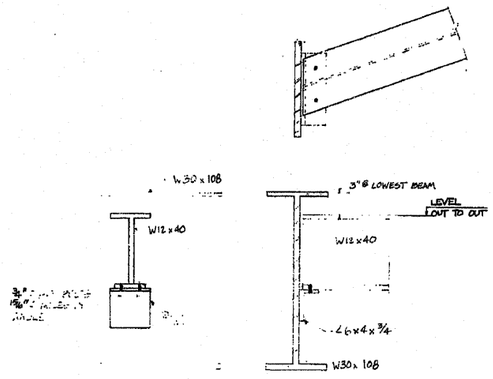
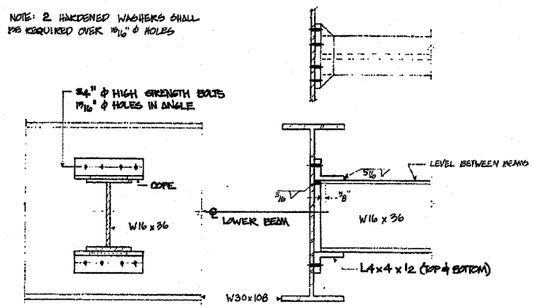
ROUTE NO.	SECTION	COUNTY	SHEET NO.	TOTAL SHEETS	SHEET NO. 7 SHEETS 13
561	105V-BR	WHITESIDE	34	16	

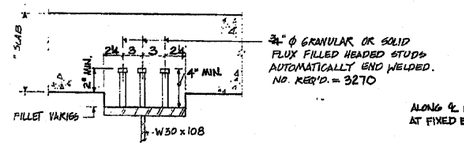
FOR INFORMATION ONLY



END DIAPHRAGM
NO. REQ'D. 24

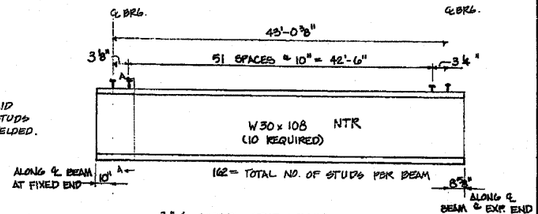


INTERIOR DIAPHRAGM
NO. REQ'D. 12



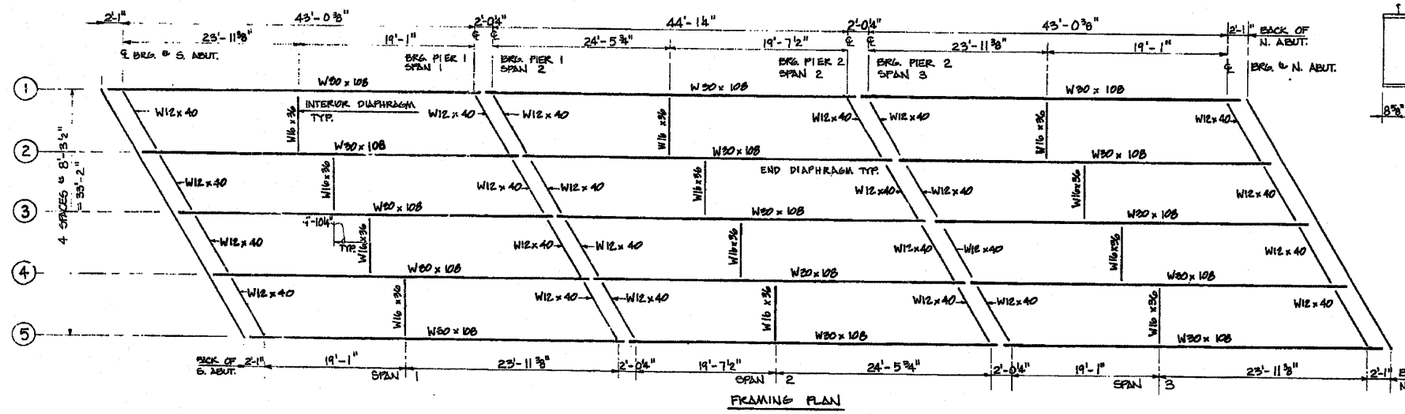
¾" ϕ GRANULAR OR SOLID FLUX FILLED HEADED STUDS AUTOMATICALLY END WELDED. NO. REQ'D. = 3270

SHEAR STUDS A-A

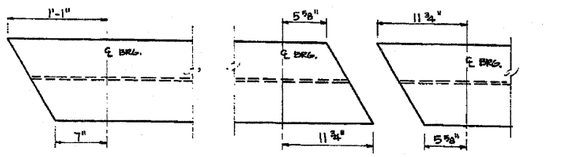


¾" ϕ SHEAR STUD SPACING
SPAN 1 AND SPAN 3

NTR- DESIGNATES NOTCH TOUGHNESS REQUIREMENTS



FRAMING PLAN

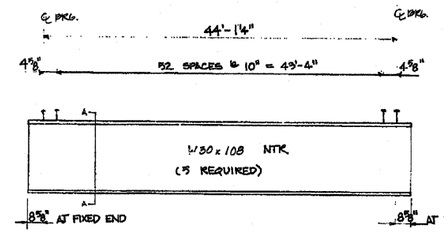


END OF BEAM DETAIL
FIXED BEARING AT ABUTMENTS

END OF BEAM DETAIL
EXPANSION BEARING @ PIERS

END OF BEAM DETAIL
FIXED BEARING @ PIERS

LOCATION	BEAM NO. 1	NO. 2	NO. 3	NO. 4	NO. 5
℄ BRG. S. ABUT.	662.66	662.82	662.98	662.81	662.65
℄ BRG. PIER 1 SPAN 1	662.61	662.79	662.96	662.78	662.54
℄ BRG. PIER 1 SPAN 2	662.60	662.74	662.86	662.71	662.54
℄ BRG. PIER 2 SPAN 2	662.42	662.56	662.65	662.49	662.30
℄ BRG. PIER 2 SPAN 3	662.41	662.59	662.63	662.47	662.29
℄ BRG. N. ABUT	662.10	662.22	662.30	662.13	662.05



165= TOTAL NO. OF STUDS PER BEAM

¾" ϕ SHEAR STUD SPACING SPAN 2

ALL CONTACT SURFACES OF JOINTS FOR THE DIAPHRAGMS SHALL BE FREE OF PAINT OR LACQUER.

SPAN 2

INTERIOR GIRDER MOMENT TABLE	
Is (in)	4470.
Ic (in)	12602.
Ss (in)	299.
Sc (in)	449.
DL (K/FT)	1.151
MDL (FT-K)	279.86
fs NON COMP(KSI)	11.23
S DL (K/FT)	0.599
M SDL	145.65
MLL	853.19
M IMP	252.41
TOTAL (FT K)	1251.91
fs COMP(KSI)	33.46
fs TOTAL (KSI)	44.69
VR (K)	55.41

I_s AND S_s ARE THE MOMENT OF INERTIA AND SECTION MODULUS OF THE STEEL SECTION USED IN COMPUTING f_s DOL.
I_c AND S_c ARE THE MOMENT OF INERTIA AND SECTION MODULUS OF THE COMPOSITE SECTION USED IN COMPUTING f_s TOTAL.
VR IS THE MAXIMUM LL + IMPACT SHEAR RANGE IN SPAN.
THE LOAD FACTOR 1.3 [DL + 5/3 (LL + IMP)] IS USED IN COMPUTING MOMENTS AND STRESSES.

INTERIOR GIRDER REACTION TABLE	
R DL (K)	38.59
R LL (K)	45.64
IMP (K)	13.64
R TOTAL (K)	97.72

GIRDER & FRAMING DETAILS
F.A. ROUTE 561 (ILLINOIS RT. 2)
OVER C&NW RR AT GALT
SECTION 105 VBR
WHITESIDE COUNTY
STA. 616+34.31

* FAS 1197 (West Lincolnway Road) & FAP 308 (IL 84)
**D2 Bridge Painting 2009-3

FILE NAME = P:\PAINTING\64E93\PLANeng.dgn	USER NAME = linkdj	DESIGNED - ---	REVISED - ---
		DRAWN - ---	REVISED - ---
	PLOT SCALE = 50.0000 ' / IN.	CHECKED - ---	REVISED - ---
	PLOT DATE = Thu Jan 29 10:19:28 2009	DATE - ---	REVISED - ---

STATE OF ILLINOIS
DEPARTMENT OF TRANSPORTATION

Existing Plans SN 098-0024

SCALE: --- | SHEET NO. -- OF --- SHEETS | STA. --- TO STA. ---

F.A. RTE.	SECTION	COUNTY	TOTAL SHEETS	SHEET NO.
*	**	Whiteside	15	6
		CONTRACT NO. 64E93		
		ILLINOIS FED. AID PROJECT		