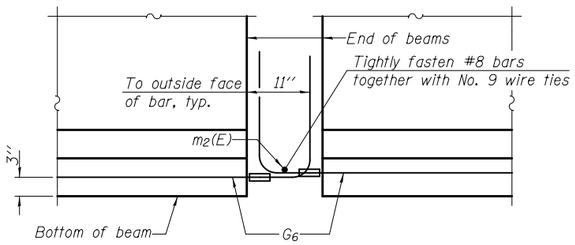
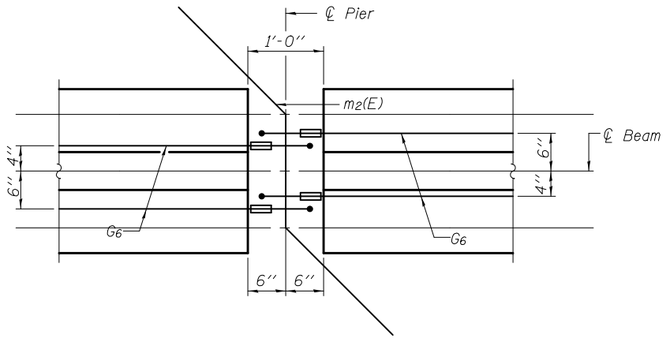
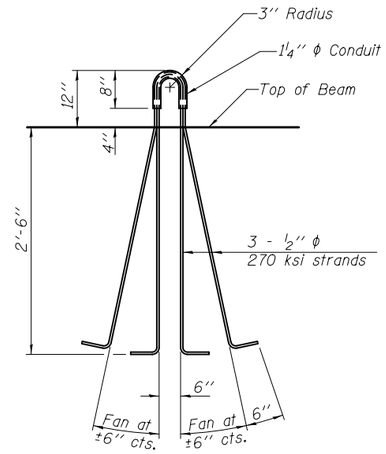


ELEVATION OF BEAM AT PIER



PLAN OF BEAM AT PIER



LIFTING LOOP DETAIL

NOTES

Inserts for ¾'' ϕ threaded dowel rods, when specified, are to be two strut, ferrule type for interior beams and single ferrule, flared loop type for exterior beams.

Prestressing steel shall be uncoated high strength, low relaxation 7-wire strand, Grade 270. The nominal diameter shall be ½'' and the nominal cross-sectional area shall be 0.153 sq. in.

Reinforcement bars shall conform to ASTM A 706, Grade 60.

A minimum 2½'' ϕ lifting pin shall be used to engage the lifting loops during handling.

Tilt G_6 bars when necessary to maintain 1½'' clearance.

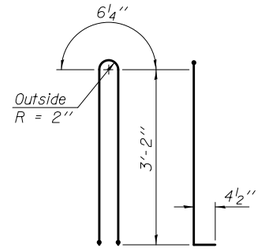
The top and bottom plates shall be AASHTO M270 Grade 50.

The bottom plates shall be galvanized according to AASHTO M111. Top plates and threaded rods need not be galvanized.

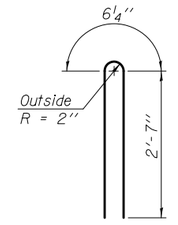
Threaded rods shall be ASTM F 1554 Grade 55.

The G_6 bar assembly shall be capable of developing 125 percent of the yield strength of the grade 60 reinforcement bar components. The assembly shall allow completion of the splice without turning of the hook bar. The hook bar shall be threaded such that the entire coupler can be threaded onto the hook bar.

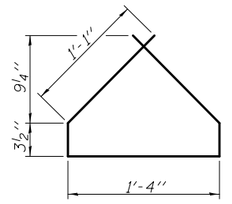
Beams requiring G_6 bar assemblies shall not be released from the fabricator until they have attained 45 days of age or older.



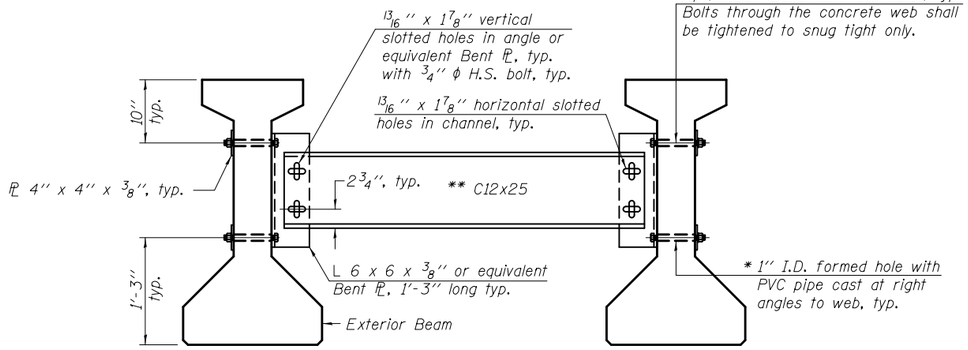
BAR G1

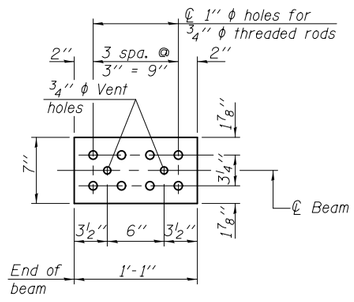


BAR G2

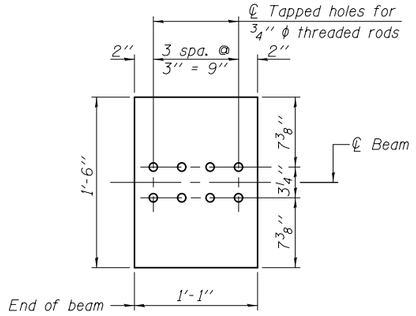


BAR G4





TOP PLATE



BOTTOM PLATE

See bearing details for pintle hole locations when required.

Notes:

All material for bracing shall be hot dip galvanized according to AASHTO M111 unless otherwise noted.

Two hardened washers are required for each set of oversized holes.

All holes shall be 15/16''ϕ unless otherwise noted.

5/16'' x 3'' x 3'' plate washers are required over all slotted holes.

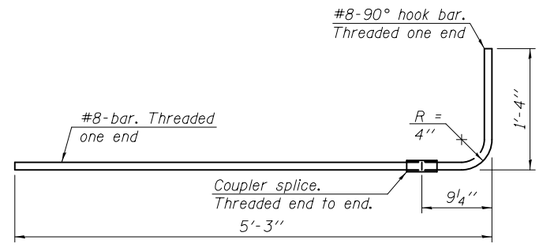
All bolts shall be galvanized according to AASHTO M232.

Bracing shall be installed as beams are erected and tightened as soon as possible during erection.

Permanent bracing shall not be paid for separately, but shall be included in the cost of Furnishing and Erecting Precast Prestressed Concrete I-Beams.

* Fabricator shall locate to miss strands within permissible tolerances.

** Alternate C12x30 channels are permitted to facilitate material acquisition.



G6 BAR ASSEMBLY

PERMANENT BRACING DETAILS
FOR 36'' PPC I-BEAMS

BILL OF MATERIAL

Item	Unit	Total
Furnishing and Erecting Precast Prestressed Concrete I-Beams, 36''	Ft.	718.5

PI-4-36D 1-28-11

DESIGNED - MARK D. SHAFFER	EXAMINED	DATE - JANUARY 24, 2014	STATE OF ILLINOIS DEPARTMENT OF TRANSPORTATION	36'' PPC I-BEAM DETAILS STRUCTURE NO. 100 – 0081	F.A.U. RTE.	SECTION	COUNTY	TOTAL SHEETS	SHEET NO.
CHECKED - STEPHEN M. RYAN					9588	39B-2	WILLIAMSON	224	111
DRAWN - MICHAEL B. MOSSMAN	PASSED	REVISED						CONTRACT NO. 78277	
CHECKED - F.T. / G.R.A.	ACTING ENGINEER OF BRIDGE DESIGN ACTING ENGINEER OF BRIDGES AND STRUCTURES	REVISED		SHEET NO. 18 OF 26 SHEETS			ILLINOIS	FED. AID PROJECT	