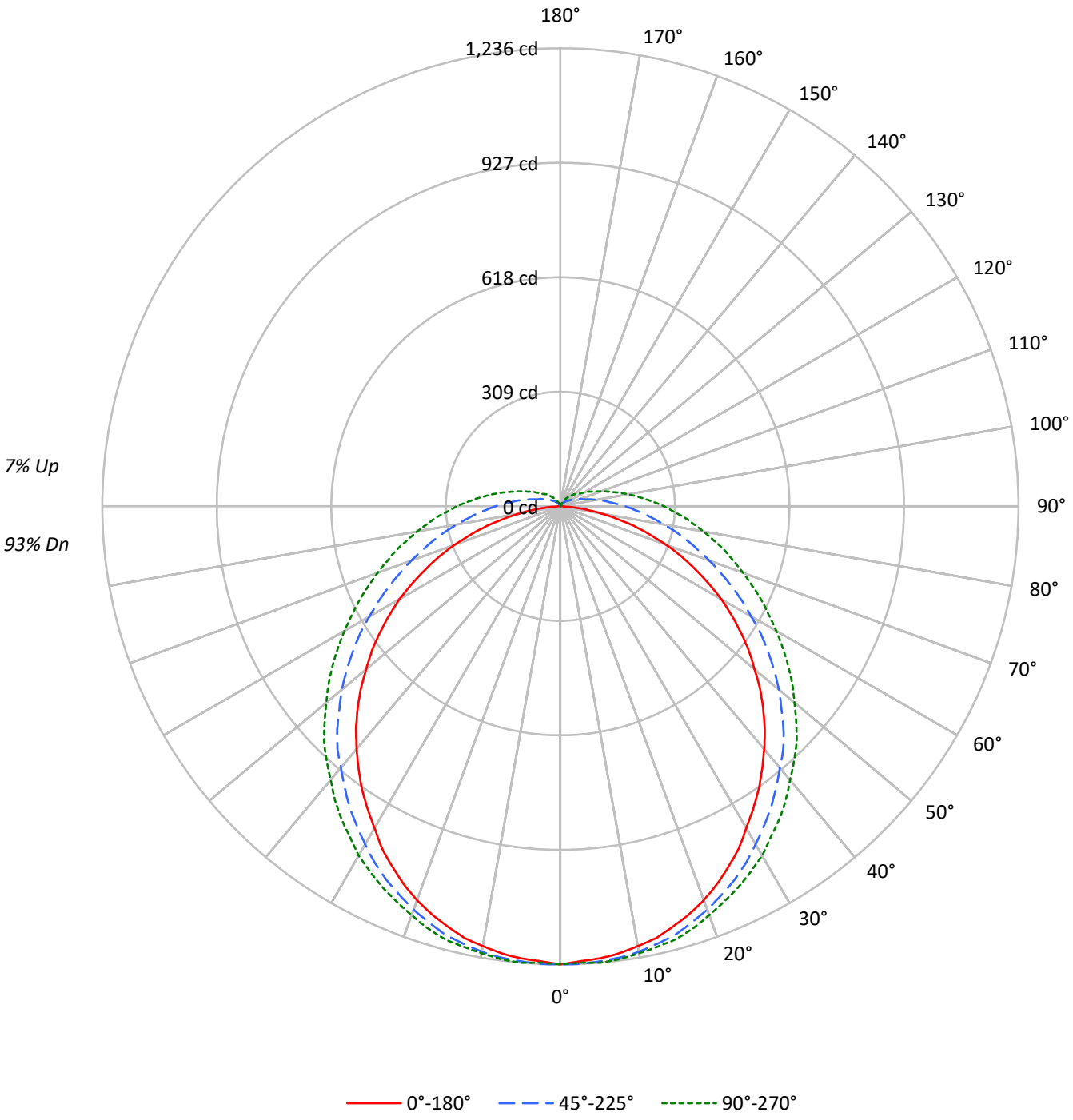
Input Watts (W):	106
Input Voltage (V):	NR
Input Current (Ain):	NR
Voltage Rise (V):	NR
Power Factor:	NR
Total Harmonic Distortion (THDi):	NR
Frequency (hertz):	60
Stabilization Time:	NR
Operation Time:	NR
Ambient Temperature (°C):	NR
Test Distance:	24 FT

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

Scaled Data Report

TEST NUMBER: P1357491
CATALOG NUMBER: 8ASL4-20HE-2-R63-UNV

Luminous Intensity Polar Plot



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

Scaled Data Report

TEST NUMBER: P1357491
CATALOG NUMBER: 8ASL4-20HE-2-R63-UNV

COEFFICIENT OF UTILIZATION - ZONAL CAVITY METHOD:

RF	20				20				20			20			20			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
RCR																		
0	117	117	117	117	114	114	114	114	107	107	107	101	101	101	95	95	95	93
1	105	100	95	90	102	97	92	88	91	87	84	86	83	80	81	79	77	74
2	95	86	79	72	92	84	77	71	79	73	68	74	70	65	70	66	63	60
3	86	75	66	59	83	73	65	58	69	62	56	65	59	55	62	57	53	50
4	79	66	57	50	76	64	56	49	61	54	48	58	51	46	55	49	45	42
5	72	59	50	43	70	57	49	42	54	47	41	52	45	40	49	43	39	36
6	67	53	44	37	64	52	43	37	49	41	36	47	40	35	44	39	34	32
7	62	48	39	33	60	47	38	32	45	37	32	43	36	31	41	35	30	28
8	58	44	35	29	56	43	34	29	41	33	28	39	32	28	37	31	27	25
9	54	40	32	26	52	39	31	26	37	30	25	36	29	25	34	29	24	22
10	50	37	29	24	49	36	28	23	35	28	23	33	27	22	32	26	22	20

AVERAGE LUMINANCE (cd/sqm):

	0°	45°	90°
0°	5002	5002	5002
5°	4968	4907	4887
10°	4940	4820	4768
15°	4901	4724	4673
20°	4848	4602	4539
25°	4761	4483	4423
30°	4651	4345	4308
35°	4567	4217	4175
40°	4469	4078	4034
45°	4369	3960	3932
50°	4241	3802	3780
55°	4119	3632	3659
60°	3969	3441	3531
65°	3729	3264	3432
70°	3463	3099	3341
75°	3071	2975	3310
80°	2446	2868	3300
85°	1572	2882	3394

MAXIMUM LUMINANCE 45°-90°:

Horizontal Angle: 0°
Vertical Angle: 45°
Luminance: 4369 cd/sqm

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

Scaled Data Report

TEST NUMBER: P1357491
CATALOG NUMBER: 8ASL4-20HE-2-R63-UNV

ZONAL LUMENS:

Zone	Lumens	% Fixture
0°-10°	117.2	2.8
10°-20°	336.9	7.9
20°-30°	510.5	12.0
30°-40°	617.5	14.6
40°-50°	650.9	15.3
50°-60°	607.5	14.3
60°-70°	501.6	11.8
70°-80°	363.9	8.6
80°-90°	229.9	5.4
90°-100°	137.2	3.2
100°-110°	78.7	1.9
110°-120°	44.7	1.1
120°-130°	25.5	0.6
130°-140°	13.8	0.3
140°-150°	6.0	0.1
150°-160°	1.1	0.0
160°-170°	0.0	0.0
170°-180°	0.0	0.0
0°-30°	964.7	22.7
0°-40°	1582.1	37.3
0°-60°	2840.6	66.9
0°-90°	3936.0	92.8
90°-120°	260.6	6.1
90°-150°	305.9	7.2
90°-180°	307.0	7.2
0°-180°	4243.0	100.0

CANDELA DISTRIBUTION:

	0°	22.5°	45°	67.5°	90°	Flux
0°	1236	1236	1236	1236	1236	
5°	1224	1236	1232	1232	1236	116
15°	1174	1189	1197	1201	1209	331
25°	1073	1088	1112	1127	1135	494
35°	933	956	991	1018	1030	583
45°	773	804	851	886	902	596
55°	595	630	684	731	750	531
65°	400	443	509	571	598	398
75°	206	260	354	428	459	217
85°	39	120	225	303	334	48
90°	0	74	175	249	280	2
95°	0	47	132	202	229	0
105°	0	16	74	128	148	0
115°	0	8	43	78	93	0
125°	0	4	27	50	58	0
135°	0	0	16	31	39	0
145°	0	0	8	19	23	0
155°	0	0	0	4	8	0
165°	0	0	0	0	0	0
175°	0	0	0	0	0	0
180°	0	0	0	0	0	

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

Scaled Data Report

TEST NUMBER: P1357491
CATALOG NUMBER: 8ASL4-20HE-2-R63-UNV

CANDELA DISTRIBUTION (FULL):

	0°	22.5°	45°	67.5°	90°
0°	1235.9	*1235.9*	1235.9	1235.9	1235.9
2.5°	*1228.2*	*1239.8*	*1235.9*	*1232.1*	*1232.1*
5°	1224.3	*1235.9*	1232.1	1232.1	1235.9
7.5°	1216.5	*1228.2*	1228.2	1228.2	1232.1
10°	1204.8	*1220.4*	1220.4	1220.4	1224.3
12.5°	1193.2	*1204.8*	1208.7	1212.6	1216.5
15°	1173.8	*1189.3*	1197.1	1201.0	1208.7
17.5°	1154.3	*1166.0*	1177.6	1189.3	1193.2
20°	1131.0	*1146.5*	1158.2	1169.9	1173.8
22.5°	1103.8	*1119.3*	1134.9	1146.5	1154.3
25°	1072.7	*1088.3*	1111.6	1127.1	1134.9
27.5°	1041.6	*1057.2*	1084.4	1103.8	1111.6
30°	1002.7	*1026.1*	1053.3	1076.6	1088.3
32.5°	967.8	*991.1*	1022.2	1049.4	1057.2
35°	932.8	*956.1*	991.1	1018.3	1030.0
37.5°	893.9	*921.1*	956.1	987.2	998.9
40°	855.1	*882.3*	921.1	956.1	963.9
42.5°	816.2	*843.4*	890.0	921.1	932.8
45°	773.4	*804.5*	851.2	886.1	901.7
47.5°	730.7	*761.8*	808.4	847.3	862.8
50°	684.0	*719.0*	769.5	808.4	824.0
52.5°	641.3	*676.3*	726.8	769.5	789.0
55°	594.7	*629.6*	684.0	730.7	750.1
57.5°	548.0	*583.0*	641.3	691.8	711.2
60°	501.4	*536.4*	594.7	653.0	672.4
62.5°	450.8	*489.7*	551.9	610.2	633.5
65°	400.3	*443.1*	509.1	571.3	598.5
67.5°	353.7	*396.4*	466.4	536.4	559.7
70°	303.2	*349.8*	427.5	497.5	524.7
72.5°	252.6	*303.2*	388.7	462.5	489.7
75°	206.0	*260.4*	353.7	427.5	458.6
77.5°	155.5	*221.5*	318.7	396.4	423.6
80°	112.7	*182.7*	283.7	365.3	392.5
82.5°	73.8	*147.7*	252.6	334.2	361.5
85°	38.9	*120.5*	225.4	303.2	334.2
87.5°	11.7	*93.3*	198.2	275.9	303.2
90°	0.0	*73.8*	174.9	248.7	279.8
92.5°	0.0	*58.3*	151.6	225.4	252.6
95°	0.0	*46.6*	132.1	202.1	229.3
97.5°	0.0	*38.9*	116.6	182.7	206.0
100°	0.0	*31.1*	101.1	163.2	186.6
102.5°	0.0	*23.3*	85.5	143.8	167.1
105°	0.0	*15.5*	73.8	128.3	147.7
107.5°	0.0	*11.7*	62.2	112.7	132.1
110°	0.0	*11.7*	58.3	97.2	116.6

TEST NUMBER: P1357491
CATALOG NUMBER: 8ASL4-20HE-2-R63-UNV

CANDELA DISTRIBUTION (continued):

	0°	22.5°	45°	67.5°	90°
112.5°	0.0	*7.8*	50.5	89.4	104.9
115°	0.0	*7.8*	42.8	77.7	93.3
117.5°	0.0	*7.8*	38.9	70.0	85.5
120°	0.0	*7.8*	35.0	62.2	73.8
122.5°	0.0	*3.9*	31.1	54.4	66.1
125°	0.0	*3.9*	27.2	50.5	58.3
127.5°	0.0	*3.9*	23.3	46.6	54.4
130°	0.0	*3.9*	23.3	42.8	50.5
132.5°	0.0	*0.0*	19.4	38.9	46.6
135°	0.0	*0.0*	15.5	31.1	38.9
137.5°	0.0	*0.0*	15.5	27.2	35.0
140°	0.0	*0.0*	11.7	27.2	31.1
142.5°	0.0	*0.0*	7.8	23.3	27.2
145°	0.0	*0.0*	7.8	19.4	23.3
147.5°	0.0	*0.0*	3.9	15.5	19.4
150°	0.0	*0.0*	3.9	11.7	15.5
152.5°	0.0	*0.0*	0.0	7.8	11.7
155°	0.0	*0.0*	0.0	3.9	7.8
157.5°	0.0	*0.0*	0.0	0.0	3.9
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

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

Scaled Data Report

TEST NUMBER: P1357491
CATALOG NUMBER: 8ASL4-20HE-2-R63-UNV

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	14.92	16.46	15.39	16.92	17.41	17.02	18.56	17.49	19.02	19.51
	3H	16.42	17.82	16.91	18.29	18.82	19.49	20.89	19.98	21.36	21.89
	4H	16.90	18.23	17.41	18.72	19.26	20.72	22.05	21.22	22.53	23.08
	6H	17.18	18.41	17.70	18.91	19.47	22.02	23.25	22.54	23.76	24.32
	8H	17.23	18.41	17.76	18.94	19.51	22.70	23.88	23.23	24.41	24.98
	12H	17.24	18.38	17.78	18.90	19.50	23.47	24.60	24.00	25.12	25.72
4H	2H	15.81	17.14	16.31	17.62	18.17	17.45	18.78	17.96	19.27	19.81
	3H	17.55	18.68	18.07	19.21	19.78	20.15	21.28	20.67	21.81	22.38
	4H	18.16	19.20	18.70	19.74	20.33	21.55	22.59	22.09	23.13	23.73
	6H	18.56	19.48	19.12	20.04	20.65	23.05	23.96	23.61	24.53	25.14
	8H	18.66	19.52	19.22	20.09	20.71	23.84	24.70	24.40	25.27	25.89
	12H	18.70	19.49	19.29	20.08	20.71	24.73	25.51	25.32	26.11	26.74
8H	4H	18.86	19.73	19.43	20.29	20.92	21.77	22.63	22.33	23.20	23.82
	6H	19.45	20.18	20.05	20.79	21.42	23.44	24.17	24.04	24.78	25.41
	8H	19.64	20.30	20.25	20.92	21.56	24.37	25.03	24.98	25.65	26.30
	12H	19.76	20.35	20.37	20.96	21.67	25.45	26.04	26.06	26.65	27.36
12H	4H	19.07	19.85	19.66	20.45	21.08	21.78	22.56	22.36	23.16	23.79
	6H	19.76	20.42	20.37	21.04	21.68	23.48	24.14	24.09	24.76	25.40
	8H	20.05	20.64	20.66	21.25	21.96	24.48	25.07	25.09	25.68	26.39

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

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

Report Prepared for

Cooper Lighting Solutions

Fail-Safe

Report Number: SP1-2511-597-7

Test Date: 01/21/2026

Luminaire Tested: 4ASL-2-R630-UNV-OPL-1_600mA

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

Report Generated By FNC07603 / LDUCLS01DT446
Version: v7.05

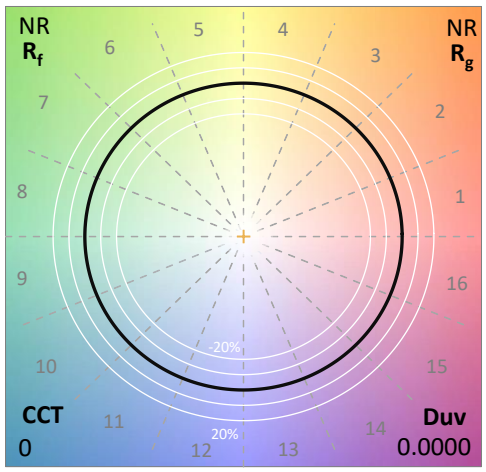
Test Information

Test Method:	LM-79-2019
Report Number:	SP1-2511-597-7
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-R630-UNV-OPL-1_600mA**
Description:	2foot 4ASL LED LUMINAIRE WITH OPL LENS AND RED 630NM LEDS with 1 rows at 600mA

Spectral Parameters

CCT (K):	0	CRI (Ra):	0.0		
CIE u':	0.5395	R1:	0.0	R9:	0.0
CIE v':	0.5190	R2:	0.0	R10:	0.0
Duv:	0.0000	R3:	0.0	R11:	0.0
CIE x:	0.7004	R4:	0.0	R12:	0.0
CIE y:	0.2995	R5:	0.0	R13:	0.0
CIE z:	0.0001	R6:	0.0	R14:	0.0
Peak Wavelength (nm):	638	R7:	0.0	R15:	0.0
Dominant Wavelength (nm):	624	R8:	0.0		
Purity:	99.9862				

Rf:	NR
Rg:	NR



Test Conditions

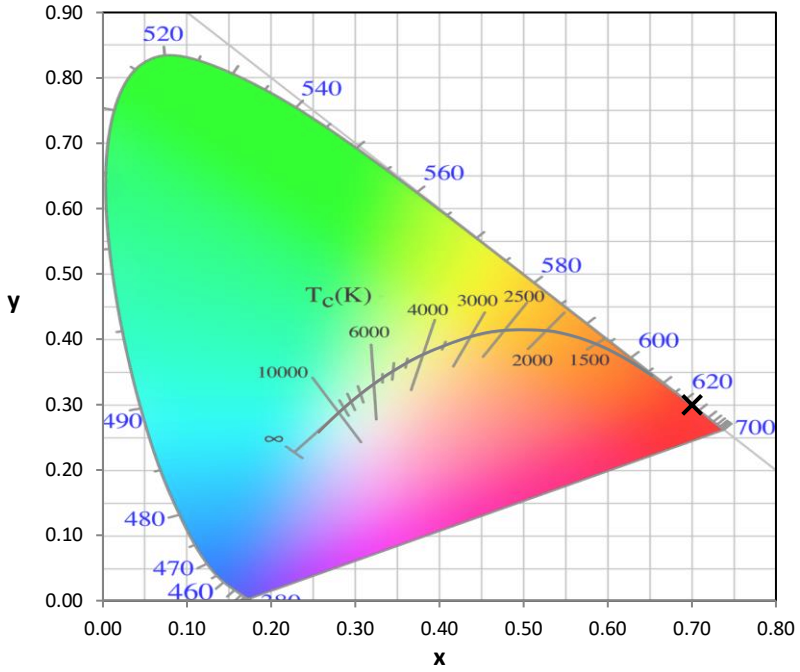
Stabilization Time:	69M
Operation Time:	2H 9M
Sphere Temperature (°C):	25.1

REPORT NUMBER: SP1-2511-597-7

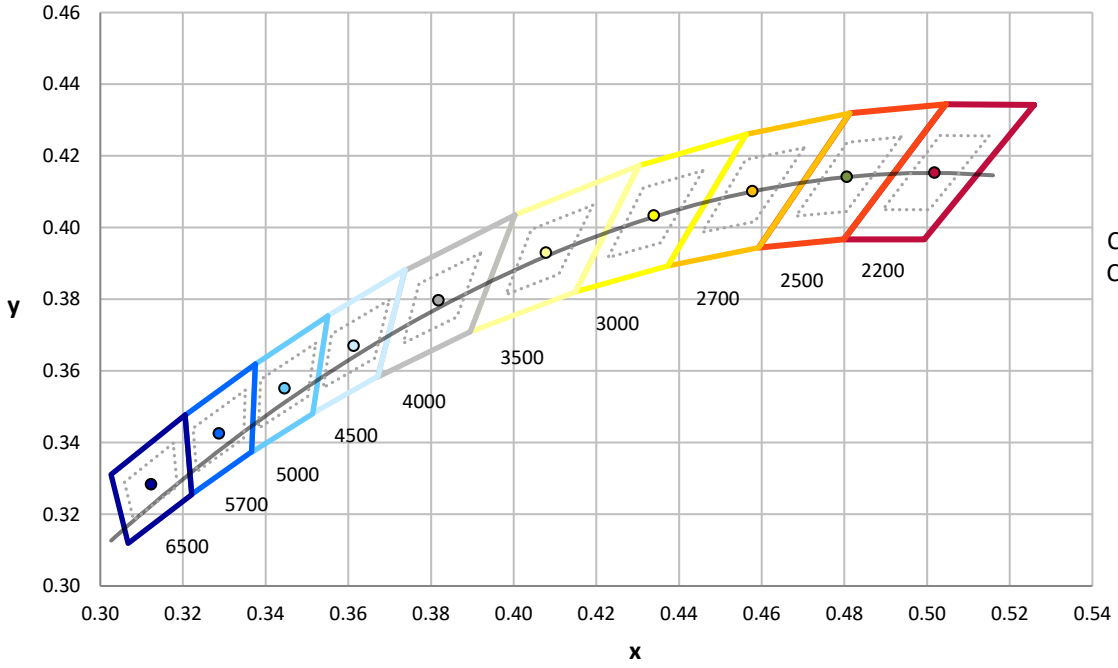
Measurement and Test Equipment			
Instrument	Identification Number	Calibration Date	Calibration Due Date
Photometer	76INCH SPHERE IN0058	12/16/2025	6/16/2026
Power Meter	XITRON INXT2011004	10/21/2025	10/21/2026
AC Power Source	CHROMA 61603 IN0063	10/21/2025	10/21/2026
DC Power Source	AGILENT E3634A IN0208	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: SP1-2511-597-7

CIE 1931 Chromaticity Diagram



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

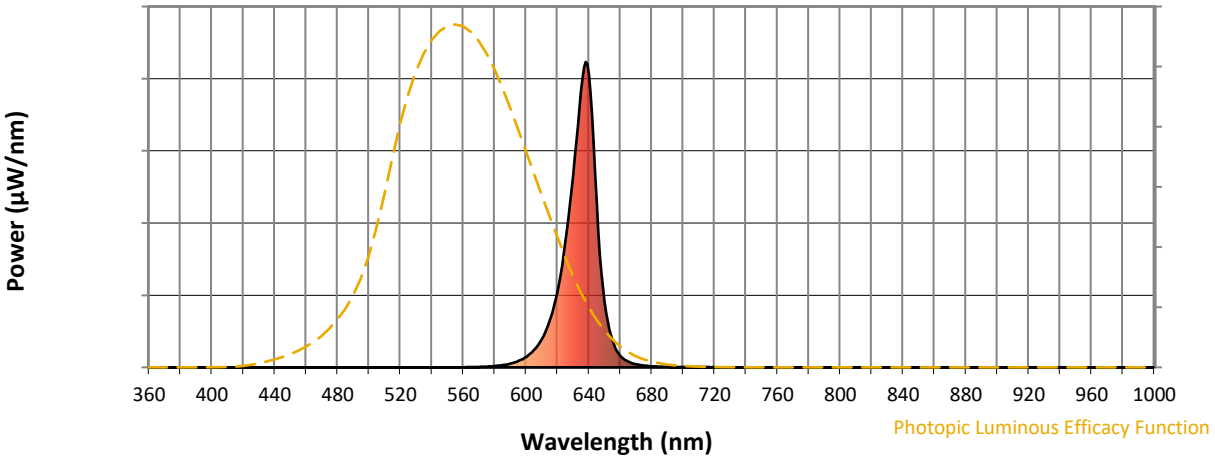


CCT = 0K
CIE x = 0.7004
CIE y = 0.2995
Duv = 0.0000

Point lies outside the range

REPORT NUMBER: SP1-2511-597-7

Photopic Flux vs. Wavelength

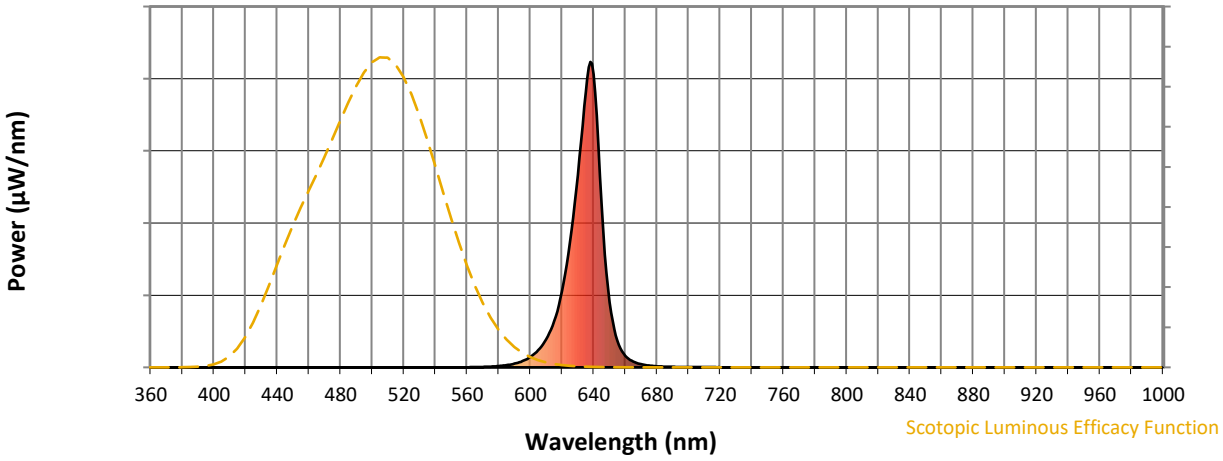


Photopic Lumens: NR

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	248	NR	750	0	NR	880	0	NR
365	0	NR	495	0	NR	625	409	NR	755	0	NR	885	0	NR
370	0	NR	500	0	NR	630	630	NR	760	0	NR	890	0	NR
375	0	NR	505	0	NR	635	903	NR	765	0	NR	895	0	NR
380	0	NR	510	0	NR	640	960	NR	770	0	NR	900	0	NR
385	0	NR	515	0	NR	645	535	NR	775	0	NR	905	0	NR
390	0	NR	520	0	NR	650	212	NR	780	0	NR	910	0	NR
395	0	NR	525	0	NR	655	88	NR	785	0	NR	915	0	NR
400	0	NR	530	0	NR	660	38	NR	790	0	NR	920	0	NR
405	0	NR	535	0	NR	665	19	NR	795	0	NR	925	0	NR
410	0	NR	540	0	NR	670	10	NR	800	0	NR	930	0	NR
415	0	NR	545	0	NR	675	6	NR	805	0	NR	935	0	NR
420	0	NR	550	0	NR	680	4	NR	810	0	NR	940	0	NR
425	0	NR	555	0	NR	685	2	NR	815	0	NR	945	0	NR
430	0	NR	560	0	NR	690	2	NR	820	0	NR	950	0	NR
435	0	NR	565	1	NR	695	1	NR	825	0	NR	955	0	NR
440	0	NR	570	2	NR	700	1	NR	830	0	NR	960	0	NR
445	0	NR	575	3	NR	705	1	NR	835	0	NR	965	0	NR
450	0	NR	580	4	NR	710	1	NR	840	0	NR	970	0	NR
455	0	NR	585	7	NR	715	1	NR	845	0	NR	975	0	NR
460	0	NR	590	12	NR	720	1	NR	850	0	NR	980	0	NR
465	0	NR	595	20	NR	725	0	NR	855	0	NR	985	0	NR
470	0	NR	600	34	NR	730	0	NR	860	0	NR	990	0	NR
475	0	NR	605	56	NR	735	0	NR	865	0	NR	995	0	NR
480	0	NR	610	92	NR	740	0	NR	870	0	NR	1000	0	NR
485	0	NR	615	152	NR	745	0	NR	875	0	NR			

REPORT NUMBER: SP1-2511-597-7

Scotopic Flux vs. Wavelength

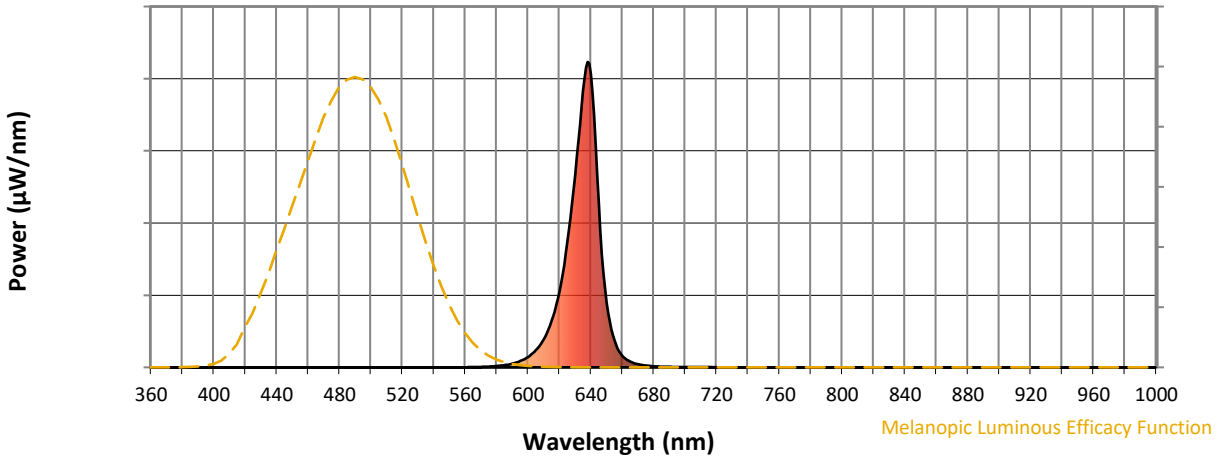


Scotopic Lumens: NR **S/P: 0.05**

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	248	NR	750	0	NR	880	0	NR
365	0	NR	495	0	NR	625	409	NR	755	0	NR	885	0	NR
370	0	NR	500	0	NR	630	630	NR	760	0	NR	890	0	NR
375	0	NR	505	0	NR	635	903	NR	765	0	NR	895	0	NR
380	0	NR	510	0	NR	640	960	NR	770	0	NR	900	0	NR
385	0	NR	515	0	NR	645	535	NR	775	0	NR	905	0	NR
390	0	NR	520	0	NR	650	212	NR	780	0	NR	910	0	NR
395	0	NR	525	0	NR	655	88	NR	785	0	NR	915	0	NR
400	0	NR	530	0	NR	660	38	NR	790	0	NR	920	0	NR
405	0	NR	535	0	NR	665	19	NR	795	0	NR	925	0	NR
410	0	NR	540	0	NR	670	10	NR	800	0	NR	930	0	NR
415	0	NR	545	0	NR	675	6	NR	805	0	NR	935	0	NR
420	0	NR	550	0	NR	680	4	NR	810	0	NR	940	0	NR
425	0	NR	555	0	NR	685	2	NR	815	0	NR	945	0	NR
430	0	NR	560	0	NR	690	2	NR	820	0	NR	950	0	NR
435	0	NR	565	1	NR	695	1	NR	825	0	NR	955	0	NR
440	0	NR	570	2	NR	700	1	NR	830	0	NR	960	0	NR
445	0	NR	575	3	NR	705	1	NR	835	0	NR	965	0	NR
450	0	NR	580	4	NR	710	1	NR	840	0	NR	970	0	NR
455	0	NR	585	7	NR	715	1	NR	845	0	NR	975	0	NR
460	0	NR	590	12	NR	720	1	NR	850	0	NR	980	0	NR
465	0	NR	595	20	NR	725	0	NR	855	0	NR	985	0	NR
470	0	NR	600	34	NR	730	0	NR	860	0	NR	990	0	NR
475	0	NR	605	56	NR	735	0	NR	865	0	NR	995	0	NR
480	0	NR	610	92	NR	740	0	NR	870	0	NR	1000	0	NR
485	0	NR	615	152	NR	745	0	NR	875	0	NR			

REPORT NUMBER: SP1-2511-597-7

Melanopic Flux vs. Wavelength



Melanopic Lumens: NR **M/P: 0.02**

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	248	NR	750	0	NR	880	0	NR
365	0	NR	495	0	NR	625	409	NR	755	0	NR	885	0	NR
370	0	NR	500	0	NR	630	630	NR	760	0	NR	890	0	NR
375	0	NR	505	0	NR	635	903	NR	765	0	NR	895	0	NR
380	0	NR	510	0	NR	640	960	NR	770	0	NR	900	0	NR
385	0	NR	515	0	NR	645	535	NR	775	0	NR	905	0	NR
390	0	NR	520	0	NR	650	212	NR	780	0	NR	910	0	NR
395	0	NR	525	0	NR	655	88	NR	785	0	NR	915	0	NR
400	0	NR	530	0	NR	660	38	NR	790	0	NR	920	0	NR
405	0	NR	535	0	NR	665	19	NR	795	0	NR	925	0	NR
410	0	NR	540	0	NR	670	10	NR	800	0	NR	930	0	NR
415	0	NR	545	0	NR	675	6	NR	805	0	NR	935	0	NR
420	0	NR	550	0	NR	680	4	NR	810	0	NR	940	0	NR
425	0	NR	555	0	NR	685	2	NR	815	0	NR	945	0	NR
430	0	NR	560	0	NR	690	2	NR	820	0	NR	950	0	NR
435	0	NR	565	1	NR	695	1	NR	825	0	NR	955	0	NR
440	0	NR	570	2	NR	700	1	NR	830	0	NR	960	0	NR
445	0	NR	575	3	NR	705	1	NR	835	0	NR	965	0	NR
450	0	NR	580	4	NR	710	1	NR	840	0	NR	970	0	NR
455	0	NR	585	7	NR	715	1	NR	845	0	NR	975	0	NR
460	0	NR	590	12	NR	720	1	NR	850	0	NR	980	0	NR
465	0	NR	595	20	NR	725	0	NR	855	0	NR	985	0	NR
470	0	NR	600	34	NR	730	0	NR	860	0	NR	990	0	NR
475	0	NR	605	56	NR	735	0	NR	865	0	NR	995	0	NR
480	0	NR	610	92	NR	740	0	NR	870	0	NR	1000	0	NR
485	0	NR	615	152	NR	745	0	NR	875	0	NR			

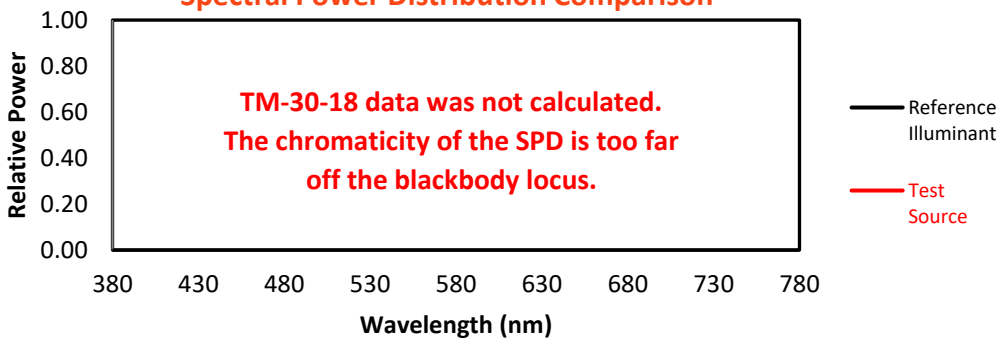
REPORT NUMBER: SP1-2511-597-7

TM-30-18

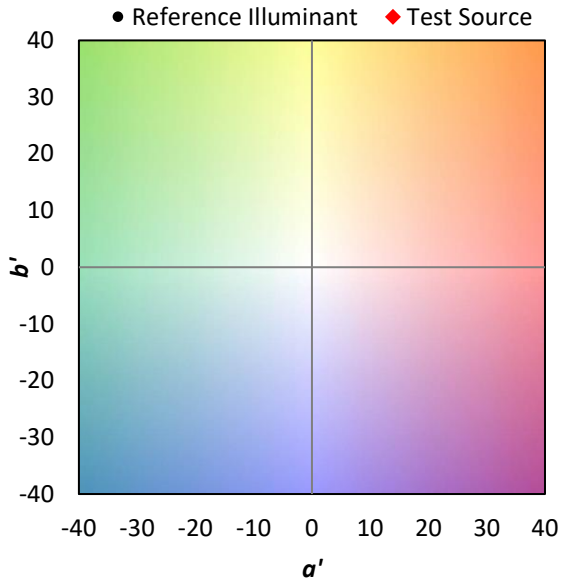
Summary

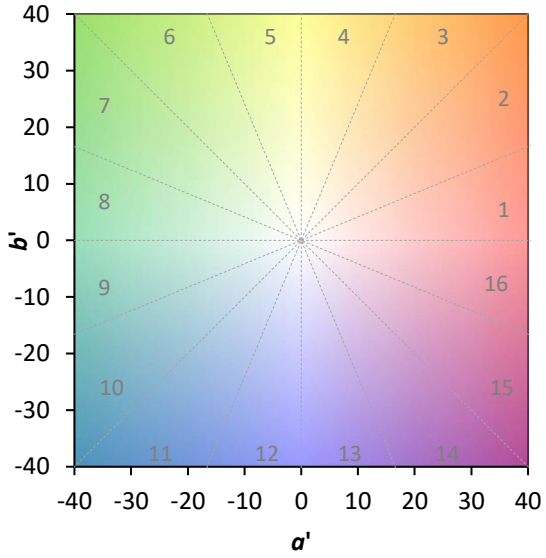
R_f = 0
R_g = 0
CIE R_a = 0.0
R_9 = 0.0

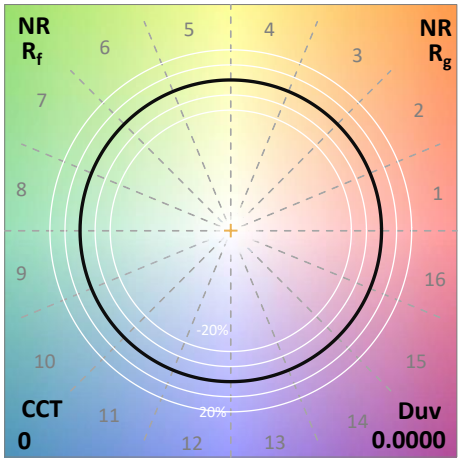
Spectral Power Distribution Comparison

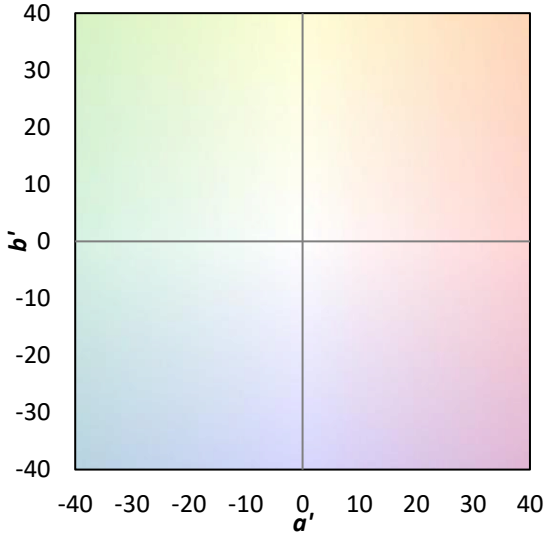


Color Vector Graphics







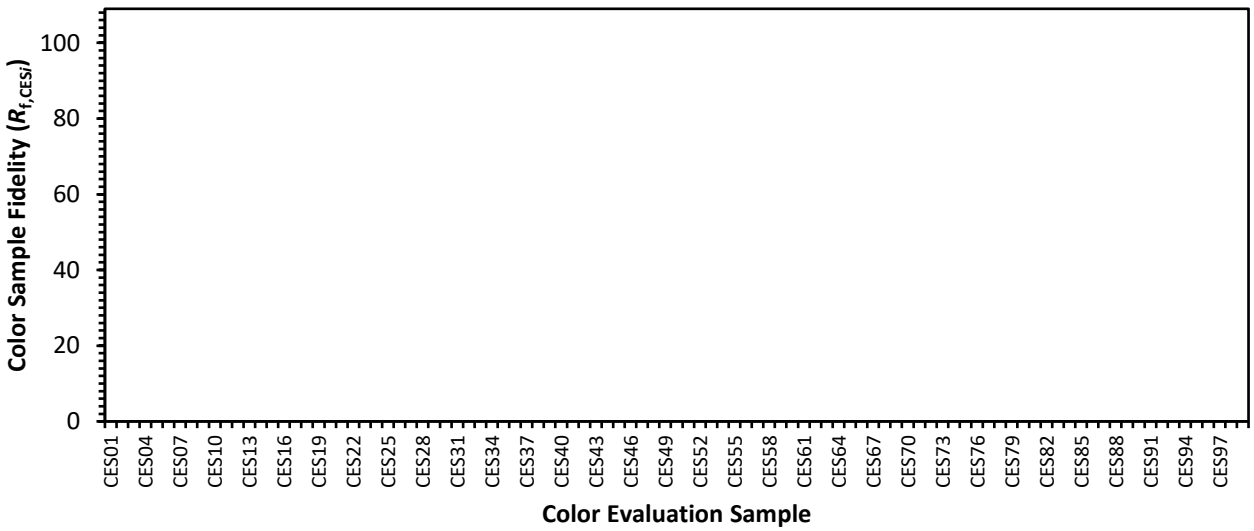


REPORT NUMBER: SP1-2511-597-7

TM-30-18

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

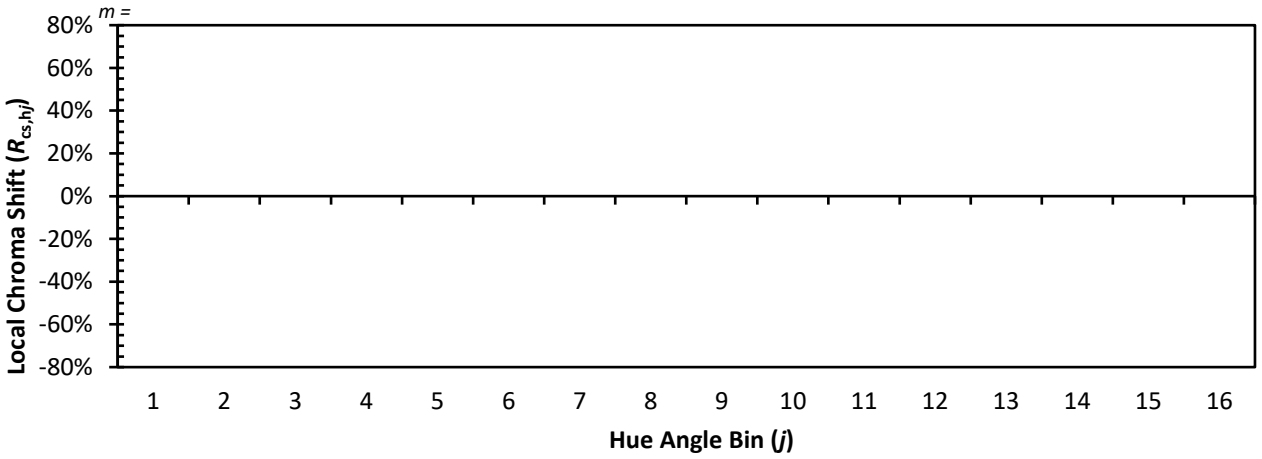
CES01 = 0	CES26 = 0	CES51 = 0	CES76 = 0
CES02 = 0	CES27 = 0	CES52 = 0	CES77 = 0
CES03 = 0	CES28 = 0	CES53 = 0	CES78 = 0
CES04 = 0	CES29 = 0	CES54 = 0	CES79 = 0
CES05 = 0	CES30 = 0	CES55 = 0	CES80 = 0
CES06 = 0	CES31 = 0	CES56 = 0	CES81 = 0
CES07 = 0	CES32 = 0	CES57 = 0	CES82 = 0
CES08 = 0	CES33 = 0	CES58 = 0	CES83 = 0
CES09 = 0	CES34 = 0	CES59 = 0	CES84 = 0
CES10 = 0	CES35 = 0	CES60 = 0	CES85 = 0
CES11 = 0	CES36 = 0	CES61 = 0	CES86 = 0
CES12 = 0	CES37 = 0	CES62 = 0	CES87 = 0
CES13 = 0	CES38 = 0	CES63 = 0	CES88 = 0
CES14 = 0	CES39 = 0	CES64 = 0	CES89 = 0
CES15 = 0	CES40 = 0	CES65 = 0	CES90 = 0
CES16 = 0	CES41 = 0	CES66 = 0	CES91 = 0
CES17 = 0	CES42 = 0	CES67 = 0	CES92 = 0
CES18 = 0	CES43 = 0	CES68 = 0	CES93 = 0
CES19 = 0	CES44 = 0	CES69 = 0	CES94 = 0
CES20 = 0	CES45 = 0	CES70 = 0	CES95 = 0
CES21 = 0	CES46 = 0	CES71 = 0	CES96 = 0
CES22 = 0	CES47 = 0	CES72 = 0	CES97 = 0
CES23 = 0	CES48 = 0	CES73 = 0	CES98 = 0
CES24 = 0	CES49 = 0	CES74 = 0	CES99 = 0
CES25 = 0	CES50 = 0	CES75 = 0	

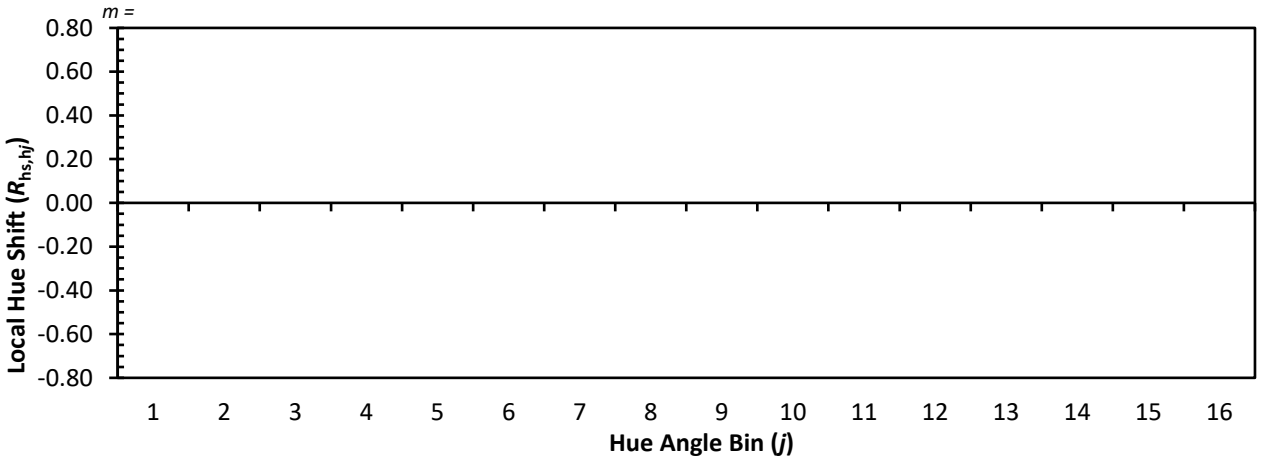


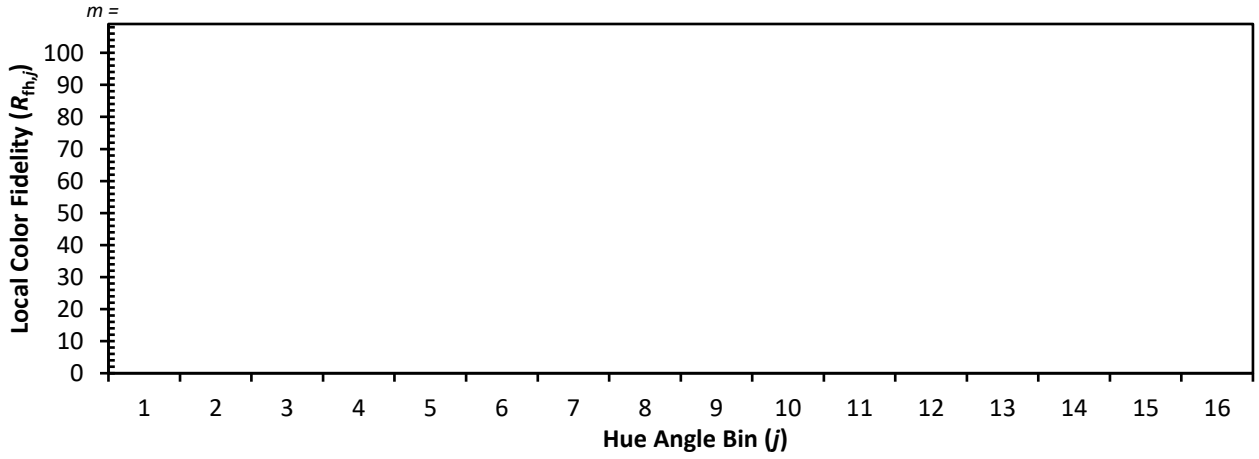
REPORT NUMBER: SP1-2511-597-7

TM-30-18

Color Rendition by Hue-Angle Bin



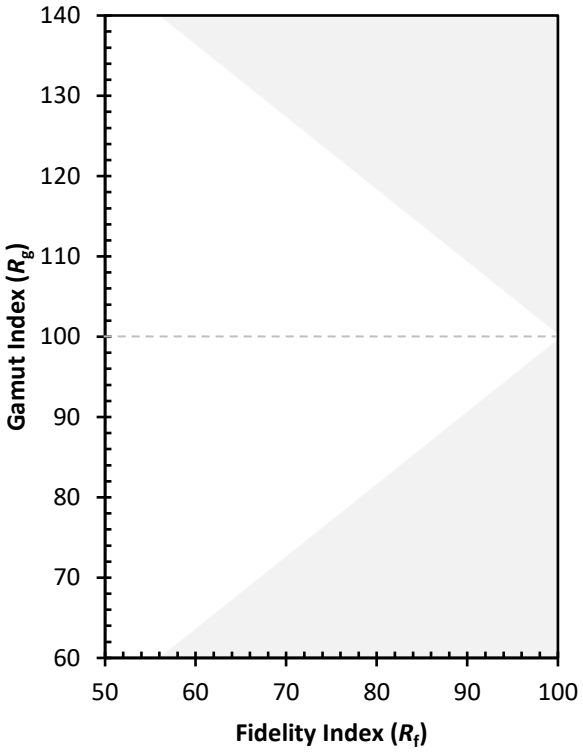


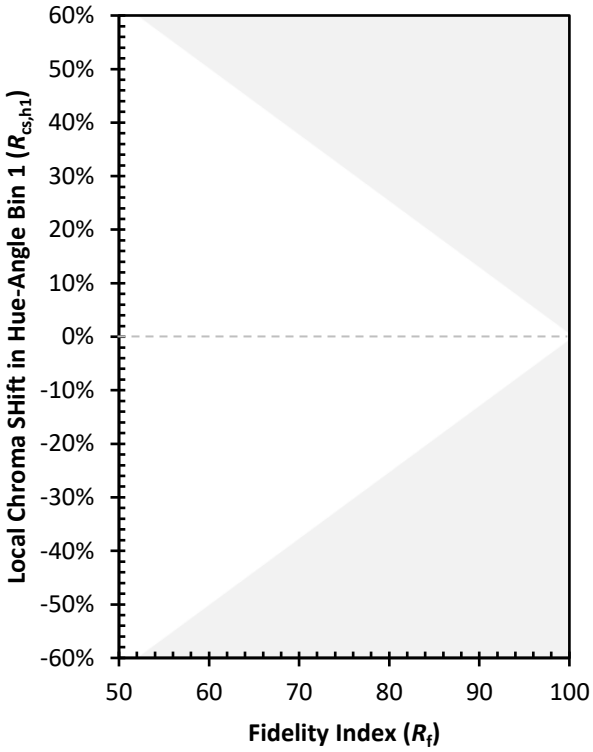


REPORT NUMBER: SP1-2511-597-7

TM-30-18

Measure Comparisons





(END OF REPORT)