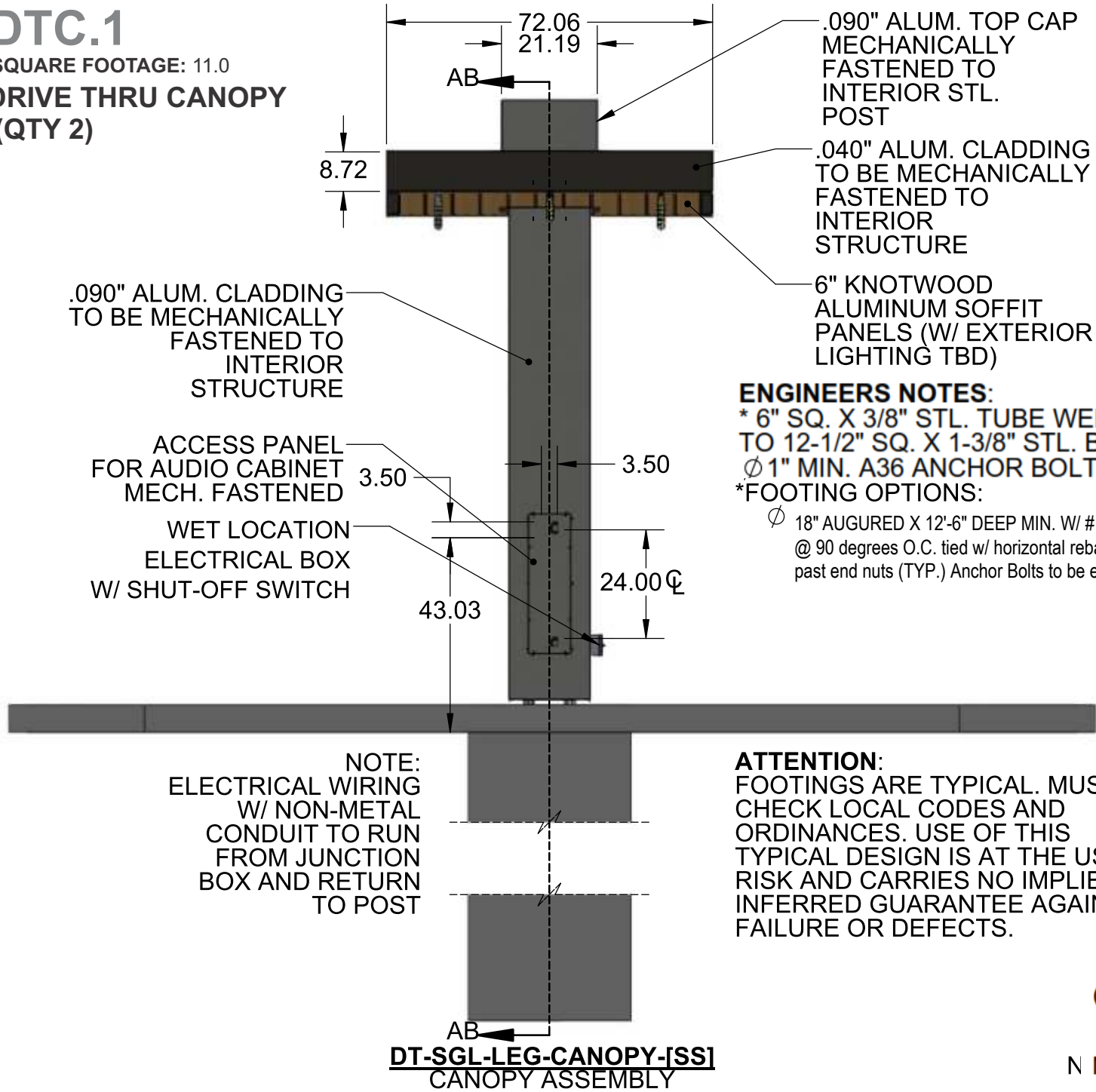


DTC.1  
SQUARE FOOTAGE: 11.0  
DRIVE THRU CANOPY  
(QTY 2)



**ENGINEERS NOTES:**  
\* 6" SQ. X 3/8" STL. TUBE WELDED  
TO 12-1/2" SQ. X 1-3/8" STL. BASE PLATE W/ (4)  
 $\phi$  1" MIN. A36 ANCHOR BOLTS.  
\*FOOTING OPTIONS:  
 $\phi$  18" AUGURED X 12'-6" DEEP MIN. W/ # 4 REBAR in 12" circle  
@ 90 degrees O.C. tied w/ horizontal rebar @ 6" O.C. & 12" O.C.  
past end nuts (TYP.) Anchor Bolts to be embd. min. 20" (TYP.)

**ATTENTION:**  
FOOTINGS ARE TYPICAL. MUST  
CHECK LOCAL CODES AND  
ORDINANCES. USE OF THIS  
TYPICAL DESIGN IS AT THE USER'S  
RISK AND CARRIES NO IMPLIED OR  
INFERRED GUARANTEE AGAINST  
FAILURE OR DEFECTS.

DESIGN SPECIFICATIONS				
IBC	2018	with	MO	amendments
ASCE	7-16	Minimum Design Loads for Buildings & Other Structures		
ACI	318-14	Building Code Requirements for Structural Concrete		
ANSI/AISC	360-16	Specification for Structural Steel Buildings		
DESIGN LOADS				
Wind	V =	115	mph	
Exposure	C			
Risk Cat.	II			
Grnd. Snow	Pg =	20	psf	

MOUNTING BRACKET  
WELDED TO STL POST  
AND MECH. FASTENED TO  
CLADDING W/ 1/4"-20 SS  
SCREWS

14.26

HEATED ROOF MATS  
5" WIDE:  
.11 AMP/LN. FT.  
110V/1PH

14.92

93°

5.13

133.65

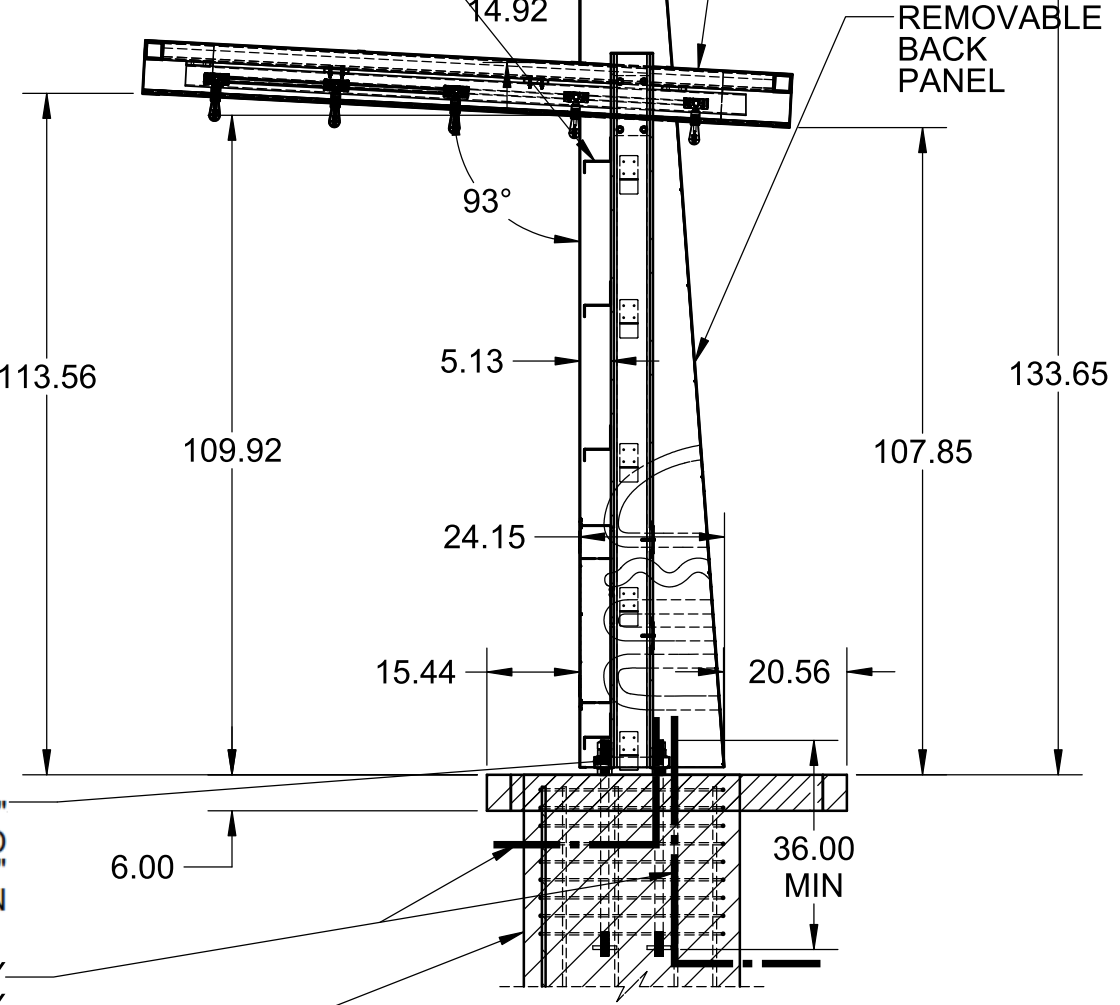
107.85

24.15

15.44

20.56

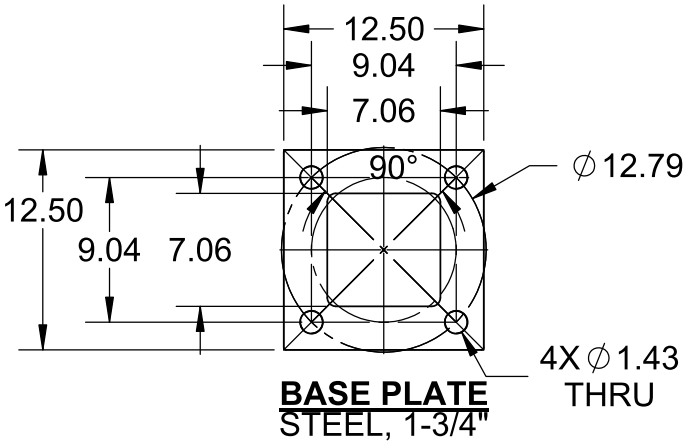
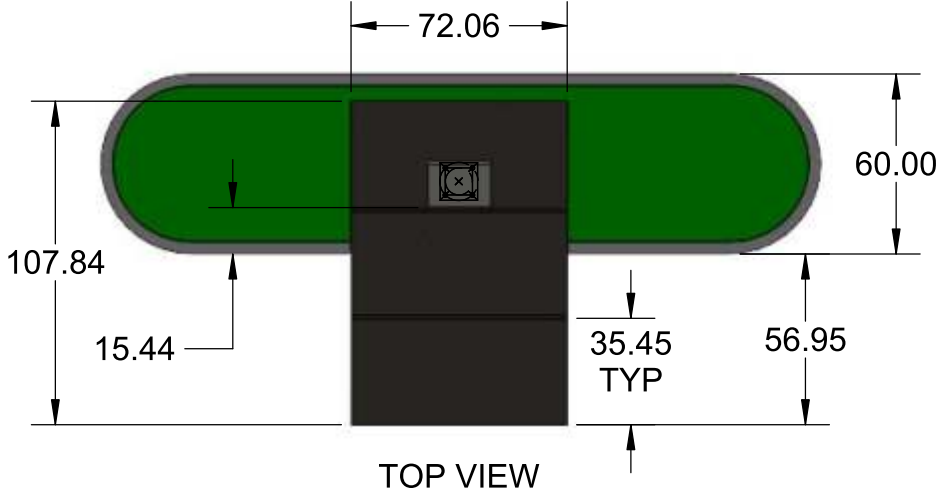
REMOVABLE  
BACK  
PANEL



3000 PSI CONC. FOOTING W/  
(4)  $\phi$  1" X 24" (MIN) LONG ANCHOR  
RODS W/ DBL HEAVY HEX NUTS  
OVER HEAVY HEX LEVELING  
N NUTS W/ (9) #5 REBAR VERTICALS  
AND (9) #4 REBAR HORIZONTALS  
@ 3" O.C. @ TOP, THEN  
FILL BALANCE @ 12" MAX O.C.  
TO BOTTOM OF FOOTING

SECTION AB  
SCALE 1 : 32

NOTE:  
CONG. PIER IS TO BE POURED TIGHT  
AGAINST UNDISTURBED SOIL. BACKFILL IS  
NOT ACCEPTABLE



**MURDOCH  
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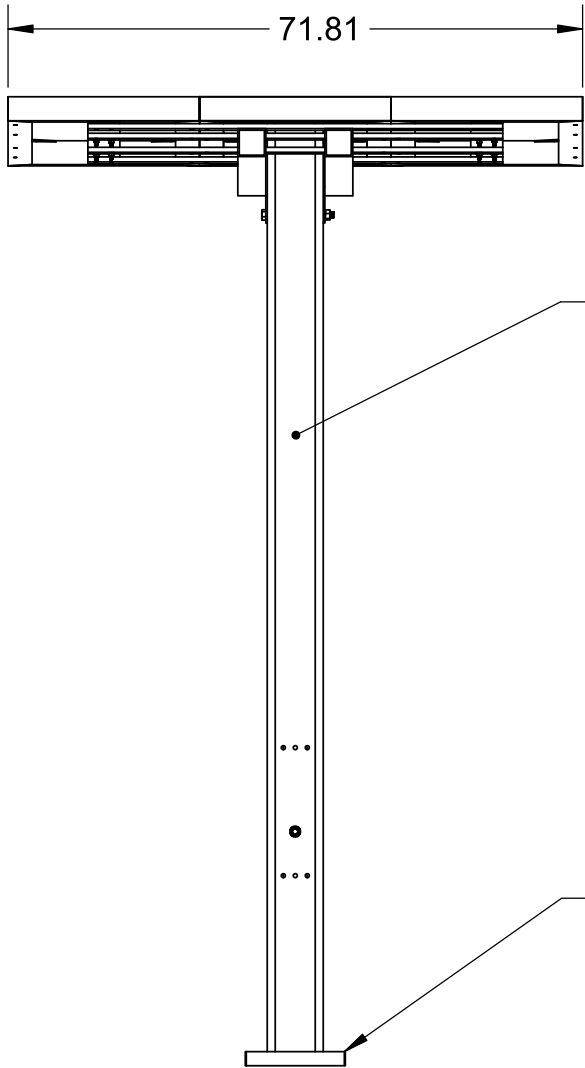
*Jere Murdoch*  
**Jere Murdoch, PE**  
Professional Engineer  
MO PE Lic. #2014038163

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REV. 11/12/2021

ENG VAULT/SHAKE SHACK/DT-SGL-LEG-CANOPY-[SS]/SOLIDWORKS/DT-SGL-LEG-CANOPY-[SS]-TYP

DTC.1 DRIVE THRU CANOPY (QTY 2)  
SQUARE FOOTAGE: 11.0

DESIGN SPECIFICATIONS				
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ANSI/AISC	360-16	Specification for Structural Steel Buildings		
DESIGN LOADS				
Wind	V =	115	mph	
Exposure	C			
Risk Cat.	II			
Grnd. Snow	Pg =	20	psf	



FRONT VIEW  
(STRUCTURE)

6" X 6" X 3/8" WALL  
STL. SUPPORT TUBE

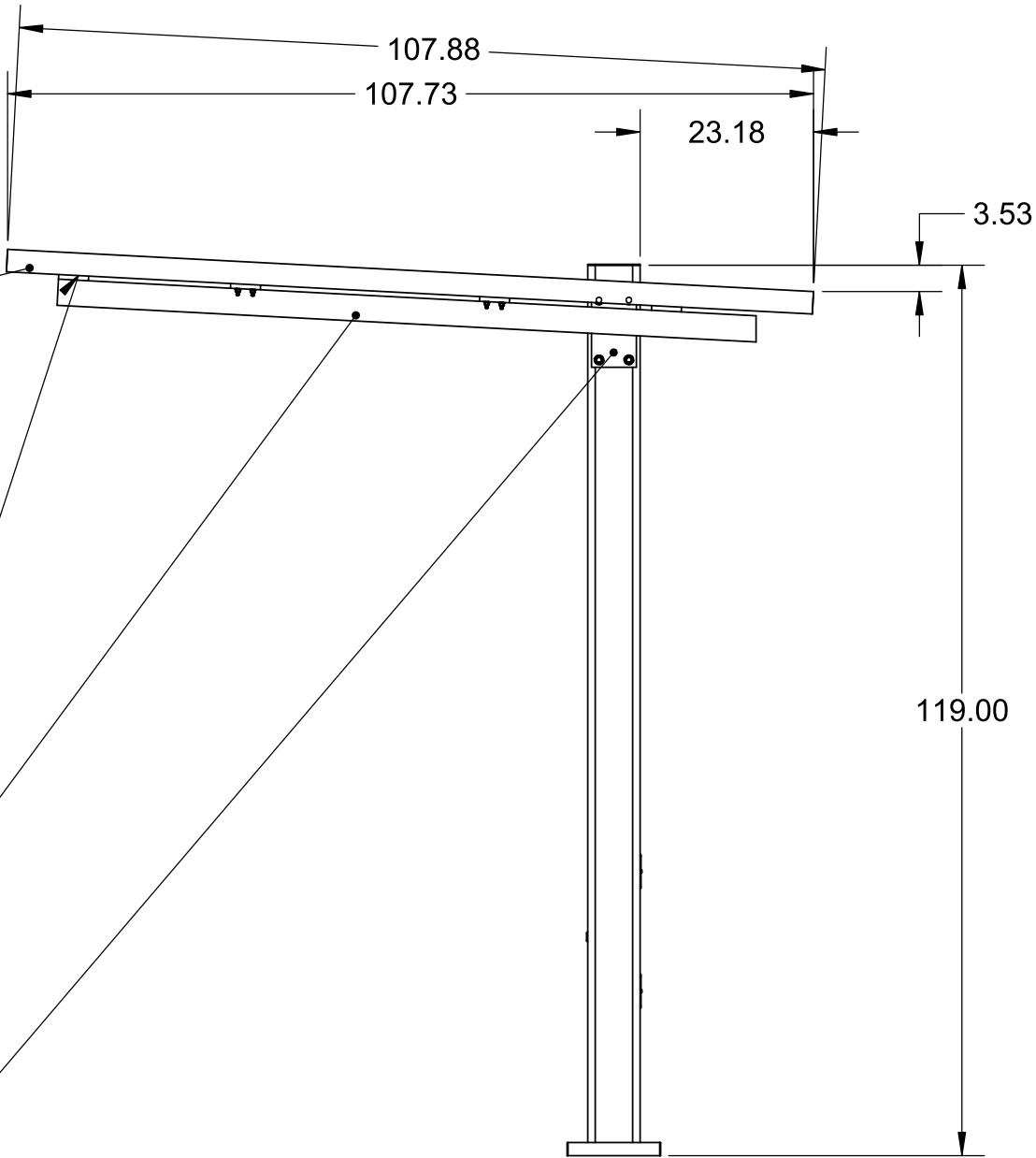
12-1/2" X 12-1/2" X 1-3/8"  
STL BASE PLATE W/  
CONTINUOUS WELD  
BOTH SIDES

4" X 4" ALUM.  
SUPPORT TUBE  
FRAME WELDMENT

4" X 5/8" STL. PLATES  
W/ 3/8"-16 X 1-3/4"L  
STL. BOLTS, WASHERS  
AND NUTS

3-1/2" X 3-1/2" X 3/16" WALL  
STL. SUPPORT TUBE

6" X 10" X 3/16" STL  
PLATE WELDED TO  
HSS 3-1/2" SQ. STL.  
TUBE AND MECH.  
FASTENED TO STL.  
SUPPORT TUBE



SIDE VIEW  
(STRUCTURE)



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Professional Engineer  
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JOB #: 250360-R16  
DATE: 12.14.2020  
DESIGNER: S. Wiands  
SALES REP:  
PROJ MGR: S. KOSTKA

REV.	DATE	BY	DESCRIPTION
5	04.16.21	SW	REVISE PER MARK-UPS
6	04.23.21	SW	REVISE PER MARK-UPS
7	05.04.21	SW	REVISE PER MARK-UPS
8	05.20.21	SW	UPDATE ELEVATIONS AND VARIOUS
9	05.21.21	SW	UPDATE PER REQUEST
10	06.09.21	SW	REVISED PER REQUEST
12	07.12.21	SW	ADDED ENGINEERING
13	07.22.21	JD	UPDATE FAUX NEON SIGNS
14	08.05.21	SW	REVISED PER REQUEST
15	08.09.21	SW	REVISED ENGINEERING
16	09.28.21	JD	REVISED PER REQUEST

CLIENT APPROVAL	DATE
LANDLORD APPROVAL	DATE
QC	

SHAKE SHACK

SHAKE SHACK  
2051 NW LOWENSTEIN DR  
LEE'S SUMMIT, MO 64081

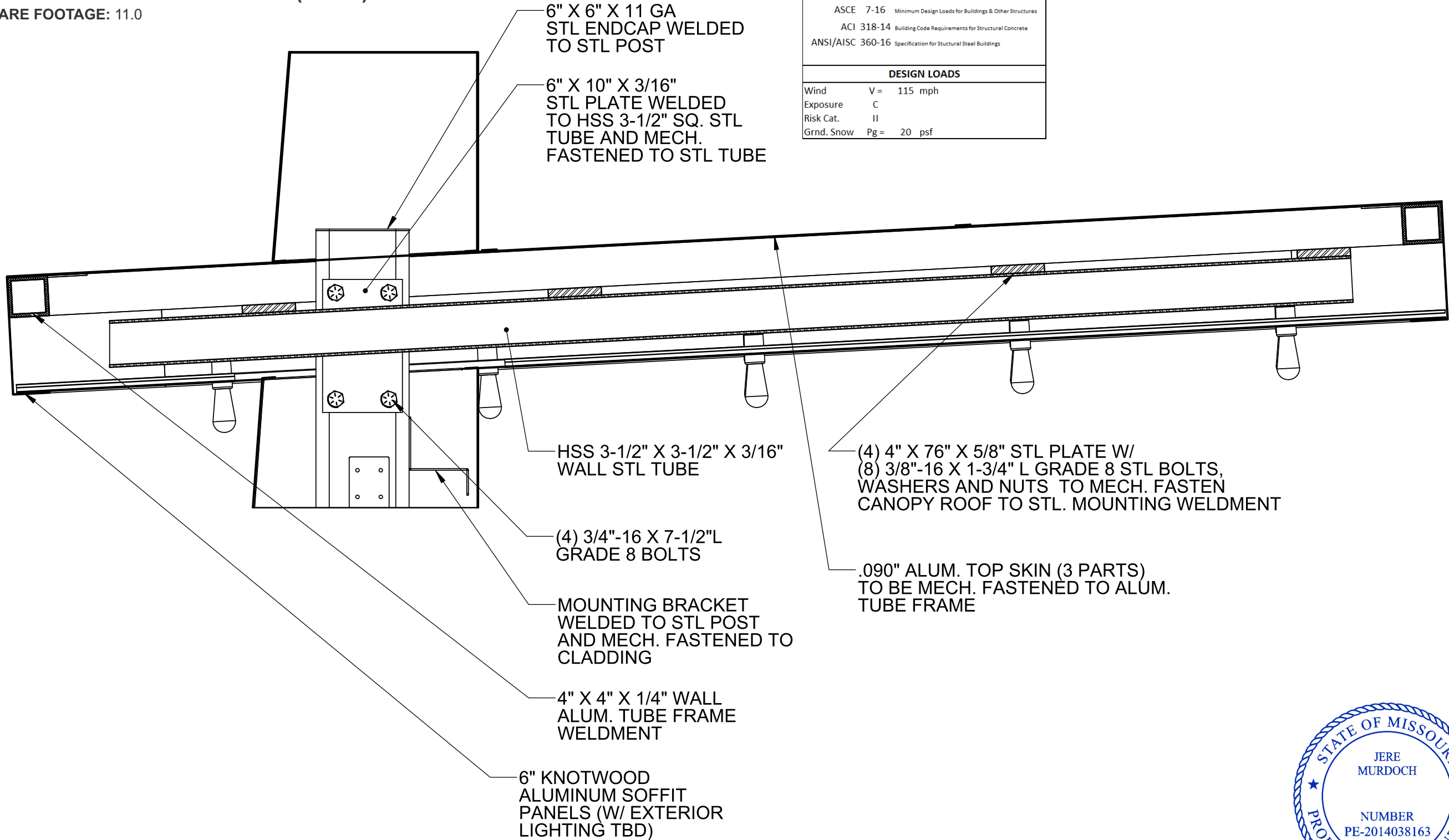
DESIGN PHASE: CONCEPTUAL

SHEET NUMBER

8.3

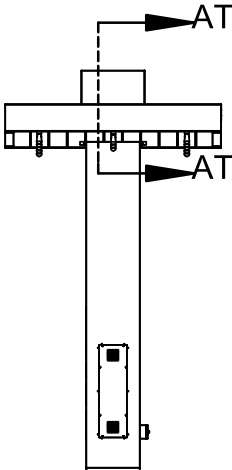
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DTC.1 DRIVE THRU CANOPY (QTY 2)  
SQUARE FOOTAGE: 11.0



DESIGN SPECIFICATIONS				
IBC	2018	with	MO	amendments
ASCE	7-16	Minimum Design Loads for Buildings & Other Structures		
ACI	318-14	Building Code Requirements for Structural Concrete		
ANSI/AISC	360-16	Specification for Structural Steel Buildings		
DESIGN LOADS				
Wind	V =	115	mph	
Exposure	C			
Risk Cat.	II			
Grnd. Snow	Pg =	20	psf	

SECTION AT



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*Jere Murdoch*  
**Jere Murdoch, PE**  
Professional Engineer  
MO PE Lic. #2014038163

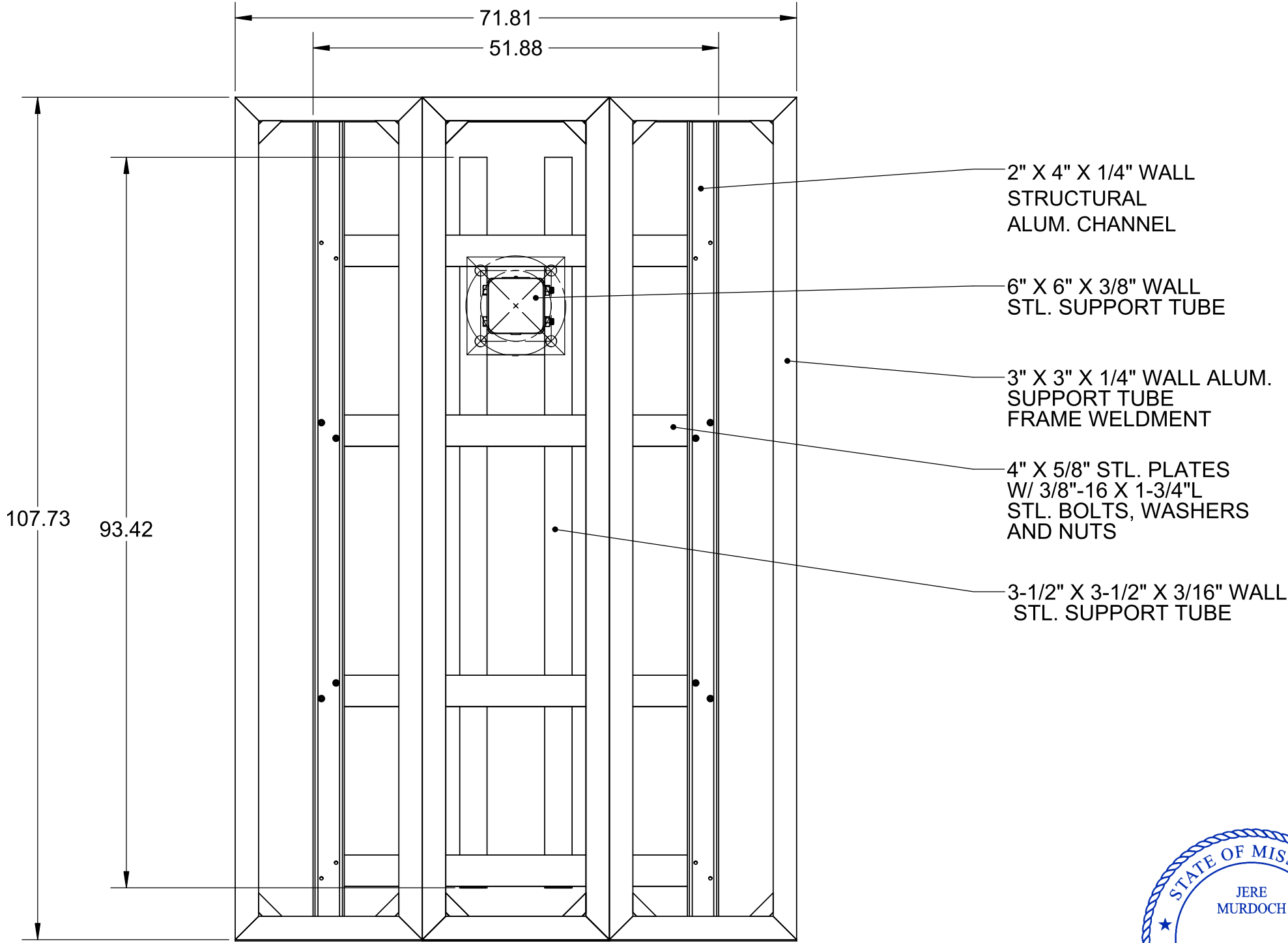
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Rev. 11/12/2021

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	DATE: 12.14.2020	5	04.16.21	SW	REVISE PER MARK-UPS	LANDLORD APPROVAL	DATE		2051 NW LOWENSTEIN DR LEE S SUMMIT, MO 64081	
	DESIGNER: S. Wiands	6	04.23.21	SW	REVISE PER MARK-UPS					
	SALES REP:	7	05.04.21	SW	REVISE PER MARK-UPS					
	PROJ MGR: S. KOSTKA	8	05.20.21	SW	UPDATE ELEVATIONS AND VARIOUS					
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		16	09.28.21	JD	REVISED PER REQUEST					

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DTC.1 DRIVE THRU CANOPY (QTY 2)

SQUARE FOOTAGE: 11.0



TOP VIEW  
(STRUCTURE)

DESIGN SPECIFICATIONS				
IBC	2018	with	MO	amendments
ASCE	7-16	Minimum Design Loads for Buildings & Other Structures		
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ANSI/AISC	360-16	Specification for Structural Steel Buildings		
DESIGN LOADS				
Wind	V =	115 mph		
Exposure	C			
Risk Cat.	II			
Grnd. Snow	Pg =	20 psf		



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Professional Engineer  
MO PE Lic. #2014038163

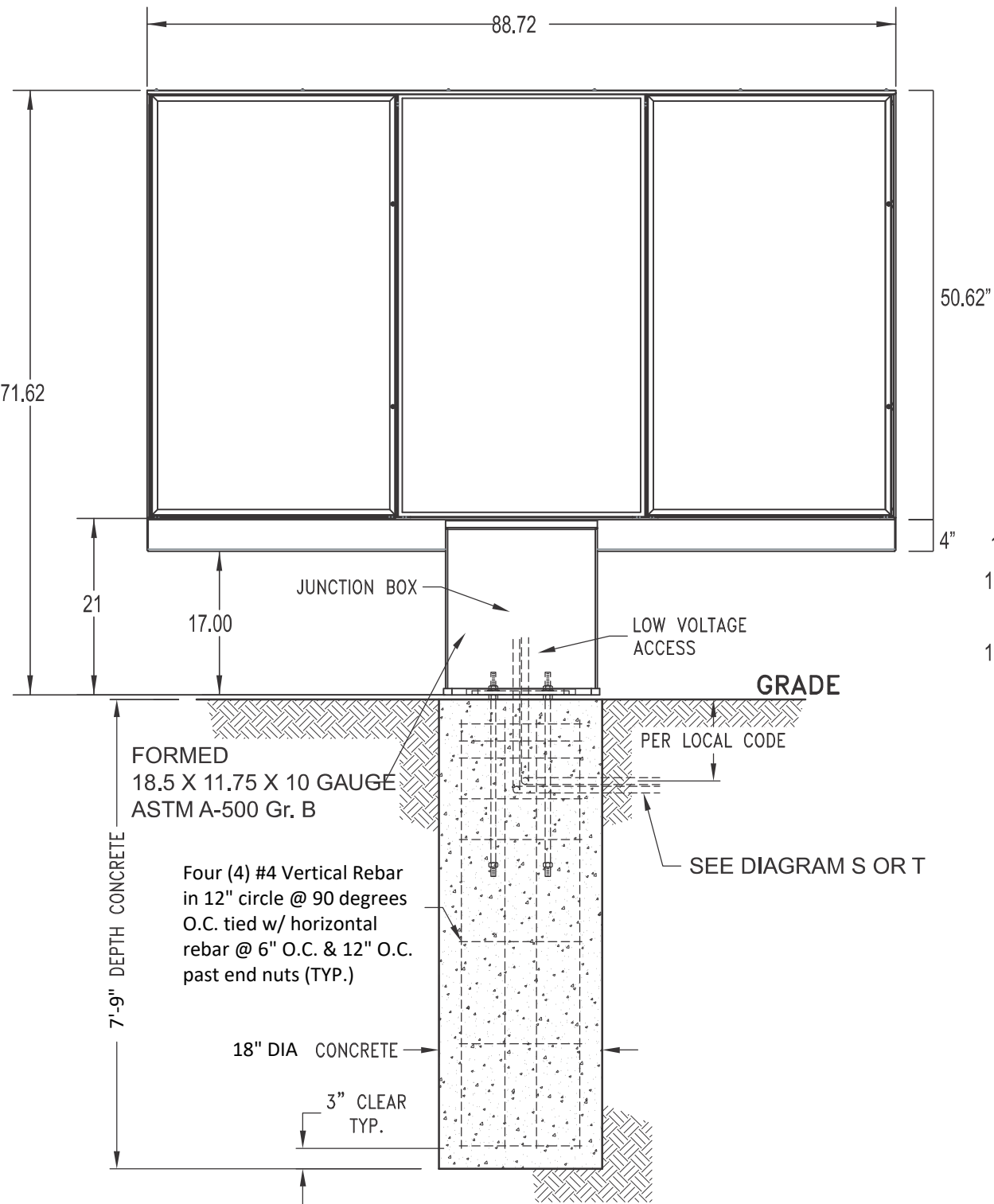
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	DESIGNER: S. Wiands	6	04.23.21	SW	REVISE PER MARK-UPS					
	SALES REP:	7	05.04.21	SW	REVISE PER MARK-UPS					
	PROJ MGR: S. KOSTKA	8	05.20.21	SW	UPDATE ELEVATIONS AND VARIOUS					
		9	05.21.21	SW	UPDATE PER REQUEST					
		10	06.09.21	SW	REVISED PER REQUEST					
12		07.12.21	SW	ADDED ENGINEERING						
13	07.22.21	JD	UPDATE FAUX NEON SIGNS	QC	DESIGN PHASE: CONCEPTUAL	8.5				
14	08.05.21	SW	REVISED PER REQUEST							
15	08.09.21	SW	REVISED ENGINEERING							
		16	09.28.21	JD	REVISED PER REQUEST					

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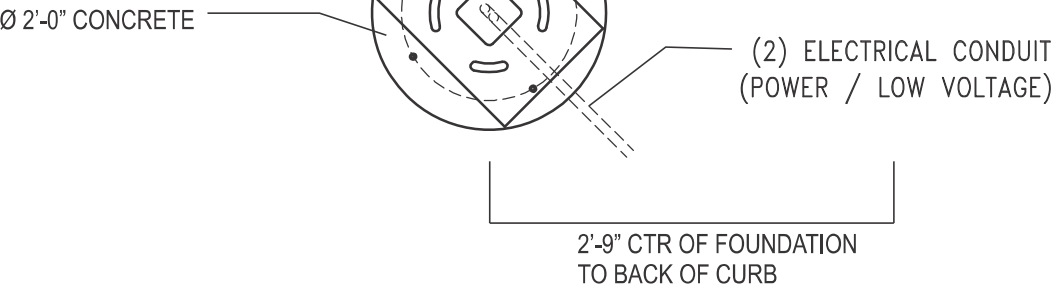
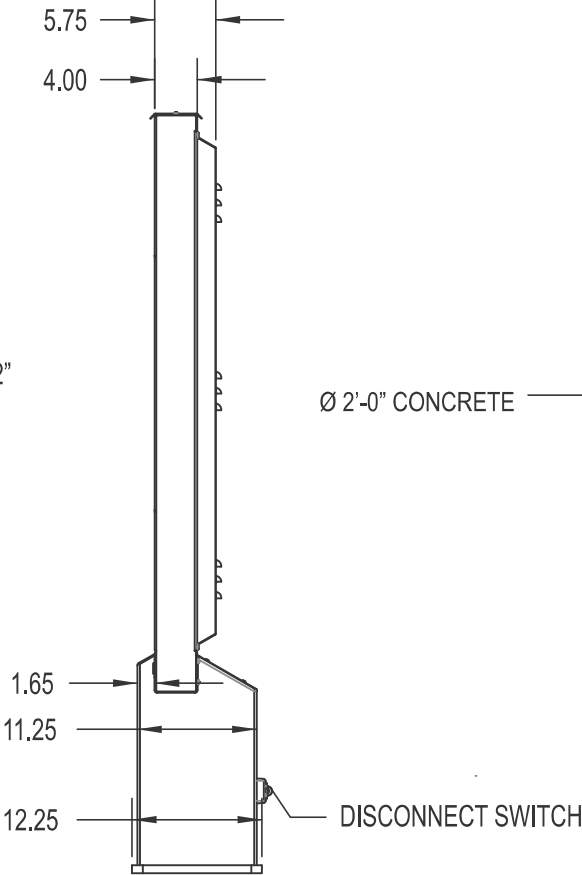


DMB.1 EXTERIOR MENU BOARD (QTY 2)

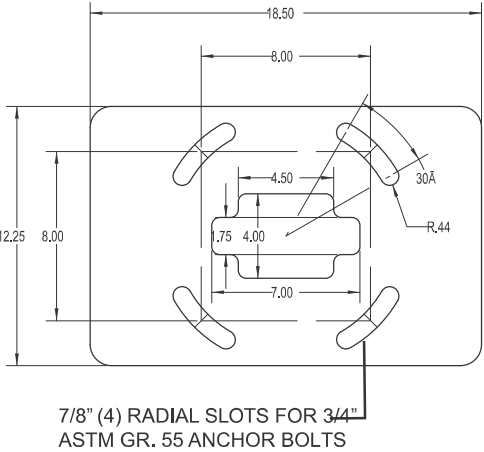


ELEVATION VIEW

Engineers Note:  
Murdoch Engineering scope of work to baseplate, anchor bolt and footing.  
Sign box pre-engineered to withstand applicable loading.



PLAN VIEW  
QTY. CONCRETE: 0.7 CU. YDS.



BASE PLATE DETAIL  
3/4" ASTM A-36 STEEL

DESIGN SPECIFICATIONS				
IBC	2018	with	MO	amendments
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ACI	318-14	Building Code Requirements for Structural Concrete		
ANSI/AISC	360-16	Specification for Structural Steel Buildings		
DESIGN LOADS				
Wind	V =	115	mph	
Exposure	C			
Risk Cat.	II			
Grnd. Snow	Pg =	20	psf	



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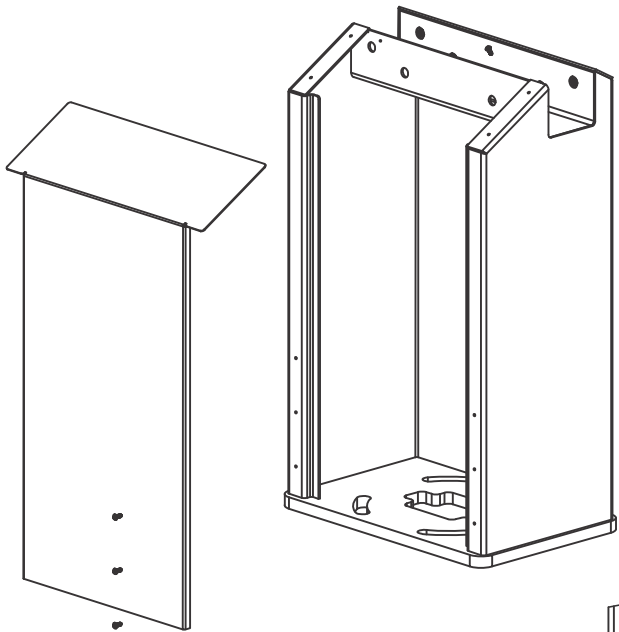
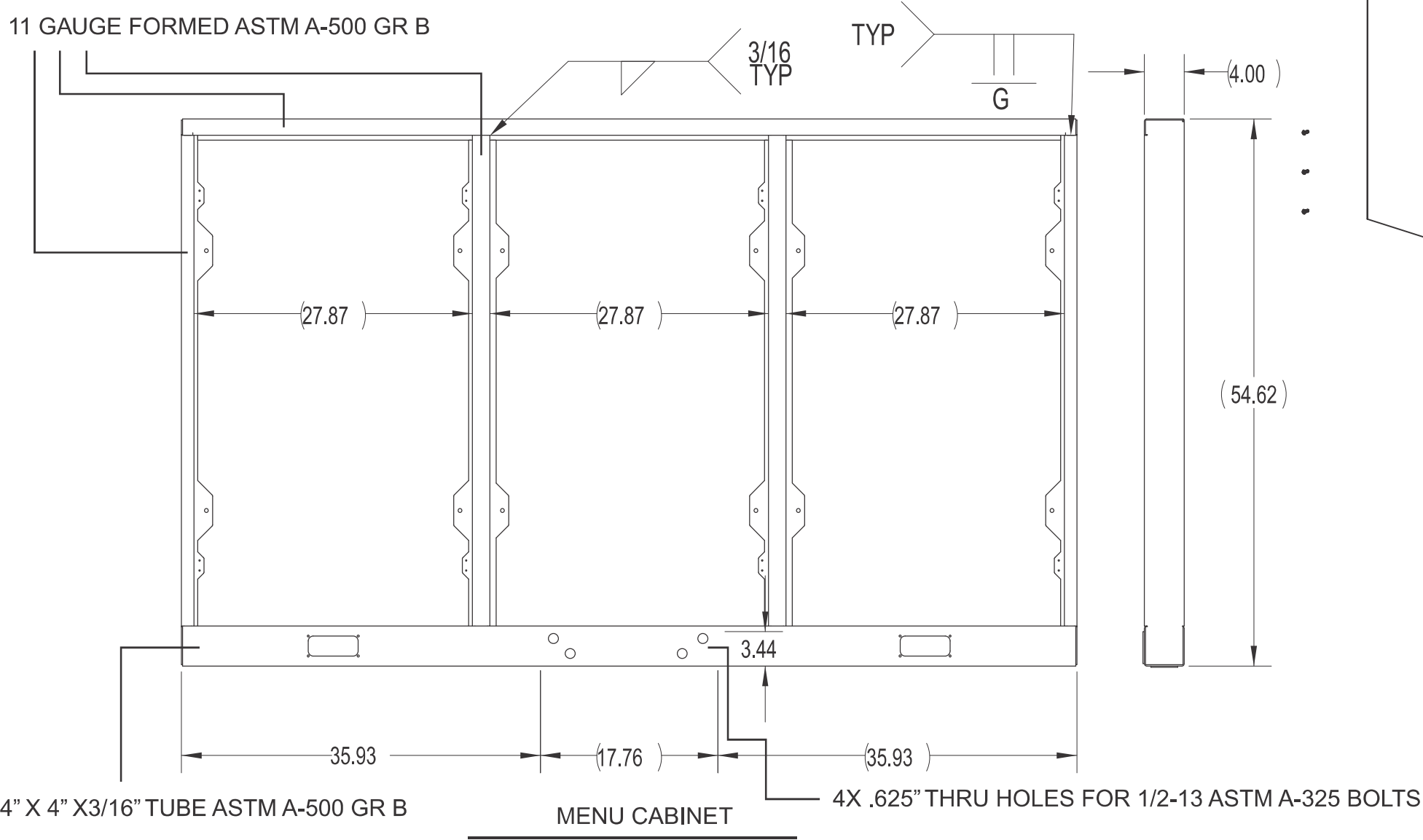
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**Jere Murdoch, PE** REV. 11/12/2021  
Professional Engineer  
MO PE Lic. #2014038163

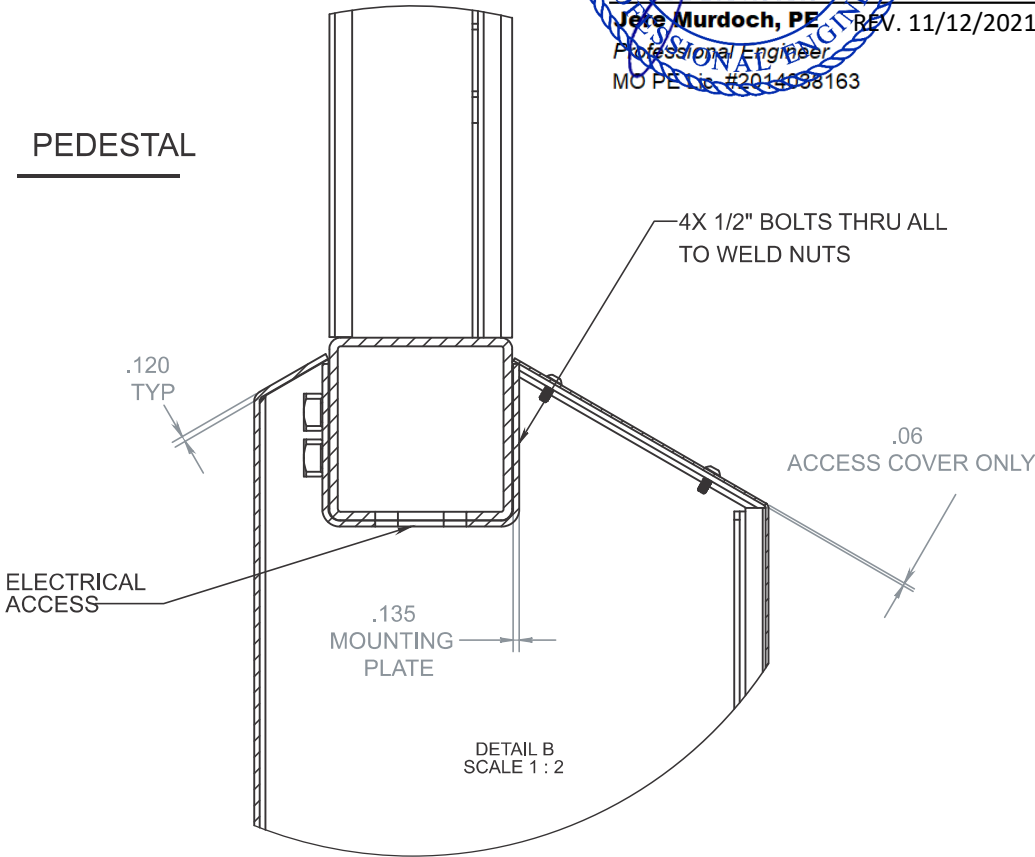
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		7	05.04.21	SW	REVISE PER MARK-UPS									
		8	05.20.21	SW	UPDATE ELEVATIONS AND VARIOUS	LANDLORD APPROVAL		DATE						
		9	05.21.21	SW	UPDATE PER REQUEST									
		10	06.09.21	SW	REVISED PER REQUEST									
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		13	07.22.21	JD	UPDATE FAUX NEON SIGNS									
		14	08.05.21	SW	REVISED PER REQUEST	QC						DESIGN PHASE: CONCEPTUAL		
		15	08.09.21	SW	REVISED ENGINEERING									
		16	09.28.21	JD	REVISED PER REQUEST									

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DMB.1 EXTERIOR MENU BOARD (QTY 2)



PEDESTAL



CUT AWAY VIEW PEDESTAL TO CABINET CONNECTION

DESIGN SPECIFICATIONS				
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ANSI/AISC	360-16	Specification for Structural Steel Buildings		
DESIGN LOADS				
Wind	V =	115 mph		
Exposure	C			
Risk Cat.	II			
Grnd. Snow	Pg =	20 psf		

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PE-2014038163

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Jere Murdoch, PE

Professional Engineer

MO PE Lic #2014038163

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	DESIGNER: S. Wiands	6	04.23.21	SW	REVISE PER MARK-UPS				LEE S SUMMIT, MO 64081	
	SALES REP:	7	05.04.21	SW	REVISE PER MARK-UPS	QC	DESIGN PHASE: CONCEPTUAL		9.2	
	PROJ MGR: S. KOSTKA	8	05.20.21	SW	UPDATE ELEVATIONS AND VARIOUS					
		9	05.21.21	SW	UPDATE PER REQUEST					
		10	06.09.21	SW	REVISED PER REQUEST					
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GENERAL:

- ALL MATERIALS AND WORK SHALL CONFORM TO THE REQUIREMENTS OF THE APPLICABLE INTERNATIONAL BUILDING CODE (IBC).
- CONSTRUCTION METHODS AND PROJECT SAFETY: DRAWINGS AND SPECIFICATIONS REPRESENT THE FINISHED STRUCTURE AND DO NOT INDICATE METHODS, PROCEDURES, OR SEQUENCE OF CONSTRUCTION. TAKE NECESSARY PRECAUTIONS TO MAINTAIN AND ENSURE THE INTEGRITY OF THE STRUCTURE DURING CONSTRUCTION. THE EOR WILL NOT ENFORCE SAFETY MEASURES OR REGULATIONS. THE CONTRACTOR SHALL DESIGN, CONSTRUCT, AND MAINTAIN ALL SAFETY DEVICES AND SHALL BE SOLELY RESPONSIBLE FOR CONFORMING TO ALL LOCAL, STATE, AND FEDERAL SAFETY AND HEALTH STANDARDS, LAWS, AND REGULATIONS.
- THE CONTRACTOR SHALL VERIFY ALL DIMENSIONS, ELEVATIONS AND SITE CONDITIONS PRIOR TO THE START OF CONSTRUCTION AND NOTIFY THE ENGINEER IMMEDIATELY OF ANY DISCREPANCIES OR INCONSISTENCIES THAT ARE FOUND. NOTED DIMENSIONS TAKE PRECEDENCE OVER SCALED DIMENSIONS. DO NOT SCALE DRAWINGS.
- ALL OMISSIONS AND/OR CONFLICTS BETWEEN THE VARIOUS ELEMENTS OF THE WORKING DRAWINGS AND SPECIFICATIONS SHALL BE BROUGHT TO THE ATTENTION OF THE ENGINEER AND FIELD INSPECTOR. THE ENGINEER SHALL PROVIDE A SOLUTION PRIOR TO PROCEEDING WITH ANY WORK AFFECTED BY THE CONFLICT OR OMISSION.
- WHERE NO CONSTRUCTION DETAILS ARE SHOWN OR NOTED FOR ANY PART OF THE WORK, CONSTRUCT IN ACCORDANCE WITH THE STEEL CONSTRUCTION MANUAL, 14TH EDITION OR 2010 ALUMINUM DESIGN MANUAL .
- WHEN A DETAIL IS IDENTIFIED AS TYPICAL, THE CONTRACTOR IS TO APPLY THIS DETAIL IN ESTIMATING AND CONSTRUCTION TO EVERY LIKE CONDITION WHETHER OR NOT THE REFERENCE IS REPEATED IN EVERY INSTANCE.
- ANY CHANGE TO THE DESIGN AS SHOWN ON THE DRAWINGS REQUIRES PRIOR WRITTEN APPROVAL FROM DESIGN ENGINEER OF RECORD BEFORE CONSTRUCTION.
- WORK PERFORMED IN CONFLICT WITH THE STRUCTURAL DRAWINGS OR APPLICABLE BUILDING CODE REQUIREMENTS SHALL BE CORRECTED AT THE EXPENSE OF THE CONTRACTOR.
- VERIFICATION: VERIFY ALL DIMENSIONS, ELEVATIONS, AND SITE CONDITIONS BEFORE STARTING WORK. NOTIFY THE EOR IMMEDIATELY OF ANY DISCREPANCIES.

EXISTING CONDITIONS:

- IF EXISTING CONDITIONS ARE NOT AS DETAILED IN THIS DESIGN, THE INSTALLER SHALL CEASE WORK AND NOTIFY MURDOCH ENGINEERING IMMEDIATELY.
- MURDOCH ENGINEERING WILL NOT BE PERFORMING ON-SITE INSPECTIONS OR VERIFICATIONS. IT IS THE RESPONSIBILITY OF THE INSTALLER, STRUCTURE OWNER, AND PROPERTY OWNER TO IDENTIFY EXISTING CONDITIONS AND CONTACT MURDOCH ENGINEERING WITH ANY DISCREPANCIES OR CONCERNS.
- INSTALLER SHALL CONFIRM THE DIAMETER AND THICKNESS OF EXISTING MEMBERS AND NOTIFY MURDOCH ENGINEERING OF ANY DISCREPANCIES.
- INSTALLER SHALL INSPECT AND CONFIRM THE QUALITY OF EXISTING STRUCTURE AS "IN GOOD REPAIR". IF THERE ARE ANY INDICATIONS THAT THIS IS NOT THE CASE, INSTALLER SHALL CEASE WORK IMMEDIATELY AND NOTIFY MURDOCH ENGINEERING.
- ANY EXISTING INFORMATION SHOWN HAS BEEN FURNISHED BY THE PERSON(S) OR COMPANY THIS DOCUMENT WAS PREPARED FOR (SEE TITLE BLOCK). MURDOCH ENGINEERING IN NO WAY CERTIFIES THIS INFORMATION AS "AS-BUILT". IF THERE IS ANY REASON TO BELIEVE THE EXISTING CONDITIONS DETAILED HEREIN ARE NOT ACCURATE, MURDOCH ENGINEERING SHALL BE NOTIFIED IMMEDIATELY.

STEEL

- STEEL SHAPES SHALL CONFORM TO THE FOLLOWING:

ROUND HSS	ASTM A500, GR B	Fy=42 KSI MIN.
SQUARE/RECT HSS	ASTM A500, GR B	Fy=46 KSI MIN.
THREADED ROD	ASTM A36	Fy=46 KSI MIN.
STEEL PLATE	ASTM A36 ASTM	Fy=36 KSI MIN.
STD. PIPE	A53, GR B	Fy=35 KSI MIN.
- BOLTS SHALL CONFORM TO ASTM A307 UNO..
- BOLTS AND THREADED ROD SHALL BE HOT-DIP GALVANIZED PER ASTM F2329 UNO.
- ANCHOR BOLTS SHALL CONFORM TO ASTM F1554 UNO.
- NUTS SHALL CONFORM TO ASTM A563.
- WASHERS SHALL CONFORM TO ASTM F844.
- STEEL HARDWARE SHALL BE HOT-DIP GALVANIZED PER ASTM A153 UNO
- WELDING:
  - WELD STRUCTURAL STEEL IN COMPLIANCE WITH ANSI/AWS D1.1 AND AISC SPECIFICATION, CHAPTER J. WELDERS SHALL BE CERTIFIED AS REQUIRED BY GOVERNING CODE AUTHORITY. WELDING SHALL BE DONE BY ELECTRIC ARC PROCESS USING LOW-HYDROGEN ELECTRODES WITH SPECIFIED TENSILE STRENGTH NOT LESS THAN 70 KSI UNLESS NOTED OTHERWISE.
  - ALL SHOP AND FIELD WELDS SHALL BE PERFORMED BY AN AWS OR ICC CERTIFIED WELDER WITH ACTIVE STATUS AT TIME OF WELDING
  - UNLESS A LARGER WELD SIZE IS INDICATED, PROVIDE MINIMUM SIZE WELDS PER AISC SPECIFICATION, SECTION J2, TABLE J2.4
  - BASE PLATES SHALL BE WELDED ON TOP AND BOTTOM WITH CONTINUOUS WELDS OF AT LEAST 1/4" (IF PLATE IS CUT TO FIT TUBE INTO PLATE)

ALUMINUM:

- FABRICATE AND ERECT ALUMINUM IN COMPLIANCE WITH THE ALUMINUM ASSOCIATION (AA) 2010 ALUMINUM DESIGN MANUAL (ADM) 1, THE SPECIFICATIONS FOR ALUMINUM SHEET METAL WORK (ASM35), AND IBC CHAPTER 20.
- PIPE AND TUBE SHALL BE 6061-T6 PER ASTM B241 OR B429 WITH Ft<sub>u</sub>=38 KSI MIN, F<sub>ty</sub>=35 KSI MIN, Ft<sub>uw</sub>=24 KSI MIN, F<sub>tyw</sub>=15 KSI MIN.
- STD STRUCTURAL PROFILES SHALL BE 6061-T6 PER B308 WITH Ft<sub>u</sub>=38 KSI MIN, F<sub>ty</sub>=35 KSI MIN, Ft<sub>uw</sub>=24 KSI MIN, F<sub>tyw</sub>=15 KSI MIN.
- SHEET AND PLATE SHALL BE 6061-T6 PER ASTM B209 WITH Ft<sub>u</sub>=42 KSI MIN, F<sub>ty</sub>=35 KSI MIN, Ft<sub>uw</sub>=24 KSI MIN, F<sub>tyw</sub>=15 KSI MIN.
- EXTRUSIONS SHALL BE 6061-T6 PER ASTM B241 OR B429 WITH Ft<sub>u</sub>=38 KSI MIN, F<sub>ty</sub>=35 KSI MIN, Ft<sub>uw</sub>=24 KSI MIN, F<sub>tyw</sub>=15 KSI MIN.
- ALL SHOP AND FIELD WELDS SHALL BE PERFORMED BY AN AWS OR ICC CERTIFIED WELDER WITH CURRENT STATUS AT TIME OF WELDING
- UNLESS A LARGER WELD SIZE IS INDICATED, PROVIDE MINIMUM SIZE WELD PER ADM. ALL ALUMINUM WELDED JOINTS SHALL HAVE WELD SIZES OF AT LEAST 1/4 INCH
- FILLET WELDS SHALL NOT EXCEED THINNEST MEMBER WALL THICKNESS JOINED.
- ALUMINUM WELD FILLER SHALL BE 5356 ALLOY
- WELDING PROCESS GMAW OR GTAW SHALL BE IN ACCORDANCE WITH AWS D1.2 --
- ALUMINUM CHANNEL LETTERS SHALL BE CONSTRUCTED OF 0.090" RETURNS AND 0.125" BACKS MINIMUM, UNLESS A LARGER SIZE IS INDICATED ON DRAWINGS. THIS NOTE SHALL SUPERCEDE DRAWING DETAILS.
- PROVIDE NEOPRENE GASKET BETWEEN DISSIMILAR METALS TO PREVENT GALVANIC CORROSION
- ALUMINUM DIRECTLY EMBEDDED INTO CONCRETE SHALL BE CAPPED AT BOTTOM AND COATED WITH BITUMINOUS COATING OR POLYURETHANE WHERE IN CONTACT WITH CONCRETE.
- FASTENERS BETWEEN DISSIMILAR METALS SHALL BE STAINLESS STEEL 316.

CONCRETE & REINFORCEMENT

- MINIMUM 28-DAY COMPRESSIVE STRENGTH (f<sub>c</sub>') SHALL BE 3,000 PSI. THE MAXIMUM WATER TO CEMENT RATIO SHALL BE 0.45 BY WEIGHT. A MINIMUM OF 5-3/4 BAGS OF CEMENT SHALL BE USED PER CUBIC YARD WITH A SLUMP OF 4" +/- 1.
- REINFORCEMENT TO BE ASTM A615 GR 60, F<sub>y</sub>=60 KSI UNO
- CALCIUM CHLORIDE OR ADDED CHLORIDE IS NOT PERMITTED
- VIBRATION: ALL REINFORCED CONCRETE SHALL BE CONSOLIDATED WITH MECHANICAL VIBRATORS
- CONCRETE CONSTRUCTION SHALL BE IN ACCORDANCE WITH ACI 318-11
- PROVIDE A MINIMUM OF 2-1/2" COVER OF ALL EMBEDDED STEEL REBAR AND A MINIMUM OF 6 INCHES OF COVER FOR DIRECT BURIED PIPE OR TUBE MEMBERS.

FOUNDATIONS

- CONCRETE POURED INTO CONSTRAINED EARTH EXCAVATIONS MUST CURE UNDER PROPER CONDITIONS FOR A MINIMUM OF 7 DAYS PRIOR TO SIGN BOX INSTALLATION. (EXCEPTION: IF THE OVERALL HEIGHT OF THE SIGN IS LESS THAN 20 FEET AND THE SIGN IS ADEQUATELY BRACED AGAINST WIND LOADS FOR A MINIMUM OF 4 DAYS, THE BOX MAY BE INSTALLED THE SAME DAY AS THE FOOTING IS POURED)
- FOOTINGS MUST BE POURED AGAINST UNDISTURBED EARTH. SOIL BACKFILL IS UNACCEPTABLE. WHEN A SONOTUBE IS USED AS THE FORM, 3/4" BLUESTONE OR CONCRETE SHALL BE USED TO BACKFILL THE SPACE BETWEEN THE SONOTUBE AND UNDISTURBED EARTH.
- COLD WEATHER PLACEMENT: PROTECT CONCRETE WORK FROM PHYSICAL DAMAGE OR REDUCED STRENGTH THAT COULD BE CAUSED BY FROST, FREEZING ACTIONS OR LOW TEMPERATURES. DO NOT POUR CONCRETE DURING OR WHEN FREEZING TEMPERATURES ARE ANTICIPATED WITHIN 3 DAYS OF POUR.
- REINFORCEMENT IS NOT REQUIRED FOR DIRECT BURIAL TYPE SIGN FOOTINGS FOR SIGNS OF 25 FEET OVERALL HEIGHT OR LESS, DIRECT BURIED STEEL SHALL EXTEND TO 6 INCHES FROM BOTTOM OF FOOTING.
- FOR ANCHOR BOLT/ BASE PLATE - SQUARE FOOTINGS, PROVIDE A MINIMUM OF #5 VERTICAL REBAR @ 12" O.C., 4" OFFSET FROM PERIMETER, TOP AND BOTTOM OF FOOTING. PROVIDE #3 HORIZONTAL TIES @ 12" O.C. Unless otherwise noted.
- FOR ANCHOR BOLT/ BASE PLATE - ROUND FOOTINGS, PROVIDE A MINIMUM OF SIX (6) VERTICAL #5 REBARS, EVENLY SPACED, 4" OFFSET FROM FOOTING PERIMETER & #3 HORIZONTAL TIES, 12" O.C. Unless otherwise noted.
- ANCHOR BOLTS SHALL BE TIED TO REBAR CAGE AT A MINIMUM OF TWO LOCATIONS PER ANCHOR BOLT
- FOOTING DESIGN ASSUMES FOOTING SHALL BE EXCAVATED AND POURED IN UNDISTURBED NATURAL EARTH, CAPABLE OF WITHSTANDING A MINIMUM 1,500 PSF VERTICAL DESIGN BEARING PRESSURE AND 150 PSF/FT OF DEPTH OF LATERAL BEARING PRESSURE BASED ON SOIL DATA OBTAINED FROM THE USGS SOIL SURVEY.

SCOPE OF WORK:

- LIMITS OF LIABILITY TO EXTEND ONLY TO THE QUANTITY INDICATED. ATTEMPTS IN PART OR IN WHOLE TO INSTALL GREATER QUANTITIES THAN THOSE SPECIFIED WITHOUT CONSULTING MURDOCH ENGINEERING SHALL VOID ALL PROFESSIONAL LIABILITY AND COVERAGE.

DESIGN SPECIFICATIONS			
IBC	2018	with	MO amendments
ASCE	7-16	Minimum Design Loads for Buildings & Other Structures	
ACI	318-14	Building Code Requirements for Structural Concrete	
ANSI/AISC	360-16	Specification for Structural Steel Buildings	
DESIGN LOADS			
Wind	V =	115	mph
Exposure	C		
Risk Cat.	II		
Grnd. Snow	Pg =	20	psf



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MO PE Lic. #2014038163

DWG TITLE:	
GENERAL NOTES	
SHEET:	SIZE:
<b>S.1</b>	<b>B</b>

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