

Signify Classified - Internal  
Cooper Lighting Solutions Photometric Lab  
1121 Highway 74 South  
Peachtree City, GA 30269



Scaled data based on original data using  
LM-79-08 Approved Method: Electrical and Photometric Measurements of Solid-  
State Lighting Products

Test Report Prepared for  
Cooper Lighting Solutions  
(formerly Eaton)

Brand: INVUE

Report Number: P870611

Luminaire Tested: **EMM2-HTN-SA2C-840-U-T1**

Issue Date: 09/05/2024



**Test Information**

Test Method: LM-79-08  
Report Number: P870611  
Test Lab: INNOVATION CENTER(G3)  
Issue Date: 09/05/2024  
Manufacturer: COOPER LIGHTING SOLUTIONS (FORMERLY EATON)  
Product Line: INVUE  
Catalog Number: EMM2-HTN-SA2C-840-U-T1  
Description: EPIC MODERN TALL HOUSING DISCRETE LED ARRAYS 120W 80CRI 4000K  
FIXTURE w/ TYPE 1 DISTRIBUTION OPTIC  
Light Source: (20) 4000K CCT, 80 CRI LEDS  
Ballast/Driver: ELECTRONIC DRIVER

**Summary**

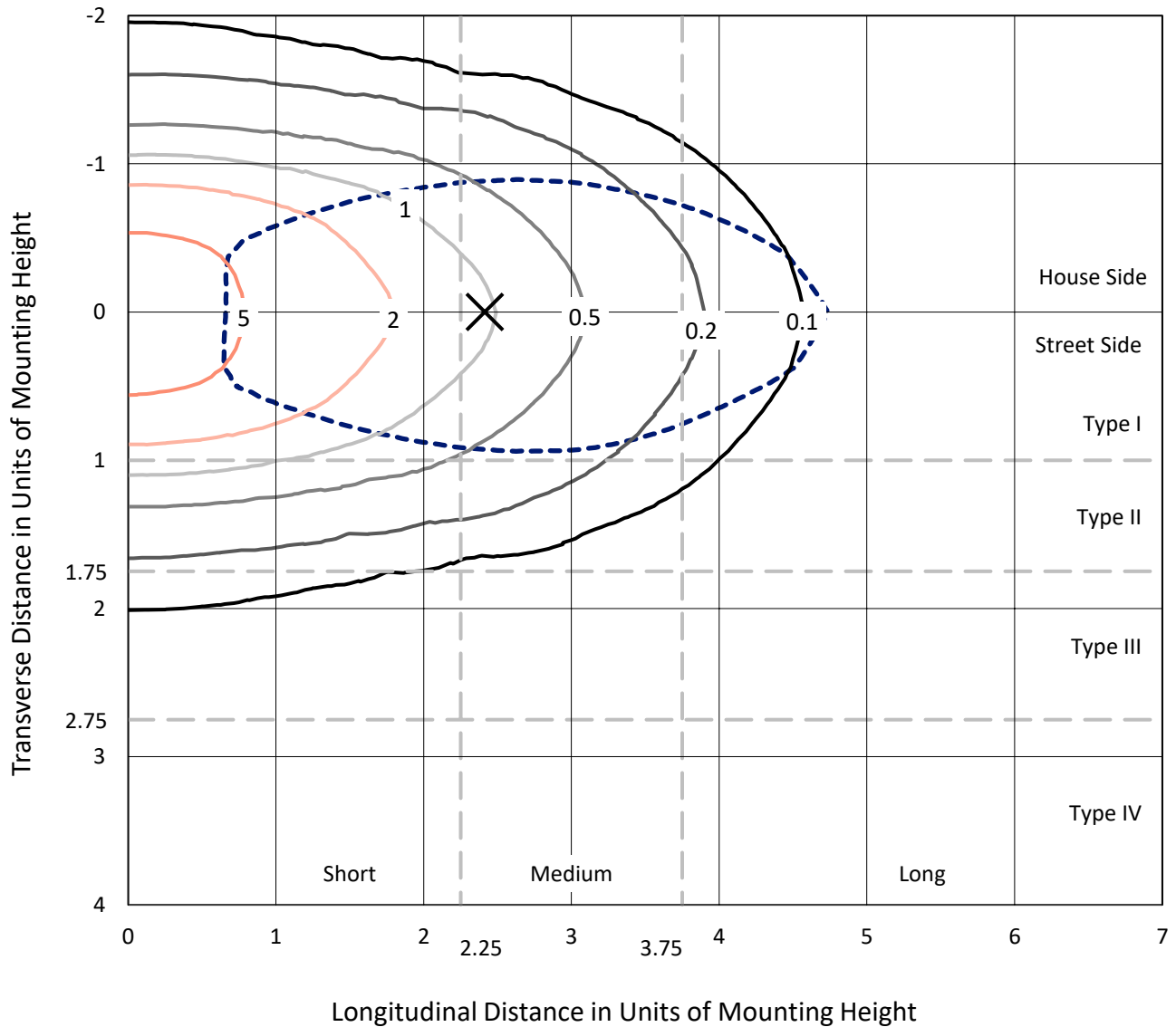
Lumens per Lamp: N/A  
Luminaire Lumens: 13560.1 lumens  
Efficiency: N/A  
Efficacy: 134.3 lumens/watt  
Luminous Opening: Rectangular (W 0.67' x L: 0.33' x H: 0')  
IES Classification: Type I - Short  
BUG Rating: B3 - U0 - G3

Input Watts (W): 101  
Input Voltage (V): 120  
Input Current (A<sub>in</sub>): NR  
Voltage Rise (V): NR  
Power Factor: 0.99  
Total Harmonic Distortion (THDi): 9.45%  
Frequency (hertz): 60  
Stabilization Time: NR  
Operation Time: NR  
Ambient Temperature (°C): NR  
Test Distance: 24 FT

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### Iso-Footcandle Lines of Horizontal Illumination

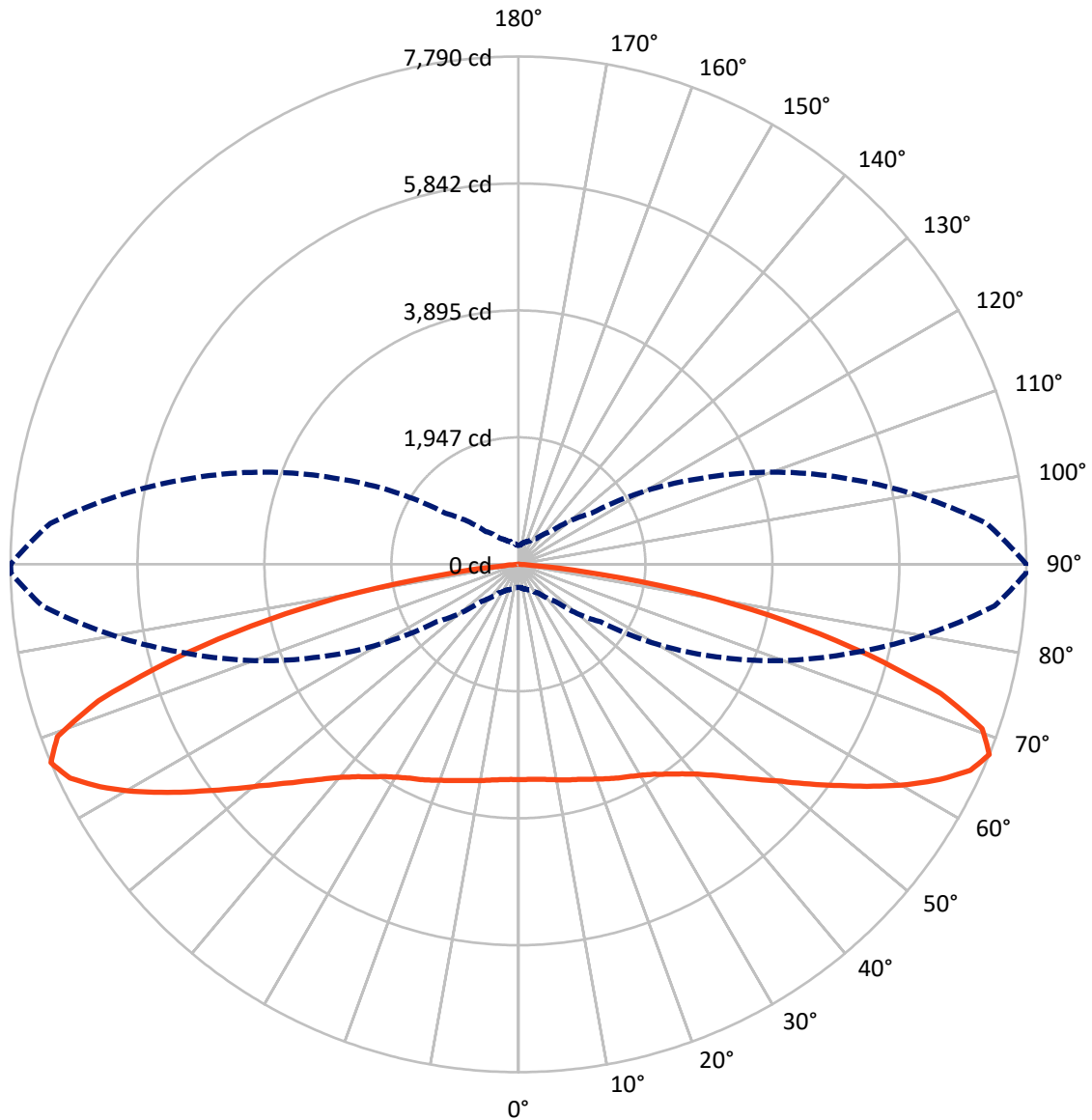
× Max cd  
 - - - 1/2 Max cd



Based on 20 foot mounting height. Maximum calculated value = 8.3 fc  
 Type I - Short - N/A

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### Luminous Intensity Polar Plot



— Vertical Plane Through 90-Deg Lateral    - - - Horizontal Cone Through 67.5-Deg Vertical

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**FLUX DISTRIBUTION:**

		Downward	Upward	Total
<b>House Side</b>	Lumens	6659.6	0.0	6659.6
	% Fixture	49.1	0.0	49.1
<b>Street Side</b>	Lumens	6900.5	0.0	6900.5
	% Fixture	50.9	0.0	50.9
<b>Total</b>	Lumens	13560.1	0.0	13560.1
	% Fixture	100.0	0.0	100.0

**Coefficient of Utilization**

**ZONAL LUMENS:**

Zone	Lumens	% Fixture
0°-10°	316.6	2.3
10°-20°	951.5	7.0
20°-30°	1574.7	11.6
30°-40°	2088.1	15.4
40°-50°	2354.3	17.4
50°-60°	2413.5	17.8
60°-70°	2279.5	16.8
70°-80°	1398.7	10.3
80°-90°	183.0	1.3
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°	13560.1	100.0
0°-180°	13560.1	100.0



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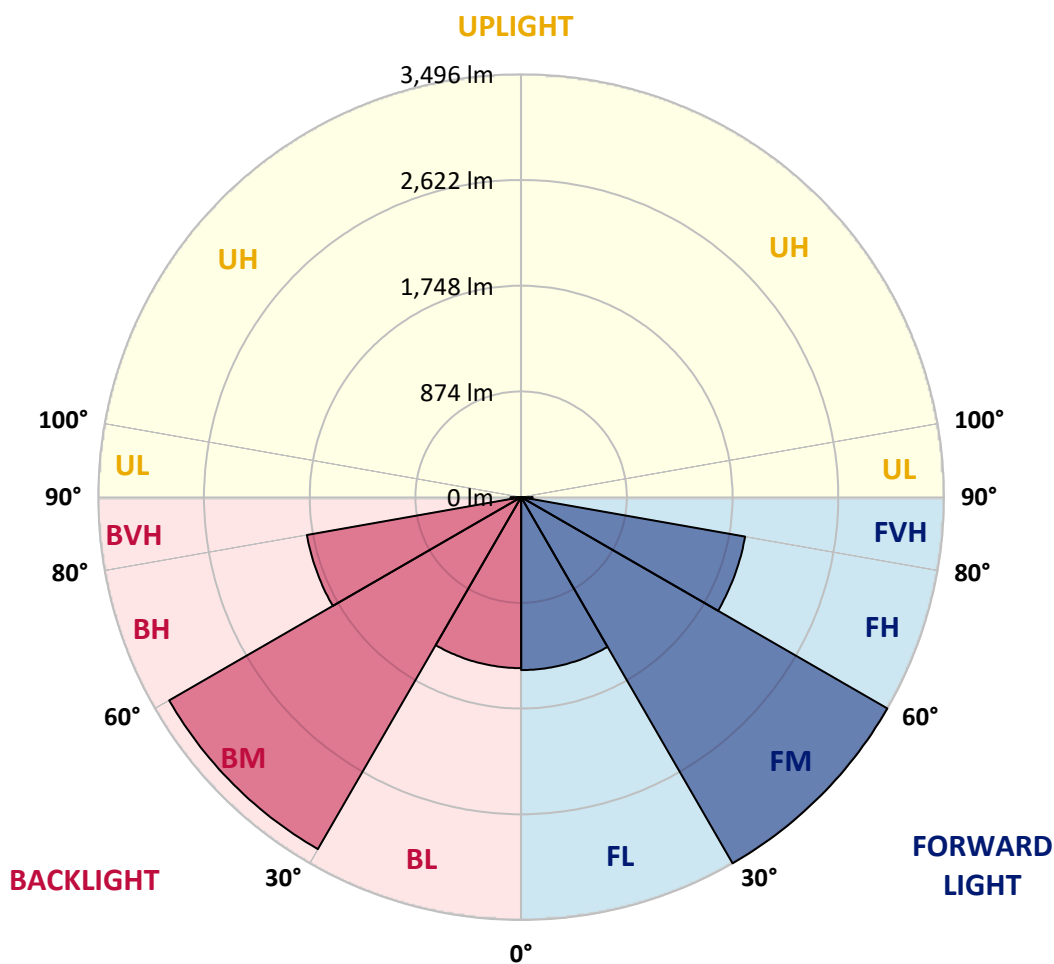
CATALOG NUMBER: EMM2-HTN-SA2C-840-U-T1

**LUMINAIRE CLASSIFICATION SYSTEM LUMEN TABLE AND BUG RATING:**

Zone	Lumens	% Fixture	Zone Rating/Lumen Limit		
			B	U	G
FL (0°-30°)	1429.6	10.5			
FM (30°-60°)	3495.6	25.8			
FH (60°-80°)	1879.9	13.9			G2/5000
FVH (80°-90°)	95.3	0.7			G1/100
BL (0°-30°)	1413.3	10.4	B3/2500		
BM (30°-60°)	3360.3	24.8	B3/5000		
BH (60°-80°)	1798.4	13.3	B3/2500		G3/2500
BVH (80°-90°)	87.7	0.6			G1/100
UL (90°-100°)	0.0	0.0		U0/0	
UH (100°-180°)	0.0	0.0		U0/0	

**BUG Rating: B3-U0-G3**

Type I Short





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**CANDELA DISTRIBUTION (FULL):**

	0°	5°	15°	25°	35°	45°	55°	65°	75°	85°	89°
0°	3303.9	3303.9	3303.9	3303.9	3303.9	3303.9	3303.9	3303.9	3303.9	3303.9	3303.9
2.5°	3316.9	3316.9	3309.1	3296.1	3293.5	3296.1	3311.7	3303.9	3303.9	3306.5	3303.9
5°	3316.9	3316.9	3311.7	3298.7	3298.7	3298.7	3316.9	3309.1	3311.7	3314.3	3314.3
7.5°	3322.1	3322.1	3316.9	3306.5	3306.5	3306.5	3332.5	3327.3	3327.3	3335.1	3329.9
10°	3335.1	3329.9	3324.7	3327.3	3319.5	3332.5	3345.5	3348.1	3358.6	3363.8	3361.2
12.5°	3335.1	3329.9	3316.9	3332.5	3332.5	3350.8	3369.0	3379.4	3392.4	3392.4	3392.4
15°	3319.5	3314.3	3303.9	3329.9	3340.3	3363.8	3389.8	3405.4	3428.9	3428.9	3426.3
17.5°	3301.3	3293.5	3288.3	3327.3	3350.8	3382.0	3421.0	3441.9	3467.9	3470.5	3465.3
20°	3267.4	3264.8	3267.4	3319.5	3361.2	3405.4	3452.3	3480.9	3514.8	3525.2	3517.4
22.5°	3231.0	3231.0	3241.4	3311.7	3376.8	3436.7	3499.2	3535.6	3569.4	3579.9	3569.4
25°	3181.5	3181.5	3202.3	3285.7	3382.0	3470.5	3543.4	3592.9	3624.1	3634.5	3629.3
27.5°	3106.0	3106.0	3129.5	3233.6	3366.4	3496.5	3590.3	3647.6	3681.4	3691.8	3686.6
30°	2999.3	2994.1	3025.3	3155.5	3337.7	3525.2	3645.0	3704.8	3749.1	3756.9	3749.1
32.5°	2830.0	2837.9	2884.7	3048.7	3290.9	3543.4	3710.0	3780.3	3829.8	3845.4	3840.2
35°	2624.4	2637.4	2702.5	2913.4	3202.3	3540.8	3777.7	3863.6	3928.7	3949.6	3947.0
37.5°	2379.6	2397.9	2478.6	2725.9	3069.6	3501.8	3840.2	3957.4	4043.3	4069.3	4074.5
40°	2111.5	2129.7	2233.8	2507.2	2889.9	3410.6	3876.7	4064.1	4178.7	4230.7	4238.6
42.5°	1827.7	1858.9	1983.9	2249.5	2673.8	3264.8	3876.7	4168.3	4308.9	4405.2	4413.0
45°	1554.3	1580.3	1731.4	1991.7	2442.1	3077.4	3832.4	4272.4	4485.9	4652.5	4647.3
47.5°	1317.4	1325.2	1463.2	1726.1	2184.4	2863.9	3741.3	4366.1	4673.3	4894.6	4941.5
50°	1072.7	1090.9	1208.0	1468.4	1921.4	2629.6	3587.7	4426.0	4866.0	5201.9	5261.7
52.5°	900.8	903.4	991.9	1231.5	1648.0	2345.8	3402.8	4441.6	5050.9	5535.1	5608.0
55°	734.2	747.2	822.7	1002.4	1385.1	2067.2	3163.3	4418.2	5220.1	5858.0	5993.3
57.5°	630.1	632.7	687.3	830.5	1169.0	1770.4	2897.7	4340.1	5360.7	6214.6	6386.5
60°	541.5	541.5	583.2	692.5	945.1	1481.4	2585.3	4202.1	5438.8	6597.4	6847.3
62.5°	471.2	473.8	510.3	591.0	786.3	1223.7	2241.6	3986.0	5467.4	6967.1	7253.5
65°	427.0	429.6	450.4	505.1	648.3	994.6	1890.2	3723.1	5428.4	7243.0	7615.3
67.5°	354.1	356.7	393.1	434.8	538.9	799.3	1536.1	3358.6	5269.6	7329.0	7784.6
70°	270.8	278.6	328.0	372.3	447.8	637.9	1179.4	2876.9	4889.4	7037.4	7506.0
72.5°	226.5	229.1	265.6	315.0	374.9	499.9	895.6	2265.1	4311.5	6284.9	6805.6
75°	197.9	200.5	221.3	265.6	312.4	400.9	622.2	1564.7	3439.3	5082.1	5558.6
77.5°	179.6	182.2	187.5	223.9	263.0	309.8	440.0	929.5	2426.5	3884.5	4134.4
80°	171.8	171.8	158.8	184.9	216.1	242.1	294.2	533.7	1556.9	2619.2	2819.6
82.5°	122.4	119.8	109.3	114.6	132.8	132.8	151.0	221.3	596.2	1106.5	1200.2
85°	7.8	7.8	13.0	15.6	23.4	31.2	39.1	52.1	151.0	205.7	213.5
87.5°	2.6	2.6	2.6	2.6	2.6	5.2	5.2	5.2	7.8	10.4	10.4
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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**CANDELA DISTRIBUTION (continued):**

	90°	95°	105°	115°	125°	135°	145°	155°	165°	175°	180°
0°	3303.9	3303.9	3303.9	3303.9	3303.9	3303.9	3303.9	3303.9	3303.9	3303.9	3303.9
2.5°	3301.3	3303.9	3303.9	3309.1	3314.3	3311.7	3309.1	3314.3	3306.5	3290.9	3288.3
5°	3311.7	3311.7	3309.1	3314.3	3319.5	3314.3	3309.1	3309.1	3303.9	3288.3	3285.7
7.5°	3332.5	3329.9	3329.9	3329.9	3329.9	3322.1	3314.3	3309.1	3301.3	3285.7	3277.9
10°	3361.2	3358.6	3356.0	3353.4	3340.3	3332.5	3319.5	3311.7	3301.3	3283.1	3277.9
12.5°	3392.4	3387.2	3382.0	3384.6	3358.6	3335.1	3322.1	3303.9	3296.1	3254.4	3246.6
15°	3423.7	3415.8	3413.2	3402.8	3376.8	3342.9	3316.9	3290.9	3264.8	3225.8	3212.8
17.5°	3465.3	3460.1	3444.5	3434.1	3397.6	3350.8	3311.7	3275.2	3241.4	3194.5	3186.7
20°	3514.8	3509.6	3493.9	3473.1	3426.3	3369.0	3314.3	3257.0	3215.4	3160.7	3147.7
22.5°	3569.4	3561.6	3548.6	3525.2	3465.3	3397.6	3322.1	3246.6	3184.1	3121.6	3113.8
25°	3626.7	3621.5	3608.5	3574.7	3509.6	3426.3	3322.1	3210.2	3132.1	3077.4	3053.9
27.5°	3681.4	3678.8	3663.2	3624.1	3556.4	3447.1	3298.7	3150.3	3046.1	2973.2	2957.6
30°	3751.7	3746.5	3728.3	3684.0	3608.5	3460.1	3251.8	3048.7	2918.6	2837.9	2814.4
32.5°	3837.6	3832.4	3806.4	3751.7	3671.0	3462.7	3184.1	2918.6	2746.7	2660.8	2632.2
35°	3952.2	3941.8	3907.9	3842.8	3730.9	3436.7	3064.4	2751.9	2541.1	2429.1	2390.0
37.5°	4077.1	4064.1	4019.9	3939.2	3772.5	3366.4	2895.1	2528.0	2288.5	2155.7	2127.1
40°	4230.7	4212.5	4144.8	4032.9	3788.1	3244.0	2705.1	2298.9	2043.8	1898.0	1864.1
42.5°	4423.4	4392.2	4282.8	4137.0	3756.9	3077.4	2478.6	2062.0	1770.4	1635.0	1627.2
45°	4655.1	4605.7	4441.6	4238.6	3689.2	2869.1	2239.0	1796.4	1517.9	1385.1	1351.2
47.5°	4928.5	4868.6	4626.5	4316.7	3556.4	2655.6	1981.3	1538.7	1283.5	1148.2	1122.1
50°	5230.5	5173.2	4821.7	4360.9	3413.2	2405.7	1728.7	1309.6	1054.4	942.5	942.5
52.5°	5597.6	5467.4	5009.2	4366.1	3194.5	2129.7	1486.6	1085.7	885.2	786.3	765.4
55°	5988.1	5834.5	5178.4	4319.3	2968.0	1877.1	1226.3	903.4	726.4	656.1	637.9
57.5°	6422.9	6188.6	5300.8	4225.5	2681.6	1601.2	1023.2	744.6	611.8	554.6	546.7
60°	6860.3	6558.3	5373.7	4066.7	2377.0	1346.0	851.4	622.2	525.9	484.3	476.4
62.5°	7266.5	6860.3	5378.9	3835.0	2080.2	1122.1	697.7	536.3	466.0	434.8	434.8
65°	7617.9	7112.9	5290.4	3538.2	1702.7	900.8	575.4	453.0	406.2	372.3	364.5
67.5°	7789.8	7209.2	5134.2	3132.1	1364.3	713.4	484.3	393.1	348.9	296.8	291.6
70°	7547.7	6930.6	4733.2	2611.3	1054.4	567.6	403.5	335.9	291.6	247.3	242.1
72.5°	6774.4	6188.6	4084.9	2022.9	794.1	458.2	335.9	286.4	239.5	216.1	210.9
75°	5542.9	5147.2	3228.4	1392.9	554.6	359.3	281.2	242.1	203.1	192.7	190.1
77.5°	4207.3	3827.2	2358.8	872.2	380.1	281.2	239.5	205.7	177.0	184.9	179.6
80°	2809.2	2634.8	1567.3	494.7	255.1	205.7	182.2	151.0	135.4	156.2	151.0
82.5°	1275.7	1208.0	736.8	216.1	114.6	88.5	62.5	46.9	36.4	33.8	39.1
85°	213.5	187.5	52.1	23.4	13.0	7.8	5.2	5.2	2.6	2.6	2.6
87.5°	10.4	7.8	7.8	5.2	2.6	2.6	2.6	2.6	2.6	0.0	0.0
90°	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0



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

Streetworks

Report Number: SP1-2407-157-8

Test Date: 09/05/2024

Luminaire Tested: MEM2-HTN-SA-40-840-U-5WQ

Data in this report applies to families of products including MEM2-HTN-SA-40-840-U-5WQ

**Test Information**

Test Method: LM-79-2019  
 Report Number: SP1-2407-157-8  
 Test Lab: COOPER LIGHTING SOLUTIONS  
 Photometer: SP1 - 76IN SPHERE  
 Measurement Geometry: 4π  
 Issue Date: 09/05/2024  
 Manufacturer: COOPER LIGHTING SOLUTIONS  
 Product Line: Streetworks  
 Catalog Number: **MEM2-HTN-SA-40-840-U-5WQ**  
 Description: Epic Modern Light Square 40W 5WQ Optic

**Spectral Parameters**

CCT (K): 3996  
 CIE u': 0.2245  
 CIE v': 0.5031  
 Duv: 0.0012  
 CIE x: 0.3815  
 CIE y: 0.3799  
 CIE z: 0.2386  
 Peak Wavelength (nm): 449  
 Dominant Wavelength (nm): 578  
 Purity: 28.49233  
 Rf: 82.6  
 Rg: 95.1

CRI (Ra):	80.6		
R1:	78.1	R9:	-5.8
R2:	87.1	R10:	70.3
R3:	94.5	R11:	78.7
R4:	79.7	R12:	60.5
R5:	78.7	R13:	80.2
R6:	82.7	R14:	97.2
R7:	84.3	R15:	70.6
R8:	59.5		



**Test Conditions**

Stabilization Time: 29M  
 Operation Time: 1H 29M  
 Sphere Temperature (°C): 24.3

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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	10/24/2023	10/24/2024
DC Power Source	IN0208	10/24/2023	10/24/2024
Sphere Thermometer	IN0085	10/24/2023	10/24/2024
Room Thermometer	IN0046	10/24/2023	10/24/2024

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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 4000K 4-step quadrangle

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**Photopic Flux vs. Wavelength**



**Photopic Lumens: NR**

$\lambda$ (nm)	Power W <sup>^</sup> /nm	Lumens ( $\phi$ /nm)	$\lambda$ (nm)	Power W <sup>^</sup> /nm	Lumens ( $\phi$ /nm)	$\lambda$ (nm)	Power W <sup>^</sup> /nm	Lumens ( $\phi$ /nm)	$\lambda$ (nm)	Power W <sup>^</sup> /nm	Lumens ( $\phi$ /nm)	$\lambda$ (nm)	Power W <sup>^</sup> /nm	Lumens ( $\phi$ /nm)
360	0	NR	490	289	NR	620	725	NR	750	17	NR	880	0	NR
365	0	NR	495	351	NR	625	673	NR	755	15	NR	885	0	NR
370	0	NR	500	414	NR	630	619	NR	760	13	NR	890	0	NR
375	0	NR	505	470	NR	635	562	NR	765	11	NR	895	0	NR
380	0	NR	510	513	NR	640	506	NR	770	9	NR	900	0	NR
385	0	NR	515	546	NR	645	452	NR	775	8	NR	905	0	NR
390	0	NR	520	571	NR	650	400	NR	780	7	NR	910	0	NR
395	1	NR	525	592	NR	655	352	NR	785	6	NR	915	0	NR
400	3	NR	530	606	NR	660	307	NR	790	5	NR	920	0	NR
405	6	NR	535	624	NR	665	267	NR	795	4	NR	925	0	NR
410	12	NR	540	642	NR	670	231	NR	800	4	NR	930	0	NR
415	22	NR	545	663	NR	675	199	NR	805	3	NR	935	0	NR
420	44	NR	550	686	NR	680	171	NR	810	3	NR	940	0	NR
425	83	NR	555	713	NR	685	146	NR	815	2	NR	945	0	NR
430	150	NR	560	745	NR	690	125	NR	820	2	NR	950	0	NR
435	267	NR	565	774	NR	695	106	NR	825	2	NR	955	0	NR
440	466	NR	570	806	NR	700	90	NR	830	1	NR	960	0	NR
445	804	NR	575	835	NR	705	76	NR	835	1	NR	965	0	NR
450	1000	NR	580	858	NR	710	65	NR	840	1	NR	970	0	NR
455	715	NR	585	875	NR	715	55	NR	845	1	NR	975	0	NR
460	492	NR	590	884	NR	720	47	NR	850	1	NR	980	0	NR
465	402	NR	595	880	NR	725	40	NR	855	1	NR	985	0	NR
470	288	NR	600	868	NR	730	34	NR	860	1	NR	990	0	NR
475	226	NR	605	844	NR	735	28	NR	865	1	NR	995	0	NR
480	227	NR	610	814	NR	740	24	NR	870	0	NR	1000	0	NR
485	248	NR	615	771	NR	745	20	NR	875	0	NR			

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**Scotopic Flux vs. Wavelength**



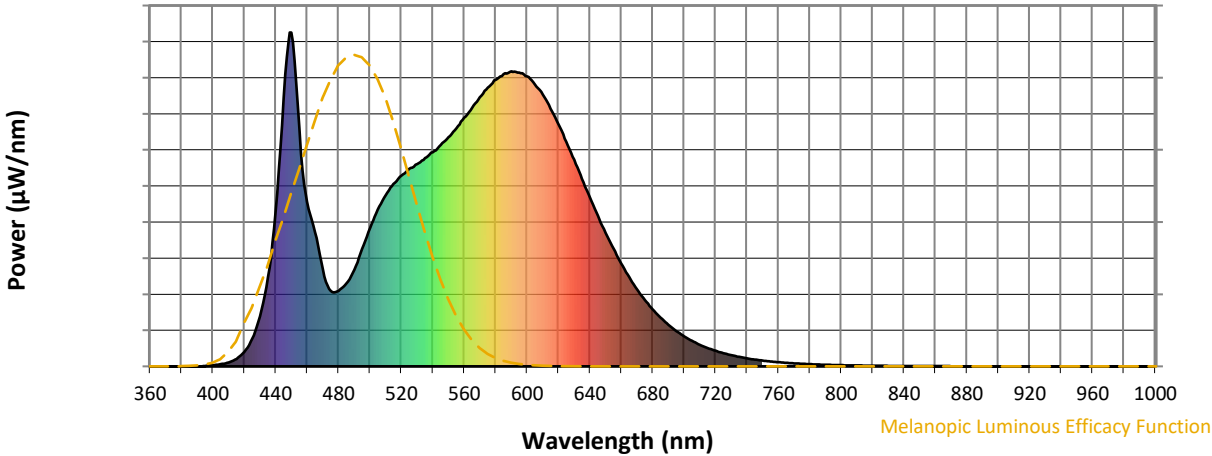
**Scotopic Lumens: NR**

**S/P: 1.66**

λ (nm)	Power W <sup>^</sup> /nm	Lumens (φ/nm)	λ (nm)	Power W <sup>^</sup> /nm	Lumens (φ/nm)	λ (nm)	Power W <sup>^</sup> /nm	Lumens (φ/nm)	λ (nm)	Power W <sup>^</sup> /nm	Lumens (φ/nm)	λ (nm)	Power W <sup>^</sup> /nm	Lumens (φ/nm)
360	0	NR	490	289	NR	620	725	NR	750	17	NR	880	0	NR
365	0	NR	495	351	NR	625	673	NR	755	15	NR	885	0	NR
370	0	NR	500	414	NR	630	619	NR	760	13	NR	890	0	NR
375	0	NR	505	470	NR	635	562	NR	765	11	NR	895	0	NR
380	0	NR	510	513	NR	640	506	NR	770	9	NR	900	0	NR
385	0	NR	515	546	NR	645	452	NR	775	8	NR	905	0	NR
390	0	NR	520	571	NR	650	400	NR	780	7	NR	910	0	NR
395	1	NR	525	592	NR	655	352	NR	785	6	NR	915	0	NR
400	3	NR	530	606	NR	660	307	NR	790	5	NR	920	0	NR
405	6	NR	535	624	NR	665	267	NR	795	4	NR	925	0	NR
410	12	NR	540	642	NR	670	231	NR	800	4	NR	930	0	NR
415	22	NR	545	663	NR	675	199	NR	805	3	NR	935	0	NR
420	44	NR	550	686	NR	680	171	NR	810	3	NR	940	0	NR
425	83	NR	555	713	NR	685	146	NR	815	2	NR	945	0	NR
430	150	NR	560	745	NR	690	125	NR	820	2	NR	950	0	NR
435	267	NR	565	774	NR	695	106	NR	825	2	NR	955	0	NR
440	466	NR	570	806	NR	700	90	NR	830	1	NR	960	0	NR
445	804	NR	575	835	NR	705	76	NR	835	1	NR	965	0	NR
450	1000	NR	580	858	NR	710	65	NR	840	1	NR	970	0	NR
455	715	NR	585	875	NR	715	55	NR	845	1	NR	975	0	NR
460	492	NR	590	884	NR	720	47	NR	850	1	NR	980	0	NR
465	402	NR	595	880	NR	725	40	NR	855	1	NR	985	0	NR
470	288	NR	600	868	NR	730	34	NR	860	1	NR	990	0	NR
475	226	NR	605	844	NR	735	28	NR	865	1	NR	995	0	NR
480	227	NR	610	814	NR	740	24	NR	870	0	NR	1000	0	NR
485	248	NR	615	771	NR	745	20	NR	875	0	NR			

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Melanopic Flux vs. Wavelength



Melanopic Lumens: NR

M/P: 3.37

λ (nm)	Power W <sup>^</sup> /nm	Lumens (φ/nm)	λ (nm)	Power W <sup>^</sup> /nm	Lumens (φ/nm)	λ (nm)	Power W <sup>^</sup> /nm	Lumens (φ/nm)	λ (nm)	Power W <sup>^</sup> /nm	Lumens (φ/nm)	λ (nm)	Power W <sup>^</sup> /nm	Lumens (φ/nm)
360	0	NR	490	289	NR	620	725	NR	750	17	NR	880	0	NR
365	0	NR	495	351	NR	625	673	NR	755	15	NR	885	0	NR
370	0	NR	500	414	NR	630	619	NR	760	13	NR	890	0	NR
375	0	NR	505	470	NR	635	562	NR	765	11	NR	895	0	NR
380	0	NR	510	513	NR	640	506	NR	770	9	NR	900	0	NR
385	0	NR	515	546	NR	645	452	NR	775	8	NR	905	0	NR
390	0	NR	520	571	NR	650	400	NR	780	7	NR	910	0	NR
395	1	NR	525	592	NR	655	352	NR	785	6	NR	915	0	NR
400	3	NR	530	606	NR	660	307	NR	790	5	NR	920	0	NR
405	6	NR	535	624	NR	665	267	NR	795	4	NR	925	0	NR
410	12	NR	540	642	NR	670	231	NR	800	4	NR	930	0	NR
415	22	NR	545	663	NR	675	199	NR	805	3	NR	935	0	NR
420	44	NR	550	686	NR	680	171	NR	810	3	NR	940	0	NR
425	83	NR	555	713	NR	685	146	NR	815	2	NR	945	0	NR
430	150	NR	560	745	NR	690	125	NR	820	2	NR	950	0	NR
435	267	NR	565	774	NR	695	106	NR	825	2	NR	955	0	NR
440	466	NR	570	806	NR	700	90	NR	830	1	NR	960	0	NR
445	804	NR	575	835	NR	705	76	NR	835	1	NR	965	0	NR
450	1000	NR	580	858	NR	710	65	NR	840	1	NR	970	0	NR
455	715	NR	585	875	NR	715	55	NR	845	1	NR	975	0	NR
460	492	NR	590	884	NR	720	47	NR	850	1	NR	980	0	NR
465	402	NR	595	880	NR	725	40	NR	855	1	NR	985	0	NR
470	288	NR	600	868	NR	730	34	NR	860	1	NR	990	0	NR
475	226	NR	605	844	NR	735	28	NR	865	1	NR	995	0	NR
480	227	NR	610	814	NR	740	24	NR	870	0	NR	1000	0	NR
485	248	NR	615	771	NR	745	20	NR	875	0	NR			

**Summary**

$R_f = 82.6$   
 $R_g = 95.1$   
 CIE  $R_a = 80.6$   
 $R_9 = -5.8$



**Color Vector Graphics**





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

CES01 = 85	CES26 = 79	CES51 = 94	CES76 = 72
CES02 = 61	CES27 = 93	CES52 = 94	CES77 = 82
CES03 = 31	CES28 = 90	CES53 = 88	CES78 = 71
CES04 = 69	CES29 = 83	CES54 = 89	CES79 = 91
CES05 = 48	CES30 = 95	CES55 = 88	CES80 = 88
CES06 = 50	CES31 = 86	CES56 = 84	CES81 = 80
CES07 = 40	CES32 = 78	CES57 = 84	CES82 = 95
CES08 = 39	CES33 = 90	CES58 = 84	CES83 = 95
CES09 = 29	CES34 = 85	CES59 = 90	CES84 = 90
CES10 = 74	CES35 = 92	CES60 = 91	CES85 = 78
CES11 = 57	CES36 = 85	CES61 = 87	CES86 = 73
CES12 = 63	CES37 = 91	CES62 = 87	CES87 = 83
CES13 = 42	CES38 = 95	CES63 = 84	CES88 = 86
CES14 = 74	CES39 = 98	CES64 = 78	CES89 = 76
CES15 = 71	CES40 = 94	CES65 = 75	CES90 = 87
CES16 = 46	CES41 = 98	CES66 = 75	CES91 = 72
CES17 = 49	CES42 = 92	CES67 = 73	CES92 = 62
CES18 = 56	CES43 = 88	CES68 = 77	CES93 = 78
CES19 = 71	CES44 = 99	CES69 = 82	CES94 = 60
CES20 = 65	CES45 = 93	CES70 = 72	CES95 = 70
CES21 = 86	CES46 = 90	CES71 = 67	CES96 = 82
CES22 = 78	CES47 = 95	CES72 = 89	CES97 = 90
CES23 = 91	CES48 = 84	CES73 = 65	CES98 = 84
CES24 = 90	CES49 = 89	CES74 = 93	CES99 = 73
CES25 = 71	CES50 = 94	CES75 = 69	



Color Rendition by Hue-Angle Bin



Measure Comparisons



(END OF REPORT)