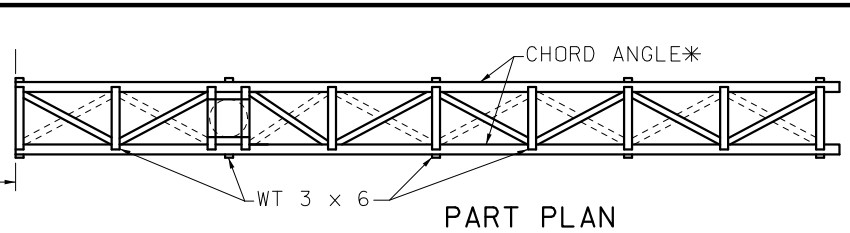
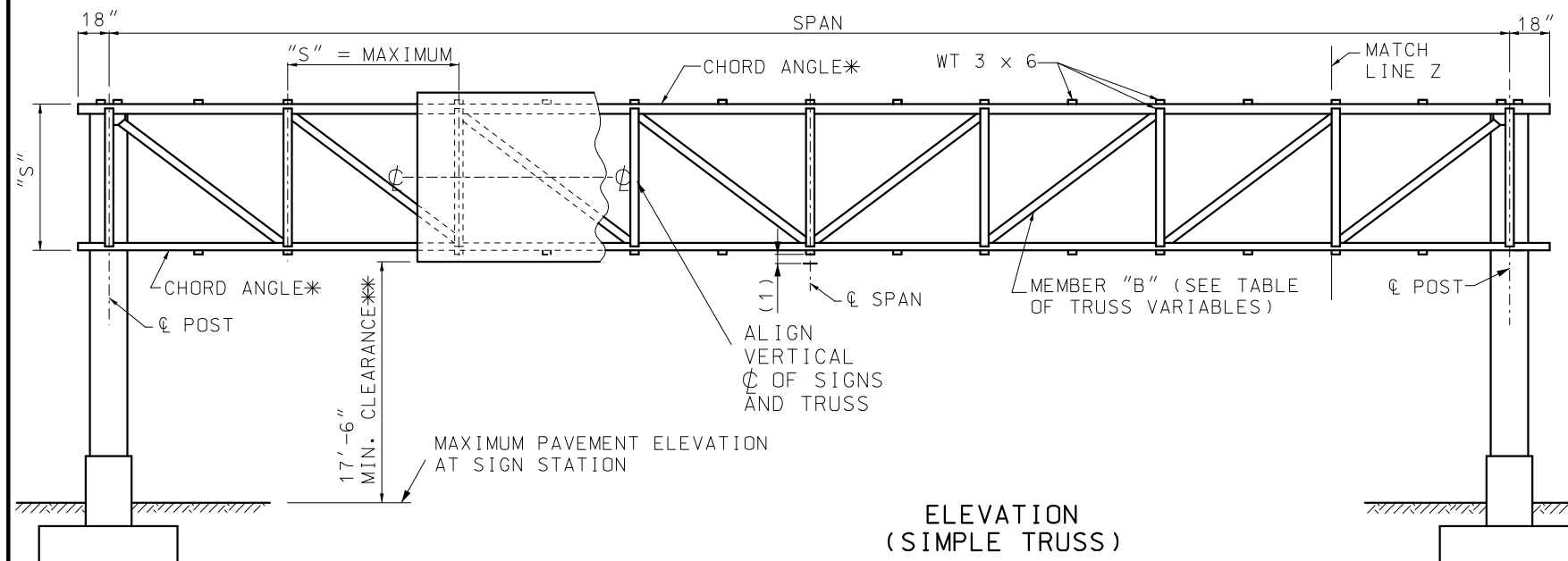


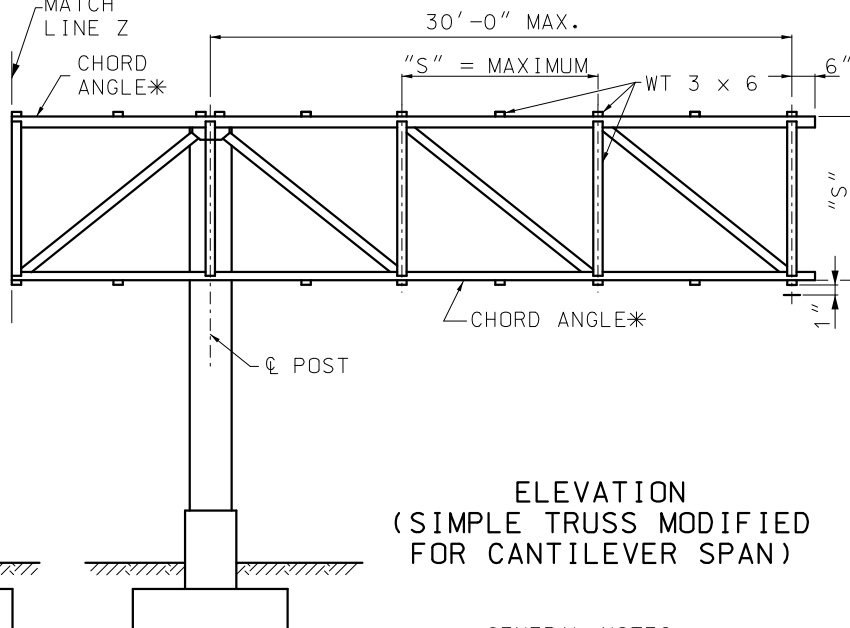
PART PLAN



PART PLAN



ELEVATION (SIMPLE TRUSS)



ELEVATION (SIMPLE TRUSS MODIFIED FOR CANTILEVER SPAN)

NOTES:

SHOP SPLICES ON CHORD ANGLES WILL BE ALLOWED ONLY BY SPECIAL PERMISSION. IF PERMISSION IS GRANTED, SUCH SPLICES MUST BE LOCATED AT THE CENTERLINE OF MAIN PANEL POINTS.

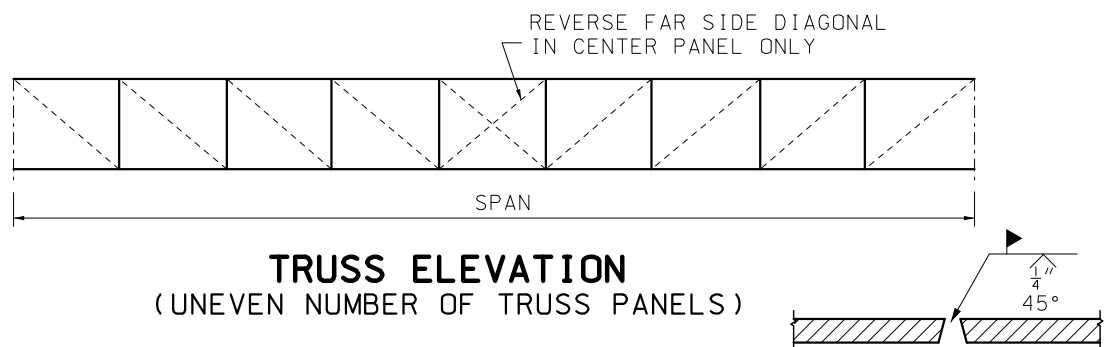
"D" = GREATEST OVERALL DEPTH OF ANY SIGN OR SIGNS ON TRUSS AND
 "S" = TRUSS DEPTH, AND
 "W" = TRUSS WIDTH.

3/4" DIA. BOLTS SHALL BE REMOVED AFTER WELDING IS COMPLETE. BOLT HOLES SHALL BE PLUGGED AND THE OUTSIDE FACE GROUND SMOOTH.

* SEE GENERAL NOTES THIS SHEET FOR CHARPY V-NOTCH REQUIREMENTS.

** IF LIGHTING IS SPECIFIED, VERTICAL CLEARANCE IS MEASURED TO LOWEST POINT OF LIGHTING BRACKET.

(1) FOR PARABOLIC CAMBER SEE TABLE OF TRUSS VARIABLES



TRUSS ELEVATION (UNEVEN NUMBER OF TRUSS PANELS)

| TRUSS VARIABLES | | | | | |
|-----------------|-------|-------|---------------------------|---------------------------|-------------|
| SPAN | "S" | "W" | MEMBER "A" | MEMBER "B" | SHOP CAMBER |
| UP TO 80'-6" | 6'-0" | 4'-0" | L 2 1/2" x 2 1/2" x 1/4" | L 2 1/2" x 2 1/2" x 1/4" | 2" |
| 81' TO 100'-6" | 6'-0" | 5'-0" | L 3" x 3" x 1/4" | L 2 1/2" x 2 1/2" x 1/4" | 2 1/2" |
| 101' TO 130'-6" | 7'-0" | 6'-0" | L 3" x 3" x 1/4" | L 3" x 3" x 1/4" | 3 1/2" |
| 131' TO 150'-6" | 8'-0" | 6'-0" | L 3 1/2" x 3 1/2" x 5/16" | L 3 1/2" x 3 1/2" x 5/16" | 4 1/2" |
| 151' TO 160'-6" | 8'-0" | 7'-0" | L 3 1/2" x 3 1/2" x 5/16" | L 3 1/2" x 3 1/2" x 5/16" | 5 1/2" |

NOTE: FOR SIZE OF CHORD MEMBERS SEE DATA SHEET.

GENERAL NOTES:

ALL STRUCTURAL STEEL AND COLUMN BASE PLATES ASTM A36, EXCEPT THAT CHORD ANGLES GREATER THAN 1/2" IN THICKNESS SHALL BE AASHTO M183 WITH SUPPLEMENTAL REQUIREMENTS: S5, CHARPY V-NOTCH IMPACT TEST FOR TEMPERATURE ZONE 2.

ALL ANCHOR BOLTS SHALL BE ASTM F1554, GRADE 36.

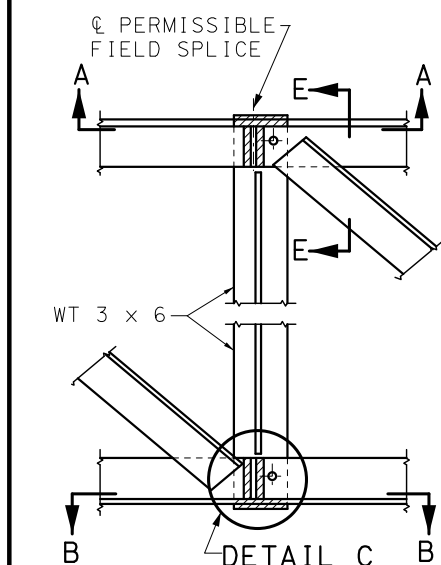
PROPOSED FIELD SPLICES SHALL BE SHOWN ON SHOP DRAWINGS FOR APPROVAL OF THE ENGINEER.

TRUSSES SHALL BE FABRICATED WITH A MINIMUM OF SPLICING IN TRUSS CHORDS. FIELD SPLICING WILL NOT BE PERMITTED WITHIN THE MIDDLE ONE-THIRD OF SPAN.

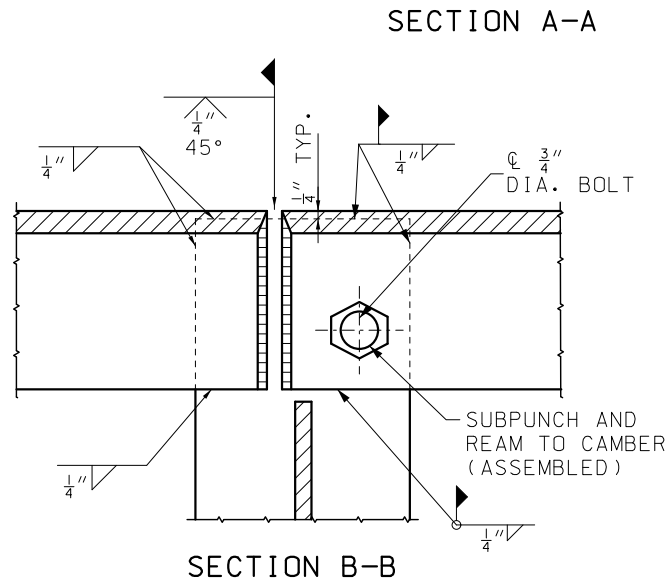
FOR ADDITIONAL INFORMATION SEE DATA SHEET.

ZINC CHROMATE PRIMER SHALL MEET THE REQUIREMENTS OF FEDERAL SPECIFICATIONS TT-P-645 OR TT-P-1757 AND SHALL BE ACCEPTED ON THE BASIS OF THE LABEL SHOWING CONFORMANCE OR A MANUFACTURER'S CERTIFICATION.

ALL SIGNS SHALL BE CENTERED VERTICALLY ABOUT THE HORIZONTAL CL OF THE TRUSS.

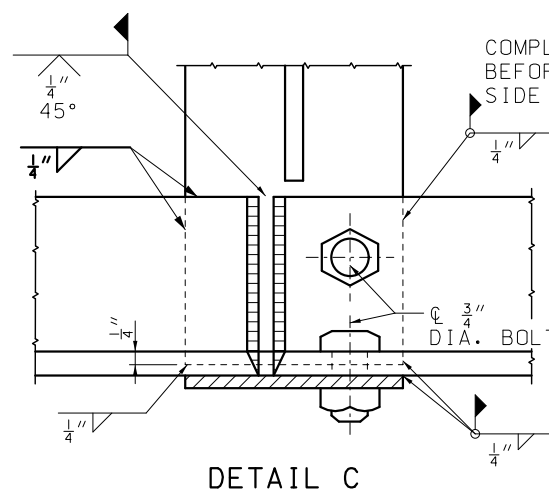


SECTION THROUGH TRUSS LOCATING SPLICES

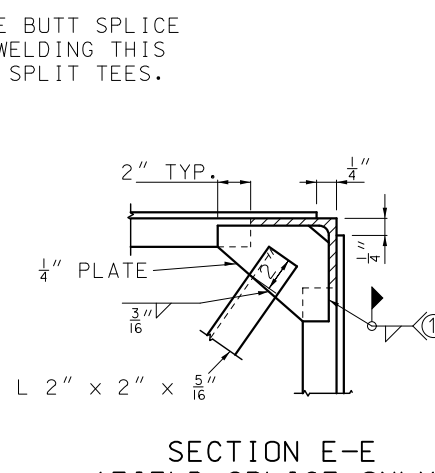


SECTION B-B

DETAIL OF FIELD SPLICES (IF ANY)



DETAIL C



SECTION E-E (FIELD SPLICE ONLY)

SEE SHEET 2

MISSOURI HIGHWAYS AND TRANSPORTATION COMMISSION

105 WEST CAPITOL
JEFFERSON CITY, MO 65102
1-888-ASK-MODOT (1-888-275-6636)

STATE OF MISSOURI
NICOLE A. KOLB HOOD
NUMBER PE-2001018754
PROFESSIONAL ENGINEER

THIS SHEET HAS BEEN SIGNED, SEALED AND DATED ELECTRONICALLY.

OVERHEAD SIGN TRUSSES

STRUCTURAL STEEL

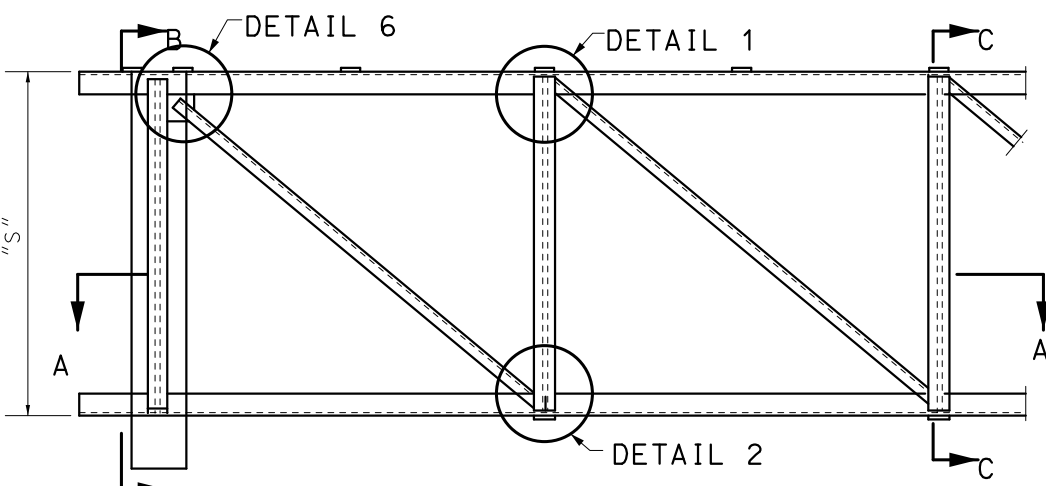
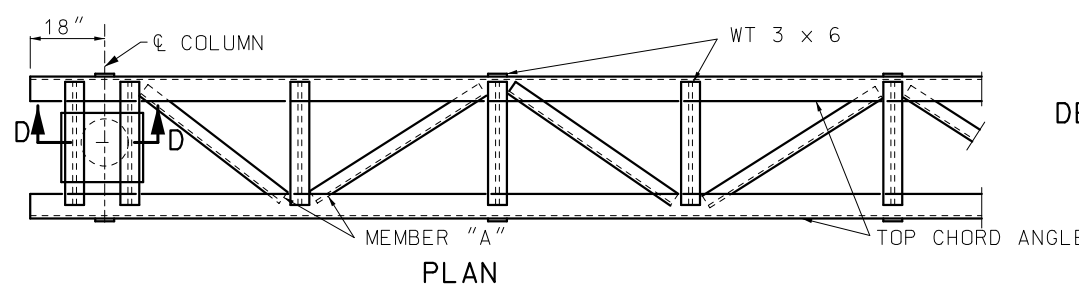
DATE EFFECTIVE: 01/01/2021
DATE PREPARED: 10/14/2020

903.60AC

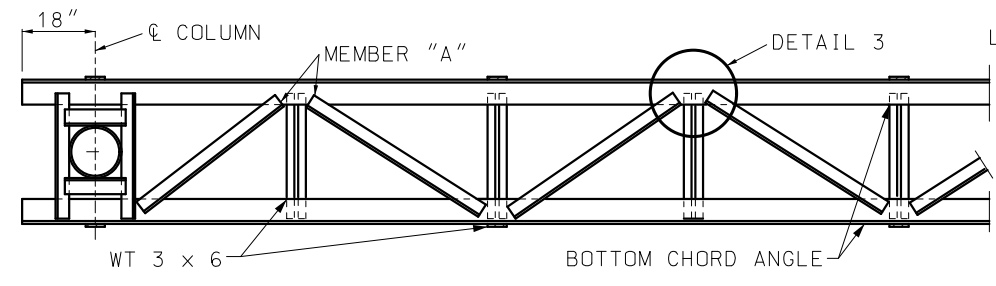
SHEET NO.
1 OF 5

IF A SEAL IS PRESENT ON THIS SHEET IT HAS BEEN ELECTRONICALLY SEALED AND DATED.

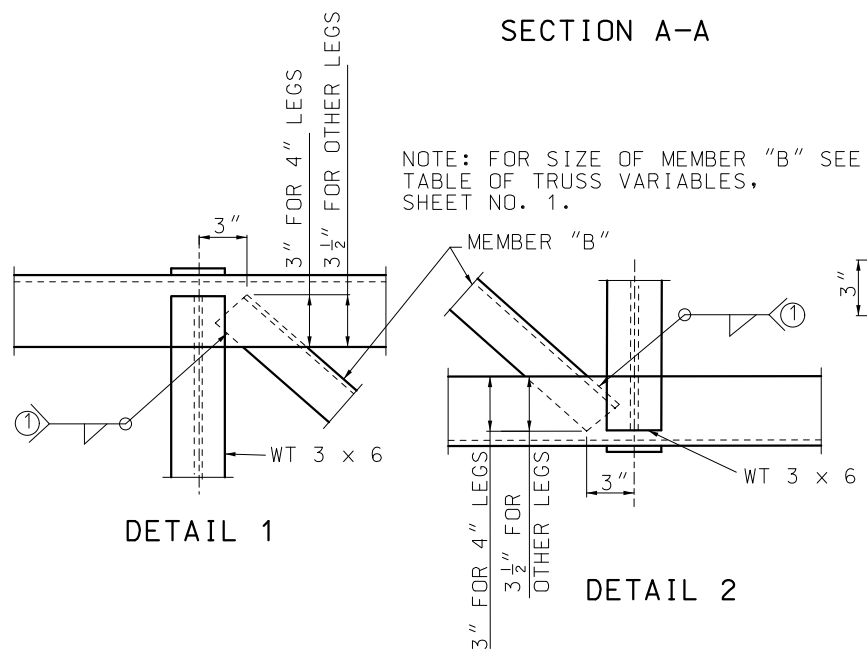
IF A SEAL IS PRESENT ON THIS SHEET IT HAS BEEN ELECTRONICALLY SEALED AND DATED.



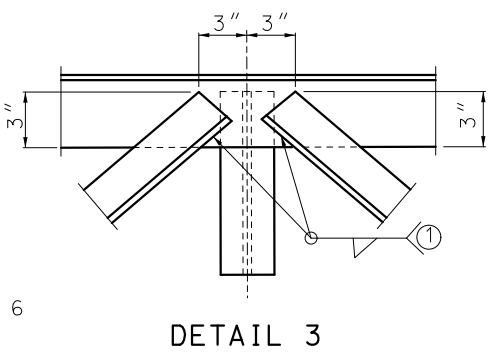
NOTE: FOR SIZE OF MEMBER "A" SEE TABLE OF TRUSS VARIABLES, SHEET NO. 1.



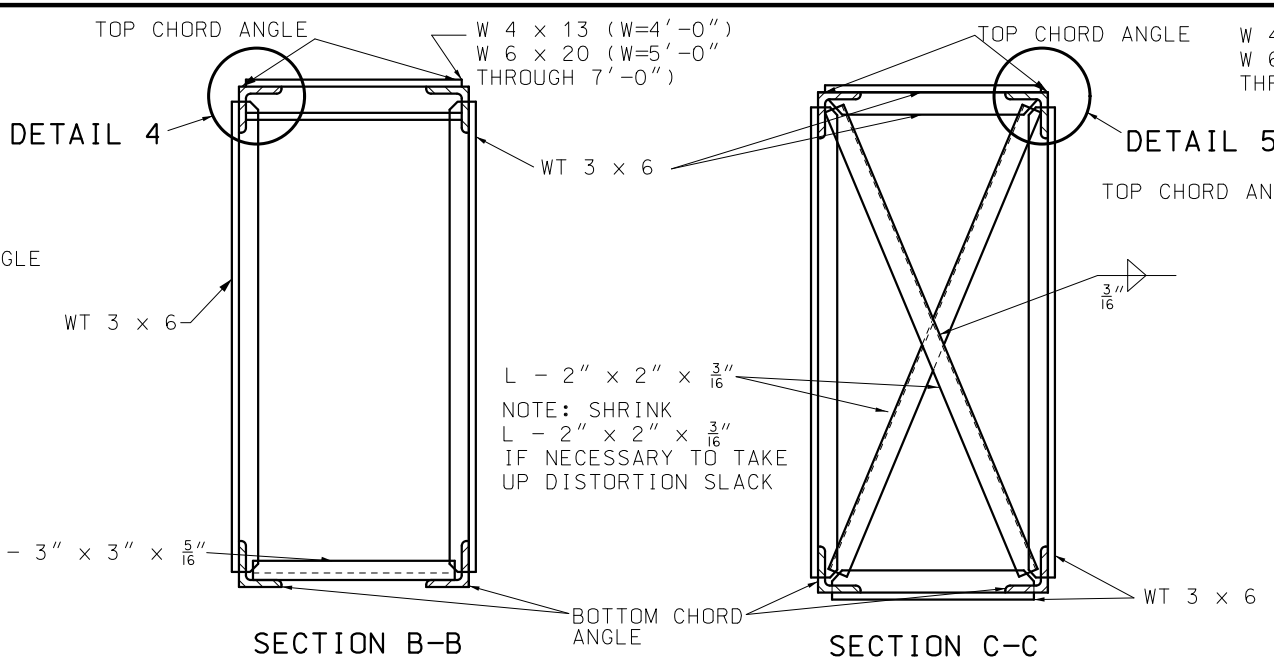
SECTION A-A



NOTE: FOR SIZE OF MEMBER "B" SEE TABLE OF TRUSS VARIABLES, SHEET NO. 1.

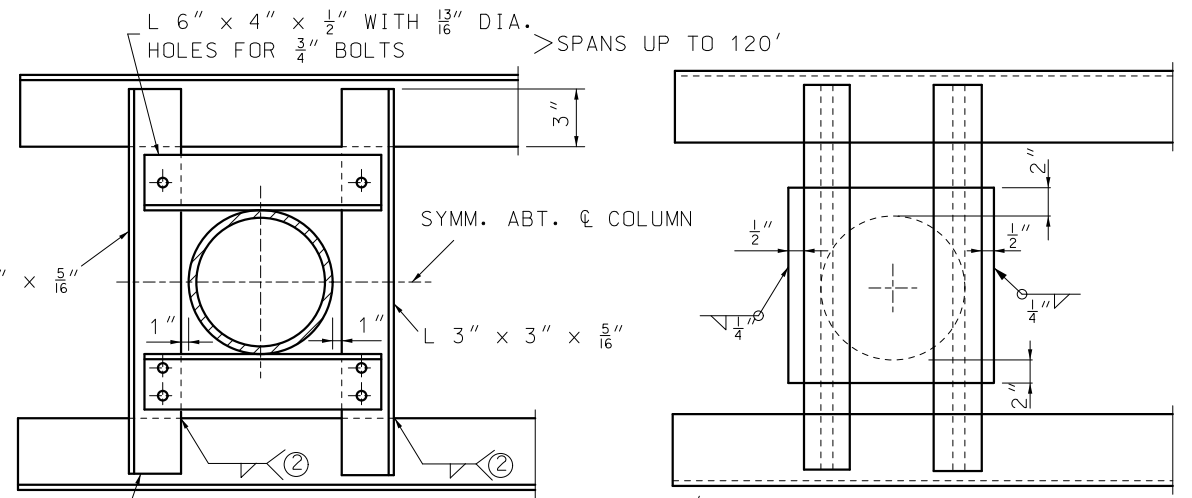


TYPICAL FOR ALL PANEL POINT FRAMING EXCEPT AT FIELD SPLICES, IF ANY, AND COLUMN SUPPORTS.



SECTION B-B

SECTION C-C

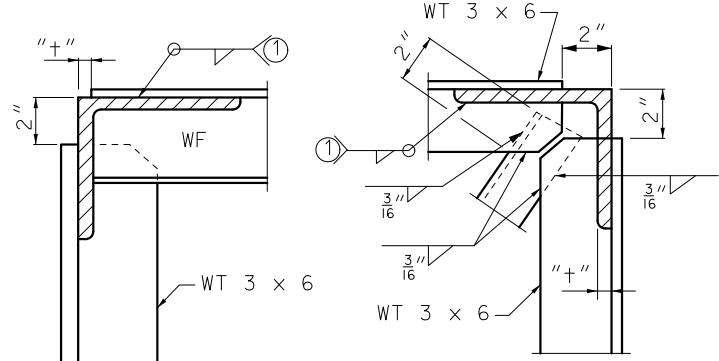


PLAN OF POST

NOTE: BOLTS SHALL BE HIGH STRENGTH STEEL WITH HARDENED WASHERS UNDER HEAD AND NUT.

SECTION F-F

NOTE: FILLET WELD 2 (SHOP OR FIELD) SHALL BE 3/16" WHEN "+" IS 1/2" OR LESS AND 1/4" WHEN "+" IS GREATER THAN 1/2".

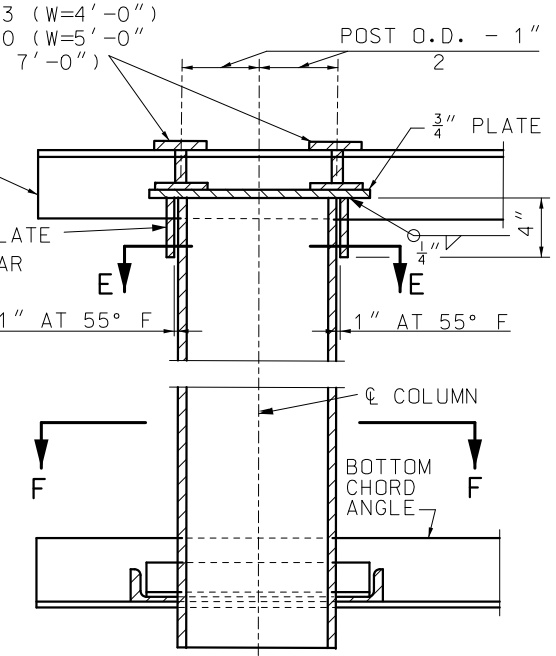


DETAIL 4

DETAIL 5

SLOT WEB OF STRUCTURAL TEE'S AND WIDE FLANGES TO RECEIVE LEG OF CHORD ANGLES (TYPICAL).

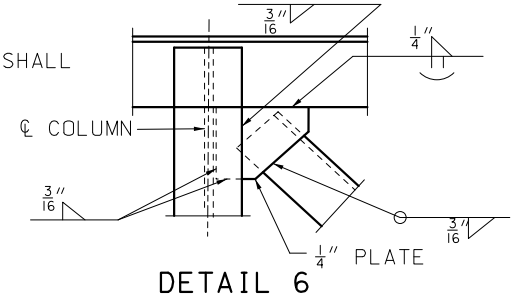
FILLET WELD 1 SHALL BE 5/16" WHEN "+" IS 1/2" OR LESS AND 1/4" WHEN "+" IS GREATER THAN 1/2".



SECTION D-D

SECTION E-E

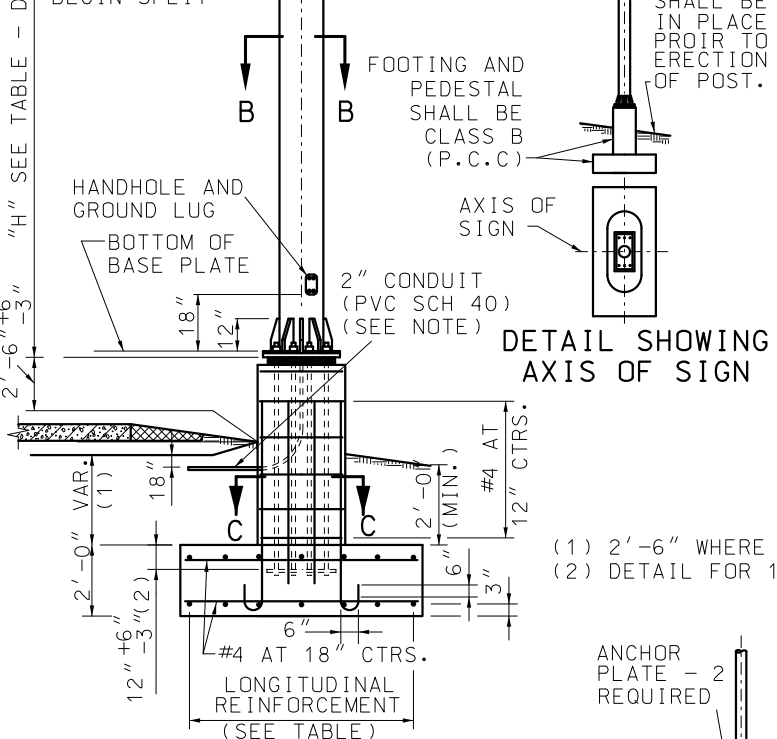
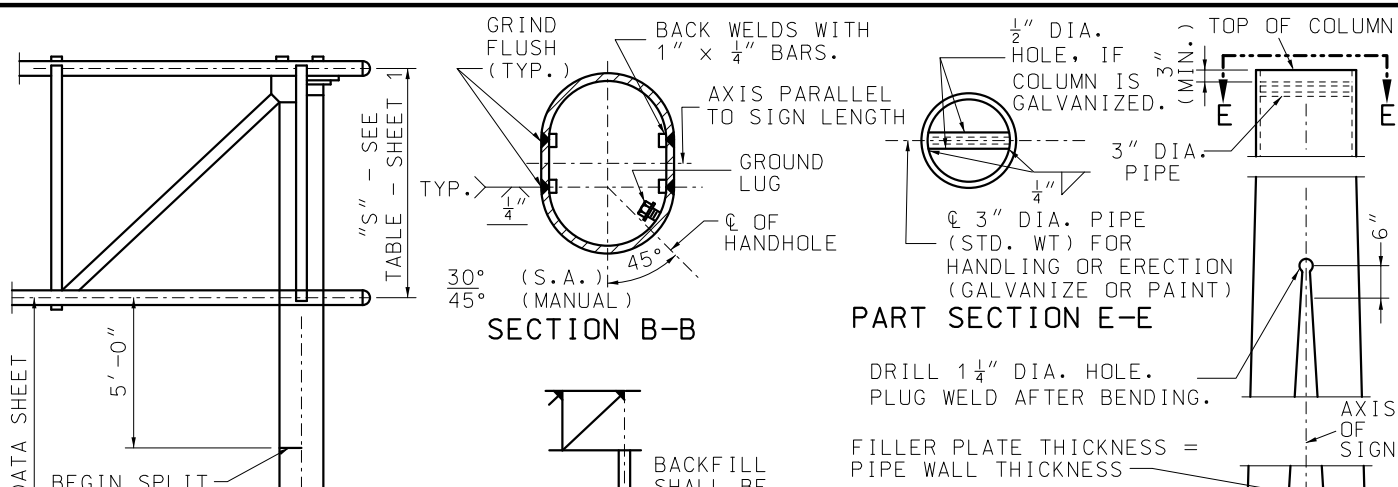
NOTE: DETAILS OF CANTILEVER END SECTION ARE SIMILAR TO THOSE SHOWN ON THIS SHEET.



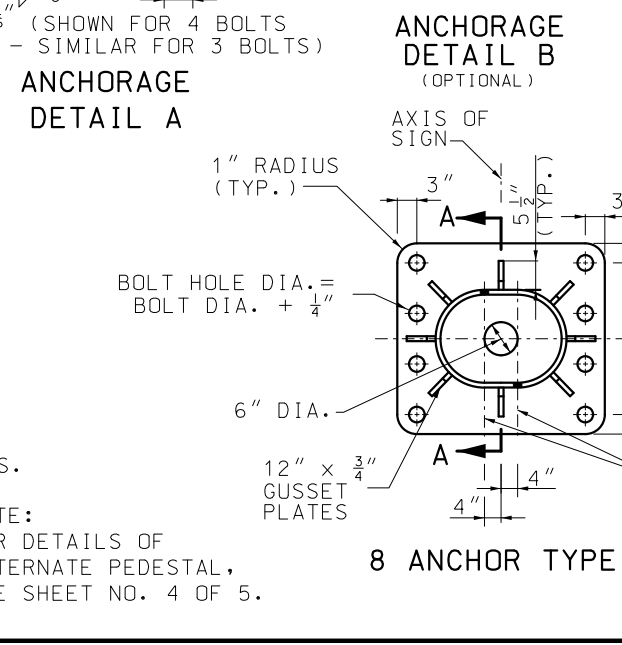
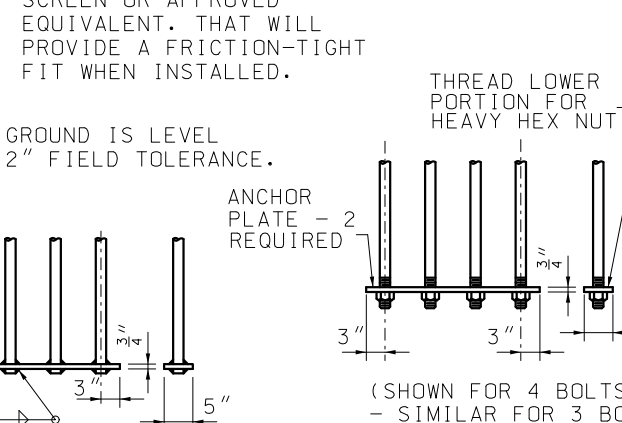
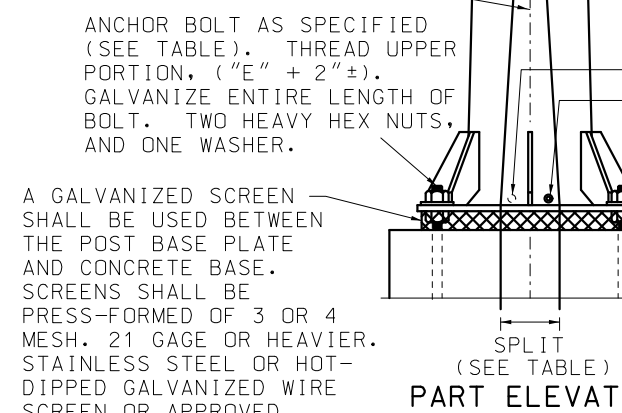
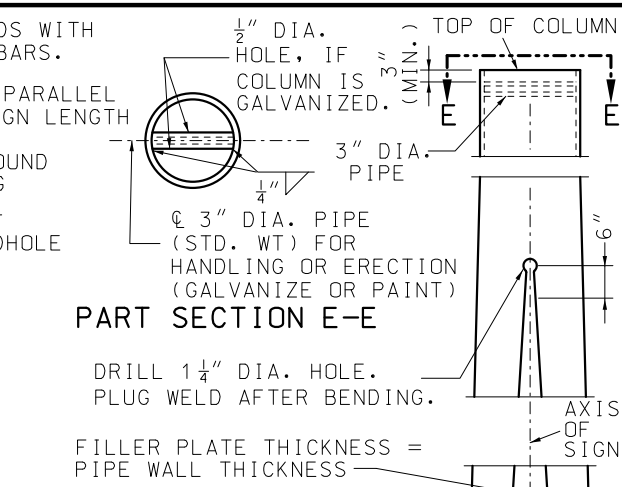
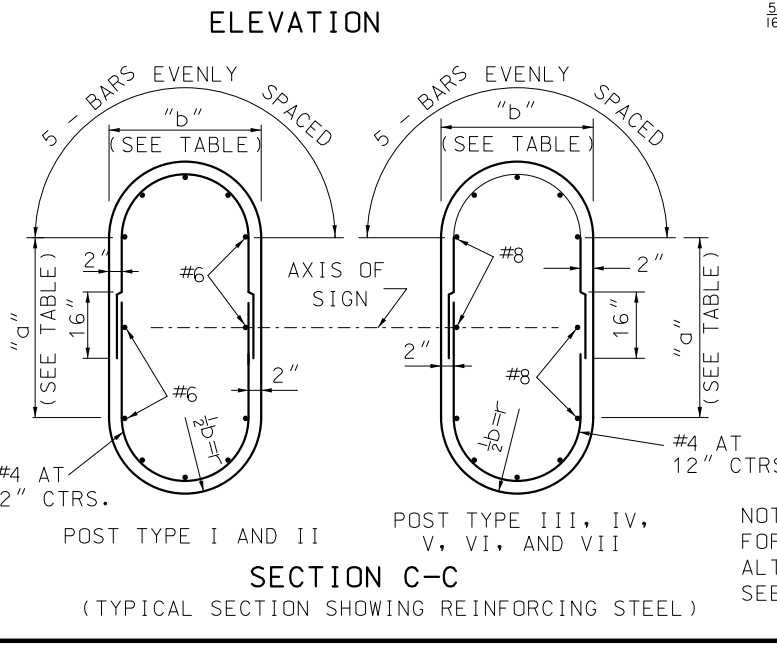
DETAIL 6

| | | | |
|---|--|--|--|
| | | MISSOURI HIGHWAYS AND TRANSPORTATION COMMISSION 105 WEST CAPITOL JEFFERSON CITY, MO 65102 1-888-ASK-MODOT (1-888-275-6636) | |
| | | OVERHEAD SIGN TRUSSES STRUCTURAL STEEL | |
| DATE EFFECTIVE: 01/01/2021 DATE PREPARED: 10/14/2020 | | | |

IF DESIRED THE OUTSTANDING LEGS OF DIAGONAL ANGLES MAY BE CLIPPED AT 45° TO FACILITATE ASSEMBLY AND WELDING.

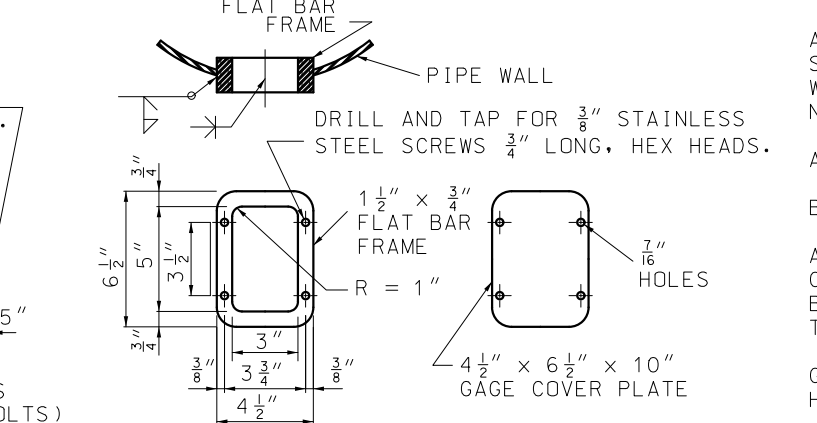
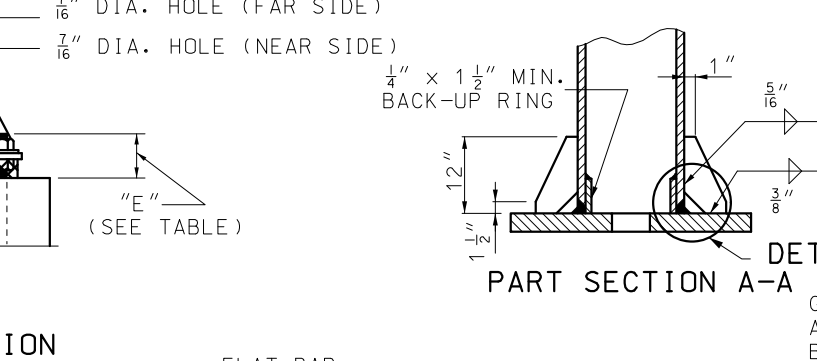


NOTE: THE 2" CONDUIT IN THE CONCRETE PEDESTAL SHALL BE PVC SCHEDULE 40 AND SHALL BE PLACED WITH A MINIMUM RADIUS BEND OF 9 1/2".

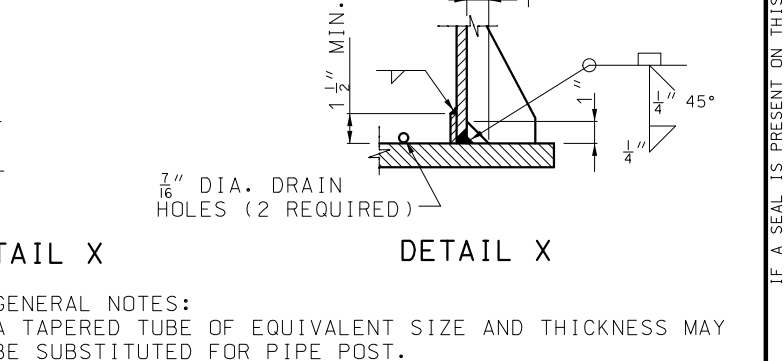
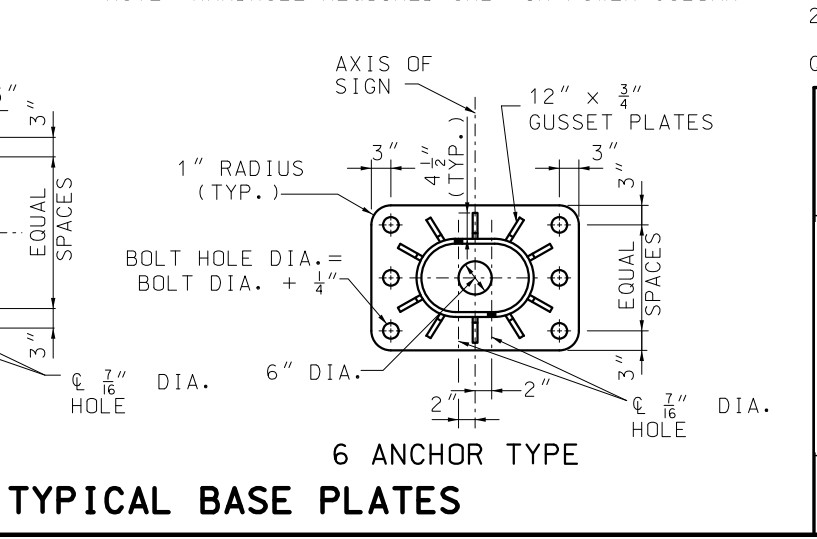


| POST TYPE | PIPE COLUMN | DIMENSION "E" | SPLIT | BASE PLATE SIZE* | ANCHOR BOLTS DIA. | PEDESTAL SIZE* | | FOOTING SIZE* | LONGITUDINAL FOOTING REINFORCEMENT | | CONCRETE C.Y. |
|-----------|--------------------|---------------|---------|------------------------|-------------------|----------------|--------|-----------------|------------------------------------|------------|---------------|
| | | | | | | a | b | | TOP | BOTTOM | |
| I | 12" STD. AT 65.42 | 8 1/2" | 6" | 2'-6" x 23" x 1 1/2" | 6 AT 2 1/4" | 4'-0" | 2'-11" | 7'-0" x 14'-6" | 7-#5 BARS | 7-#6 BARS | 10.9 |
| II | 14" O.D. AT 72.09 | 8 1/2" | 9 1/2" | 3'-0" x 2'-0" x 1 1/2" | 6 AT 2 1/4" | 4'-4" | 3'-0" | 8'-0" x 16'-0" | 8-#5 BARS | 9-#6 BARS | 13.2 |
| III | 16" O.D. AT 82.77 | 8 3/4" | 11 1/2" | 3'-4" x 2'-2" x 1 3/4" | 6 AT 2 1/4" | 4'-8" | 3'-2" | 8'-6" x 17'-6" | 9-#5 BARS | 9-#7 BARS | 15.2 |
| IV | 18" O.D. AT 93.45 | 9 1/2" | 12 1/2" | 3'-7" x 2'-4" x 2" | 6 AT 2 1/2" | 5'-1" | 3'-4" | 9'-6" x 19'-0" | 10-#5 BARS | 10-#8 BARS | 18.1 |
| V | 20" O.D. AT 104.13 | 9 1/2" | 13" | 3'-10" x 2'-9" x 2" | 8 AT 2 1/2" | 5'-4" | 3'-9" | 10'-0" x 20'-0" | 10-#5 BARS | 10-#8 BARS | 20.6 |
| VI | 24" O.D. AT 125.49 | 9 1/2" | 10 1/2" | 4'-0" x 3'-3" x 2" | 8 AT 2 1/2" | 5'-6" | 4'-3" | 10'-6" x 21'-0" | 11-#5 BARS | 11-#8 BARS | 23.3 |
| VII | 24" O.D. AT 125.49 | 9 1/2" | 13 1/2" | 4'-3" x 3'-3" x 2" | 8 AT 2 1/2" | 5'-9" | 4'-3" | 11'-0" x 22'-0" | 11-#5 BARS | 11-#9 BARS | 25.1 |

* BASE PLATES, PEDESTAL, AND FOOTINGS, LONGER SIDES SHALL BE NORMAL TO AXIS OF SIGN.



NOTE: HANDHOLE REQUIRED ONLY IN POWER COLUMN.



GENERAL NOTES:
A TAPERED TUBE OF EQUIVALENT SIZE AND THICKNESS MAY BE SUBSTITUTED FOR PIPE POST.
ALL STEEL PIPE COLUMNS SHALL BE EITHER GRADE "B" SEAMLESS STEEL PIPE OR GRADE "B" ELECTRIC RESISTANCE WELDED STEEL PIPE; ASTM SPECIFICATION A53. NO OBJECTIONABLE SEAMS WILL BE PERMITTED.

ALL STRUCTURES SHALL BE GROUNDED.
BURR THREADS ON ALL ANCHOR BOLTS.
A HORIZONTAL WELDED SPLICE MAY BE FABRICATED IN THE COLUMN BETWEEN THE TOP OF PIPE AND 4'-0" BELOW THE BOTTOM CHORDS OF THE TRUSS WHEN DETAILED ON THE SHOP DRAWINGS AND APPROVED BY THE ENGINEER.
GROUND LUGS SHALL BE LOCATED INSIDE COLUMN NEAR HAND HOLE.

QUANTITIES FOR PEDESTAL, BASED ON NOMINAL HEIGHT OF 5'-0".
QUANTITIES FOR FOOTING, BASED ON NOMINAL DEPTH OF 2'-0".
QUANTITIES SHOWN ARE FOR ONE COLUMN ONLY.

MISSOURI HIGHWAYS AND TRANSPORTATION COMMISSION
105 WEST CAPITOL
JEFFERSON CITY, MO 65102
1-888-ASK-MODOT (1-888-275-6636)

MoDOT

STATE OF MISSOURI
NICOLE A. KOLB HOOD
NUMBER PE-2001018754
PROFESSIONAL ENGINEER
THIS SHEET HAS BEEN SIGNED, SEALED AND DATED ELECTRONICALLY.

OVERHEAD SIGN TRUSSES
STRUCTURAL STEEL

DATE EFFECTIVE: 01/01/2021
DATE PREPARED: 10/14/2020

903.60AC

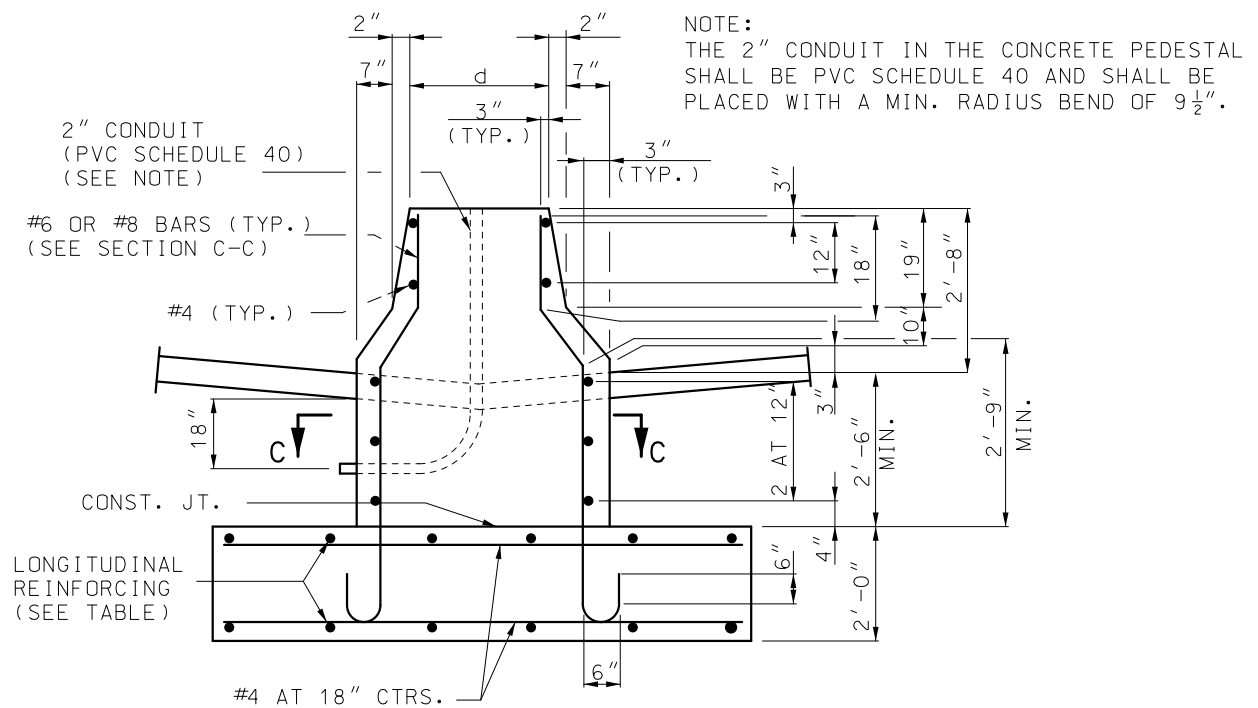
SHEET NO. 3 OF 5

IF A SEAL IS PRESENT ON THIS SHEET IT HAS BEEN ELECTRONICALLY SEALED AND DATED.

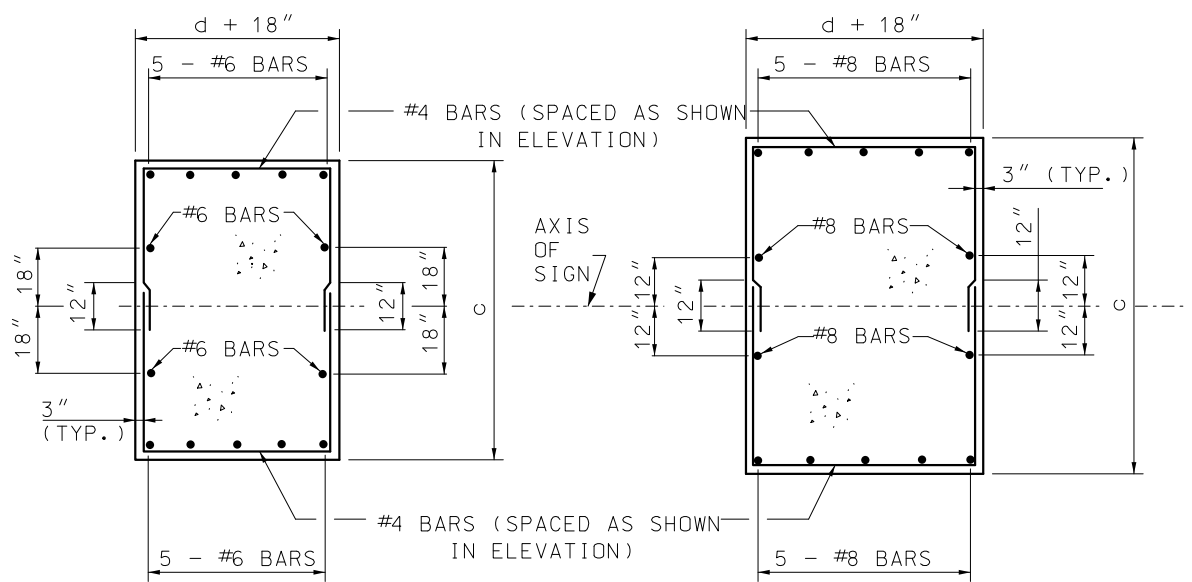
IF A SEAL IS PRESENT ON THIS SHEET IT HAS BEEN ELECTRONICALLY SEALED AND DATED.

| POST TYPE | PIPE COLUMN | PEDESTAL SIZE* | | FOOTING SIZE* | LONGITUDINAL FOOTING REINFORCEMENT | | CONCRETE C.Y. | |
|-----------|--------------------|----------------|--------|-----------------|------------------------------------|------------|-----------------------|-----------------------|
| | | c | d | | TOP | BOTTOM | TYPE A MEDIAN BARRIER | TYPE C MEDIAN BARRIER |
| I | 12" STD. AT 65.42 | 5'-9" | 2'-1" | 7'-0" x 14'-6" | 7-#5 BARS | 7-#6 BARS | 10.9 | 11.6 |
| II | 14" O.D. AT 72.09 | 6'-2" | 2'-2" | 8'-0" x 16'-0" | 8-#5 BARS | 9-#6 BARS | 13.2 | 14.0 |
| III | 16" O.D. AT 82.77 | 6'-7" | 2'-4" | 8'-6" x 17'-6" | 9-#5 BARS | 9-#7 BARS | 15.2 | 16.1 |
| IV | 18" O.D. AT 93.45 | 7'-1" | 2'-6" | 9'-6" x 19'-0" | 10-#5 BARS | 10-#8 BARS | 18.1 | 19.1 |
| V | 20" O.D. AT 104.13 | 7'-8" | 2'-11" | 10'-0" x 20'-0" | 10-#5 BARS | 10-#8 BARS | 20.6 | 21.7 |
| VI | 24" O.D. AT 125.49 | 8'-3" | 3'-5" | 10'-6" x 21'-0" | 11-#5 BARS | 11-#8 BARS | 23.3 | 24.6 |
| VII | 24" O.D. AT 125.49 | 8'-6" | 3'-5" | 11'-0" x 22'-0" | 11-#5 BARS | 11-#9 BARS | 25.1 | 26.5 |

* BASE PLATES, PEDESTAL, AND FOOTINGS LONGER SIDES SHALL BE NORMAL TO AXIS OF SIGN.



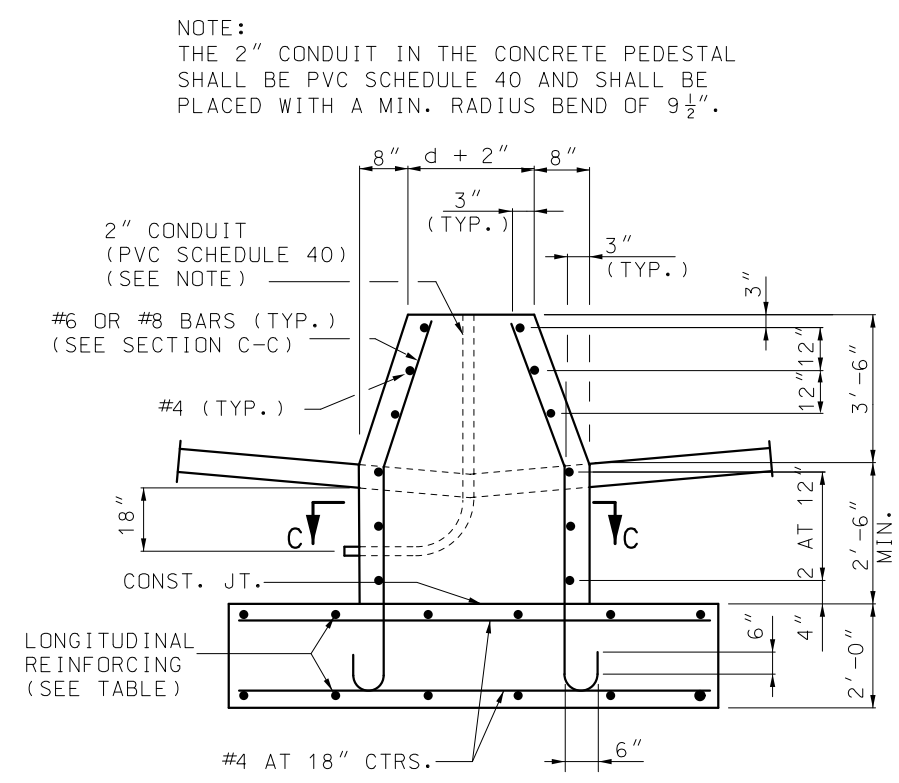
PART ELEVATION
(TYPE A CONCRETE TRAFFIC BARRIER)



SECTION C-C
TYPICAL SECTION SHOWING
REINFORCING STEEL

DETAILS OF ALTERNATE PEDESTAL

(TO BE USED ADJACENT TO TYPE "A" OR "C" MEDIAN BARRIER)



PART ELEVATION
(TYPE C CONCRETE TRAFFIC BARRIER)

GENERAL NOTES:

- A TAPERED TUBE OF EQUIVALENT SIZE AND THICKNESS MAY BE SUBSTITUTED FOR PIPE POST.
- ALL STEEL PIPE COLUMNS SHALL BE EITHER GRADE "B" SEAMLESS STEEL PIPE OR GRADE "B" ELECTRIC RESISTANCE WELDED STEEL PIPE; ASTM SPECIFICATION A53.
- NO OBJECTIONABLE SEAMS WILL BE PERMITTED.
- ALL STRUCTURES SHALL BE GROUNDED.
- BURR THREADS ON ALL ANCHOR BOLTS.
- PIPE COLUMN, BASE PLATE, ANCHOR BOLTS AND NOTES PERTAINING TO THESE ITEMS HAVE BEEN OMITTED FOR CLARITY. REFER TO SHEET 3 OF 5 FOR DETAILS OF THESE ITEMS.
- GROUND LUGS SHALL BE LOCATED INSIDE COLUMN NEAR HAND HOLE.
- QUANTITIES FOR PEDESTAL ARE BASED ON NOMINAL HEIGHT OF 5'-2" (TYPE A MEDIAN BARRIER) OR 6'-0" (TYPE C MEDIAN BARRIER).
- QUANTITIES FOR FOOTING ARE BASED ON NOMINAL DEPTH OF 2'-0".
- QUANTITIES SHOWN ARE FOR ONE COLUMN ONLY.

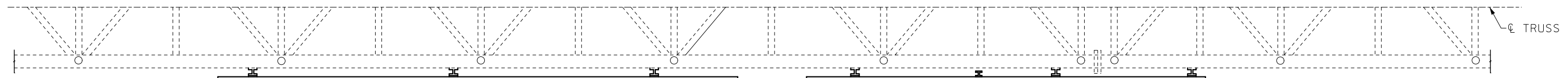
MISSOURI HIGHWAYS AND TRANSPORTATION COMMISSION
 105 WEST CAPITOL
 JEFFERSON CITY, MO 65102
 1-888-ASK-MODOT (1-888-275-6636)

STATE OF MISSOURI
 NICOLE A. KOLB HOOD
 NUMBER PE-2001018754
 PROFESSIONAL ENGINEER
 THIS SHEET HAS BEEN SIGNED, SEALED AND DATED ELECTRONICALLY.

OVERHEAD SIGN TRUSSES
STRUCTURAL STEEL

| | | |
|----------------------------|-----------------|------------------|
| DATE EFFECTIVE: 01/01/2021 | 903.60AC | SHEET NO. 4 OF 5 |
| DATE PREPARED: 10/14/2020 | | |

IF A SEAL IS PRESENT ON THIS SHEET IT HAS BEEN ELECTRONICALLY SEALED AND DATED.



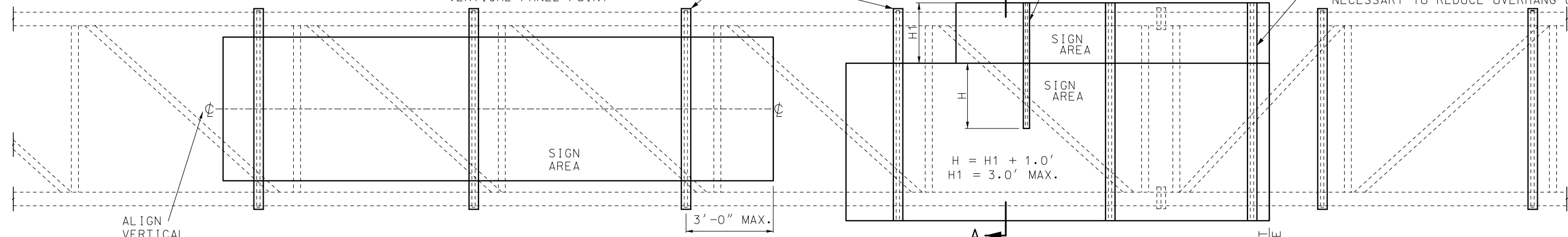
TYPICAL HALF PLAN OF SIGN COMPONENTS

6" ALUM. I AT 4.03# TO BE LOCATED AS CLOSE AS POSSIBLE TO NEAREST VERTICAL PANEL POINT

3'-0" MAX.
0'-6" MIN.

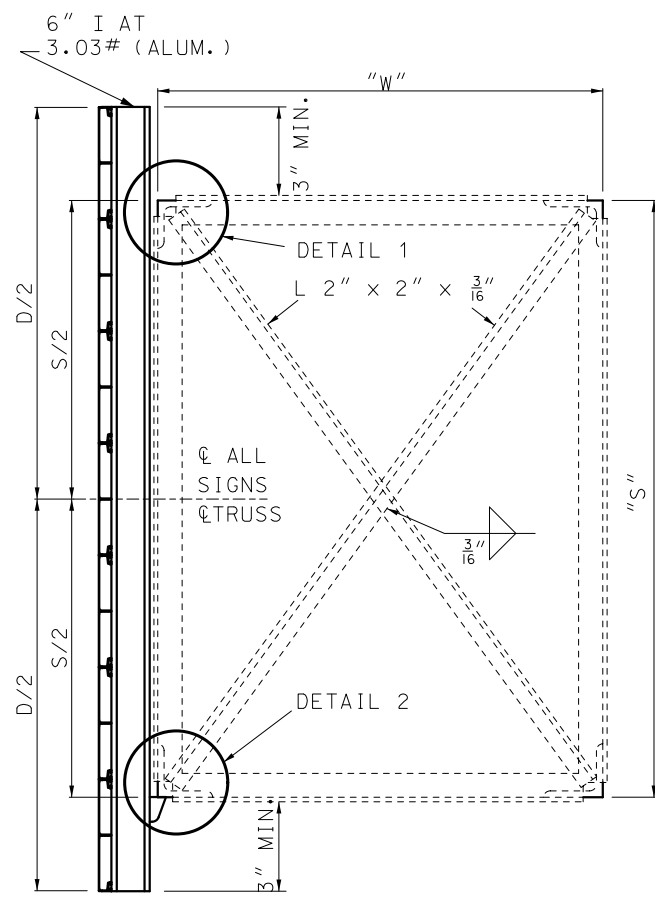
3" ALUMINUM I-BEAM (ASTM B308) FASTENED TO ALUMINUM EXTRUDED SIGN PANEL

6" ALUM. I AT 4.03# SHALL BE PLACED AT HORIZONTAL PANEL POINTS (±9") WHEN NECESSARY TO REDUCE OVERHANG OF SIGN



ALIGN VERTICAL C OF SIGNS AND TRUSS

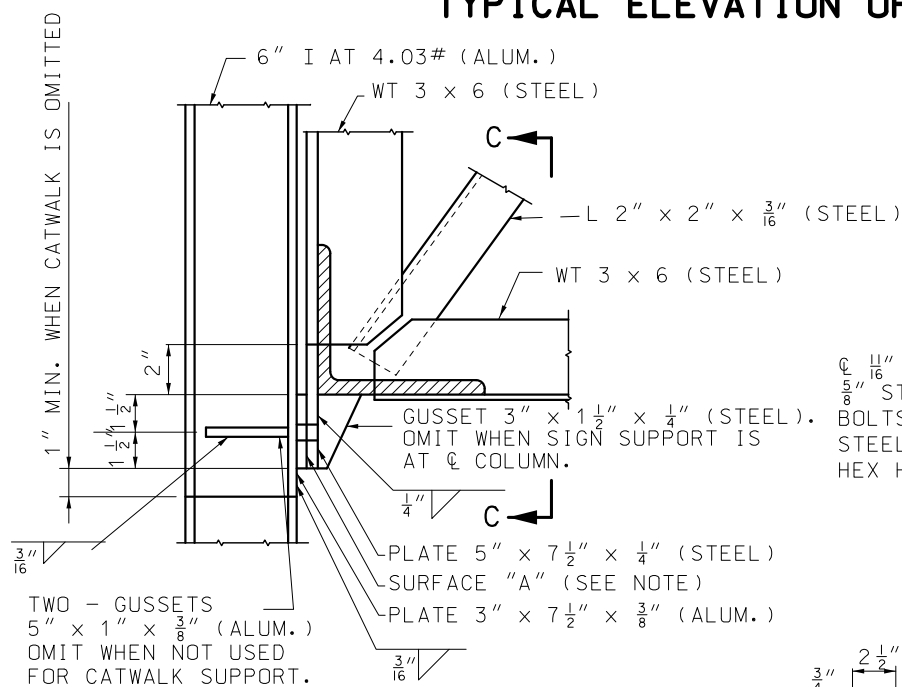
TYPICAL ELEVATION OF SIGN COMPONENTS



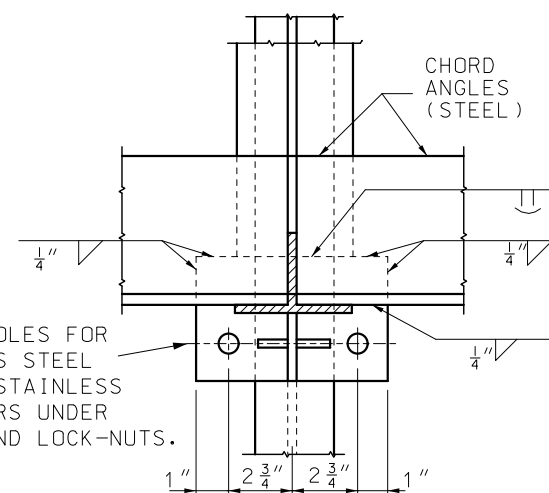
SECTION A-A

TYPICAL SECTION OF SIGN SUPPORT

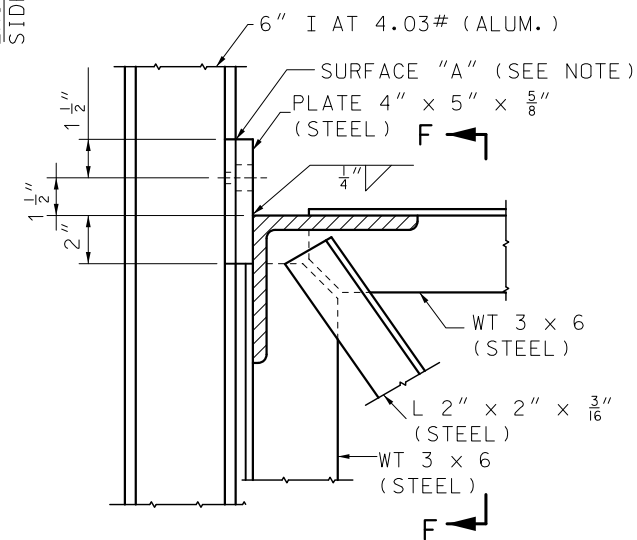
NOTE: "D" = GREATEST OVERALL DEPTH OF ANY SIGN OR SIGNS ON TRUSSES AND "S" = TRUSS DEPTH. SEE SHEET NO. 5 OF 7 FOR LOCATION OF SECTION A-A.



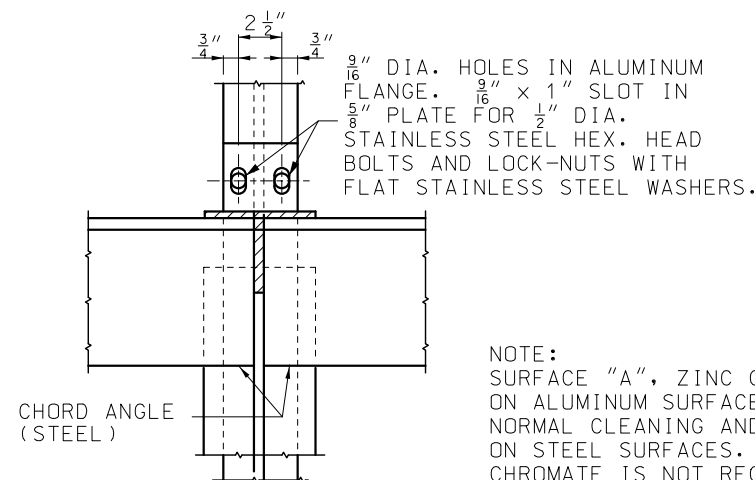
DETAIL 2



SECTION C-C



DETAIL 1



SECTION F-F

NOTE: SURFACE "A", ZINC CHROMATE ON ALUMINUM SURFACES. NORMAL CLEANING AND PAINTING ON STEEL SURFACES. ZINC CHROMATE IS NOT REQUIRED WHEN STEEL IS GALVANIZED.

GENERAL NOTES:

EXIT NO. PANELS SHALL BE MOUNTED FLUSH WITH THE EXIT SIDE OF THE GUIDE SIGN.

ALL SIGNS SHALL BE CENTERED VERTICALLY ABOUT THE HORIZONTAL C OF THE TRUSS.

| | | |
|--|--|-----------------|
| | MISSOURI HIGHWAYS AND TRANSPORTATION COMMISSION | |
| | 105 WEST CAPITOL JEFFERSON CITY, MO 65102 1-888-ASK-MODOT (1-888-275-6636) | |
| | OVERHEAD SIGN TRUSSES STRUCTURAL STEEL | |
| | DATE EFFECTIVE: 01/01/2021 DATE PREPARED: 10/14/2020 | 903.60AC |