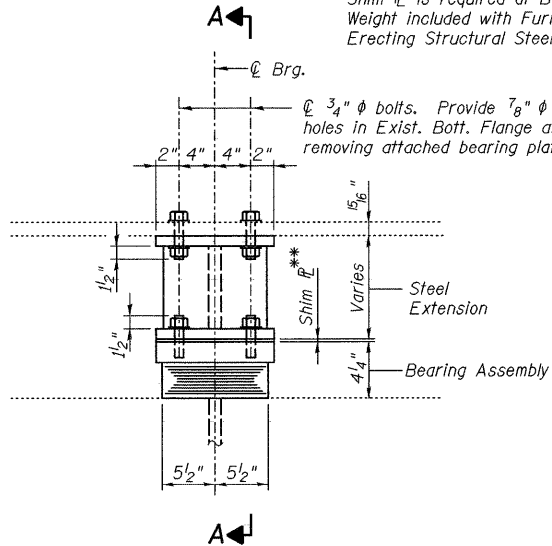


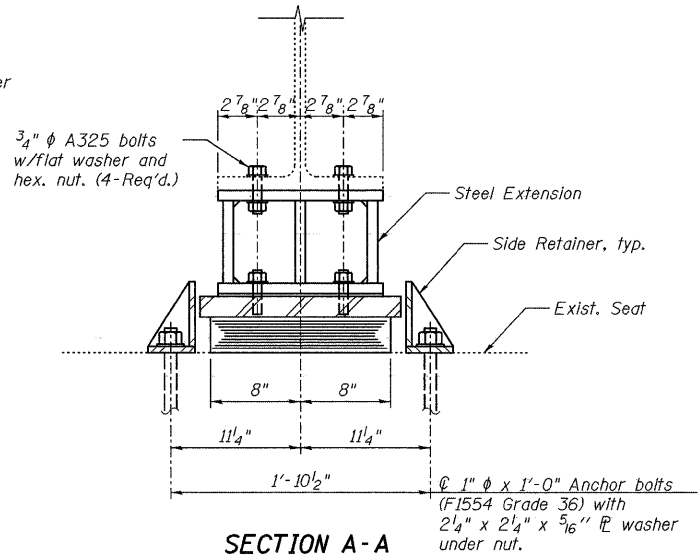
STATE OF ILLINOIS
DEPARTMENT OF TRANSPORTATION

**In addition to adjusting shims, one 3/4" Shim is required at Beams 1 & 12. Weight included with Furnishing and Erecting Structural Steel.

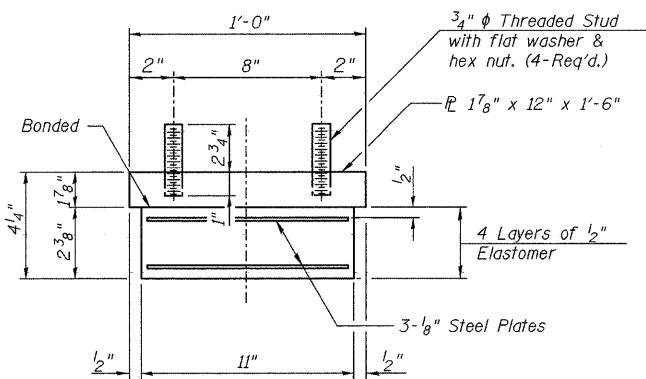


ELEVATION AT PIERS 1 AND 3

TYPE I ELASTOMERIC EXP. BRG.



SECTION A-A



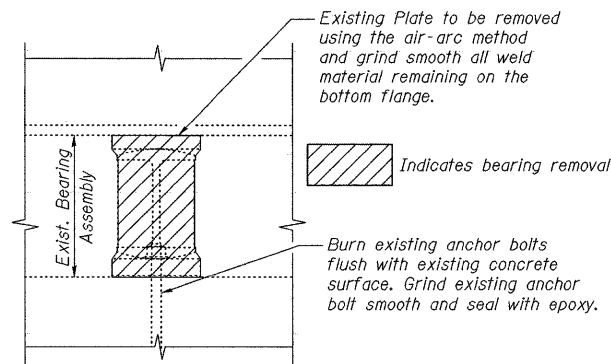
BEARING ASSEMBLY

Shim plates shall not be placed under Bearing Assembly.

BEAM REACTIONS (KIPS)

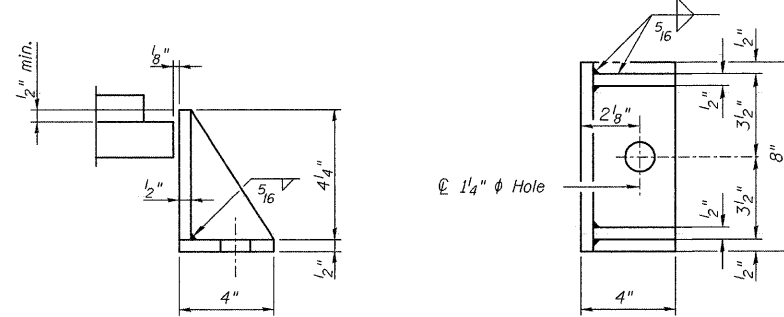
LOCATION	DEAD LOAD	*NET OVERLAY	LIVE LOAD	IMPACT LOAD	TOTAL LOAD
Piers 1 & 3	61.5	8.2	47.6	10.0	127.3

*Existing plans do not indicate a design specification for future wearing surface.



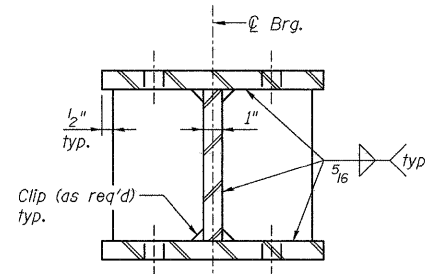
EXISTING BEARING REMOVAL DETAILS

(Existing Expansion Bearings at Piers 1 & 3)
Cost Included with Jack and Remove Existing Bearings.



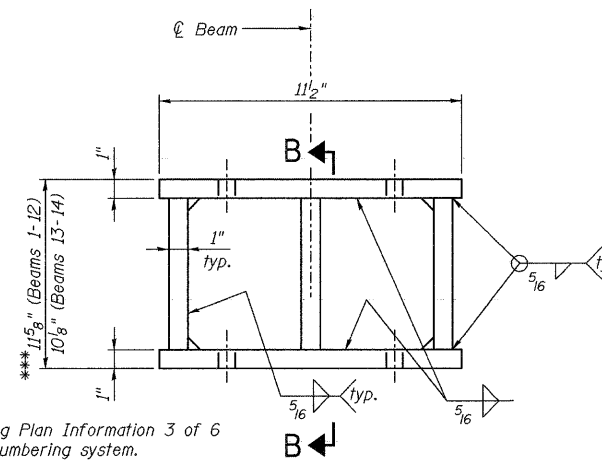
SIDE RETAINER

Equivalent rolled angle with stiffeners will be allowed in lieu of welded plates.



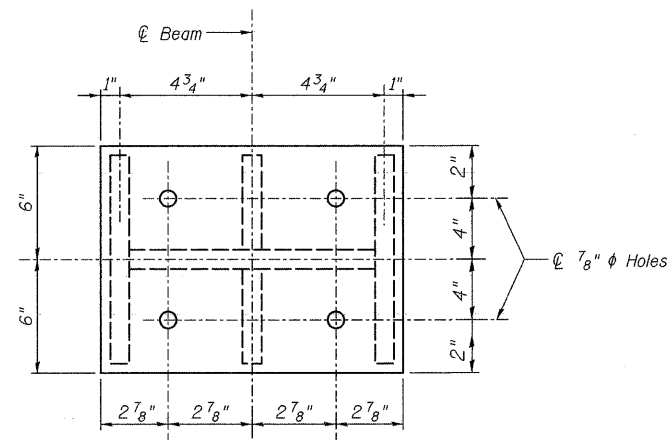
SECTION B-B

*** See Existing Plan Information 3 of 6 for beam numbering system.



ELEVATION STEEL EXTENSION

(Weight included with Furnishing and Erecting Structural Steel.)



PLAN STEEL EXTENSION

BILL OF MATERIAL

Item	Unit	Total
Jack and Remove Existing Bearings	Each	28
Elastomeric Bearing Assembly, Type I	Each	28
Anchor Bolts, 1"	Each	52
Furnishing and Erecting Structural Steel	Pound	5,430

Notes:

- For Jacking and Cribbing see special provision for "Jack and Remove Existing Bearings".
- Jacking and cribbing for beams at Piers 1 & 3 shall be performed such that they can remain supported while the specified structural repairs are performed. Cost included with Jack and Remove Existing Bearings.
- The tabulated beam reactions were taken from the existing construction plans. The Contractor shall verify that the equipment used to support the beams is sufficient to carry these loads in addition to any temporary construction loads.
- The minimum Jack capacity for lifting the beams, at each bearing location, shall be 140 kips at Piers 1 & 3.
- Anchor bolts shall be ASTM F1554 all-thread (or an Engineer-approved alternate material) of the grade(s) and diameter(s) specified. ASTM A307 Grade C anchor bolts may be used in lieu of ASTM F1554 Grade 36 (Fy=36ksi). The corresponding specified grade of AASHTO M314 anchor bolts may be used in lieu of ASTM F1554.
- Anchor bolts for side retainers shall be installed in holes drilled in the concrete after bearings are in place. Side retainers shall be placed after bolts are installed.
- Drilled and set anchor bolts shall be installed according to Article 521.06 of the Standard Specifications.
- Side retainers and other steel members required for the bearing assembly shall be included in the cost of Elastomeric Bearing Assembly, Type I.
- The structural steel plates of the Bearing Assembly and Steel Extension shall conform to the requirements of AASHTO M 270 Grade 36.
- Two 1/8" adjusting shims shall be provided for each bearing in addition to all other plates or shims and placed as shown on bearing details.
- The anchor bolt size and grades shown constitute a calculated seismic structural fuse. Substitution of higher diameter and/or grade anchor bolts will not be allowed.
- Omit one side retainer at Beams 1 and 12 due to interference with existing concrete bollards. Remove concrete bollards as necessary to allow for installation of Elastomeric Bearings. Cost included with Elastomeric Bearing Assembly, Type I. See Substructure Repairs - Piers sheet for locations of existing concrete bollards.
- Diaphragm removal and reinstallation may be required to facilitate drilling holes. Cost included with Furnishing and Erecting Structural Steel.
- Prior to ordering any material, the Contractor shall verify in the field all existing bearing heights and required Steel Extension dimensions.

BEARING DETAILS
STRUCTURE NO. 016-0536

DESIGNED -	JLS
CHECKED -	KWS
DRAWN -	RMG
CHECKED -	KWS

benesch

alfred benesch & company
Engineers • Surveyors • Planners
205 North Michigan Avenue, Suite 2400
Chicago, Illinois 60601
312-565-0450 Job No. 10032.13

SHEET NO. 8 17 SHEETS	F.A.I. RTE. 94	SECTION 1010.1-1-2	COUNTY COOK	TOTAL SHEETS 37	SHEET NO. 20
	CONTRACT NO. 60J30			FED. ROAD DIST. NO. ILLINOIS FED. AID PROJECT	