

DESIGN DATA

LIVELOAD

DESIGN RATING: H-20
 INVENTORY RATING: HS21
 OPERATIONAL RATING: HS36
 STRUCTURE IS DESIGNED FOR A FUTURE WEARING SURFACE OF 20 POUNDS PER SQUARE FOOT.

ALLOWABLE DESIGN STRESSES

CONCRETE MASONRY - SLAB $f'_c = 4,000$ p.s.i.
 - ALL OTHER $f'_c = 3,500$ p.s.i.
 HIGH - STRENGTH BAR STEEL REINFORCEMENT, GRADE 60 $f_y = 60,000$ p.s.i.

FOUNDATION DATA

ABUTMENTS TO BE SUPPORTED ON $10\frac{3}{4}$ " ϕ C.I.P. CONCRETE PILES DRIVEN TO A MIN. BEARING VALVE OF 45 TONS PER PILE. EST. 35'-0" LONG.

HYDRAULIC DATA

100 YEAR FREQUENCY

Q100 DRAINAGE AREA	1,200	C.F.S.
VELOCITY	35.2	SQ. MI.
WATERWAY AREA - BRIDGE	8.3	F.P.S.
- OVERFLOW	128	SQ. FT.
Q100 - THRU BRIDGE	47	SQ. FT.
- OVERFLOW	1068	C.F.S.
HIGH WATER 100 ELEVATION	132	C.F.S.
DESIGN ROADWAY FREQUENCY	1443.2	±
OVERFLOW FREQUENCY	7 YEARS	
Q7 HIGH WATER 7 ELEVATION	700	C.F.S.
	1441.3	±

TRAFFIC DATA

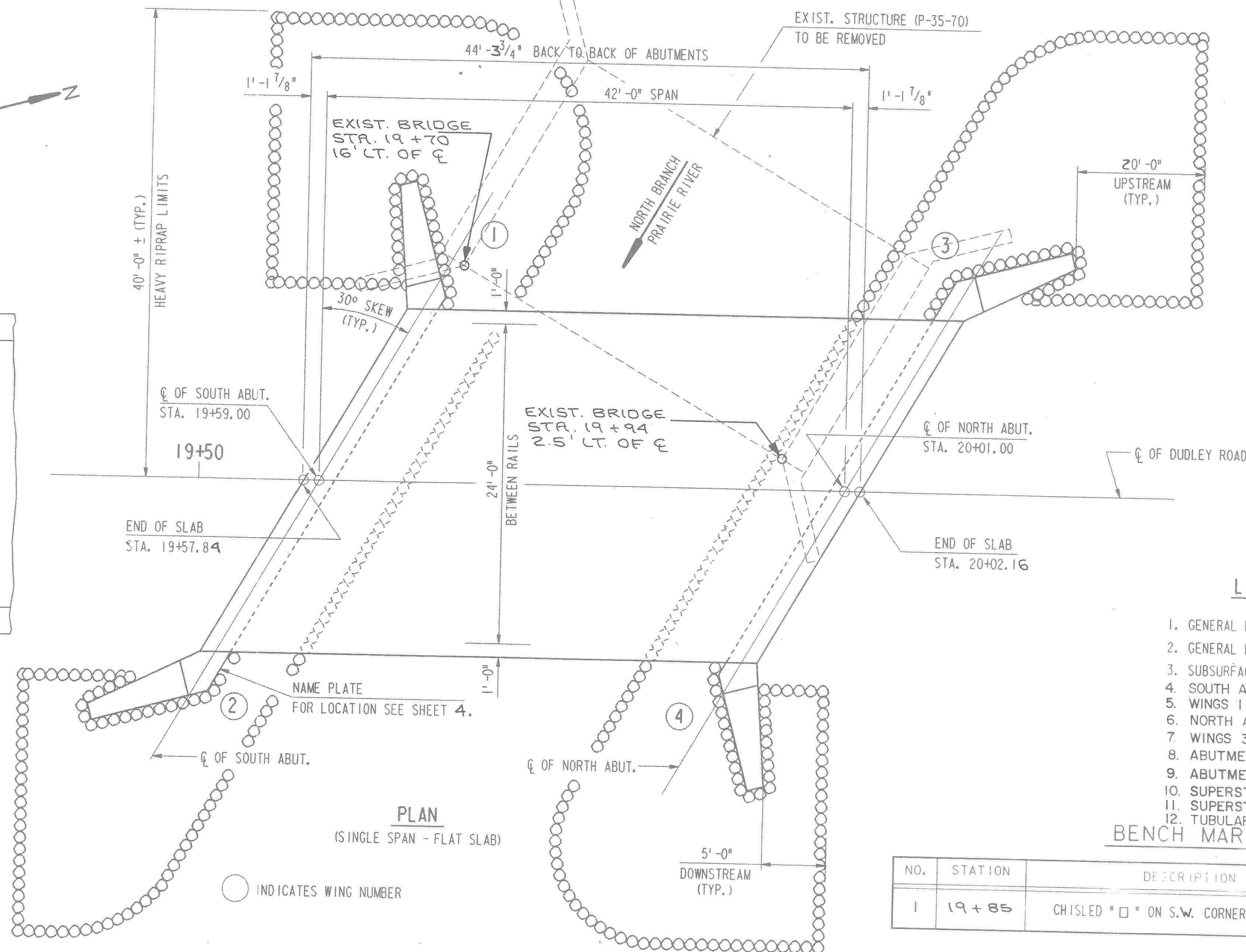
A. D. T. (1986) = 80
 A. D. T. (2006) = 120
 DESIGN SPEED = 40 M.P.H.

LIST OF DRAWINGS

1. GENERAL PLAN ——— X78440
2. GENERAL PLAN ——— X78441
3. SUBSURFACE EXPLORATION ——— X78442
4. SOUTH ABUTMENT ——— X78443
5. WINGS 1 & 2 ——— X78444
6. NORTH ABUTMENT ——— X78445
7. WINGS 3 & 4 ——— X78446
8. ABUTMENT DETAILS ——— X78447
9. ABUTMENT DETAILS ——— X78448
10. SUPERSTRUCTURE ——— X78449
11. SUPERSTRUCTURE ——— X78450
12. TUBULAR RAILING, TYPE F — X78451

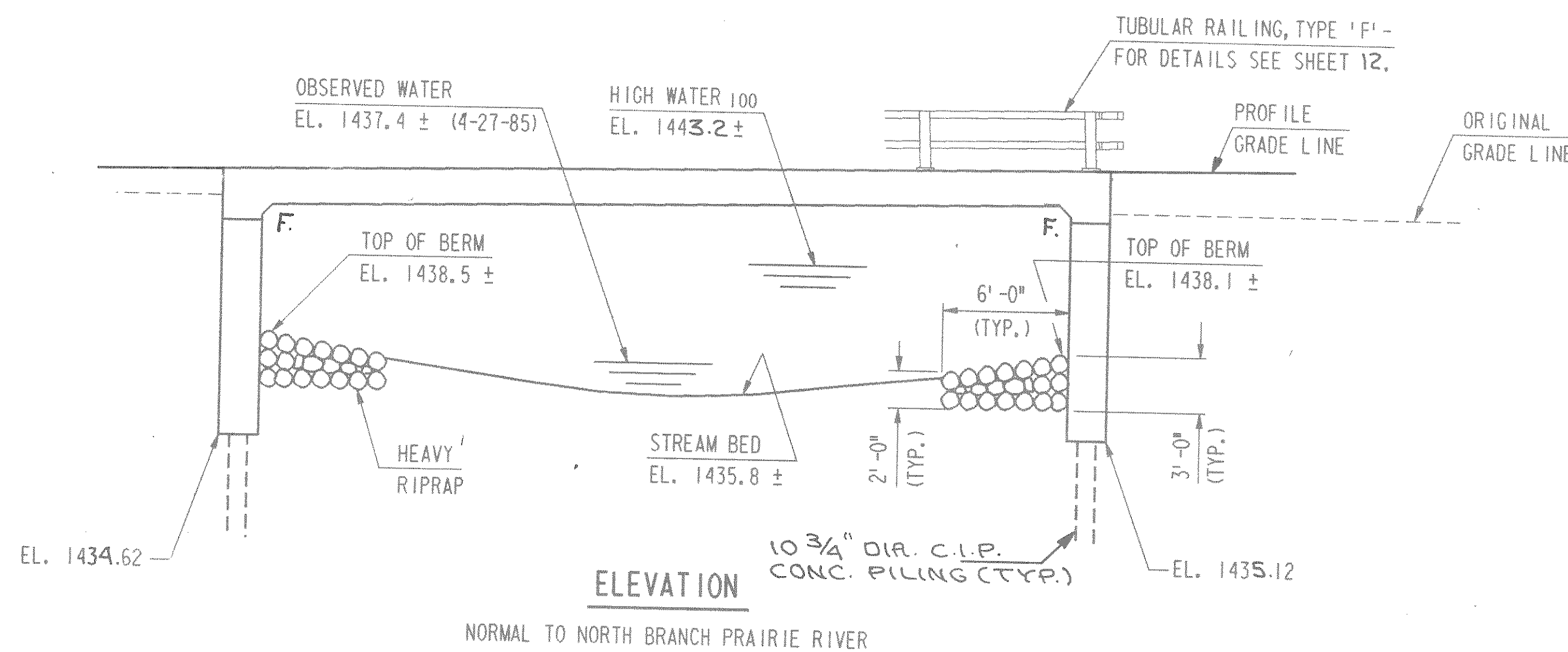
BENCH MARK

NO.	STATION	DESCRIPTION	ELEV.
1	19+85	CHISEL "□" ON S.W. CORNER OF WING WALL	1440.76



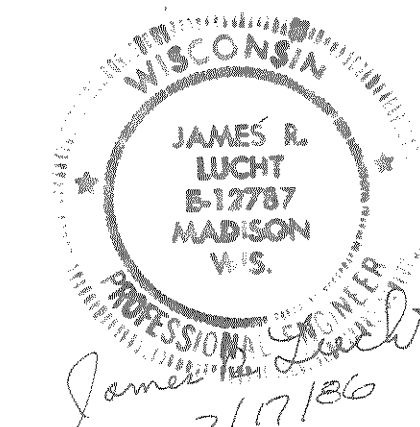
PLAN (SINGLE SPAN - FLAT SLAB)

○ INDICATES WING NUMBER

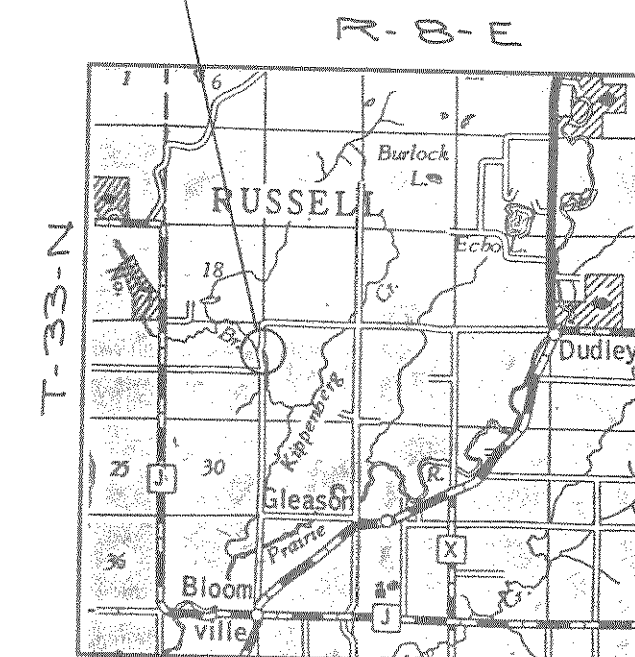


ELEVATION

NORMAL TO NORTH BRANCH PRAIRIE RIVER



PROJECT LOCATION



LAYOUT

No.	Date	Revision	By
Donohue Engineers & Architects COMPUTER AIDED DESIGN/DRAFTING			
STATE OF WISCONSIN DEPARTMENT OF TRANSPORTATION			
STRUCTURE B-35-93			
DUDLEY ROAD OVER NORTH BRANCH PRAIRIE RIVER			
County L INCOLN		TOWN OF RUSSELL	
Design Spec. AASHTO 1984	Load H-20	Const. Spec. WIS. 1981	
Designed By B. D.	Design Checked JRL	Drawn By D. F. K.	Plans Checked JRL
Approved State Bridge Engineer		Date	
GENERAL PLAN			SHEET 1 OF 12 X78440