

STATE OF ILLINOIS
DEPARTMENT OF TRANSPORTATION

ROUTE NO.	SECTION	COUNTY	LIST#	SHEET NO.	SHEET NO. 2 29 SHEETS
FAP 314	108BR-1	MADISON	12.3	30	
FED. ROAD DIST. NO. 7		ILLINOIS		FED. AID PROJECT-	

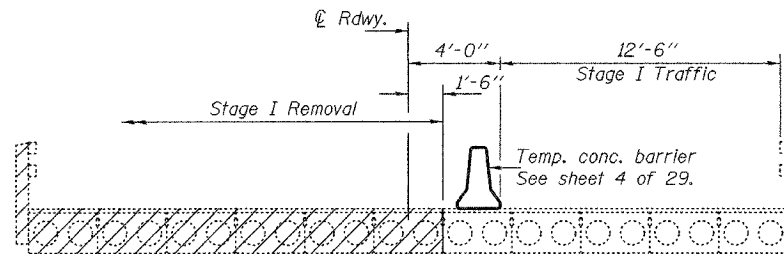
Contract #76454

TOTAL BILL OF MATERIAL

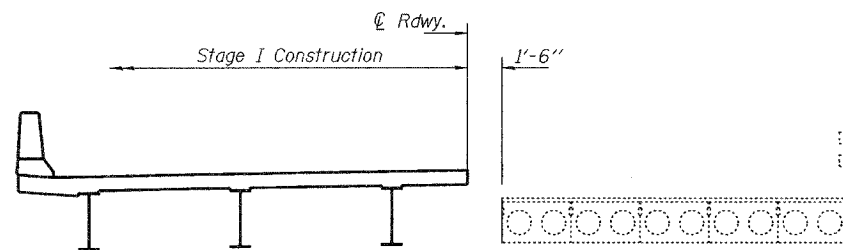
ITEM	UNIT	SUPER	SUB	TOTAL
Porous Granular Embankment (Special)	Cu. Yd.		113	113
Stone Riprap, Class A5	Sq. Yd.		2358	2358
Filter Fabric	Sq. Yd.		2358	2358
Removal of Existing Structures N1	Each			1
Structure Excavation	Cu. Yd.		365	365
Floor Drains	Each		26	26
Concrete Structures	Cu. Yd.		223.7	223.7
Concrete Superstructure	Cu. Yd.	404.7		404.7
Bridge Deck Grooving	Sq. Yd.	1239		1239
Protective Coat	Sq. Yd.	1586		1586
Furnishing and Erecting Structural Steel	L. Sum	0.65		0.65
Stud Shear Connectors	Each	5742		5742
Reinforcement Bars, Epoxy Coated	Pound	99800	21,750	121,550
Slopedwall Removal	Sq. Yd.		231	231
Furnishing Steel Piles HP12x53	Foot		2010	2010
Test Pile Steel HP12x53	Each		3	3
Furnishing Steel Piles HP12x63	Foot		1734	1734
Driving Steel Piles	Foot		3744	3744
Test Pile Steel HP12x63	Each		1	1
Temporary Sheet Piling	Sq. Ft.		2070.9	2070.9
Name Plates	Each		1	1
Bar Splicers	Each	1007	167	1174
Underwater Structure Excavation Protection L1	Each		1	1
Underwater Structure Excavation Protection L2	Each		1	1
Pipe Underdrains for Structures, 4"	Foot		102	102
Composite Bridge Approach Pavement	Sq. Yd.	249		249
Concrete Encasement	Cu. Yd.		21.4	21.4
Geocomposite Wall Drain	Sq. Yd.		65	65
Metal Shoes	Each		42	42

GENERAL NOTES

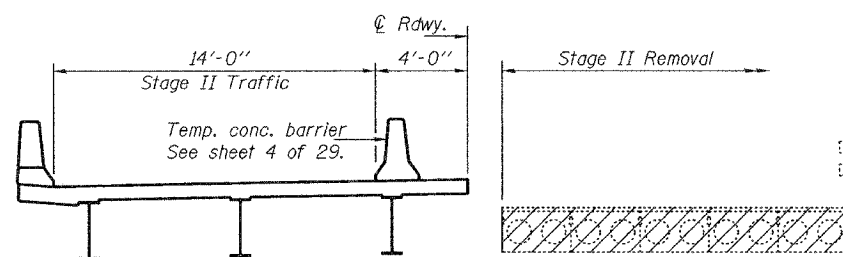
Fasteners shall be high strength bolts. Bolts $\frac{7}{8}$ " ϕ , open holes $\frac{15}{16}$ " ϕ , unless otherwise noted.
 Calculated weight of Structural Steel = 318790 (AASHTO M 270, Grade 50)
 = 36980 (AASHTO M 270, Grade 36)
 Field welding of construction accessories will not be permitted to beams. Anchor bolts shall be set before bolting diaphragms over supports.
 The main load carrying member components subject to tensile stress shall conform to the Supplemental Requirements for Notch Toughness Zone 2. These components are the wide flange beams, and all splice plate material. Reinforcement bars shall conform to the requirements of AASHTO M 31 or M 322 Grade 60.
 Layout of slope protection system may be varied in the field to suit ground conditions as directed by the Engineer.
 Bearing seat surfaces shall be constructed or adjusted to the designated elevations within a tolerance of $\frac{1}{8}$ inch. Adjustment shall be made either by grinding the surface or by shimming the bearing. Two $\frac{1}{8}$ " adjusting shims, of the dimensions of the bottom bearing plate, shall be provided for each bearing in addition to all other plates or shims.
 The Contractor shall drive three (3) HP12x53 and one (1) HP12x63 test piles in a permanent location at North and South Abutments, Pier 2 and Pier 3 respectively as directed by the Engineer before ordering the remainder of piles.
 The Contractor shall drive one (1) test pile HP12x53 in a permanent location at N. Abut., S. Abut., & Pier 2 and one (1) test pile HP12x63 in permanent location at Pier 3 as directed by the Engineer before ordering the remainder of piles.
 In addition to all other requirements of section 512 of the Standard Specifications, splices for HP12x53 and HP12x63 piles shall develop the full capacity of the steel's cross sectional area of the pile for tension, shear and bending forces. One approved method of achieving this requirement is full penetration butt welding of the entire cross section. Other types of splices meeting the full capacity requirement may be allowed subject to the approval of the Engineer. Any proposal by the Contractor to use an alternate splice method must include adequate documentation demonstrating that the full tension, shear and bending capacities will be met. Appropriate welder qualifications will be required for the positions and processes used in splicing all piles. Nondestructive testing of completed welds will be limited to visual inspection.
 All construction joints shall be bonded.
 The inorganic zinc rich primer/Acrylic/Acrylic Paint System shall be used for shop and field painting of new structural steel except where otherwise noted. The color of the final finish coat shall be gray, Munsell No. 5B 7/1. See Special Provision for "Cleaning and Painting New Metal Structures."



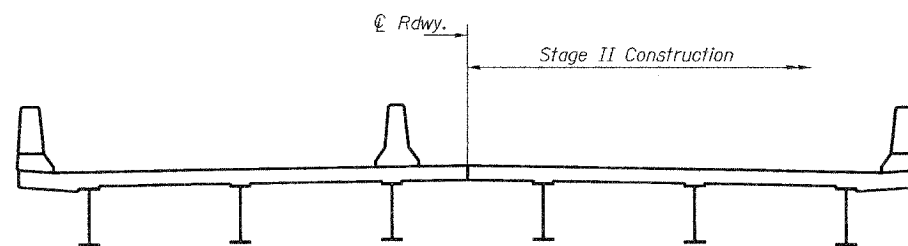
STAGE I REMOVAL



STAGE I CONSTRUCTION

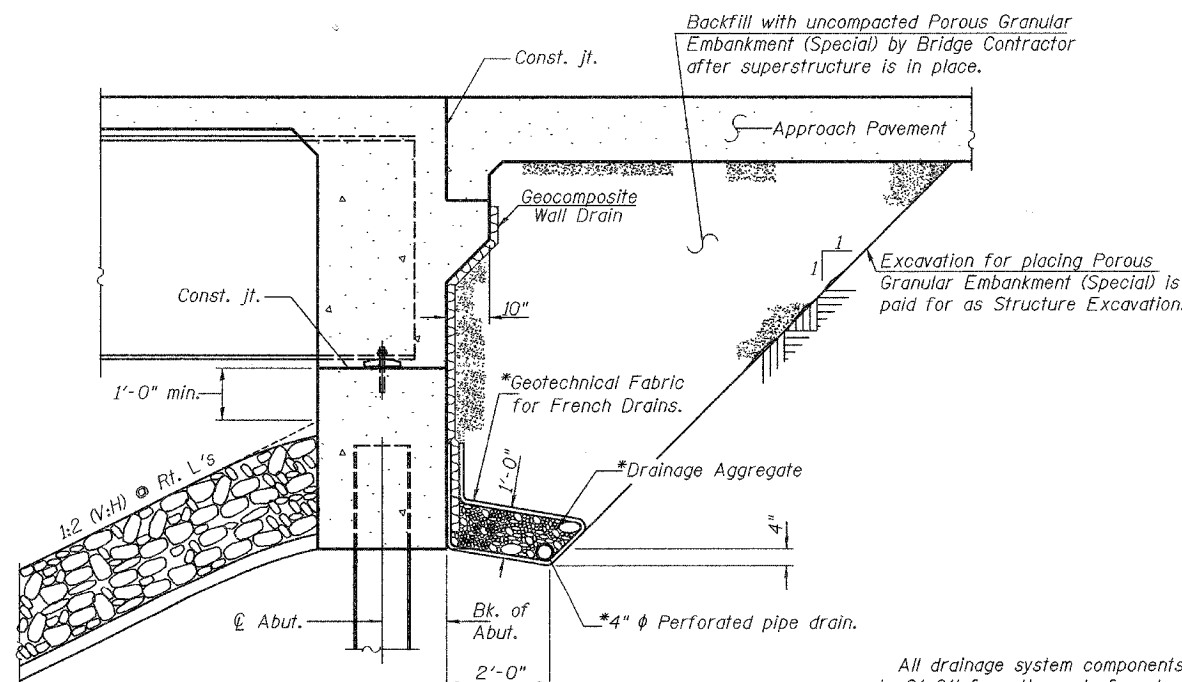


STAGE II REMOVAL



STAGE II CONSTRUCTION

Notes: Hatched areas indicate removal of existing structures.
 For quantity of temporary concrete barrier, see Roadway Plans.
 All cross sections are looking south.



*Included in the cost of Pipe Underdrains for Structures.

SECTION THRU INTEGRAL ABUTMENT

All drainage system components shall extend to 2'-0" from the end of each wingwall except an outlet pipe shall extend until intersecting with the side slopes. The pipes shall drain into concrete headwalls. (See Article 601.05 of the Standard Specifications and Highway Standard 601101).

DESIGNED	Curt M. Evoy
CHECKED	Tom L. Kurtenbach
DRAWN	h.t. duong
CHECKED	CME/TLK

EXAMINED	November 17, 2005
PASSED	Thomas J. Demigale ENGINEER OF BRIDGE DESIGN
	Ralph E. Anderson ENGINEER OF BRIDGES AND STRUCTURES

GENERAL DATA &
 STAGE CONSTRUCTION DETAILS
 F.A.P. RTE. 314 - SEC. 108BR-1
 MADISON COUNTY
 STATION 263+51
 STRUCTURE NO. 060-0334