

Coversheet for:

Kaikor Construction

Project: FRP Walkways & Ladder
Honolulu, HI

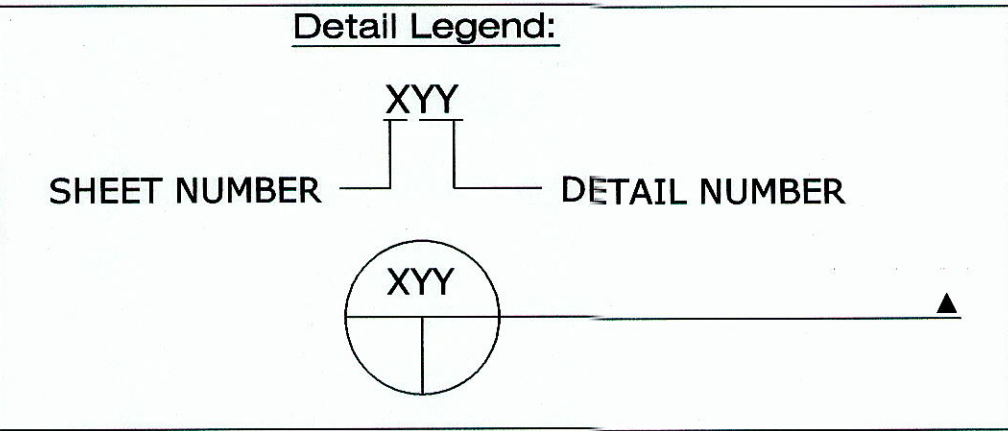
In addition to field connections shown, corrections of minor misfits and a reasonable amount of cutting is considered as a part of erection. Any error which prevents assembly by moderate use of cutting is to be received and approval of correction or change is to be received in writing before proceeding.

Failure to Comply will relieve
Fibergrate Composite Structures, Inc.
of Responsibility.

DRAWING INDEX	
Sheet	1. Coversheet
	2. Bridge @ Bent 12 & 13
	3. Roadway @ Ladder 1 & 2
	4. Details

GENERAL NOTES

- ALL GRATING TO BE HELD DOWN WITH FIBERGRATE'S SS316 HOLD-DOWN CLIPS (HDCS); 4-6 HDCS PER GRATING PIECE. OPEN MESH GRATING MAY BE LEFT UN-HELD IN CASE OF NARROW TRENCHES BUT COVERED GRATING SHOULD BE HELD DOWN IN ALL CASES AND IN ALL SUPPORT CONDITIONS. IN CASE OF CONCRETE-EMBED-ANGLE SUPPORT, CONCRETE-ANCHORS MAY HAVE TO BE USED IN CONJUNCTION WITH HDCS.
- FIBERGRATE'S SQUARE MESH MOLDED GRATING IS BI-DIRECTIONAL. FIBERGRATE'S RECTANGULAR MESH MOLDED GRATING IS TO BE TREATED AS UNI-DIRECTIONAL. FIBERGRATE'S PULTRUDED GRATING IS UNI-DIRECTIONAL.
- CUT GRATING MAY HAVE OPEN STUB BARS.
- FIBERGRATE'S STANDARD SQUARE TUBE GUARDRAIL SYSTEM CONSISTS OF 2-1/8" X 2-1/8" X 3/16" SQUARE TUBE POSTS, 1-3/4" X1-3/4"X1/8" SQUARE TUBE RAILS AND A 4" TALL KICKPLATE.
- FIBERGRATE'S STANDARD FIXED LADDER SYSTEM CONSISTS OF 1-3/4" X 1-3/4" X 1/4" SQUARE TUBE RAILS AND 1-1/4" DIAMETER FLUTED RUNGS. SAFETY CAGES ARE PROVIDED WHEN REQUIRED.
- ALL SHOP CUT EDGES AND DRILLED HOLES TO BE RESIN SEALED PRIOR TO SHIPPING.
- SOME FIELD FABRICATION MAY BE REQUIRED, ALL FIELD CUT EDGES AND DRILLED HOLES TO BE SEALED USING BILL OF MATERIALS PART NO. A.
- ALL F.R.P. MEMBERS SHALL BE FABRICATED BY FIBERGRATE INTO SUBASSEMBLIES TO FACILITATE FIELD ERECTION. THE F.R.P. WALKWAYS, HANDRAILS & STRINGERS SHALL BE SHOP FABRICATED AND SHOP ASSEMBLED INTO THE LARGEST PRACTICAL SIZE SUITABLE FOR TRANSPORTATION.
- IT SHALL BE THE FIELD'S RESPONSIBILITY TO ASSURE PROPER FIT-UP OF F.R.P. ASSEMBLIES. THIS INCLUDES VERIFICATION OF AS-BUILT CONDITIONS. IN CASE OF CONCRETE MISALIGNMENT INCORRECTLY PLACED OR MISSING EMBEDS., THE FIELD SHALL MODIFY THE F.R.P. SUBASSEMBLIES AND PROVIDE THE REQUIRED ANCHORAGES.
- CUTTING, FITTING, AND PLACEMENT: PERFORM CUTTING DRILLING, AND FITTING REQUIRED FOR INSTALLATION OF F.R.P. FABRICATIONS. SET F.R.P. FABRICATION ACCURATELY IN LOCATION ALIGNMENT, AND ELEVATION; WITH EDGES AND SURFACES LEVEL, PLUMB, TRUE, AND FREE OF RACK; AND MEASURED FROM ESTABLISHED LINES AND LEVELS.
- ALL ANCHOR BOLTS TO BE PROVIDED (BY OTHERS) .
- CONTRACTOR TO ENSURE THAT GRATING IS SUPPORTED AT INTERVALS AS DETERMINED FROM JOB SPECIFICATIONS AND FIBERGRATE'S PUBLISHED GRATING-LOAD-DEFLECTION CHARTS.
- ALL DIMENSIONS TO BE VERIFIED BY CONTRACTOR. CONTRACTOR ALSO TO VERIFY DIMENSIONS WHERE NOTED.



REFERENCE ONLY

"These drawings are for approval only, and are not intended for use as fabrication drawings"

CONTRACTOR TO VERIFY
ALL DIMENSIONS

LEGEND:

NO.	BY	DATE	REVISION	CHKD. BY	DATE
3					
2					
1					
0	VS	01/04/09	APPROVAL	MSR/CS	01/04/09

FABRICATION TOLERANCES (U.N.O.)			
	MOLDED GRATING	PULTRUDED GRATING	DYNAFORM SHAPES
LENGTH	+1/8, -5/16	+1/8	+1/8
WIDTH	+1/8, -5/16	+1/8	+1/8
HOLE LOC.	+1/16	+1/16	+1/16
CIRC. CUTS	+3/16	+3/16	N/A
NOTCHES	+1/8	+1/8	N/A
SQUARE OF CUT	1°	1°	2°
ANGULARITY	±2	±2	±2

DO NOT STACK TOLERANCES

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GRATING: CORVEX 1" DEEP 1 1/2" SQ. MESH MOLDED GRATING	
COLOR: DK. GRAY	SURFACE: MENISCUS
TREADS:	
COLOR:	
DYNAFORM SHAPES: ISOFR	DYNAFORM GUARDRAIL: ISOFR
COLOR: SL. GRAY	COLOR: YELLOW
HARDWARE: 316 SS	GRATING H.D.C. ASSYS.: M-5
COATING:	PLAT SHEET:
REFERENCE DWGS.:	

CONTRACTOR: Kaikor Construction			
DRAWN BY: VS		DATE: 12/30/09	STRUCTURAL DESIGNER: Ethan Love P.E.
PROJECT COORDINATOR: R. Carter		P.O. NO.: 382-06	Cust NO.: 000425
Fibergrate Composite Structures Inc. Fiberglass Grating • Structurals • Fabrication		W.O. NO.: 724417	SCALE: N.T.S.
Fibergrate Composite Structures 900 FM 205 • STEPHENVILLE, TEXAS 76401		DWG. SHT.: 1 OF 4	

D

C

B

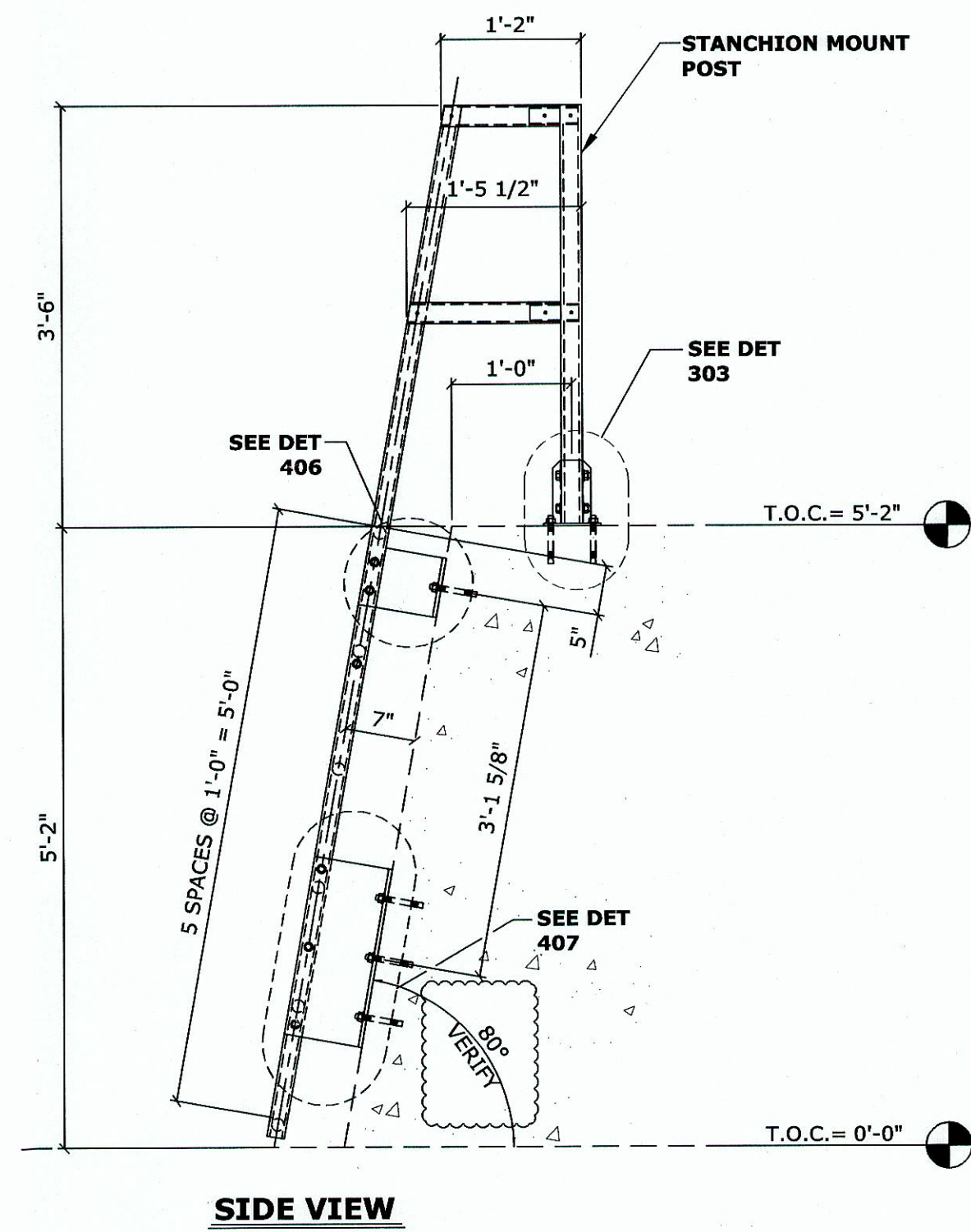
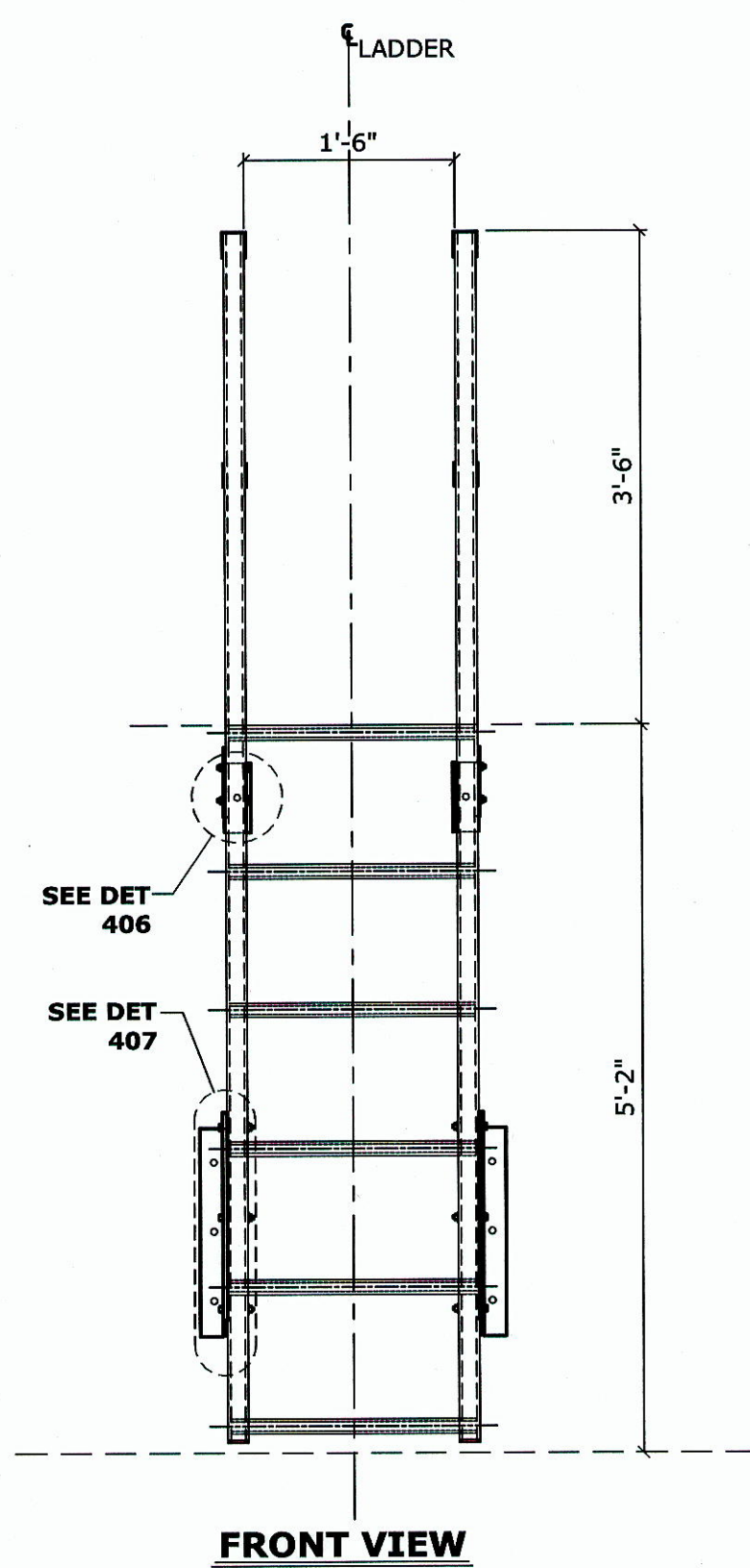
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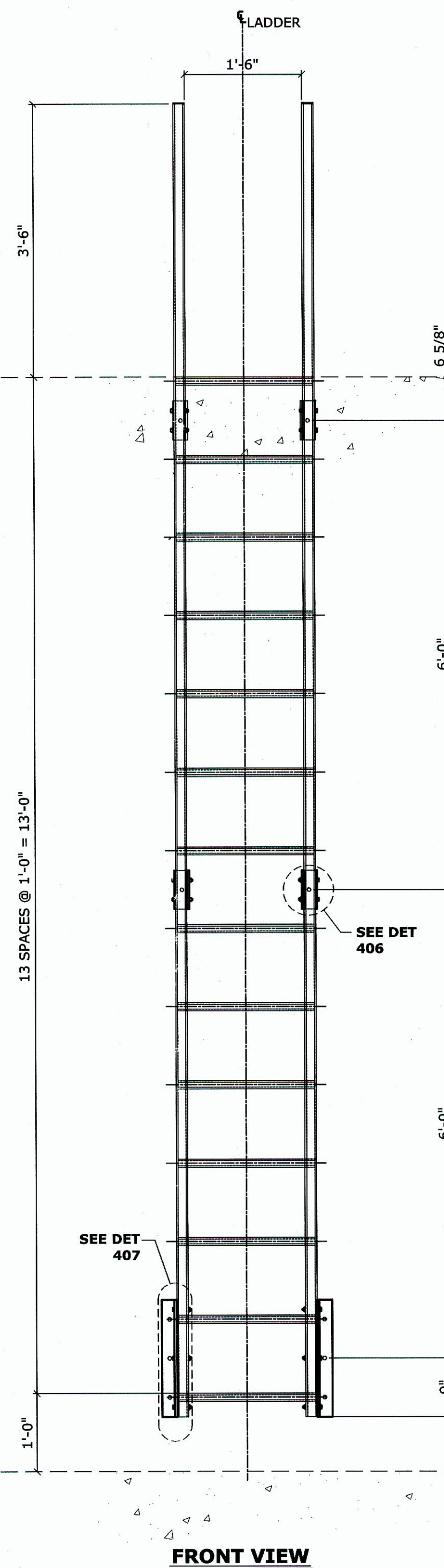
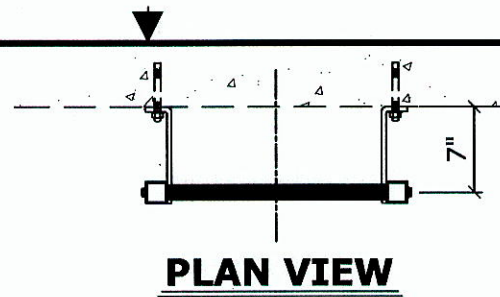
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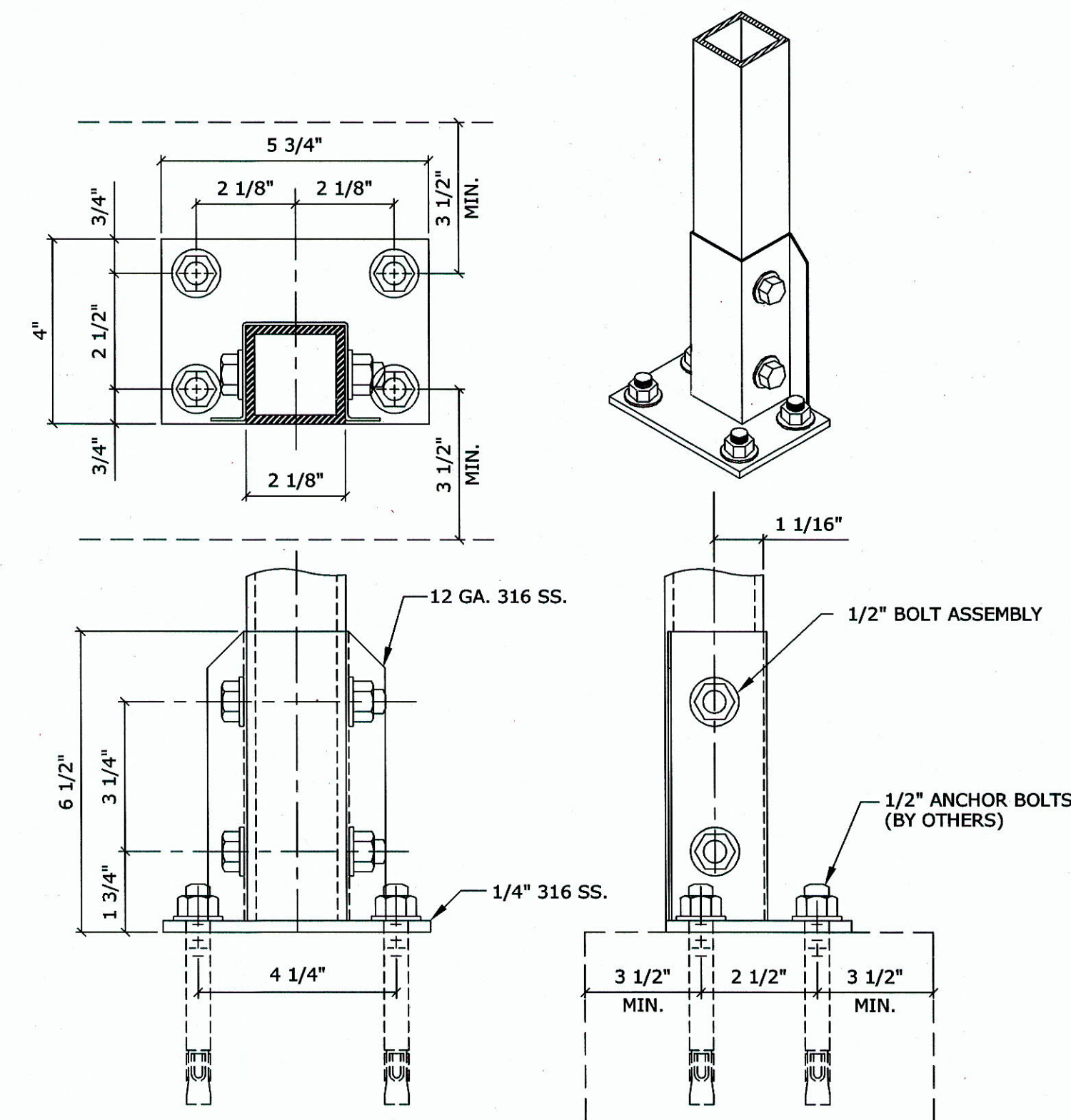
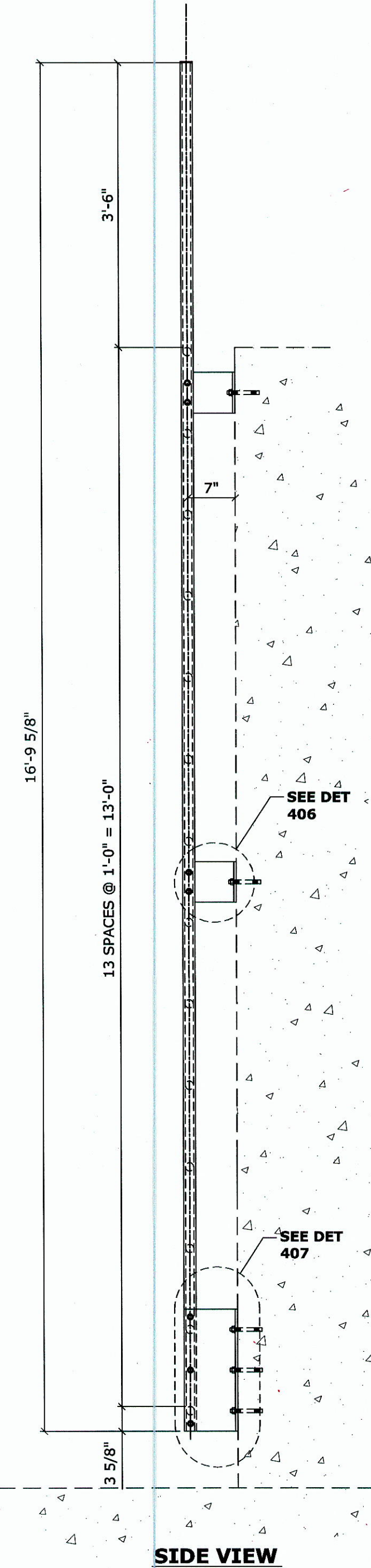
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301 ROADWAY LADDER - 1
ASSEMBLY 1000000 - 1 AREA REQUIRED



302 ROADWAY LADDER - 2
ASSEMBLY 1000000 - 1 AREA REQUIRED



303 DETAIL - STANCHION BASE

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2					
1					
0	VS	01/04/10	APPROVAL	MSR/CS	01/04/10

FABRICATION TOLERANCES (U.N.O.)		
	MOLDED GRATING	PULTRUDED GRATING
LENGTH	+1/8, -5/16	+1/8
WIDTH	+1/8, -5/16	+1/8
HOLE LOC.	+1/16	+1/16
CIRC. CUTS	+3/16	+3/16
NOTCHES	+1/8	+1/8
SQUARE OF CUT	+1"	+1"
ANGULARITY	+2	+2

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REFERENCE DWGS.: DESIGN DRAWINGS		

REFERENCE ONLY

Kaikor Construction

CONTRACTOR: VS DATE: 01/04/10 STRUCTURAL DESIGNER: Ethan Love P.E. PROJECT COORDINATOR: R. Carter

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Composite Structures

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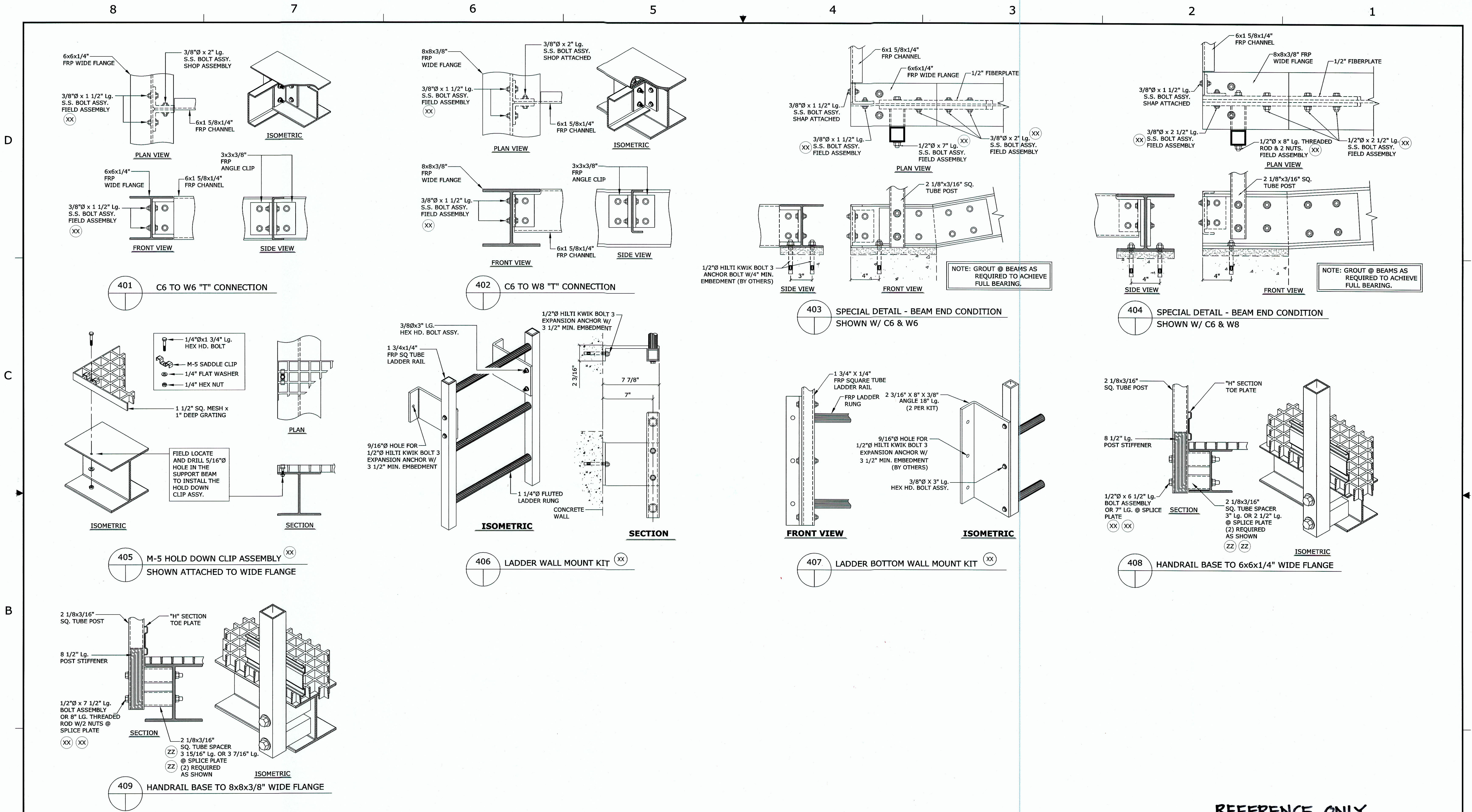
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ANGULARITY	#2	#2	#2

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REFERENCE ONLY

CONTRACTOR: Kaikor Construction

DATE: 01/04/10

STRUCTURAL DESIGNER: Ethan Love P.E.

PROJECT COORDINATOR: R. Carter

P.O. NO.: 382-06

Cust No.: 000425

W.O. NO.: 724417

SCALE: N.T.S.

DWG. SHT.: 4 OF 4

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