JVA Job# 15578, Pedestrian Bridge, Beaumont CA

STRUCTURAL GENERAL NOTES

DESIGN LOADS: AASHTO GUIDE SPECIFICATIONS FOR DESIGN OF PEDESTRIAN BRIDGES
AASHTO LRFD BRIDGE DESIGN SPECIFICATIONS (5TH EDITION 2010)

Live Load:	Pedestrian	85 psf
	Piping	400 plf
Wind:		
	Prescribed Wind (min)	75 psf per (AASHTO Section 3.8.1.2) Applied to Surface Area of Truss Members

Seismic:

Spectral Response		Acceleration	Coefficient	
	Short Period	S_S 1.50g	S_{DS}	1.0g
	One Second	S_1 0.60g	S_{D1}	0.60g
Soils Site Class		D		
Seismic Design Category		D		
Design Base Shear		48 kips		
Seismic Response Coefficient(s)		C_S 0.333		
Response Modification Factor(s)		R 3.0		
Analysis Procedure		Equivalent Lateral Force		

REINFORCED CONCRETE:
Design is based on ACI 318-05 "Building Code Requirements for Reinforced Concrete." Concrete work shall conform to ACI 301-05 "Standard Specifications for Structural Concrete."

Structural concrete shall have the following properties:

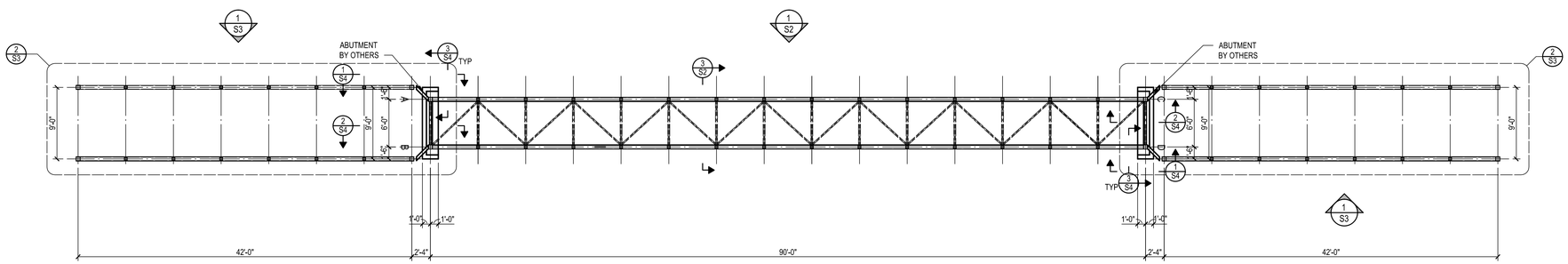
Intended Use	f'c, psi 28day	Max W/C Ratio	Maximum Aggregate	Slump, inches (±1")	Entrained Air, percent (±1.5%)	Cement Type	Admixtures, Comments
Precast Plank	4,000	0.45	3/4" Stone	4"	2	I/II	

Detailing, fabrication, and placement of reinforcing steel shall be in accordance with ACI 315-05 "Details and Detailing of Concrete Reinforcement."
Except as noted on the drawings, concrete protection for reinforcement in cast-in-place concrete shall be as follows:
Exposed to earth or weather:
#5 bar, W31 or D31 wire, and smaller 1-1/2"

STRUCTURAL STEEL:
Structural steel shall be detailed, fabricated, and erected in accordance with the "Specification for Structural Steel Buildings" (AISC 360-05) and the "Code of Standard Practice for Steel Buildings and Bridges" (AISC 303-05) by the American Institute of Steel Construction (AISC). Hollow structural section (HSS) Square and Rectangular shapes shall conform to ASTM A500-03a, Grade B (46 ksi yield).
Rolled shapes, including plates, and angles shall conform to ASTM A36-04, 36 ksi yield.
Welding shall be done by a certified welder in accordance with the AISC documents listed above, the American Welding Society (AWS) D1.5: 2008 Bridge Welding Code, and the recommendations for use of weld E70 electrodes. Where not specifically noted, minimum weld shall be 1/4" fillet by length of contact edge.
High performance corrosion resistant paint is to be used on the structure after all welding is completed.

FIELD VERIFICATION OF EXISTING CONDITIONS:
The General Contractor shall thoroughly inspect and survey the existing structure to verify conditions that affect the work shown on the drawings.
The General Contractor shall report any variations or discrepancies to the Civil Engineer/Owner and Structural Engineer before proceeding

STRUCTURAL ERECTION AND BRACING REQUIREMENTS:
The Structural Drawings illustrate and describe the completed structure with elements in their final positions, properly supported, connected, and/or braced.
The Structural Drawings illustrate typical and representative details to assist the General Contractor. Details shown apply at all similar conditions unless otherwise indicated. Although due diligence has been applied to make the drawings as complete as possible, not every detail is illustrated and not every exceptional condition is addressed.
All proprietary connections and elements shall be installed in accordance with the manufacturers' recommendations.
All work shall be accomplished in a workmanlike manner and in accordance with the applicable codes and local ordinances.
The General Contractor is responsible for coordination of all work, including layout and dimension verification, materials coordination, shop drawing review, and the work of subcontractors. Any discrepancies or omissions discovered in the course of the work shall be immediately reported to the Civil Engineer/Owner and Structural Engineer for resolution. Continuation of work without notification of discrepancies relieves the Civil Engineer/Owner and Structural Engineer from all consequences.
Unless otherwise specifically indicated, the Structural Drawings do not describe methods of construction.
The General Contractor, in the proper sequence, shall perform or supervise all work necessary to achieve the final completed structure, and to protect the structure, workmen, and others during construction. Such work shall include, but not be limited to temporary bracing, shoring for construction equipment, shoring for excavation, formwork, scaffolding, safety devices and programs of all kinds, support and bracing for cranes and other erection equipment.
Temporary bracing shall remain in place until all floors, walls, roofs and any other supporting elements are in place.
The Civil Engineer/Owner and Structural Engineer bear no responsibility for the above items, and observation visits to the site do not in any way include inspections of these items.



FRAMING PLAN

1/8"=1'-0

0 2' 4' 8' 16'

REACTIONS (kips)								
TYPE	A		B		C		D	
	GRAVITY	LATERAL	GRAVITY	LATERAL	GRAVITY	LATERAL	GRAVITY	LATERAL
DEAD*	26		26		26		26	
LIVE	11.5		11.5		11.5		11.5	
WIND	±8	±6	±8	±6	±8	±6	±8	±6
SIESMIC	±5.8	±12	±5.8	±12	±5.8	±12	±5.8	±12

* INCLUDES PIPING AND WATER

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90'-0 BROOKSIDE PEDESTRIAN BRIDGE
BEAUMONT, CA

DESIGNED BY:	MJM
DRAWN BY:	HMH
CHECKED BY:	TSS
JOB #:	15578
DATE:	10/16/12

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PARAGON BRIDGE WORKS
19240 US HIGHWAY 85
GILCREST, CO 80623
(970)737-1174

GENERAL NOTES & FRAMING PLAN

SHEET NO.
S1

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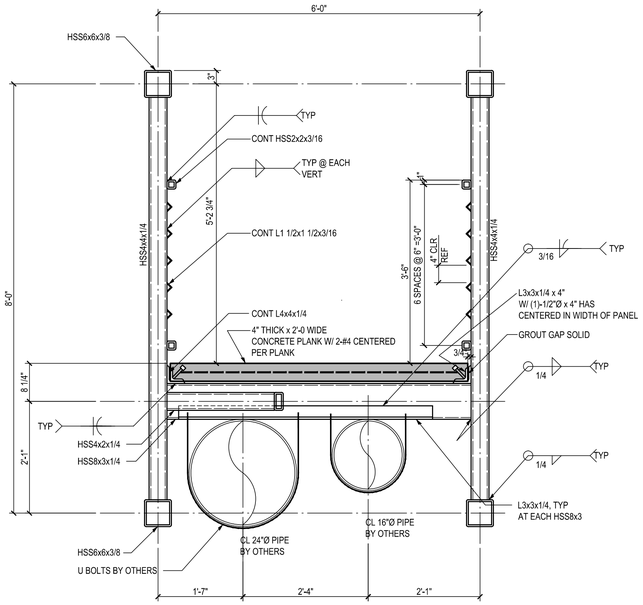
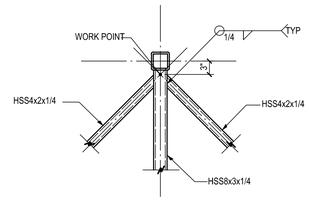
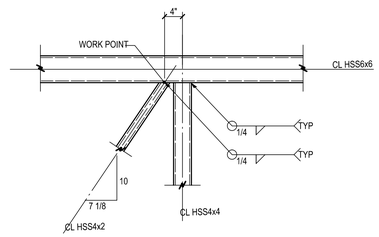


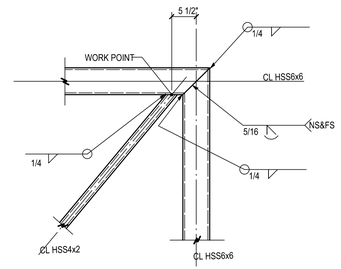
3 / S2 SECTION
3/4"=1'-0



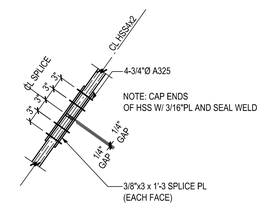
8 / S2 SECTION
3/4"=1'-0



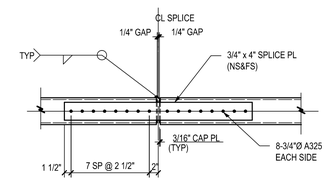
4 / S2 SECTION
3/4"=1'-0



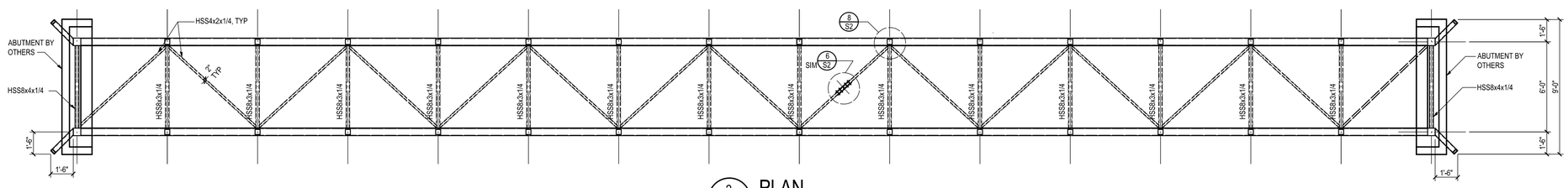
5 / S2 SECTION
3/4"=1'-0



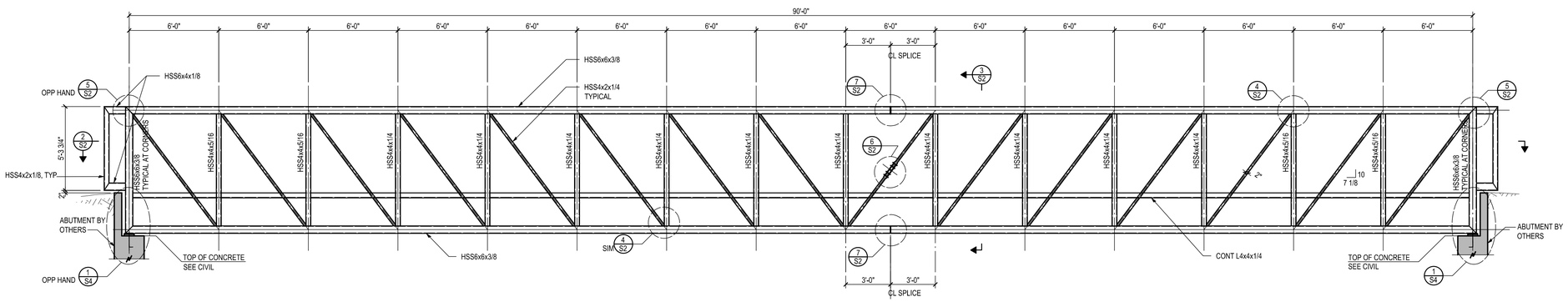
6 / S2 SECTION
3/4"=1'-0



7 / S2 SECTION
3/4"=1'-0



2 / S2 PLAN
1/4"=1'-0



1 / S2 ELEVATION
1/4"=1'-0

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ELEVATION AND SECTIONS

SHEET NO.
S2

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