



# LUMINAIRE TESTING LABORATORY, INC.

SUSTAINING  
MEMBER  
of the  
IESNA

905 Harrison Street · Allentown, PA 18103 · 610-770-1044 · Fax 610-770-8912 · www.LuminaireTesting.com

LTL NUMBER: 15454

DATE: 04-16-2009

PREPARED FOR: SUNOVIA ENERGY TECHNOLOGIES, INC.

CATALOG NUMBER: 21" FAIRVIEW LUMINAIRE

LUMINAIRE: CAST ALUMINUM HOUSING, CLEAR GLASS ENCLOSURE.

LAMP: 40 WHITE LEDS, 10 WITH SMALL CLEAR PLASTIC OPTICS AND 30 WITH FRESNEL PLASTIC LENSES BELOW.

LED POWER SUPPLY: ONE HIGH PERFECTION TECH LP1060-36-GG-170

POWER FACTOR: 0.985

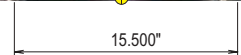
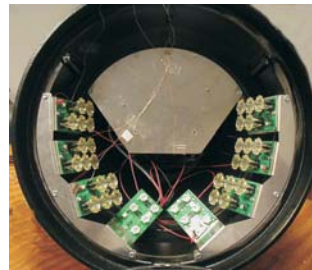
ELECTRICAL VALUES: 120.0VAC 0.4445A, 52.47W

LUMINAIRE EFFICACY: 39.3 LUMENS/WATT

NOTE: THIS TEST WAS PERFORMED USING THE CALIBRATED PHOTODETECTOR METHOD OF ABSOLUTE PHOTOMETRY.\*

IES CLASSIFICATION: **TYPE I**  
LONGITUDINAL CLASSIFICATION: **MEDIUM**  
CUTOFF CLASSIFICATION: **SEMI-CUTOFF\*\***

\*\*CUTOFF DESIGNATION IS NOT DEFINED FOR ABSOLUTE PHOTOMETRIC TESTS. THIS CUTOFF RATING IS BASED ON THE MAXIMUM CANDELA READING PER LUMINAIRE RATED AT 1000 LUMENS.



## FLUX DISTRIBUTION

LUMENS	DOWNWARD	UPWARD	TOTALS
HOUSE SIDE	235.53	0.00	235.53
STREET SIDE	1827.65	0.00	1827.65
TOTALS	2063.19	0.00	2063.19

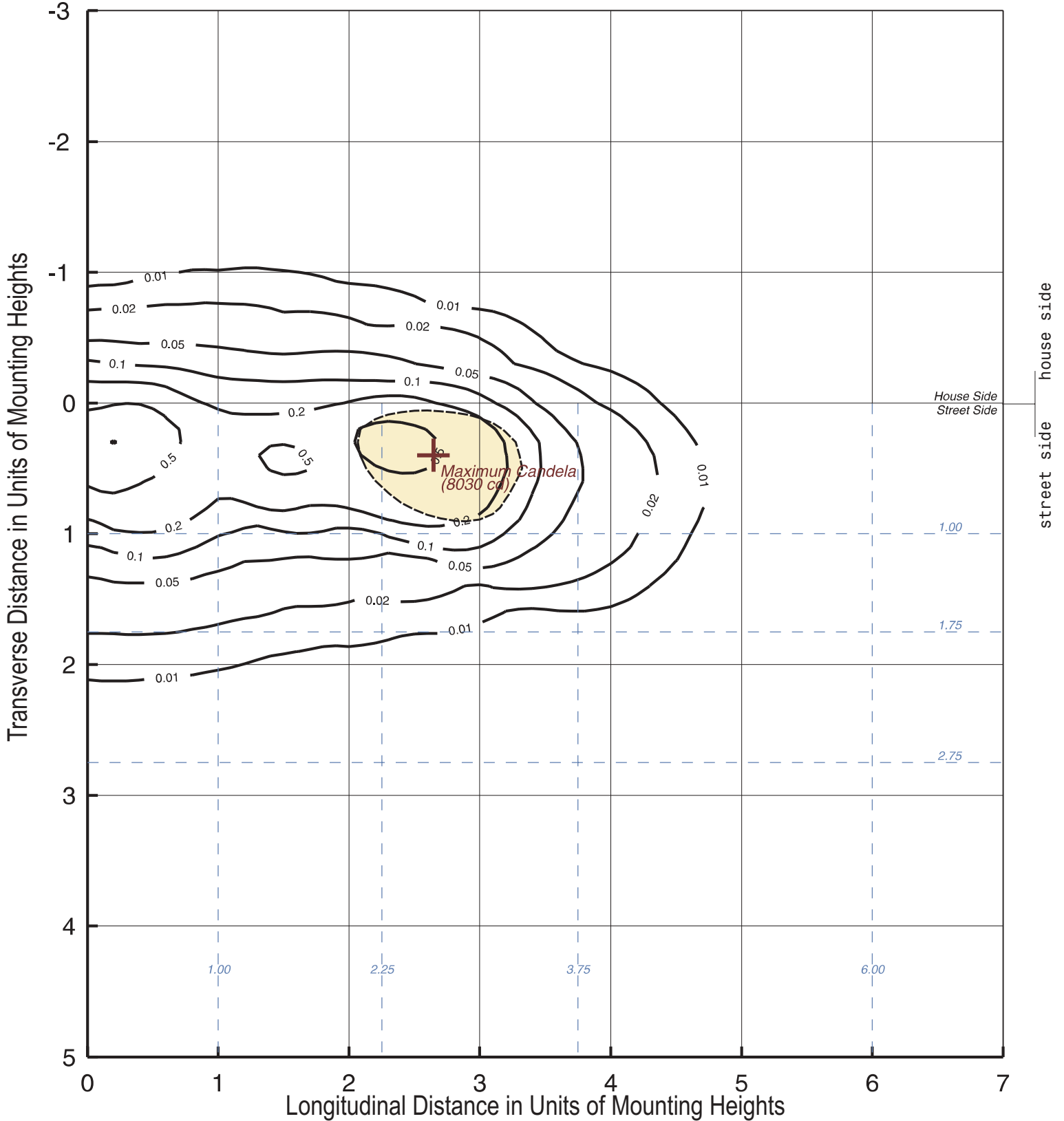
Approved By: MG

\*DATA WAS ACQUIRED USING THE CALIBRATED PHOTODETECTOR METHOD OF ABSOLUTE PHOTOMETRY. A UDT MODEL #211 PHOTODETECTOR AND UDT MODEL #S370 OPTOMETER COMBINATION WERE USED AS A STANDARD. A SPECTRAL MISMATCH CORRECTION FACTOR WAS EMPLOYED BASED ON THE SPECTRAL RESPONSIVITY OF THE PHOTODETECTOR AND THE SPECTRAL POWER DISTRIBUTION OF THE TEST SUBJECT.

**TESTING WAS PERFORMED IN ACCORDANCE WITH IES LM-79-08.**  
TEST ANGULAR INCREMENTS AND REPORT FORMATTING WAS BASED ON IES LM-31-95.



# ISOFOOTCANDLE LINES OF HORIZONTAL ILLUMINATION VALUES BASED ON 25.00 FOOT MOUNTING HEIGHT



PROJECTION OF HALF-MAX CANDELA CONTOUR



CANDELA DISTRIBUTION

Table with 12 columns (0, 5, 15, 25, 35, 45, 55, 65, 75, 81.4, 85) and 21 rows (180, 175, 165, 155, 145, 135, 125, 115, 105, 95, 90, 87.5, 85, 82.5, 80, 77.5, 75, 72.5, 70, 69.5, 67.5, 65, 62.5, 60, 57.5, 55, 52.5, 50, 47.5, 45, 40, 35, 30, 25, 20, 15, 10, 5, 0). Values represent candela distribution for various beam angles.

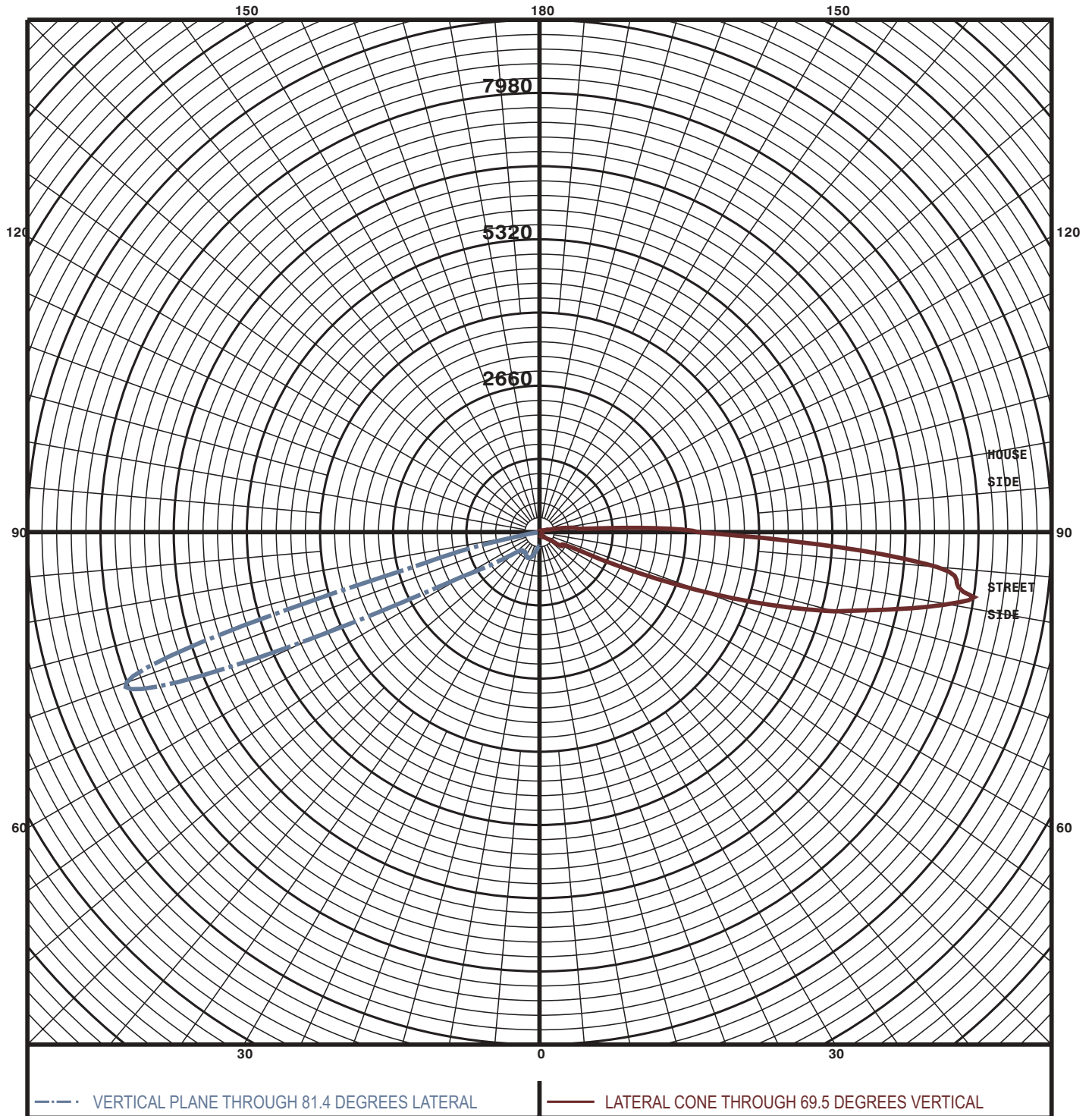


CANDELA DISTRIBUTION

Table with 12 columns (90, 95, 105, 115, 125, 135, 145, 155, 165, 175, 180) and 12 rows (180, 175, 165, 155, 145, 135, 125, 115, 105, 95, 90, 87.5, 85, 82.5, 80, 77.5, 75, 72.5, 70, 69.5, 67.5, 65, 62.5, 60, 57.5, 55, 52.5, 50, 47.5, 45, 40, 35, 30, 25, 20, 15, 10, 5, 0). Each cell contains a numerical value representing candela distribution.

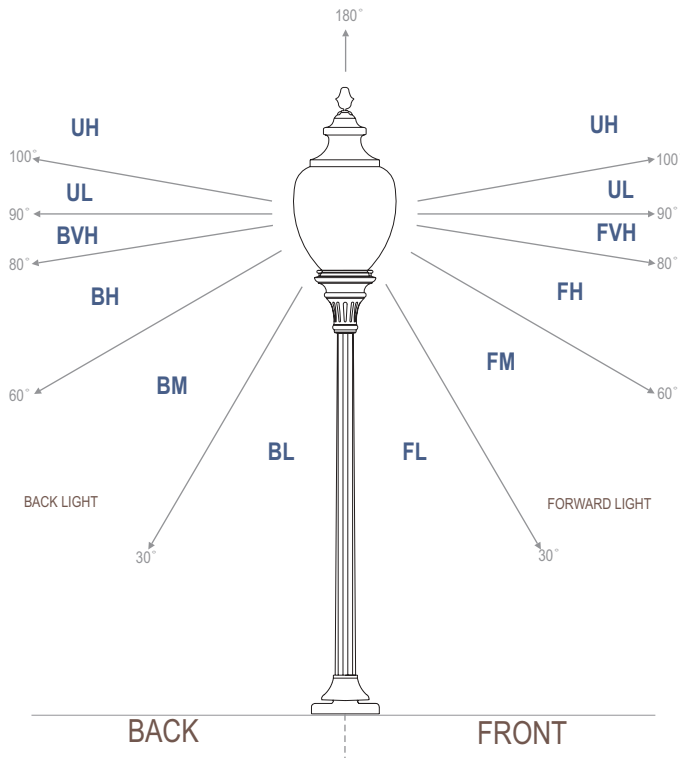


MAXIMUM PLANE AND CONE PLOTS OF CANDELA





FLUX DISTRIBUTION TABLE BASED ON THE IESNA LUMINAIRE CLASSIFICATION SYSTEM  
FLUX



ZONE	LUMINAIRE LUMENS	% OF LUMINAIRE LUMENS
FORWARD LIGHT	1828	88.6
FL ( 0° -30° )	260	12.6
FM (30° -60° )	653	31.7
FH (60° -80° )	909	44.1
FVH (80° -90° )	6	0.3

BACK LIGHT	236	11.4
BL ( 0° -30° )	54	2.6
BM (30° -60° )	92	4.4
BH (60° -80° )	88	4.3
BVH (80° -90° )	2	0.1

UPLIGHT	0	0
UL (90° -100° )	0	0
UH (100° -180° )	0	0

TRAPPED LIGHT	NA	NA
---------------	----	----

