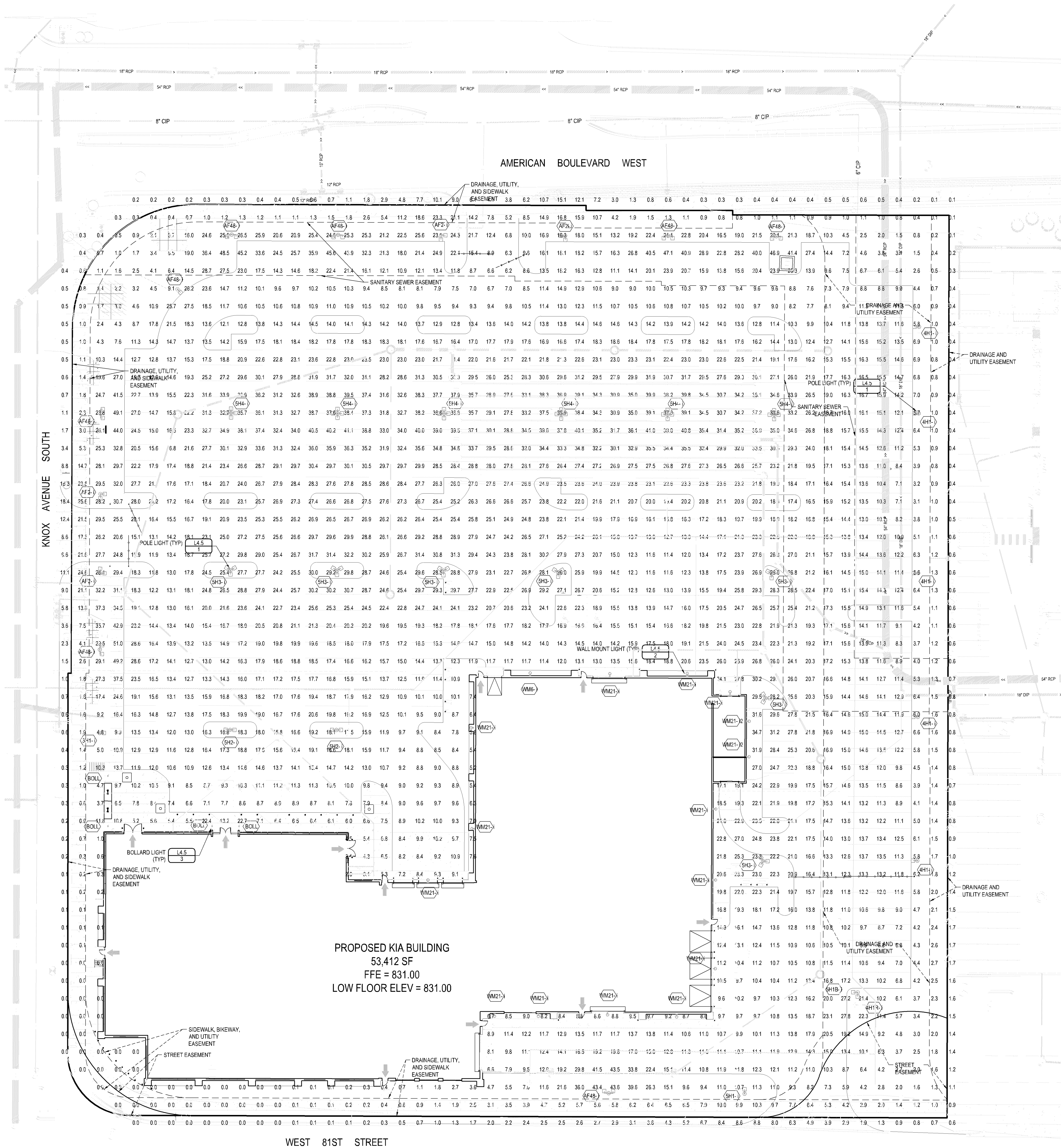




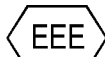
GENERAL NOTES

- Coordinate with electrical contractor to provide conduits for site lighting.
 - Light pole base shall be designed and provided by others. All bases in green space shall be eight (8") inch height. All bases in pavement shall be thirty-six (36") inch height.
 - Mounting height listed in luminaire schedule includes height of light pole base.
 - Calculations based on LSI lighting fixtures. Any substitutions need to meet city code requirements.
- Existing light pole and luminaire.
- All existing light poles shall be replaced with bronze poles. All proposed light poles shall be bronze.
- Quantities shown are for this sheet only.

BLOOMINGTON CODE REQUIREMENTS

- 33' - maximum pole height
- 10:1 - maximum uniformity ratio (50% reduction for perimeter 25')
- 2.0 fc - minimum foot candles (pavement surface)
- 2.0 fc - maximum foot candles (at property line)
- 10.0 fc - minimum foot candles (primary building entrance/exit, radius of 2x door opening)
- 2.0 fc - minimum foot candles (secondary building entrance/exit, 5' radius)
- 3.0 fc - minimum foot candles (pedestrian access surface from primary building entrance, within 30')
- 2.0 fc - minimum foot candles (pedestrian access surface to primary building entrance, beyond 30')
- 4.0 fc - minimum foot candles (pedestrian crosswalk, 2x fc level of pavement)
- 50,000 maximum lumens (per single site source, initial lumens)

LEGEND



Luminaire callout

LUMINAIRE SCHEDULE

CALLOUT	SYMBOL	QUANTITY	MOUNTING	MODEL	MOUNTING HEIGHT
3H1-M		1	POLE	LSI INDUSTRIES, INC., MRM-LED-48-SL-3-50-70CRI-IL	25'
4H1-M		5	POLE	LSI INDUSTRIES, INC., MRM-LED-48-SL-4-50-70CRI-IL	25'
4H1R-M		1	POLE	LSI INDUSTRIES, INC., MRM-LED-48-SL-4-50-70CRI	25'
5H1B-M		1	POLE	LSI INDUSTRIES, INC., MRM-LED-36-SL-SW-50-70CRI	25'
5H1-M		1	POLE	LSI INDUSTRIES, INC., MRM-LED-48-SL-SW-50-70CRI	25'
5H2-M		2	POLE	LSI INDUSTRIES, INC., MRM-LED-48-SL-SW-50-70CRI	25'
5H3-M		7	POLE	LSI INDUSTRIES, INC., MRM-LED-48-SL-SW-50-70CRI	25'
5H4-M		6	POLE	LSI INDUSTRIES, INC., MRM-LED-48-SL-SW-50-70CRI	25'
AF2-M		4	POLE	LSI INDUSTRIES, INC., MRM-LED-48-SL-FTA-50-70CRI-IL	25'
AF4B-M		16	POLE	LSI INDUSTRIES, INC., MRM-LED-48-SL-FTA-50-70CRI-IL	25'
BOLL-M		4	POLE	LSI INDUSTRIES, INC., MRB-LED-30L-ACR-S-50-HSS	3'-6"
WM6-M		1	WALL	LSI INDUSTRIES, INC., XWM-4-LED-06L-50	22'
WM21-M		13	WALL	LSI INDUSTRIES, INC., XWM-4-LED-21L-50	22'
WM21-M2		2	WALL	LSI INDUSTRIES, INC., XWM-4-LED-21L-50	15'

DEVELOPER

THE LUTHER COMPANY, LLLP.
3701 ALABAMA AVENUE SOUTH
ST. LOUIS PARK, MN
TEL (952) 258-8800 - FAX (952) 258-8900

MUNICIPALITY



PROJECT

LUTHER
BLOOMINGTON KIA
BLOOMINGTON, MN

ISSUE / REVISION HISTORY

DATE	ISSUE / REVISION	REVIEW
07 FEB 2024	DRG SUBMITTAL	SES
05 AUG 2024	CLIENT REVIEW	SES
14 AUG 2024	CITY SUBMITTAL	SES
08 SEP 2024	CITY REVIEW	SES
16 OCT 2024	WATERSHED SUBMITTAL	SES
04 NOV 2024	75% PROGRESS SET	SES
13 NOV 2024	80% PROGRESS SET	SES
18 NOV 2024	WATERSHED SUBMITTAL	SES
25 NOV 2024	PERMIT SET	SES
10 DEC 2024	RESPONSE TO CITY COMMENTS	SES
07 JAN 2025		SES

PL202400150
PL2024-150

CERTIFICATION

IF THE SIGNATURE, SEAL OR FOUR LINES DIRECTLY ABOVE ARE NOT
VISIBLE, THIS SHEET HAS BEEN REPRODUCED BEYOND ITS INTENDED
READABILITY AND IS NO LONGER A VALID DOCUMENT. PLEASE CONTACT
THE ENGINEER TO REQUEST ADDITIONAL DOCUMENTS.

RESPONSE TO CITY COMMENTS
01.07.2025

LANDFORM
From Site to Finish

105 South Fifth Avenue
Suite 513
Minneapolis, MN 55401

Tel: 612-252-9070
Fax: 612-252-9077
Web: landform.net

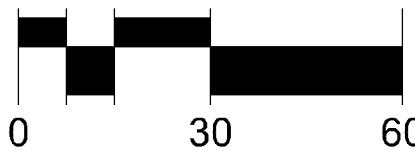
FILE NAME L401LUT061.DWG
PROJECT NO. LUT23061

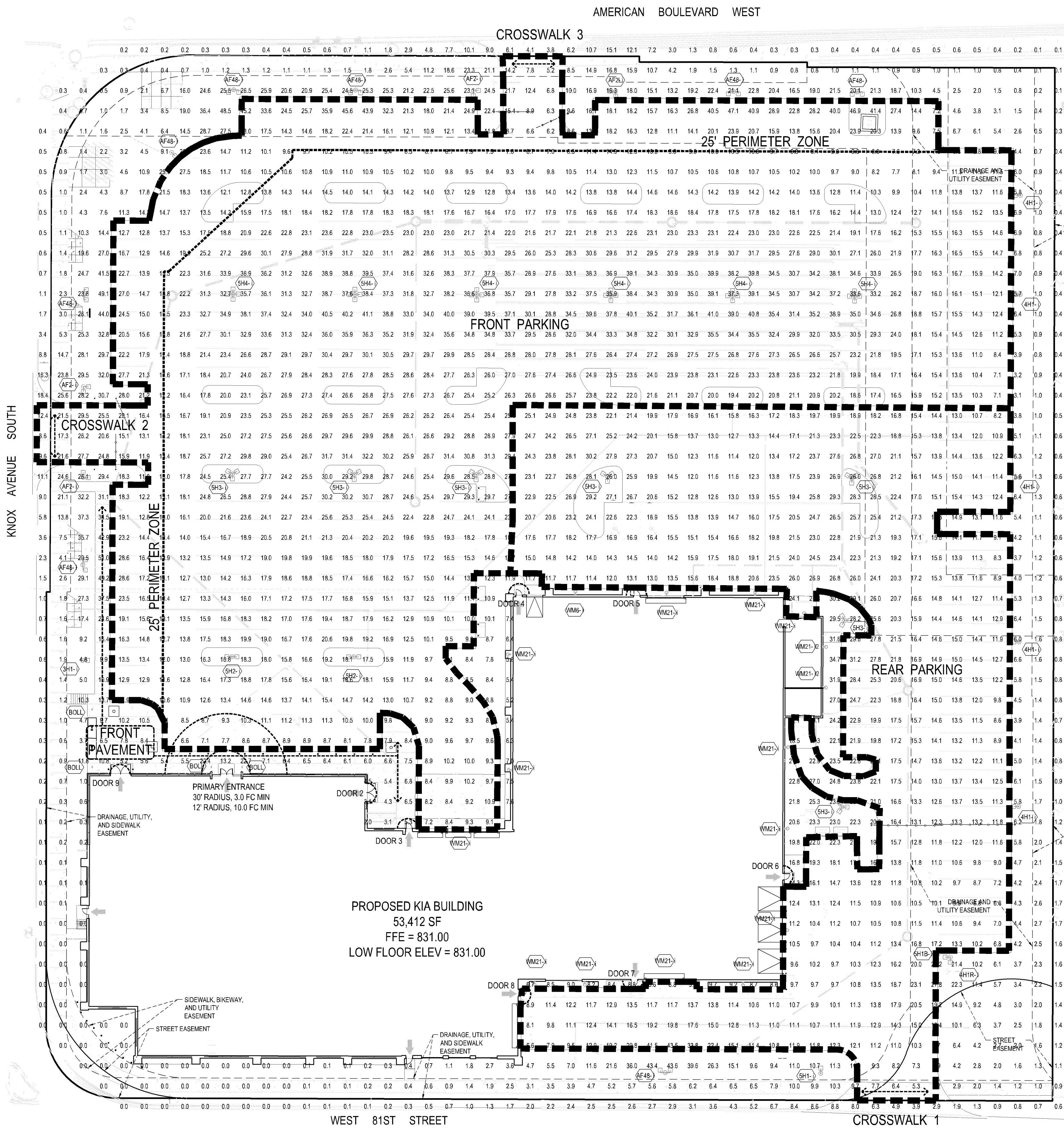
PHOTOMETRICS
INITIAL VALUES

L4.1



NORTH





LEGEND

----- Calculation Area Boundary

EEE Luminaire callout

- GENERAL NOTES**
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 - Calculations based on LSI lighting fixtures. Any substitutions need to meet city code requirements.

CALCULATIONS

EAST PROPERTY LINE	<table><tr><td>AVERAGE FOOT-CANDLES</td><td>0.89</td></tr><tr><td>MAXIMUM FOOT-CANDLES</td><td>1.9</td></tr><tr><td>MINIMUM FOOT-CANDLES</td><td>0.1</td></tr><tr><td>MINIMUM TO MAXIMUM FC RATIO</td><td>0.05</td></tr><tr><td>MAXIMUM TO MINIMUM FC RATIO</td><td>21.35</td></tr><tr><td>AVERAGE TO MINIMUM FC RATIO</td><td>9.81</td></tr></table>	AVERAGE FOOT-CANDLES	0.89	MAXIMUM FOOT-CANDLES	1.9	MINIMUM FOOT-CANDLES	0.1	MINIMUM TO MAXIMUM FC RATIO	0.05	MAXIMUM TO MINIMUM FC RATIO	21.35	AVERAGE TO MINIMUM FC RATIO	9.81	MAIN ENTRANCE 12' RADIUS	<table><tr><td>AVERAGE FOOT-CANDLES</td><td>18.14</td></tr><tr><td>MAXIMUM FOOT-CANDLES</td><td>20.8</td></tr><tr><td>MINIMUM FOOT-CANDLES</td><td>13.5</td></tr><tr><td>MAXIMUM TO MINIMUM FC RATIO</td><td>1.55</td></tr><tr><td>AVERAGE TO MINIMUM FC RATIO</td><td>1.35</td></tr></table>	AVERAGE FOOT-CANDLES	18.14	MAXIMUM FOOT-CANDLES	20.8	MINIMUM FOOT-CANDLES	13.5	MAXIMUM TO MINIMUM FC RATIO	1.55	AVERAGE TO MINIMUM FC RATIO	1.35	25' PERIMETER ZONE	<table><tr><td>AVERAGE FOOT-CANDLES</td><td>17.52</td></tr><tr><td>MAXIMUM FOOT-CANDLES</td><td>43.1</td></tr><tr><td>MINIMUM FOOT-CANDLES</td><td>6</td></tr><tr><td>MAXIMUM TO MINIMUM FC RATIO</td><td>7.13</td></tr><tr><td>AVERAGE TO MINIMUM FC RATIO</td><td>2.9</td></tr></table>	AVERAGE FOOT-CANDLES	17.52	MAXIMUM FOOT-CANDLES	43.1	MINIMUM FOOT-CANDLES	6	MAXIMUM TO MINIMUM FC RATIO	7.13	AVERAGE TO MINIMUM FC RATIO	2.9	FRONT PAVEMENT	<table><tr><td>AVERAGE FOOT-CANDLES</td><td>15.27</td></tr><tr><td>MAXIMUM FOOT-CANDLES</td><td>46.9</td></tr><tr><td>MINIMUM FOOT-CANDLES</td><td>2.4</td></tr><tr><td>MAXIMUM TO MINIMUM FC RATIO</td><td>19.27</td></tr><tr><td>AVERAGE TO MINIMUM FC RATIO</td><td>6.28</td></tr></table>	AVERAGE FOOT-CANDLES	15.27	MAXIMUM FOOT-CANDLES	46.9	MINIMUM FOOT-CANDLES	2.4	MAXIMUM TO MINIMUM FC RATIO	19.27	AVERAGE TO MINIMUM FC RATIO	6.28																												
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MINIMUM FOOT-CANDLES	16.7																																																																												
MINIMUM TO MAXIMUM FC RATIO	0.74																																																																												
MAXIMUM TO MINIMUM FC RATIO	1.35																																																																												
AVERAGE TO MINIMUM FC RATIO	1.15																																																																												
AVERAGE FOOT-CANDLES	6.54																																																																												
MAXIMUM FOOT-CANDLES	8.8																																																																												
MINIMUM FOOT-CANDLES	4.8																																																																												
MINIMUM TO MAXIMUM FC RATIO	0.54																																																																												
MAXIMUM TO MINIMUM FC RATIO	1.84																																																																												
AVERAGE TO MINIMUM FC RATIO	1.35																																																																												

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MUNICIPALITY

BLOOMINGTON

PROJECT

LUTHER
BLOOMINGTON KIA
BLOOMINGTON, MN

ISSUE / REVISION HISTORY

DATE	ISSUE / REVISION	REVIEW
07 FEB 2024	DRG SUBMITTAL	SES
05 AUG 2024	CITY SUBMITTAL	SES
08 SEP 2024	CITY RESUBMITTAL	SES
16 OCT 2024	WATERSHED SUBMITTAL	SES
04 NOV 2024	75% PROGRESS SET	SES
13 NOV 2024	WATERSHED RESUBMITTAL	SES
18 NOV 2024	80% PROGRESS SET	SES
23 NOV 2024	WATERSHED RESUBMITTAL	SES
10 DEC 2024	PERMIT SET	SES
07 JAN 2025	RESPONSE TO CITY COMMENTS	SES

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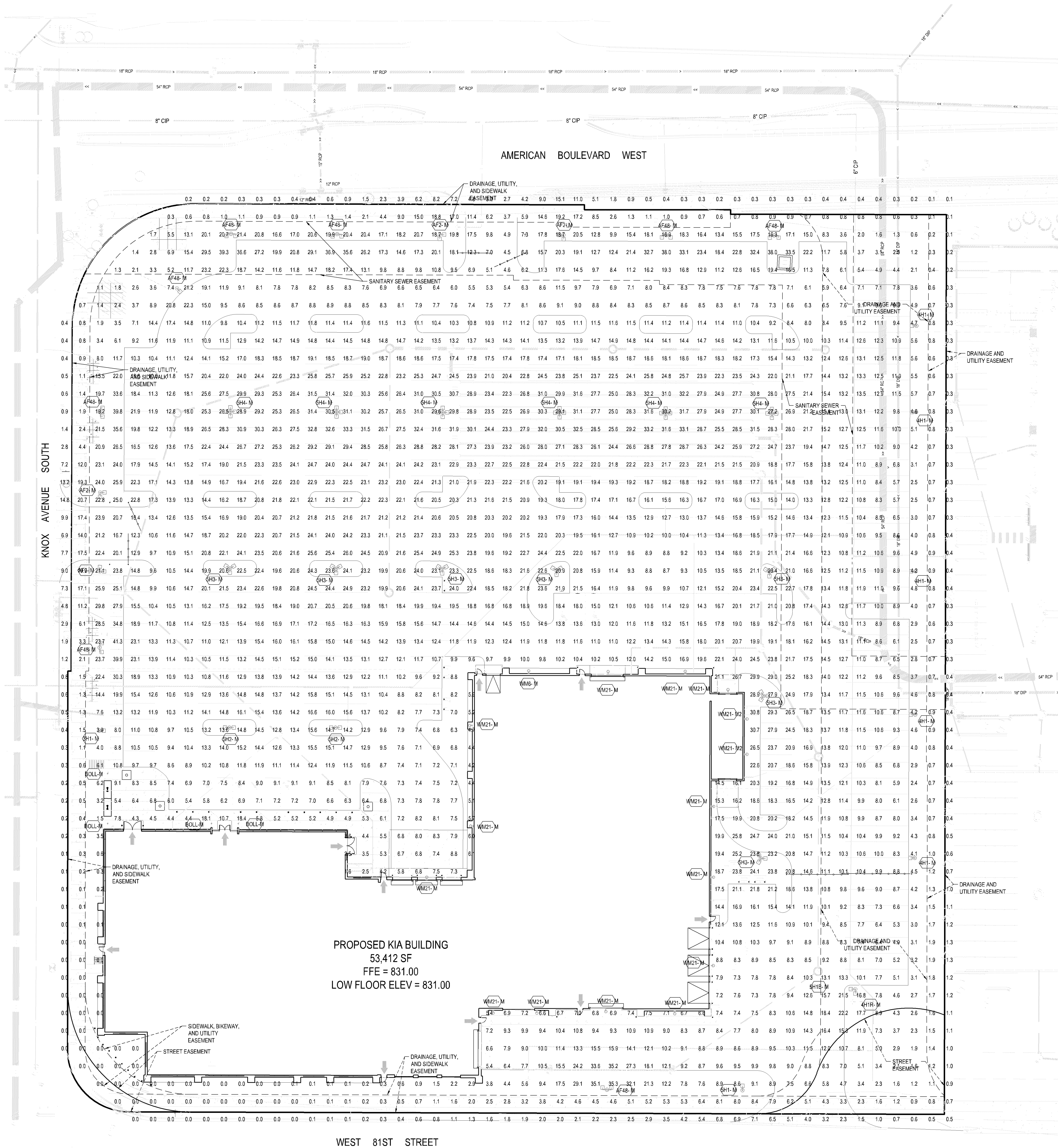
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Fax: 612-252-9077
Web: landform.net

FILE NAME: L402LUT061.DWG
PROJECT NO.: LUT23061

INITIAL VALUES CALCULATIONS

L4.2

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GENERAL NOTES

- Coordinate with electrical contractor to provide conduits for site lighting.
 - Light pole base shall be designed and provided by others. All bases in green space shall be eight (8") inch height. All bases in pavement shall be thirty-six (36") inch height.
 - Mounting height listed in luminaire schedule includes height of light pole base.
 - Calculations based on LSI lighting fixtures. Any substitutions need to meet city code requirements.
- Existing light pole and luminaire.
- All existing light poles shall be replaced with bronze poles. All proposed light poles shall be bronze.
- Quantities shown are for this sheet only.

BLOOMINGTON CODE REQUIREMENTS

- 33' - maximum pole height
10:1 - maximum uniformity ratio (50% reduction for perimeter 25')
2.0 fc - minimum foot candles (pavement surface)
2.0 fc - maximum foot candles (at property line)
10.0 fc - minimum foot candles (primary building entrance/exit, radius of 2x door opening)
2.0 fc - minimum foot candles (secondary building entrance/exit, 5' radius)
3.0 fc - minimum foot candles (pedestrian access surface from primary building entrance, within 30')
2.0 fc - minimum foot candles (pedestrian access surface to primary building entrance, beyond 30')
4.0 fc - minimum foot candles (pedestrian crosswalk, 2x fc level of pavement)
50,000 maximum lumens (per single site source, initial lumens)

LEGEND



Luminaire callout

LUMINAIRE SCHEDULE

CALLOUT	SYMBOL	QUANTITY	MOUNTING	MODEL	MOUNTING HEIGHT
3H1-M		1	POLE	LSI INDUSTRIES, INC., MRM-LED-48-SL-3-50-70CRI-IL	25'
4H1-M		5	POLE	LSI INDUSTRIES, INC., MRM-LED-48-SL-4-50-70CRI-IL	25'
4H1R-M		1	POLE	LSI INDUSTRIES, INC., MRM-LED-48-SL-RC-50-70CRI	25'
5H1B-M		1	POLE	LSI INDUSTRIES, INC., MRM-LED-36-SL-5W-50-70CRI	25'
5H1-M		1	POLE	LSI INDUSTRIES, INC., MRM-LED-48-SL-5W-50-70CRI	25'
5H2-M		2	POLE	LSI INDUSTRIES, INC., MRM-LED-48-SL-5W-50-70CRI	25'
5H3-M		7	POLE	LSI INDUSTRIES, INC., MRM-LED-48-SL-5W-50-70CRI	25'
5H4-M		6	POLE	LSI INDUSTRIES, INC., MRM-LED-48-SL-5W-50-70CRI	25'
AF2-M		4	POLE	LSI INDUSTRIES, INC., MRM-LED-48-SL-FTA-50-70CRI-IL	25'
AF4B-M		16	POLE	LSI INDUSTRIES, INC., MRM-LED-48-SL-FTA-50-70CRI-IL	25'
BOLL-M		4	POLE	LSI INDUSTRIES, INC., MRB-LED-30L-ACR-S-50-HSS	3'-6"
WM6-M		1	WALL	LSI INDUSTRIES, INC., XWM-4-LED-56L-50	22'
WM21-M		18	WALL	LSI INDUSTRIES, INC., XWM-4-LED-21L-50	22'
WM21-M2		2	WALL	LSI INDUSTRIES, INC., XWM-4-LED-21L-50	18'

DEVELOPER

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ISSUE / REVISION HISTORY

DATE	ISSUE / REVISION	REVIEW
07 FEB 2024	ORC SUBMITTAL	SES
05 AUG 2024	CLIENT REVIEW	SES
14 AUG 2024	CITY SUBMITTAL	SES
08 SEP 2024	CITY REVIEW	SES
10 OCT 2024	WATERSHED SUBMITTAL	SES
04 NOV 2024	75% PROGRESS SET	SES
13 NOV 2024	WATERSHED SUBMITTAL	SES
18 NOV 2024	80% PROGRESS SET	SES
25 NOV 2024	WATERSHED SUBMITTAL	SES
18 DEC 2024	PERMIT SET	SES
07 JAN 2025	RESPONSE TO CITY COMMENTS	SES

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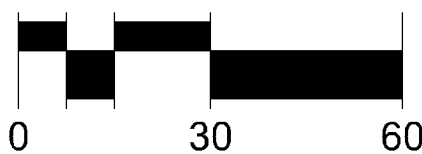
FILE NAME L403LUT061.DWG
PROJECT NO. LUT23061

PHOTOMETRICS
MAINTAINED VALUES

L4.3



NORTH



LEGEND

Calculation Area Boundary

EEE

Luminaire callout

GENERAL NOTES

1. Coordinate with electrical contractor to provide conduits for site lighting.

2. Light pole base shall be designed and provided by others. All bases in green space shall be eight (8") inch height. All bases in pavement shall be thirty-six (36") inch height.

3. Mounting height listed in luminaire schedule includes height of light pole base.

4. Calculations based on LSI lighting fixtures. Any substitutions need to meet city code requirements.

CALCULATIONS

EAST PROPERTY LINE	
AVERAGE FOOT-CANDLES	0.6
MAXIMUM FOOT-CANDLES	1.4
MINIMUM FOOT-CANDLES	0.1
MINIMUM TO MAXIMUM FC RATIO	0.05
MAXIMUM TO MINIMUM FC RATIO	19.86
AVERAGE TO MINIMUM FC RATIO	8.5

MAIN ENTRANCE 12' RADIUS	
AVERAGE FOOT-CANDLES	14.95
MAXIMUM FOOT-CANDLES	17.3
MINIMUM FOOT-CANDLES	10.9
MAXIMUM TO MINIMUM FC RATIO	1.59
AVERAGE TO MINIMUM FC RATIO	1.37

25' PERIMETER ZONE	
AVERAGE FOOT-CANDLES	14.23
MAXIMUM FOOT-CANDLES	34.9
MINIMUM FOOT-CANDLES	4.8
MAXIMUM TO MINIMUM FC RATIO	7.56
AVERAGE TO MINIMUM FC RATIO	3.09

FRONT PAVEMENT	
AVERAGE FOOT-CANDLES	10.03
MAXIMUM FOOT-CANDLES	36
MINIMUM FOOT-CANDLES	2
MAXIMUM TO MINIMUM FC RATIO	17.56
AVERAGE TO MINIMUM FC RATIO	4.9

DEVELOPER

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ISSUE / REVISION HISTORY

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25 NOV 2024	WATERSHED SUBMITTAL	SES
10 DEC 2024	PERMIT SET	SES
07 JAN 2025	RESPONSE TO CITY COMMENTS	SES

REAR PARKING

AVERAGE FOOT-CANDLES	13.2
MAXIMUM FOOT-CANDLES	28.9
MINIMUM FOOT-CANDLES	3.3
MAXIMUM TO MINIMUM FC RATIO	8.77
AVERAGE TO MINIMUM FC RATIO	4

FRONT PARKING

AVERAGE FOOT-CANDLES	16.9
MAXIMUM FOOT-CANDLES	32.8
MINIMUM FOOT-CANDLES	3.2
MAXIMUM TO MINIMUM FC RATIO	10.17
AVERAGE TO MINIMUM FC RATIO	5.23

PRIMARY ENTRANCE

AVERAGE FOOT-CANDLES	7.94
MAXIMUM FOOT-CANDLES	17.1
MINIMUM FOOT-CANDLES	4.2
MAXIMUM TO MINIMUM FC RATIO	4.05
AVERAGE TO MINIMUM FC RATIO	1.88

DOOR 2

AVERAGE FOOT-CANDLES	3.08
MAXIMUM FOOT-CANDLES	3.1
MINIMUM FOOT-CANDLES	3.1
MAXIMUM TO MINIMUM FC RATIO	1
AVERAGE TO MINIMUM FC RATIO	1

DOOR 3

AVERAGE FOOT-CANDLES	4.1
MAXIMUM FOOT-CANDLES	4.1
MINIMUM FOOT-CANDLES	4.1
MAXIMUM TO MINIMUM FC RATIO	1
AVERAGE TO MINIMUM FC RATIO	1

DOOR 4

AVERAGE FOOT-CANDLES	7.61
MAXIMUM FOOT-CANDLES	7.6
MINIMUM FOOT-CANDLES	7.6
MAXIMUM TO MINIMUM FC RATIO	1
AVERAGE TO MINIMUM FC RATIO	1

DOOR 5

AVERAGE FOOT-CANDLES	7.77
MAXIMUM FOOT-CANDLES	7.8
MINIMUM FOOT-CANDLES	7.8
MAXIMUM TO MINIMUM FC RATIO	1
AVERAGE TO MINIMUM FC RATIO	1

DOOR 6

AVERAGE FOOT-CANDLES	11.39
MAXIMUM FOOT-CANDLES	11.4
MINIMUM FOOT-CANDLES	11.4
MAXIMUM TO MINIMUM FC RATIO	1
AVERAGE TO MINIMUM FC RATIO	1

DOOR 7

AVERAGE FOOT-CANDLES	7.53
MAXIMUM FOOT-CANDLES	7.5
MINIMUM FOOT-CANDLES	7.5
MAXIMUM TO MINIMUM FC RATIO	1
AVERAGE TO MINIMUM FC RATIO	1

DOOR 8

AVERAGE FOOT-CANDLES	7.17
MAXIMUM FOOT-CANDLES	7.2
MINIMUM FOOT-CANDLES	7.2
MAXIMUM TO MINIMUM FC RATIO	1
AVERAGE TO MINIMUM FC RATIO	1

DOOR 9

AVERAGE FOOT-CANDLES	3.55
MAXIMUM FOOT-CANDLES	3.6
MINIMUM FOOT-CANDLES	3.6
MAXIMUM TO MINIMUM FC RATIO	1
AVERAGE TO MINIMUM FC RATIO	1

CROSSWALK 1

AVERAGE FOOT-CANDLES	5.58
MAXIMUM FOOT-CANDLES	7.9
MINIMUM FOOT-CANDLES	3.8
MINIMUM TO MAXIMUM FC RATIO	0.46
MAXIMUM TO MINIMUM FC RATIO	2.19
AVERAGE TO MINIMUM FC RATIO	1.54

CROSSWALK 2

AVERAGE FOOT-CANDLES	13.97
MAXIMUM FOOT-CANDLES	16.7
MINIMUM FOOT-CANDLES	12
MINIMUM TO MAXIMUM FC RATIO	0.72
MAXIMUM TO MINIMUM FC RATIO	1.39
AVERAGE TO MINIMUM FC RATIO	1.16

CROSSWALK 3

AVERAGE FOOT-CANDLES	5.44
MAXIMUM FOOT-CANDLES	8.9
MINIMUM FOOT-CANDLES	3.5
MINIMUM TO MAXIMUM FC RATIO	0.38
MAXIMUM TO MINIMUM FC RATIO	2.55
AVERAGE TO MINIMUM FC RATIO	1.55

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PROJECT NO.: LUT23061

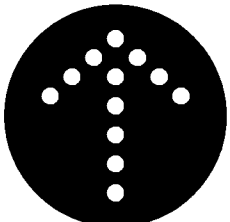
MAINTAINED VALUES CALCULATIONS

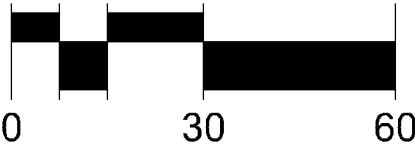
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Catalog # : _____ Project : _____
Prepared By : _____ Date : _____ Type : _____

Mirada Bollard (MRB)

Low Level Lighting



OVERVIEW	
Lumen Package	1,000 - 3,000
Wattage Range	23 - 38
Efficacy Range (LPW)	72 - 84
Weight lbs (kg)	40 (18)

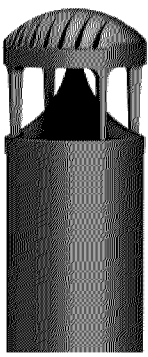
FEATURES & SPECIFICATIONS

Construction

- Precision 2pc die-cast aluminum head maintains durability and consistency while providing vandal resistance, effective heat dissipation, and superior aesthetics.
 - 8-5/8" OD one-piece extruded aluminum heavy wall .322 inch thick seamless shaft. Various heights are available in 6" increments starting at a minimum of 26" (maximum height is 62").
 - Lower housing attaches to cast aluminum universal base plate with four stainless steel roll pins. Accommodates 4.5" - 6" bolt circles.
 - Optional roughneck zinc plated steel base plate (.375" thick) with welded U shaped reinforcement, 3/8" diameter 302 stainless steel roll pins with 10,000 lb. shear load.
 - IP66 rated Optical and Driver compartment protects integral components from harsh environments.
 - Fixtures are finished with LSI's DuraGrip® polyester powder coat finishing process. The DuraGrip finish withstands extreme weather changes without cracking or peeling. Other standard LSI finishes available. Consult factory.
 - Luminaire is proudly manufactured in the U.S. of U.S. and imported parts.
 - Shipping weight: 40 lbs in carton.
- ##### Optical System
- Available in two optical distributions, symmetrical and asymmetrical.
 - High transmission clear flat acrylic lens seals the luminaire's optical chamber to IP66.
 - Available in 5000K, 4000K, 3000K, and 2700K color temperatures per ANSI

QUICK LINKS

Ordering Guide	Performance	Photometrics	Dimensions
----------------	-------------	--------------	------------



- C78.377. Also available in Phosphor Converted Amber. Consult Factory for other color temperature requirements.
- Minimum CRI of 70.
- ##### Electrical
- High-performance programmable driver features over-voltage, under-voltage, short-circuit and over temperature protection. Custom lumen and wattage packages available.
 - 0-10V dimming (10% - 100%) standard.
 - Standard Universal Voltage (120-277 Vac) Input 50/60 Hz. Optional High Voltage 347-480 Vac Input available.
 - L91 Calculated Life: >100K Hours calculated @ 25°C per IESNA TM-21-11.
 - Total harmonic distortion: <20%.
 - Operating temperature: -40°C to +50°C (-40°F to +122°F); Cold-weather emergency battery backup rated for -20°C minimum ambient.
 - Power factor: >.90.
 - Input power stays constant over life.
 - High-efficacy LEDs with integrated circuit board mount to the housing to maximize heat dissipation and promote long life.
 - Driver components are fully encased in potting long material for moisture resistance. Driver complies with FCC standards. Driver and key electronic components can easily be accessed.
 - Field replaceable surge protection device meets a minimum Category C Low operation (per ANSI/IEEE C62.41.2).
- ##### Installation
- Optional 120v-277v integral emergency battery pack is available. The 90 - minute batteries provide constant power to the LED system, ensuring code compliance. A test switch/indicator button is installed on the housing for ease of maintenance.
 - Easy leveling even in uneven areas and full 360-degree rotation for precise alignment during installation.
 - Base plate installs with four heavy-duty 3/8" x 10" galvanized steel anchor bolts.
 - Base plate attaches to lower extruded housing via four stainless steel roll pins.
- ##### Warranty
- LSI luminaires carry a 5-year limited warranty. Refer to <https://www.lsiindustries.com/resources/terms-and-warranty.aspx> for more information.
- ##### Listings
- Listings
 - Listed to UL 1598 and UL 8750.
 - RoHS Compliant.
 - Meets Buy American Act requirements.
 - Suitable for wet locations.
 - IP66 rated Driver compartment and IP66 rated optical chamber per IEC 60598.
 - IDA compliant; with 3000K or 2700K color temperature selection.



Catalog # : _____ Project : _____ Type : _____
Prepared By : _____ Date : _____

Mirada Medium Wall Sconce (XWM)

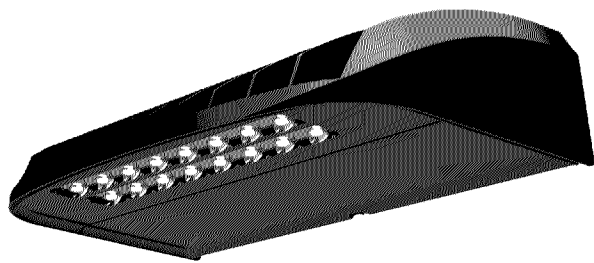
Outdoor Wall Sconce



OVERVIEW	
Lumen Package (lm)	3,000 - 21,000
Wattage Range (W)	23 - 175
Efficacy Range (LPW)	125 - 158
Weight lbs (kg)	27 (12.2)

QUICK LINKS

Ordering Guide	Performance	Photometrics	Dimensions
----------------	-------------	--------------	------------



FEATURES & SPECIFICATIONS

Construction

- Rugged die-cast aluminum housing contains factory prewired driver and optical unit. Hinged die-cast aluminum wiring access door located underneath.
- Galvanized-steel universal wall mount bracket comes standard with hinging mechanism to easily access the junction box wire connections without removing the luminaire.
- Optional pole-mounting bracket (XPMa) permits mounting to standard poles.
- Fixtures are finished with LSI's DuraGrip® polyester powder coat finishing process. The DuraGrip finish withstands extreme weather changes without cracking or peeling. Other standard LSI finishes available. Consult factory.
- Max shipping weight: 30lbs in carton

Optical System

- State-of-the-Art one piece silicone optic provides industry leading optical control while also acting as an integrated gasket reducing system complexity and improving fixture reliability.
- Proprietary silicone refractor optics provide exceptional coverage and uniformity in Types 2, 3, and Forward Throw (FT) distributions.
- Silicone optical material does not yellow or crack with age and provides a typical light transmittance of 93%.
- Zero uplight.
- Available in 5000K, 4000K and 3000K color temperatures per ANSI C78.377. Also Available in Phosphor Converted Amber with Peak intensity at 610nm.
- Minimum CRI of 70.

Electrical

- High-performance programmable driver features over-voltage, under-voltage, short-circuit and over temperature protection. Custom lumen and wattage packages available.

- 0-10V dimming (10% - 100%) standard.
 - Standard Universal Voltage (120-277 Vac) Input 50/60 Hz or optional High Voltage (347-480 Vac).
 - L90 Calculated Life: >100K Hours
 - Total harmonic distortion: <20%
 - 3L to 12L operating temperature: -40°C to +50°C (-40°F to +122°F)
 - 18L operating temperature: -40°C to +45°C (-40°F to +113°F)
 - 18L operating temperature: -40°C to +40°C (-40°F to +104°F)
 - 21L operating temperature: -40°C to +35°C (-40°F to + 95°F)
 - Power factor: >.90
 - Input power stays constant over life.
 - Optional 10kV surge protection device meets a minimum Category C Low operation (per ANSI/IEEE C62.41.2).
 - High-efficacy LEDs mounted to metal-core circuit board to maximize heat dissipation
 - Components are fully encased in potting material for moisture resistance. Driver complies with FCC standards. Driver and key electronic components can easily be accessed via hinged door.
 - Optional integral emergency battery pack provides 90-minutes of constant power to the LED system, ensuring code compliance. A test switch/indicator button is installed on the housing for ease of maintenance. The fixture delivers 1500 lumens during emergency mode.
- ##### Controls
- Integral passive infrared Bluetooth™ motion sensor options. Fixtures operate independently and can be commissioned via an iOS or Android configuration app. Updates and modifications to the control strategy are easily implemented via an intuitive app.
- ##### LSI's AirLink™ Blue lighting control system
- is a simple feature rich wireless Bluetooth mesh network. The integrated fixture sensor module provides wireless control of grouped fixtures based on motion sensors, daylight or a fully customizable schedule.
- ##### Installation
- Universal wall mounting plate easily mounts directly to 4" octagonal or square junction box.
 - 2 fasteners secure the hinged door underneath the housing and provide quick & easy access to the electrical compartment for installing/servicing.
 - Optional terminal block accepts up to 12 ga wire.
- ##### Warranty
- LSI luminaires carry a 5-year limited warranty. Refer to <https://www.lsiincorp.com/resources/terms-conditions-warranty/> for more information.
 - 1 Year warranty on Battery Back-up option.
- ##### Listings
- Listed to UL 1598 and UL 8750.
 - Meets Buy American Act requirements.
 - IDA compliant; with 3000K or lower color temperature selection.
 - Title 24 Compliant; see local ordinance for qualification information.
 - Suitable for wet Locations.
 - IP65 rated luminaire per IEC 60598.
 - 3G rated for ANSI C136.31 high vibration applications when pole mounted (using optional XPMa bracket) or wall mounted.
 - IK08 rated luminaire per IEC 66262 mechanical impact code
 - DesignLights Consortium™ (DLC) Premium qualified product. Not all versions of this product may be DLC Premium qualified. Please check the DLC Qualified Products List at www.designlights.com/DQL to confirm which versions are qualified.



Catalog # : _____ Project : _____ Type : _____
Prepared By : _____ Date : _____

Mirada Large (MRL)

Outdoor LED Area Light



OVERVIEW	
Lumen Package	40,000 - 78,000
Wattage Range	286 - 648
Efficacy Range (LPW)	115 - 154
Weight lbs(kg)	60 (27.2)

QUICK LINKS

Ordering Guide	Performance	Photometrics	Dimensions
----------------	-------------	--------------	------------



FEATURES & SPECIFICATIONS

Construction

- Rugged die-cast aluminum housing, optical frame, and driver access cover.
- Fixtures are finished with LSI's DuraGrip® polyester powder coat finishing process. The DuraGrip finish withstands extreme weather changes without cracking or peeling. Other standard LSI finishes available. Consult factory.
- Shipping weight: 68 lbs in carton.

Optical System

- State-of-the-Art one piece silicone optic sheet delivers industry leading optical control with an integrated gasket to provide IP66 rated sealed optical chamber in 1 component.
- Proprietary silicone refractor optics provide exceptional coverage and uniformity in IES Types 2, 3, SW, FT, FTA and AM.
- Silicone optical material does not yellow or crack with age and provides a typical light transmittance of 93%.
- Zero uplight.
- Available in 5000K, 4000K, and 3000K color temperatures per ANSI C78.377. Also Available in Phosphor Converted Amber with Peak intensity at 610nm.
- Minimum CRI of 70.
- Integral louver (L) and integral half louver (IH) options available for enhanced back-light control.

Electrical

- High-performance programmable driver features over-voltage, under-voltage, short-circuit and over temperature protection. Custom lumen and wattage packages available.
- 0-10V dimming (10% - 100%) standard.

- Standard Universal Voltage (120-277 Vac) Input 50/60 Hz or optional High Voltage (347-480 Vac).
- L90 Calculated Life: >100K Hours (See Lumen Maintenance chart)
- Total harmonic distortion: <20%
- Operating temperature: -40°C to +50°C (-40°F to +122°F). 65L and 78L lumen packages rated to +40°C.
- Power factor: >.90
- Input power stays constant over life.
- Field replaceable 10kV surge protection device meets a minimum Category C Low operation (per ANSI/IEEE C62.41.2).
- High-efficacy LEDs mounted to metal-core circuit board to maximize heat dissipation
- Components are fully encased in potting material for moisture resistance. Driver and key electronic components can easily be accessed.

Installation

- Designed to mount to square or round poles.
- A single fastener secures the hinged door, underneath the housing and provides quick & easy access to the electrical compartment for installing/servicing.
- Included terminal block accepts up to 12 ga. wire.
- Utilizes both B3 and B5 drill patterns for easy fastening of LSI products.

Warranty

- LSI luminaires carry a 5-year limited warranty. Refer to <https://www.lsiincorp.com/resources/terms-conditions-warranty/> for more information.
- ##### Listings
- Listed to UL 1598 and UL 8750.
 - State of California Title 24 Compliant; with IMSBT, ALSC, or ALSCH Options.
 - DesignLights Consortium™ (DLC) qualified product. Not all versions of this product may be DLC qualified. Please check the DLC Qualified Products List at www.designlights.com/DQL to confirm which versions are qualified.
 - Meets Buy American Act requirements.
 - IDA compliant; with 3000K color temperature selection.
 - Suitable for wet locations.
 - IP66 rated Luminaire per IEC 60598.
 - 3G rated for ANSI C136.31 high vibration applications are qualified.
 - IK08 rated luminaire per IEC 66262 mechanical impact code

- Optional Integral passive infrared Bluetooth™ motion and photocell sensor (see page 5 for more details). Fixtures operate independently and can be commissioned via iOS or Android configuration app.
- LSI's AirLink™ wireless control system options reduce energy and maintenance costs while optimizing light quality 24/7. (see controls section for more details).

DEVELOPER

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MUNICIPALITY



BLOOMINGTON

PROJECT

LUTHER
BLOOMINGTON KIA
BLOOMINGTON, MN

ISSUE / REVISION HISTORY

DATE	ISSUE / REVISION	REVIEW
07 FEB 2024	DRG SUBMITTAL	SES
05 AUG 2024	CLIENT REVIEW	SES
14 AUG 2024	CITY SUBMITTAL	SES
08 SEP 2024	CITY REVIEW	SES
10 OCT 2024	WATERPROOF SUBMITTAL	SES
04 NOV 2024	75% PROGRESS SET	SES
13 NOV 2024	WATERPROOF SUBMITTAL	SES
18 NOV 2024	80% PROGRESS SET	SES
25 NOV 2024	WATERPROOF SUBMITTAL	SES
18 DEC 2024	PERMIT SET	SES
07 JAN 2025	RESPONSE TO CITY COMMENTS	SES

Plans approved
02/20/2025



Elaine O'Neil

PL202400150
PL2024-150

CERTIFICATION

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RESPONSE TO CITY COMMENTS
01.07.2025

LANDFORM
From Site to Finish

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FILE NAME L40SLUT061.DWG

PROJECT NO. LUT23061

LUMINAIRES

L4.5

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LSI BOLLARD LIGHT

NO SCALE

2

LSI WALL MOUNT LIGHT

NO SCALE

1

LSI POLE LIGHT

NO SCALE