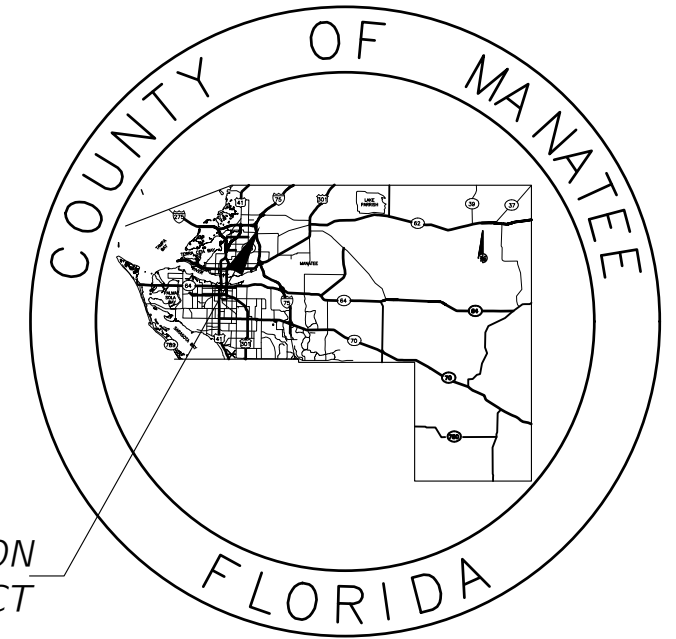


STATE OF FLORIDA COUNTY OF MANATEE



PROPOSED LIGHTING PLANS FOR 69TH STREET EAST INTERSECTION IMPROVEMENTS ELLENTON, FLORIDA

MANATEE COUNTY PROJECT No: 6083160

LOCATION
OF PROJECT

**CONSTRUCTION PLANS
JANUARY 2023**

THIS ITEM HAS BEEN DIGITALLY SIGNED AND SEALED BY:

M. Fathy 2023.01.11
Abdalla 15:56:06 -05'00'

ON THE DATE ADJACENT TO THE SEAL.

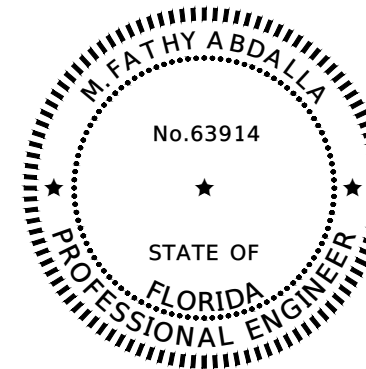
PRINTED COPIES OF THIS DOCUMENT ARE NOT CONSIDERED SIGNED AND SEALED AND THE SIGNATURE MUST BE VERIFIED ON ANY ELECTRONIC COPIES.

LIGHTING PLANS
PROFESSIONAL OF RECORD: M. FATHY ABDALLA, P.E. NO. 63914
KISINGER CAMPO & ASSOCIATES CORP.
201 N. FRANKLIN STREET, SUITE 400
TAMPA, FL 33602



Know what's below
Call before you dig

ATTENTION IS DIRECTED TO THE FACT THAT THESE PLANS MAY HAVE BEEN ENLARGED IN SIZE BY REPRODUCTION. THIS MUST BE CONSIDERED WHEN OBTAINING SCALED DATA.



INDEX OF LIGHTING PLANS	
SHEET NO.	DESCRIPTION
L-1	KEY SHEET
L-2	GENERAL NOTES
L-3	LIGHTING DATA AND LEGEND
L-4	LIGHTING PLAN
L-5	SERVICE POINT DETAILS

GOVERNING DESIGN STANDARDS:

FLORIDA DEPARTMENT OF TRANSPORTATION, FY 2023-24 DESIGN STANDARDS eBOOK (DSeB) AND APPLICABLE DESIGN STANDARDS REVISIONS (DSRs) AT THE FOLLOWING WEBSITE:
<https://www.fdot.gov/design/standardplans/current/default.shtm>

GOVERNING STANDARD SPECIFICATIONS:

FLORIDA DEPARTMENT OF TRANSPORTATION, JULY 2022 STANDARD SPECIFICATIONS FOR ROAD AND BRIDGE CONSTRUCTION AT THE FOLLOWING WEBSITE:
<http://www.fdot.gov/programmanagement/Implemented/SpecBooks>

MANATEE COUNTY PROJECT MANAGER: JIM SHULER, P.E.

CONSTRUCTION CONTRACT NO.	FISCAL YEAR	SHEET NO.
N/A	2023	L-1

M:\6201601.00_Manatee_County_Transportation_Services\WD 1 - 60th Ave\Segment 3\Lighting\KEYSLT01.dwg [1/11/2023 2:51 PM]

THE OFFICIAL RECORD OF THIS SHEET IS THE ELECTRONIC FILE DIGITALLY SIGNED AND SEALED UNDER RULE 61G15-23.004, F.A.C.

M:\6201601_00_Manatee_County_Transportation_Services\WO 1 - 60th Ave\Segment 3\Lighting\GNNTL\T01.dwg [1/11/2023 2:51 PM]


LIGHTING GENERAL NOTES

1. WHERE FOOTER OR FOUNDATION ARE TO BE INSTALLED BY AUGERING OR DRILLING, SURVEY AND STAKE OR PAINT TO AN ACCURACY OF 0.1' PRIOR TO REQUESTING UTILITY LOCATES. STAKE OR PAINT THE CENTER OF EACH LOCATION AND CLEARLY LABEL WITH STATION, OFFSET, IDENTIFYING STRUCTURE NUMBER, AND DIAMETER OF EXCAVATION IN INCHES.
2. WHERE AUGERING OR DRILLING, EXCAVATE THE FIRST 4 FEET BY NON MECHANICAL AND NON DESTRUCTIVE MEANS.
3. PROVIDE SHOP DRAWINGS OF THE PHOTOMETRIC CALCULATIONS FOR LUMINAIRES OTHER THAN THE BASIS OF DESIGN SHOWN IN THE PLANS. MEET ALL PHOTOMETRIC REQUIREMENTS IN THE CONTRACT DOCUMENTS AND THE FDOT DESIGN MANUAL.
4. THE LOCATIONS OF EXISTING UTILITIES ARE APPROXIMATE, DO NOT COVER ALL SEGMENTS OF THE PROJECT, AND ARE BASED ON LIMITED INVESTIGATION. ADDITIONAL UTILITIES MAY EXIST. CONTRACTOR SHALL VERIFY AND LOCATE ALL UTILITIES IN CONFLICT WITH PROPOSED LIGHT POLES.
5. THE CADD SYMBOLS USED TO REPRESENT LIGHT POLES ARE ENLARGED TO ENHANCE PLAN READABILITY AND DO NOT REPRESENT THE ACTUAL SIZE OF THESE ELEMENTS. PLACE THESE ELEMENTS AS SPECIFIED IN THE PLANS WHILE PROVIDING A MINIMUM CLEAR ZONE DISTANCE SHOWN IN THE PLAN

SIGNALIZED INTERSECTION
LIGHTING CRITERIA (RECONSTRUCTION)

AVERAGE INITIAL INTENSITY (HORIZONTAL FOOT CANDLES)
AVERAGE INITIAL INTENSITY (VERTICAL FOOT CANDLES)
UNIFORMITY RATION AVG./MIN.
MAX./MIN
VEILING LUMINANCE RATIO
DESIGN WIND SPEED

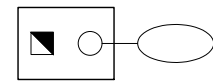
1.5 - 3.0 FOOT CANDLES
1.2 - 1.5 FOOT CANDLES
4:1 OR LESS
10:1 OR LESS
N/A
140 MPH

NUMBER	DESCRIPTION	DATE	PROJECT #	6083160	SURVEYED	RPH	5/2018	M. FATHY ABDALLA, P.E. P.E. LICENSE NUMBER 63914 KISINGER CAMPO & ASSOCIATES CORP. 201 N. FRANKLIN STREET SUITE 400 TAMPA, FL 33602	 PUBLIC WORKS DEPARTMENT ENGINEERING SERVICES 1022 26th Avenue East, Bradenton, FL 34208	GENERAL NOTES	SHEET NO. L-2
			SURVEY #	N/A	DESIGNED	NCR	9/2021				
			SEC./TWN./RGE	28/33S/18E	DRAWN	NCR	9/2021				
			SCALE	1" = 50'	CHECKED		9/2021				

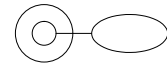
THE OFFICIAL RECORD OF THIS SHEET IS THE ELECTRONIC FILE DIGITALLY SIGNED AND SEALED UNDER RULE 61G15-23.004, F.A.C.

LIGHTING LEGEND

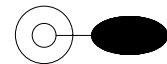
DESCRIPTION



PROP. CONV. LIGHT POLE WITH LED LUMINAIRE. THE BASIS OF DESIGN USED WAS: MANUFACTURER: GE, MODEL: EVOLVE ERL2, PHOTOMETRIC CURVE: C5, SINGLE ARM LIGHT POLE, 223 WATT, LED, 240 VOLT, TYPE III DISTRIBUTION, 40' MOUNTING HEIGHT, AND 12' ARM LENGTH. FILE NAME: ERL2_28C530.ies. SYMBOL INCLUDES LUMINAIRE, ARM, POLE, FOUNDATION, PULL BOX, CONCRETE SLAB, & POLE CABLE DISTRIBUTION SYSTEM. PULL BOX AND PCDS TO BE PAID FOR SEPARATELY.



PROP. CONV. LED LUMINAIRE MOUNTED TO PROP. SIGNAL POLE. THE BASIS OF DESIGN USED WAS: MANUFACTURER: GE, MODEL: EVOLVE ERL2, PHOTOMETRIC CURVE: C5, SINGLE ARM LIGHT POLE, 223 WATT, LED, 240 VOLT, TYPE III DISTRIBUTION, 40' MOUNTING HEIGHT, AND 12' ARM LENGTH. FILE NAME: ERL2_28C530.ies. SYMBOL INCLUDES LUMINAIRE, ARM, PULL BOX, & POLE CABLE DISTRIBUTION SYSTEM. PULL BOX AND PCDS TO BE PAID FOR SEPARATELY. SEE SIGNALIZATION PLANS FOR DETAILS ON SIGNAL POLE.



PROP. CONV. LED LUMINAIRE MOUNTED TO PROP. SIGNAL POLE. THE BASIS OF DESIGN USED WAS: MANUFACTURER: GE, MODEL: EVOLVE ERL2, PHOTOMETRIC CURVE: C5, SINGLE ARM LIGHT POLE, 223 WATT, LED, 240 VOLT, TYPE III DISTRIBUTION, 35' MOUNTING HEIGHT, AND 12' ARM LENGTH. FILE NAME: ERL2_28C530.ies. SYMBOL INCLUDES LUMINAIRE, ARM, PULL BOX, & POLE CABLE DISTRIBUTION SYSTEM. PULL BOX AND PCDS TO BE PAID FOR SEPARATELY. SEE SIGNALIZATION PLANS FOR DETAILS ON SIGNAL POLE.



PROPOSED LOAD CENTER RATED FOR 120V / 240V OPERATION, SINGLE PHASE, 3 WIRE



PULL BOX



2" SCH. 40 PVC CONDUIT, OPEN TRENCH, WITH CONDUCTORS INSIDE (CONDUIT AND CONDUCTOR SIZE SHOWN ON PLAN SHEETS). RUN ONE COPPER BOND CONDUCTOR (XHHW INSULATION) INSIDE CONDUIT WITH OTHER CONDUCTORS.



2" HDPE CONDUIT, DIRECTIONAL BORE, WITH CONDUCTORS INSIDE (CONDUIT AND CONDUCTOR SIZE SHOWN ON PLAN SHEETS). RUN ONE COPPER BOND CONDUCTOR (XHHW INSULATION) INSIDE CONDUIT WITH OTHER CONDUCTORS AND A SPARE CONDUIT. CONDUIT AND TRANSITION COUPLING SHALL BE UL LISTED. EXTEND CONDUIT BEYOND EDGE OF PAVEMENT TO PULL BOXES.


POLE DATA

POLE NO.	LUMINAIRE NO.	CIRCUIT	Ø OR Ç	STATION	OFFSET	ORIENT.*	PAY ITEM
1	-	A-1	BUFFALO RD.	199+32	56.26' RT.	0°	715-61-342
2	-	A-1	BUFFALO RD.	199+76	91.06' RT.	0°	715-5-32
3	1	A-1	BUFFALO RD.	199+65	-65.36' LT.	-40°	715-5-32
3	2	A-1	BUFFALO RD.	199+65	-65.36' LT.	-140°	715-5-32
4	-	A-2	BUFFALO RD.	200+92	48.71' RT.	25°	715-5-32

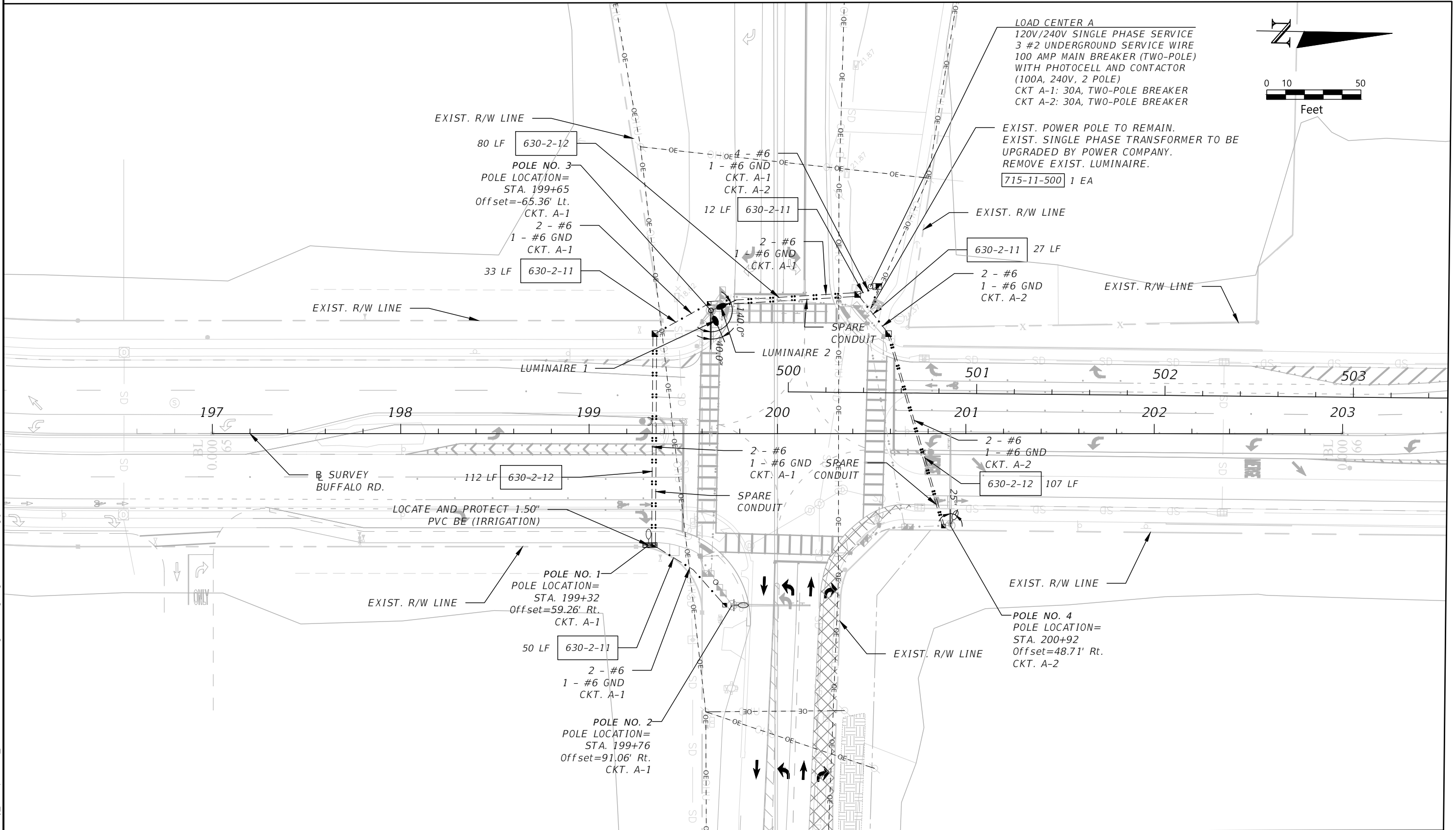
* ORIENTATION IS MEASURED CLOCKWISE FROM THE AXIS ALONG THE MAST ARM.

M:\6201601_00_Manatee_County_Transportation_Services\WO 1 - 60th Ave\Segment 3\Lighting\PLD\TLT01.dwg [11/11/2023 2:51 PM]

THE OFFICIAL RECORD OF THIS SHEET IS THE ELECTRONIC FILE DIGITALLY SIGNED AND SEALED UNDER RULE 61G15-23.004, F.A.C.

NUMBER	DESCRIPTION						DATE	PROJECT # 6083160			M. FATHY ABDALLA, P.E.			 PUBLIC WORKS DEPARTMENT ENGINEERING SERVICES 1022 26th Avenue East, Bradenton, FL 34208	LIGHTING DATA AND LEGEND	SHEET NO. L-3									
	SURVEY #							N/A			DESIGNED						RPH			5/2018			P.E. LICENSE NUMBER 63914		
	SEC./TWN./RGE							28/33S/18E			DRAWN						NCR			9/2021			KISINGER CAMPO & ASSOCIATES CORP.		
	SCALE							1" = 50'			CHECKED						9/2021			201 N. FRANKLIN STREET SUITE 400 TAMPA, FL 33602					

M:\6201601_00_Manatee_County_Transportation_Services\WO 1 - 60th Ave\Segment 3\Lighting\PLAN\T301.dwg [1/11/2023 2:52 PM]



NUMBER	DESCRIPTION	DATE	PROJECT #	SURVEYED	RPH	DATE
			6083160			5/2018
			N/A	DESIGNED	NCR	9/2021
			28/33S/18E	DRAWN	NCR	9/2021
			1" = 50'	CHECKED		9/2021

M. FATHY ABDALLA, P.E.
P.E. LICENSE NUMBER 63914
KISINGER CAMPO & ASSOCIATES CORP.
201 N. FRANKLIN STREET
SUITE 400
TAMPA, FL 33602



PUBLIC WORKS DEPARTMENT
ENGINEERING SERVICES
1022 26th Avenue East, Bradenton, FL 34208

LIGHTING PLAN

THE OFFICIAL RECORD OF THIS SHEET IS THE ELECTRONIC FILE DIGITALLY SIGNED AND SEALED UNDER RULE 61G15-23.004, F.A.C.

