

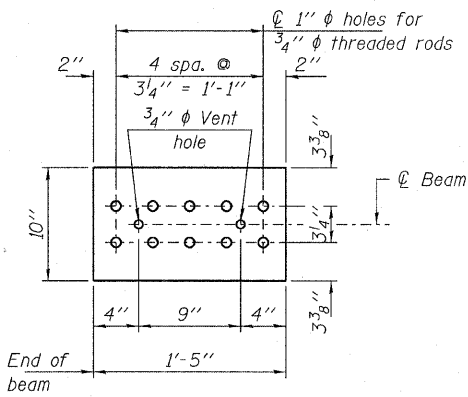
PLAN

INTERIOR BEAM MOMENT TABLE		
		0.5 Span
I	(in ⁴)	392,638
I'	(in ⁴)	701,203
S _b	(in ³)	12,224
S _b '	(in ³)	15,743
S _t	(in ³)	12,715
S _t '	(in ³)	37,985
Q	(k/ft.)	1.33
M _Q	('k)	1,623
s _Q	(k/ft.)	0.43
M _{s_Q}	('k)	522
M _L	('k)	795
M _(Imp)	('k)	175

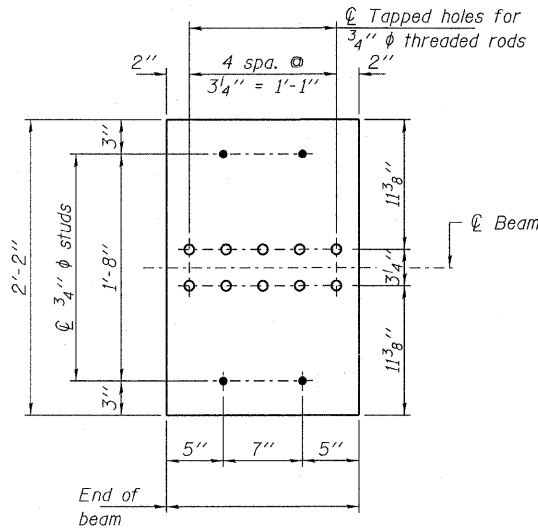
INTERIOR BEAM REACTION TABLE		
		Abut.
R _Q	(k)	66.5
R _{s_Q}	(k)	20.5
R _L	(k)	34.6
R _(Imp)	(k)	7.6
R _(Total)	(k)	129.2

DESIGNED - P.S.L.
CHECKED - M.D.C.
DRAWN - D.A.B.
CHECKED - M.D.C.

- I Non-composite moment of inertia of beam section (in⁴).
- I' Composite moment of inertia of beam section (in⁴).
- S_b Non-composite section modulus for the bottom fiber of the prestressed beam (in³).
- S_b' Composite section modulus for the bottom fiber of the prestressed beam (in³).
- S_t Non-composite section modulus for the top fiber of the prestressed beam (in³).
- S_t' Composite section modulus for the top fiber of the prestressed beam (in³).
- Q Un-factored non-composite dead load (kips/ft).
- M_Q Un-factored moment due to non-composite dead load conservatively taken at 0.5 of the span (kip-ft).
- s_Q Un-factored long-term composite (superimposed) dead load (kips/ft).
- M_{s_Q} Un-factored moment due to long-term composite (superimposed) dead load (kip-ft).
- M_L Un-factored live load moment on the composite section (kip-ft).
- M_(Imp) Un-factored moment due to impact on the composite section (kip-ft).

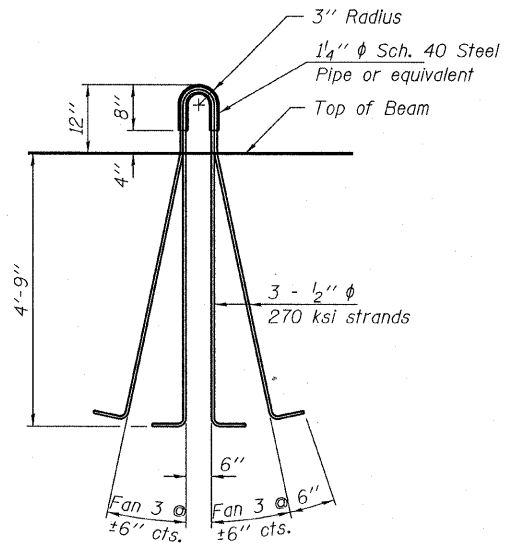


TOP PLATE



BOTTOM PLATE

See bearing details for pinhole locations when required.



LIFTING LOOP DETAIL

NOTES

- Inserts for 3/4" φ threaded dowel rods, when specified, are to be two strut, coil type for interior beams and single coil, flared loop type for exterior beams.
- Prestressing steel shall be uncoated high strength, low relaxation 7-wire strand, Grade 270.
- The nominal diameter shall be 1/2" and the nominal cross-sectional area shall be 0.153 sq. in.
- Non-prestressing steel shall conform to ASTM A 706 (IL MOD), Grade 60.
- A minimum 2 1/2" φ lifting pin shall be used to engage the lifting loops during handling.
- Cut G₆ bars when necessary to maintain 1/2" clearance.
- The top and bottom plates shall be AASHTO M270 Grade 50.
- The bottom plates and studs shall be galvanized according to AASHTO M111.
- Threaded rods shall be ASTM F 1554 Grade 55.

BILL OF MATERIAL

Item	Unit	Total
Furnishing and Erecting Precast Prestressed Concrete Bulb T-Beams, 63"	Foot	599

FRAMING PLAN & BEAM DETAILS
STRUCTURE NO. 029-0066

HAMPTON, LENZINI & RENWICK, INC. CIVIL & STRUCTURAL ENGINEERS LAND SURVEYORS 3085 STEVENSON DRIVE, SUITE 201 SPRINGFIELD, ILLINOIS 62703 (217) 546-3400	SHEET NO. 14 20 SHEETS	F.A.P.	SECTION	COUNTY	TOTAL SHEETS	SHEET NO.
		665	(144-B)BR	FULTON	67	30
		IL 116 OVER LITTLERS CREEK			CONTRACT NO. 68091	
PROJECT NUMBER: 12-37-0003-1		DATE: 07/31/08		FED. ROAD DIST. NO. 4 ILLINOIS FED. AID PROJECT		