

STATE OF ILLINOIS
DEPARTMENT OF TRANSPORTATION

GENERAL NOTES

All structural steel shall conform to AASHTO Classification M-270 Gr. 36, unless otherwise noted.

Plan dimensions and details relative to existing plans are subject to nominal construction variations. The Contractor shall field verify existing dimensions and details affecting new construction and make necessary approved adjustments prior to construction or ordering of materials. Such variations shall not be cause for additional compensation for a change in scope of the work, however, the Contractor will be paid for the quantity actually furnished at the unit price bid for the work.

The contractor is advised that the existing PPC Deck Beams are in a deteriorated condition with reduced load carrying capacity. It is the contractor's responsibility to account for the condition of the beams when developing construction procedures.

If the contractor's procedure for existing beam removal or placement of new beams involves placement of cranes or other heavy equipment on the bridge, a detailed procedure shall be submitted to the Engineer for approval. The procedure shall include calculations, prepared and sealed by an Illinois Licensed Structural Engineer, verifying that the equipment and procedure used will not overstress the new or existing beams. To distribute load to multiple beams and protect the existing surface, in all cases a double layer mat of heavy timbers shall be used at all times under crane tracks or wheels and any outriggers in the down position. If necessary, shims shall be used under the crane mat to ensure uniform contact with the underlying beams. If heavy equipment will be placed on new PPC deck beams, the following shall be done prior to placement of the timber mats: placement and tightening of transverse tie assemblies, grouting and curing the dowel rods 24 hours minimum and grouting and curing the shear keys.

Any damage done to the bridge during beam removal shall be repaired by the Contractor. Cost to be included in the cost of Removal of Existing PPC Deck Beams.

The top surface of the beams shall be finished according to the IDOT Manual for Fabrication of Precast Prestressed Concrete Products.

Temporary concrete barrier shall only be anchored into the overlay and not into the PPC Deck Beams.

All structural steel shall be shop painted with the inorganic zinc rich primer per AASHTO M300, Type 1. Cost included with PPC Deck Beams.

The minimum thickness of the Concrete overlay shall be 4 1/2" and varies as required to adjust for the new profile grade and beam camber.

The deck surface shall have its final finish tined according to Article 420.09(e)(1) of the Standard Specifications. Cost included with Concrete Wearing Surface (5").

DESIGN STRESSES

PRECAST PRESTRESSED UNITS

$f'_c = 6,000$ psi

$f'_{ci} = 5,000$ psi

$f'_s = 270,000$ psi (1/2" ϕ low lax strands)

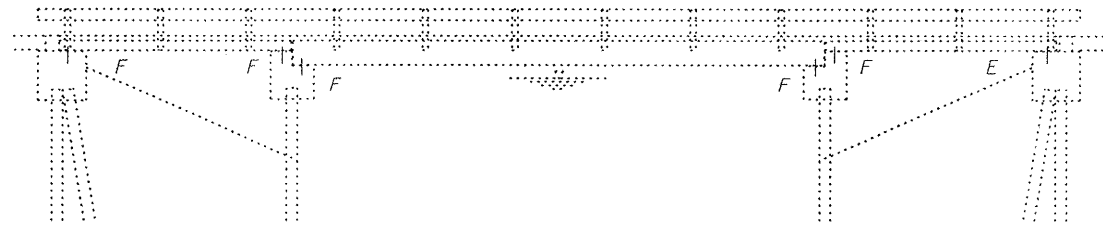
$f'_{si} = 201,960$ psi (1/2" ϕ low lax strands)

TOTAL BILL OF MATERIAL

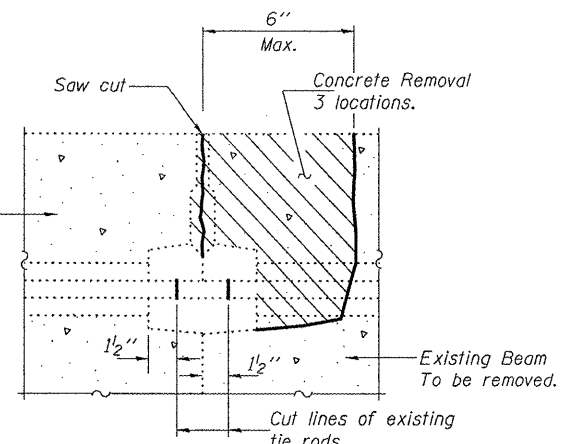
ITEM	UNIT	QUANTITY
Removal of Existing PPC Deck Beams	Sq. Ft.	972
Precast Prestressed Concrete Deck Beams (11" Depth)	Sq. Ft.	587
Precast Prestressed Concrete Deck Beams (27" Depth)	Sq. Ft.	379
Concrete Removal	Cu. Yd.	1.3
Concrete Wearing Surface (5")	Sq. Yd.	117
Reinforcement Bars, Epoxy Coated	Pound	1210
Removing & Re-erecting Existing Rolling	Foot	69
Mechanical Splicers	Each	102
Protective Coat	Sq. Yd.	117

**PLAN & ELEVATION
US ROUTE 67 OVER
FARMER'S FORK
SN 055-0027**

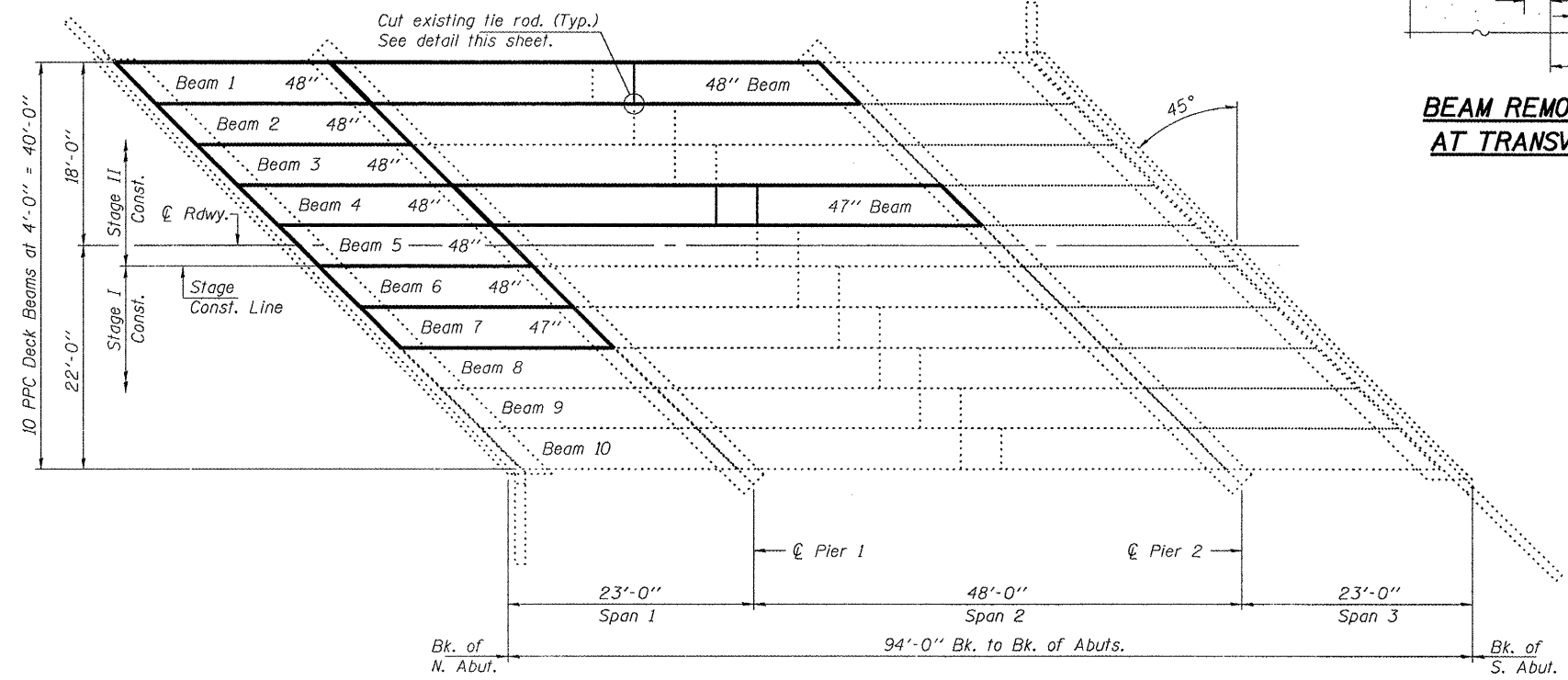
SHEET NO. 1	F.A.P. RTE.	SECTION	COUNTY	TOTAL SHEETS	SHEET NO.
7 SHEETS	310	-	McDONOUGH	16	10
FED. ROAD DIST. NO.			ILLINOIS FED. AID PROJECT		



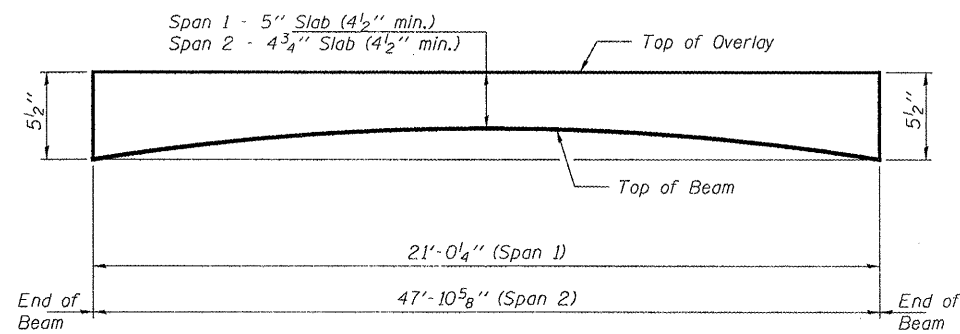
ELEVATION



**BEAM REMOVAL DETAIL
AT TRANSVERSE TIES**



PLAN



ANTICIPATED INITIAL CAMBER DIAGRAM



Expires: November 30, 2010

DESIGNED: Alan J. Hallogay
CHECKED: [Signature]
DRAWN: Kyle M. Steffen
CHECKED: ATH MB

NOVEMBER 6, 2008
EXAMINED: [Signature]
PASSED: [Signature]
ENGINEER OF STRUCTURAL SERVICES
ENGINEER OF BRIDGES AND STRUCTURES