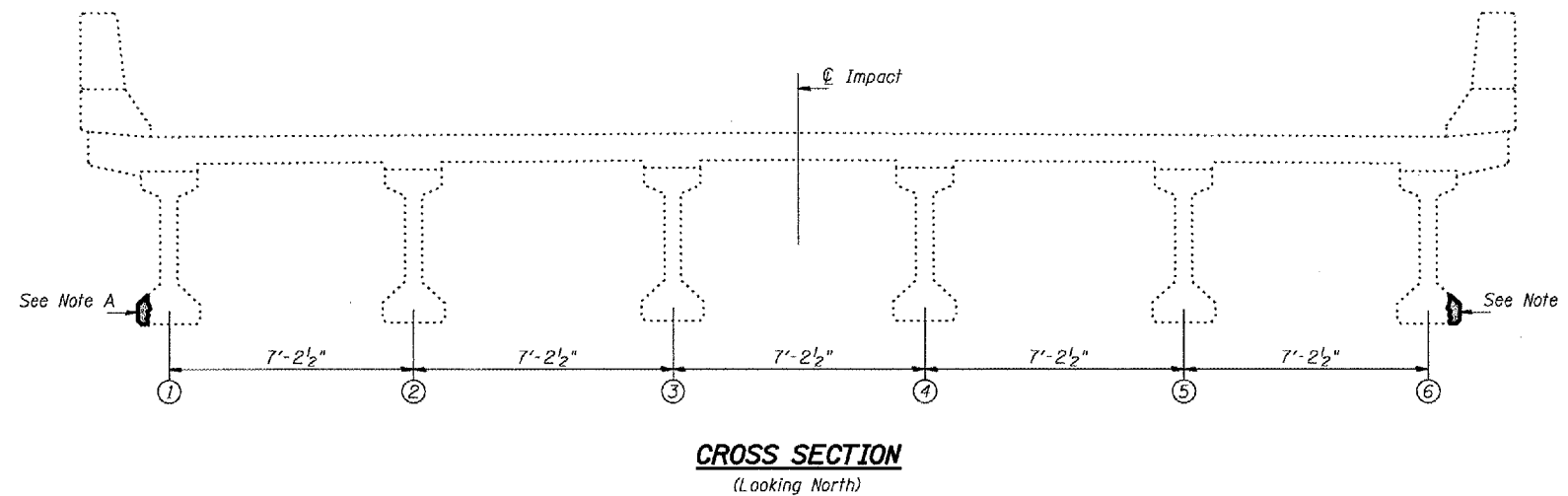
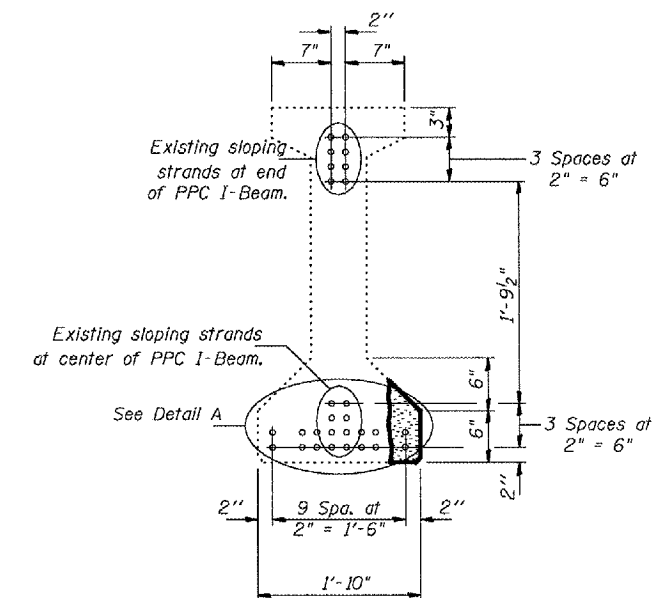


F.A.I. RTE.	SECTION	COUNTY	TOTAL SHEETS	SHEET NO.
412	(50-5B)1	LASALLE	25	16
FED. ROAD DIST. NO. ILLINOIS			NON-FED. AID PROJECT	

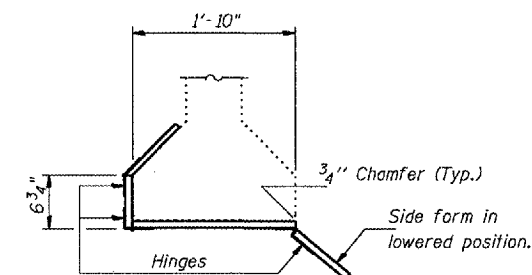


CROSS SECTION
(Looking North)

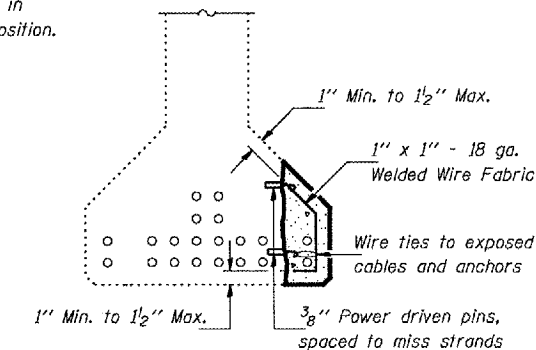
Note A:
PPC I-Beams to be repaired as detailed.



PATCHING DETAIL
Beam 5, Span 3.



SUGGESTED FORM DETAIL



DETAIL A

REPAIR PROCEDURES FOR WEST AND EAST FASCIA BEAMS

- The damaged area of the beam shall be cleaned of all loose and spalled concrete, and sealant. Hand tools shall be used for the removal of concrete adjacent to the prestressing strands. While a 15 pound chipping hammer may be used away from prestressing strands, extreme care shall be taken not to damage the exposed prestressing strands. Any exposed portions of the strands shall be sandblasted.
- Using the same tools, remove the existing concrete to sound concrete along the edges of the damaged area to a depth of 1" min. to 1 1/2" max. The edges shall be saw cut 3/4" deep or less.
- Power driven pins as shown in Detail A shall be placed at 9" alternate centers horizontally and located vertically 3" and 7" up from bottom of Fascia Beams. Use wire ties in areas where the strands are exposed as shown in Detail A. Place 1" x 1" x 18 gauge welded wire fabric in repair areas and attach it to the pins or strands with wire ties. The clearance between the finished surface of the new concrete and the welded wire fabric shall be 1" minimum. All beams involved in this work shall be rebuilt to their original dimensions.
- All surfaces of existing concrete in the area to be repaired shall be coated with an epoxy-resin primer bonding agent. The concrete beam to be repaired or crack sealed must be at a temperature of at least 50° F. or higher.
- The repair shall be made using a concrete meeting all the requirements specified in Section 1020 of the Standard Specifications for Class PS Concrete for precast prestressed concrete members, except the maximum size of the aggregate shall be 1/2". Place the lower form on the bottom of the beam and compact by vibrating (or other approved methods) the concrete mix into the voids. After accessible voids have been filled and compacted, the top vertical form shall be raised into position and the remaining voids filled and compacted. The sloping upper surface shall be finished to the configuration of the existing PPC I-Beam flange. The cost of concrete removal, Class PS Concrete, power driven pins, wire ties, wire mesh, epoxy bonding agent, and all other work required to perform any repairs on East and West Fascia beams is included in the Lump Sum price for PPC I-Beam Repairs.

BILL OF MATERIAL

ITEM	UNIT	QUANTITY
PPC I Beam Repairs	L.S.	1

REVISIONS	
NAME	DATE

ILLINOIS DEPARTMENT OF TRANSPORTATION
PPC I-BEAMS REPAIR
S.N. 050-0173 (SB)
F.A.I. 412 OVER C. & N.W. RAILROAD
SECTION (50-5B)1
STA. 1216 + 43.45