

128491

CRAWFORD COUNTY PROJECT NO. BROS-9024(28)--8J-24 BRIDGE

ALL ADVANCED WARNING SIGNS, TYPE III BARRICADES, AND OTHER TRAFFIC CONTROL DEVICES FOR THIS PROJECT SHALL BE LOCATED AT THE BEGINNING AND END OF THE PROJECT, AND WHERE THE ROAD FOR CONSTRUCTION INTERSECTS OTHER PUBLIC ROADS AND SHALL INCLUDE ALL OTHER BARRICADES AND WARNING SIGNS NECESSARY TO PROTECT THE CONTRACTOR'S WORK AND EQUIPMENT, FOR PROVIDING FOR THE SAFETY OF THE TRAVELING PUBLIC, ALL SIGNS, BARRICADES, AND OTHER TRAFFIC CONTROL DEVICES SHALL BE IN ACCORDANCE WITH THE "MANUAL ON UNIFORM TRAFFIC CONTROL DEVICES FOR STREETS AND HIGHWAYS 1988 EDITION."

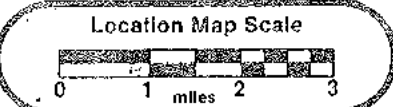
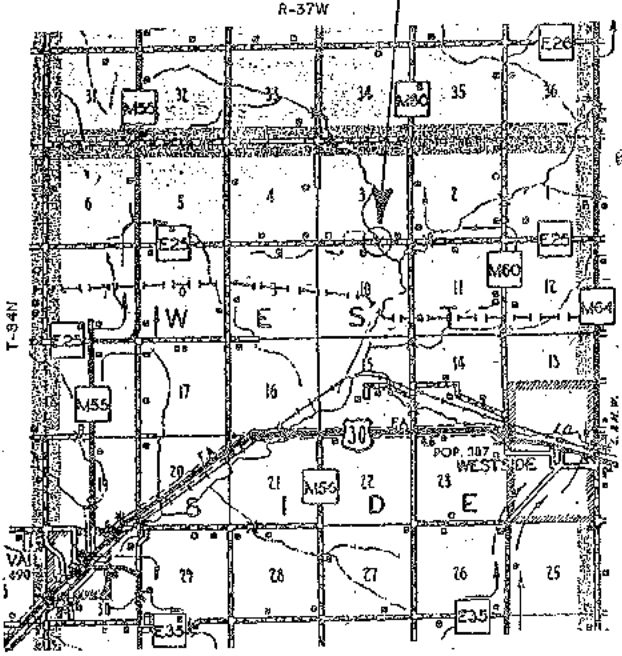
THE LUMP SUM BID PRICE FOR TRAFFIC CONTROL SHALL INCLUDE THE FURNISHING, PLACING, MAINTENANCE AND REMOVAL BY THE CONTRACTOR.

THIS ROAD WILL BE CLOSED TO THROUGH TRAFFIC DURING CONSTRUCTION. LOCAL TRAFFIC TO ADJACENT PROPERTIES WILL BE MAINTAINED AS PROVIDED FOR IN ARTICLE 1107.08 TRAFFIC CONTROL DEVICES, PROCEDURES, AND LAYOUTS SHALL BE AS PER PLAN SPECS. FOR TRAFFIC CONTROLS FOR STREET AND HIGHWAY CONSTRUCTION AND MAINTENANCE OPERATIONS.

SPECIFICATION # 5025 AND ALL APPLICABLE SUPPLEMENTAL SPECIFICATIONS SHALL APPLY.

1. TRAFFIC CONTROL FOR WORK ENCHROACHING ON THE TRAVELED WAY SHALL BE IN ACCORDANCE WITH DESIGN DETAIL 520-26.
2. THE LOCATION FOR OVERNIGHT STORAGE OF EQUIPMENT BY THE CONTRACTOR SHALL BE APPROVED BY THE ENGINEER-IN CHARGE OF CONSTRUCTION.
3. PROPOSED CHANGES IN THE TRAFFIC CONTROL PLAN SHALL BE REVIEWED WITH THE COUNTY ENGINEER BEFORE CHANGES ARE MADE.

STATION 8+40.0
PROPOSED 100'-0"X24'-0" CONTINUOUS CONCRETE SLAB BRIDGE @ 45° SKEW (RIGHT AHEAD)



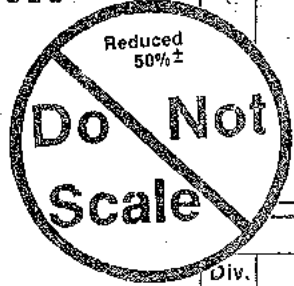
IOWA DEPARTMENT OF TRANSPORTATION Highway Division

PLANS OF PROPOSED IMPROVEMENT ON THE SECONDARY ROAD SYSTEM CRAWFORD COUNTY

F.H.W.A. NO. 128490

Project Number: BROS-9024 (28)--8J-24

INDEX OF SHEETS	
No.	Description
1.	TITLE SHEET INCLUDING: LOCATION MAP, MILEAGE SUMMARY, AND ESTIMATE OF QUANTITIES.
2.	PLAN AND PROFILE SHEET INCLUDING: TYPICAL CROSS SECTION AND GENERAL NOTES.
3.	SITUATION PLAN & SOUNDINGS.
4.	520-26 SIGNING FOR TEMPORARY ROAD CLOSURES IN RURAL AREAS.



PROJECT NO. BROS-9024(28)--8J-24

The Standard Specifications, Series of 1984, of the Iowa Department of Transportation Shall Apply to Construction Work on this Project
Plus Current Special Provisions and Supplemental Specifications

Scales: As Noted

ESTIMATE OF QUANTITIES

ITEM NO.	ITEM	UNITS	ABUTMENTS	PIERS	SUPERSTRUCTURE	TOTAL
1.	CONCRETE, STRUCTURAL CLASS "C"	C.Y.	25.6		177.1	202.7
2.	STEEL, REINFORCING	LBS.	3040		41,884	44,924
3.	RAIL, CONCRETE OPEN	L.F.			224.5	224.5
4.	PILING FURNISH 26 AT 60'	L.F.	720	840		1560
5.	STEEL BEARING DRIVE 26 AT 60'	L.F.	720	840		1560
6.	HP 10X42 ENCASE 14 AT 165'	L.F.		231		231
7.	GUARDRAIL FORMED STEEL BEAM (CASE U)	L.F.				75
8.	GUARDRAIL FORMED STEEL THRIE BEAM	L.F.				62.5
9.	GUARDRAIL POSTS BEAM	NO.				24
10.	GUARDRAIL, END ANCHORAGES BEAM (RE-52)	NO.				2
11.	GUARDRAIL, END ANCHORAGES BEAM (RE-69)	NO.				2
12.	OBJECT MARKERS, TYPE 3 (OH-3R & OH-3L)	NO.				4
13.	OBJECT MARKERS, TRIPLE YELLOW (OM2-3YV)	NO.				4
14.	REVTMENT, CLASS "E" RIP RAP	TONS				308
15.	EXCAVATION, CLASS "10" ROADWAY & BORROW	C.Y.				3,587
16.	EXCAVATION, CLASS "10" CHANNEL	C.Y.				3,586
17.	EXCAVATION, CLASS "20"	C.Y.				18
18.	CULVERT, CORR. METAL ENTRANCE (18" DIA.)	L.F.				34
19.	CULVERT, CORR. METAL ENTRANCE (24" DIA.)	L.F.				80
20.	GRANULAR SURFACING ON ROAD CLASS "C" GRAVEL	TONS				175
21.	FABRIC REINFORCEMENT	S.Y.				440
22.	REMOVAL OF EXISTING STRUCTURE	L.S.				L.S.
23.	MOBILIZATION	L.S.				L.S.
24.	TRAFFIC CONTROL	L.S.				L.S.

MILEAGE SUMMARY			
Div.	Location	Lin. Ft.	Miles
	STA. 4+00 TO STA. 13+00	900.0	0.71
	DEDUCT FOR BRIDGES STA. 8+40	-10425	-0.020
	NET LENGTH OF ROADWAY IN PROJECT	795.75	0.151

ROAD STANDARD PLANS					
The following Standard Plans shall be considered applicable to construction work on this project.					
Identification	Date	Identification	Date	Identification	Date
RE-2A	2-17-87	RE-47	11-10-87	RE-69	8-8-89
RE-2B	10-2-90	RE-48A	8-20-85	RL-II	10-11-88
RE-7	10-2-90	RE-52	8-8-89		
RE-12A	10-11-88	RE-65	1-9-90		
RE-12B	1-9-90	RE-68	8-8-89		

BRIDGE STANDARDS					
(May be obtained at Bridge Design Services)					
Standard	Date Issued	Latest Revision	Standard	Date Issued	Latest Revision
J24-87	JAN. 1987		J24-17-87	JAN. 1987	
J24-3-87	JAN. 1987		J24-19-87	JAN. 1987	JUNE 1989
J24-6-87	JAN. 1987		P 10 A	AUG. 1988	3-11-91
J24-7-87	JAN. 1987				
J24-8-87	JAN. 1987				

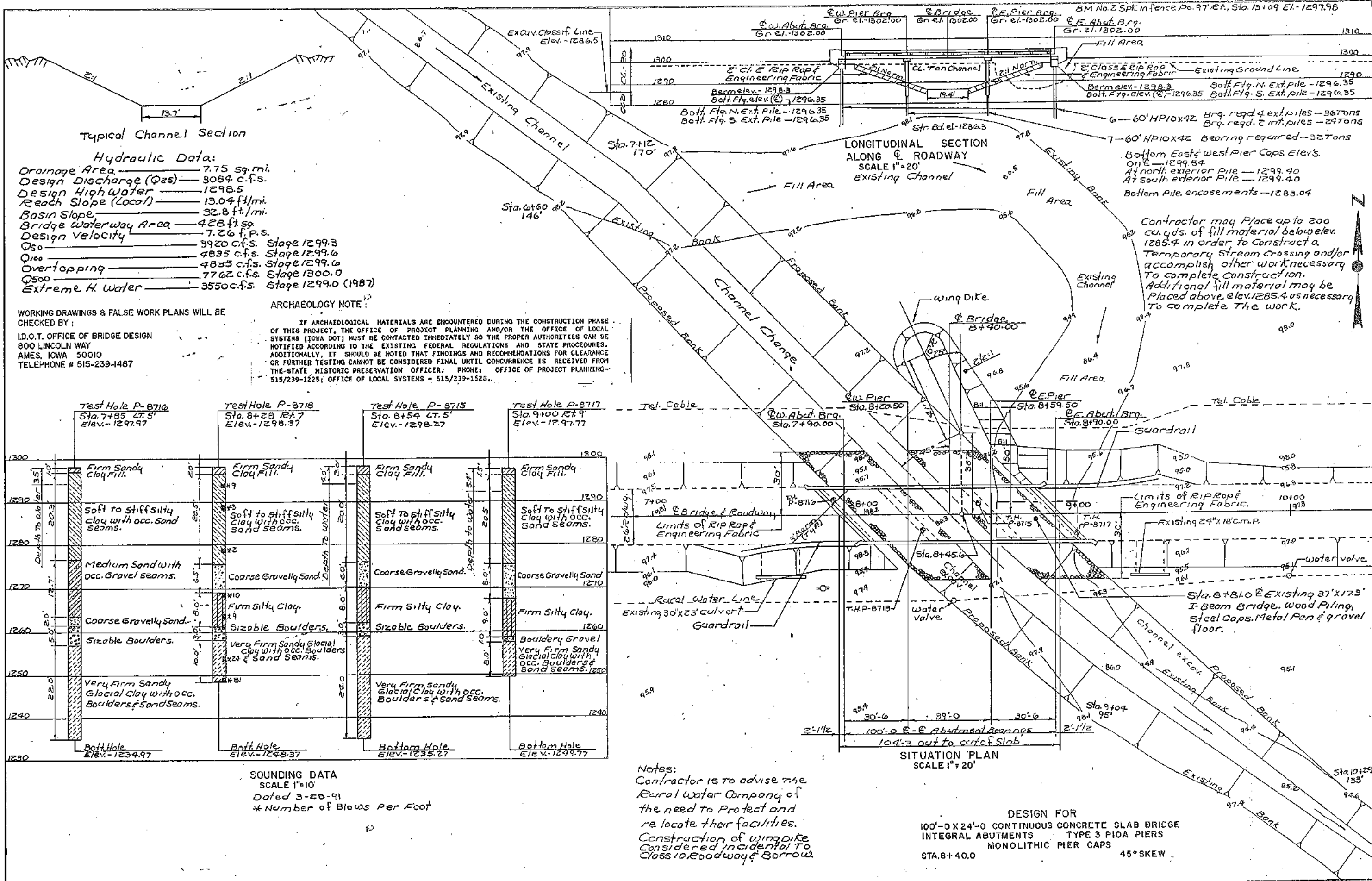
ITEM NOTES

1. ALL STRUCTURAL CONCRETE IS TO BE CLASS "C" TYPE "A" COMPACTION REQUIRED.
15. CONTRACTOR WILL BE REQUIRED TO STRIP, SALVAGE, AND RESPREAD 8" OF TOPSOIL IN THE BORROW AREA. PAYMENT FOR THIS TOPSOIL SHALL BE CONSIDERED INCIDENTAL TO ITEM #15 CLASS "10" ROADWAY AND BORROW.
16. CLASS "10" CHANNEL EXCAVATION SHALL BE USED TO CONSTRUCT THE EAST ABUTMENT BERM. THE REMAINING CLASS "10" CHANNEL DIRT SHALL BE WASTED IN THE EXISTING CHANNEL TO AN ELEVATION OF THE EXISTING CHANNEL BANKS.
19. 16 GAGE, ANNULAR PIPE ONLY.
20. GRANULAR SURFACING SHALL MEET THE REQUIREMENTS OF CLASS "C" GRAVEL IN ACCORDANCE WITH SECTION #120, GRADATION NUMBER 10, AND SHALL INCLUDE THE COST OF SPREADING OF GRANULAR SURFACING ON THE ROAD SURFACE.
22. See Sheet 2 for description and disposal. 1988 AADT 50 V.P.D.

John P. Lawler
Jim Jensen
LeRoy A. Hansohn
David E. Ordman
E. Selzer
 Approved
 Board of Supervisors

Iowa Department of Transportation Highway Division
 District Local Systems Engineer
 DATE
 I hereby certify that this plan was prepared under my supervision and that engineering decisions with regard to the design were made by me or by other duly registered professional engineers under the laws of the State of Iowa.
 Iowa Registration Number Date

Iowa Department of Transportation
 Highway Division
 Authorized for Letting
 Deputy Chief Engineer Date
 U.S. Department of Transportation Federal Highway Administration
 Approved
 Division Engineer Date



Typical Channel Section

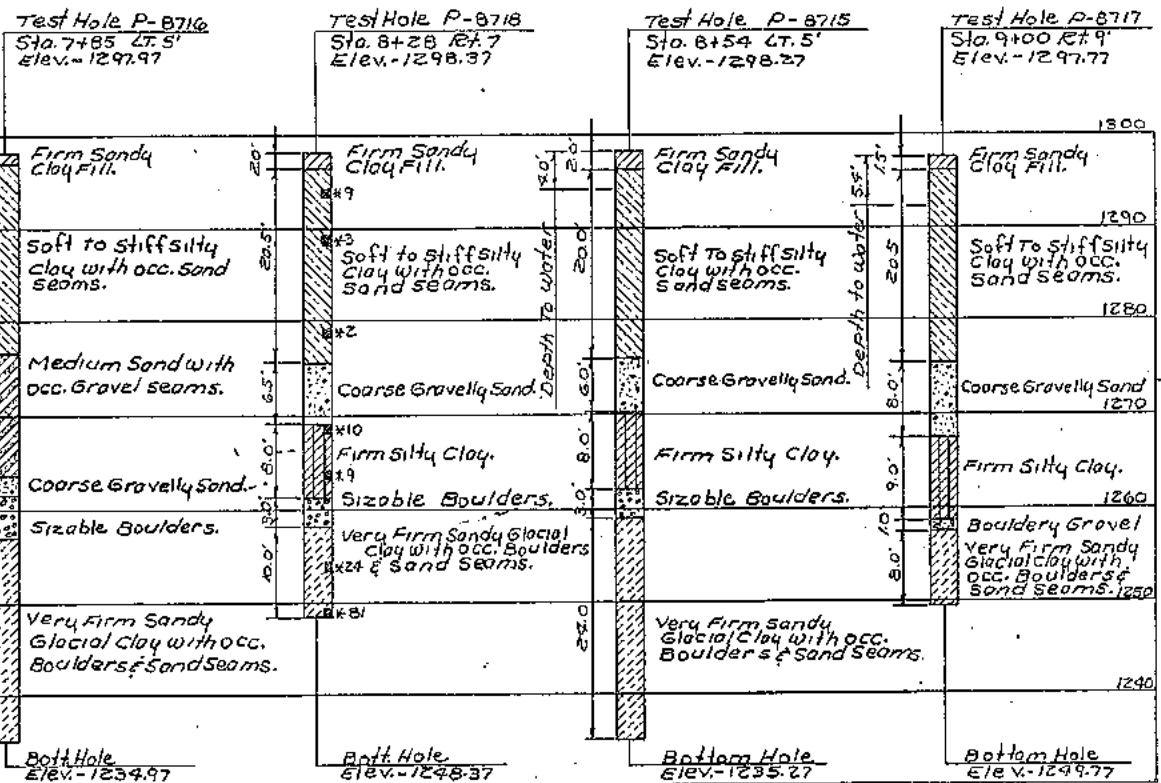
Hydraulic Data:

Drainage Area	7.75 sq. mi.
Design Discharge (Q ₂₅)	3084 c.f.s.
Design High Water	1298.5
Reach Slope (Local)	13.04 ft/mi.
Basin Slope	32.8 ft/mi.
Bridge Waterway Area	428 ft ²
Design Velocity	7.26 f.p.s.
Q ₅₀	3920 c.f.s. Stage 1299.3
Q ₁₀₀	4895 c.f.s. Stage 1299.6
Overtopping	4835 c.f.s. Stage 1299.6
Q ₅₀₀	7762 c.f.s. Stage 1300.0
Extreme H. Water	3550 c.f.s. Stage 1299.0 (1987)

ARCHAEOLOGY NOTE:

IF ARCHAEOLOGICAL MATERIALS ARE ENCOUNTERED DURING THE CONSTRUCTION PHASE OF THIS PROJECT, THE OFFICE OF PROJECT PLANNING AND/OR THE OFFICE OF LOCAL SYSTEMS (IOWA DOT) MUST BE CONTACTED IMMEDIATELY SO THE PROPER AUTHORITIES CAN BE NOTIFIED ACCORDING TO THE EXISTING FEDERAL REGULATIONS AND STATE PROCEDURES. ADDITIONALLY, IT SHOULD BE NOTED THAT FINDINGS AND RECOMMENDATIONS FOR CLEARANCE OR FURTHER TESTING CANNOT BE CONSIDERED FINAL UNTIL CONCURRENCE IS RECEIVED FROM THE STATE HISTORIC PRESERVATION OFFICER. PHONE: OFFICE OF PROJECT PLANNING - 515/239-1225; OFFICE OF LOCAL SYSTEMS - 515/239-1528.

WORKING DRAWINGS & FALSE WORK PLANS WILL BE CHECKED BY:
 I.D.O.T. OFFICE OF BRIDGE DESIGN
 800 LINCOLN WAY
 AMES, IOWA 50010
 TELEPHONE # 515-239-1487



SOUNDING DATA
 SCALE 1"=10'
 Dated 3-28-91
 * Number of Blows Per Foot

Notes:
 Contractor is to advise the Rural Water Company of the need to protect and relocate their facilities. Construction of wing dike considered incidental to Class 10 Roadway & Borrow.

DESIGN FOR
 100'-0" X 24'-0" CONTINUOUS CONCRETE SLAB BRIDGE
 INTEGRAL ABUTMENTS TYPE 3 P10A PIERS
 MONOLITHIC PIER CAPS
 STA. 8+40.0 45° SKEW