

Bench Mark: - Brass disk, DuPage County, West side of Grace Street beyond sidewalk. Approx. 180' South of Prairie Ave. Elev. 712.12

Existing Structure: None

Aerial Wire

**DESIGN STRESSES**

**FIELD UNITS**

f'c = 3,500 psi  
fy = 60,000 psi (Reinforcement)

**PRECAST UNITS**

f'c = 6,000 psi  
f'ci = 5,000 psi  
fpu = 270,000 psi (1/2"  $\phi$  low lax. strands)  
fpbt = 201,960 psi (1/2"  $\phi$  low lax. strands)  
f'c = 4,500 psi (Precast Panels)

**DESIGN SPECIFICATIONS**

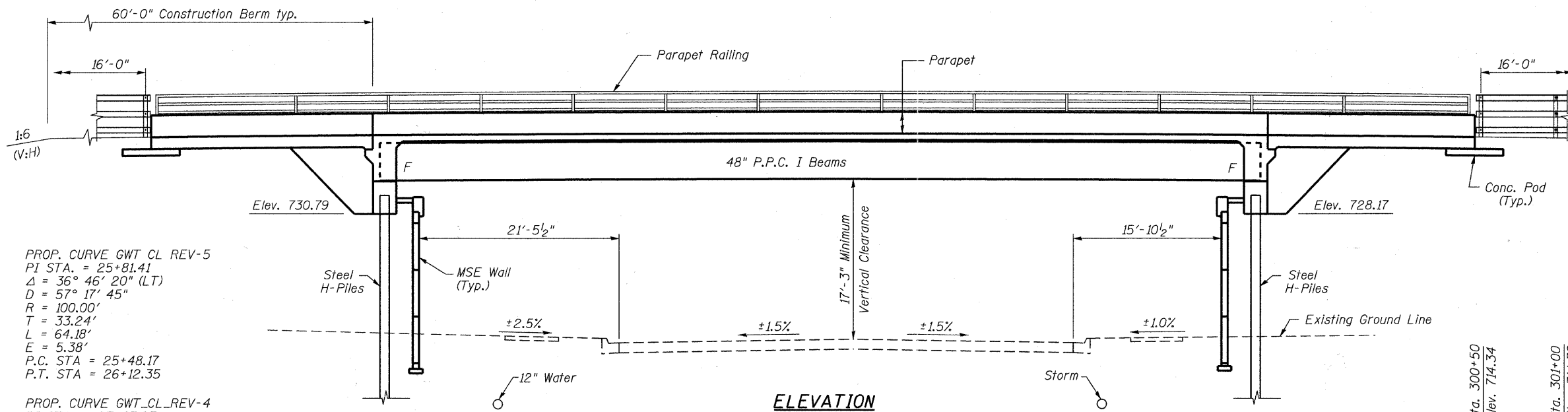
2007 AASHTO LRFD Bridge Design Specifications with 2008 and 2009 Interims  
2009 AASHTO LRFD Guide Specifications for the Design of Pedestrian Bridges

**LOADING H2O**

Pedestrian Live Load 90#/sq. ft.  
Allow 25#/sq. ft. for future wearing surface.

**SEISMIC DATA**

Seismic Performance Zone (SPZ) = 1  
Design Spectral Acceleration at 1.0 sec. (S<sub>01</sub>) = 0.087  
Design Spectral Acceleration at 0.2 sec. (S<sub>05</sub>) = 0.154  
Soil Site Class = D

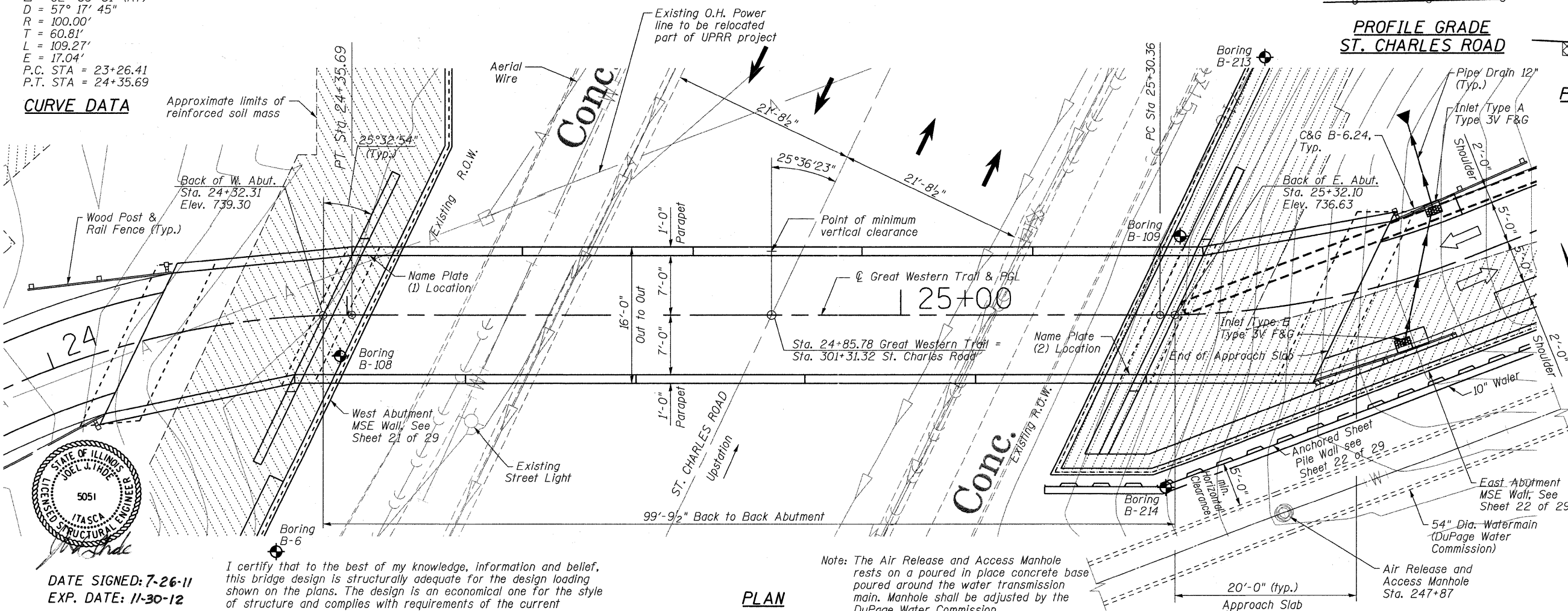


PROP. CURVE GWT CL REV-5  
PI STA. = 25+81.41  
 $\Delta = 36^\circ 46' 20''$  (LT)  
D = 57' 17' 45"  
R = 100.00'  
T = 33.24'  
L = 64.18'  
E = 5.38'  
P.C. STA = 25+48.17  
P.T. STA = 26+12.35

PROP. CURVE GWT CL REV-4  
PI STA. = 23+87.23  
 $\Delta = 62^\circ 36' 31''$  (RT)  
D = 57' 17' 45"  
R = 100.00'  
T = 60.81'  
L = 109.27'  
E = 17.04'  
P.C. STA = 23+26.41  
P.T. STA = 24+35.69

**CURVE DATA**

Approximate limits of reinforced soil mass



**PLAN**

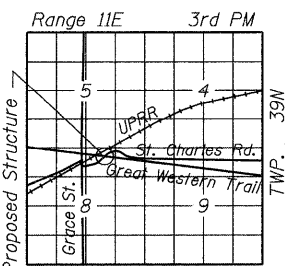
I certify that to the best of my knowledge, information and belief, this bridge design is structurally adequate for the design loading shown on the plans. The design is an economical one for the style of structure and complies with requirements of the current "AASHTO LRFD Bridge Design Specifications."

Note: The Air Release and Access Manhole rests on a poured in place concrete base poured around the water transmission main. Manhole shall be adjusted by the DuPage Water Commission.

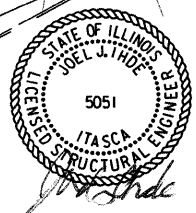
**PROFILE GRADE ST. CHARLES ROAD**

**PROFILE GRADE TRAIL**

Reinforced Soil Mass



**LOCATION SKETCH**



DATE SIGNED: 7-26-11  
EXP. DATE: 11-30-12

**Bollinger, Lach & Associates, Inc.**  
ITASCA, ILLINOIS

USER NAME =	DESIGNED SRT	REVISED -
PLOT SCALE =	CHECKED JJT	REVISED -
PLOT DATE =	DRAWN GM	REVISED -
	CHECKED JJT	REVISED -

**STATE OF ILLINOIS  
GREAT WESTERN TRAIL  
ST. CHARLES ROAD**

**GENERAL PLAN  
STRUCTURE NUMBER 022-3121  
SHEET NO. 1 OF 29 SHEETS**

F.A. RTE.	SECTION	COUNTY	TOTAL SHEETS	SHEET NO.
	06-00151-00-BR	DuPAGE	201	118
			CONTRACT NO. 63568	
ILLINOIS FED. AID PROJECT				