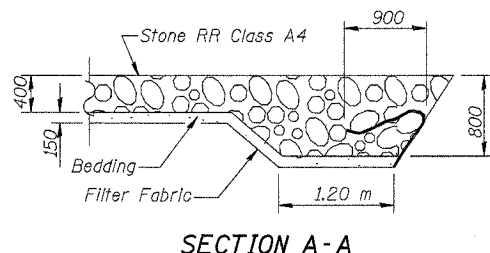
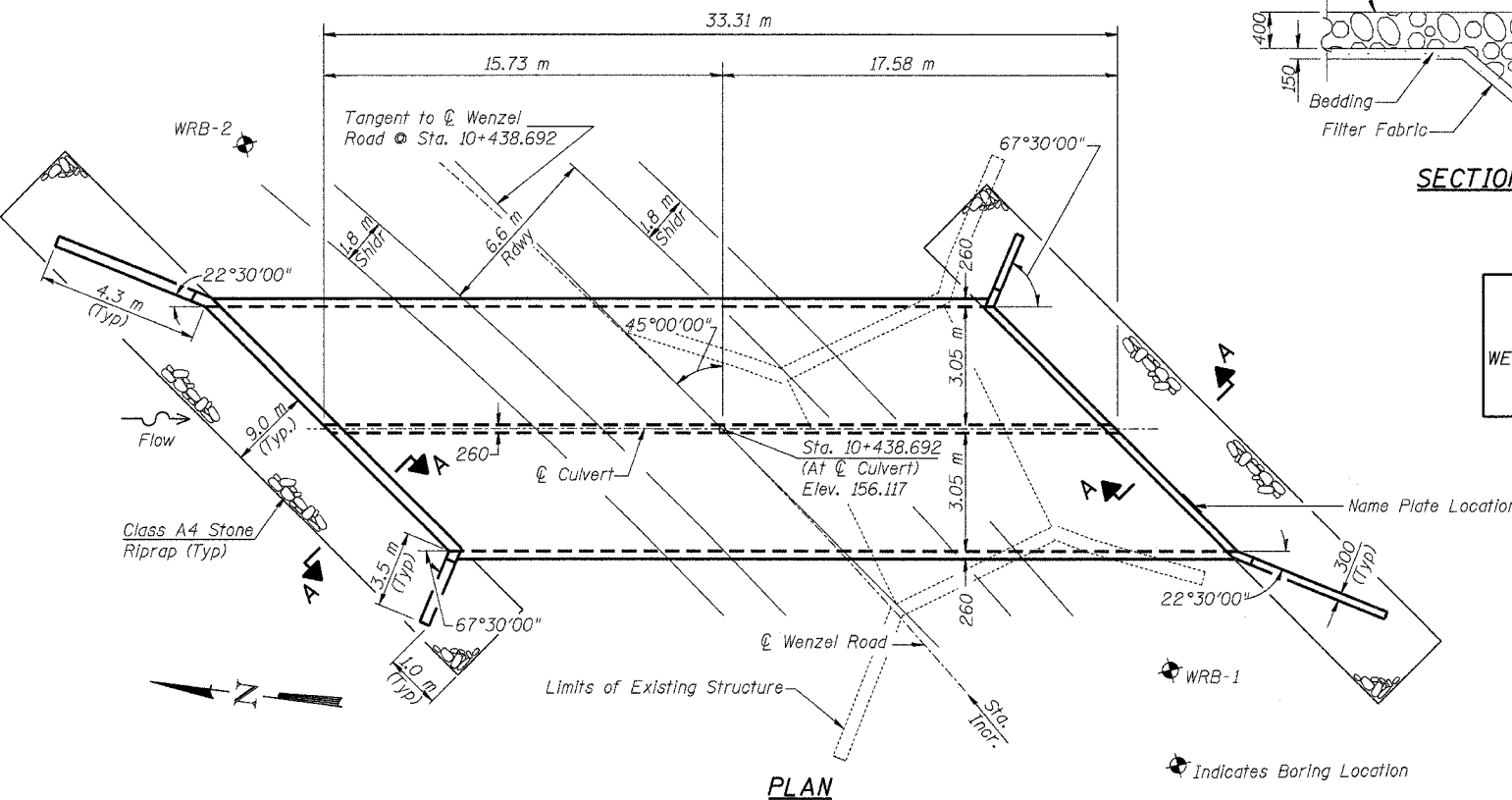
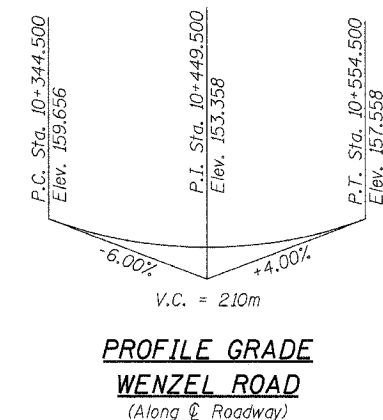
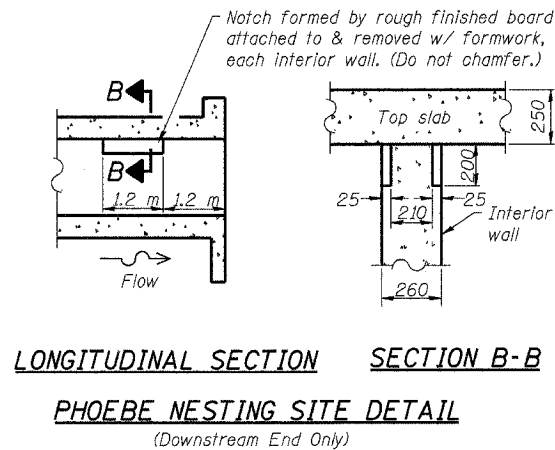
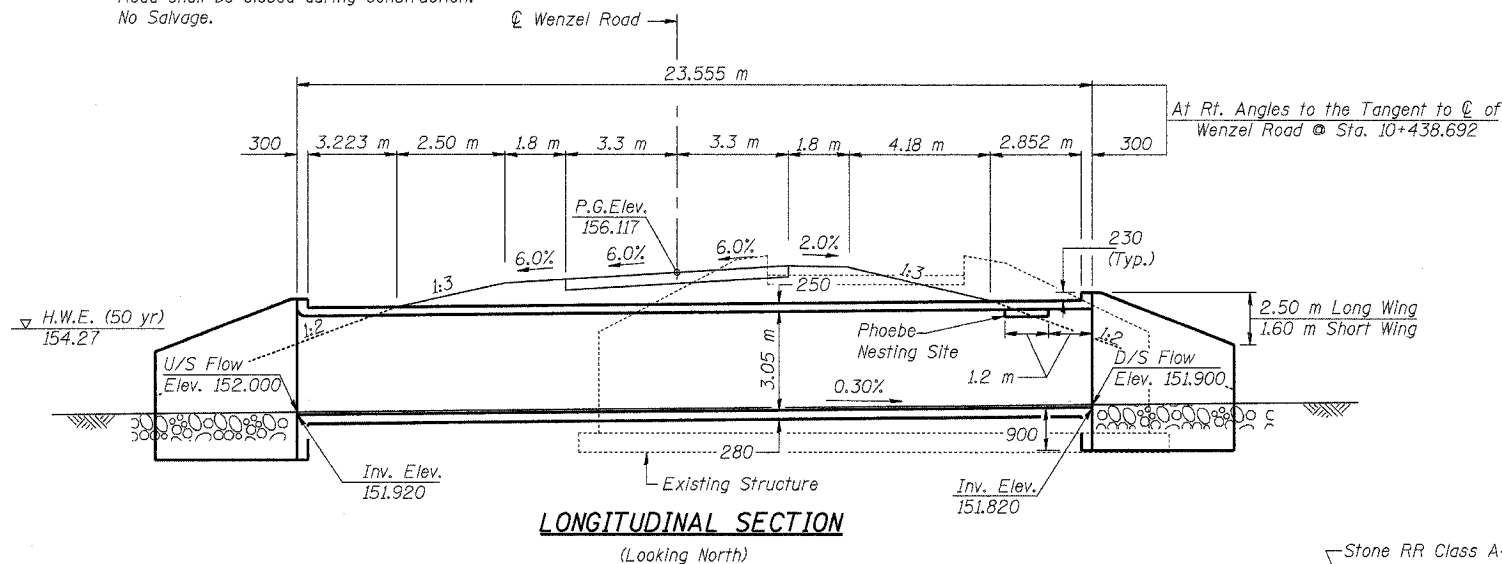


Bench Mark : Chiseled Square on the Southwest Wingwall of Bridge. Ele. 155.874 m

Existing Structure: The existing structure is a single span slab bridge measuring 6.18 m back to back of abutments and 5.58 m width outside face to outside face. The abutments are of closed type fixed at both ends with diagonal wings. The structure has no skew. Neither the existing structure plans nor the date of construction is available. Road shall be closed during construction. No Salvage.

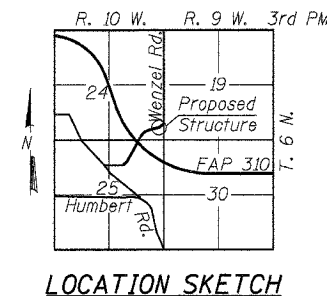
STATE OF ILLINOIS  
DEPARTMENT OF TRANSPORTATION

ROUTE NO.	SECTION	COUNTY	TOTAL SHEETS	SHEET NO.
F.A.P. 310	60-15HB	MADISON	185	96
CONTRACT NO. 76626				



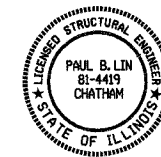
HORIZONTAL CURVE DATA

PI Sta. = 10+436.175  
 $\Delta$  = 76°18'06" (LT)  
 R = 145.000 m  
 T = 113.902 m  
 L = 193.099 m  
 E = 39.387 m  
 PC Sta. = 10+322.273  
 PT Sta. = 10+515.371  
 Full Superelevation = 6.0%



STATION 10+438.692  
 BUILT 200\_ BY  
 STATE OF ILLINOIS  
 WENZEL ROAD SEC. 60-15HB  
 LOADING MS18  
 STR. NO. 060-6900  
**NAME PLATE**  
 See Std. 515001

**APPROVED**  
 FOR STRUCTURAL ADEQUACY ONLY  
*Ralph E. Anderson*  
 ENGINEER OF BRIDGES AND STRUCTURES



*Paul B. Lin* 7/30/07 Date  
 Paul B. Lin  
 Licensed Structural Engineer  
 State of Illinois No. 81-4419  
 Expires 11/30/2008

GENERAL NOTES

1. Reinforcement Bars shall conform to the requirements of AASHTO M31M or M322M Grade 420.
2. For backfilling and embankment see Standard Specifications.
3. Layout of slope protection system may be varied in the field to suit ground conditions as directed by Engineer.
4. A distance of half the length of the wingwall but not less than two meters of the barrel shall be poured monolithically with the wingwalls.
5. Excavation behind existing abutment walls shall be done before removing the existing superstructure.
6. Precast culvert alternate is not allowed.
7. All dimensions are in millimeters (mm) except as noted.

DESIGN SPECIFICATIONS

2002 AASHTO Specifications

LOADING MS 18

Allow 2.4 kN/m<sup>2</sup> for future wearing surface.

DESIGN STRESSES

FIELD UNITS

$f'_c = 24$  MPa  
 $f'_y = 420$  MPa (Reinf.)

WATERWAY INFORMATION

Drainage Area = 277.13 Ha. (1.07 Sq. Mi.) Exist. Low Grade Elev. 155.879 m

Flood	Freq. Yr.	Q m <sup>3</sup> /s	Opening m <sup>2</sup>		Head - m		Headwater Elev.		
			Exist.	Prop.	Exist.	Prop.	Exist.	Prop.	
Design	50	37	11.99	14.93	154.27	0.38	0.00	154.65	154.27
Base	100	44	12.99	16.03	154.45	0.53	0.11	154.98	154.56
Max. Calc.	500	59	14.77	17.98	154.77	0.52	0.26	155.29	155.03

$\Delta$  At upstream face of culvert.

**LIN ENGINEERING, LTD.**  
 210 N. CHASTNUT  
 CHATHAM, ILLINOIS 62629  
 (618) 483-4688 FAX (618) 483-4706  
 Designed By: WJ Checked By: STJ Drawn By: JMD  
 Date: 07/03 File: 060-6900.D01

REVISIONS	
NAME	

ILLINOIS DEPARTMENT OF TRANSPORTATION  
**GENERAL PLAN**  
**WENZEL ROAD OVER ROCK CREEK BRANCH**  
**SECTION 60-15HB**  
**MADISON COUNTY**  
**STA. 10+438.692**  
**STRUCTURE NUMBER 060-6900**