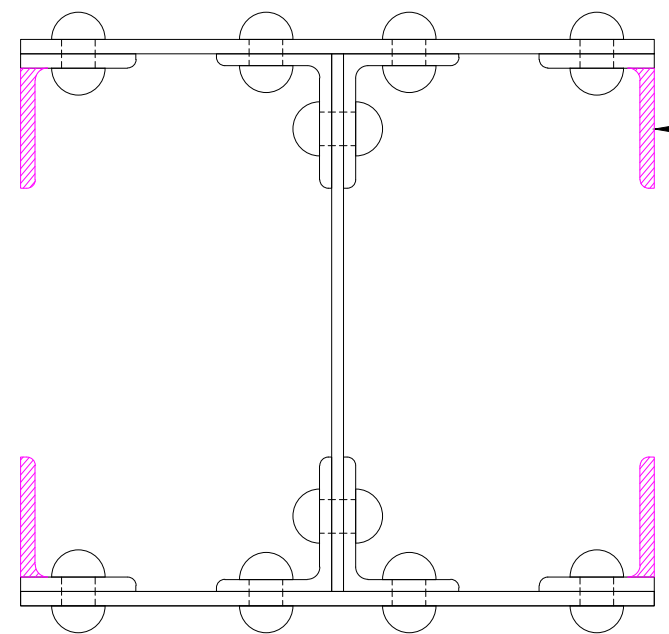
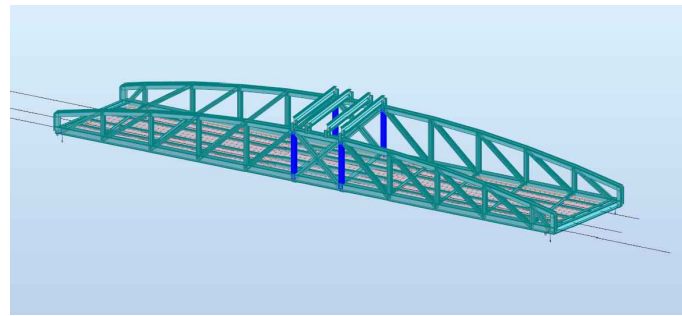
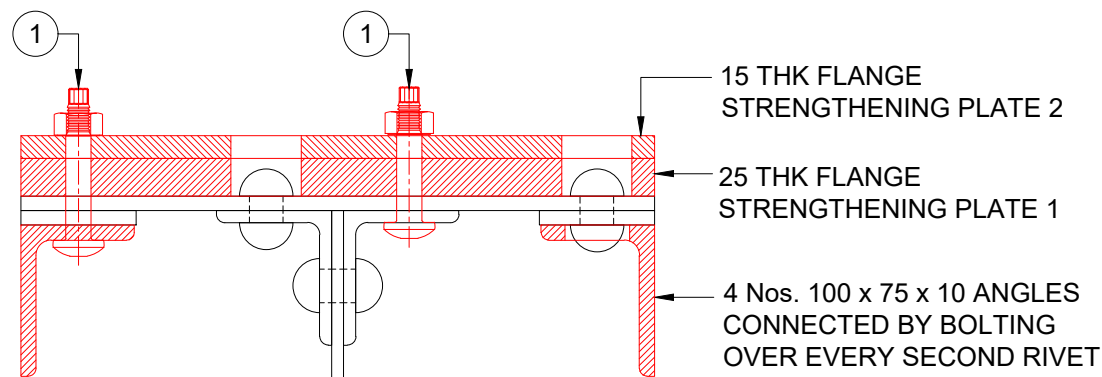


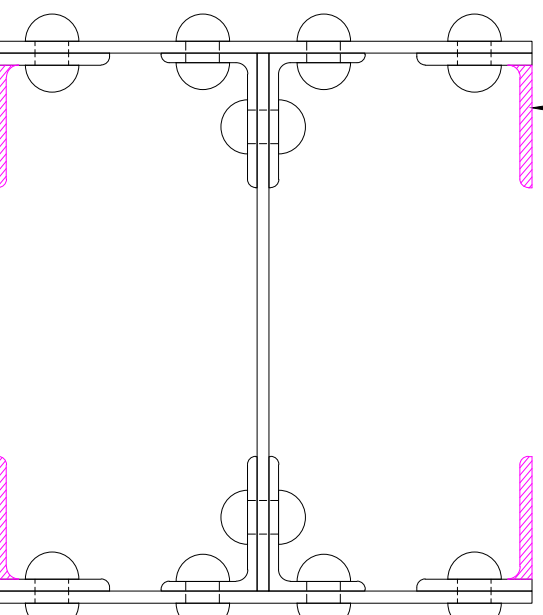
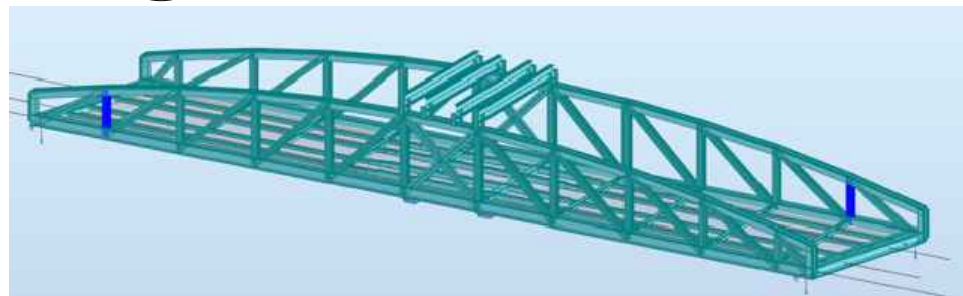


CORRODED OUTSTANDING LEG
OF ANGLE NOT CONSIDERED IN
ASSESSMENT CALCULATIONS
OF REDUCED CROSS SECTIONS

REDUCED SECTION- VER 419
SCALE: 1:5

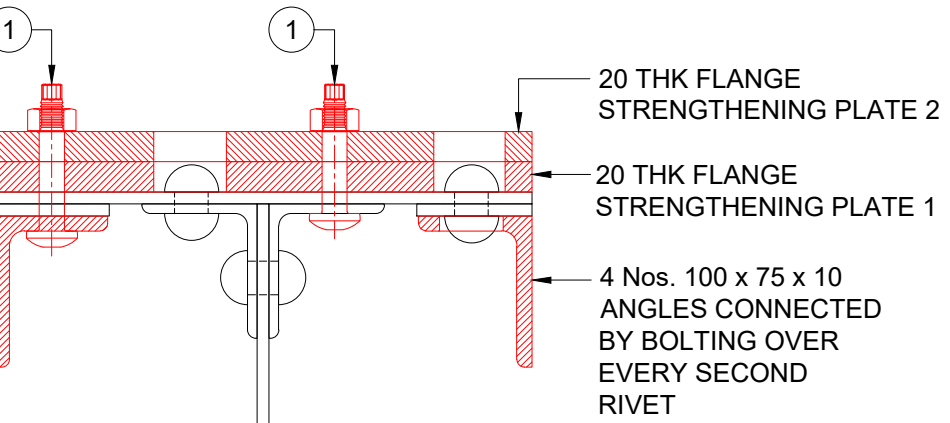


STRENGTHENED SECTION- VER 419
SCALE: 1:5

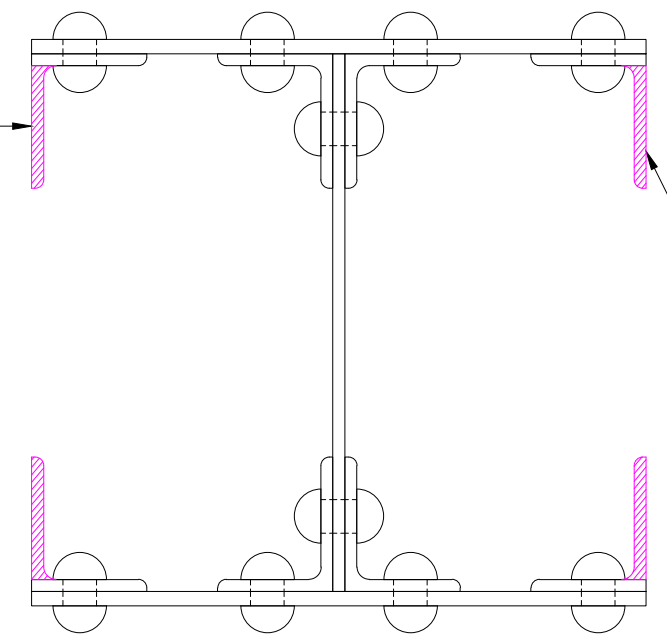
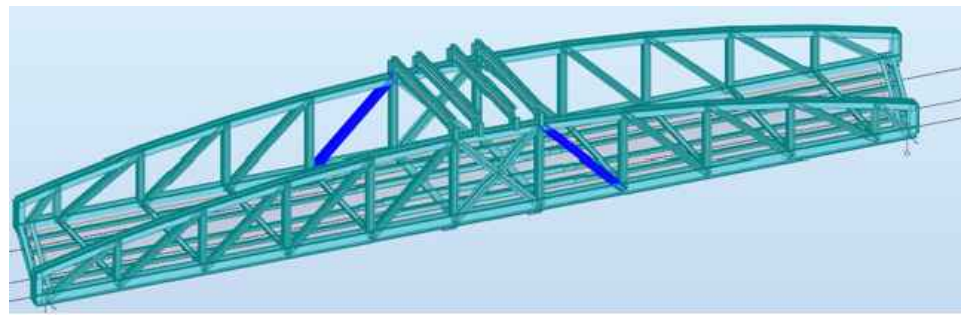


CORRODED OUTSTANDING LEG
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ASSESSMENT CALCULATIONS
OF REDUCED CROSS SECTIONS

REDUCED SECTION- VER 355
SCALE: 1:5

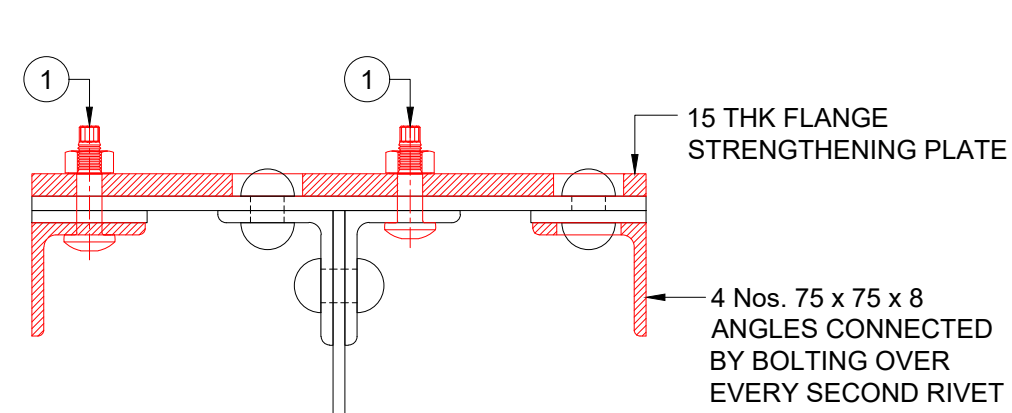


STRENGTHENED SECTION- VER 355
SCALE: 1:5

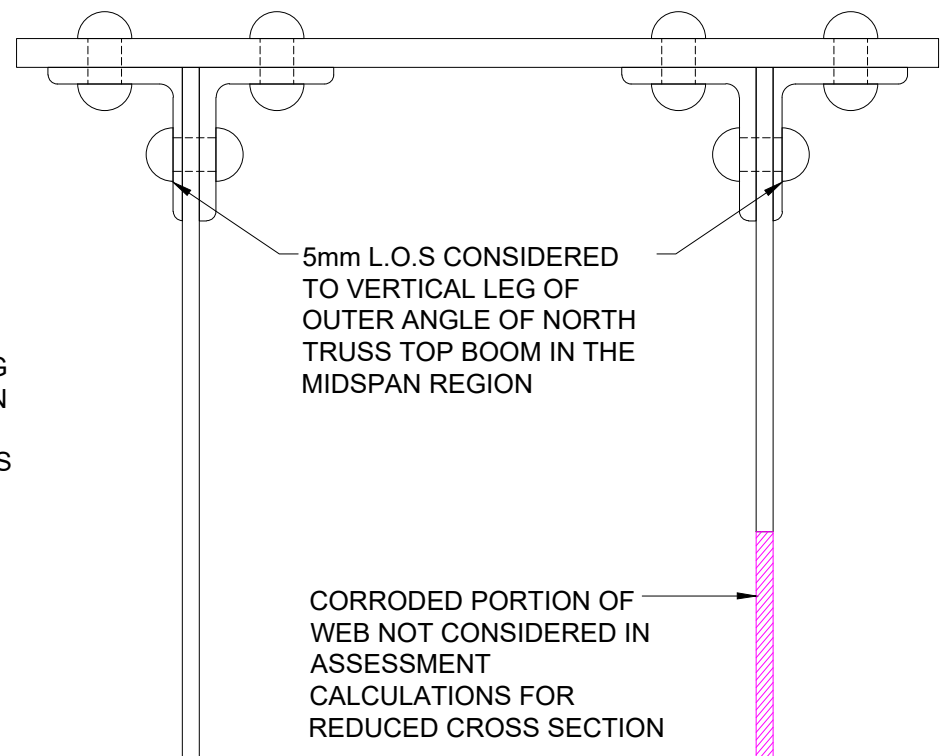


CORRODED OUTSTANDING LEG
OF ANGLE NOT
CONSIDERED IN ASSESSMENT
CALCULATIONS OF REDUCED
CROSS SECTIONS

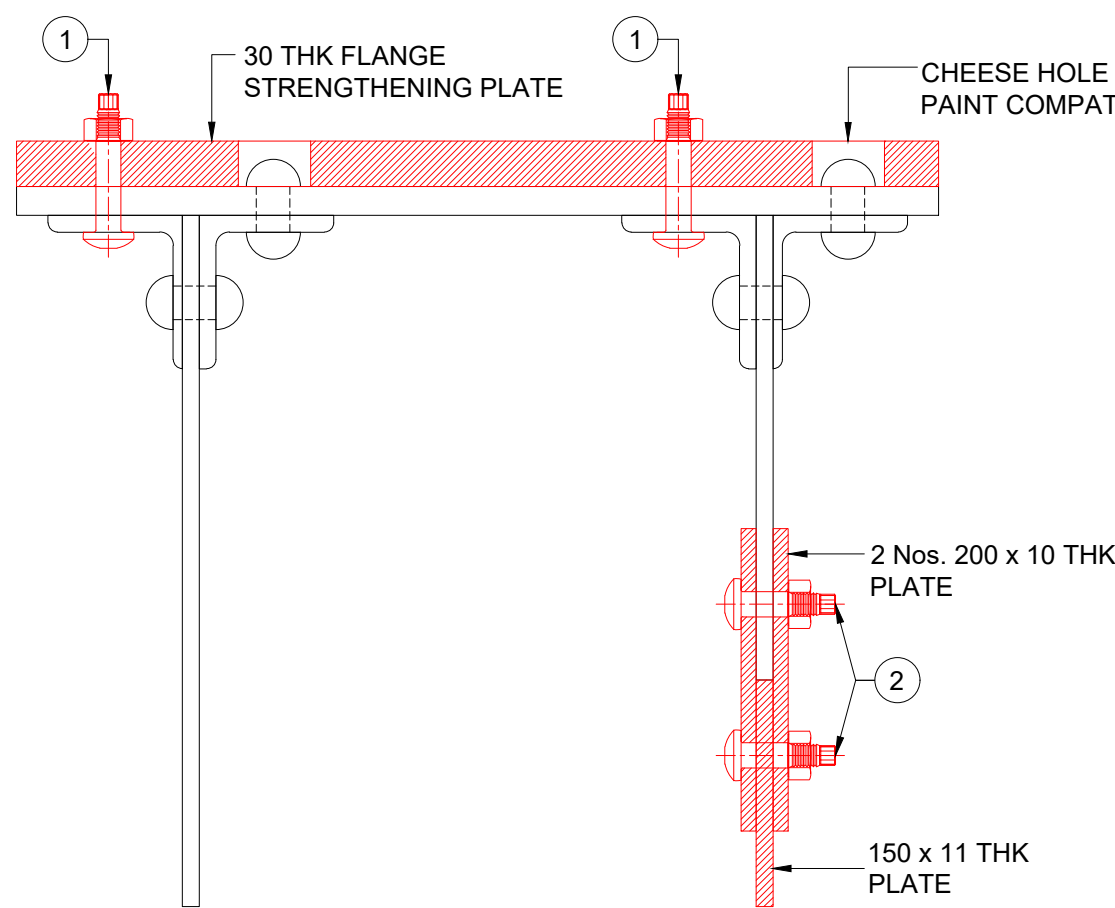
REDUCED SECTION- DIA 406
SCALE: 1:5



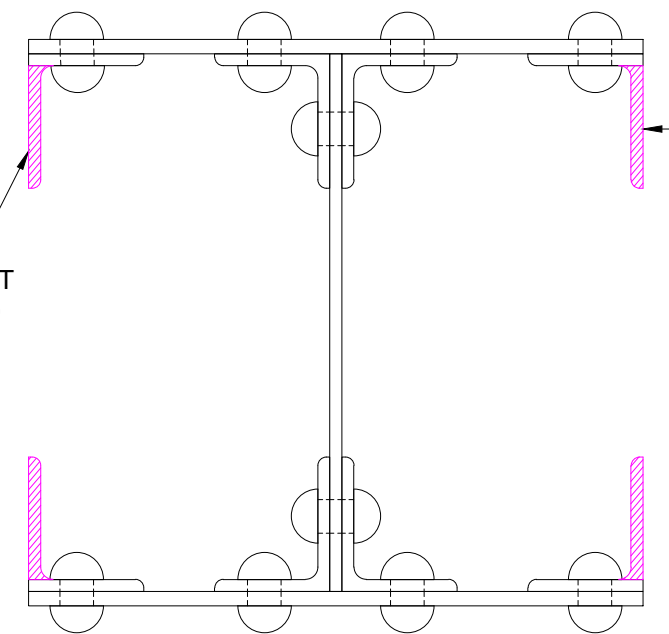
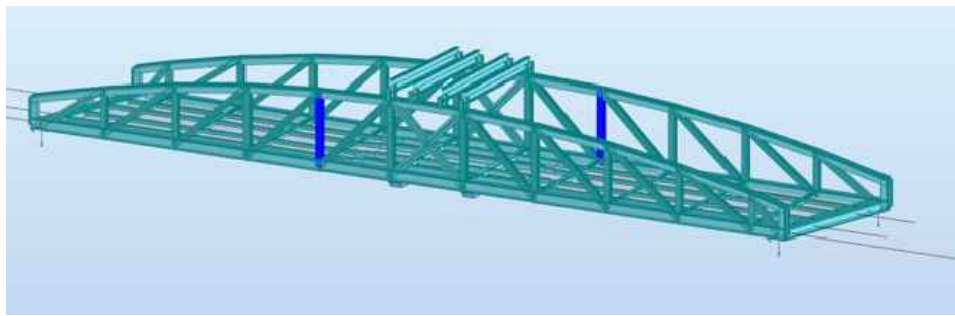
STRENGTHENED SECTION- DIA 406
SCALE: 1:5



REDUCED SECTION- TB MD
SCALE: 1:5
(NORTH TRUSS)

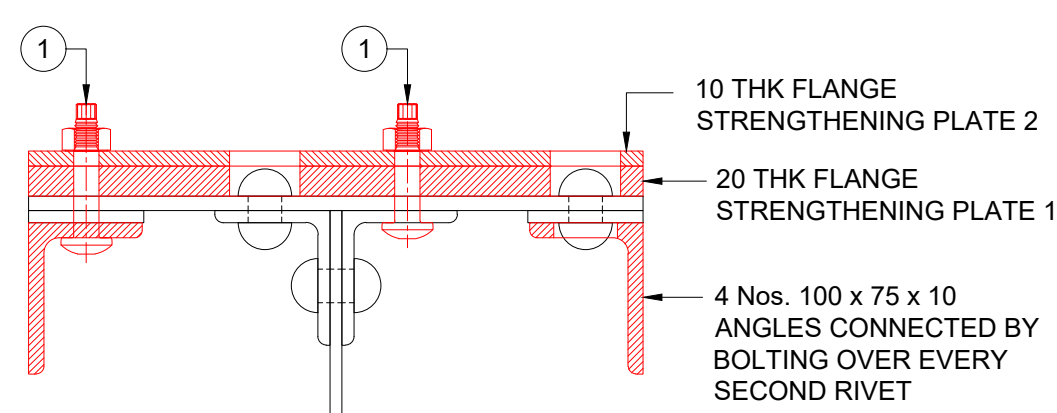


STRENGTHENED SECTION- TB MD
SCALE: 1:5
(NORTH TRUSS)

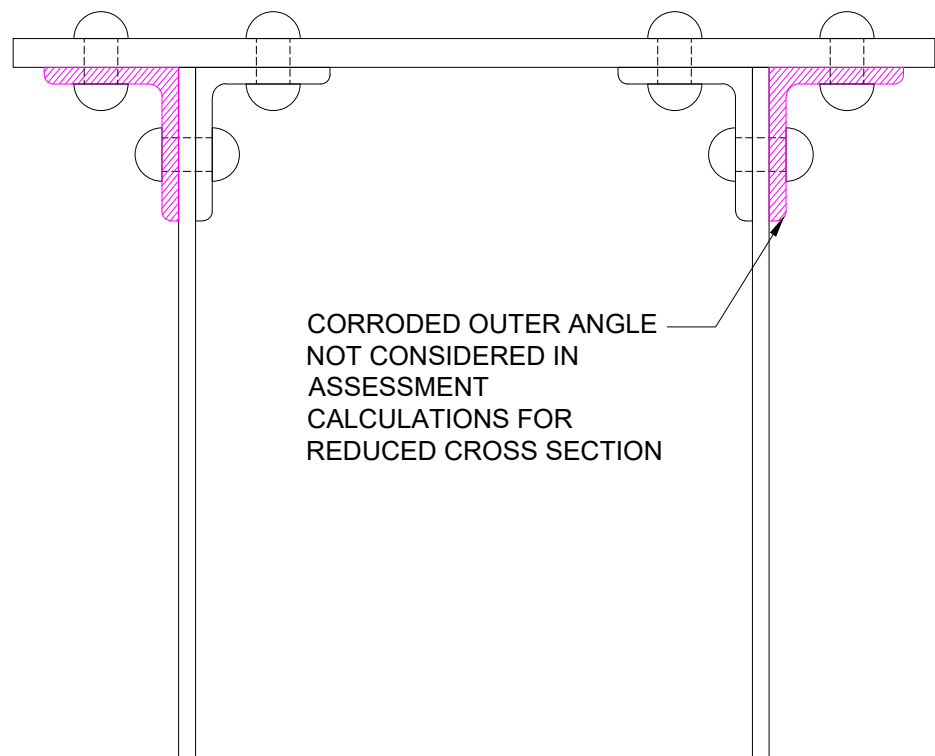


CORRODED OUTSTANDING LEG
OF ANGLE NOT CONSIDERED IN
ASSESSMENT CALCULATIONS
OF REDUCED CROSS SECTIONS

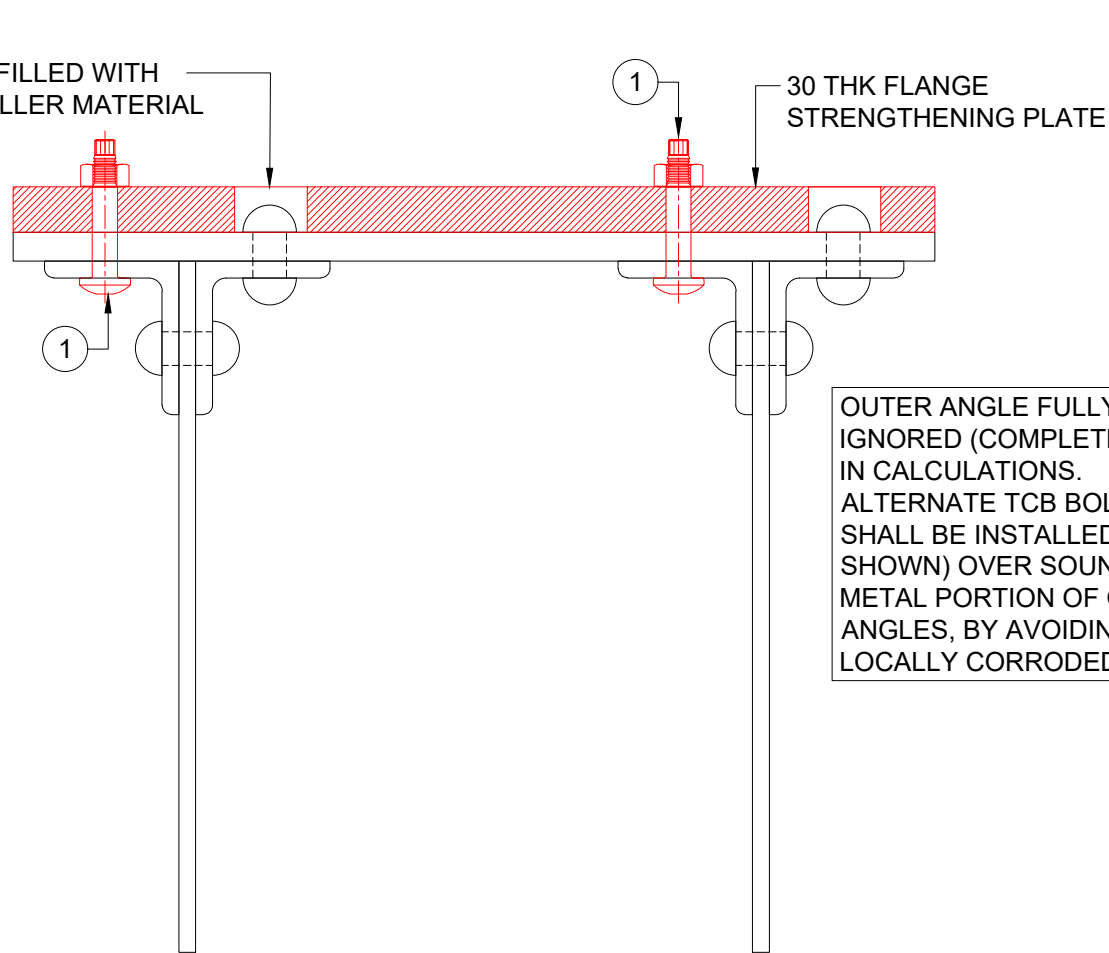
REDUCED SECTION- VER 406
SCALE: 1:5



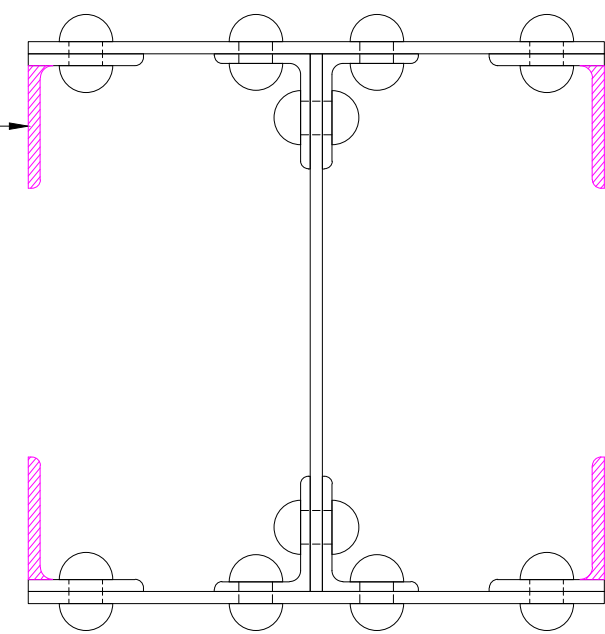
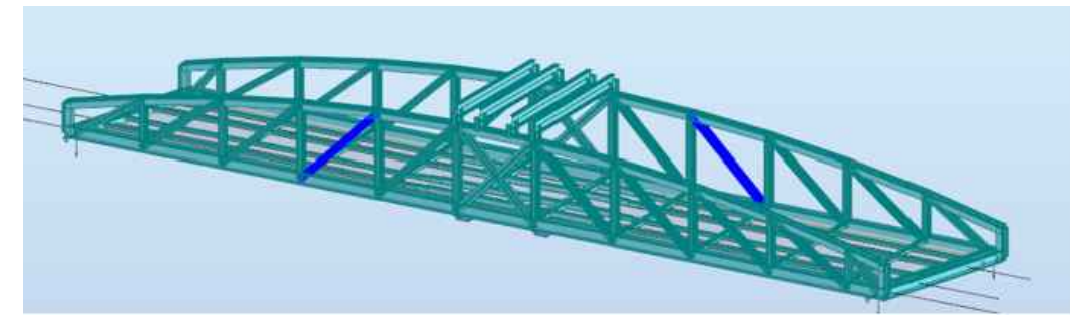
STRENGTHENED SECTION- VER 406
SCALE: 1:5



REDUCED SECTION- TB MD
SCALE: 1:5
(SOUTH TRUSS)

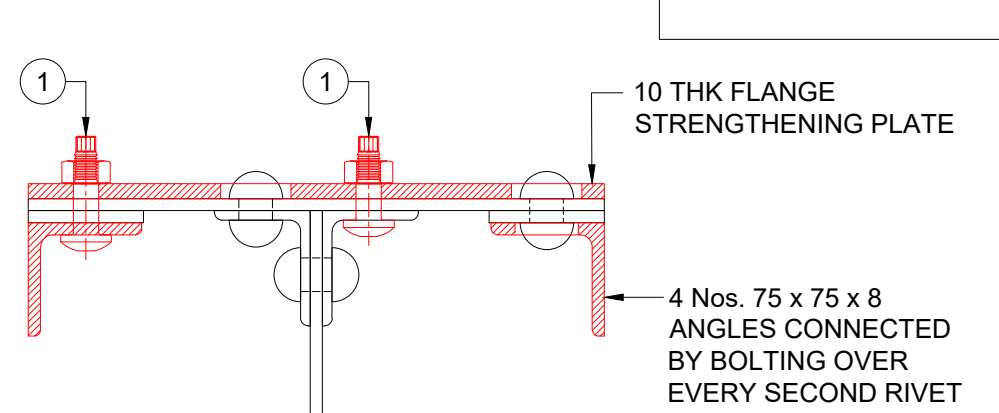


STRENGTHENED SECTION- TB MD
SCALE: 1:5
(SOUTH TRUSS)

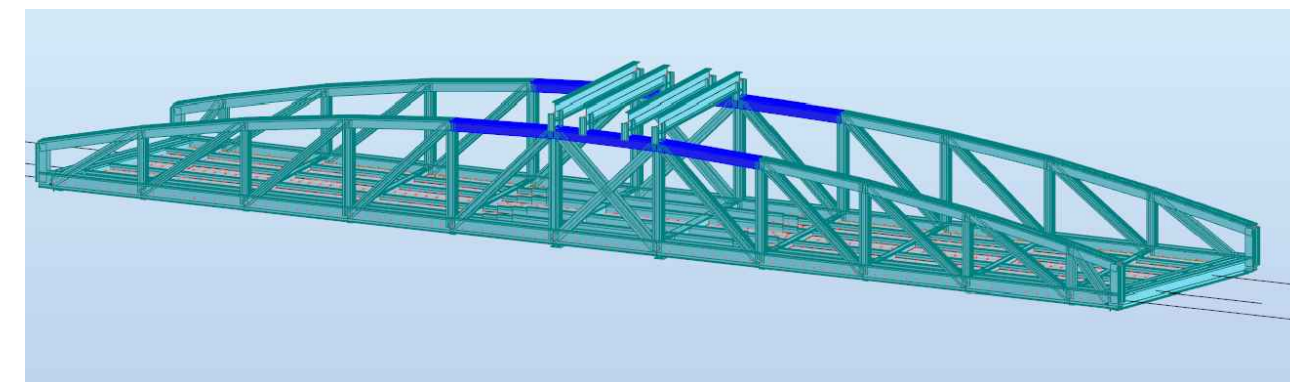


CORRODED OUTSTANDING LEG
OF ANGLE NOT CONSIDERED IN
ASSESSMENT CALCULATIONS
OF REDUCED CROSS SECTIONS

REDUCED SECTION- DIA 381
SCALE: 1:5



STRENGTHENED SECTION- DIA 381
SCALE: 1:5



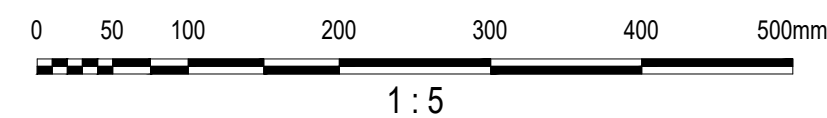
- LEGEND:-**
- PROPOSED STRENGTHENING STEELWORK
 - VER - VERTICAL TRUSS MEMBER
 - DIA - DIAGONAL TRUSS MEMBER
 - TB - TOP BOOM
 - MD - MIDSPAN REGION
 - NEW BOLT IN PRE DRILLED HOLE
 - EXISTING RIVET TO BE LEFT IN PLACE
 - PART OF SECTION NOT CONSIDERED TO BE EFFECTIVE STRUCTURALLY
 - L.O.S - LOSS OF SECTION

NOTES:

- ALL DIMENSIONS ARE IN MILLIMETRES AND LEVELS ARE IN METRES ADD UNLESS NOTED OTHERWISE.
- DO NOT SCALE OFF THIS DRAWING, USE FIGURED DIMENSIONS ONLY.
- OVERPLATE DIMENSIONS TO BE CONFIRMED BY THE GRIP5-8 CONTRACTOR VIA TEMPLATING ON SITE, PRIOR TO FABRICATION.
- RIVETS ARE NOT TO BE REMOVED, OTHER THAN THOSE INDICATED IN THE DRAWINGS - RIVETS ARE TO BE REMOVED BY APPROVED MECHANICAL TECHNIQUES WITHOUT DAMAGE TO EXISTING STRUCTURE (SEE NR/CIV/TUM/800 FOR GUIDANCE) FOLLOWING THE RIVETS REMOVAL, THE RIVETS HOLES ARE TO BE REAMED OUT TO 24mm DIA. AND REPLACED WITH TEMPORARY BOLTS. RIVET REMOVAL WORKS MIGHT BE UNDERTAKEN OUTSIDE OF POSSESSION ON A "ONE IN, ONE OUT" BASIS.
- ALL AREAS TO RECEIVE REPAIR PLATES TO BE PREPARED TO BARE METAL. WHERE A FLAT SURFACE CAN'T BE ACHIEVED, DEVCON CHEMICAL METAL "A" OR SIMILAR APPROVED MUST BE USED TO LEVEL THE SURFACE.
- THE CONTACT SURFACE SHOULD BE FREE OF LOCALISED CORROSION AND EDGES GROUND BACK TO SOUND METAL WITH THE AREA CLEANED TO PROVIDE A SOUND CONTACT SURFACE.
- REMOVAL OF RIVETS - AFTER THE REMOVAL OF THE RIVET, THE PERIPHERY OF THE HOLE SHOULD BE CHECKED FOR DAMAGE AND WHERE NECESSARY THE HOLE SHOULD BE DRESSED OR REAMED TO REMOVE THESE IMPERFECTIONS. ANY SERIOUS CRACKING SHOULD BE INVESTIGATED.
- SEALING OF EDGES - WHERE NEW PLATES ARE OFFERED UP AGAINST EXISTING PLATES, APPLY A SEALANT AROUND BOLT HOLES AND EDGES OF PLATES IN ACCORDANCE WITH NR SPECIFICATIONS. THE SEALANT IS TO BE COMPATIBLE WITH THE PROTECTIVE COATING SYSTEM.
- FOR THE LOCATION OF STRENGTHENING IN THE TRUSS, REFER TO DRAWINGS 152093-ARC-DRG-ECV-000030 AND 000039.

STEEL SPECIFICATION:-

- STEEL TO BE IN ACCORDANCE WITH BS EN 10025.
- ALL BOLTS TO BE TCBs CLASS HRC 10.9 TO BS EN 14399-10 UNLESS OTHERWISE STATED.
- STEELWORK SHALL COMPLY WITH BS EN 1090-2 FOR EXECUTION CLASS EXC3 AND TOLERANCE CLASS 2.
- ALL NEW STEELWORK TO BE S275 J2.
- ALL NEW STEELWORK TO BE COATED WITH N4 PROTECTIVE PAINT SYSTEM IN ACCORDANCE WITH NR/L3/CIV/039.



A02	12.06.2020	UPDATED TO DRN COMMENTS	T.A	B.K	J.L
A01	24.04.2020	FOR FORM 001 REVIEW	K.S	B.K	J.L
Rev	Date	Description of Revisions	Drawn	Chkd	Appr
Status					Suitability

FOR FORM 001 REVIEW



Contractor(s):



Project:

RIVER NEATH SWING
BRIDGE GRIP 4

Drawing Title:

STRENGTHENING OF
REDUCED SECTIONS (SPAN 4)
(SHEET 1 OF 2)

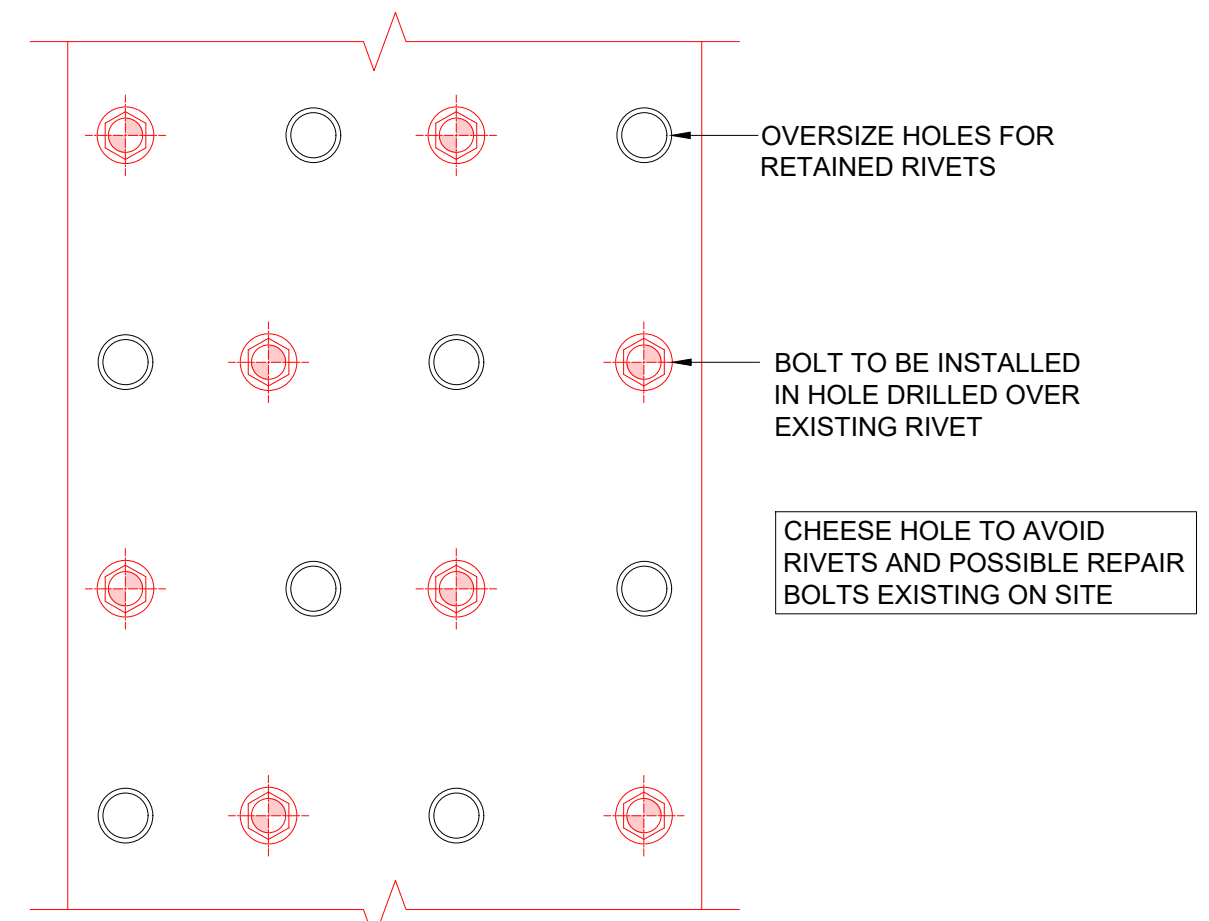
Designed	S. ALURU	Signed	S.A	Date	12.06.2020
Drawn	K. SRILEKHA	Signed	K.S	Date	12.06.2020
Checked	B. KING	Signed	B.K	Date	12.06.2020
Approved	J. LYNN	Signed	J.L	Date	12.06.2020

Scale(s)	AS SHOWN @ A1	ELR & Mileage	SDI1 207m 63ch
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Alternative Reference	152093	Sheet	1 of 2
Drawing Number	152093-ARC-DRG-ECV-000015	Revision	A02

TABLE: NOTE DESCRIPTION

ITEM	DESCRIPTION
①	TCB INSTALLED OVER EVERY SECOND RIVET IN A ROW
②	NEW TCB IN NEW HOLE



**TYPICAL PLAN OF STRENGTHENING
(VERTICALS / DIAGONALS / TOP BOOM / BOTTOM BOOM)**