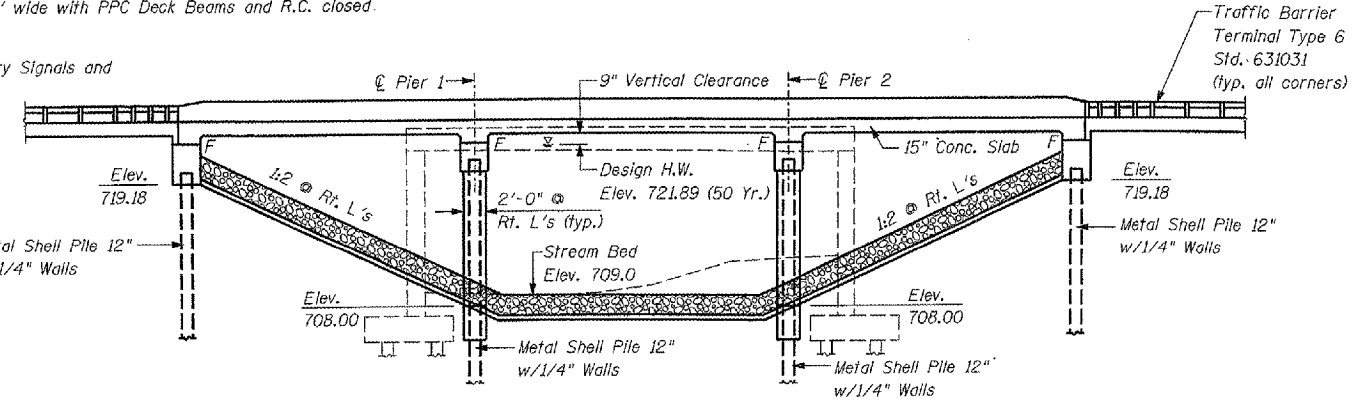


BENCHMARK: 4601-6 Elev. = 719.95
 chiseled "□" on west Headwall of F.E.
 @ 29.2' RT, Sta. 2088+45.5
 Approx. 400' East of Intersection
 of U.S. 136 & T.R. 3000 N & 1200 E.
 EXISTING STRUCTURE: S.N. 010-0063 to be removed. Built in 1925 as S.A. Route 10 Section 69B-15D.
 Single span, R.C. T-Beams 40' x 26' wide with R.C. closed Abuts. on spread footings. Widened
 in 1972 as SB1 Route 119 Section 105 BY to 40' x 46' wide with PPC Deck Beams and R.C. closed
 Abuts. on spread footings.

One lane of traffic to be maintained utilizing Temporary Signals and
 Stage Construction.

The existing aluminum hand rail shall be salvaged
 & delivered to the Districts Maintenance Yard.
 Cost included in "Removal of Existing Structures".

F.A.P. RTE.	SECTION	COUNTY	TOTAL SHEETS	SHEET NO.
709	105BR-5	CHAMPAIGN	31	11
STA. 2074+53		TO STA. 2082+62		
FED. ROAD DIST. NO.		ILLINOIS FED. AID PROJECT		
SHEET 1 OF 11 SHEETS				



STATION 2078+57.63
 BUILT 20 BY
 STATE OF ILLINOIS
 F.A.P. RTE. 709 SEC. 105BR-5
 F.A.P. PROJ.
 LOADING HS20
 STR. NO. 010-0276

NAME PLATE
 See Std. 515001

ELEVATION

GENERAL NOTES

1. Reinforcement bars shall conform to the requirements of ASTM A 706 Gr 60 (IL Modified). See Special Provisions.
2. Layout of slope protection system may be varied in the field to suit ground conditions as directed by the Engineer.
3. The Contractor shall make allowance for the deflection of forms, shrinkage and settlement of false work, in addition to allowance for dead local deflection.
4. The backfill around the pier bents shall be placed after the Superstructure is in place.
5. The Contractor shall drive two test piles in a permanent location - one at the West Abut. and one at Pier 2 as directed by the Engineer before ordering the remainder of the piles.
6. For section A-A see Sheet # 2 of 11.
7. Prior to removing the existing deck the Contractor shall excavate behind the existing abutments.

TOTAL BILL OF MATERIAL

ITEM	UNIT	SUPER	SUB	TOTAL
Stone Riprap, Class A4	Yd ³		580	580
Filter Fabric	Yd ²		580	580
Removal of Existing Structures	Each	1		1
Structure Excavation	Yd ³		92	92
Bridge Deck Grooving	Yd ²	305.8		305.8
Protective Coat	Yd ²	389.9		389.9
Concrete Structures	Yd ³		129.1	129.1
Concrete Superstructure	Yd ³	172.6		172.6
Reinforcement Bars, Epoxy Coated	Lb.	30560	11100	41660
Temporary Sheet Piling	Ft ²		998	998
Floor Drains	Each	6		6
Name Plates	Each	1		1
Furnishing Metal Shell Piles, 12 inch	Ft.		1295	1295
Driving Piles	Ft.		1295	1295
Test Pile Metal Shells	Each		2	2
Bar Splitters	Each	131	76	207
Underwater Structure Excavation Protection Location 1	Each		1	1
Underwater Structure Excavation Protection Location 2	Each		1	1
Porous Granular Embankment, (Special)	Yd ³		69	69
Pipe Underdrains for Structures, 4 inch	Ft.		112	112
Asbestos Bearing Pad Removal	Each		16	16

WATERWAY INFORMATION

Drainage Area = 17.86 Sq. Mi. Low Grade Elev. 721.88 @ Sta. 2085+00

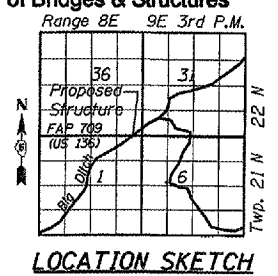
Flood	Freq. Yr.	Q CFS	Opening Sq. Ft.		Nat. H.W.E. Ft.		Head - Ft.		Headwater Elev. - Ft.	
			Exist.	Prop.	Exist.	Prop.	Exist.	Prop.		
Design	50	1879.00	352.20	578.20	721.89	0.77	0.25	722.66	722.14	
Base	100	2154.00	352.20	597.70	722.18	1.00	0.32	723.18	722.50	
Overtopping	300	2657.00	352.20	-	722.67	1.47	-	724.14	-	
Max. Calc.	500	2809.00	-	605.70	722.81	-	0.51	-	723.32	

APPROVED
 For Structural Adequacy Only

Ralph E. Anderson (TSJ)
 Engineer of Bridges & Structures

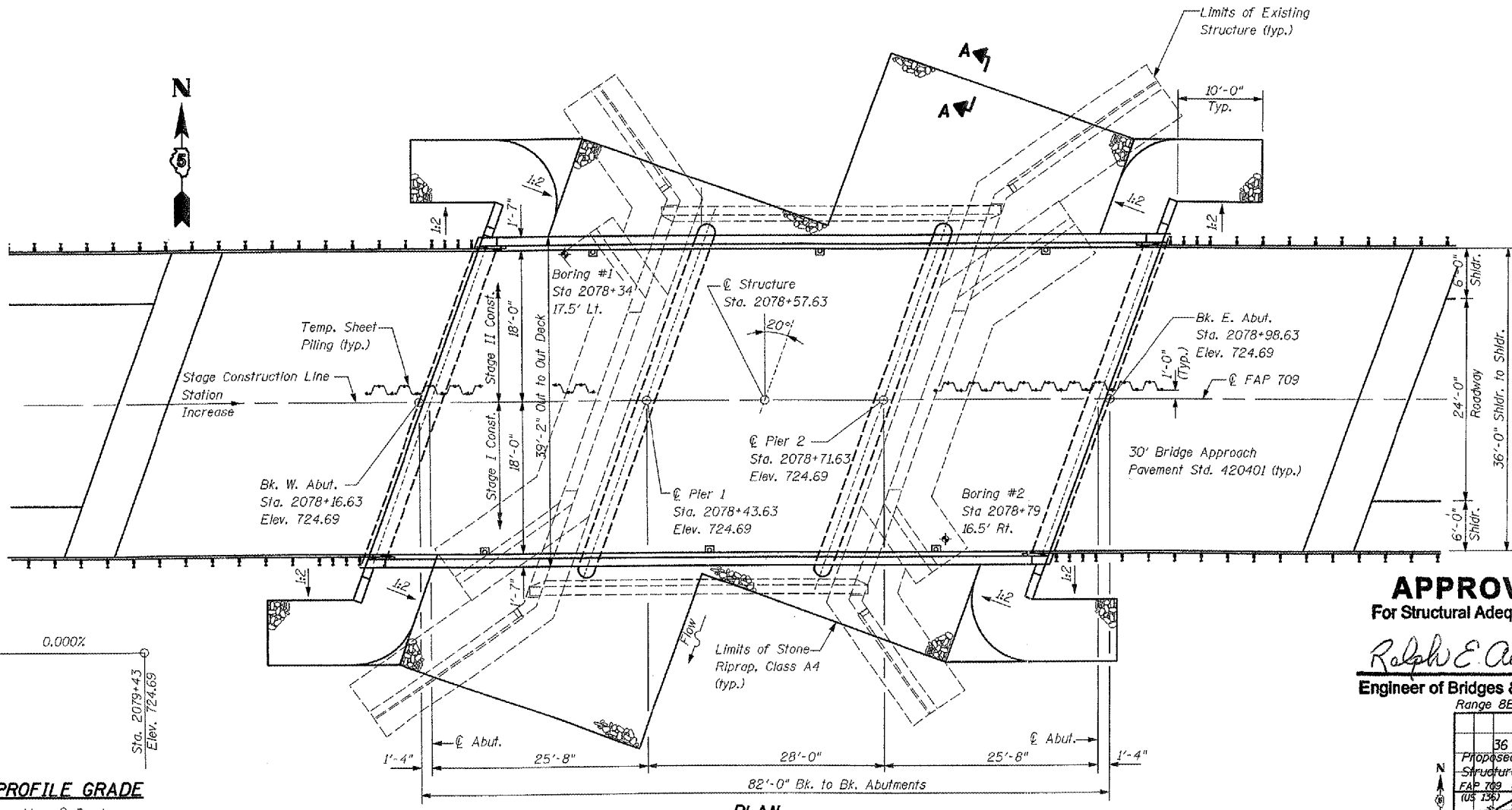


M. Silvester 11-30-06
 MARTIN J. SILVESTER
 STRUCTURAL ENGINEER
 LICENSE EXP. DATE 11-30-08

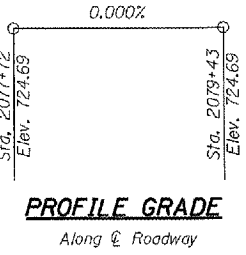


REVISIONS	
NAME	DATE

ILLINOIS DEPARTMENT OF TRANSPORTATION
GENERAL PLAN
 US ROUTE 136 OVER BIG DITCH
 FAP RTE. 709 SECTION 105BR-5
 STA. 2078+57.63
 CHAMPAIGN COUNTY STR. NO. 010-0276
 SCALE: 1/8" = 1'-0"
 DATE 11-2001
 DRAWN BY RMH
 CHECKED BY MJS



PLAN



PROFILE GRADE
 Along ϕ Roadway

DESIGN STRESSES
 FIELD UNITS
 $f_c = 3,500$ psi
 $f_y = 60,000$ psi (Reinf.)

LOADING HS20-44
 Allow 50 lb./sq. ft. for future wearing surface.

DESIGN SPECIFICATIONS
 AASHTO 1996 with 1997, 1998, 1999, 2000 Interims

SEISMIC DATA
 Seismic Performance Category (SPC) = A
 Bedrock Acceleration Coefficient (A) = 0.047
 Site Coefficient (S) = 1.0

UPCHURCH AND ASSOCIATES
 1111 S. WASHINGTON ST., SUITE 200
 CHAMPAIGN, ILL. 61701-2000
 TEL: 219-244-5320
 FAX: 219-244-5321