

**FIRST AMENDMENT TO COMMUNICATIONS SITE LICENSE
BETWEEN
CITY OF LAS VEGAS, A NEVADA MUNICIPAL CORPORATION
AND
T-MOBILE WEST TOWER LLC, A DELAWARE LIMITED LIABILITY COMPANY**

THIS FIRST AMENDMENT TO COMMUNICATIONS SITE LICENSE ("First Amendment") dated the _____ day of _____, 2023 (the "Effective Date") by and between the CITY OF LAS VEGAS, a Nevada municipal corporation (the "City"), and T-MOBILE WEST TOWER LLC, a Delaware Limited Liability Company, by and through CCTMO LLC, a Delaware Limited Liability Company, its attorney in fact ("Licensee"). The Licensee and City are herein collectively referred to as the "Parties".

RECITALS

WHEREAS, the Parties entered into that certain Communications Site License dated _____ (the "License"), for the purpose of a wireless communication facility located at 101 North Pavilion Center Drive, Las Vegas, Nevada 89144 (APN: 137-35-501-004) (the "Property"), as legally described in Exhibit A attached hereto; and

WHEREAS, the Parties desire to enter into this First Amendment for the purpose of allowing Licensee to sublet space within its permitted use on the Property (the "License Area") as shown in Exhibit B to STARRY GROUP HOLDINGS, INC., a Massachusetts corporation ("Starry") pursuant to a separate sublease or license agreement between Licensee and Starry (the "Starry Sublease").

NOW, THEREFORE, in consideration of the mutual covenants and agreements herein contained and other good and valuable consideration, the receipt and sufficiency of which are hereby acknowledged, the City and Licensee covenant and agree as follows:

AGREEMENT

1. CONSENT TO SUBLEASE

Notwithstanding anything to the contrary in the License, the City hereby approves and grants consent to Licensee to sublet portions of the wireless communications facility and ground space within the License Area to Starry to locate, operate, maintain and repair its equipment as shown in Exhibit C (the "Starry Equipment"). The City further agrees that no separate license agreement between the City and Starry will be required for any ground space within the License Area necessitated by the Starry Sublease.

2. COLOCATION FEE

2.1 In consideration for the City's consent to sublease pursuant to this First Amendment and in lieu of the Revenue Share set forth in Section 13.2 of the License, effective as of the commencement date of the Starry Sublease, Licensee shall pay to the City, the amount of Six Hundred and 00/100 Dollars (\$600.00) per month ("Starry Colocation Fee") upon the completion of construction. Licensee shall provide written notice to the City when the Starry Equipment is operational to establish the Starry Colocation Fee commencement date. The Starry Colocation Fee shall increase in the same manner and at the same time as the adjustment for the License Fee as provided in Section 5.2 of the License, and shall be payable in advance, together with the License Fee.

2.2 In the event of the expiration or early termination of the Starry Sublease, Licensee shall provide thirty (30) days' written notice to the City, and the Starry Colocation Fee shall end and no longer be owed, effective upon the date of expiration or early termination of the Starry Sublease. Starry will be responsible to remove any and all equipment installed subject to this First Amendment located within the

License Area no later than thirty (30) days after termination of said Starry Sublease.

3. MISCELLANEOUS

3.1 The Parties represent and acknowledge that as of the date of this First Amendment, neither party (i) is in default under the terms of the License; (ii) has any defense, set off or counterclaim to the enforcement by either party of the terms of the License; and (iii) is aware of any action or inaction by either party that would constitute an event of default by either party under the License.

3.2 In the event of a conflict between any provision(s) of the License and of this First Amendment, this First Amendment shall control.

3.3 Unless otherwise specifically defined in this First Amendment, all capitalized terms used herein shall have the meaning ascribed to them in the License.

3.4 In all other respects, the License is hereby ratified and confirmed, in full.

3.5 This First Amendment may be executed in any number of counterparts, each of which shall be an original and all of which shall together constitute one and the same instrument. It shall not be necessary for any counterpart to bear the signature of all Parties hereto. Executed copies hereof may be delivered by facsimile or e-mail, pursuant to NRS 719.240, and upon receipt will be deemed originals and binding upon the Parties hereto, regardless of whether originals are delivered thereafter.

[LEFT BLANK INTENTIONALLY AND SIGNATURES ON NEXT PAGE]

FIRST AMENDMENT TO COMMUNICATIONS SITE LICENSE
BETWEEN
CITY OF LAS VEGAS, A NEVADA MUNICIPAL CORPORATION
AND
T-MOBILE WEST TOWER LLC, A DELAWARE LIMITED LIABILITY COMPANY

Signature Page

IN WITNESS WHEREOF, the Parties have executed this License on the Effective Date.

CITY OF LAS VEGAS

By: _____
Carolyn G. Goodman, Mayor

By: _____
LuAnn D. Holmes, MMC, City Clerk

By: John S. Riddle 1/3/23
Deputy City Attorney Date

T-MOBILE WEST TOWER LLC, A DELAWARE
LIMITED LIABILITY COMPANY,
BY AND THROUGH
CCTMO LLC, A DELAWARE LIMITED LIABILITY COMPANY,
ITS ATTORNEY IN FACT

"Licensee"

By: _____

Print Name: Lori Lopez

Print Title: Mgr RE Trans

Date: 2/6/2023

EXHIBIT A

LEGAL DESCRIPTION OF THE PROPERTY

LOT 3 AS SHOWN ON FILE 85 OF PARCEL MAPS, PAGE 97, IN THE OFFICE OF THE COUNTY RECORDER, CLARK COUNTY, NEVADA.

EXHIBIT B

MAP SHOWING THE "LICENSE AREA".

[REFERENCE ATTACHED]

CROWN CASTLE USA INC. SITE ACTIVITY REQUIREMENTS:

- [illegible]

GENERAL NOTES:

- [illegible]

CONCRETE, FOUNDATIONS, AND REINFORCING STEEL:

- [illegible]

GREENFIELD GROUNDING NOTES:

- [illegible]

ELECTRICAL INSTALLATION NOTES:

- [illegible]

APWA UNIFORM COLOR CODE:

[illegible]

ABBREVIATIONS:

- | | | |
|--------------------|--------------------|--------------------|
| ANT | ANTENNA | ANTENNA |
| FAST | FASTING | FASTING |
| INT | INTERFERENCE | INTERFERENCE |
| FRAME | FRAME | FRAME |
| GEN | GENERATOR | GENERATOR |
| PRO | PROBING | PROBING |
| SYSTEM | SYSTEM | SYSTEM |
| GLOBAL | GLOBAL | GLOBAL |
| SYSTEM | SYSTEM | SYSTEM |
| FOR | FOR | FOR |
| MOBILE | MOBILE | MOBILE |
| LONG | LONG | LONG |
| TERM | TERM | TERM |
| EVOLUTION | EVOLUTION | EVOLUTION |
| BAR | BAR | BAR |
| NEW | NEW | NEW |
| WAVE | WAVE | WAVE |
| MICROWAVE | MICROWAVE | MICROWAVE |
| NEW | NEW | NEW |
| WAVE | WAVE | WAVE |
| MICROWAVE | MICROWAVE | MICROWAVE |
| PROPOSED | PROPOSED | PROPOSED |
| POWER | POWER | POWER |
| PLANT | PLANT | PLANT |
| RECT | RECTIFIER | RECTIFIER |
| RECT | RECTIFIER | RECTIFIER |
| RADIO | RADIO | RADIO |
| BASE | BASE | BASE |
| STATION | STATION | STATION |
| REDS | REDS | REDS |
| RADIO | RADIO | RADIO |
| FREQUENCY | FREQUENCY | FREQUENCY |
| DATA | DATA | DATA |
| SHEET | SHEET | SHEET |
| REMOTE | REMOTE | REMOTE |
| RADIO | RADIO | RADIO |
| ROAD | ROAD | ROAD |
| SMART | SMART | SMART |
| INTEGRATED | INTEGRATED | INTEGRATED |
| DEVICE | DEVICE | DEVICE |
| USUAL | USUAL | USUAL |
| TYPE | TYPE | TYPE |
| UNIVERSAL | UNIVERSAL | UNIVERSAL |
| MOBILE | MOBILE | MOBILE |
| TELECOMMUNICATIONS | TELECOMMUNICATIONS | TELECOMMUNICATIONS |
| SYSTEM | SYSTEM | SYSTEM |
| UNITS | UNITS | UNITS |



STARRY

SUTTE 1700 & 1800
IRVINE, CA 92618

11490 BLUEGRASS PKWY
LOUISVILLE, KY 40299
502-437-5252

STARRY, INC SITE NUMBER:
S-LASLAS0157-A

BU #: 826562
PAVILION CENTER DR
101 S. PAVILION CENTER DR
LAS VEGAS, NV 89135

EXISTING 87'-0" MONOPOLE

ISSUED FOR:				
N	DATE	DRAWN	DESCRIPTION	DPS/Q
	02/04/2022	MM	PRELIMINARY	MEP
	02/25/2022	MM	CONSTRUCTION	MEP
	06/24/2023	MM	CONSTRUCTION	MEP



9/24/2022

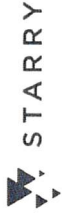
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SHEET NUMBER:
T-2
REVISION:
1

100743-CUV
05/11/2022

EXHIBIT C

APPROVED PLANS FOR EQUIPMENT AND OTHER IMPROVEMENT



STARRY, INC SITE NUMBER:
S-LASLAS0157-A
BU #: 826562
PAVILION CENTER DR
101 S. PAVILION CENTER DR
LAS VEGAS, NV 89135
EXISTING 87'-0" MONOPOLE

ISSUED FOR:			
REV	DATE	DESCRPTION	DESIGN
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2	10/25/2022	ADJ	CONSTRUCTION
3	10/25/2022	ADJ	CONSTRUCTION

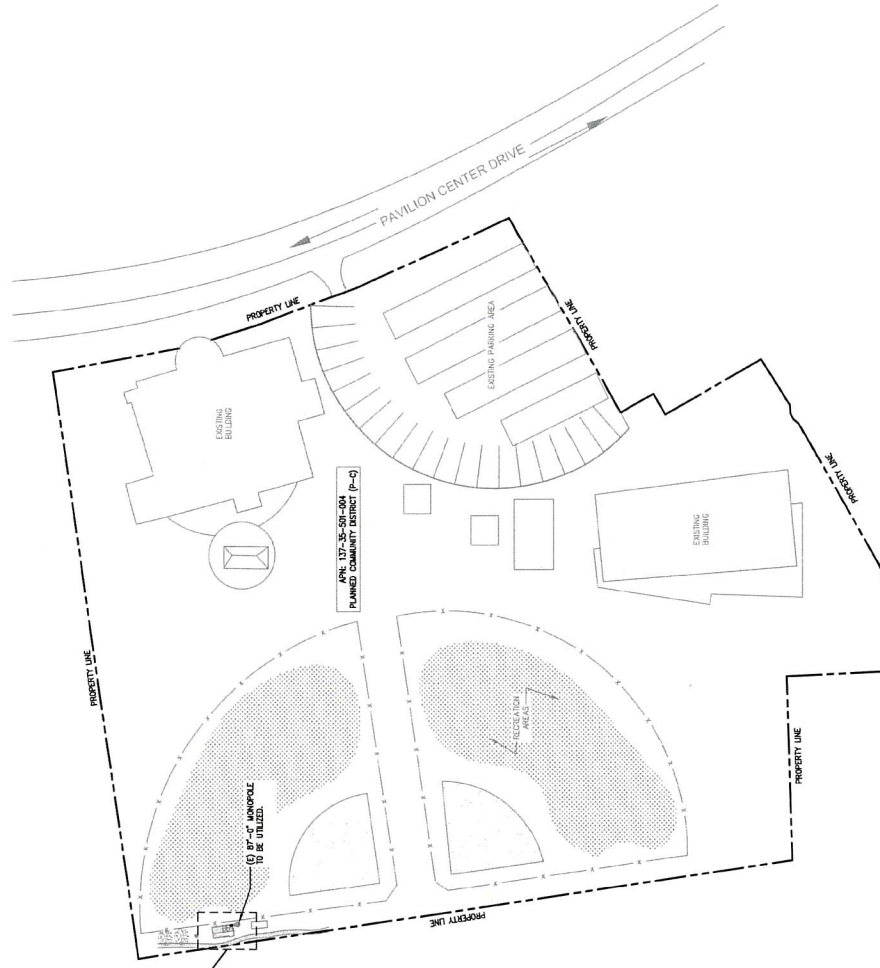


03/24/2022

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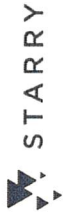
SHEET NUMBER: **C-1.1** REVISION: **1**

SITE PLAN DISCLAIMER:
PROPERTY LINES AND STRUCTURES HAVE BEEN VERIFIED BY THE DESIGNER. THE DESIGNER HAS NOT CONDUCTED A FIELD SURVEY OF THE SITE. THEREFORE, THE DESIGNER MAKES NO CLAIMS AS TO THE ACCURACY OF THE INFORMATION DEPICTED ON THIS SHEET.



1 OVERALL SITE PLAN
SCALE: NOT TO SCALE

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05/11/2022



STARRY, INC SITE NUMBER:
S-LASLAS0157-A

BU #: 826562
PAVILION CENTER DR
101 S. PAVILION CENTER DR
LAS VEGAS, NV 89135
EXISTING 87'-0" MONOPOLE

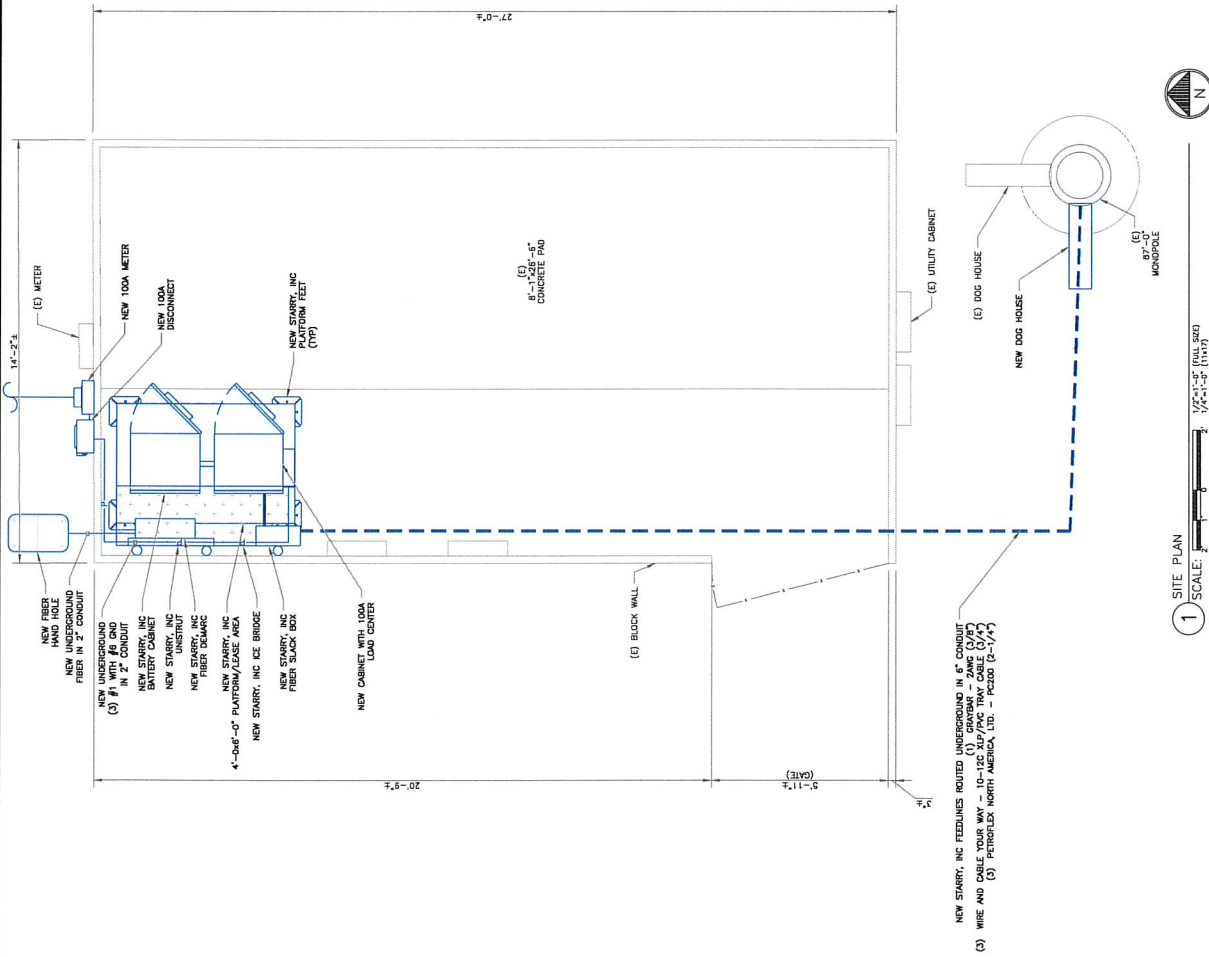
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3	02/28/2022	REV	CONSTRUCTION



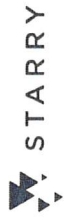
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SHEET NUMBER: **C-1.2** REVISION: **1**



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05/11/2022



**CROWN
CASTLE**
200 SPECTRUM CENTER DRIVE,
SUITE 1700 & 1800
IRVINE, CA 92618



STARRY, INC SITE NUMBER:
S-LASLAS0157-A

BU #: 826562
PAVILION CENTER DR
101 S. PAVILION CENTER DR
LAS VEGAS, NV 89135
EXISTING 87'-0" MONOPOLE

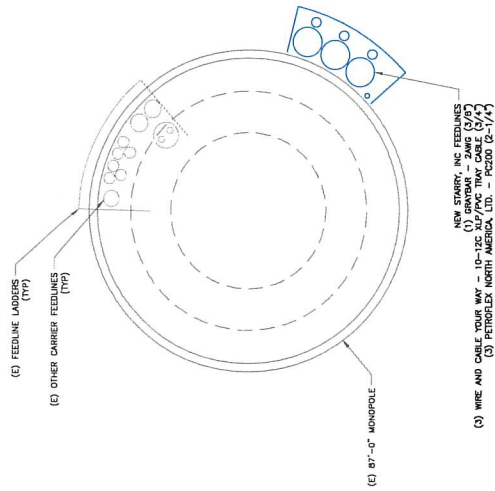
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0	02/25/2022	MM	CONSTRUCTION	MEP
1	05/24/2022	MM	CONSTRUCTION	MEP



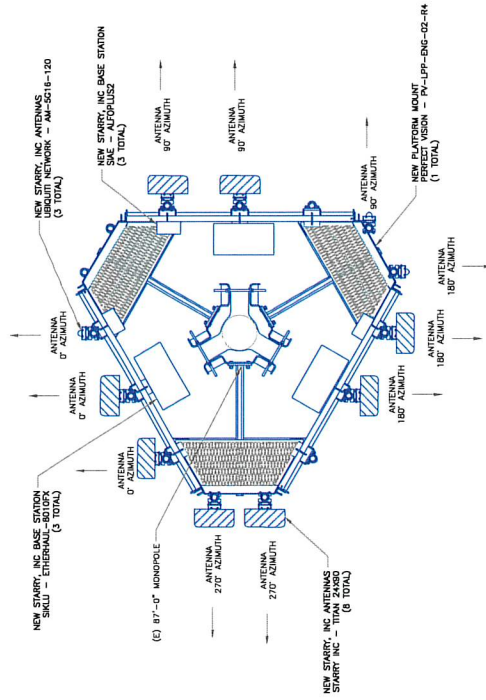
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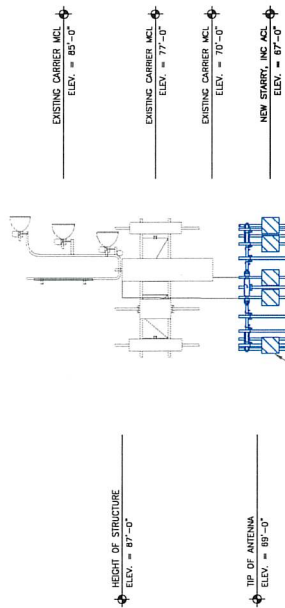
SHEET NUMBER: C-2 REVISION: 1



2 OVERALL FEEDLINE LAYOUT
SCALE: NOT TO SCALE



3 FINAL ANTENNA PLAN
SCALE: NOT TO SCALE



NEW STARRY, INC EQUIPMENT:-
(8) STARRY INC - TITAN 24X90 ANTENNAS
(3) UBIQUITY NETWORK - AM-5G16-120 ANTENNAS
(3) SIKLU - ETHERHAUL-8010FX BASE STATIONS
(3) SIAE - ALFOPUS2 BASE STATIONS
(1) PERFECT VISION - PV-LPPBM-HR-B

STARRY, INC. EQUIPMENT
ANTENNA CL: 67'-0"

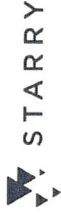
INSTALLER NOTE:
DIRECT TOWER MODE
NOT TRAP OR INTER
DECS/STEPS AND

NEW STARRY, INC FEEDLINES -
(1) GRAYBAR - 2WG (3/8")
(3) WIRE AND CABLE YOUR WAY - 10-12C XL/P/PVC TRAY CABLE (3/4")
(3) PETROFLEX NORTH AMERICA, LTD. - PC200 (2-1/4")

(F) B7'-0" MONOPOL

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1 FINAL ELEVATION
SCALE: NOT TO SCALE



STARRY, INC SITE NUMBER:
S-LASLAS0157-A
BU #: 826562
PAVILION CENTER DR
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LAS VEGAS, NV 89135
EXISTING 87'-0" MONOPOLE

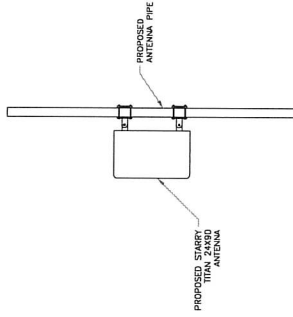
ISSUED FOR:			
NO.	DATE	DESCRIPTION	BY
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2	05/11/2022	REVISION	MEP
3	05/11/2022	CONSTRUCTION	MEP
4	05/11/2022	CONSTRUCTION	MEP



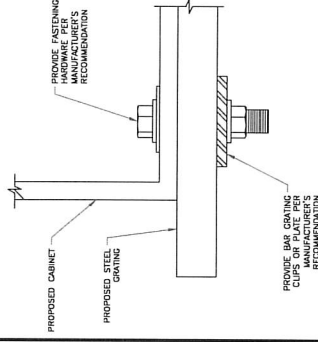
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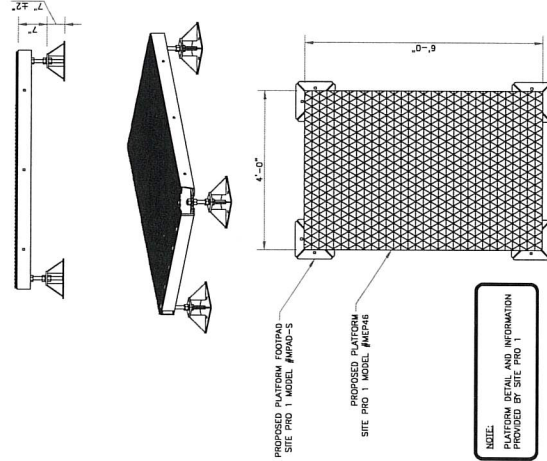
SHEET NUMBER: **C-3** REVISION: **1**



2 PROPOSED ANTENNA MOUNTING DETAIL
SCALE: NOT TO SCALE

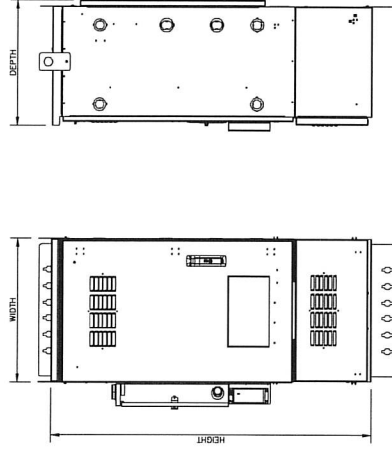


3 CABINET ANCHORING DETAIL
SCALE: NOT TO SCALE

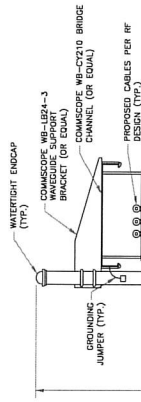


4 SITE PRO 1 PLATFORM (MEP46)
SCALE: NOT TO SCALE

HEIGHT	WIDTH	DEPTH	WEIGHT
82.80"	27.87"	23.95"	312 LBS



5 CHARLES CABINET - LT-PW4242HC1
SCALE: NOT TO SCALE



NOTE:
ICE BRIDGE SUPPORT POSTS TO BE SPACED 8'-0" MAX.

1/2" SCH. 40 SUPPORT PIPE (TYP.)

BLIND CONCRETE AWAY FROM POST (TYP.)
FINISHED GRADE

TO GROUND RING (TYP.)
CONCRETE POST FOOTING (TYP.) 3000 PSI MIN.

100743-CUV
05/11/2022

1 ICE BRIDGE DETAIL
SCALE: NOT TO SCALE



Siklu

EH-ANT-2ft-DL5 Datasheet EtherHaul™ 2ft dual-band antenna (E-Band and 5GHz)

ENVIRONMENTAL

Test	Standard	Duration	Temperature	Notes
Low Temperature	IEC 60521	72h	-45°C (-49°F)	
High Temperature	IEC 60521	72h	+60°C (+140°F)	
Water Tightness	IEC 60521	-	-	
Solar Radiation	ASTM G53	1000 h	-	
Ice and Snow	IEC 60521	-	-	
Wind Speed Survival Operation	-	-	-	270 km/h 180 km/h

Notes: 1. The antenna is designed for outdoor use. 2. The antenna is not suitable for use in corrosive environments.

FIGURE 1: Outline drawings

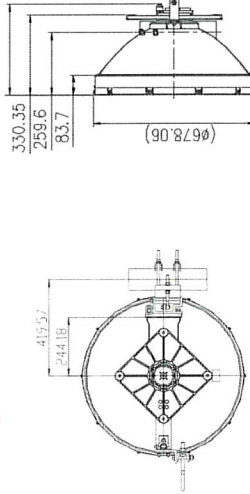


FIGURE 2: with mount for 5GHz radio

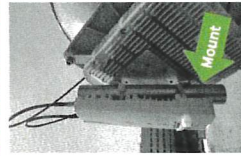
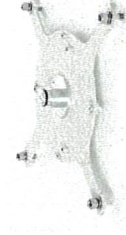


Figure 3: EH-XADPT-SFF-7080GHz (for E-Band 7xx radios)



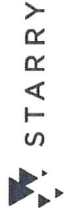
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1 SIKLU – ETHERHAUL™-8010FX
SCALE: NOT TO SCALE

SHEET NUMBER: C-4
REVISION: 1



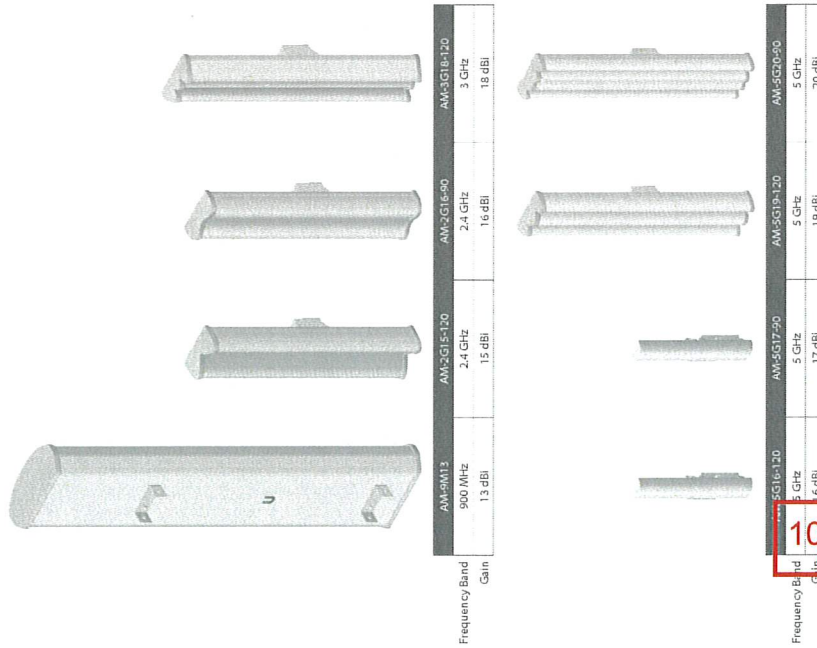
STARRY, INC. SITE NUMBER:
S-LASLAS0157-A

BU #: 826562
PAVILION CENTER DR
101 S. PAVILION CENTER DR
LAS VEGAS, NV 89135
EXISTING 87'-0" MONOPOLE

ISSUED FOR:			
REV	DATE	DESCRIPTION	PREPARED BY
1	10/24/2017	PRELIMINARY	MDP
2	10/25/2017	FOR CONSTRUCTION	MDP
3	10/25/2017	FOR CONSTRUCTION	MDP

100743-CUV
05/11/2022

Model Comparison

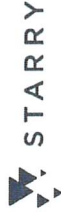


Specifications

Antenna Characteristics									
Model	AM-9M13	AM-3G15-120	AM-3G16-90	AM-3G18-120	AM-5G16-120	AM-5G17-90	AM-5G19-120	AM-5G20-90	
Dimensions*	1290 x 250 x 134 mm (50.79 x 11.42 x 5.28")	700 x 145 x 93 mm (27.56 x 5.71 x 3.66")	700 x 145 x 79 mm (27.56 x 5.71 x 3.11")	735 x 144 x 78 mm (28.94 x 5.67 x 3.07")	700 x 135 x 73 mm (27.56 x 5.32 x 2.87")	700 x 135 x 73 mm (27.56 x 5.32 x 2.87")	700 x 135 x 73 mm (27.56 x 5.32 x 2.87")	700 x 135 x 70 mm (27.56 x 5.32 x 2.76")	
Weight*	12.5 kg (27.56 lbs)	4.0 kg (8.82 lbs)	3.9 kg (8.6 lbs)	5.9 kg (13 lbs)	5.9 kg (13 lbs)	5.9 kg (13 lbs)	5.9 kg (13 lbs)	5.9 kg (13 lbs)	
Frequency Range	902 - 938 MHz	2.3 - 2.7 GHz	2.3 - 2.7 GHz	3.3 - 3.8 GHz	4.90 - 5.85 GHz	4.90 - 5.85 GHz	5.15 - 5.85 GHz	5.15 - 5.85 GHz	
Gain	13.2 - 13.8 dBi	15.0 - 16.0 dBi	16.0 - 17.0 dBi	17.3 - 18.2 dBi	16.1 - 17.1 dBi	18.6 - 19.1 dBi	19.4 - 20.3 dBi	18.2 N @ 200 km/h (41 lbf @ 125 mph)	
HPOL Beamwidth	109° (6 dB)	123° (6 dB)	91° (6 dB)	118° (6 dB)	72° (6 dB)	123° (6 dB)	91° (6 dB)	Dual-Linear	
VPOL Beamwidth	120° (6 dB)	118° (6 dB)	90° (6 dB)	121° (6 dB)	93° (6 dB)	123° (6 dB)	85° (6 dB)	Dual-Linear	
Electrical Beamwidth	15°	9°	9°	6°	8°	4°	4°	4°	
Electrical Down tilt	N/A	4°	4°	3°	4°	4°	2°	2°	
Max VSWR	1.5:1	1.5:1	1.5:1	1.5:1	1.5:1	1.5:1	1.5:1	1.5:1	
Wind Survivability	200 km/h (125 mph)	200 km/h (125 mph)	200 km/h (125 mph)	200 km/h (125 mph)	200 km/h (125 mph)	200 km/h (125 mph)	200 km/h (125 mph)	200 km/h (125 mph)	
Wind Loading	658.3 N @ 200 km/h (148 lbf @ 125 mph)	169 N @ 200 km/h (38 lbf @ 125 mph)	133.4 N @ 200 km/h (30 lbf @ 125 mph)	146.6 N @ 200 km/h (33 lbf @ 125 mph)	169 N @ 200 km/h (38 lbf @ 125 mph)	186 N @ 200 km/h (42 lbf @ 125 mph)	194 N @ 200 km/h (44 lbf @ 125 mph)	182 N @ 200 km/h (41 lbf @ 125 mph)	
Polarization	Dual-Linear	Dual-Linear	Dual-Linear	Dual-Linear	Dual-Linear	Dual-Linear	Dual-Linear	Dual-Linear	
Cross-pol Isolation	30 dB Min.	28 dB Min.	28 dB Min.	28 dB Min.	28 dB Min.	28 dB Min.	28 dB Min.	28 dB Min.	
ETSI Specification	N/A	EN 302 326 DN2	EN 302 326 DN2	EN 302 326 DN2	EN 302 326 DN2	EN 302 326 DN2	EN 302 326 DN2	EN 302 326 DN2	
Mounting	Universal Pole Mount, RocketM Bracket, and Weatherproof RF Jumpers included								

Antenna Characteristics									
Model	AM-5G16-120	AM-5G17-90	AM-5G19-120	AM-5G20-90					
Dimensions*	367 x 63 x 41 mm (14.45 x 2.48 x 1.61")	367 x 63 x 41 mm (14.45 x 2.48 x 1.61")	700 x 135 x 73 mm (27.56 x 5.32 x 2.87")	700 x 135 x 70 mm (27.56 x 5.32 x 2.76")					
Weight*	1.1 kg (2.43 lb)	1.1 kg (2.43 lb)	5.9 kg (13 lb)	5.9 kg (13 lb)					
Frequency Range	5.10 - 5.85 GHz	4.90 - 5.85 GHz	5.15 - 5.85 GHz	5.15 - 5.85 GHz					
Gain	15.0 - 16.0 dBi	16.1 - 17.1 dBi	18.6 - 19.1 dBi	19.4 - 20.3 dBi					
HPOL Beamwidth	137° (6 dB)	72° (6 dB)	123° (6 dB)	91° (6 dB)					
VPOL Beamwidth	118° (6 dB)	93° (6 dB)	123° (6 dB)	85° (6 dB)					
Electrical Beamwidth	8°	8°	4°	4°					
Electrical Down tilt	4°	4°	4°	2°					
Max VSWR	1.5:1	1.5:1	1.5:1	1.5:1					
Wind Survivability	200 km/h (125 mph)	200 km/h (125 mph)	200 km/h (125 mph)	200 km/h (125 mph)					
Wind Loading	41.7 N @ 200 km/h (9.37 lbf @ 125 mph)	41.7 N @ 200 km/h (9.37 lbf @ 125 mph)	137.9 N @ 200 km/h (31 lbf @ 125 mph)	182 N @ 200 km/h (41 lbf @ 125 mph)					
Polarization	Dual-Linear	Dual-Linear	Dual-Linear	Dual-Linear					
Cross-pol Isolation	22 dB Min.	22 dB Min.	28 dB Min.	28 dB Min.					
ETSI Specification	EN 302 326 DN2	EN 302 326 DN2	EN 302 326 DN2	EN 302 326 DN2					
Mounting	Universal Pole Mount, RocketM Bracket, and Weatherproof RF Jumpers included								

* Dimensions and weight on hole pole mount and flange (flange sold separately)



STARRY, INC SITE NUMBER:
S-LASLAS0157-A

BU #: 826562
PAVILION CENTER DR
101 S. PAVILION CENTER DR
LAS VEGAS, NV 89135
EXISTING 87'-0" MONOPOLE

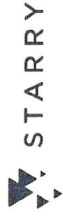
ISSUED FOR:			
REV	DATE	DESCRIPTION	BY/CHK
1	05/11/2022	PRELIMINARY	MEP
2	05/11/2022	CONSTRUCTION	MEP
3	05/11/2022	CONSTRUCTION	MEP

IT IS A VIOLATION OF LAW FOR ANY PERSON
UNLICENSED AND UNREGISTERED TO
REPRODUCE OR TRANSMIT THIS DOCUMENT
TO ANY OTHER PERSON.

SHEET NUMBER:
C-5

REVISION:
1

1 UBIQUITI NETWORK - AM-5G16-120
SCALE: NOT TO SCALE



STARRY, INC. SITE NUMBER:
S-LASLAS0157-A
BU #: 826562
PAVILION CENTER DR
101 S. PAVILION CENTER DR
LAS VEGAS, NV 89135
EXISTING 87'-0" MONOPOLE

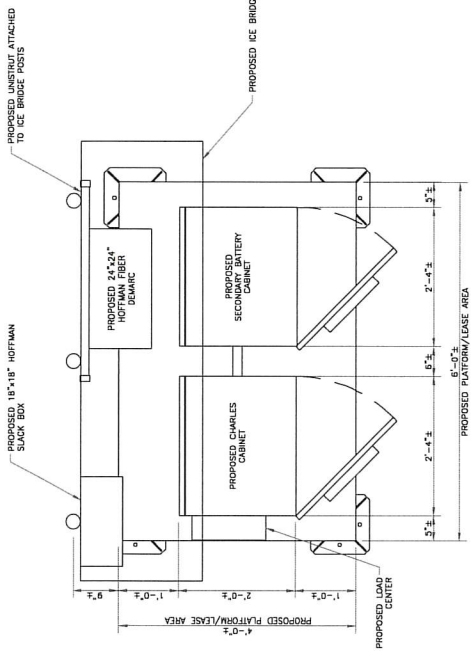
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REV	DATE	DESCRIPTION	DESIGN
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2	02/25/2022	REVISED	MEP
3	03/24/2022	CONSTRUCTION	MEP



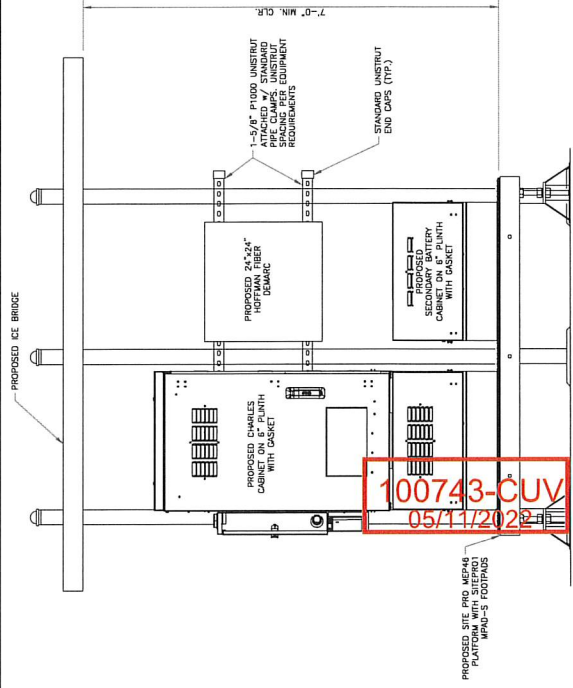
03/24/2022

IT IS A VIOLATION OF LAW FOR ANY PERSON,
UNLESS THEY ARE A REGISTERED PROFESSIONAL
ENGINEER, TO SEAL OR SIGN THIS DOCUMENT.
TO VALIDATE THIS DOCUMENT.

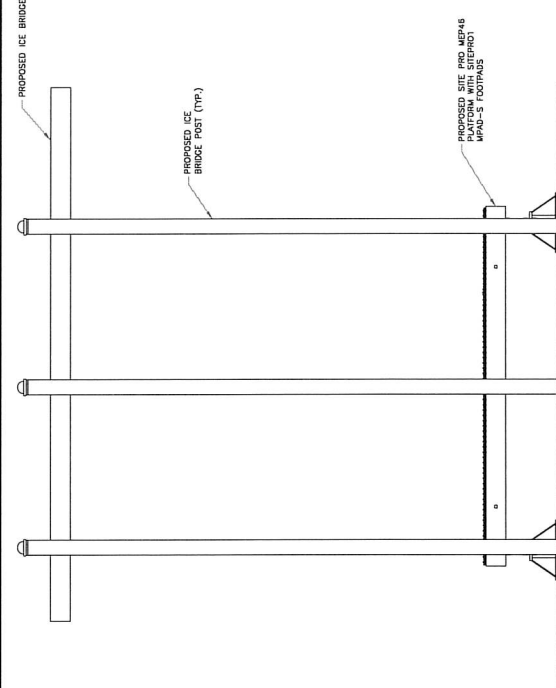
SHEET NUMBER:
C-6
REVISION:
1



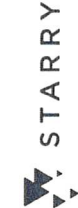
1 STARRY EQUIPMENT LAYOUT
SCALE: 1" = 1'-0"



2 STARRY EQUIPMENT FRONT ELEVATION VIEW
SCALE: NOT TO SCALE



3 STARRY EQUIPMENT ELEVATION REAR VIEW
SCALE: 1" = 1'-0"



STARRY, INC SITE NUMBER:
S-LASLAS0157-A

BU #: 826562
PAVILION CENTER DR
01 S. PAVILION CENTER DR
LAS VEGAS, NV 89135
EXISTING 87'-0" MONOPOLE

ISSUED FOR:				
REV	DATE	DWG N	DESCRIPTION	DESIGN
1	02/25/2022	31M	PRELIMINARY	MEP
0	02/25/2022	31M	CONSTRUCTION	MEP
1	03/29/2022	31M	CONSTRUCTION	MEP



03/24/2022

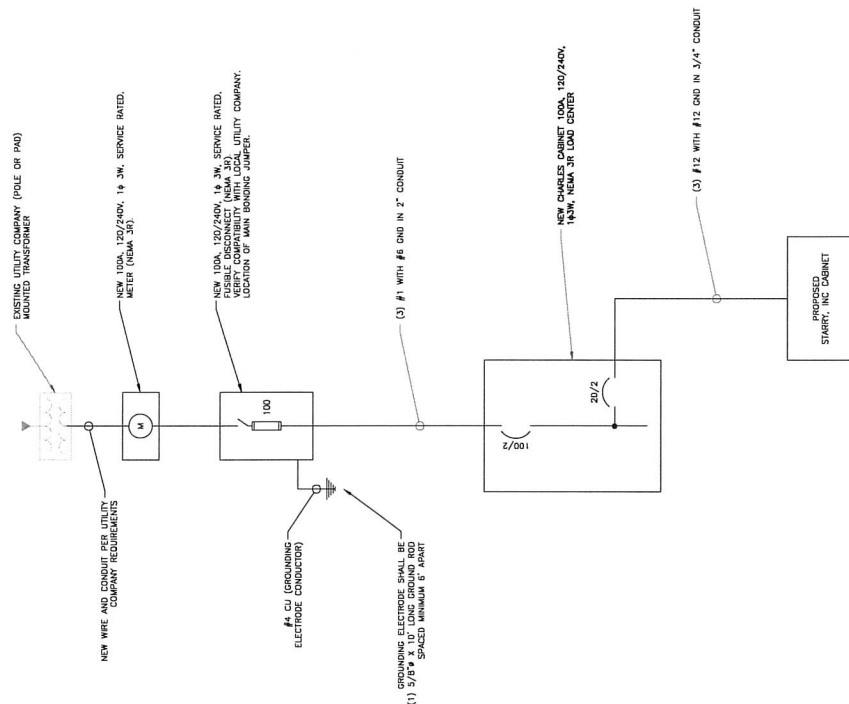
IT IS A VIOLATION OF LAW FOR ANY PERSON, UNLESS THEY ARE ACTING UNDER THE DIRECTION OF A LICENSED PROFESSIONAL ENGINEER, TO ALTER THIS DOCUMENT.

SHEET NUMBER: REVISION:

1-11

NOTES:

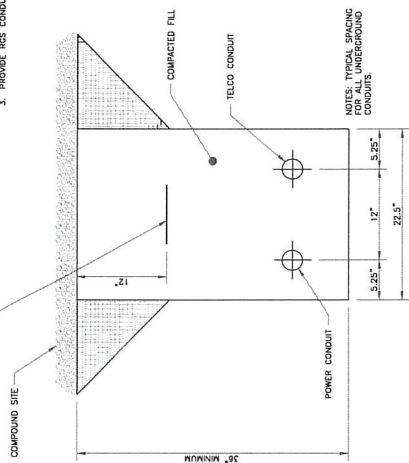
1. ALL NEW CONDUCTOR WIRE TO BE INSTALLED SHALL BE COPPER, ALL WIRE LARGER THAN #10 SHALL BE XHHW-2, THW-2, THW-2, THW-2, OR RHW-2 UNLESS NOTED OTHERWISE.
2. CONTRACTOR IS TO FIELD VERIFY ALL EXISTING ITEMS SHOWN ON THE ELECTRICAL ONE-LINE DIAGRAM AND NOTIFY THE ENGINEER OF ANY DISCREPANCIES.
3. ALL GROUNDING AND BONDING PER THE NEC.



3 ONE LINE DIAGRAM
SCALE: NOT TO SCALE

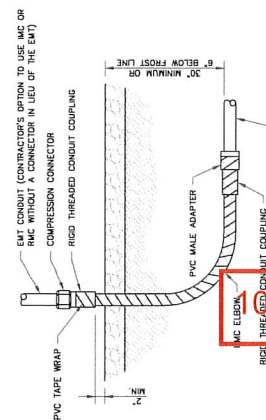
NOTES:

- 3" WIDE METALLIC YELLOW WARNING TAPE w/
BLACK LETTERS, TAPE TO READ: CAUTION
ELECTRIC LINE BURIED BELOW
1. PROVIDE PVC CONDUIT BELOW GRADE EXCEPT AS NOTED BELOW.
 2. PROVIDE RGS CONDUIT & ELBOWS AT STUB UP LOCATIONS (i.e. POLES, EQUIPMENT, etc.)
 3. PROVIDE RGS CONDUIT BELOW PARKING LOTS & ROADWAYS



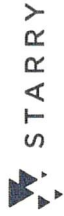
1 POWER/FIBER TRENCH DETAIL
SCALE: NOT TO SCALE

ALL METAL CONDUIT INSTALLED IN DIRECT CONTACT WITH THE EARTH SHALL BE CONSIDERED TO BE INSTALLED IN A SEVERELY CORROSIVE ENVIRONMENT AND IS REQUIRED TO HAVE SUFFICIENT PROTECTION AGAINST CORROSION (NEC ARTICLE 344.10(B) & 344.10(B)(1)). THIS CONTRACTOR SHALL PROVIDE AN APPROVED MANUFACTURER INSTALLED PROTECTIVE COATING ON THE CONDUIT OR SHALL BE (2) LAYERS OF 10 MIL PVC PIPE WRAP TAPE INSTALLED USING OPPOSING SPIRAL WRAPS ON VERTICAL PIPES THE OUTSIDE LAYER OF TAPE SHALL BE APPLIED AT AN ANGLE OF 45 DEGREES SHEDDING OF WATER (I.E. TAPE SHOULD WRAP IN AN UPWARD DIRECTION WITH LOWER WRAP BEING BENEATH THE WRAP ABOVE). SPIRAL WRAPS SHALL HAVE A MINIMUM OF 1/4" OVERLAP WITH OTHER METHODS OF JOINT PROTECTION SHALL REQUIRE APPROVAL BY THE ENGINEER OF RECORD PRIOR TO BEING USED.



2 CONDUIT STUB UP DETAIL
SCALE: NOT TO SCALE

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05/11/2022



STARRY, INC SITE NUMBER:
S-LASLAS0157-A
BU #: 826562
PAVILION CENTER DR
LAS VEGAS, NV 89135
EXISTING 87'-0" MONOPOLE

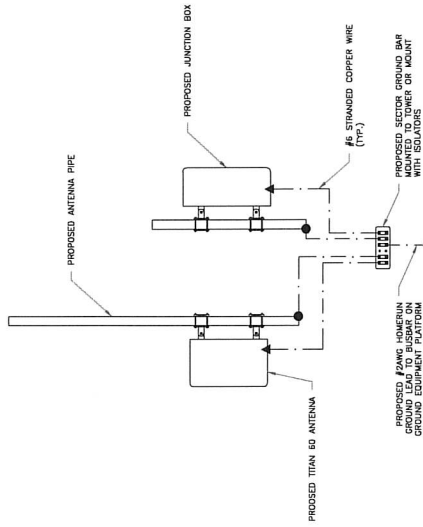
REV	DATE	DESCN	DISPOSITION	DESIGN
1	07/26/2022	001	PRELIMINARY	MEP
2	08/25/2022	001	CONSTRUCTION	MEP
3	09/05/2022	001	CONSTRUCTION	MEP



03/24/2022

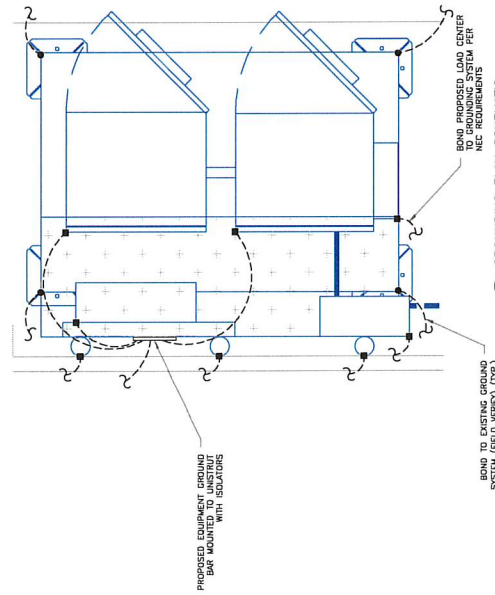
IT IS A VIOLATION OF LAW TO REANY TERM, UNLESS THEY ARE SETTING A NEW FOR DESTRUCTION, AND NO OTHER REASON TO ALTER THE DOCUMENT.

SHEET NUMBER
G-1
REVISION
1



1 TYPICAL SECTOR GROUNDING DIAGRAM
SCALE: NOT TO SCALE

INSTALLER NOTE:
REFER TO SITE PLAN DRAWING FOR
LOCATION OF GROUNDING AND
ANTENNA SUPPORT STRUCTURE.

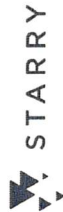


2 GROUNDING PLAN SCHEMATIC
SCALE: NOT TO SCALE

GROUNDING PLAN LEGEND:	
--- GROUND WIRE	⊙ COPPER GROUND ROD
■ EXOTHERMIC WELD	⊗ GROUND ROD #7 TEST WELL
● MECHANICAL CONNECTION	

INSTALLER NOTE:
1. #2 SOLID WIRE FOR BELOW GRADE GROUNDING
2. #6 STRANDED WIRE FROM EQUIPMENT TO GROUND BAR
3. ALL GROUND RODS TO BE 5/8" x 10'-0"

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05/11/2022



STARRY, INC SITE NUMBER:
S-LASLAS0157-A

BU #: 826562
PAVILION CENTER DR
01 S. PAVILION CENTER DR
LAS VEGAS, NV 89135
EXISTING 87'-0" MONOPOLE

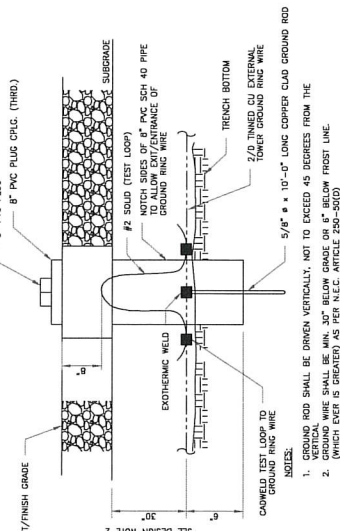
ISSUED FOR:				
N	DATE	DISC.N	DISCRIPTION	DIS./Q. DIS.
	02/04/2022	30M	PREFINANCY	MFP
	05/25/2022	30M	CONSTRUCTION	MFP
	06/24/2022	30M	CONSTRUCTION	MFP



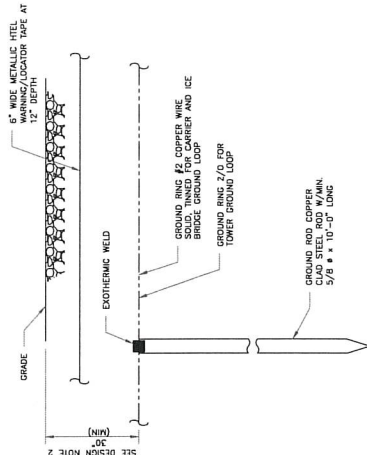
2000

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SHEET NUMBER: **G-2** REVISION: **1**

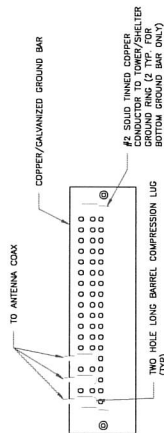


3 INSPECTION WELL DETAIL
SCALE: NOT TO SCALE



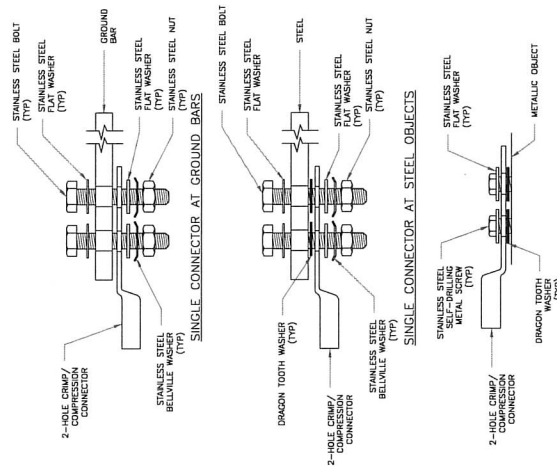
- NOTES:**
1. GROUND ROD SHALL BE DRIVEN VERTICALLY, NOT TO EXCEED 45 DEGREES FROM THE VERTICAL.
 2. GROUND WIRE SHALL BE MIN. 30" BELOW GRADE OR 6" BELOW FROST LINE. (WHICH EVER IS GREATER) AS PER N.E.C. ARTICLE 250-50(0)

6 GROUND ROD DETAIL
SCALE: NOT TO SCALE

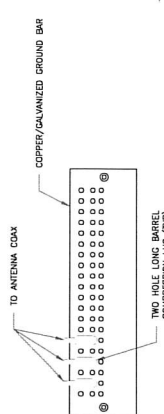


- NOTES:**
1. EXTERIOR ANTIOXIDANT JOINT COMPOUND TO BE USED ON ALL EXTERIOR CONNECTIONS.
 2. GROUND BAR SHALL NOT BE ISOLATED FROM TOWER, MOUNT DIRECTLY TO TOWER STEEL (TOWER ONLY).
 3. GROUND BAR SHALL BE ISOLATED FROM BUILDING OR SHELTER.

2 TOWER/SHELTER GROUND BAR DETAIL
SCALE: NOT TO SCALE

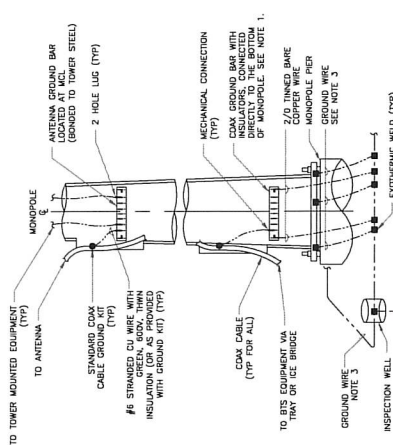
SINGLE CONNECTOR AT METALLIC/STEEL OBJECTS
(IYP)

5 HARDWARE DETAIL FOR EXTERIOR CONNECTIONS
SCALE: NOT TO SCALE



- NOTES:**
1. DOUBLING UP "OR STACKING" OF CONNECTIONS IS NOT PERMITTED.
 2. EXTERIOR ANTIOXIDANT JOINT COMPOUND TO BE USED ON ALL EXTERIOR CONNECTIONS.
 3. GROUND BAR SHALL NOT BE ISOLATED FROM TOWER. MOUNT DIRECTLY TO ANTENNA MOUNT STEEL.

1 ANTENNA SECTOR GROUND BAR DETAIL
SCALE: NOT TO SCALE



- NOTES:
1. NUMBER OF CROWNS PER ANTENNA SHALL BE DETERMINED BY THE USER, DEPENDING ON THE TYPE OF TOWER. ANTENNA FEET ON THE TOWER SHALL HAVE GROUNDS IN THE MOUNT, PROVIDE AS REQUIRED.
 2. ONLY MECHANICAL JOINTS SHALL BE ALLOWED TO BE MADE TO CROWN CASTLE USA, INC. TOWERS. ALL MECHANICAL CONNECTING SHALL BE TREATED WITH AN ANTI-OXIDANT COATING.
 3. ALL TOWER CROWNS MUST COMPLY WITH THE REQUIREMENTS OF THE RECOGNIZED EDITORIAL STANDARDS 2.2.2 AND NFPA 780.

4 TYPICAL ANTENNA CABLE GROUNDING
SCALE: NOT TO SCALE



TYPE JS



TYPE JX



TYPE JY



TYPE JZ



TYPE JA



TYPE JB



TYPE JC



TYPE JD



TYPE JE



TYPE JF



TYPE JG



TYPE JH



TYPE JI



TYPE JJ



TYPE JK



TYPE JL



TYPE JM



TYPE JN



TYPE JO



TYPE JP



TYPE JQ



TYPE JR



TYPE JS



TYPE JT



TYPE JU



TYPE JV



TYPE JW



TYPE JX



TYPE JY



TYPE JZ



TYPE JA



TYPE JB



TYPE JC



TYPE JD



TYPE JE



TYPE JF



TYPE JG



TYPE JH



TYPE JI



TYPE JJ



TYPE JK



TYPE JL



TYPE JM



TYPE JN



TYPE JO



TYPE JP



TYPE JQ



TYPE JR



TYPE JS



TYPE JT



TYPE JU



TYPE JV



TYPE JW



TYPE JX



TYPE JY



TYPE JZ



TYPE JA



TYPE JB



TYPE JC



TYPE JD



TYPE JE



TYPE JF



TYPE JG



TYPE JH



TYPE JI



TYPE JJ



TYPE JK



TYPE JL



TYPE JM



TYPE JN



TYPE JO



TYPE JP



TYPE JQ



TYPE JR



TYPE JS



TYPE JT



TYPE JU



TYPE JV



TYPE JW



TYPE JX



TYPE JY



TYPE JZ



TYPE JA



TYPE JB



TYPE JC



TYPE JD



TYPE JE



TYPE JF



TYPE JG



TYPE JH



TYPE JI



TYPE JJ



TYPE JK



TYPE JL



TYPE JM



TYPE JN



TYPE JO



TYPE JP



TYPE JQ



TYPE JR



TYPE JS



TYPE JT



TYPE JU



TYPE JV



TYPE JW



TYPE JX



TYPE JY



TYPE JZ



TYPE JA



TYPE JB



TYPE JC



TYPE JD



TYPE JE



TYPE JF



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TYPE JX



TYPE JY



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TYPE JA



TYPE JB



TYPE JC



TYPE JD



TYPE JE



TYPE JF



TYPE JG



TYPE JH



TYPE JI



TYPE JJ



TYPE JK



TYPE JL



TYPE JM



TYPE JN



TYPE JO



TYPE JP



TYPE JQ



TYPE JR



TYPE JS



TYPE JT



TYPE JU



TYPE JV



TYPE JW



TYPE JX



TYPE JY



TYPE JZ



TYPE JA



TYPE JB



TYPE JC



TYPE JD



TYPE JE



TYPE JF



TYPE JG



TYPE JH



TYPE JI



TYPE JJ



TYPE JK



TYPE JL



TYPE JM



TYPE JN



TYPE JO



TYPE JP



TYPE JQ



TYPE JR



TYPE JS



TYPE JT



PV-LPP L.I.F.E. MOUNT™ SNUB NOSE LOW PROFILE PLATFORM

Table 1: Platform Configurations

Part Number	Description	Included Parts					
		PV-LPP8-01	PV-LPPH	PV-PHK9-B	PPE-238X96	PPE-238X126	PIPE-312X126
PV-LPP8M-B	8' Face Platform	1	3	1	-	3	-
PV-LPP8M-HR-B	8' Face Platform w/ Horizontal Support Rail	1	3	1	3	-	3
PV-LPP10M-B	10' Face Platform	1	3	1	-	-	-
PV-LPP10M-HR-B	10' Face Platform w/ Horizontal Support Rail	1	3	1	3	-	3
PV-LPP10L-B	10' Face Platform, Large Pole	-	3	1	-	-	-
PV-LPP10L-HR-B	10' Face Platform w/ H-S Rail, Large Pole	-	3	1	-	-	-

Table 2: Platform EPA

Part Number	(EPA) _A (ft ²)	(EPA) _A x 1/2" ICE (ft ²)
PV-LPP8M-B	21.2	25.8
PV-LPP8M-HR-B	27.7	34.1
PV-LPP10M-B	22.4	27.3
PV-LPP10M-HR-B	29.7	36.7
PV-LPP10L-B	22.4	27.3
PV-LPP10L-HR-B	29.7	36.7

PIPES:

- Ø 2-3/8" OD (NPS 2 SCH 40)
- Ø 3-1/2" OD (NPS 3 SCH 40)
- A500 GR. C

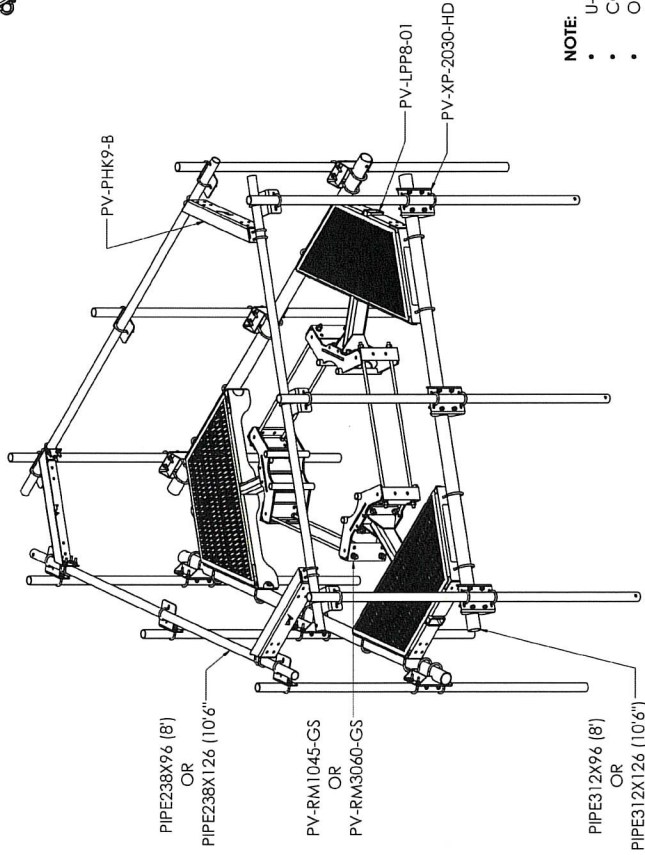
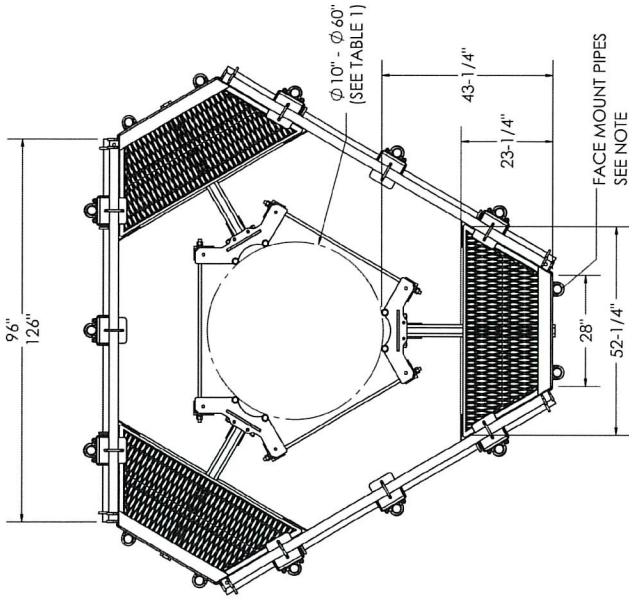
HSS TUBES:

- 5" x 3" x 3/8" HSS
- A500 GR. B

HARDWARE:

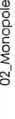
- 1/2" x 2-9/16" x 4-1/2" x 2-1/2" U-BOLT HW KIT
- 1/2" x 3-9/16" x 5-1/2" x 2-1/2" U-BOLT HW KIT
- 3/4"-10 x 48" A193-B7 ALL THREAD HW KIT
- GALVANIZED

100743-CUV
05/11/2022



- NOTE:**
- U-BOLTS FOR FACE MOUNT PIPES NOT INCLUDED
 - COMPATIBLE WITH 2-3/8" PIPE ONLY
 - ORDER (4) PV-GUB-4240 PER PIPE



1 OF 3		7/20/2020	SCALE 1:30	DIMENSIONS ARE IN INCHES TOLERANCES (UNLESS OTHERWISE SPECIFIED): HOLES: +1/16" -1/32" ANGULAR: PROFILE ±1/4", BEND ±2" ALL OTHERS: ±1/16"	CATEGORY		4			
					02_Monopole					
					SERIES		3			
					01_Platform - Triangular		UPDATE COLLARS TO GS SERIES		7/20/20	
					TYPE		2			
PK-LPP_Monopole Low Profile Platform		UPDATED PIPE SPACING		3/13/18						
BY		DJN		1						
CHECKED		SJS		LOADING UPDATE		10/19/17				
STATUS		APPROVED		0						
REV		DATE		INITIAL RELEASE		3/22/16				
REV		DATE		SNUR NOSE LOW PROFILE PLATFORM		DOCUMENT NUMBER				
REV		DATE		LPP-ENG-02-R4		4				
REV		DATE		PERFECT VISION®						

MOUNT CLASSIFICATIONS

- MOUNT CLASSIFICATION INFORMATION
- MAX STRUCTURE HEIGHT: 400ft
- STRUCTURE CLASS: I OR II
- EXPOSURE CATEGORY: B OR C
- TOPOGRAPHIC CATEGORY: 1
- DESIGN WIND PRESSURE (NO ICE): 135psf
- DESIGN WIND PRESSURE (ICED): 15psf
- DESIGN ICE THICKNESS: 2.75in Radial

APPROVED MOUNTS:

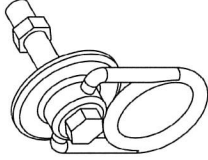
- PV-LPP8M-HR-B
- PV-LPP10M-HR-B
- PV-LPP10L-HR-B

APPROVED MOUNT CLASSIFICATIONS:

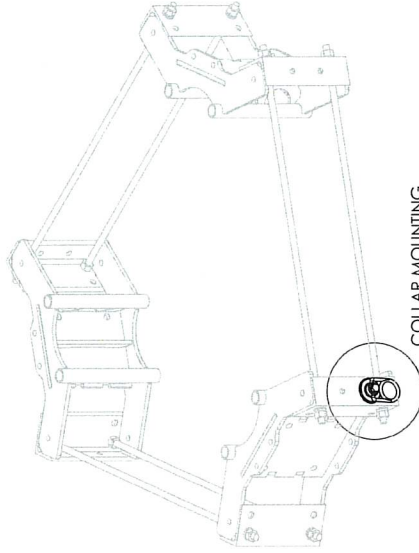
REQUIRED LOAD (lbs)	APPROVED MOUNT CLASSIFICATIONS					
	REQUIRED LOAD (lbs)					
	700	750	1150	1550	2050	
0	M700R(0)-3[6]	M750R(0)-3[6]	M1150R(0)-3[6]	M1550R(0)-3[6]	M2050R(0)-3[6]	
600	M700R(600)-3[6]	M750R(600)-3[6]	M1150R(600)-3[6]	M1550R(600)-3[6]	M2050R(600)-3[6]	
800	M700R(800)-3[6]	M750R(800)-3[6]	M1150R(800)-3[6]	M1550R(800)-3[6]	M2050R(800)-3[6]	
1100	M700R(1100)-3[6]	M750R(1100)-3[6]	M1150R(1100)-3[6]	M1550R(1100)-3[6]	M2050R(1100)-3[6]	
1350	M700R(1350)-3[6]	M750R(1350)-3[6]	M1150R(1350)-3[6]	M1550R(1350)-3[6]	M2050R(1350)-3[6]	

PV-LPP-GS-ACC1

- 10K SWIVEL ATTACHMENT ACCESSORY
- (3) INCLUDED WITH ALL PV-LPPGS KITS, (1) INSTALLED PER SECTOR MAX
- MOUNT TO COLLAR




PV-GS-ACC1
10K SWIVEL ATTACHMENT ACCESSORY
(OPTIONAL ADD ON)



COLLAR MOUNTING

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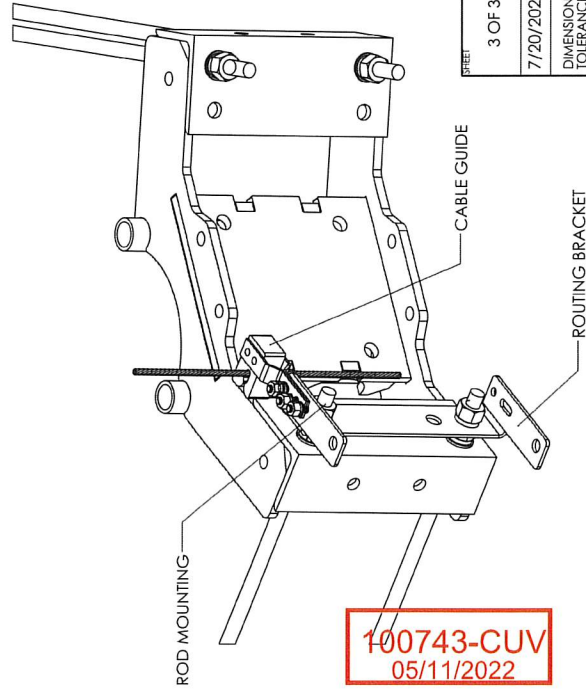
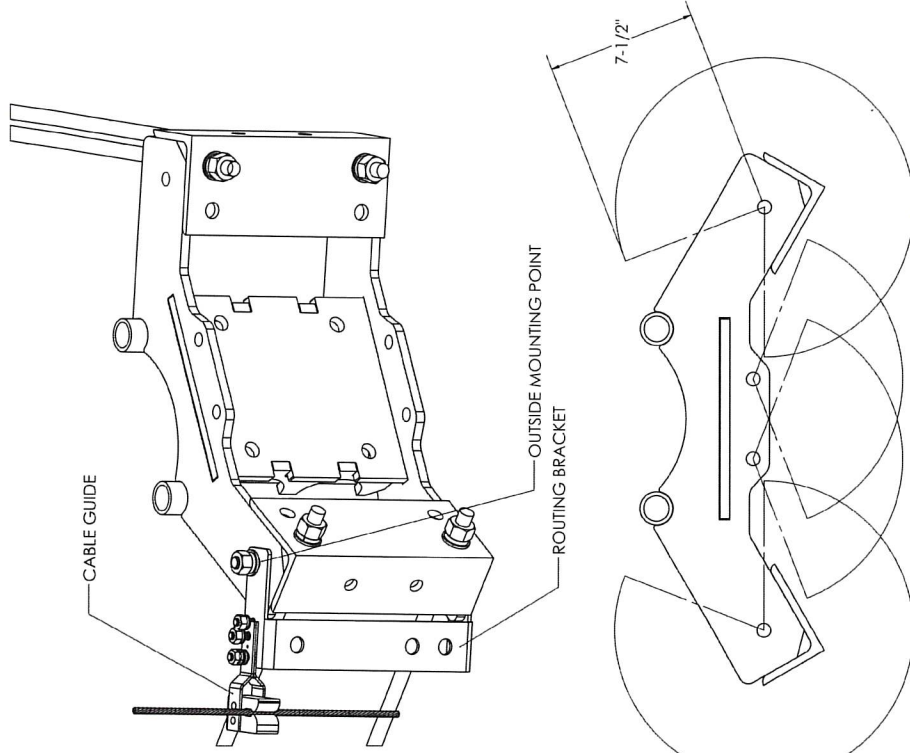
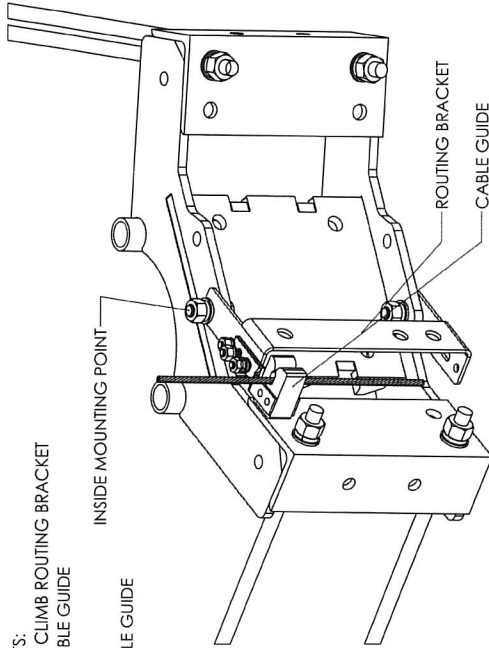
SHEET		CATEGORY		REV		DATE			
2 OF 3		SCALE: 1:32	DIMENSIONS ARE IN INCHES TOLERANCES U.N.O. HOLES: +1/16", -1/32" ANGULAR: PROFILE: ±1/4", BEND: ±2° ALL OTHERS: ±1/16"	DWG JARVIS PROJECTION	02_Monopole	01_Platform - Triangular	4	7/20/20	
							3	3/13/18	
							2	10/19/17	
							1	3/22/16	
							0		
		APPROVED		STATUS		DESCRIPTION		DATE	
		SJS		DUN		PV-LPP_Monopole Low Profile Platform		SKIR NOSE LOW PROFILE PLATFORM	
		100743-CUV		05/11/2022		LPP-ENG-02-R4		4	

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SAFETY CLIMB ROUTING

INCLUDED COMPONENTS:
PV-SCRB-RMGs - SAFETY CLIMB ROUTING BRACKET
115-242 - STANDARD CABLE GUIDE

OPTIONAL ACCESSORY:
115-203 - LOCKING CABLE GUIDE



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05/11/2022

CABLE GUIDE RANGE

REV	DESCRIPTION	DATE
1	INITIAL RELEASE	3/22/16
2	LOADING UPDATE	10/19/17
3	UPDATED PIPE SPACING	3/13/18
4	UPDATE COLLARS TO CS SERIES	7/22/20
5	UPDATE COLLARS TO CS SERIES	7/22/20

3 OF 3	7/20/2020	SCALE 1:6	WIND ANGLE PROJECTION	CATEGORY 02_Monopole	SERIES 01_Platform - Triangular	TYPE PV-LPP_Monopole Low Profile Platform	STATUS APPROVED
DIMENSIONS ARE IN INCHES TOLERANCES U.N.O. HOLES: +1/16" -1/32" ANGULAR: PROFILE ±1/4", BEND ±2" ALL OTHERS: ±1/16"				PERFECT VISION®			
115-203 - LOCKING CABLE GUIDE				DOCUMENT NUMBER			
115-242 - STANDARD CABLE GUIDE				LPP-ENG-02-R4			
PV-SCRB-RMGs - SAFETY CLIMB ROUTING BRACKET				REV 4			

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