

Existing Structure: Structure Number 101-3018 consists of a four-span, riveted, steel plate girder bridge built in 1950. The existing structure is 462'-0" long and 29'-6" wide. The substructure consists of spill-through concrete abutments and reinforced concrete wall-type piers with footings founded on timber piles. The existing structure shall be completely removed, unless noted otherwise. Kishwaukee Road will be closed during construction.

Bench Marks: Railroad spike in power pole Station 83+78.50, 75.30 ft. Rt., Elev. 687.86

Salvage: Existing Name Plate to be salvaged and delivered to Winnebago County Highway Dept.

LOADING HS25
Allow 50 #/sq. ft. for future wearing surface.

DESIGN SPECIFICATIONS

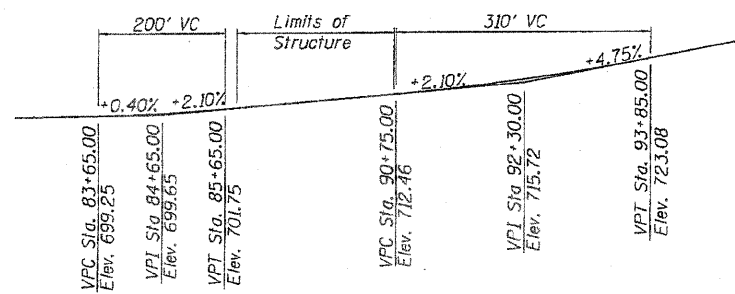
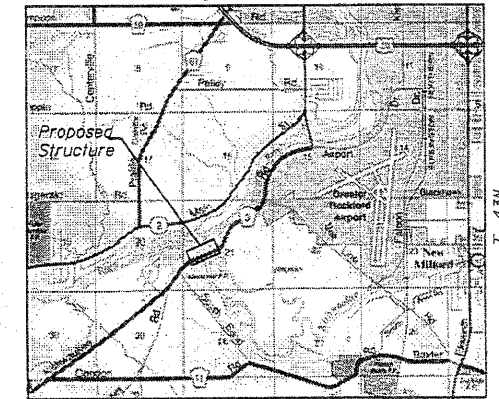
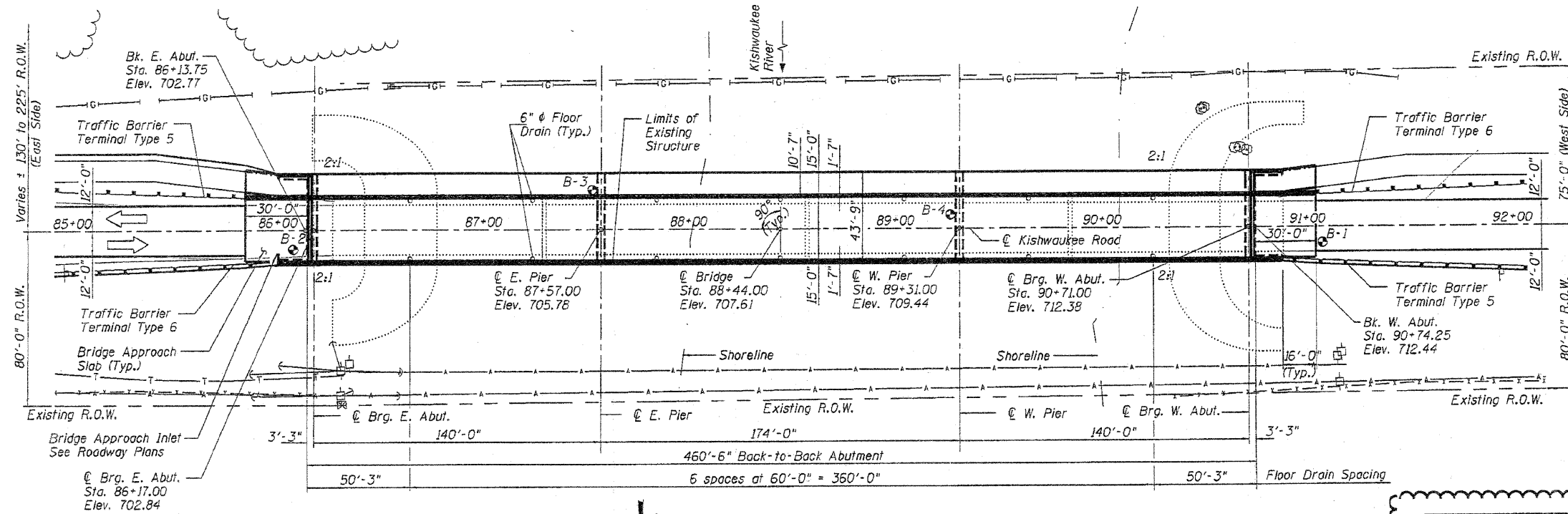
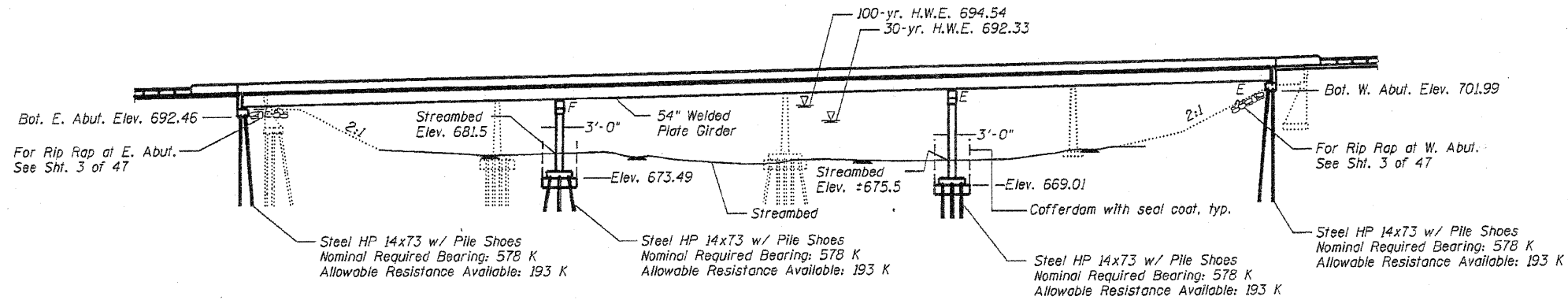
2002 AASHTO Standard Specifications for Highway Bridges
1999 AASHTO Guide for the Development of Bicycle Facilities

DESIGN STRESSES

FIELD UNITS
f'c = 3,500 psi
fy = 60,000 psi (reinforcement)
fy = 50,000 psi (AASHTO M270 Gr. 50)

SEISMIC DATA

Seismic Performance Category (SPC) = A
Bedrock Acceleration Coefficient (A) = 0.035g
Site Coefficient (S) = 1.0



DESIGN SCOUR ELEVATION TABLE

Design Scour Elev. (ft)	E. Abut.	E. Pier	W. Pier	W. Abut.
	692.5	670.5	664.0	702.0

WATERWAY INFORMATION

Drainage Area = 1257 sq. mi. Low Grade Elev. 699.21 ft. @ Sta. 83+50

Flood	Freq. Yr.	C.F.S.	Opening Sq. Ft.		Nat. Head-Ft.		Headwater EL.		
			Exist.	Prop.	Exist.	Prop.	Exist.	Prop.	
Design	30	24,200	4895	5023	692.33	-0.10	-0.14	692.23	692.19
Base	100	32,100	5700	5916	694.54	-0.16	-0.23	694.38	694.31

NAME PLATE
See Sta. 51500!

KISHWAUKEE RIVER
BUILT 2011 BY
WINNEBAGO COUNTY
SEC. 03-00337-00-BR
F.A.U. RT. 5103 STA. 86+44
STR. NO. 101-3100 LOADING HL93

STUART M. KEMP
LICENSED STRUCTURAL ENGINEER
STATE OF ILLINOIS
10/26/10
11/30/10

"I certify that to the best of my knowledge, information and belief, this bridge design is structurally adequate for the design loading shown on the plans. The design is an economical one for the style of structure and complies with requirements of the current 'AASHTO Standard Specifications for Highway Bridges.'"

GENERAL PLAN & ELEVATION
STRUCTURE NUMBER 101-3100

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DESIGN NO. 03R1807
SHEET NO. 1
DATE 11/08/10
47 SHEETS

F.A.U. RTE.	SECTION	COUNTY	TOTAL SHEETS	SHEET NO.
5103	03-00337-00-BR	Winnebago	66	16

CONTRACT NO. 85523
ILLINOIS FED. AID PROJECT

Revised 1-10-11 ADDENDUM NO. 1

DATE PLOTTED: 11/23/10
 PLOT SCALE: 1"=20'-0"
 PLOT AREA: 10'x10'
 PLOT ORIGIN: 0,0
 PLOT UNIT: INCHES
 PLOT STYLE: ANIPLOT
 PLOT DEVICE: HPGL
 PLOT FILE: 101-3100-00-01.dwg
 PLOT USER: STUART M. KEMP