

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: CORELITE

Report Number: P1215728

Luminaire Tested: 24-ID2-70-CFR2-L950-U

Issue Date: 12/5/2025

Test Information

Test Method: LM-79-2019
Report Number: P1215728
TEST IS SCALED FROM IESNA LM-79-08 TEST DATA (G3-2508-510-7)
Test Lab: INNOVATION CENTER
Issue Date: 12/5/2025
Manufacturer: COOPER LIGHTING SOLUTIONS
Product Line: CORELITE
Catalog Number: 24-ID2-70-CFR2-L950-U
Description: 2X4 IN DEPTH TROFFER WITH 2INCH CUBE REGRESS LENS
Light Source: 5000K CCT, 90 CRI LEDS
Ballast/Driver: ELECTRONIC DRIVER

Summary

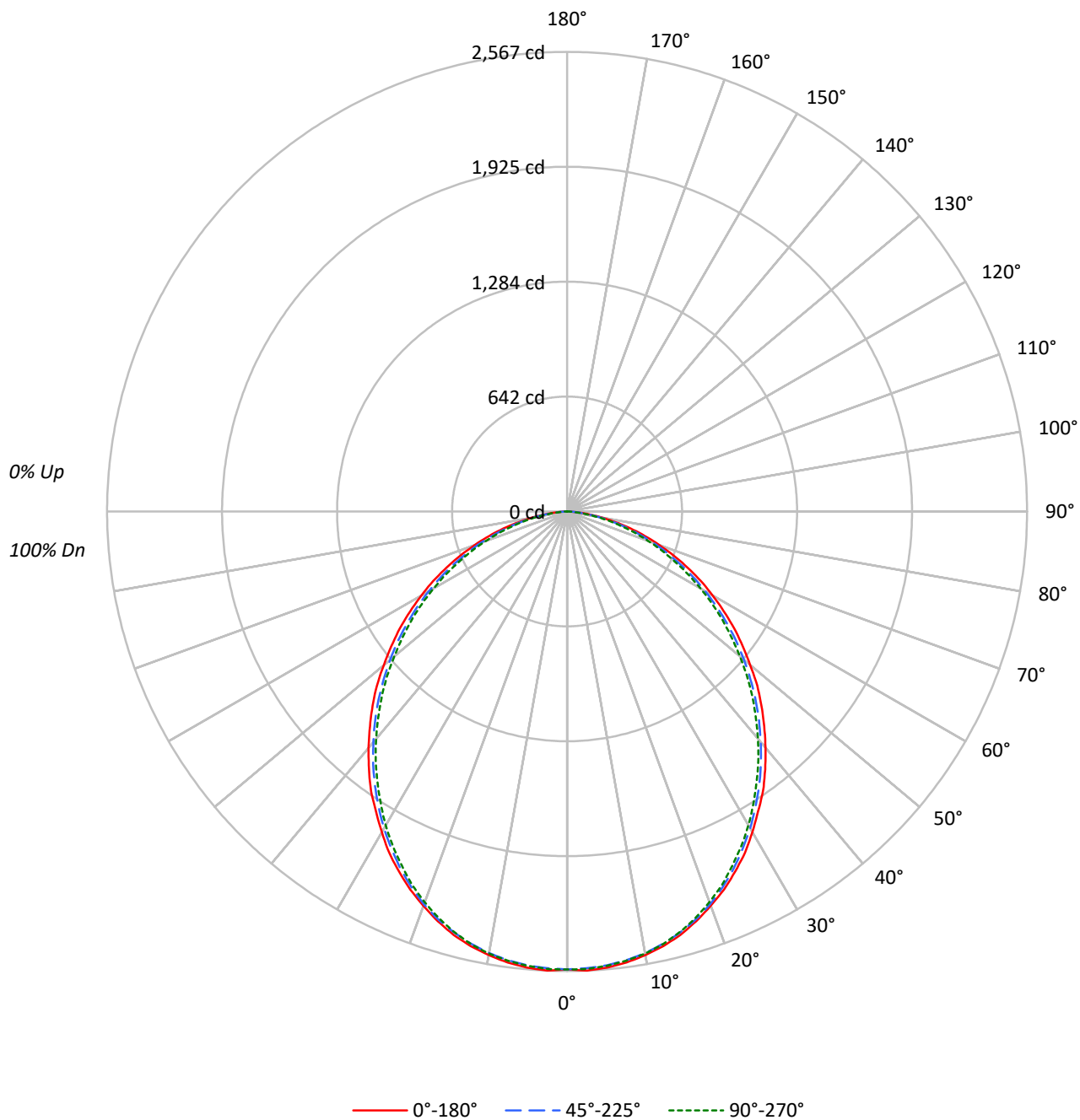
Lumens per Lamp: N/A
Luminaire Lumens: 6366.6 lumens
Efficiency: N/A
Efficacy: 105.4 lumens/watt
Spacing Criteria (0/90/45): 1.2 / 1.18 / 1.29
Luminous Opening: Rectangular (W 2' x L: 4' x H: 0')
CIE Type: Direct

Input Watts (W): 60.4
Input Voltage (V): 120
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



TEST NUMBER: P1215728
CATALOG NUMBER: 24-ID2-70-CFR2-L950-U

Luminous Intensity Polar Plot



TEST NUMBER: P1215728

CATALOG NUMBER: 24-ID2-70-CFR2-L950-U

COEFFICIENT OF UTILIZATION - ZONAL CAVITY METHOD:

RF	20				20					20					20					20
RC	80				70					50					30					0
RW	70	50	30	10	70	50	30	10		50	30	10			50	30	10			0
RCR																				
0	119	119	119	119	116	116	116	116		111	111	111			106	106	106			102
1	109	105	101	97	107	103	99	96		98	95	93			95	92	90			91
2	100	92	86	80	97	90	84	79		87	82	77			83	79	76			80
3	91	81	74	67	89	80	73	67		77	71	65			74	69	64			72
4	84	72	64	57	82	71	63	57		69	62	56			66	60	55			64
5	77	65	56	50	75	64	56	49		62	54	49			60	53	48			58
6	72	59	50	44	70	58	49	43		56	49	43			54	48	43			53
7	67	53	45	39	65	53	44	39		51	44	38			50	43	38			48
8	62	49	40	35	60	48	40	35		47	40	34			46	39	34			44
9	58	45	37	31	57	44	37	31		43	36	31			42	36	31			41
10	54	41	34	29	53	41	33	28		40	33	28			39	33	28			38

AVERAGE LUMINANCE (cd/sqm):

	0°	45°	90°
0°	3442	3442	3442
5°	3454	3437	3440
10°	3438	3422	3426
15°	3410	3392	3388
20°	3356	3343	3326
25°	3295	3266	3239
30°	3213	3175	3145
35°	3133	3070	3030
40°	3026	2953	2912
45°	2919	2830	2782
50°	2793	2697	2633
55°	2671	2551	2486
60°	2526	2393	2309
65°	2361	2217	2114
70°	2154	2014	1905
75°	1907	1735	1609
80°	1536	1368	1253
85°	1020	872	712

MAXIMUM LUMINANCE 45°-90°:

Horizontal Angle: 0°

Vertical Angle: 45°

Luminance: 2919 cd/sqm

TEST NUMBER: P1215728
 CATALOG NUMBER: 24-ID2-70-CFR2-L950-U

ZONAL LUMENS:

Zone	Lumens	% Fixture
0°-10°	241.8	3.8
10°-20°	686.2	10.8
20°-30°	1012.5	15.9
30°-40°	1170.8	18.4
40°-50°	1151.5	18.1
50°-60°	978.0	15.4
60°-70°	693.2	10.9
70°-80°	357.4	5.6
80°-90°	75.2	1.2
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°-30°	1940.5	30.5
0°-40°	3111.4	48.9
0°-60°	5240.8	82.3
0°-90°	6366.6	100.0
90°-120°	0.0	0.0
90°-150°	0.0	0.0
90°-180°	0.0	0.0
0°-180°	6366.6	100.0

CANDELA DISTRIBUTION:

	0°	22.5°	45°	67.5°	90°	Flux
0°	2558	2558	2558	2558	2558	
5°	2557	2548	2544	2542	2547	243
15°	2448	2438	2435	2430	2432	689
25°	2219	2212	2200	2186	2182	1022
35°	1907	1897	1869	1852	1845	1190
45°	1534	1521	1487	1466	1462	1183
55°	1139	1121	1088	1068	1060	1017
65°	742	723	696	674	664	735
75°	367	351	334	315	310	388
85°	66	63	56	50	46	83
90°	0	0	0	0	0	

TEST NUMBER: P1215728

CATALOG NUMBER: 24-ID2-70-CFR2-L950-U

CANDELA DISTRIBUTION (FULL):

	0°	22.5°	45°	67.5°	90°
0°	2558.3	2558.3	2558.3	2558.3	2558.3
2.5°	2567.0	2558.3	2553.1	2551.3	2557.4
5°	2557.4	2547.9	2544.4	2541.8	2547.0
7.5°	2540.9	2531.3	2527.9	2525.3	2530.5
10°	2516.6	2507.9	2504.4	2501.8	2507.9
12.5°	2486.1	2477.5	2473.1	2470.5	2474.8
15°	2447.9	2438.3	2434.9	2429.6	2432.3
17.5°	2399.2	2392.3	2389.7	2380.1	2381.0
20°	2343.6	2338.4	2334.9	2321.0	2322.7
22.5°	2286.2	2279.3	2270.6	2258.4	2258.4
25°	2219.3	2211.5	2200.2	2186.2	2181.9
27.5°	2149.7	2141.0	2122.8	2110.6	2106.3
30°	2068.0	2062.8	2043.7	2028.0	2024.6
32.5°	1984.6	1981.1	1956.8	1943.7	1935.0
35°	1907.2	1896.8	1869.0	1852.4	1844.6
37.5°	1815.9	1806.4	1776.8	1762.0	1753.3
40°	1722.9	1710.7	1681.2	1669.0	1657.7
42.5°	1628.2	1619.5	1585.6	1566.4	1558.6
45°	1534.3	1521.2	1487.3	1466.5	1462.1
47.5°	1439.5	1421.3	1388.2	1366.5	1362.2
50°	1334.3	1321.3	1288.3	1265.7	1257.9
52.5°	1235.2	1219.6	1190.0	1168.3	1157.9
55°	1138.8	1121.4	1087.5	1068.3	1059.7
57.5°	1037.1	1021.4	991.0	966.6	959.7
60°	938.8	918.8	889.3	869.3	858.0
62.5°	842.3	822.3	793.7	768.4	763.2
65°	741.5	723.2	696.3	673.7	664.1
67.5°	644.1	625.9	599.8	582.4	573.7
70°	547.6	532.9	512.0	489.4	484.2
72.5°	455.5	441.6	419.9	400.7	396.4
75°	366.8	351.2	333.8	314.7	309.5
77.5°	277.3	269.5	251.2	240.8	234.7
80°	198.2	188.6	176.5	166.9	161.7
82.5°	123.4	120.0	112.1	103.4	98.2
85°	66.1	62.6	56.5	50.4	46.1
87.5°	18.3	20.0	20.0	19.1	19.1
90°	0.0	0.0	0.0	0.0	0.0

TEST NUMBER: P1215728

CATALOG NUMBER: 24-ID2-70-CFR2-L950-U

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	15.41	17.00	15.77	17.31	17.62	15.00	16.58	15.36	16.90	17.21
	3H	17.03	18.46	17.41	18.79	19.15	16.52	17.95	16.90	18.27	18.63
	4H	17.60	18.94	18.00	19.29	19.67	17.01	18.36	17.41	18.70	19.08
	6H	17.96	19.20	18.37	19.57	19.96	17.32	18.56	17.73	18.92	19.32
	8H	18.05	19.23	18.48	19.62	20.02	17.38	18.56	17.81	18.95	19.35
	12H	18.09	19.22	18.52	19.60	20.03	17.40	18.53	17.83	18.92	19.34
4H	2H	15.93	17.27	16.33	17.62	17.99	15.59	16.94	15.99	17.28	17.66
	3H	17.76	18.88	18.17	19.28	19.68	17.32	18.44	17.73	18.83	19.24
	4H	18.44	19.45	18.87	19.86	20.30	17.92	18.92	18.35	19.34	19.77
	6H	18.91	19.79	19.36	20.23	20.69	18.32	19.19	18.77	19.64	20.09
	8H	19.03	19.85	19.49	20.29	20.76	18.41	19.23	18.87	19.67	20.14
	12H	19.09	19.83	19.58	20.31	20.78	18.45	19.18	18.93	19.66	20.13
8H	4H	18.65	19.47	19.11	19.91	20.38	18.17	18.99	18.64	19.44	19.90
	6H	19.20	19.88	19.69	20.37	20.84	18.66	19.34	19.15	19.82	20.30
	8H	19.37	19.97	19.88	20.48	20.97	18.79	19.39	19.30	19.90	20.39
	12H	19.48	20.01	19.98	20.50	21.07	18.86	19.40	19.37	19.89	20.45
12H	4H	18.65	19.39	19.13	19.86	20.33	18.19	18.93	18.67	19.40	19.87
	6H	19.21	19.82	19.72	20.33	20.82	18.68	19.29	19.19	19.80	20.29
	8H	19.42	19.96	19.93	20.45	21.01	18.86	19.39	19.36	19.88	20.45

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

Report Prepared for

Cooper Lighting Solutions

Corelite

Report Number: SP1-2506-458-13

Test Date: 08/27/2025

Luminaire Tested: 22ID2-55-CFR1-L950-U

Data in this report applies to families of products including 22ID2-55-CFR1-L950-U

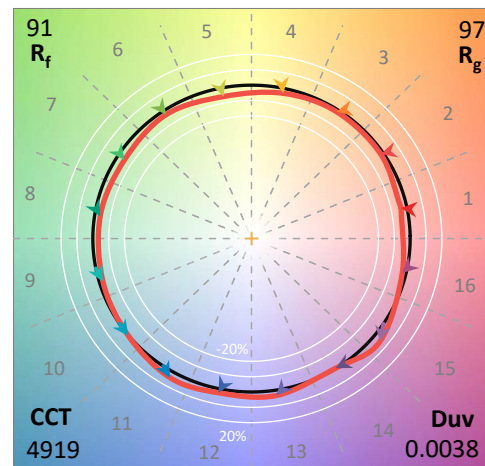
Test Information

Test Method: LM-79-2019
 Report Number: SP1-2506-458-13
 Test Lab: COOPER LIGHTING SOLUTIONS
 Photometer: SP1 - 76IN SPHERE
 Measurement Geometry: 4π
 Issue Date: 08/27/2025
 Manufacturer: COOPER LIGHTING SOLUTIONS
 Product Line: Corelite
 Catalog Number: **22ID2-55-CFR1-L950-U**
 Description: 2X2 CGTX WITH INDEPTH FRAME AND CFR1 LENS - 5500 LUMEN 5000K 90CRI

Spectral Parameters

CCT (K): 4919
 CIE u' : 0.2096
 CIE v' : 0.4901
 Duv: 0.0038
 CIE x: 0.3483
 CIE y: 0.3619
 CIE z: 0.2898
 Peak Wavelength (nm): 453
 Dominant Wavelength (nm): 570
 Purity: 13.10873
 R_f: 90.8
 R_g: 97.4

CRI (Ra): 94.0
 R1: 94.8
 R2: 97.7
 R3: 98.4
 R4: 90.8
 R5: 92.2
 R6: 94.3
 R7: 94.0
 R8: 90.0
 R9: 77.7
 R10: 93.1
 R11: 92.0
 R12: 65.9
 R13: 95.9
 R14: 99.0
 R15: 91.4



Test Conditions

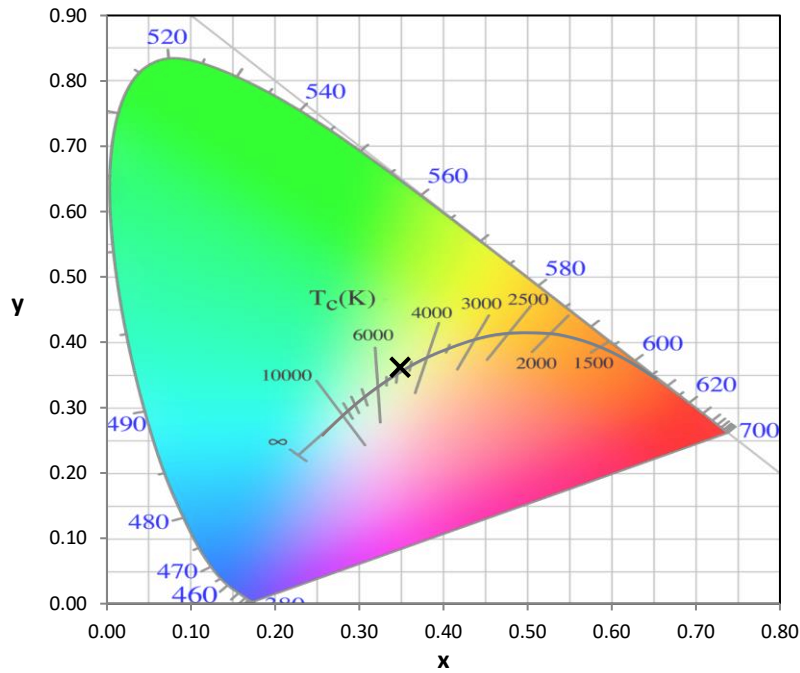
Stabilization Time: M
 Operation Time: 1H 0M
 Sphere Temperature (°C): 25.0

REPORT NUMBER: SP1-2506-458-13

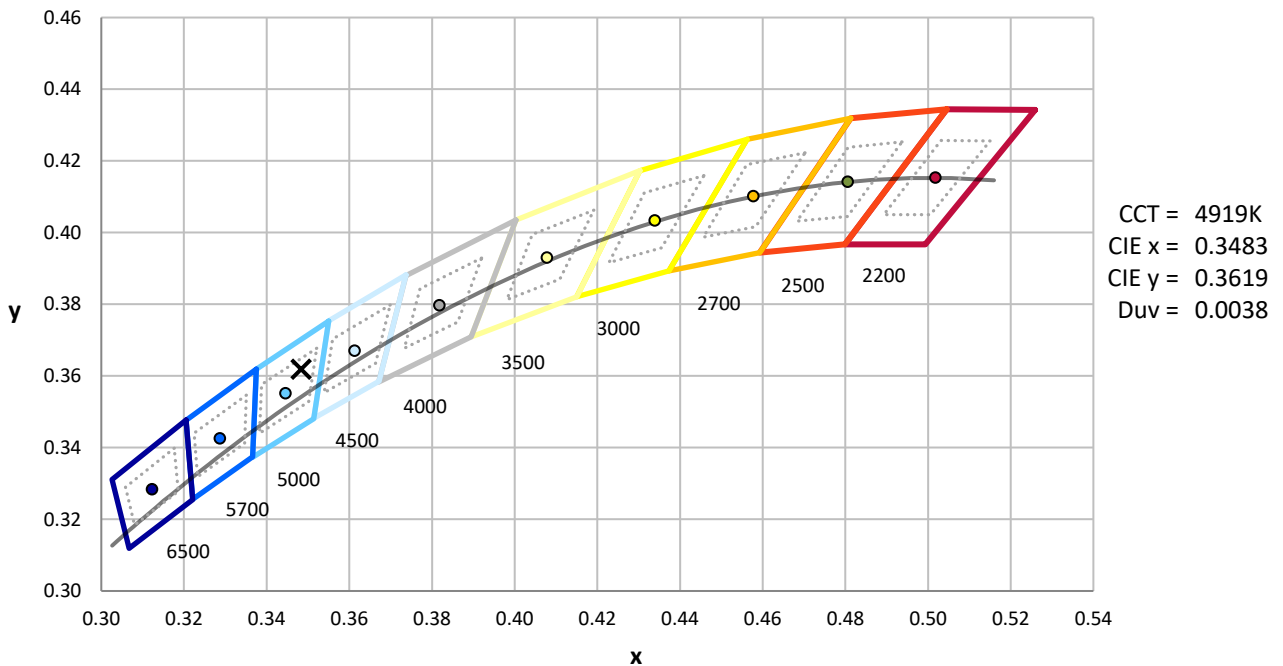
Measurement and Test Equipment			
Instrument	Identification Number	Calibration Date	Calibration Due Date
Photometer	76INCH SPHERE IN0058	6/16/2025	12/16/2025
Power Meter	XITRON INXT2011004	1/21/2025	1/21/2026
AC Power Source	CHROMA 61603 IN0063	10/22/2024	10/22/2025
DC Power Source	AGILENT E3634A IN0208	10/22/2024	10/22/2025
Sphere Thermometer	ONSET IN0085	10/22/2024	10/22/2025
Room Thermometer	ONSET IN0046	10/22/2024	10/22/2025

REPORT NUMBER: SP1-2506-458-13

CIE 1931 Chromaticity Diagram



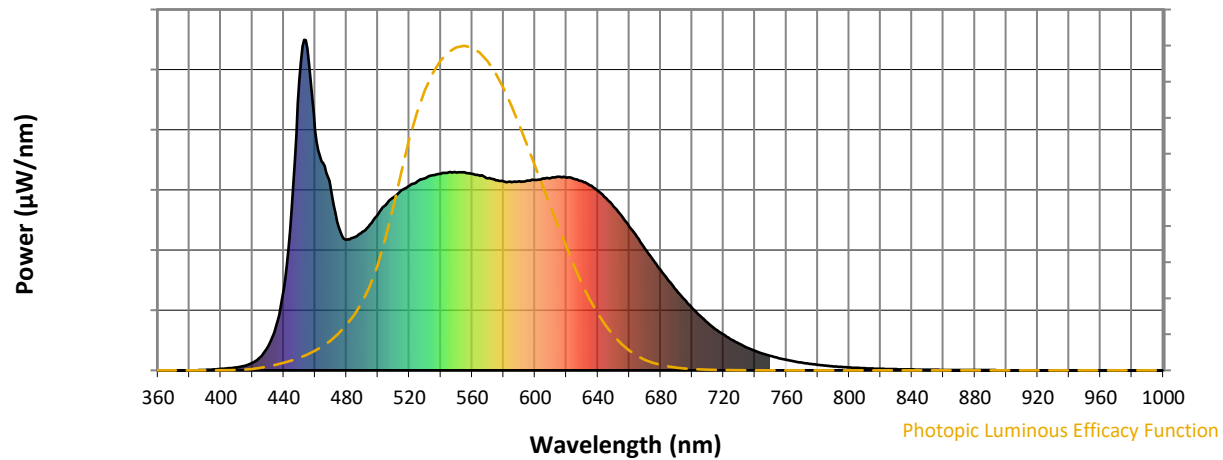
CIE 1931 Chromaticity Diagram with 2017 ANSI 7-Step and 4-Step Quadrangles



Point lies inside the ANSI 5000K 4-step quadrangle

REPORT NUMBER: SP1-2506-458-13

Photopic Flux vs. Wavelength

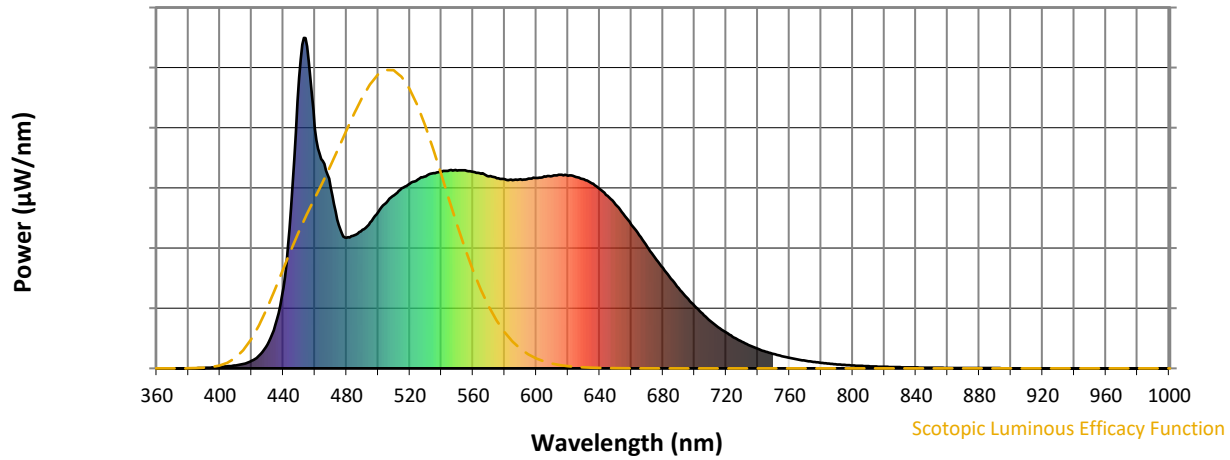


Photopic Lumens: NR

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	419	NR	620	583	NR	750	44	NR	880	1	NR
365	0	NR	495	441	NR	625	580	NR	755	37	NR	885	1	NR
370	0	NR	500	472	NR	630	572	NR	760	32	NR	890	1	NR
375	0	NR	505	501	NR	635	559	NR	765	27	NR	895	0	NR
380	0	NR	510	524	NR	640	543	NR	770	23	NR	900	0	NR
385	0	NR	515	545	NR	645	522	NR	775	20	NR	905	0	NR
390	1	NR	520	559	NR	650	496	NR	780	17	NR	910	0	NR
395	3	NR	525	572	NR	655	468	NR	785	14	NR	915	0	NR
400	4	NR	530	581	NR	660	435	NR	790	12	NR	920	0	NR
405	7	NR	535	590	NR	665	403	NR	795	10	NR	925	0	NR
410	9	NR	540	595	NR	670	368	NR	800	9	NR	930	0	NR
415	14	NR	545	599	NR	675	335	NR	805	8	NR	935	0	NR
420	23	NR	550	599	NR	680	304	NR	810	6	NR	940	0	NR
425	40	NR	555	599	NR	685	271	NR	815	6	NR	945	0	NR
430	72	NR	560	595	NR	690	243	NR	820	5	NR	950	0	NR
435	132	NR	565	589	NR	695	215	NR	825	4	NR	955	0	NR
440	243	NR	570	581	NR	700	189	NR	830	3	NR	960	0	NR
445	488	NR	575	575	NR	705	165	NR	835	3	NR	965	0	NR
450	879	NR	580	573	NR	710	144	NR	840	3	NR	970	0	NR
455	974	NR	585	570	NR	715	124	NR	845	2	NR	975	0	NR
460	726	NR	590	572	NR	720	108	NR	850	2	NR	980	0	NR
465	627	NR	595	574	NR	725	93	NR	855	2	NR	985	0	NR
470	546	NR	600	576	NR	730	80	NR	860	1	NR	990	0	NR
475	434	NR	605	581	NR	735	69	NR	865	1	NR	995	0	NR
480	395	NR	610	582	NR	740	59	NR	870	1	NR	1000	0	NR
485	403	NR	615	586	NR	745	51	NR	875	1	NR			

REPORT NUMBER: SP1-2506-458-13

Scotopic Flux vs. Wavelength



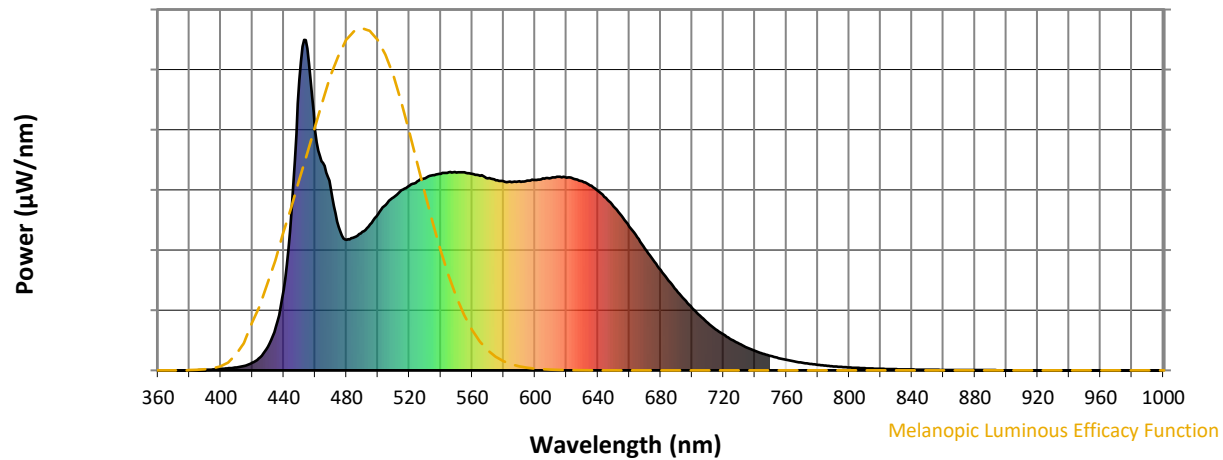
Scotopic Lumens: NR

S/P: 2.09

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	419	NR	620	583	NR	750	44	NR	880	1	NR
365	0	NR	495	441	NR	625	580	NR	755	37	NR	885	1	NR
370	0	NR	500	472	NR	630	572	NR	760	32	NR	890	1	NR
375	0	NR	505	501	NR	635	559	NR	765	27	NR	895	0	NR
380	0	NR	510	524	NR	640	543	NR	770	23	NR	900	0	NR
385	0	NR	515	545	NR	645	522	NR	775	20	NR	905	0	NR
390	1	NR	520	559	NR	650	496	NR	780	17	NR	910	0	NR
395	3	NR	525	572	NR	655	468	NR	785	14	NR	915	0	NR
400	4	NR	530	581	NR	660	435	NR	790	12	NR	920	0	NR
405	7	NR	535	590	NR	665	403	NR	795	10	NR	925	0	NR
410	9	NR	540	595	NR	670	368	NR	800	9	NR	930	0	NR
415	14	NR	545	599	NR	675	335	NR	805	8	NR	935	0	NR
420	23	NR	550	599	NR	680	304	NR	810	6	NR	940	0	NR
425	40	NR	555	599	NR	685	271	NR	815	6	NR	945	0	NR
430	72	NR	560	595	NR	690	243	NR	820	5	NR	950	0	NR
435	132	NR	565	589	NR	695	215	NR	825	4	NR	955	0	NR
440	243	NR	570	581	NR	700	189	NR	830	3	NR	960	0	NR
445	488	NR	575	575	NR	705	165	NR	835	3	NR	965	0	NR
450	879	NR	580	573	NR	710	144	NR	840	3	NR	970	0	NR
455	974	NR	585	570	NR	715	124	NR	845	2	NR	975	0	NR
460	726	NR	590	572	NR	720	108	NR	850	2	NR	980	0	NR
465	627	NR	595	574	NR	725	93	NR	855	2	NR	985	0	NR
470	546	NR	600	576	NR	730	80	NR	860	1	NR	990	0	NR
475	434	NR	605	581	NR	735	69	NR	865	1	NR	995	0	NR
480	395	NR	610	582	NR	740	59	NR	870	1	NR	1000	0	NR
485	403	NR	615	586	NR	745	51	NR	875	1	NR			

REPORT NUMBER: SP1-2506-458-13

Melanopic Flux vs. Wavelength



Melanopic Lumens: NR

M/P: 4.55

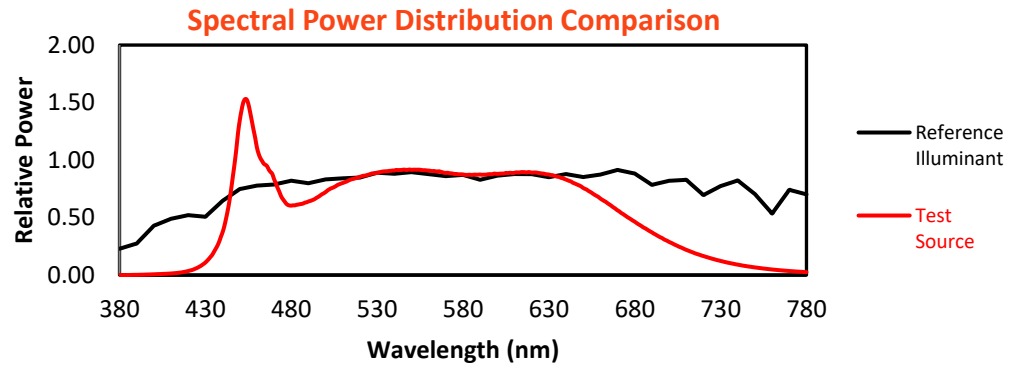
λ (nm)	Power W ^λ /nm	Lumens (φ/nm)	λ (nm)	Power W ^λ /nm	Lumens (φ/nm)	λ (nm)	Power W ^λ /nm	Lumens (φ/nm)	λ (nm)	Power W ^λ /nm	Lumens (φ/nm)	λ (nm)	Power W ^λ /nm	Lumens (φ/nm)
360	0	NR	490	419	NR	620	583	NR	750	44	NR	880	1	NR
365	0	NR	495	441	NR	625	580	NR	755	37	NR	885	1	NR
370	0	NR	500	472	NR	630	572	NR	760	32	NR	890	1	NR
375	0	NR	505	501	NR	635	559	NR	765	27	NR	895	0	NR
380	0	NR	510	524	NR	640	543	NR	770	23	NR	900	0	NR
385	0	NR	515	545	NR	645	522	NR	775	20	NR	905	0	NR
390	1	NR	520	559	NR	650	496	NR	780	17	NR	910	0	NR
395	3	NR	525	572	NR	655	468	NR	785	14	NR	915	0	NR
400	4	NR	530	581	NR	660	435	NR	790	12	NR	920	0	NR
405	7	NR	535	590	NR	665	403	NR	795	10	NR	925	0	NR
410	9	NR	540	595	NR	670	368	NR	800	9	NR	930	0	NR
415	14	NR	545	599	NR	675	335	NR	805	8	NR	935	0	NR
420	23	NR	550	599	NR	680	304	NR	810	6	NR	940	0	NR
425	40	NR	555	599	NR	685	271	NR	815	6	NR	945	0	NR
430	72	NR	560	595	NR	690	243	NR	820	5	NR	950	0	NR
435	132	NR	565	589	NR	695	215	NR	825	4	NR	955	0	NR
440	243	NR	570	581	NR	700	189	NR	830	3	NR	960	0	NR
445	488	NR	575	575	NR	705	165	NR	835	3	NR	965	0	NR
450	879	NR	580	573	NR	710	144	NR	840	3	NR	970	0	NR
455	974	NR	585	570	NR	715	124	NR	845	2	NR	975	0	NR
460	726	NR	590	572	NR	720	108	NR	850	2	NR	980	0	NR
465	627	NR	595	574	NR	725	93	NR	855	2	NR	985	0	NR
470	546	NR	600	576	NR	730	80	NR	860	1	NR	990	0	NR
475	434	NR	605	581	NR	735	69	NR	865	1	NR	995	0	NR
480	395	NR	610	582	NR	740	59	NR	870	1	NR	1000	0	NR
485	403	NR	615	586	NR	745	51	NR	875	1	NR			

REPORT NUMBER: SP1-2506-458-13

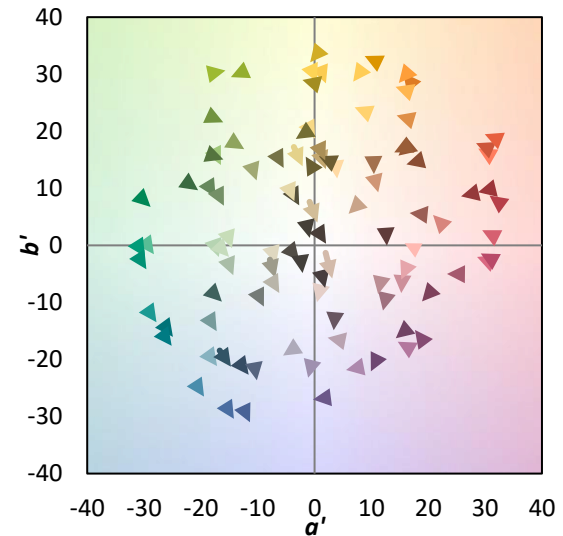
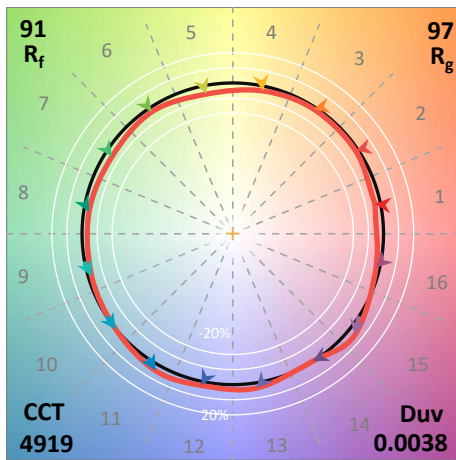
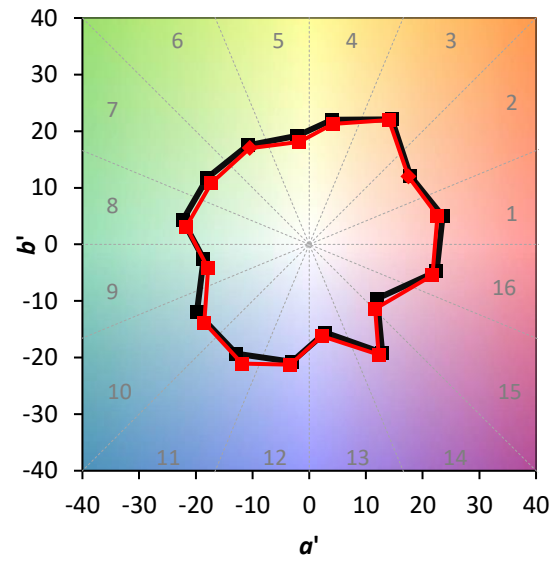
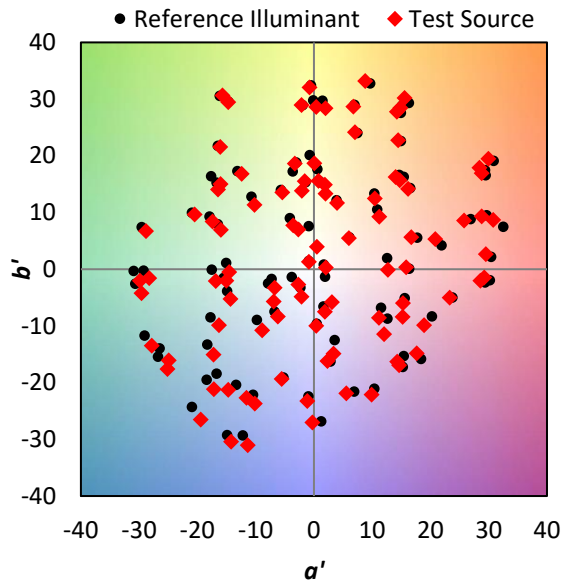
TM-30-18

Summary

$R_f = 90.8$
 $R_g = 97.4$
 $CIE R_a = 94.0$
 $R_9 = 77.7$

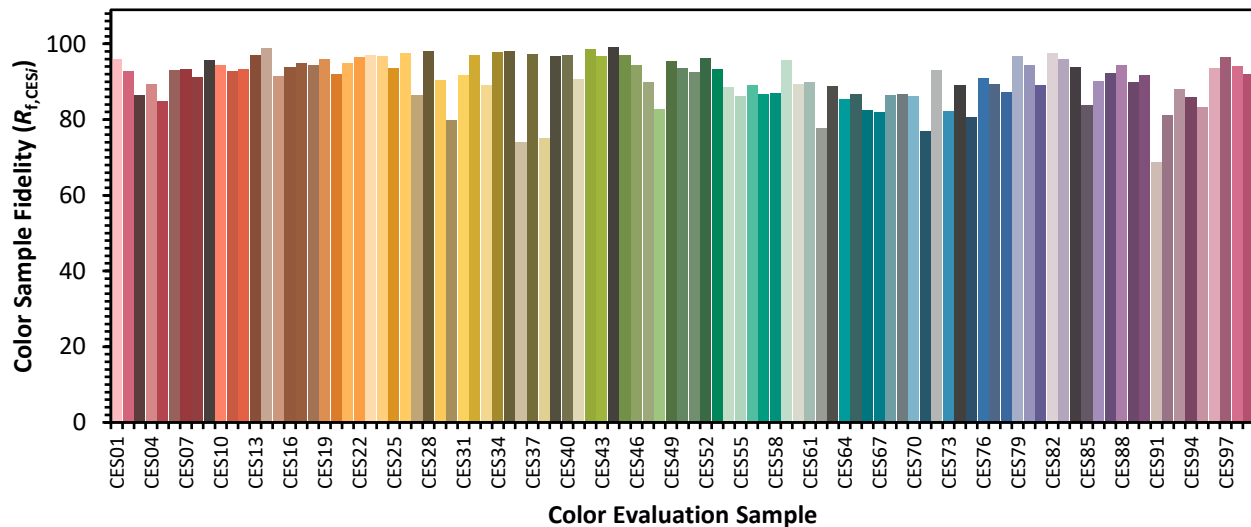


Color Vector Graphics

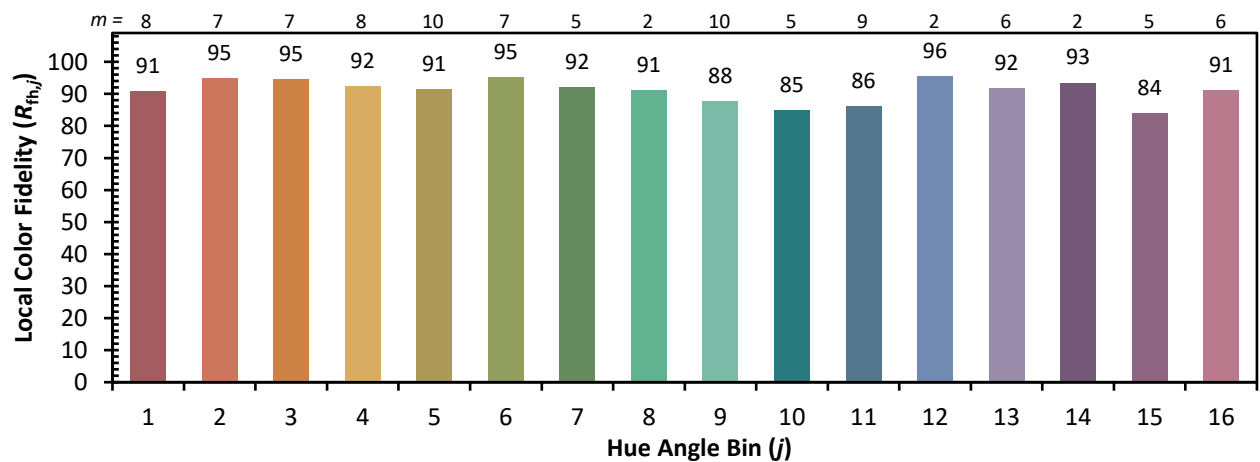
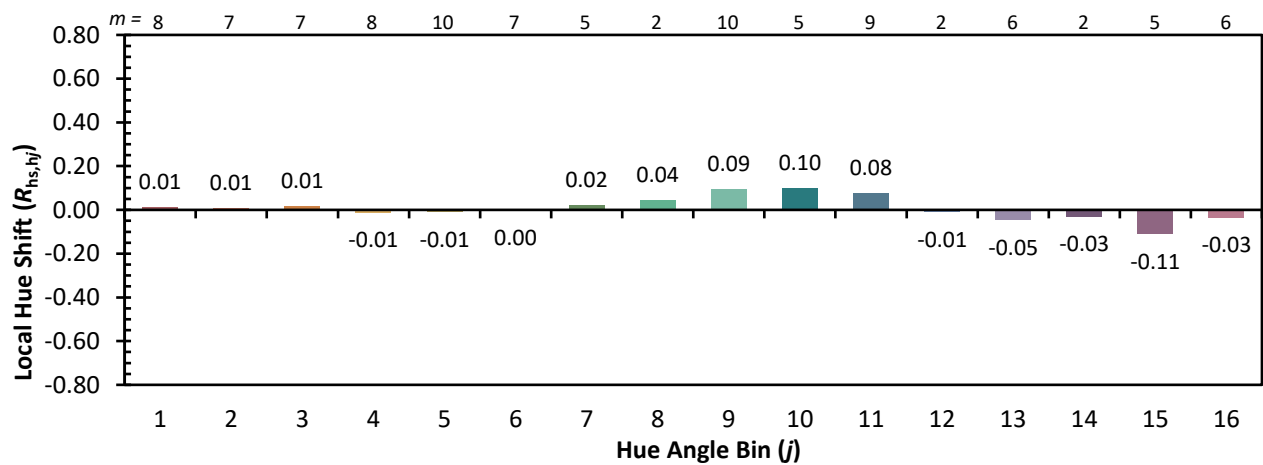
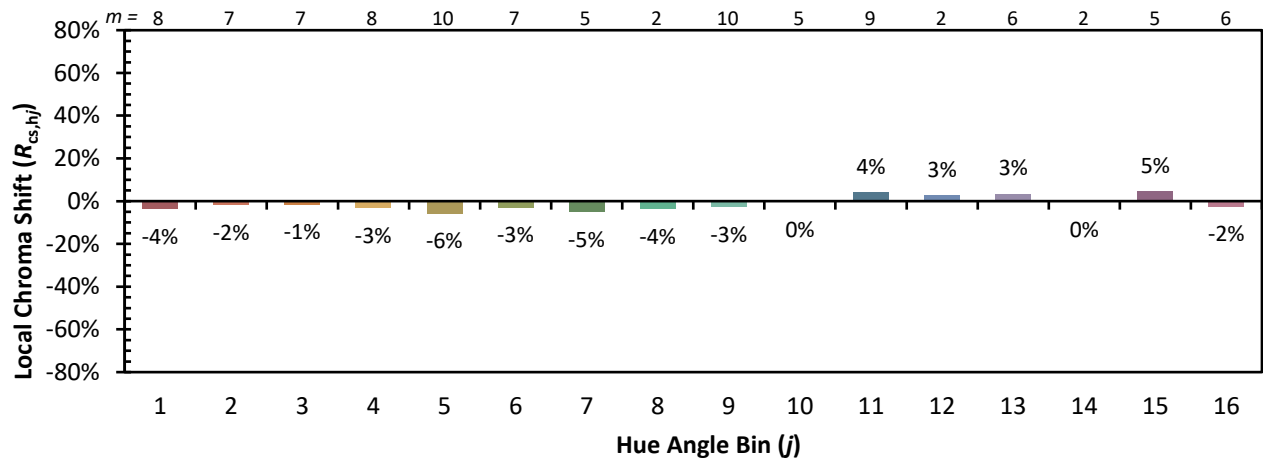


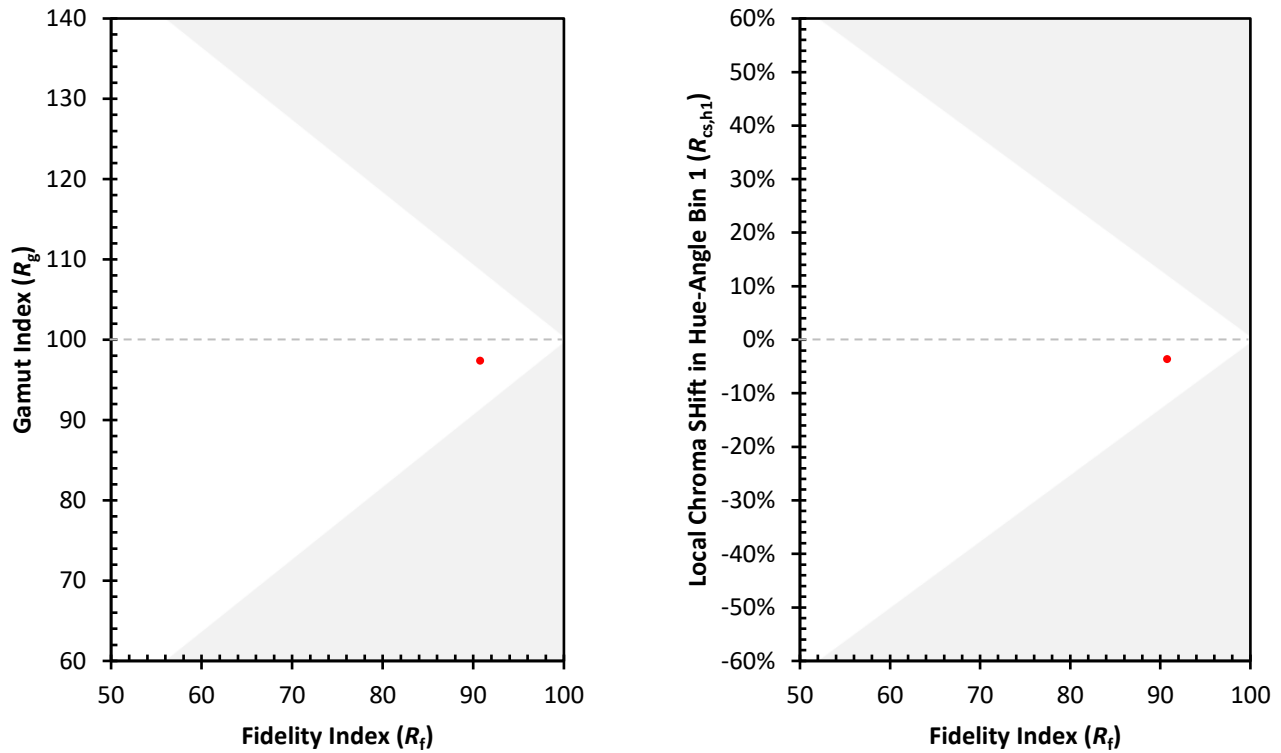
Individual Sample Fidelity Index ($R_{f,i}$)

CES01 = 85	CES26 = 98	CES51 = 93	CES76 = 91
CES02 = 61	CES27 = 86	CES52 = 96	CES77 = 89
CES03 = 31	CES28 = 98	CES53 = 93	CES78 = 87
CES04 = 68	CES29 = 90	CES54 = 89	CES79 = 97
CES05 = 48	CES30 = 80	CES55 = 86	CES80 = 94
CES06 = 50	CES31 = 92	CES56 = 89	CES81 = 89
CES07 = 41	CES32 = 97	CES57 = 87	CES82 = 97
CES08 = 40	CES33 = 89	CES58 = 87	CES83 = 96
CES09 = 29	CES34 = 98	CES59 = 96	CES84 = 94
CES10 = 73	CES35 = 98	CES60 = 89	CES85 = 84
CES11 = 56	CES36 = 74	CES61 = 90	CES86 = 90
CES12 = 62	CES37 = 97	CES62 = 78	CES87 = 92
CES13 = 42	CES38 = 75	CES63 = 89	CES88 = 95
CES14 = 74	CES39 = 97	CES64 = 85	CES89 = 90
CES15 = 71	CES40 = 97	CES65 = 87	CES90 = 92
CES16 = 47	CES41 = 91	CES66 = 82	CES91 = 69
CES17 = 48	CES42 = 99	CES67 = 82	CES92 = 81
CES18 = 56	CES43 = 97	CES68 = 86	CES93 = 88
CES19 = 70	CES44 = 99	CES69 = 87	CES94 = 86
CES20 = 65	CES45 = 97	CES70 = 86	CES95 = 83
CES21 = 84	CES46 = 94	CES71 = 77	CES96 = 94
CES22 = 77	CES47 = 90	CES72 = 93	CES97 = 97
CES23 = 91	CES48 = 83	CES73 = 82	CES98 = 94
CES24 = 89	CES49 = 95	CES74 = 89	CES99 = 92
CES25 = 70	CES50 = 94	CES75 = 81	



Color Rendition by Hue-Angle Bin



Measure Comparisons


(END OF REPORT)