



BILL OF MATERIALS									
SHOP BILL								MATERIAL ASTM A709-50 T2 U.N.O.	
LINE	SCO	SHIPPING PCS	ASSEMBLY PCS	MARK	SHAPE	DESCRIPTION	LENGTH	REMARKS	
							ft in	END EDGE DESCR	MATL GRADE
1									
2	ONE			M38A		TOP STRUT ASS'Y			
3									
4		ONE		x54a	C	12 x 20.7	12 5 1/2		
5		ONE		x54b	C	12 x 20.7	12 5 1/2		
6									
7	2			x39a	L	3 1/2 x 3 1/2 x 3/8	2 9 7/16		
8	ONE			x38a	L	4 x 3 1/2 x 3/8	2 9 7/16		
9	ONE			x38b	L	4 x 3 1/2 x 3/8	2 9 7/16		
10									
11	ONE			x49a	PL	3/8 x 9 1/2	2 9 7/16		
12	ONE			x49b	PL	3/8 x 7 1/2	2 9 7/16		
13	ONE			x50a	PL	3/8 x 22 1/8	2 9 7/16		
14	ONE			x50b	PL	3/8 x 22 1/8	2 9 7/16		
15	2			x46a	PL	3/8 x 22	2 2 7/16		
16									
17	3			x47a	PL	5/8 x 26 7/16	2 10		
18	ONE			x47b	PL	5/8 x 26 7/16	2 10		
19									
20	47			sb7-275	BOLT	7/8 #	2 3/4	Incl 1 wa 1 bar wa	A325
21	20			sb7-25	BOLT	7/8 #	2 1/2	Incl 1 wa 1 bar wa	A325
22									
23	4			jb7-2	BOLT	7/8 #	2		A307
24	4			jb7-225	BOLT	7/8 #	2 1/4		A307
25	8			jb7-25	BOLT	7/8 #	2 1/2		A307
26									
27									
28									
29									
30									

ALL HOLES TO BE PUNCHED U.N.O.

- LEGEND:**
- ⊕ = CENTERLINE
 - CTR'D = CENTERED
 - C/C = CENTER TO CENTER
 - FLG = FLANGE
 - TOP = TOP
 - BTM = BOTTOM
 - RDFH = RUNNING DIMENSIONS FROM HERE
 - ⊕ = FIELD BOLTS (QUANTITY) DIAMETER x LENGTH
 - ⊕ = ALTERNATE HOLE DIAMETER
 - TYP = TYPICAL
 - N/S = NEAR SIDE
 - F/S = FAR SIDE
 - B/S = BOTH SIDES
 - BTS = BOLT TO SHIP
 - SHP'G BOLT = SHIPPING BOLT
 - ⊕ = SHIPPING BOLT
 - D.O.R. = DIRECTION OF ROLL
 - T2 = CHARPY V-NOTCH TESTING REQUIRED
 - F2 = FRACTURE CRITICAL MATERIAL
 - ⊕ = FIELD DRILLED HOLE
 - ⊕ = FIELD DRILLED HOLE

- PAINT NOTES:**
- ALL ITEMS THIS SHEET TO RECEIVE UPPER STEEL PAINT SYSTEM PER GN1.
 - CLEAN AND PRIME BOLTED PARTS PRIOR TO ASSEMBLY.
 - PRIMER ONLY, WITHIN 3" FROM ALL OPEN HOLES, (A307) SHIPPING BOLTS AND NUTS OR TO NEAREST EDGE OR PERPENDICULAR SURFACE (WHICHEVER IS LESS) UNLESS SPECIFICALLY NOTED OTHERWISE.
 - ALL TORQUED BOLTS TO RECEIVE COMPLETE PAINT SYSTEM NOTED. NO PAINT ON (A307) SHIPPING BOLTS AND NUTS.

- NOTES:**
- FOR GENERAL NOTES SEE DRAWING GN1.
 - ALL BOLTS THIS SHEET TO BE FULLY TORQUED UNLESS NOTED AS (A307) SHIPPING BOLTS.
 - INSTALL WASHER UNDER HEAD OF BOLT AS WELL AS NUT. ADDITIONAL WASHER IS NOT REQUIRED FOR (A307) SHIPPING BOLTS.
 - ALL HOLES MARKED "⊕" OR "⊕" ARE TO BE FIELD DRILLED HOLES. DO NOT SHOP DRILL.

ALL DIMENSIONS HAVE BEEN FIELD VERIFIED
BY: _____ DATE: _____

ONE REQ'D ~ Mk. M38A

LIFTING WEIGHT
?
lbs

- NO EXCEPTION TAKEN
- REJECTED
- MAKE CORRECTIONS NOTED
- REVISE AND RESUBMIT
- SUBMIT SPECIFIED ITEM

CHECKING IS ONLY FOR GENERAL CONFORMANCE WITH THE DESIGN CONCEPT OF THE PROJECT AND GENERAL COMPLIANCE WITH THE INFORMATION GIVEN IN THE CONTRACT DOCUMENTS. ANY ACTION SHOWN IS SUBJECT TO THE REQUIREMENTS OF THE PLANS AND SPECIFICATIONS. CONTRACTOR IS RESPONSIBLE FOR DIMENSIONS WHICH SHALL BE CONFIRMED AND CORRELATED AT THE JOB SITE; FABRICATION PROCESSES AND TECHNIQUES OF CONSTRUCTION; COORDINATION OF HIS WORK WITH THAT OF ALL OTHER TRADES AND THE SATISFACTORY PERFORMANCE OF THE WORK.

DATE 5/9/12 BY PKR / dl

A	04/20/12	RC	FOR APPROVAL	REVISION
NO.	DATE	BY		
STS STEEL, INC. ENGINEERS * FABRICATORS * ERECTORS PH: (518) 370-2693 FAX: (518) 370-2696				
DRAWING TITLE UPPER STEEL (TS11 @ U4)				
PROJECT No. US RT 2 BRIDGE No 24 FEDERAL AID No.				
ENGINEER: CHA				
CUSTOMER: Harrison & Burrowes Bridge Constructors, Inc.				
PROJECT: RICHMOND, VT - TRUSS BRIDGE REHAB				
RICHMOND, VT				
HOLS:	15/16" # U.N.O.	PAINT:	PER SPEC	DATE: 03/26/12
BOLTS:	A325 U.N.O.	DR.BY:	PG	JOB NO. 1156
WELDS:	AWS D1.5	CHK.BY:	SG	DWG NO. 38

