

SHELTER DESIGN

STEEL
STEEL PLATE SHALL CONFORM TO THE REQUIREMENTS OF ASTM A36.

WELDING ELECTRODES SHALL BE E70XX.

ALUMINUM

ROOF DECK

FASTENERS

SHOP FABRICATION AND FIELD ASSEMBLY

SPECIAL INSPECTIONS

SEAL

B2508027

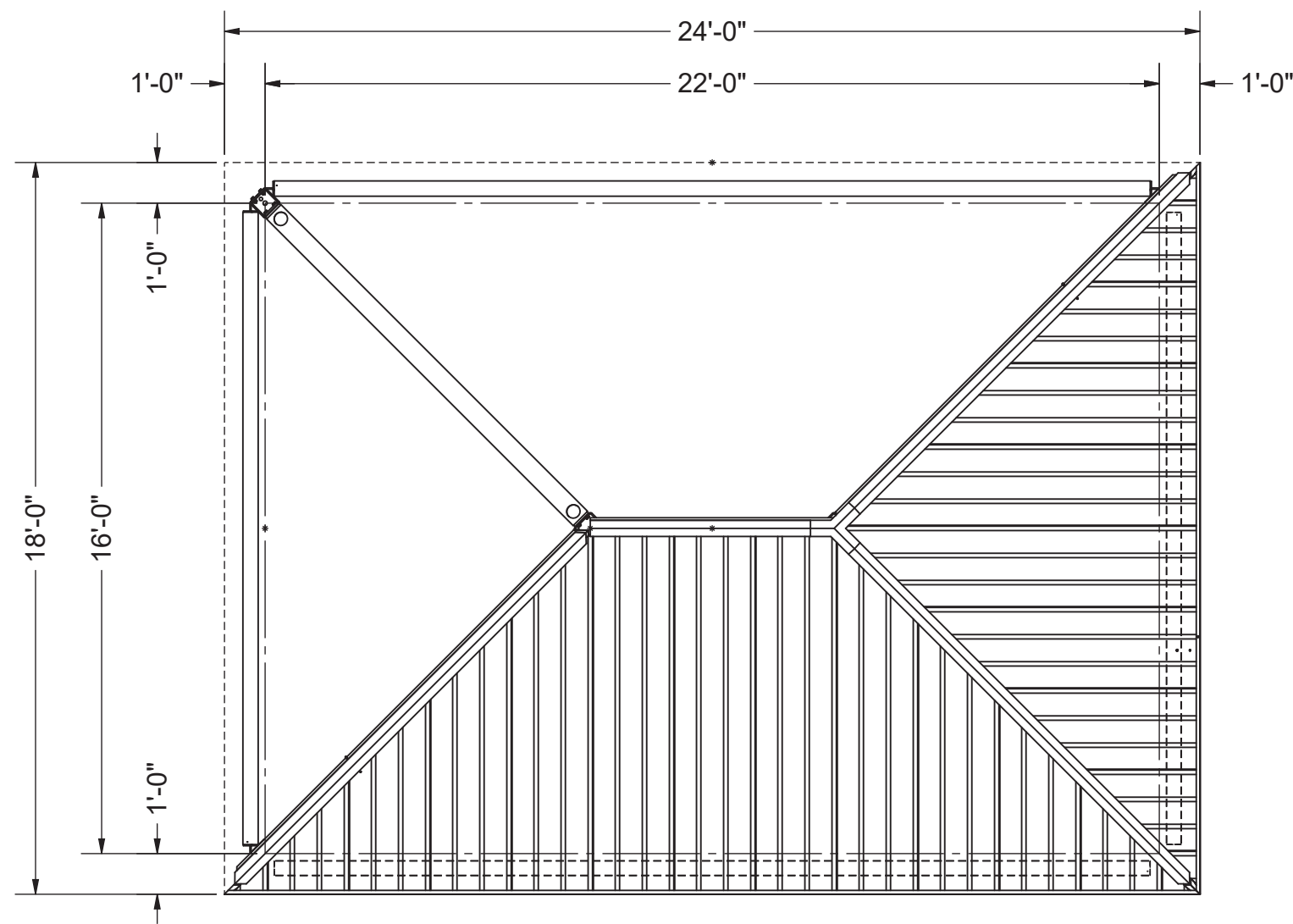
Dr. Jeffrey S. Gonzales, PhD, PE

NORTH CAROLINA
PROFESSIONAL
SEAL
34638
ENGINEER
ILDEFONSO GONZALEZ

8/7/2025

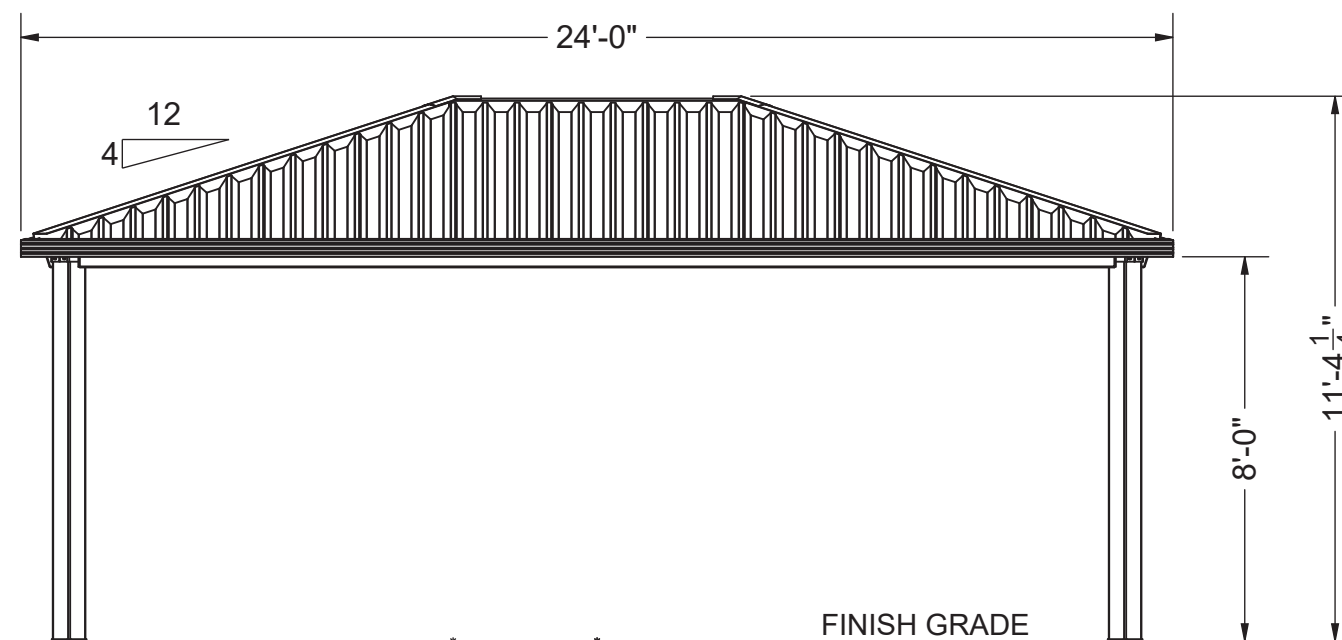
A line drawing of a square table. The top surface is decorated with a geometric pattern of parallel lines forming a grid of squares, with diagonal lines intersecting to create a star-like or woven appearance. The table has four thin, straight legs.

C1 COVER SHEET
S1 PLAN AND ELEVATIONS
S2 FOUNDATION DETAILS
S3 STRUCTURAL FRAMING
S4 FRAMING CONNECTION DETAILS
S5 ROOFING DETAILS
D1-D7 STEEL FABRICATION DETAILS



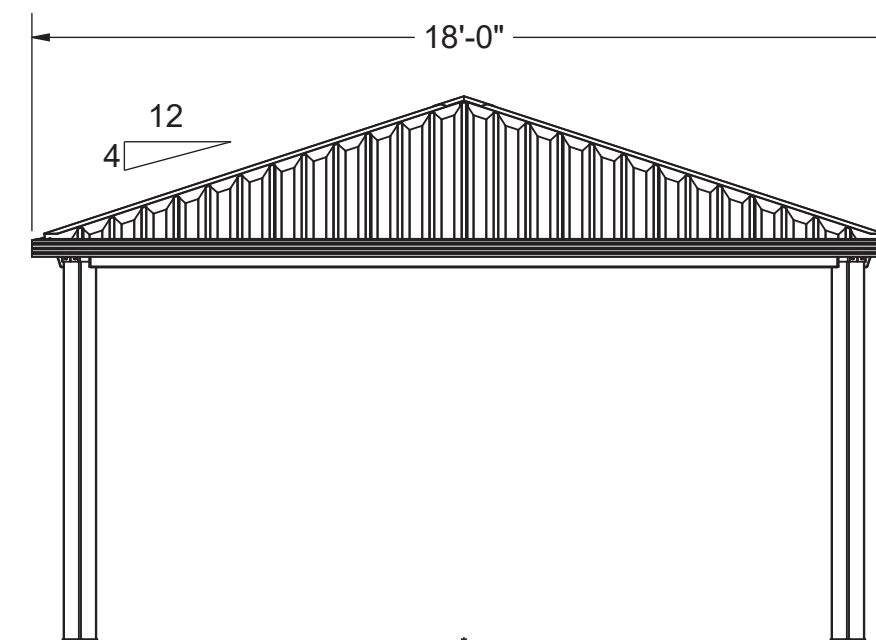
ROOF PLAN

Scale: 1/4" = 1'-0"



FRONT ELEVATION

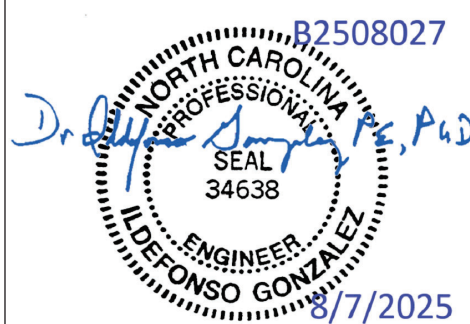
Scale: 1/4" = 1'-0"



SIDE ELEVATION

Scale: 1/4" = 1'-0"

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				JOB NO. 225498		REVISE DATE	
				P.O. NO. 4862	CHECKED BY AY		

NOTES

FOUNDATION

THE FOUNDATION SHALL REST ON SOUND SOIL THAT IS FREE OF ORGANIC AND DELETERIOUS MATERIALS AND CAPABLE OF SUPPORTING 1500 PSF VERTICAL BEARING PRESSURE AND 100 PSF/FT LATERAL BEARING PRESSURE.

FOUNDATION DESIGN SHOWN IS BASED ON THE MINIMUM PRESUMPTIVE SOIL STRENGTHS FROM THE SPECIFIED BUILDING CODE. OWNER SHALL VERIFY ACTUAL SOIL CONDITIONS AT EACH JOB SITE AND ANY REQUIRED ADJUSTMENTS TO THE FOUNDATION DESIGN SHALL BE DESIGNED BY OTHERS.

IF NECESSARY, EXTEND DEPTH OF FOOTING TO MEET LOCAL FROST DEPTH REQUIREMENTS AND ADD TIES TO MEET THE SPACING REQUIREMENT STATED ON THE DRAWING.

CONCRETE

COMPRESSION STRENGTH OF ALL REINFORCED CONCRETE SHALL NOT BE LESS THAN 3500 PSI AT 28 DAYS.

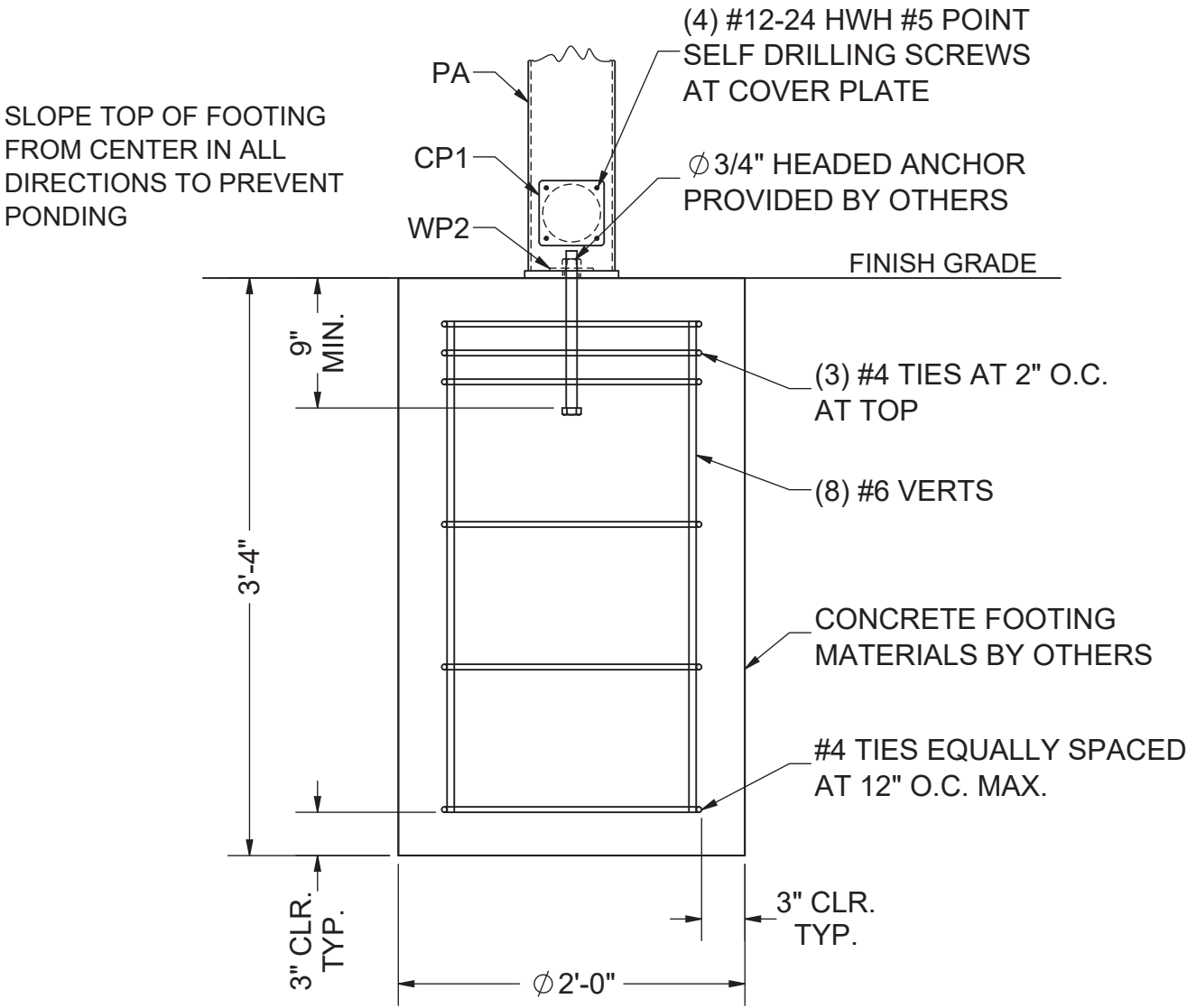
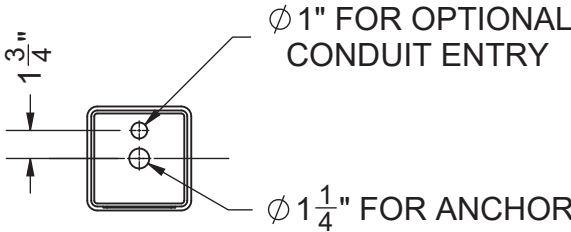
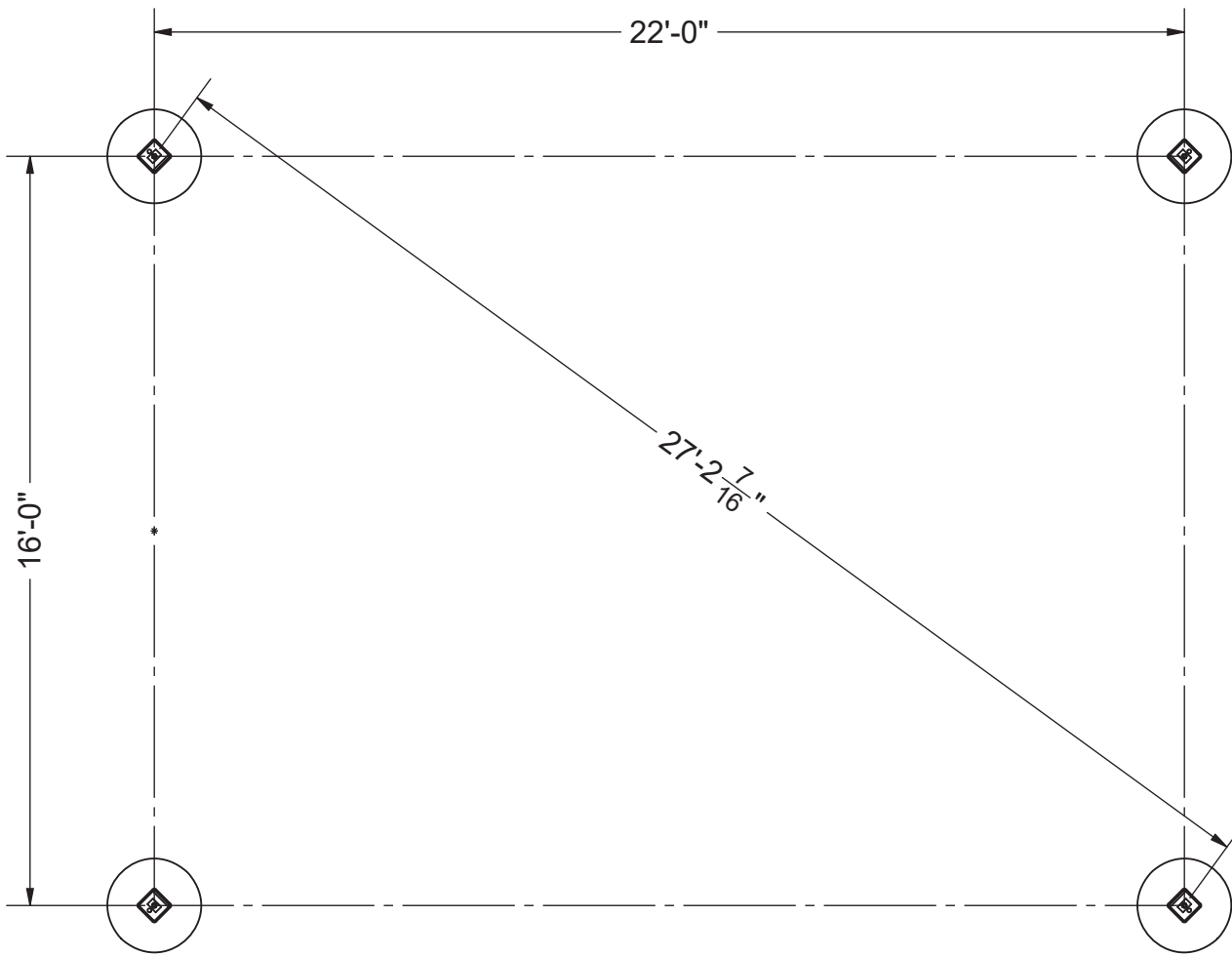
REINFORCING BARS SHALL BE DEFORMED BARS CONFORMING TO THE REQUIREMENTS OF MINIMUM ASTM A615 GRADE 40 FOR #4 AND SMALLER BARS AND GRADE 60 FOR BARS LARGER THAN #4.

MINIMUM CONCRETE COVER FOR REINFORCING BARS SHALL BE 3" UNLESS NOTED OTHERWISE.

ANCHOR RODS SHALL BE ASTM F1554 GRADE 36 MINIMUM, GALVANIZED ROD, HEADED OR WITH HEAVY HEX NUT TACKED TO ROD.

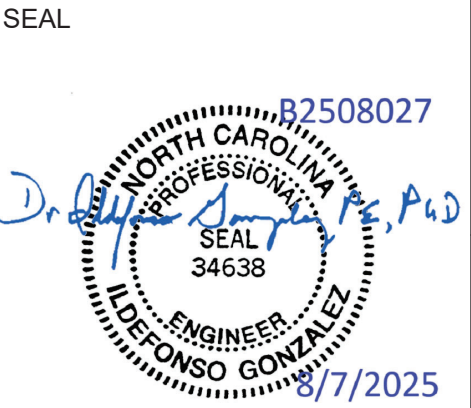
FOUNDATION REACTIONS (ASD MAX.)

AXIAL: 3.416 KIP
UPLIFT: 0.250 KIP
LATERAL: 0.223 KIP
MOMENT: N/A



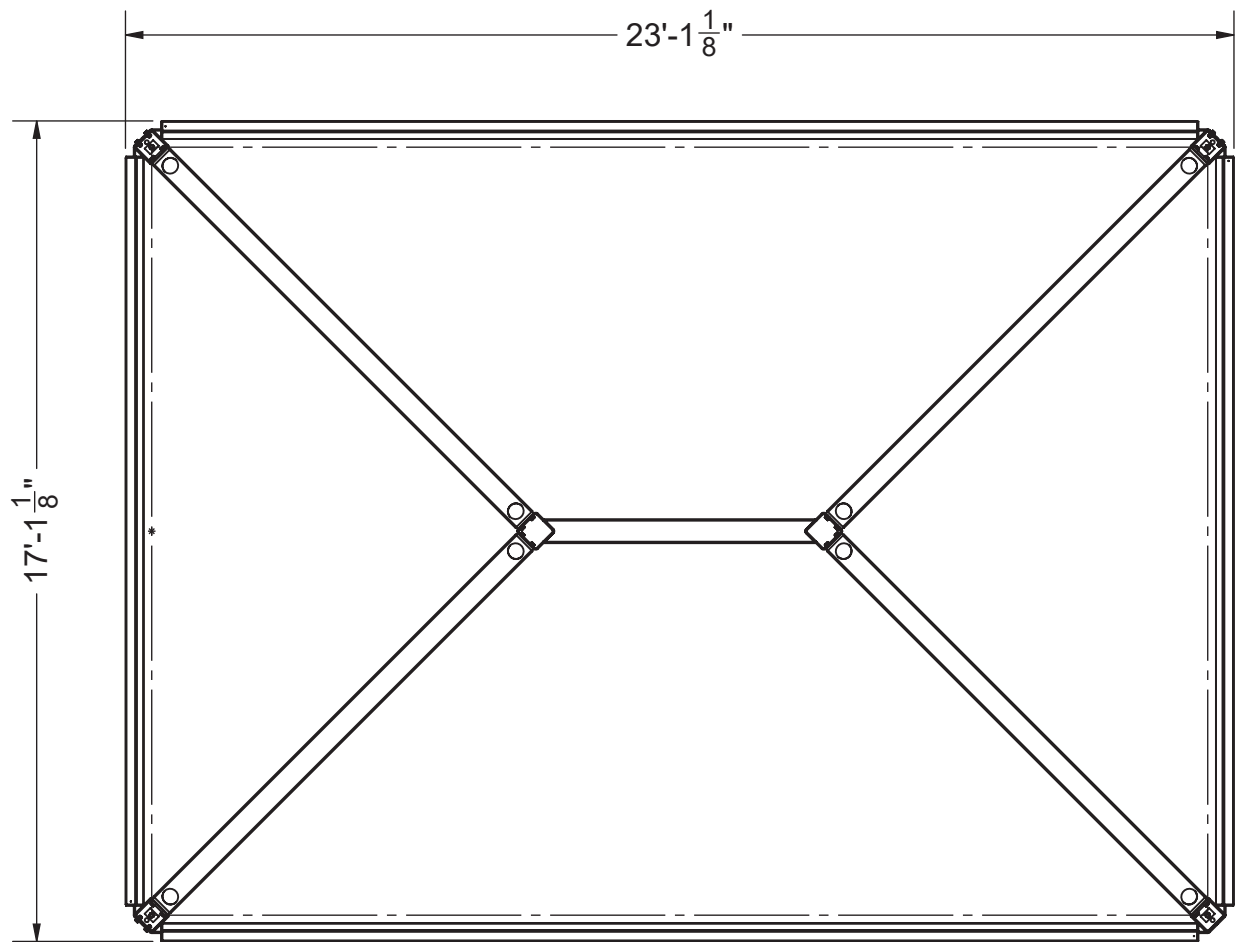
FOUNDATION SECTION

Scale: 1" = 1'-0"



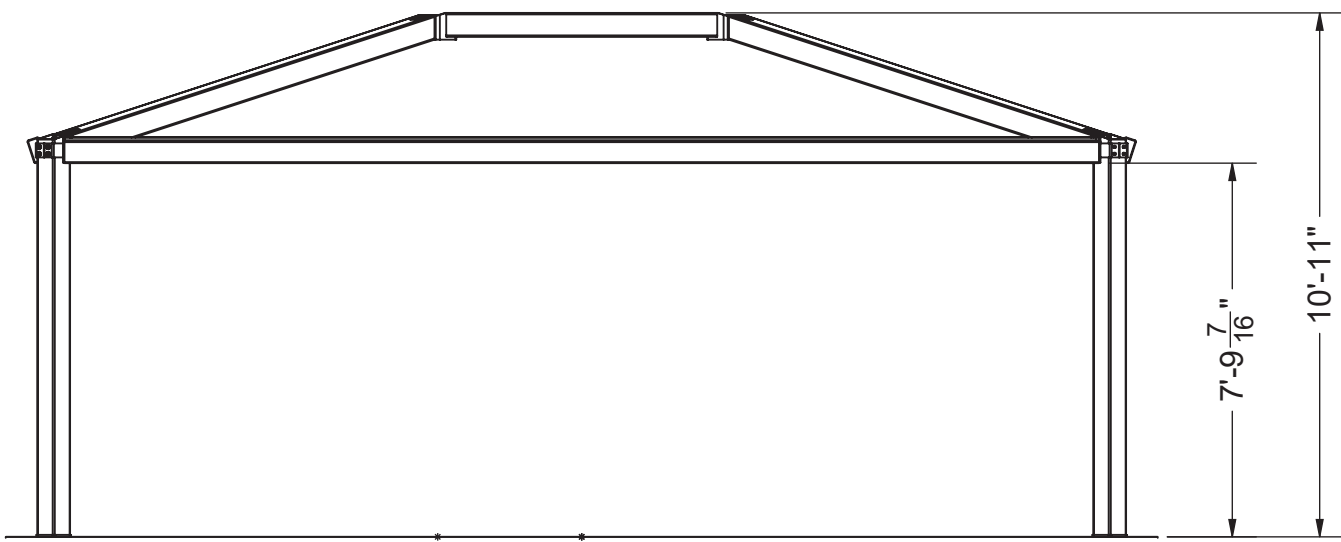
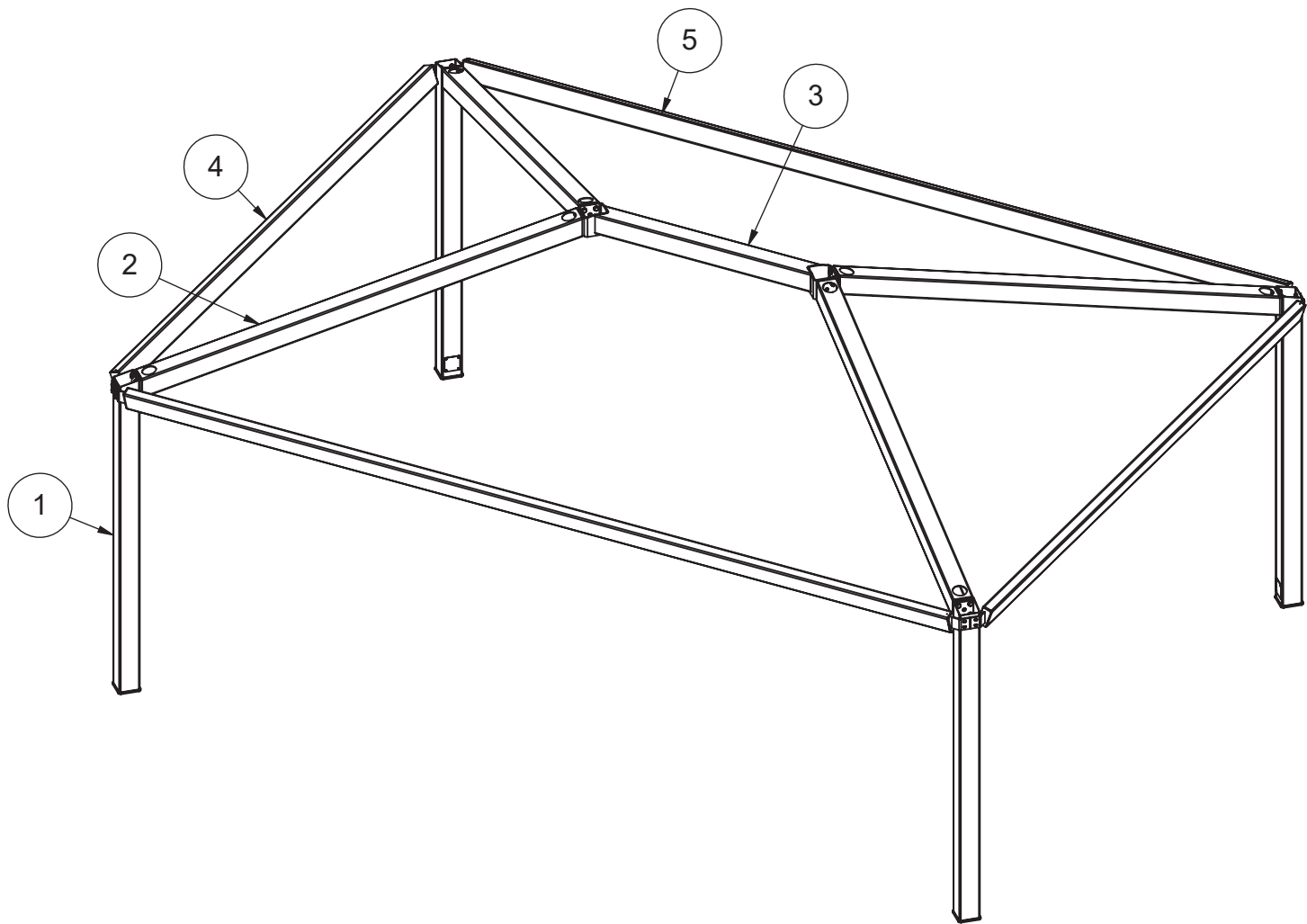
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ITEM NO.	QTY.	PART NO.	DESCRIPTION	MATERIAL	EST. WEIGHT (LBS)
1	4	PA	POST	HSS 6x6x3/16"	127.71
2	4	RA	RAFTER	HSS 6x6x3/16"	166.15
3	1	TA	RIDGE BEAM	HSS 6x6x3/16"	111.73
4	2	EA	EDGE BEAM	HSS 6x3x3/16"	171.12
5	2	EB	EDGE BEAM	HSS 6x3x3/16"	234.50



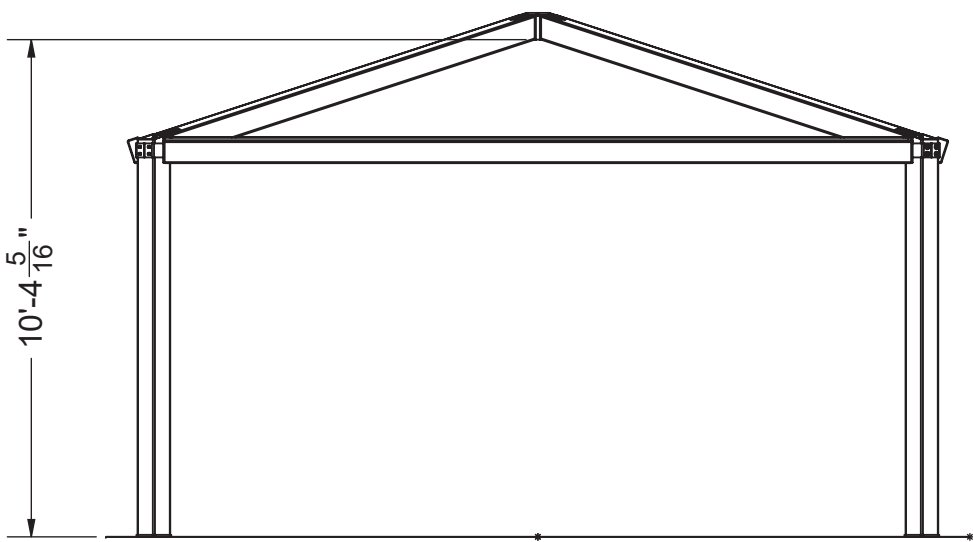
FRAME PLAN

Scale: 1/4" = 1'-0"



FRAME ELEVATION

Scale: 1/4" = 1'-0"



FRAME ELEVATION

Scale: 1/4" = 1'-0"

SEAL



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PROJECT / LOCATION

753 OLIVE BRANCH ROAD
FUQUAY-VARINA, NC 27526

MODEL

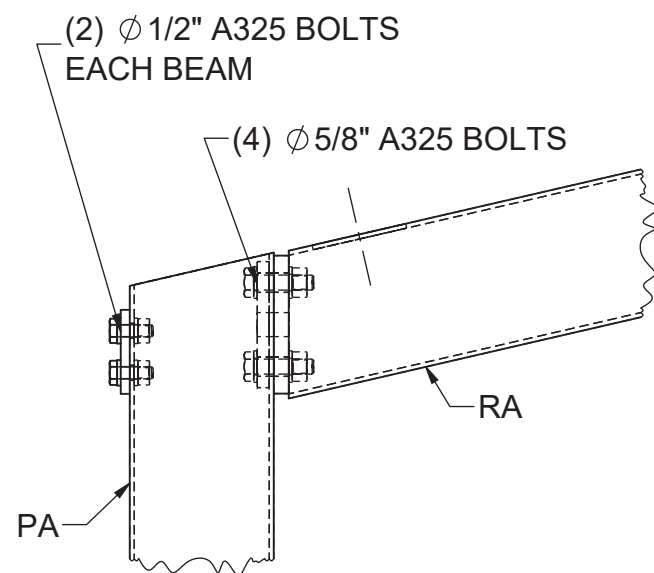
18' x 24'
NAVAJO SHELTER

DWG. NO. 225498
JOB NO. 225498
P.O. NO. 4862

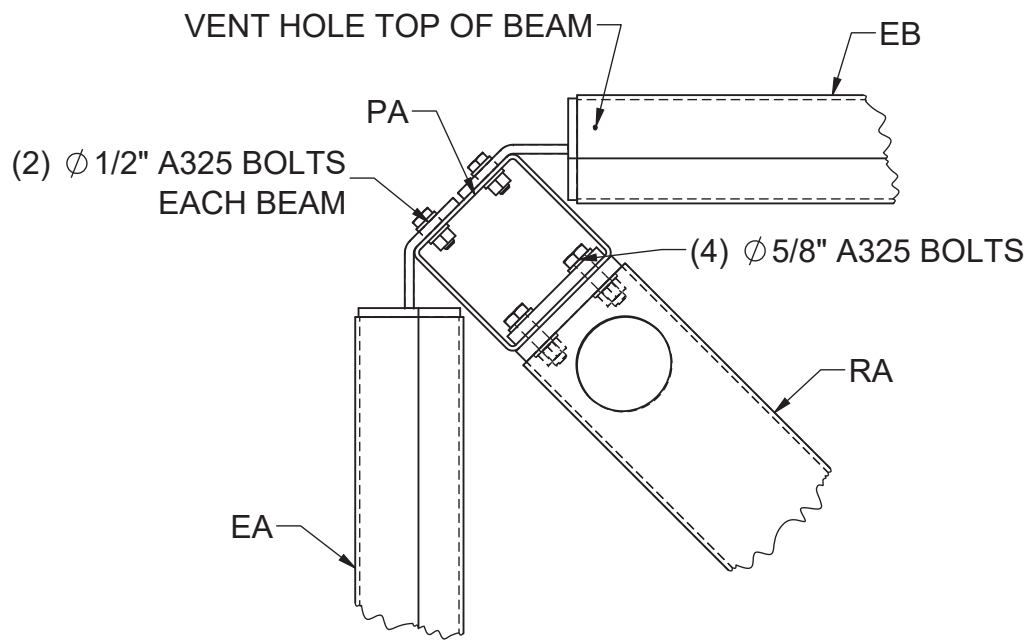
DRAWN BY TG
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DRAWN DATE 7/25/2025
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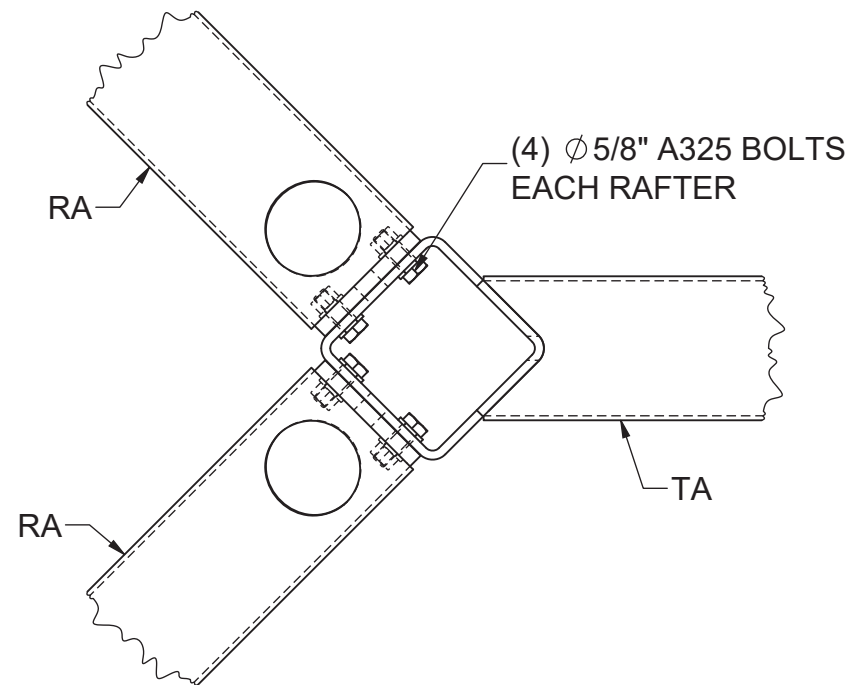
SHEET
S3
OF 13 SHEETS



POST TO RAFTER CONNECTION
Scale: 1-1/2" = 1'-0"



EDGE BEAM TO POST CONNECTION
Scale: 1-1/2" = 1'-0"



RAFTER TO TIE BLOCK CONNECTION
Scale: 1-1/2" = 1'-0"

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82508027

Dr. Alfonso Gonzalez, P.E., P.A.D.

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8/7/2025

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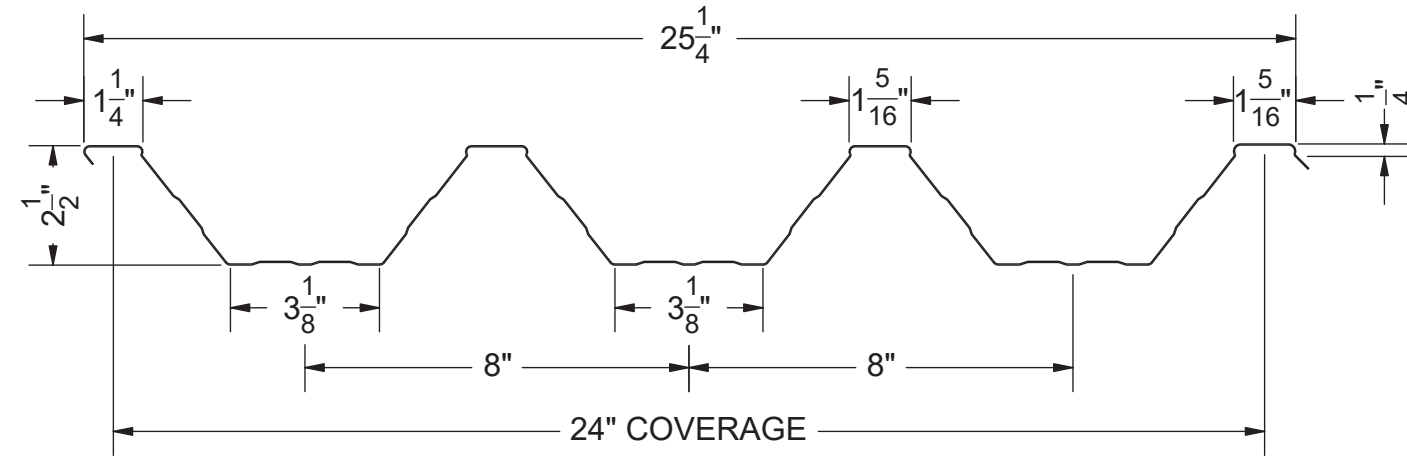
18' x 24'
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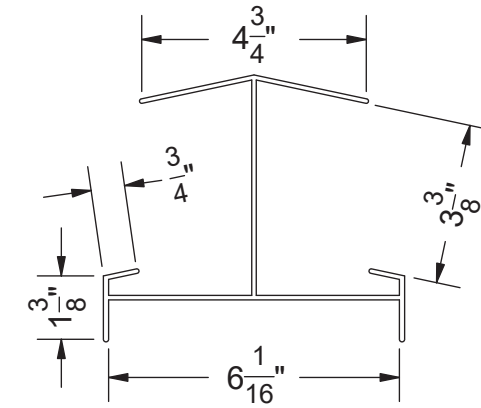
SHEET
S4
OF 13 SHEETS



ALUMINUM ALLOY 3004-H36
THICKNESS= .038"

ROOF DECK PROFILE

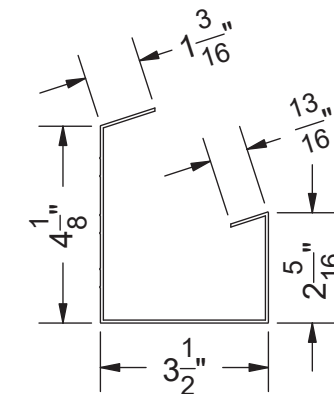
Scale: 3" = 1'-0"



ALUMINUM ALLOY 6105-T5
THICKNESS= .094"

RIDGE CAP PROFILE

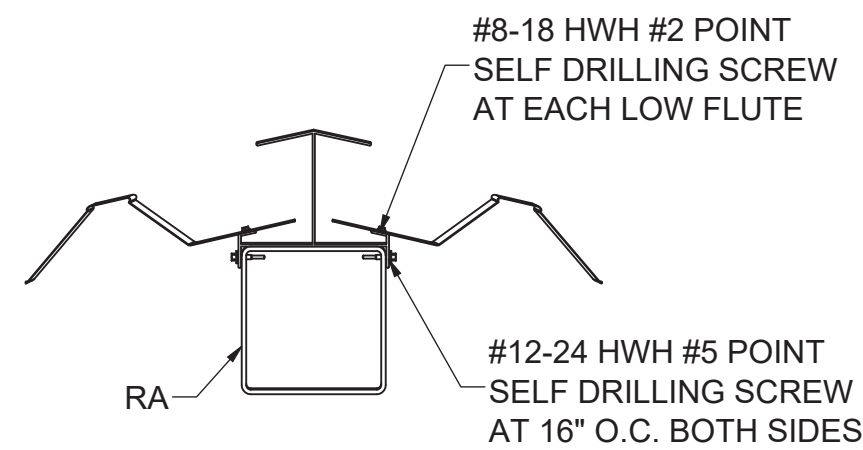
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ALUMINUM ALLOY 6105-T5
THICKNESS= .062"

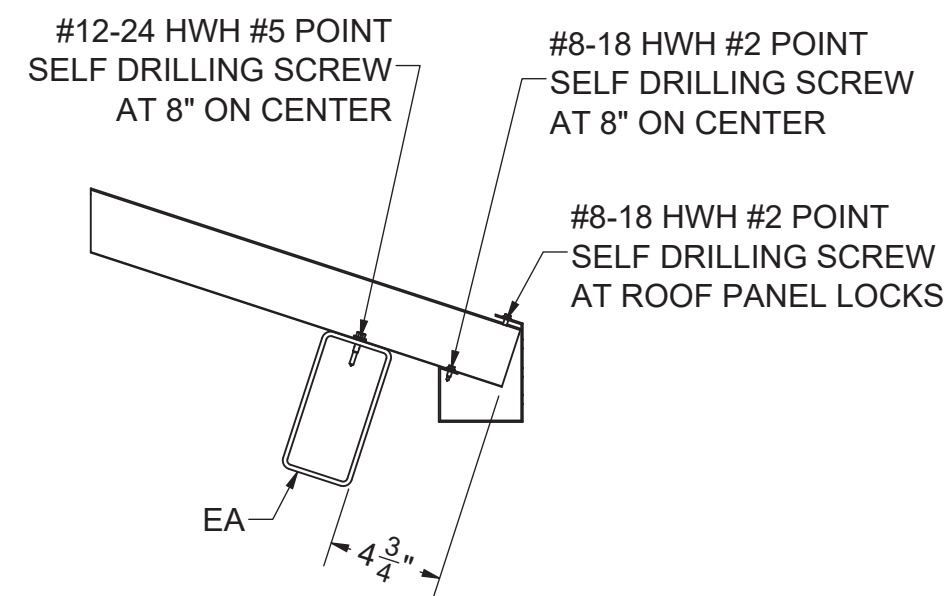
GUTTER PROFILE

Scale: 3" = 1'-0"



ROOF DECK TO RAFTER CONNECTION

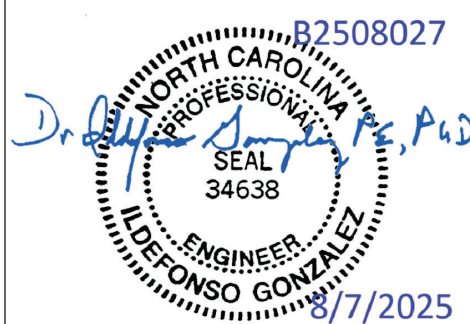
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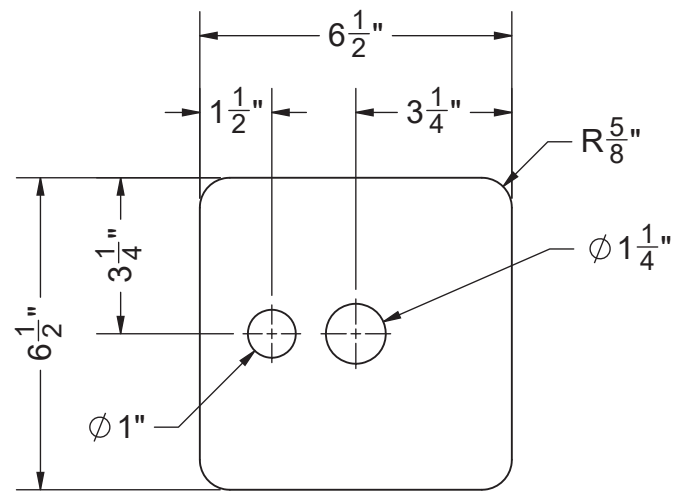
ROOF DECK TO BEAM CONNECTION

Scale: 1-1/2" = 1'-0"

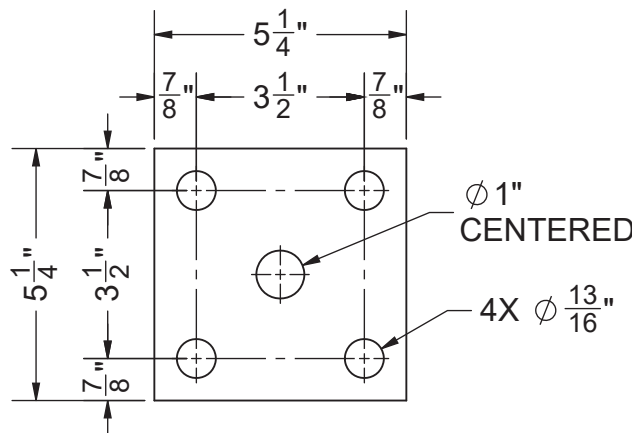
SEAL



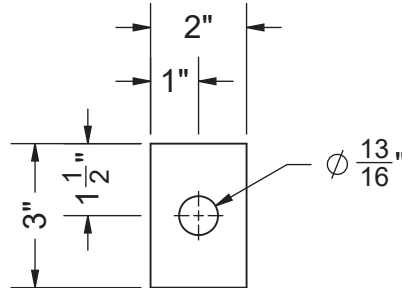
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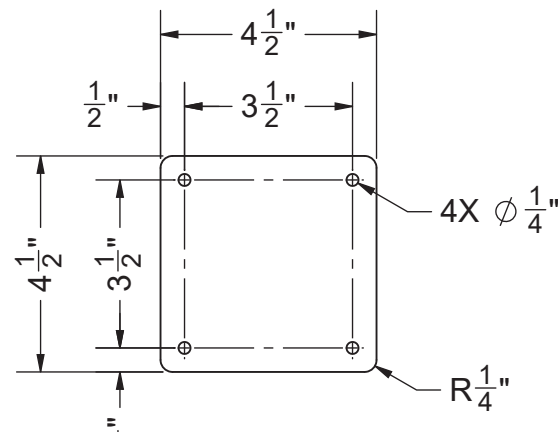
1/2" PLATE
(4) BASE PLATE - BP7



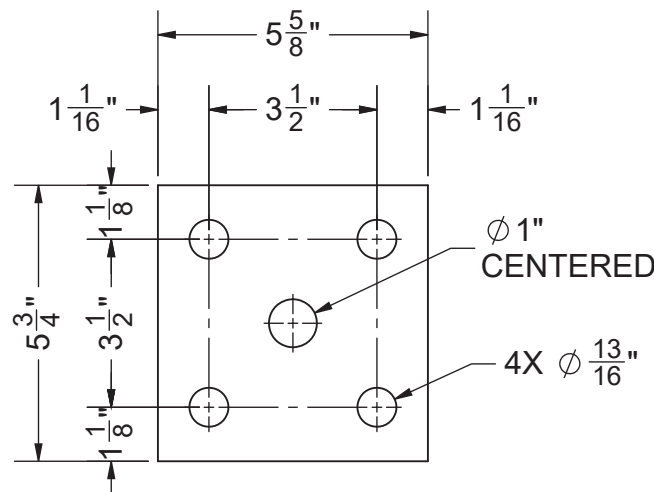
1/2" PLATE
(4) BACKING PLATE - PL7



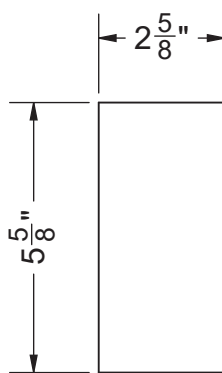
3/16" PLATE
(4) WASHER - WP2



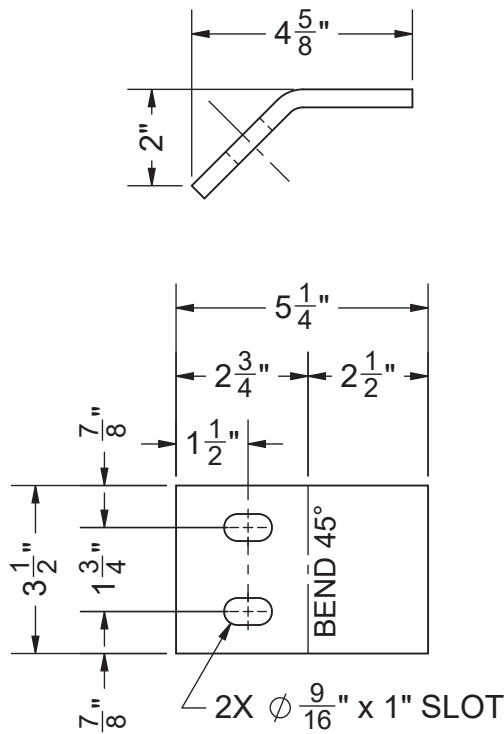
14 GA. PLATE
(4) COVER PLATE - CP1



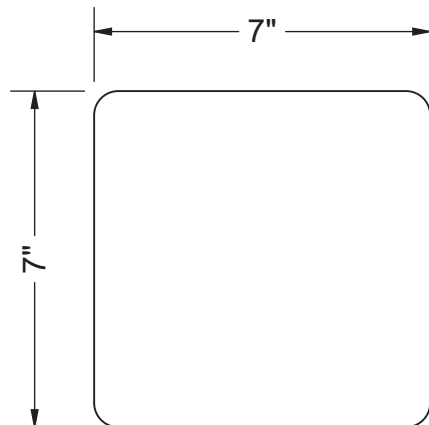
5/8" PLATE
(8) RAFTER PLATE - RP3



3/8" PLATE
(8) BEAM CAP - Ea

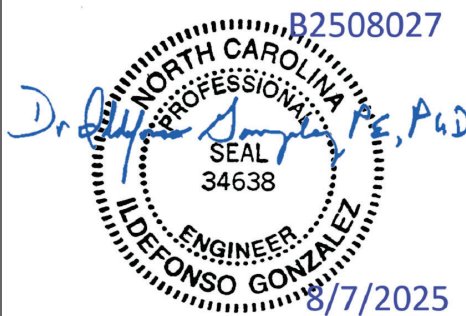


3/8" PLATE
(8) BEAM MOUNT - Eb



18 GA. PLATE
(2) TIE BLOCK CAP - 60063

SEAL



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PROJECT / LOCATION

753 OLIVE BRANCH ROAD
FUQUAY-VARINA, NC 27526

MODEL

18' x 24'
NAVAJO SHELTER

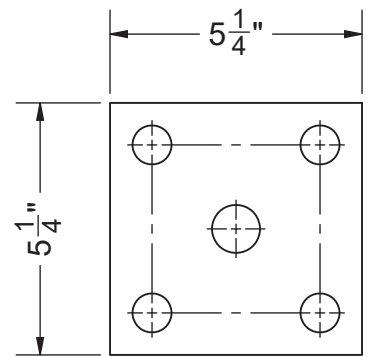
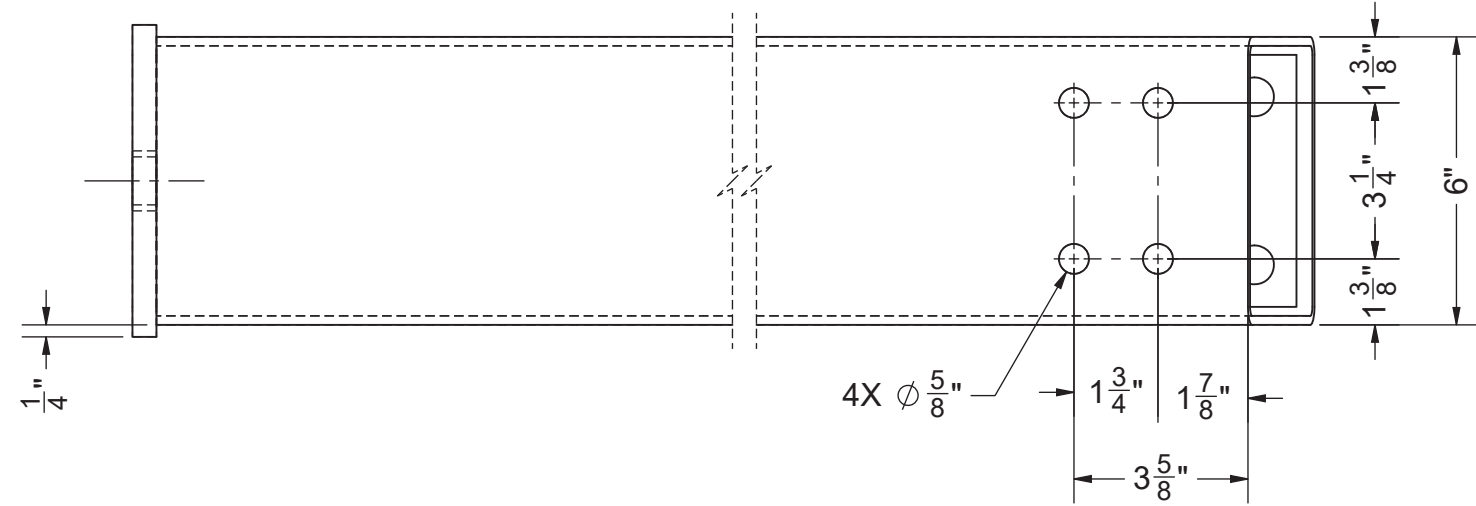
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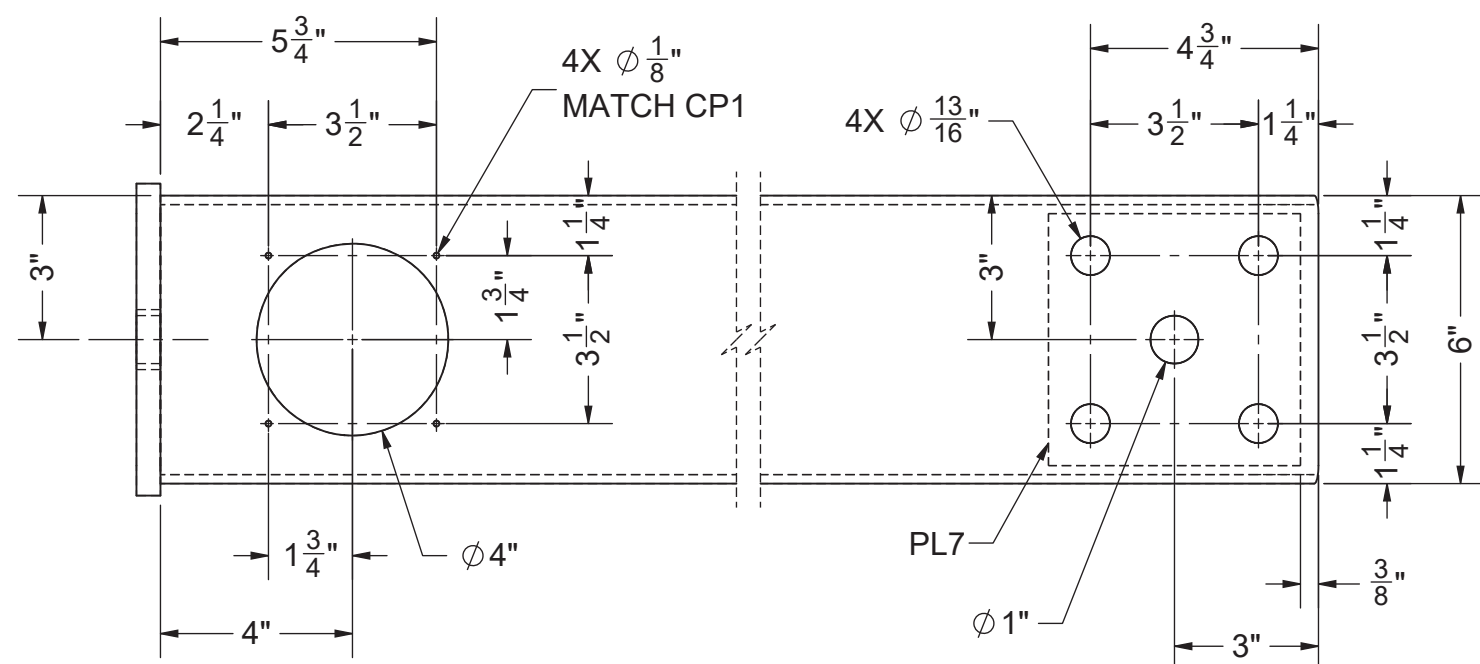
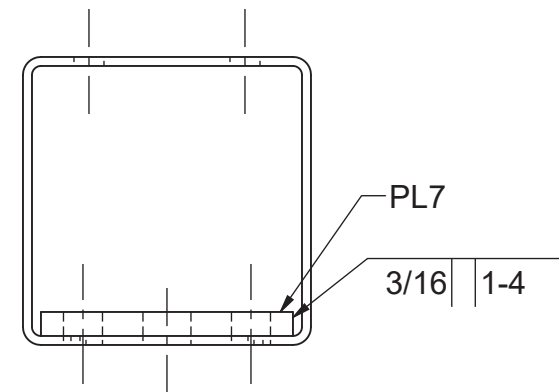
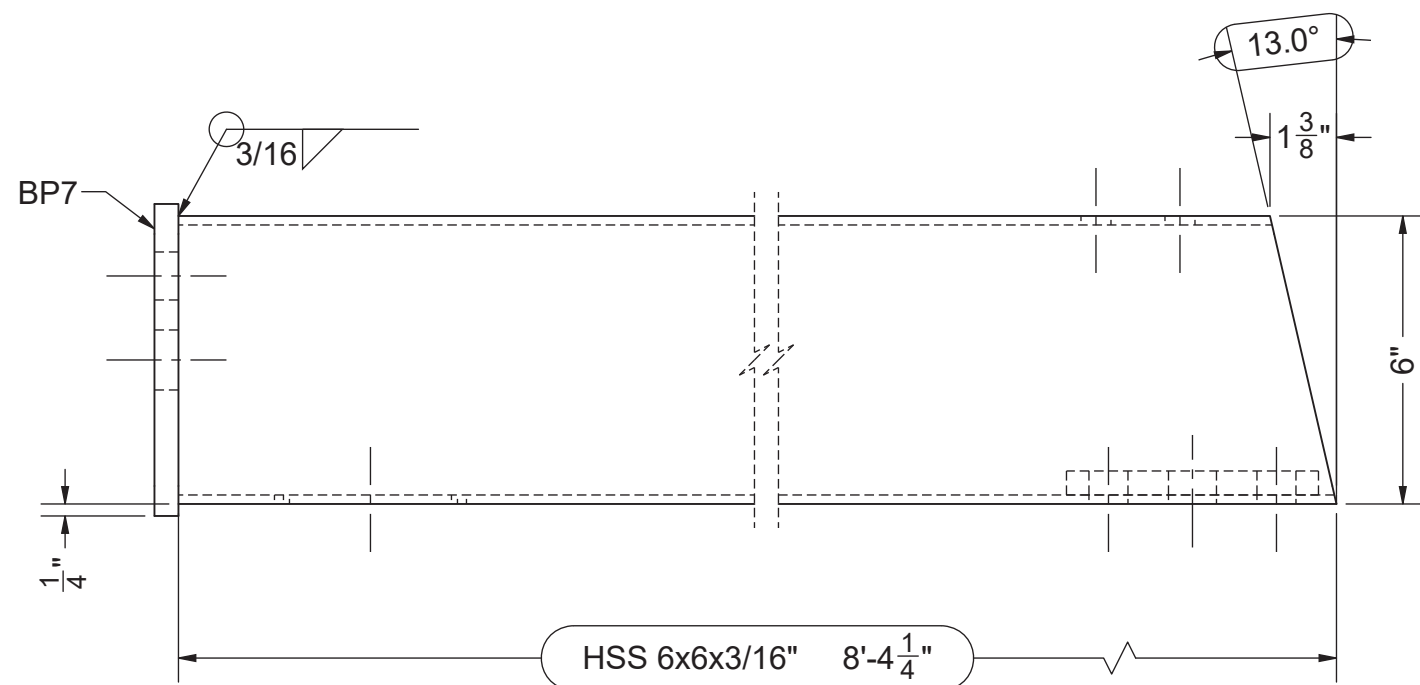
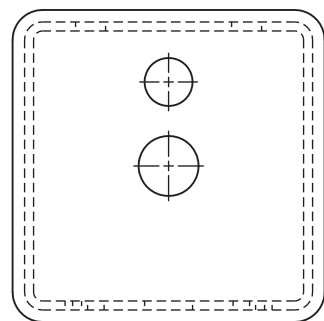
SHEET

D1
OF 13 SHEETS

PART QTY SHOWN IS FOR (1) SHELTER

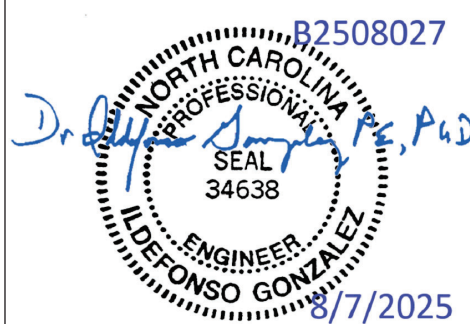


1/2" PLATE - PL7



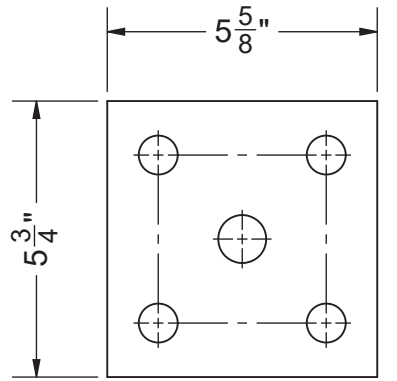
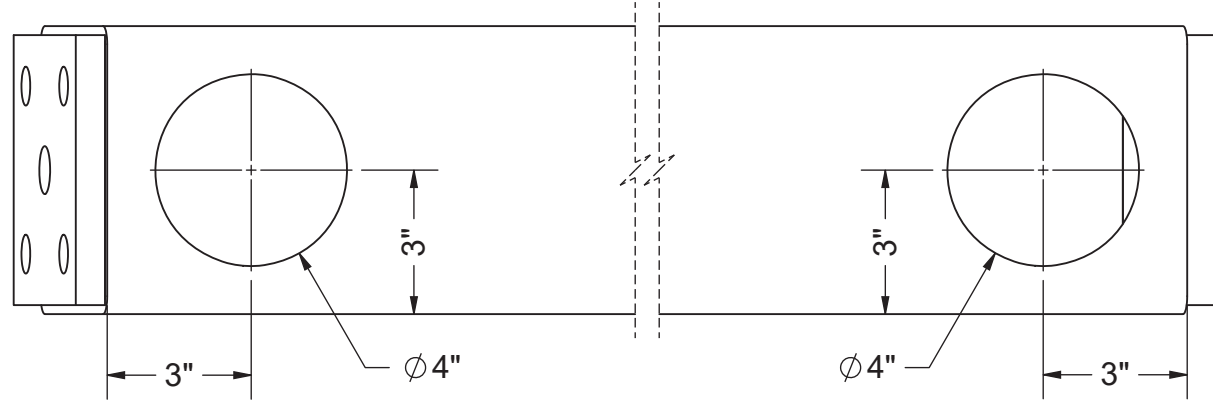
(4) POST - PA

SEAL

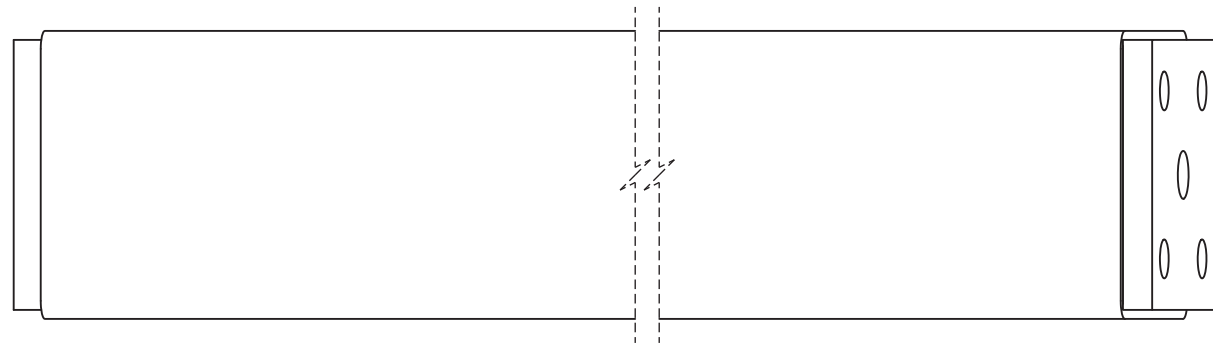
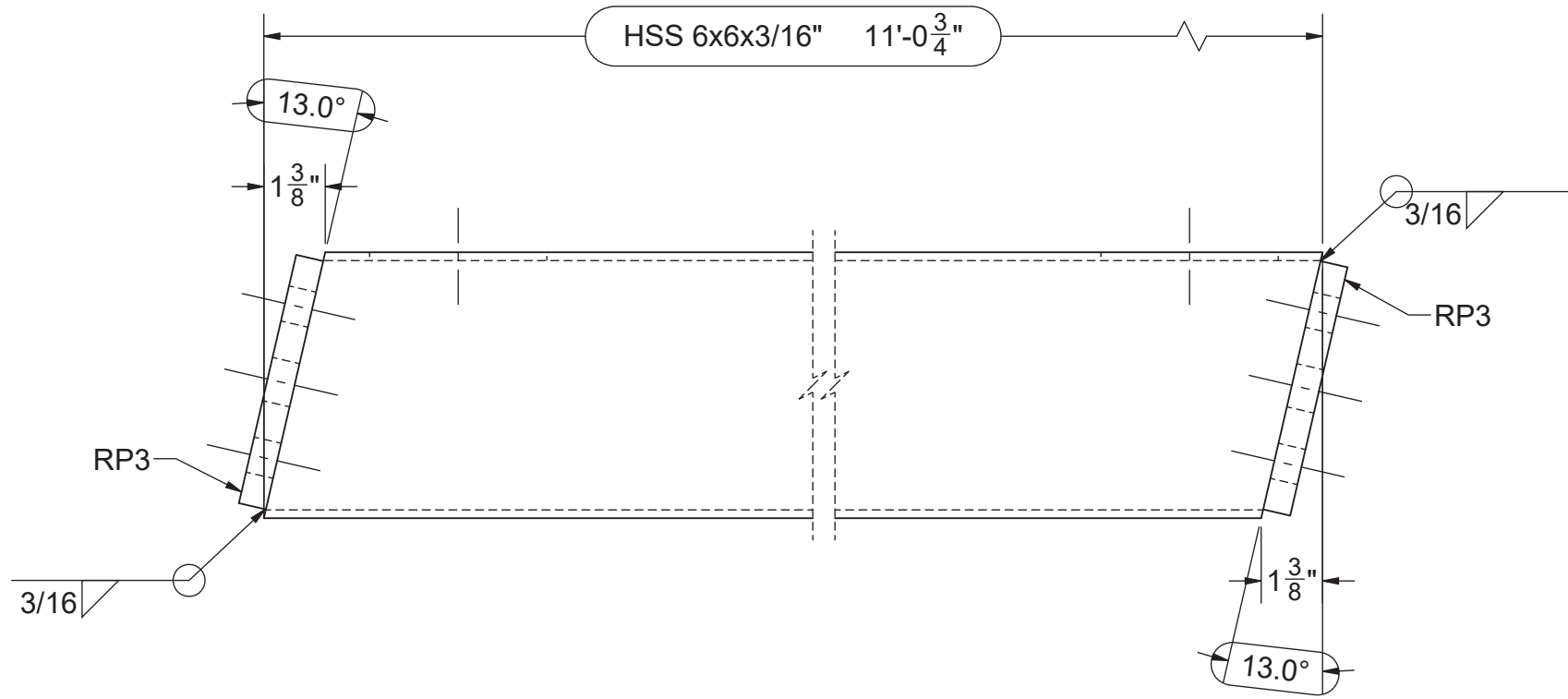


PART QTY SHOWN IS FOR (1) SHELTER

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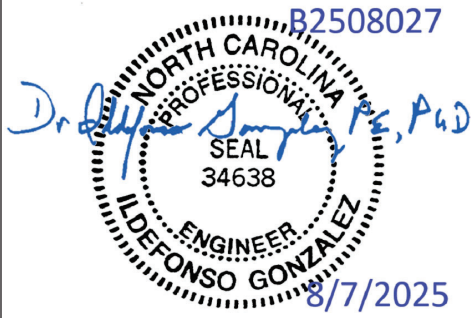


5/8" PLATE - RP3



(4) RAFTER - RA

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PROJECT / LOCATION

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FUQUAY-VARINA, NC 27526

MODEL

18' x 24'
NAVAJO SHELTER

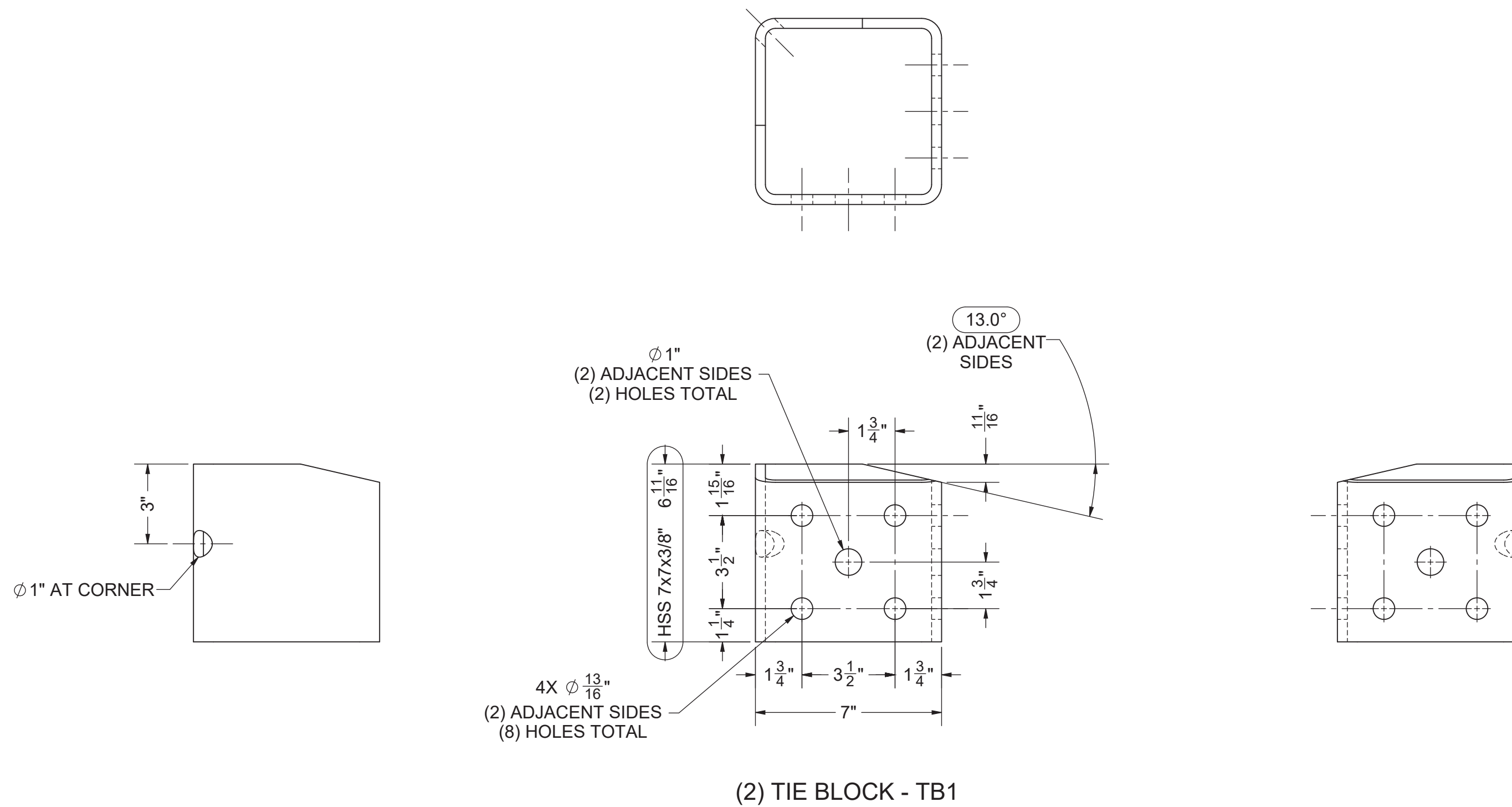
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SHEET
D3
OF 13 SHEETS

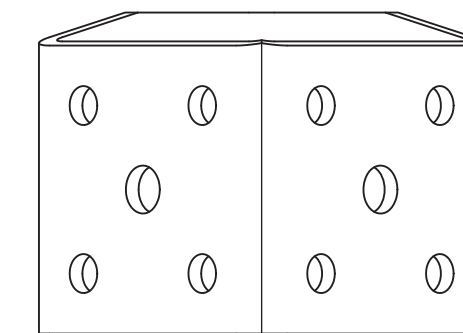
PART QTY SHOWN IS FOR (1) SHELTER



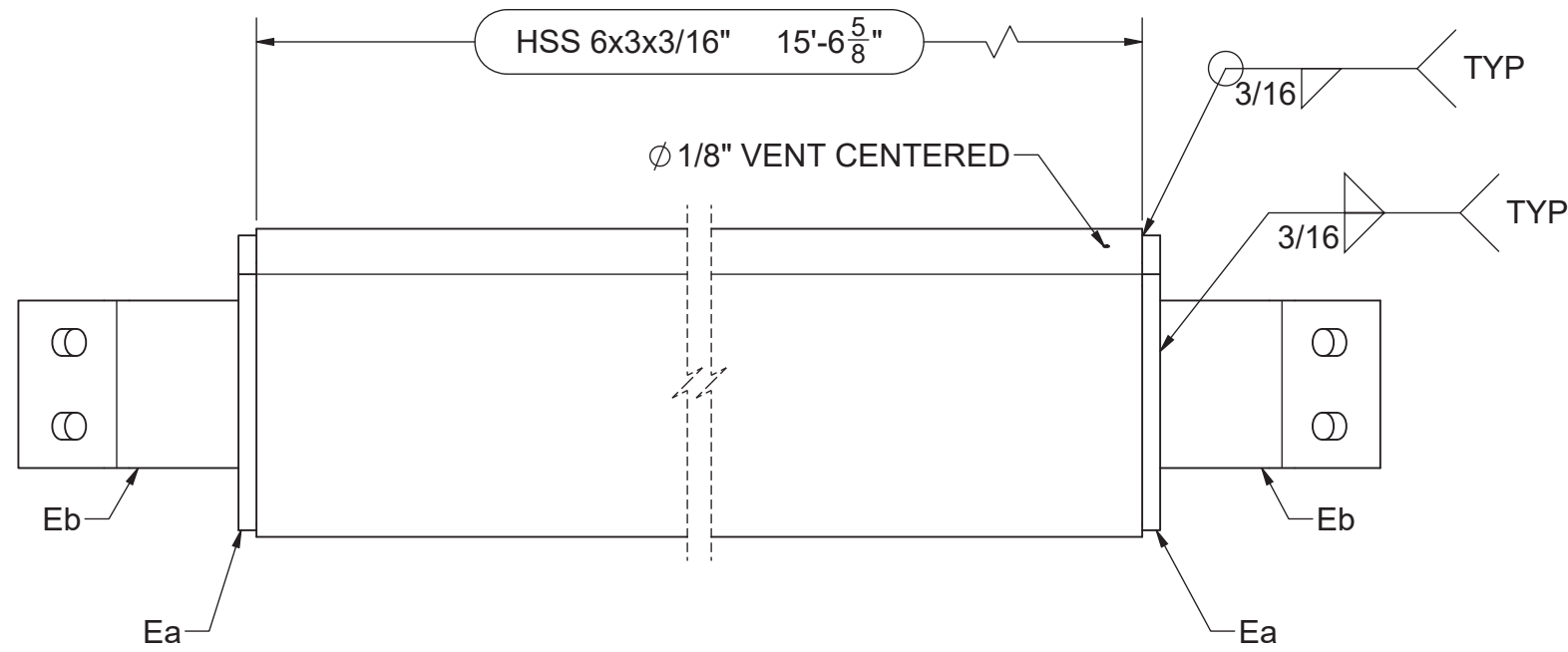
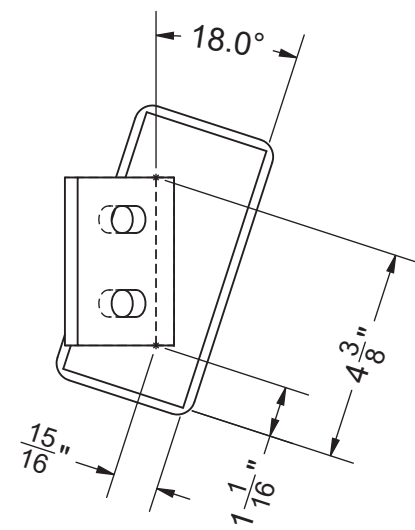
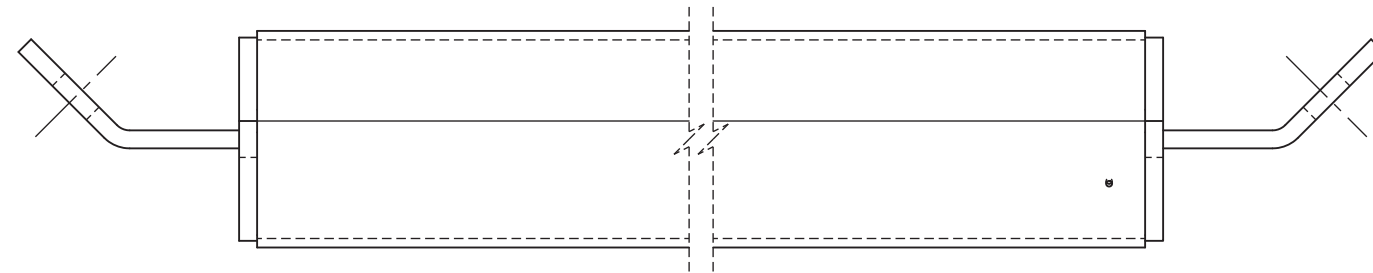
SEAL

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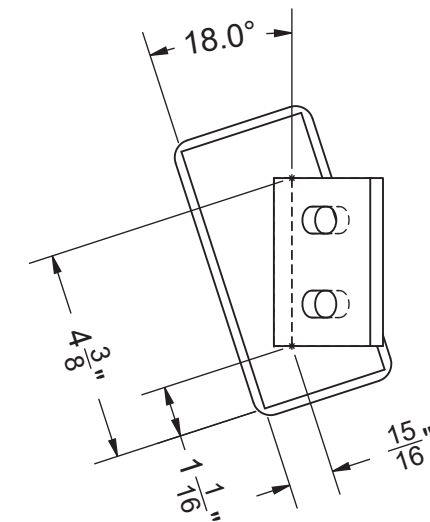
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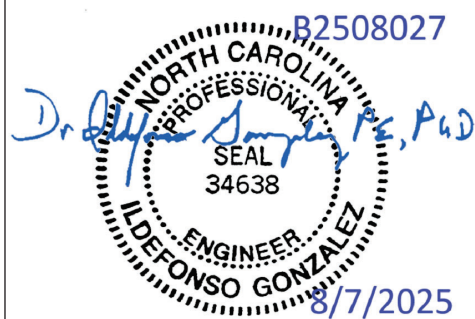
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				P.O. NO.	4862	AY		



(2) EDGE BEAM - EA



SEAL



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PHONE: (800) 851-0865
WEB: www.americana.com

PROJECT / LOCATION

753 OLIVE BRANCH ROAD
FUQUAY-VARINA, NC 27526

MODEL

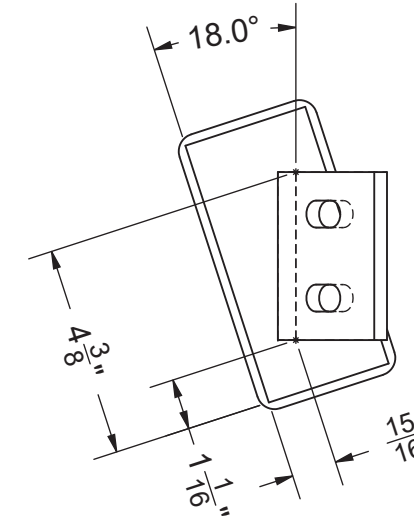
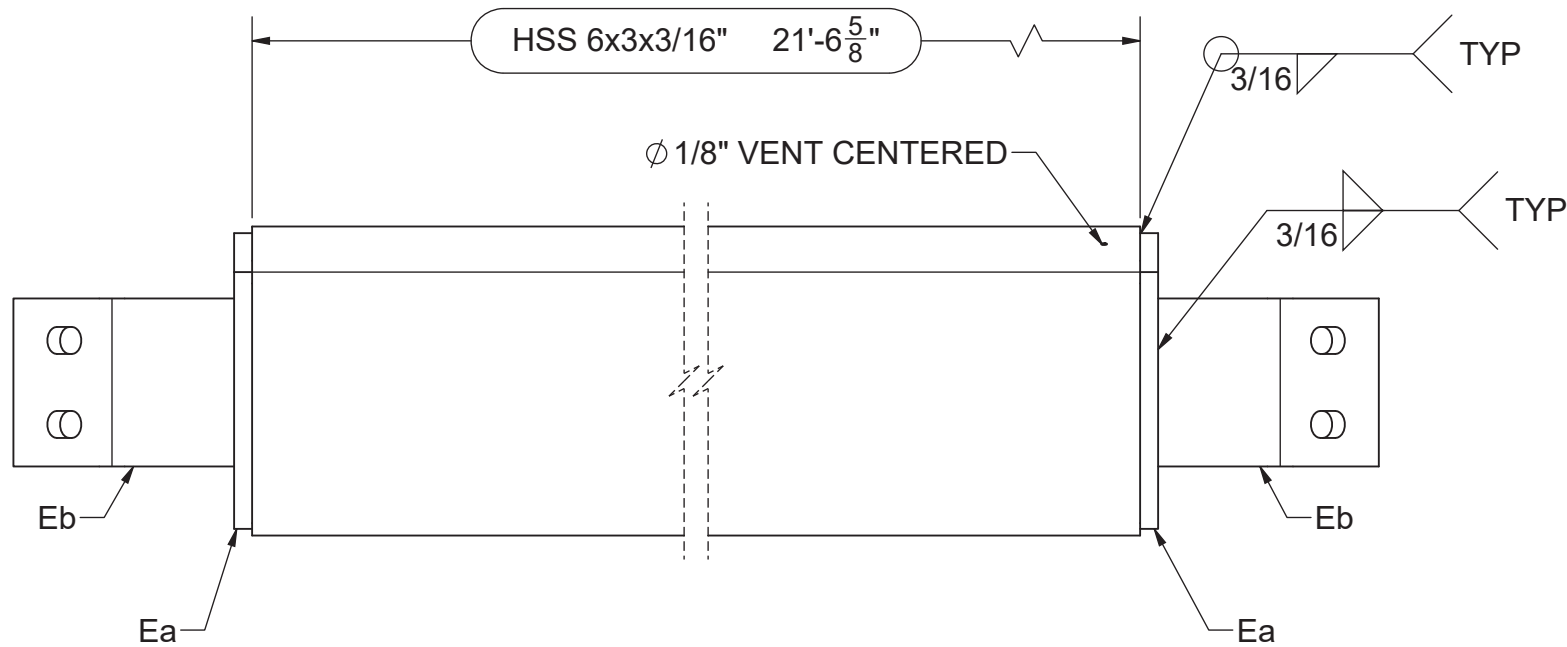
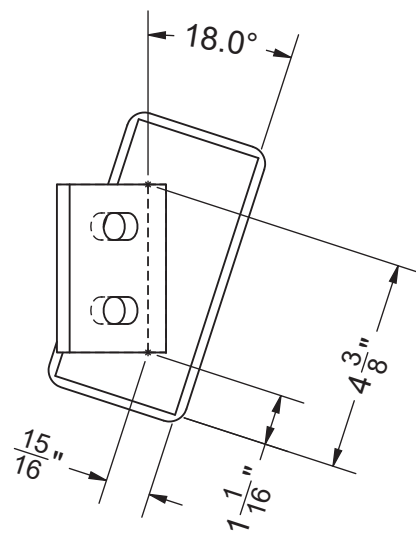
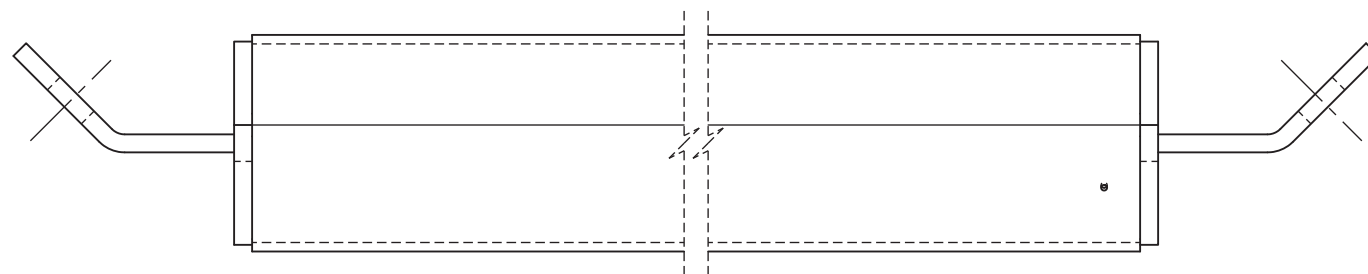
18' x 24'
NAVAJO SHELTER

DWG. NO. 225498
JOB NO. 225498
P.O. NO. 4862

DRAWN BY TG
CHECKED BY AY
DRAWN DATE 7/25/2025
REVISE DATE

SHEET
D6
OF 13 SHEETS

PART QTY SHOWN IS FOR (1) SHELTER



(2) EDGE BEAM - EB

SEAL



ENGINEER
DOTec ENGINEERING
ADDRESS: 424 JEFFERSON STREET
ST CHARLES, MO 63301
PHONE: (636) 724-9872
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MANUFACTURER
AMERICANA OUTDOORS
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SALEM, IL 62881
PHONE: (800) 851-0865
WEB: www.americana.com

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SHEET
D7
OF 13 SHEETS

PART QTY SHOWN IS FOR (1) SHELTER