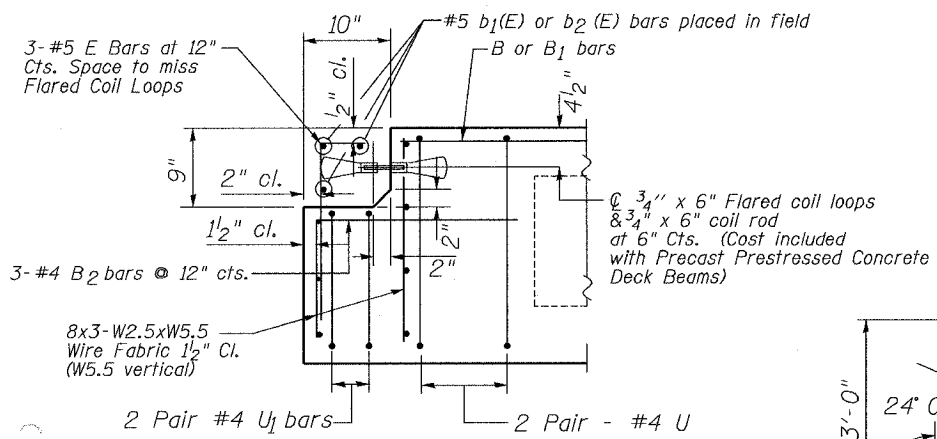


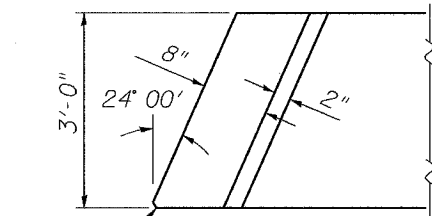
STATE OF ILLINOIS
DEPARTMENT OF TRANSPORTATION

| | | | | | |
|-----------------------|----------|-------------------|--------------|-----------|-------------|
| ROUTE NO. | SECTION | COUNTY | TOTAL SHEETS | SHEET NO. | SHEET NO. 4 |
| S.B.I. | * | Ogle | 40 | 19 | 11 SHEETS |
| F.A.L. | | | | | |
| FED. ROAD DIST. NO. 7 | ILLINOIS | FED. AID PROJECT- | | | |

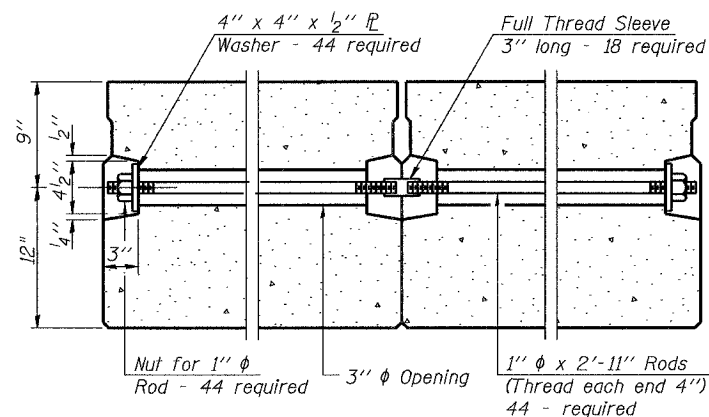
* Section 119BR-3 Contract #64A47



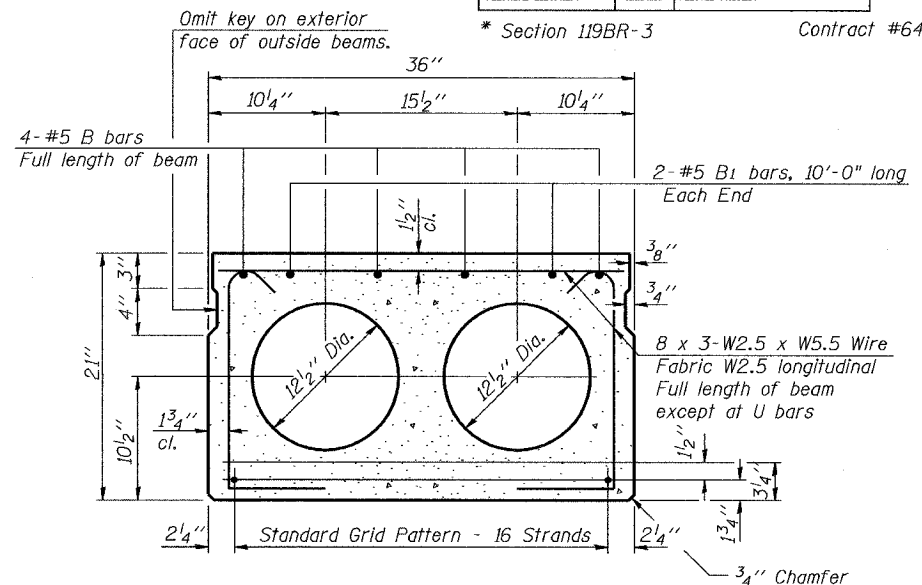
END OF BEAM AT EXPANSION JOINT



END OF BEAM AT EXPANSION JOINT PLAN - PIER ENDS



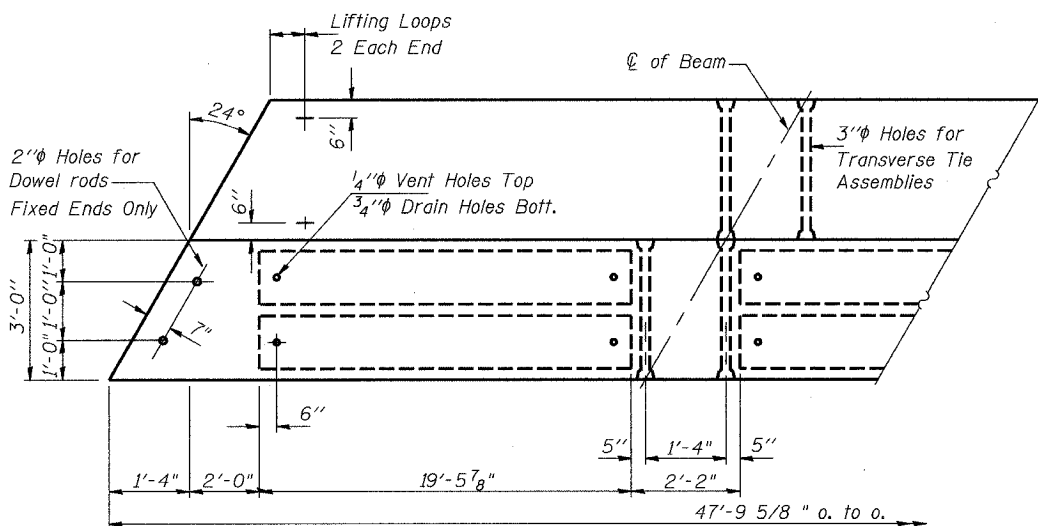
TYPICAL TRANSVERSE TIE ASSEMBLY



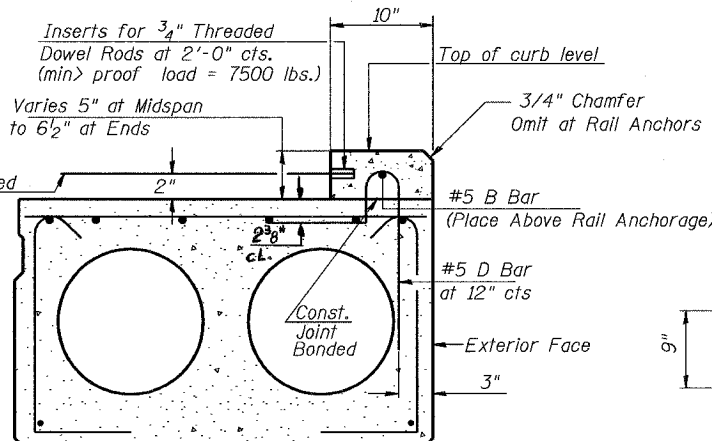
TYPICAL SECTION

16-1/2 inch diameter strands, each strand stressed to 30,900 lbs. 6-strands 1 3/4 inch up, 8-strands 3/4 inch up, 2-strands 9 inch up

Note: Place strands symmetrically about centerline of beam.

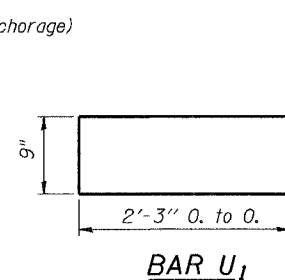


PLAN

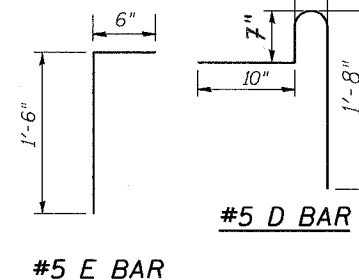


SECTION THRU EXTERIOR BEAMS

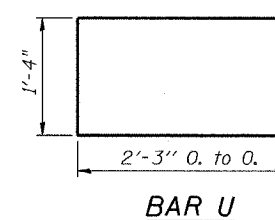
See Section Thru Interior Beams for strand pattern.



BAR U1



#5 E BAR



BAR U

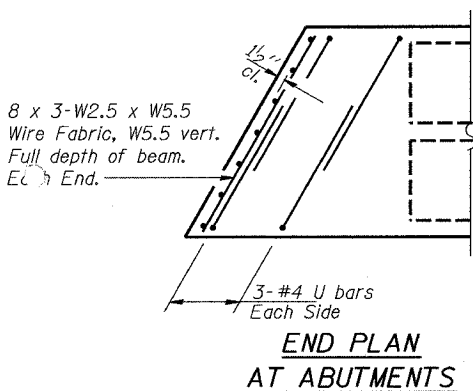
NOTES

Prestressing steel shall be uncoated high strength, low relaxation 7-wire strand, Grade 270. The nominal diameter shall be 1/2 inch and the nominal cross-sectional area shall be 0.153 sq. in. Lifting loops shall be 2 1/2 inch diameter 270 ksi strands, as shown. The 1 inch diameter rods in the transverse tie assembly shall be tightened to a snug fit and the threads set. Pockets that receive transverse tie bar on outside shall be filled with grout after transverse tie assembly is in place. Non prestressing steel shall conform to AASHTO M-31, or M-322 Grade 60. The bearing seat surfaces shall be adjusted by shimming to assure firm and even bearing. Two 1/8 inch fabric adjusting shims of the dimensions of the Exterior Bearing Pad shall be provided for each bearing. Keyway surfaces shall be cleaned to remove form oil or other bond breaking material prior to shipment of the beams. Cleaning shall be done by sandblasting the keyway areas between top of the beam and the bottom edge of the key. Corrosion inhibitor, as covered in the Special Provisions, shall be used in the concrete for precast prestressed concrete deck beams. Required Release Strength, f'ci, shall be 4000 p.s.i. Bridge rail inserts shall be cast into the precast beams and curbs. Curbs shall be cast by the precast prestressed concrete fabricator after the strands have been released and prior to shipping the beams. The concrete used in the curb shall meet the requirements specified for the beams. The curbs including all concrete and reinforcement will not be paid for separately but included with Precast Prestressed Concrete Deck Beams. The curb inserts and threaded dowel rods may be either epoxy coated or galvanized and the cost shall be considered included with Precast Prestressed Concrete Deck Beams (21 inch Depth). The cut strands at each beam end shall be given two coats of zinc dust spray or paint meeting the requirements of ASTM A 780. The zinc dust spray or paint shall be applied before corrosion appears and allowed to dry according to the manufacturer's specifications prior to another coat of zinc. A concrete sealer meeting the requirements of Section 587 of the Standard Specifications shall be applied to the exterior face and 9 inch in on the underside of the fascia beams. The sealer shall be applied after visible crack growth has subsided. This work shall be performed by the producer and included with the cost of the beam.

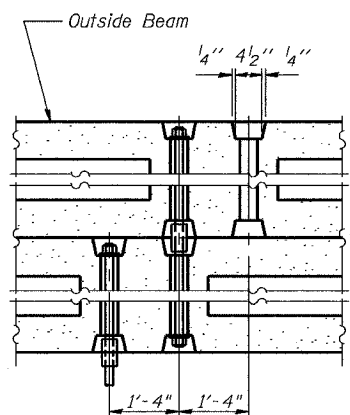
BILL OF MATERIAL

| Bar | No./Bm | Size | Length | Shape |
|---|--------|------|---------|-------|
| B | 4 | #5 | 47'-6" | — |
| B1 | 1 | #5 | 47'-6" | — |
| B2 | 4 | #5 | 10'-0" | — |
| D | 48 | #5 | 3'-7" | — |
| E | 3 | #5 | 2'-0" | — |
| U | 10 | #4 | 5'-10" | — |
| U1 | 4 | #4 | 5'-3" | — |
| Precast Prestressed Conc. Deck Bms. (21" Depth) | | | Sq. Ft. | 3155 |

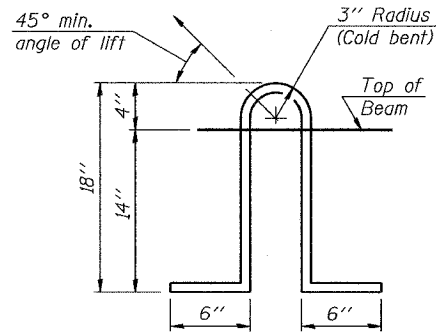
* At exterior beams only



END PLAN AT ABUTMENTS



TIE ROD OFFSET DETAIL



LIFTING LOOP DETAIL

| | |
|----------|--------|
| DESIGNED | SB |
| CHECKED | RB |
| DRAWN | DB, BS |
| CHECKED | SB |

DECK BEAM DETAILS
F.A.P. 553 (IL 72)
OVER STILLMAN CREEK
SECTION 119BR-3
OGLE COUNTY
STR. NO. 071-0042