SOLE PLATE DETAIL

SCALE: 3" = 1'-0"

NOTES:

1. These notes are to be used with the details on Dwg. No. 8.3.1.
2. This type of sliding bearing shall be used where it is necessary to minimize the superstructure thermal or seismic forces on the substructure.
3. \( D = \) Diameter of Elastomeric Bearing Pad;  
   \( LM = \) Length of Stainless Steel Mating Surface = \( D + 2" \);  
   \( WM = \) Width of Stainless Steel Mating Surface = \( D + (\text{calculated total thermal movement range} \times 1.5) \), rounded up to nearest \( \frac{1}{2}" \);  
   \( WS = \) Width of Sole Plate = \( WM + 1" \);  
   \( LS = \) Length of Sole Plate =  
      a) for anchor bolts not exceeding \( \frac{1}{2}" \) \( \phi \) is equal to (\( LM \) or width of flange, whichever is greater) + 12";  
      b) for anchor bolts greater than \( \frac{1}{2}" \) \( \phi \) it shall be determined by Designer.
4. The end of the beam and sole plate may be flush, however the sole plate cannot extend beyond the beam end. If required, increase the length of beam so that it always stays flush with sole plate.
5. Width of bridge seat may need to be increased to provide this clearance after the beam reaches its maximum thermal expansion length.
6. Width of bridge seat may need to be increased to maintain these clearances.
7. Size of slotted hole:  
   Width = (bolt diameter) \( \times 1.25 \), rounded up to nearest \( \frac{1}{4}" \).  
   Length = (calculated thermal movement) \( \times 1.5 \) + (width of slot), rounded up to nearest \( \frac{1}{4}" \).
8. Sole plate must be tapered if slope of beam bottom flange due to roadway grade and camber exceeds 1%. Provide detail of tapered sole plate as shown above.
9. Do not use the bearing assembly shown in Dwg. No. 8.3.3 with the full depth end diaphragms as shown in Section 3.7. Instead, use the bearing assembly shown in Dwg. No. 8.3.7.