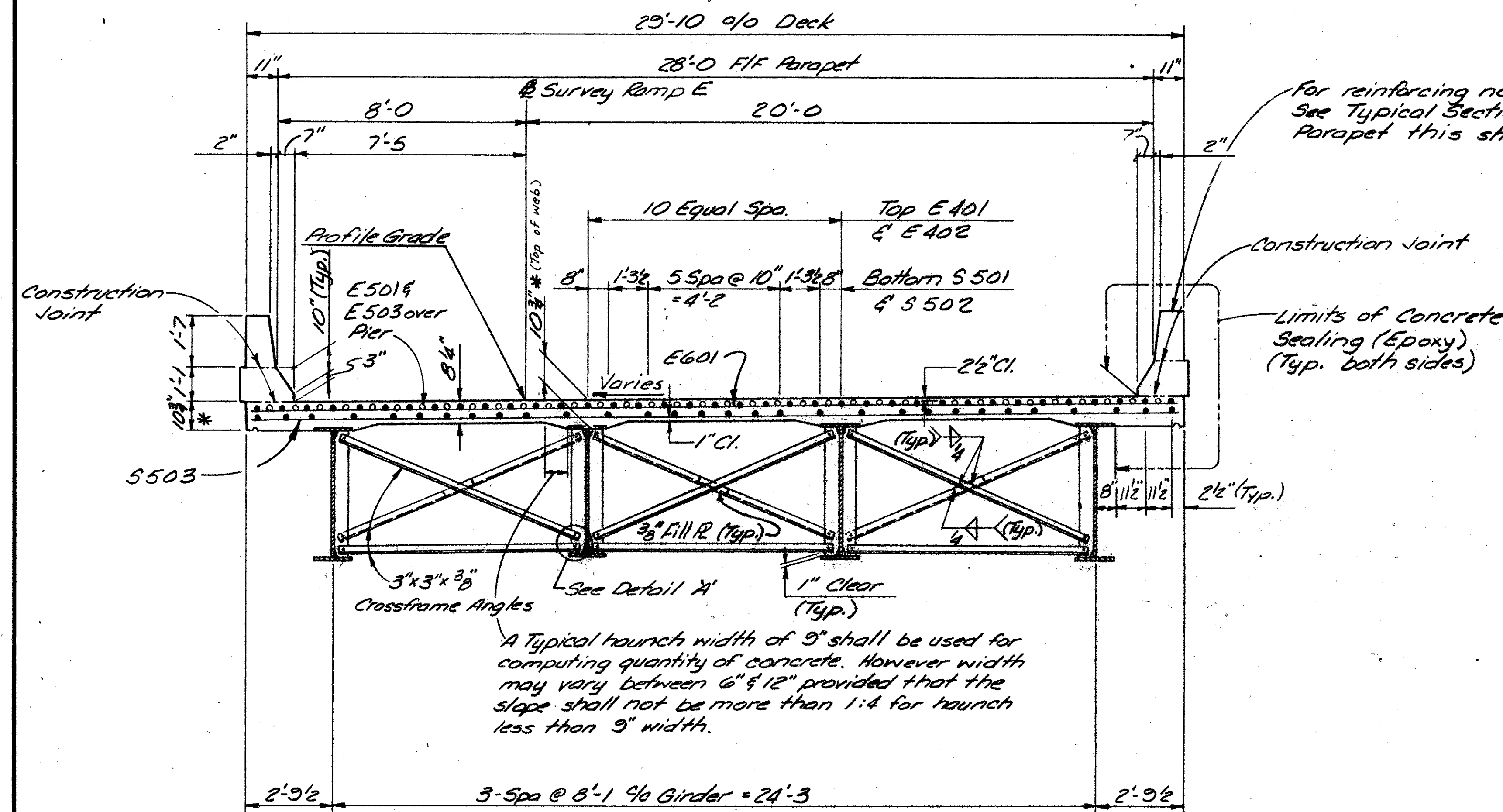


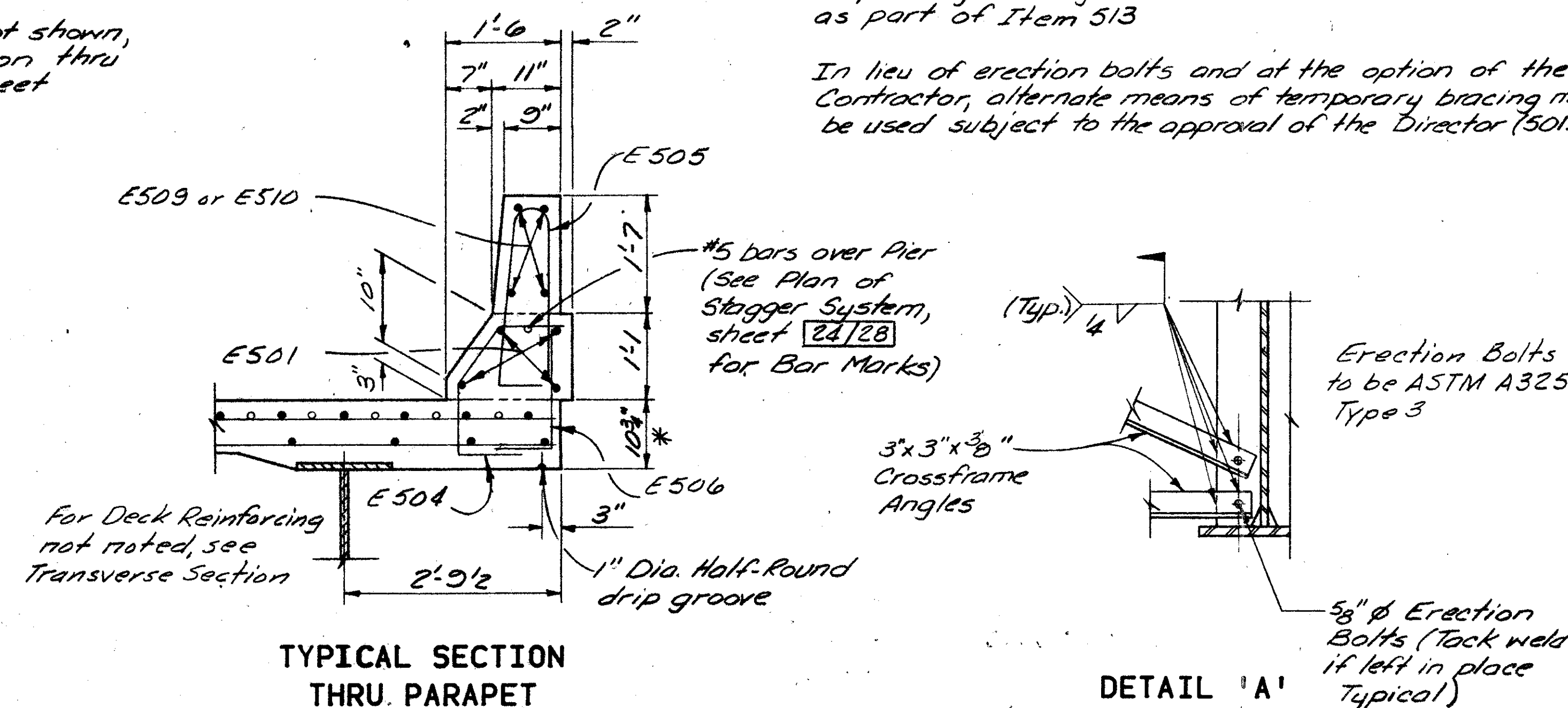
\*This is the design dimension. The quantity of deck concrete to be paid for shall be based upon this dimension, even though deviation from it may be necessary because the top flange of the girder may not have the exact camber or conformation required to place it parallel to the finished grade. Deduction shall be made for volume of encased steel plates as per 511.18

Erection Bolts:  
Hole diameter in the crossframes and girder stiffeners shall be respectively  $\frac{1}{16}$ " and  $\frac{1}{4}$ " larger than the diameter of the erection bolts. Unless replaced by permanent high strength bolts, erection bolts shall remain in place. Lock washers shall be furnished for other than fully torqued high strength erection bolts. Bolts furnished as part of Item 513

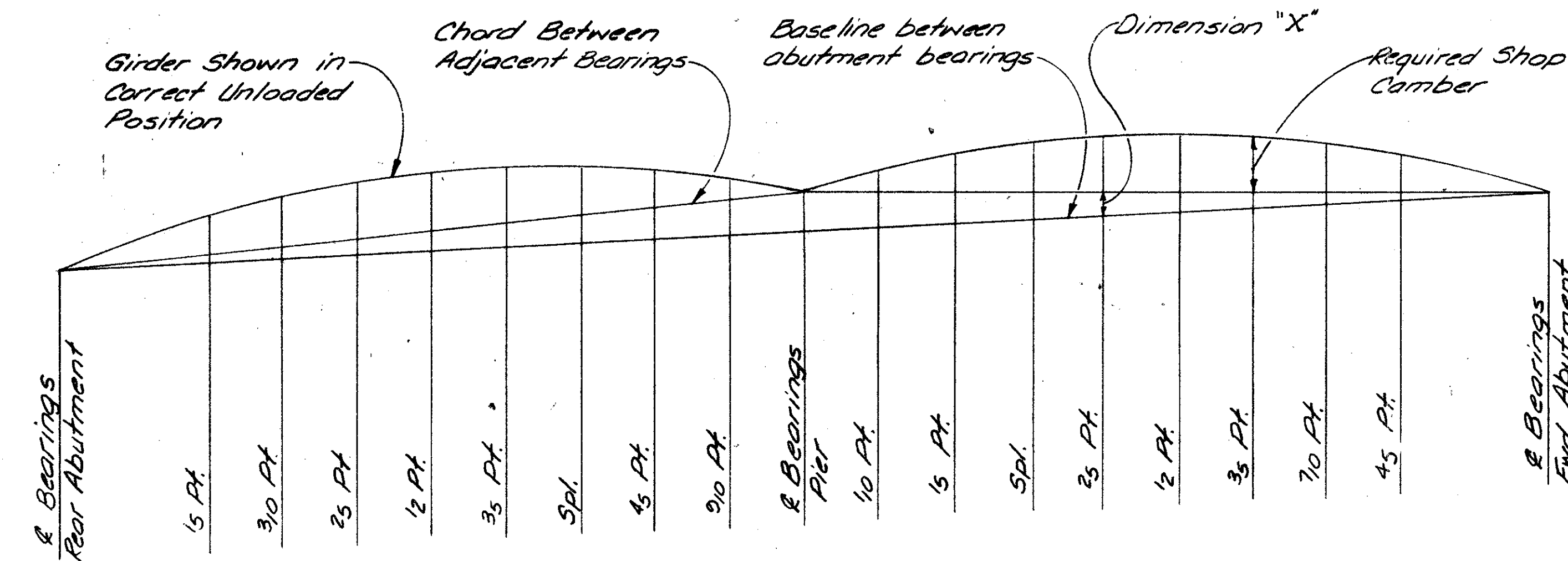
In lieu of erection bolts and at the option of the Contractor, alternate means of temporary bracing may be used subject to the approval of the Director (501.06)



TRANSVERSE SECTION



| CAMBER AND DEFLECTION                                                             |          |            |         |         |         |         |         |         |         |        |         |       |        |         |        |         |         |         |         |      |      |
|-----------------------------------------------------------------------------------|----------|------------|---------|---------|---------|---------|---------|---------|---------|--------|---------|-------|--------|---------|--------|---------|---------|---------|---------|------|------|
|                                                                                   |          | GIRDER NO. | SPAN 1  |         |         |         |         |         |         |        |         |       | SPAN 2 |         |        |         |         |         |         |      |      |
|                                                                                   |          |            | 2 Bg    | 5 Pt    | 30 Pt   | 3 Pt    | 2 Pt    | 3 Pt    | 3 Pl    | 15 Pt  | 30 Pt   | 2 Bg  | 10 Pt  | 5 Pt    | 3 Pl   | 15 Pt   | 2 Pt    | 3 Pt    | 30 Pt   | 5 Pt | 2 Bg |
| DIMENSION 'X'<br>(SEE NOTE 1)                                                     | 1        | 0          | 13/16   | 1/4     | 1 1/16  | 2 1/8   | 2 1/8   | 3 1/8   | 3 3/8   | 3 3/4  | 4 1/8   | 3 3/4 | 3 3/8  | 3       | 2 1/8  | 2 1/8   | 1 1/16  | 1/4     | 1 3/16  | 0    |      |
|                                                                                   | 2        | 0          | 9/16    | 13/16   | 1 1/16  | 1 5/8   | 1 5/8   | 2       | 2 1/8   | 2 1/8  | 2 11/16 | 2 1/8 | 2 1/8  | 1 15/16 | 1 5/8  | 1 5/8   | 1 1/16  | 1 3/16  | 9/16    | 0    |      |
|                                                                                   | 3        | 0          | 1/4     | 3/8     | 1/2     | 5/8     | 3/4     | 1 5/16  | 1       | 1 1/8  | 1 1/4   | 1 1/8 | 1      | 1 5/16  | 3 1/4  | 5/8     | 1/2     | 3/8     | 4       | 0    |      |
|                                                                                   | 4        | 0          | 0       | 0       | 0       | -1/16   | -1/16   | -1/16   | -1/16   | -1/16  | -1/16   | -1/16 | -1/16  | -1/16   | -1/16  | -1/16   | 0       | 0       | 0       | 0    |      |
| DEFLECTION DUE TO WEIGHT OF STEEL                                                 | 1 THRU 4 | 0          | 3/8     | 1/2     | 9/16    | 1/2     | 7/16    | 1/4     | 1/8     | 1/16   | 0       | 0     | 1/8    | 3/16    | 5/16   | 7/16    | 7/16    | 5/16    | 0       |      |      |
| DEFLECTION DUE TO REMAINING DEAD LOAD                                             | 1 THRU 4 | 0          | 1 3/8   | 2 7/16  | 2 5/8   | 2 1/2   | 2 1/16  | 1       | 3/4     | 1/4    | 0       | 1/8   | 7/16   | 3/8     | 1 5/8  | 2       | 2 3/16  | 2       | 1 9/16  | 0    |      |
| CONVEXITY (SEE NOTE 2)<br>REQUIRED FOR<br>VERTICAL CURVE PLUS<br>SURFACE GEOMETRY | 1        | 0          | 1 13/16 | 2 5/16  | 2 5/8   | 2 3/8   | 2 3/8   | 1 1/2   | 1 3/16  | 5/8    | 0       | 1/4   | 1/2    | 5/8     | 1 5/16 | 3/8     | 1 1/16  | 1/2     | 3/8     | 0    |      |
|                                                                                   | 2        | 0          | 1 1/2   | 1 15/16 | 2 1/16  | 1 15/16 | 1 5/8   | 1       | 1 3/16  | 7/16   | 0       | 3/16  | 5/16   | 7/16    | 1/2    | 7/16    | 5/16    | 1/4     | 3/16    | 0    |      |
|                                                                                   | 3        | 0          | 1 3/16  | 1 3/8   | 1 3/8   | 1 1/8   | 1 5/16  | 9/16    | 1/2     | 1/4    | 0       | 0     | 1/16   | 1/8     | 1/16   | 1/16    | 1/16    | 1/16    | 0       | 0    |      |
|                                                                                   | 4        | 0          | 3/4     | 1 3/16  | 9/16    | 1/2     | 3/4     | 1/4     | 3/16    | 1/8    | 0       | -1/8  | -1/4   | -1/4    | -3/16  | -3/16   | -1/8    | -1/8    | -1/16   | 0    |      |
| REQUIRED SHOP CAMBER                                                              | 1        | 0          | 4 1/16  | 5 1/4   | 5 13/16 | 5 5/8   | 4 3/8   | 2 3/4   | 2 1/16  | 1 5/16 | 0       | 3/8   | 1 1/16 | 1 11/16 | 2 3/8  | 3 5/16  | 3 5/16  | 2 15/16 | 2 1/4   | 0    |      |
|                                                                                   | 2        | 0          | 3 3/4   | 4 3/8   | 5 1/4   | 4 15/16 | 4 3/8   | 2 1/4   | 1 11/16 | 3/4    | 0       | 5/16  | 7/8    | 1 1/2   | 2 1/16 | 2 3/8   | 2 15/16 | 2 11/16 | 2 1/16  | 0    |      |
|                                                                                   | 3        | 0          | 3 11/16 | 4 5/16  | 4 9/16  | 4 3/8   | 3 11/16 | 1 13/16 | 1 3/8   | 9/16   | 0       | 1/8   | 5/8    | 1 3/16  | 2      | 2 11/16 | 2 1/2   | 1 7/8   | 0       |      |      |
|                                                                                   | 4        | 0          | 3       | 3 3/4   | 3 3/4   | 3 1/2   | 2 7/8   | 1 1/2   | 1 1/16  | 7/16   | 0       | 0     | 5/16   | 1 3/16  | 1 3/8  | 2 1/4   | 2 1/2   | 2 1/16  | 1 13/16 | 0    |      |



CAMBER AND DEFLECTION DIAGRAM

NOTE 1 - NEGATIVE VALUES FOR DIMENSION 'X' INDICATES THAT THE CHORD BETWEEN ADJACENT BEARINGS IS LOCATED BELOW THE BASELINE BETWEEN ABUTMENT BEARINGS.

NOTE 2 - NEGATIVE VALUES FOR CONVEXITY INDICATES THAT THE CONVEXITY IS LOCATED BELOW THE CHORD BETWEEN ADJACENT BEARINGS.

W.E. QUICKSALL AND ASSOCIATES, INC.  
NEW PHILADELPHIA, OHIO

SUPERSTRUCTURE DETAILS

BRIDGE NO. JEF-22-0761  
RAMP 'E' OVER U.S. 22

|                  |     |               |          |
|------------------|-----|---------------|----------|
| JEFFERSON COUNTY |     | STA. 81+98.76 |          |
| DESIGNED         |     | DATE          |          |
| FDH              | FDH | JMG           | wdg 9/85 |