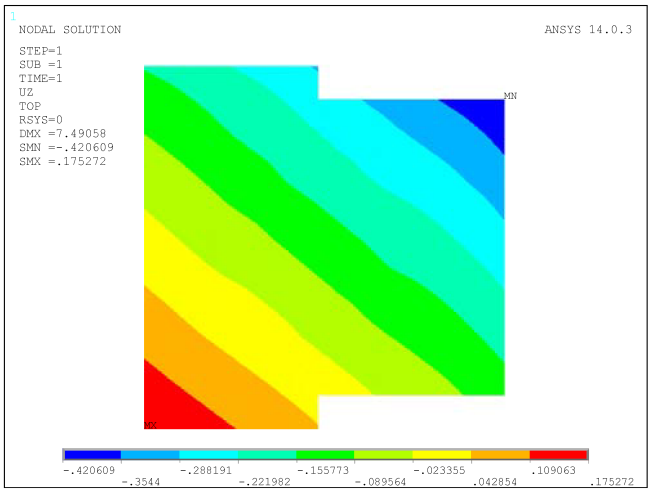
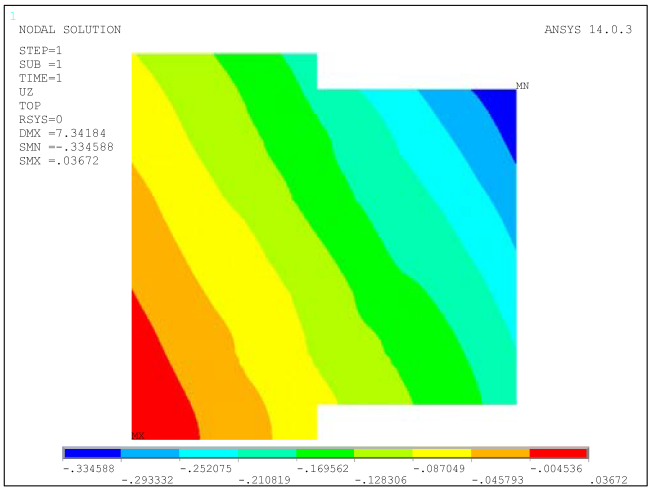
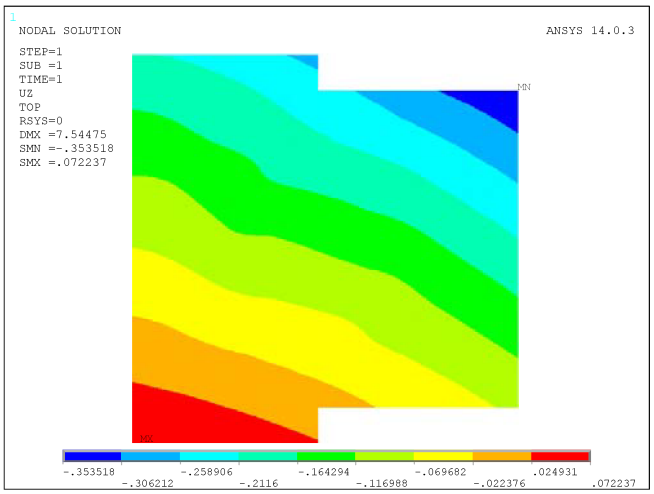


(a) LC08

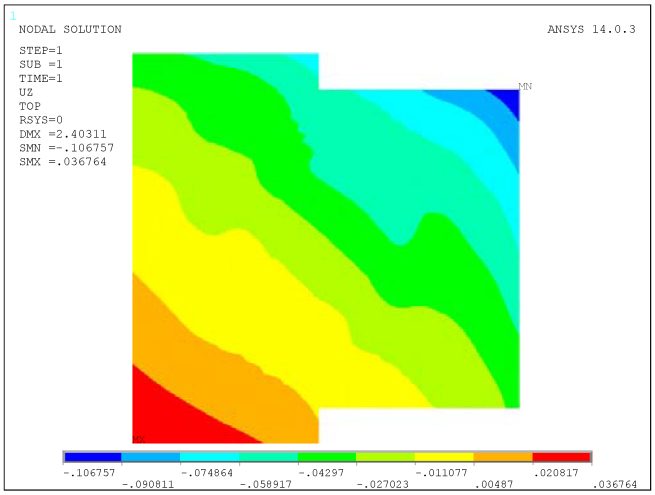


(b) LC10

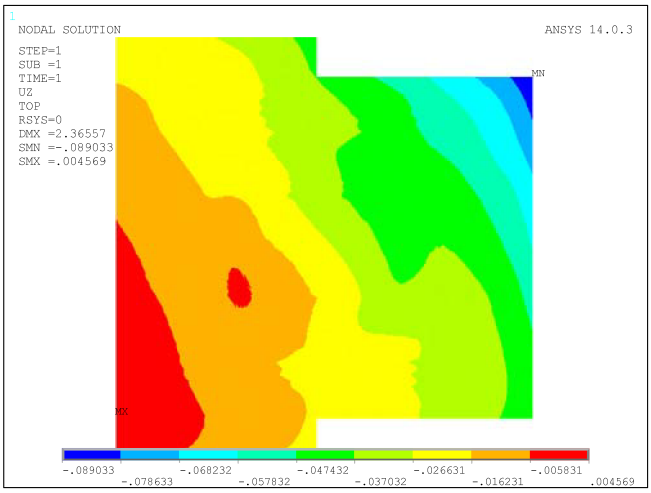


(c) LC12

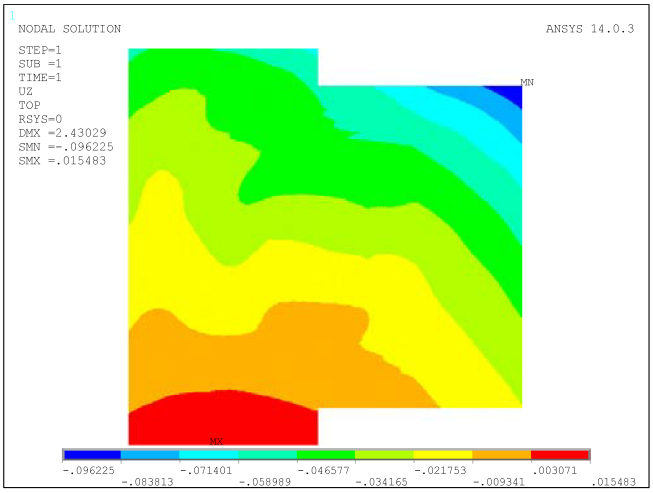
Figure 4-1. Deformation Contour of AB Basemat (UZ, S1)



(a) LC08

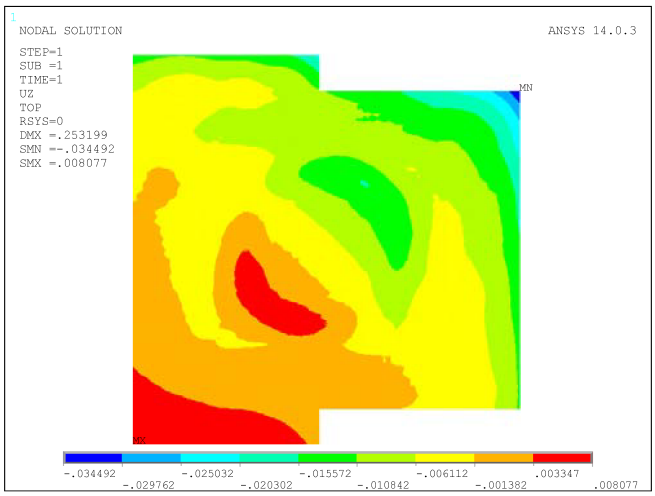


(b) LC10

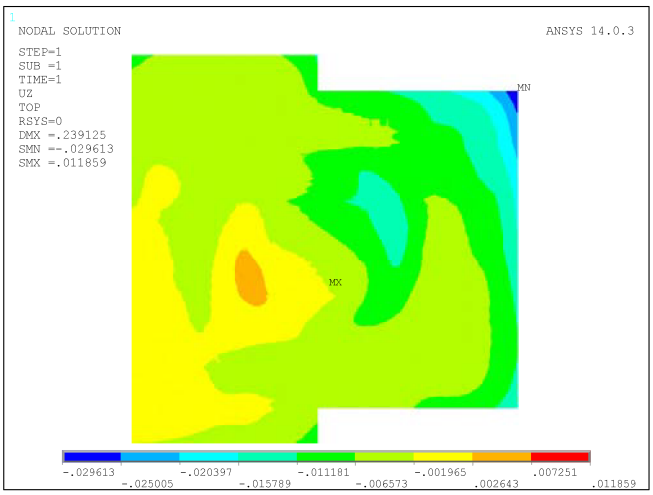


(c) LC12

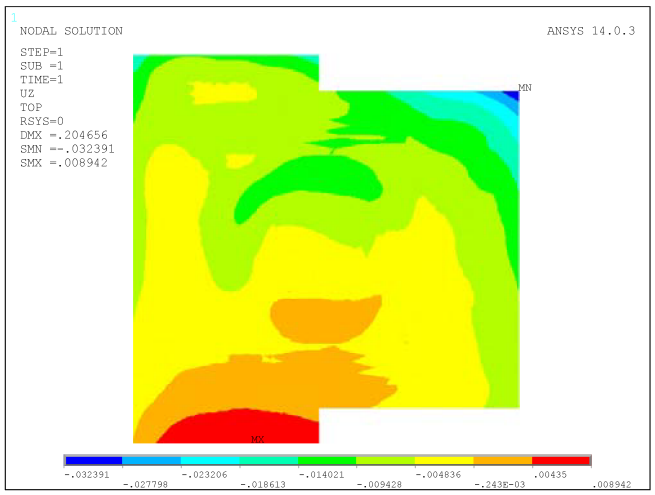
Figure 4-2. Deformation Contour of AB Basemat (UZ, S4)



(a) LC08



(b) LC10



(c) LC12

Figure 4-3. Deformation Contour of AB Basemat (UZ, S8)

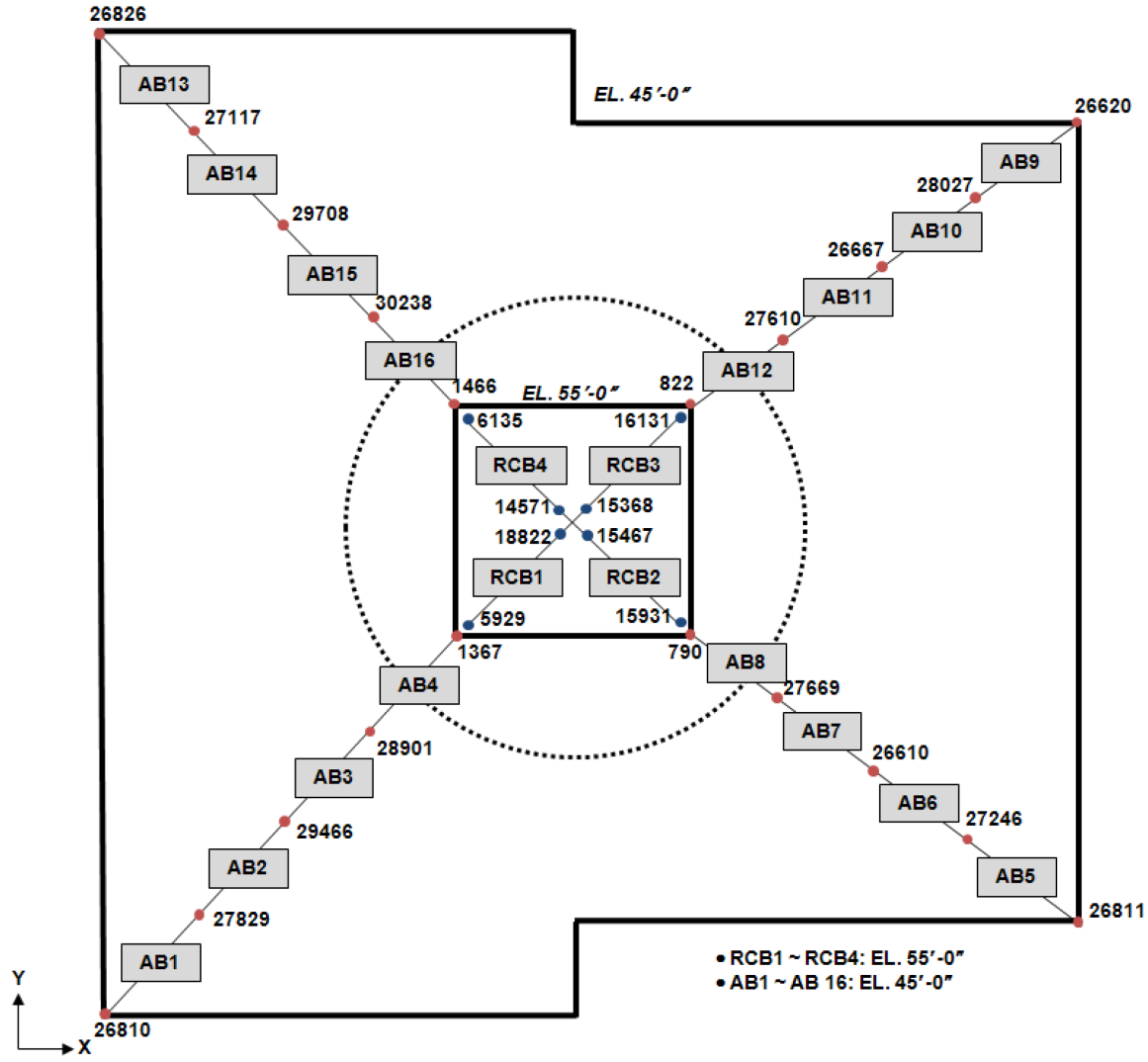


Figure 4-4. Node Location at Bottom of NI Common Basemat for Settlement Check

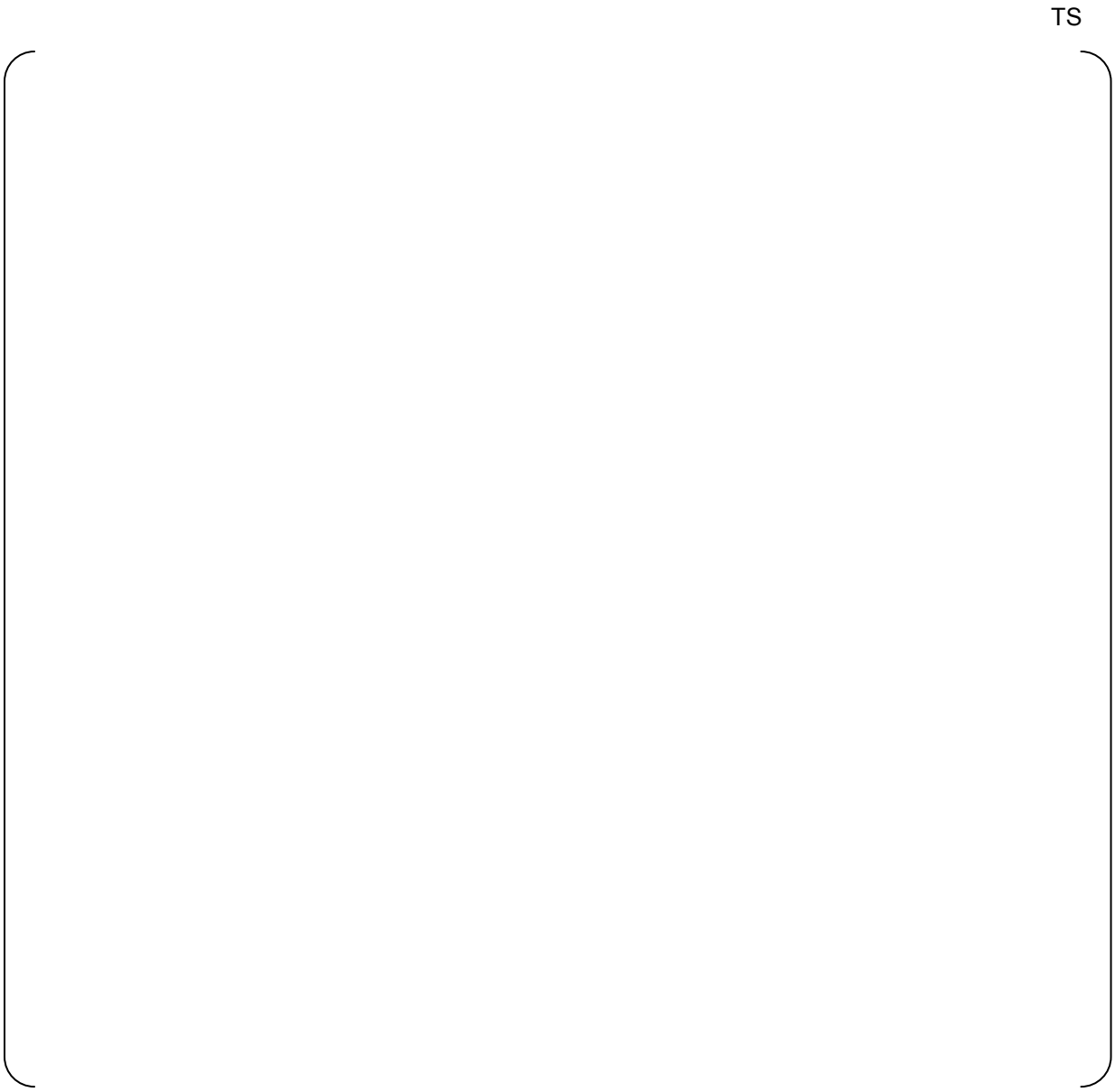
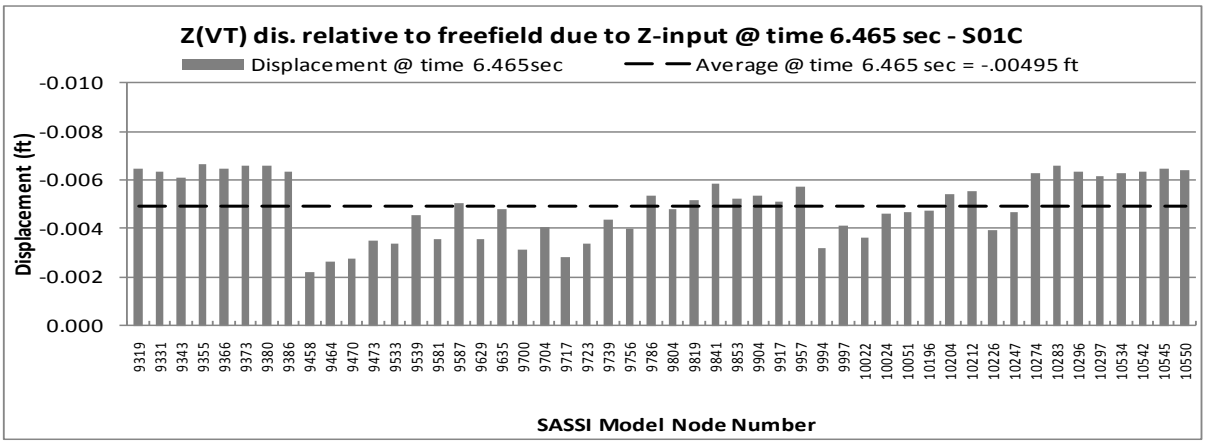
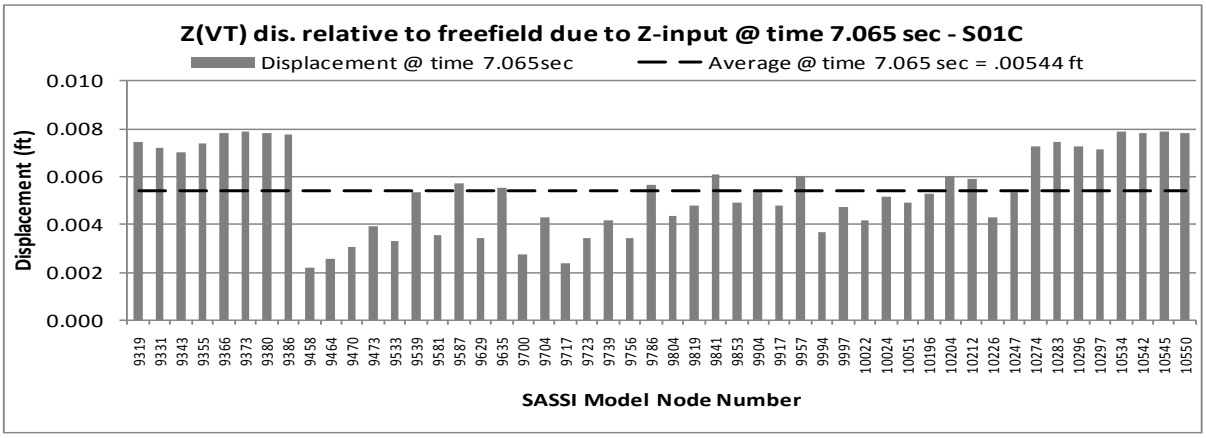


Figure 4-5. Locations of 50 Basemat SASSI Nodes for Relative Displacement Calculation

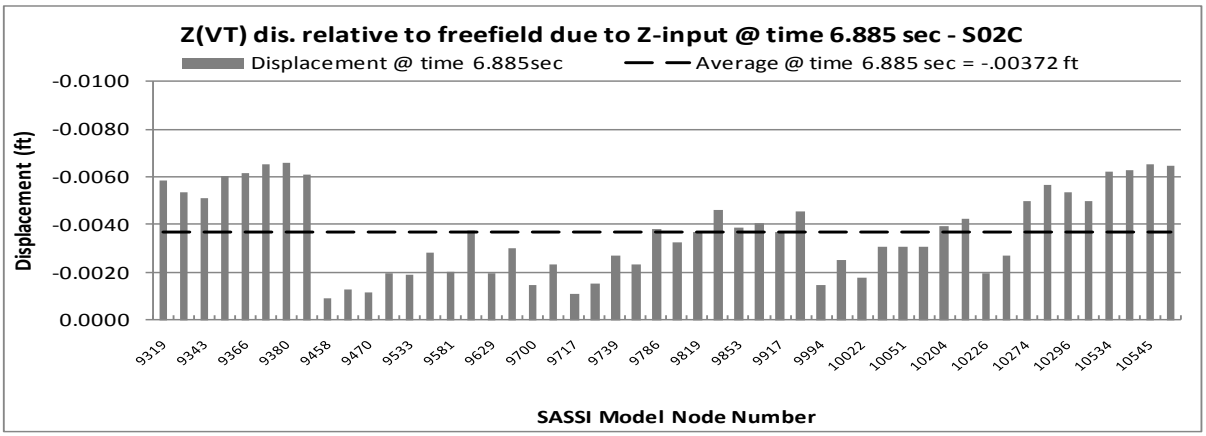


(a) Z-input at time 6.465 sec (at time of minimum average)

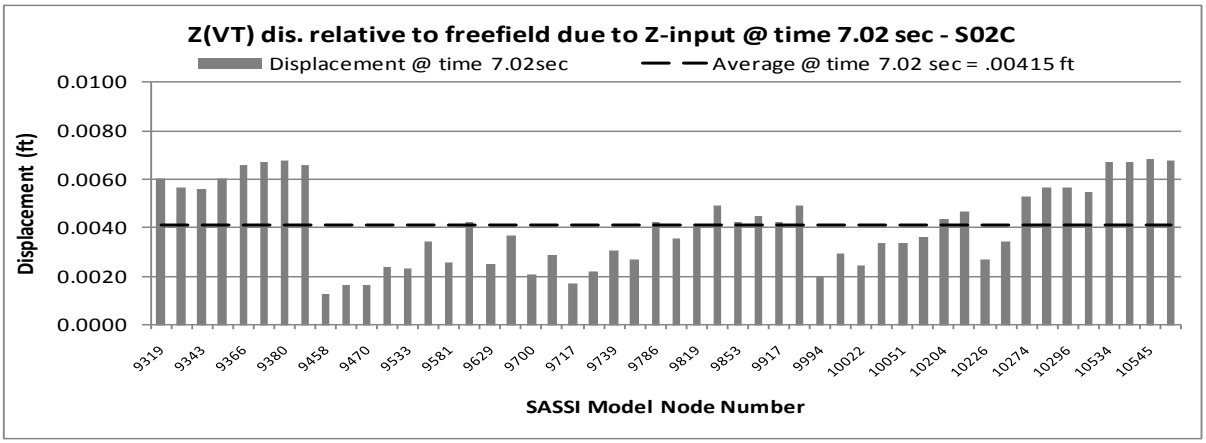


(b) Z-input at time 7.065 sec (at time of maximum average)

Figure 4-6. Displacements of Basemat due to Seismic Loading (S1)

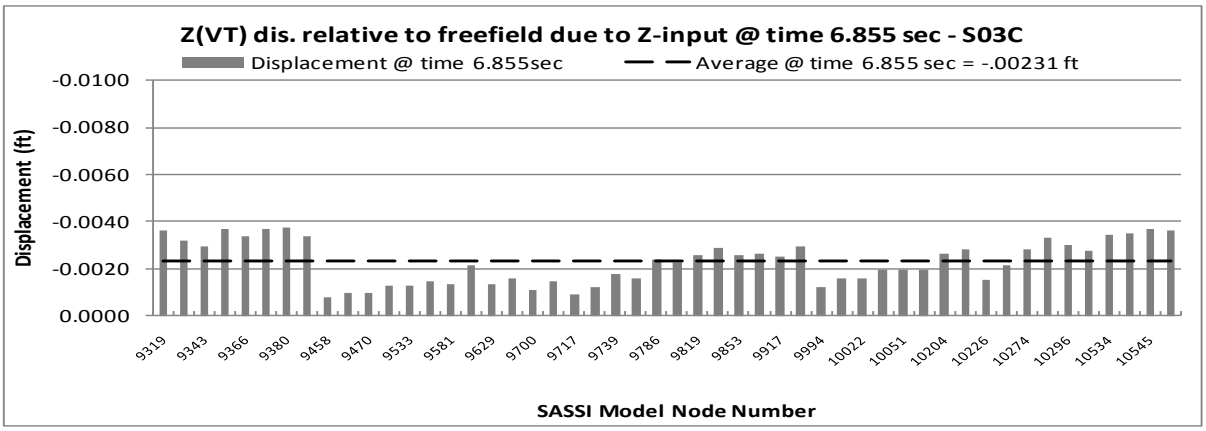


(a) Z-input at time 6.885 sec (at time of minimum average)

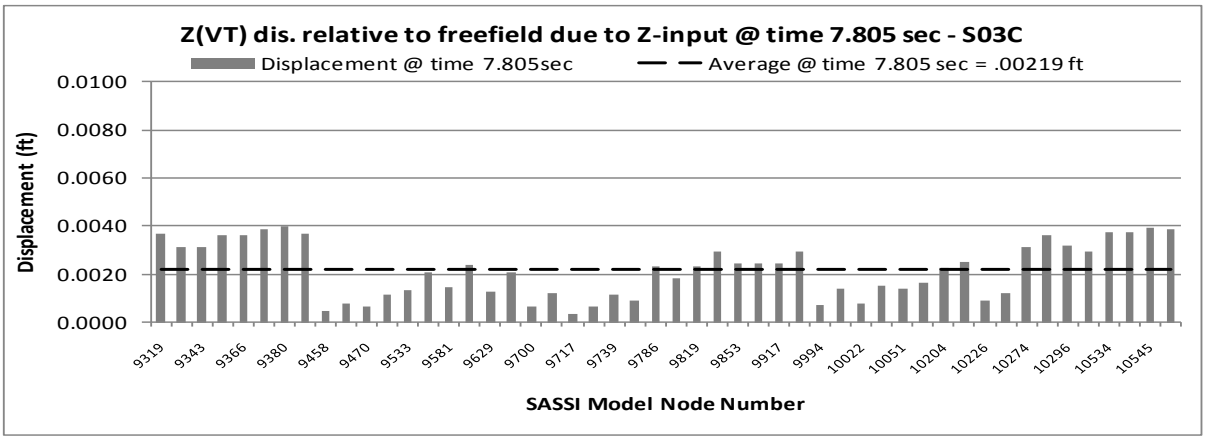


(b) Z-input at time 7.02 sec (at time of maximum average)

Figure 4-7. Displacements of Basemat due to Seismic Loading (S2)

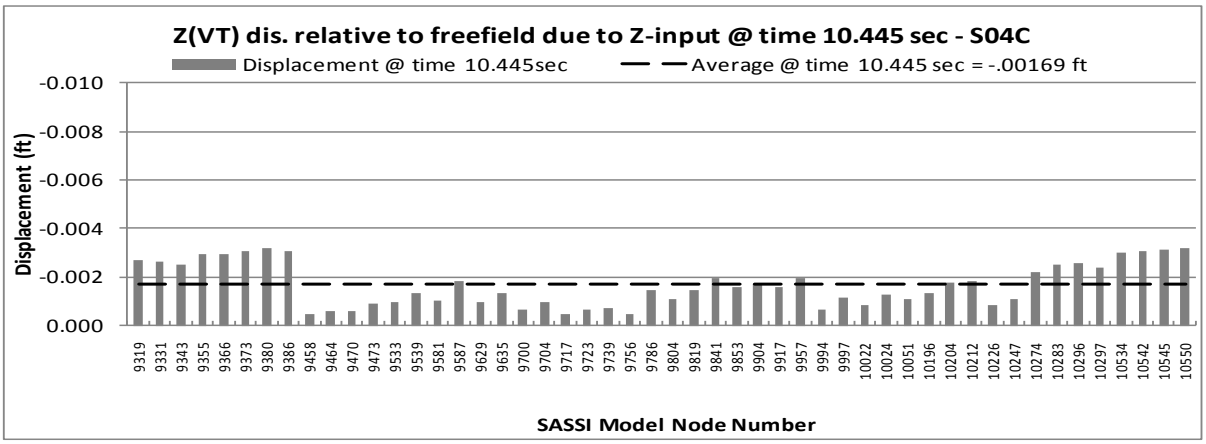


(a) Z-input at time 6.855 sec (at time of minimum average)

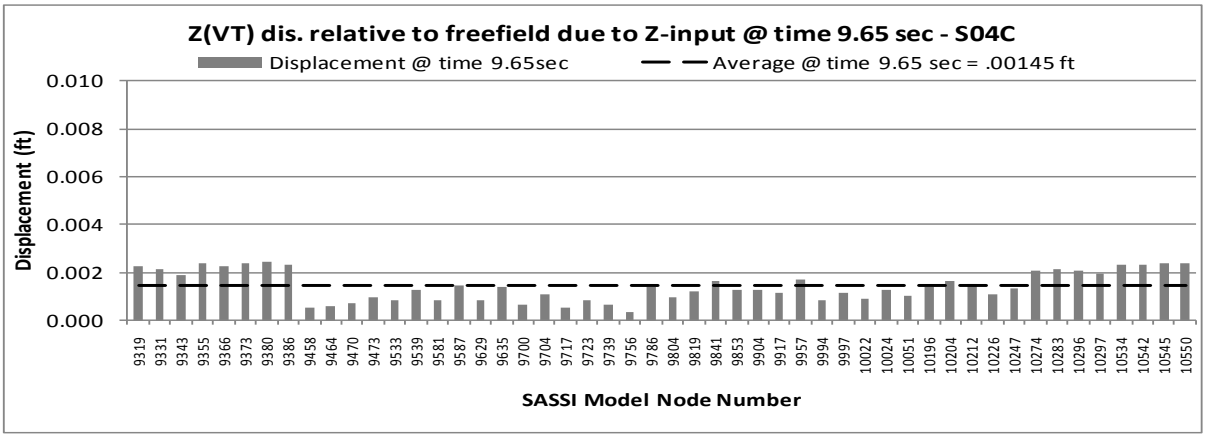


(b) Z-input at time 7.805 sec (at time of maximum average)

Figure 4-8. Displacements of Basemat due to Seismic Loading (S3)

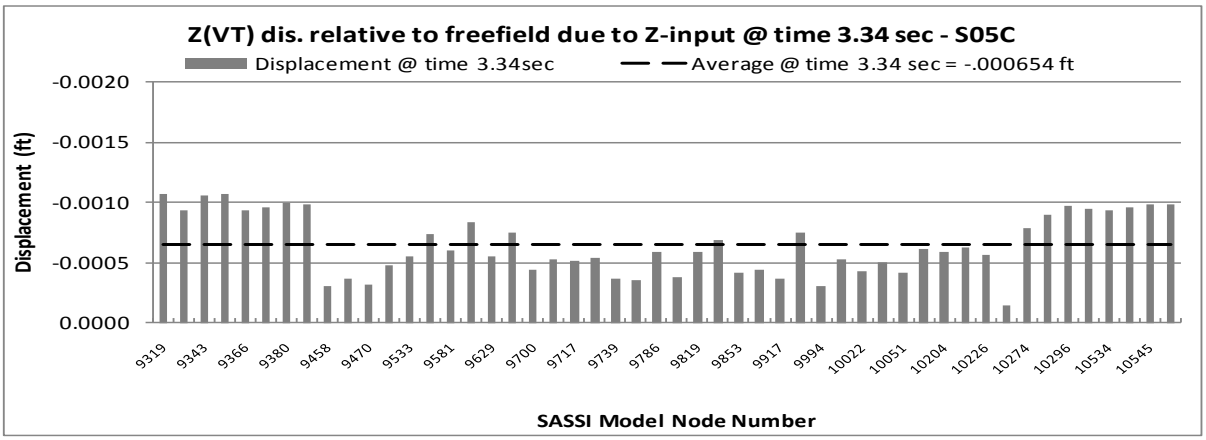


(a) Z-input at time 10.445 sec (at time of minimum average)

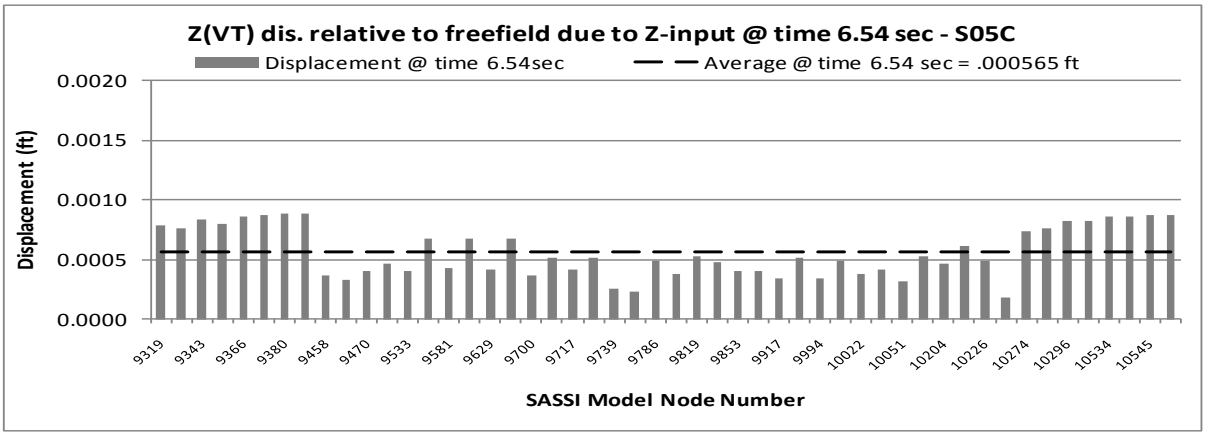


(b) Z-input at time 9.65 sec (at time of maximum average)

Figure 4-9. Displacements of Basemat due to Seismic Loading (S4)

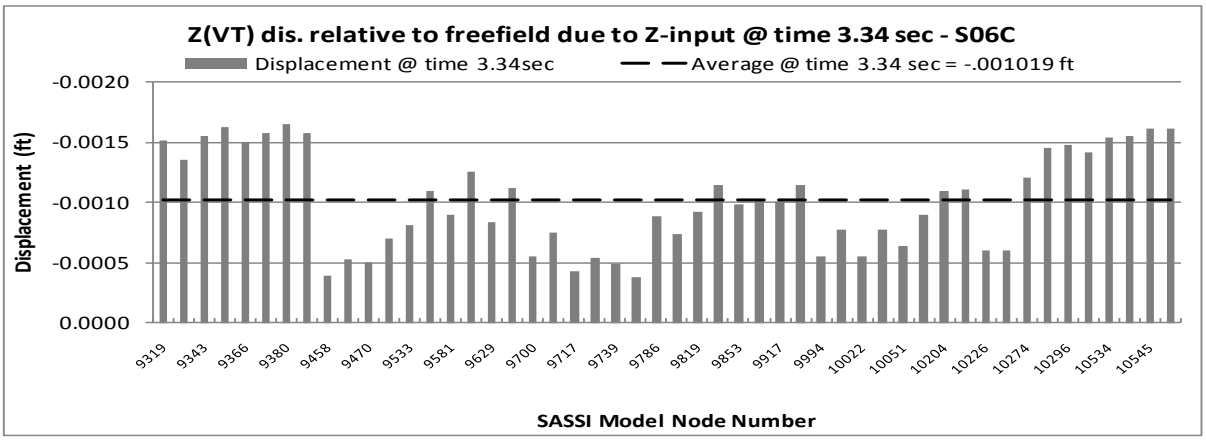


(a) Z-input at time 3.34 sec (at time of minimum average)

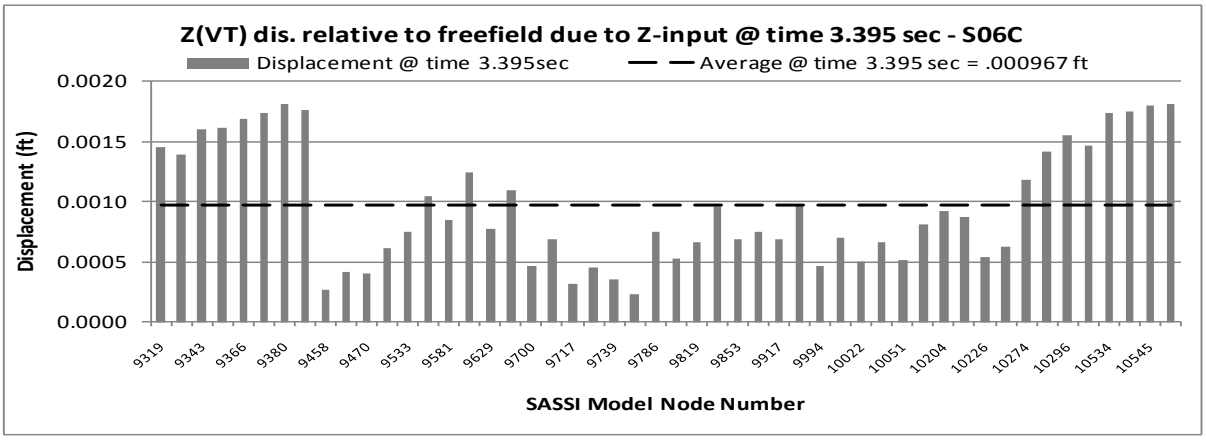


(b) Z-input at time 6.54 sec (at time of maximum average)

Figure 4-10. Displacements of Basemat due to Seismic Loading (S5)

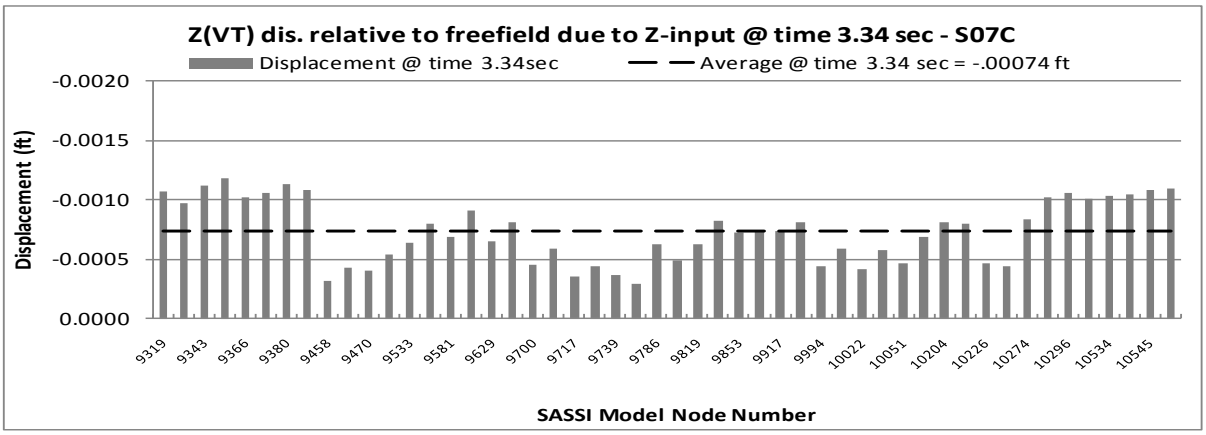


(a) Z-input at time 3.34 sec (at time of minimum average)

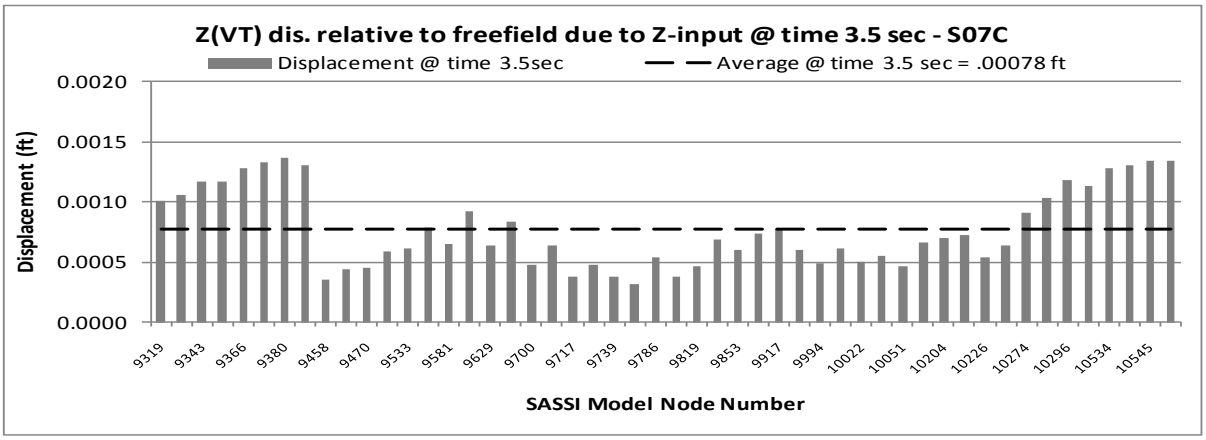


(b) Z-input at time 3.395 sec (at time of maximum average)

Figure 4-11. Displacements of Basemat due to Seismic Loading (S6)

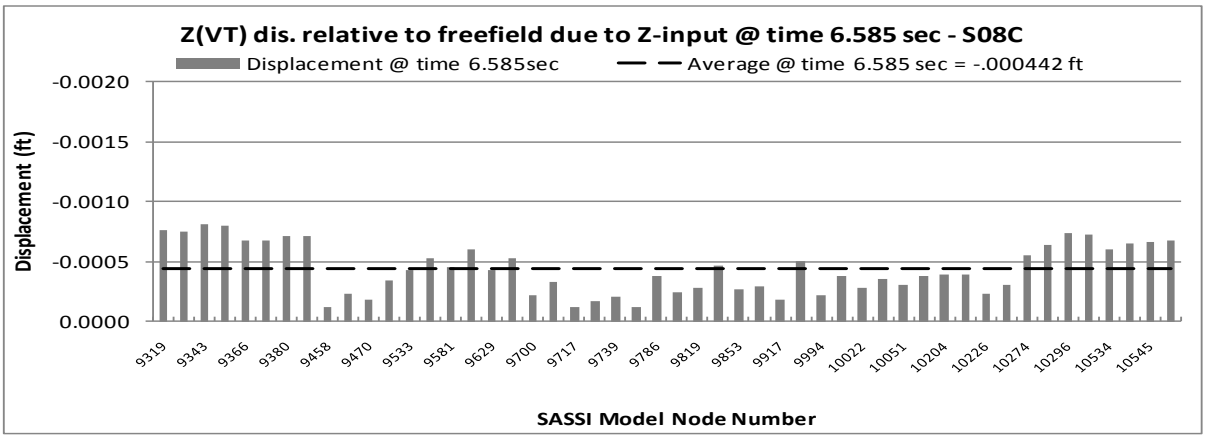


(a) Z-input at time 3.34 sec (at time of minimum average)

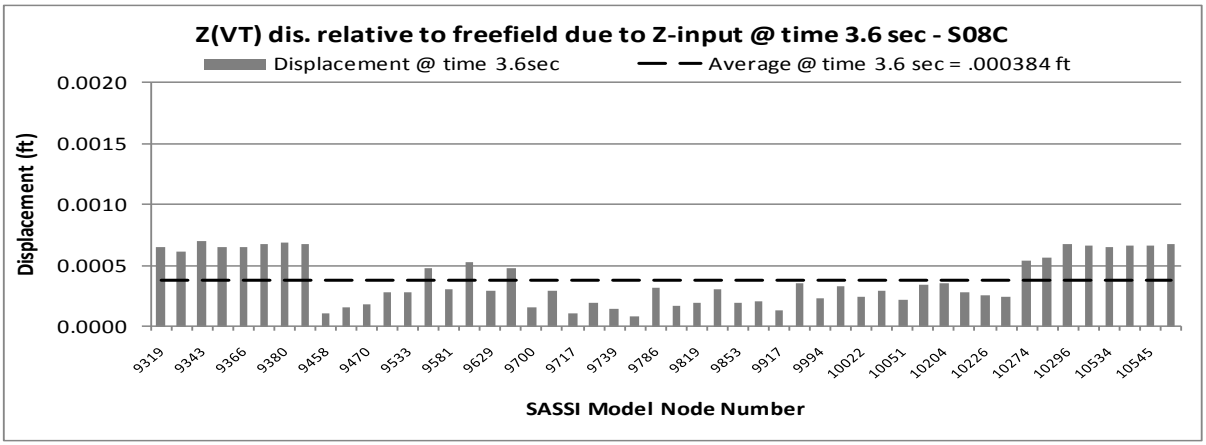


(b) Z-input at time 3.5 sec (at time of maximum average)

Figure 4-12. Displacements of Basemat due to Seismic Loading (S7)

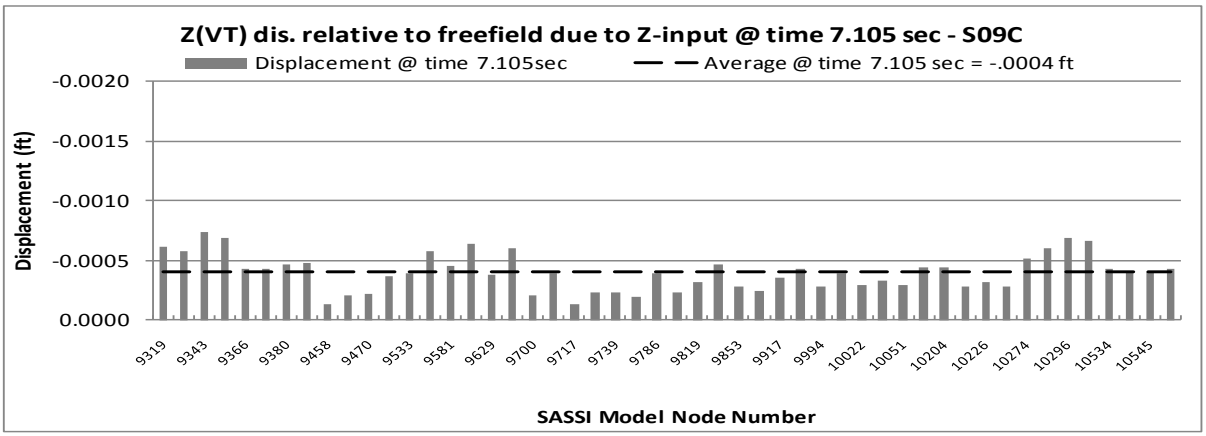


(a) Z-input at time 6.585 sec (at time of minimum average)

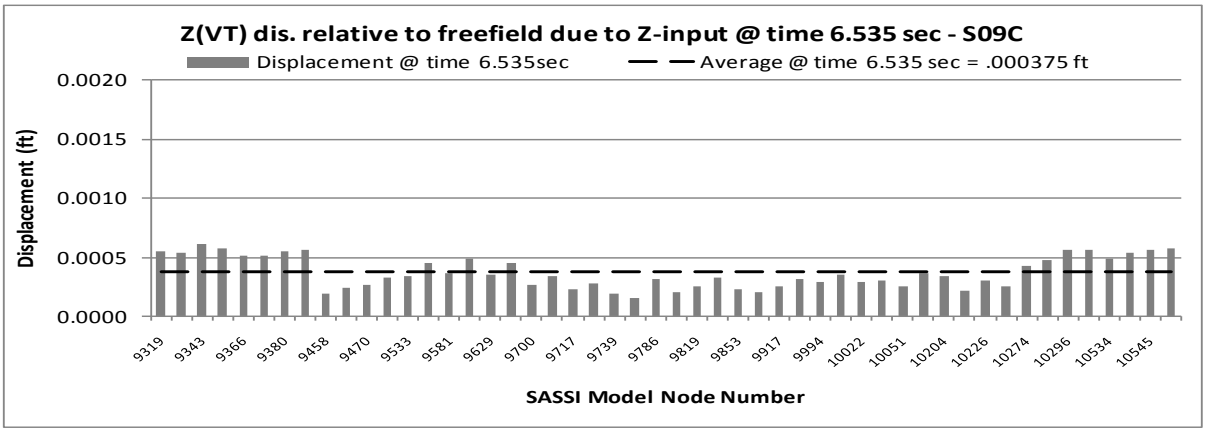


(b) Z-input at time 3.6 sec (at time of maximum average)

Figure 4-13. Displacements of Basemat due to Seismic Loading (S8)



(a) Z-input at time 7.105 sec (at time of minimum average)



(b) Z-input at time 6.535 sec (at time of maximum average)

Figure 4-14. Displacements of Basemat due to Seismic Loading (S9)

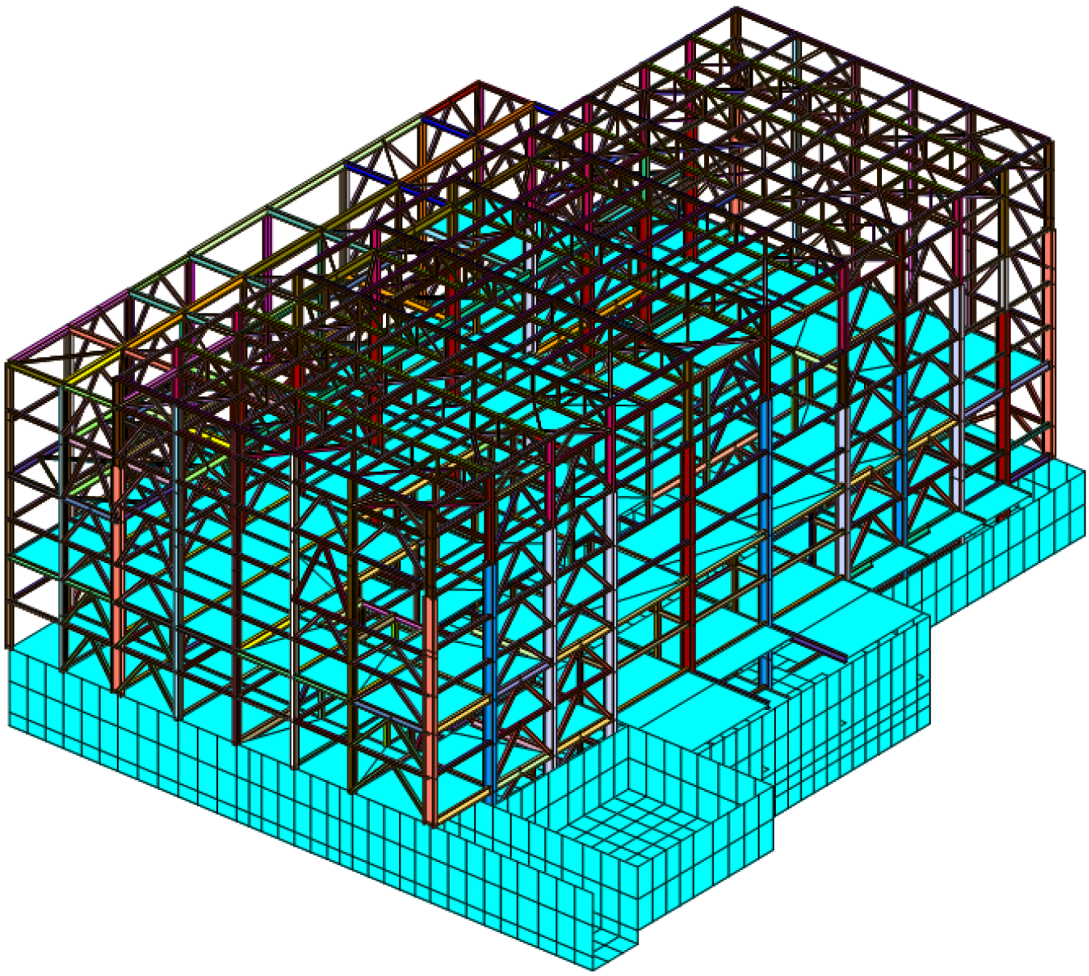
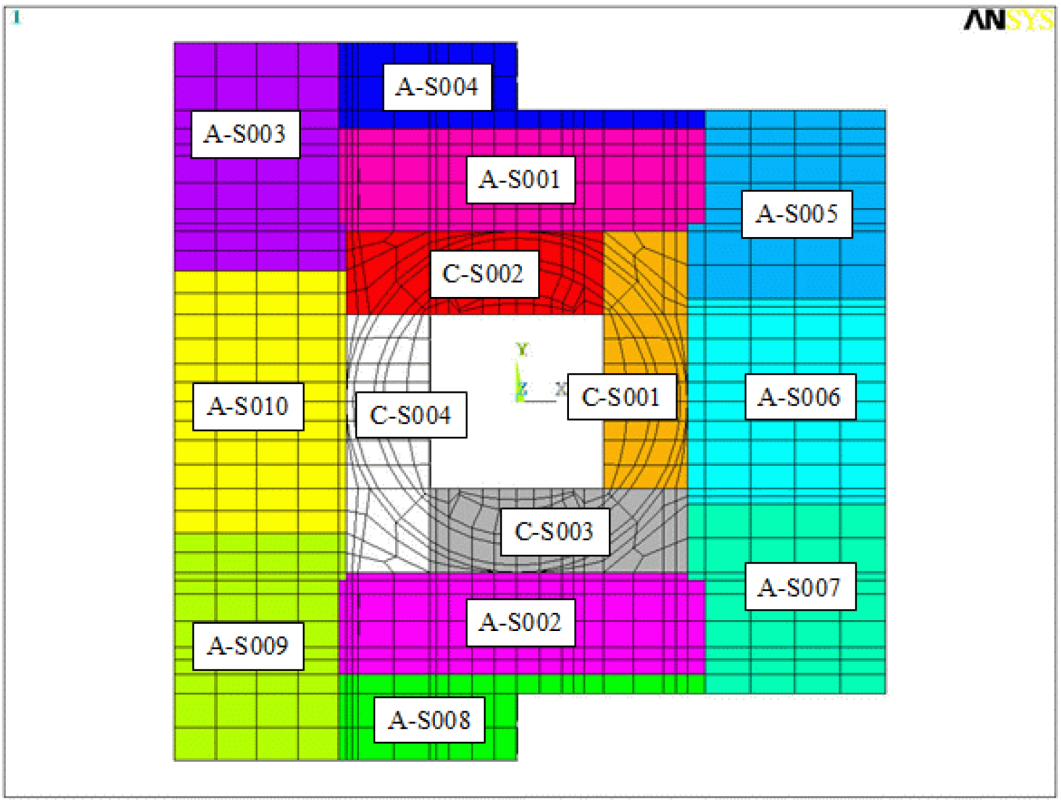
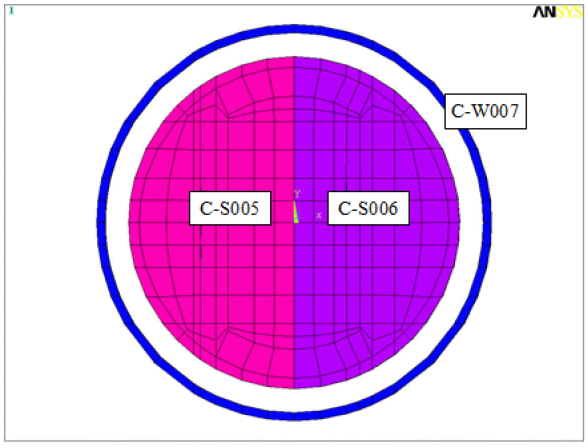


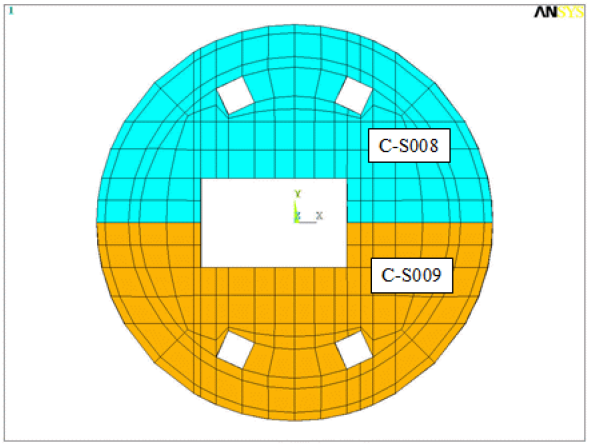
Figure 4-15. FE Model for the TGB Basemat Analysis



(a) RCB and AB Areas (EL. 35′-0″ ~ EL. 55′-0″)

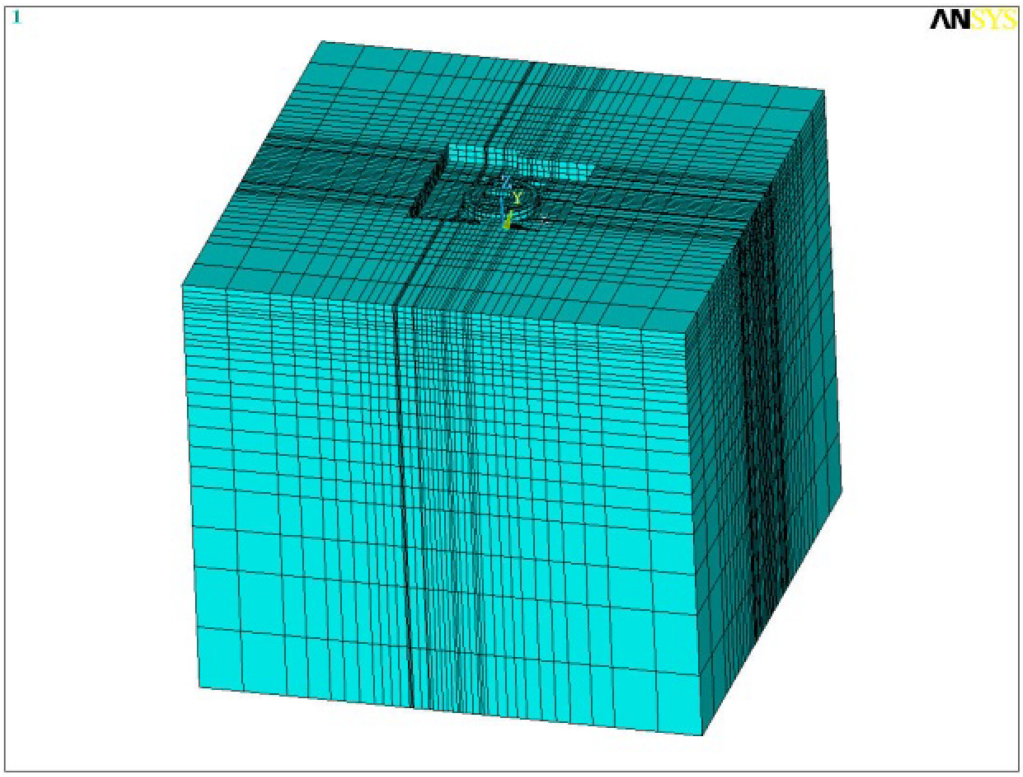


(b) RCB Area (EL. 55′-0″ ~ EL. 68′-0″)



(c) RCB Area (EL. 68′-0″ ~ EL. 78′-0″)

Figure 5-1. Individual Segments of Basemat Foundation for Concrete Pouring



(a) Full Model

(b) NI Common Basemat

Figure 5-2. Construction Sequence FE Model

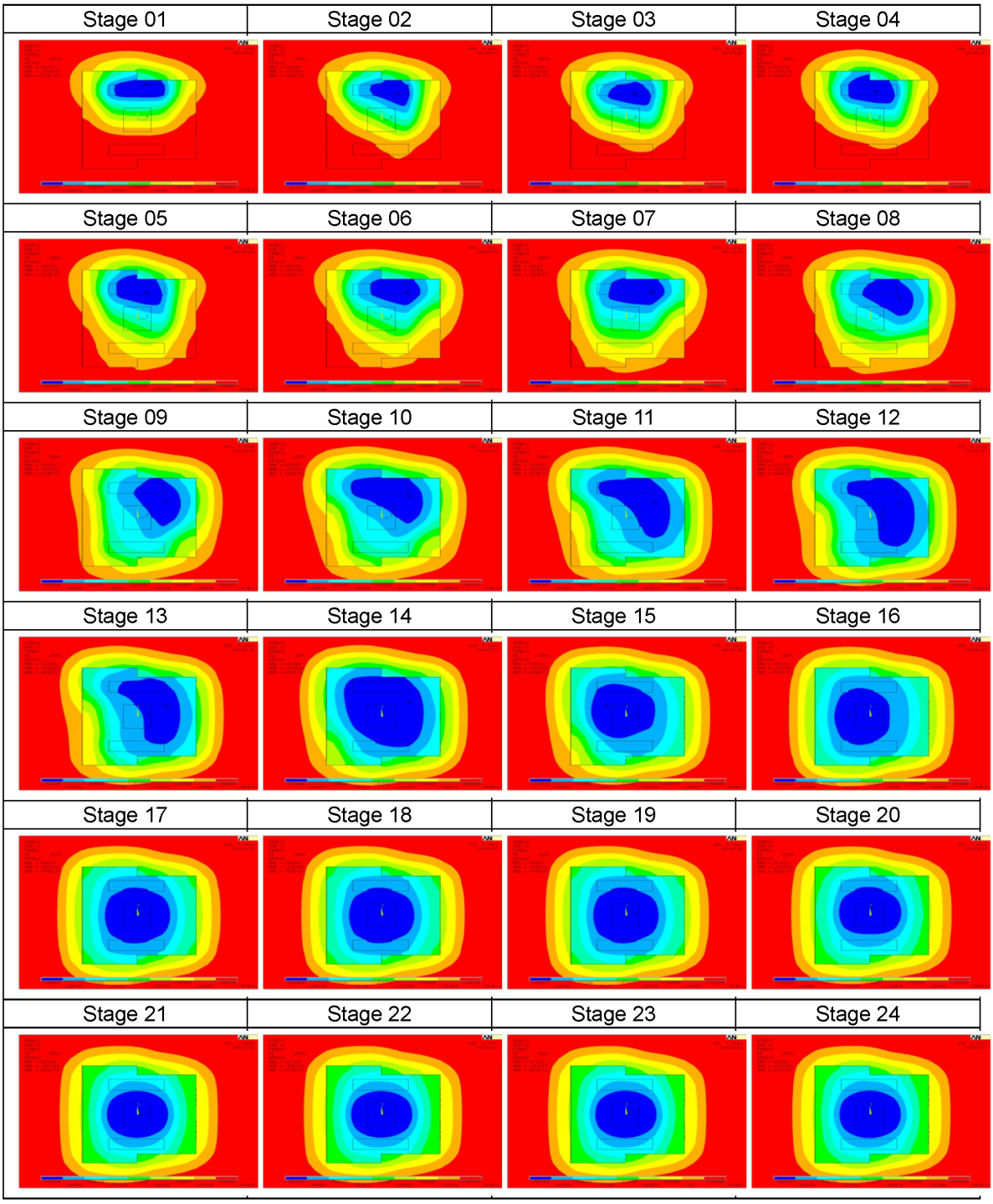


Figure 5-3. Settlement Distribution Contour for Construction Sequence Analysis for S1

Figure 5-4. Settlement Distribution Contour for Construction Sequence Analysis for S8