

Large Telescope Truss - Numerical Results

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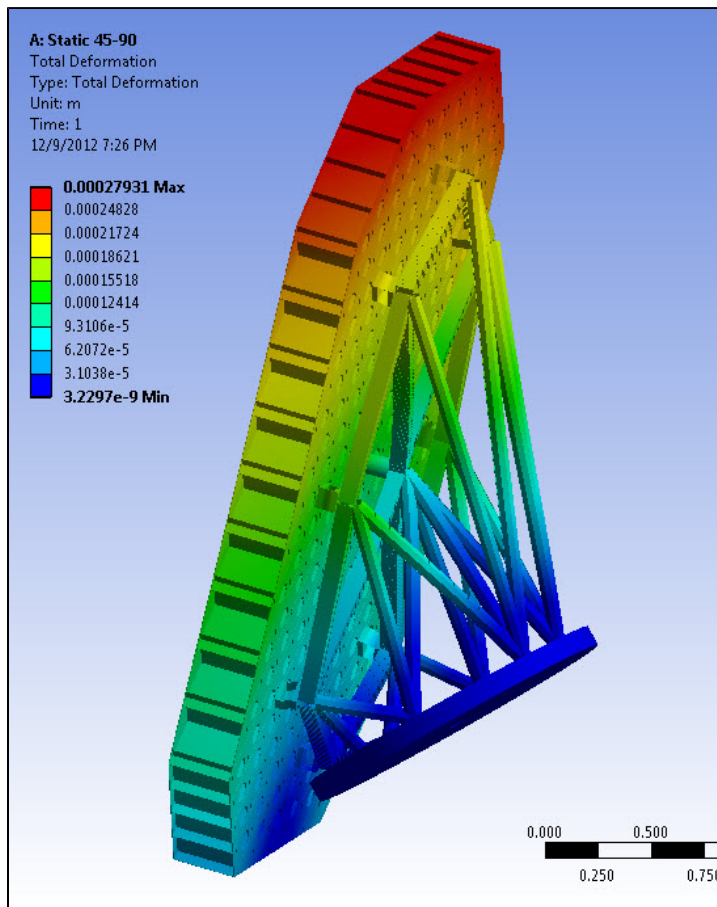
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Numerical Results

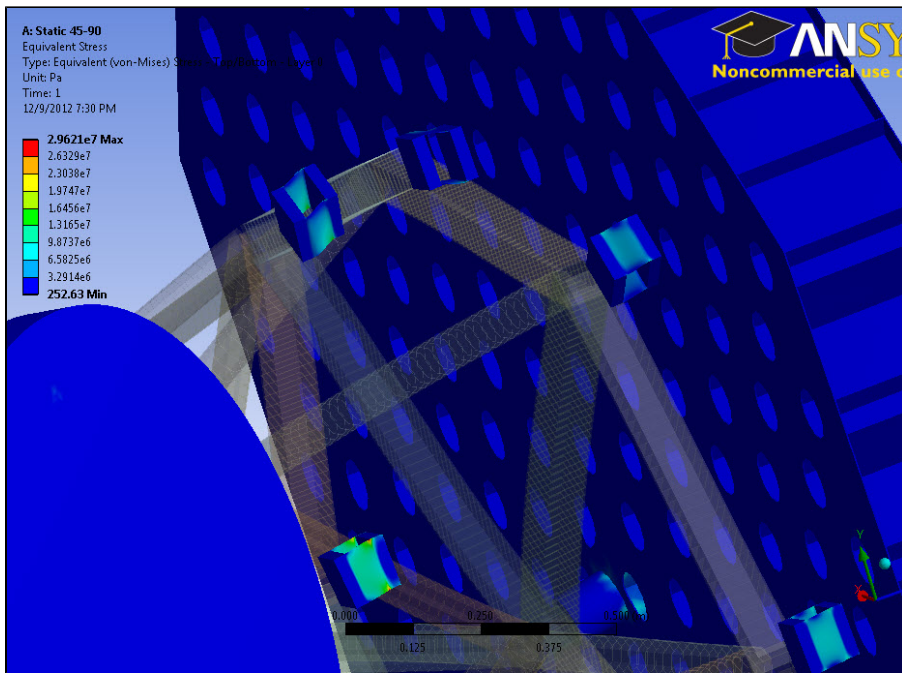
After running the simulation, we should get these results:

Total Deformation



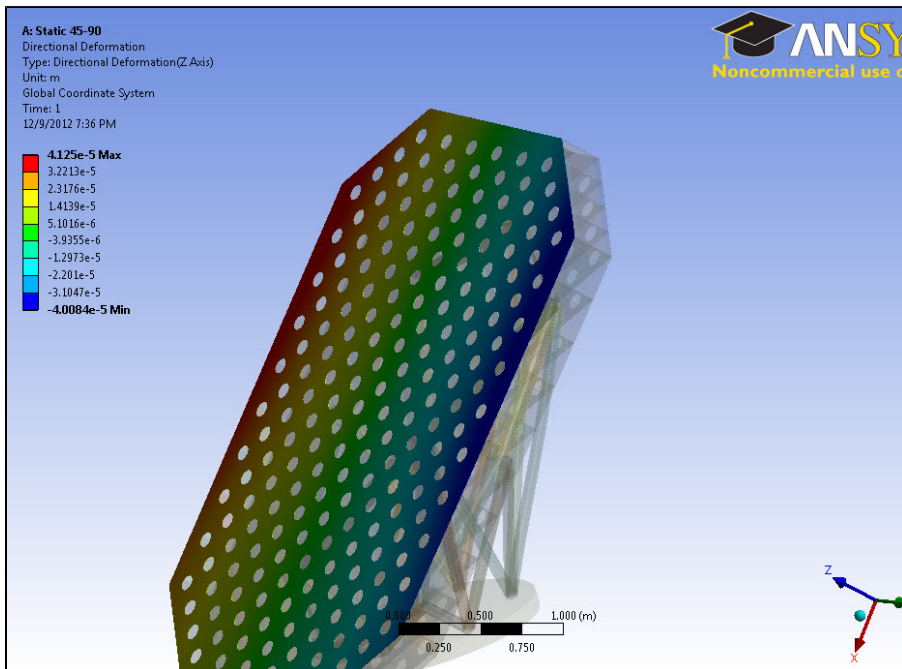
The total deformation is greatest at the top of the truss, and has a magnitude of 0.28 mm.

Equivalent Stress



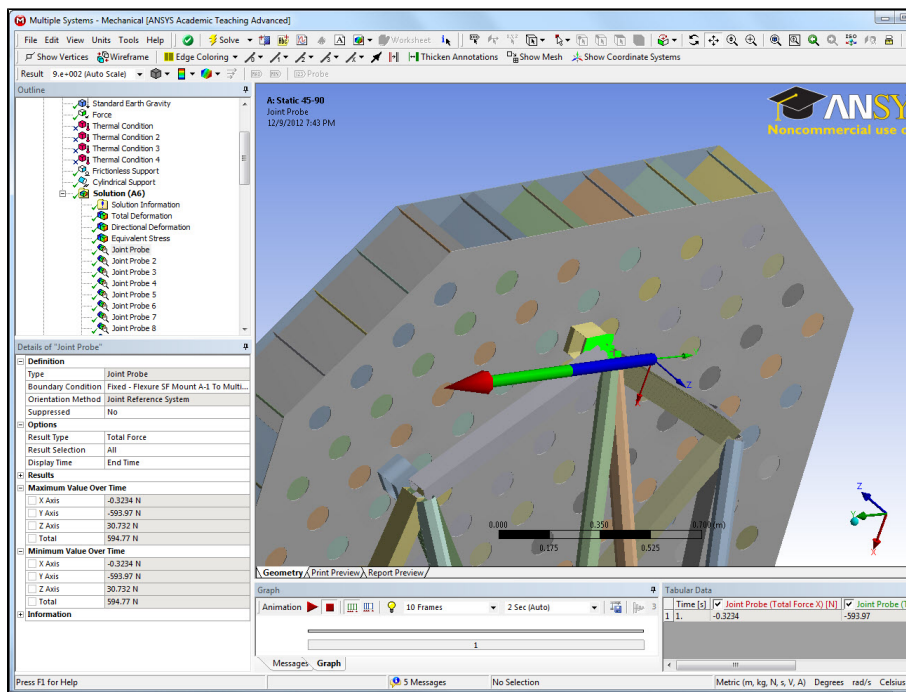
The greatest stress occurs in the Flexure mounts, and has a magnitude of 30MPa.

Directional Deformation



The Directional deformation is shown to range from -.04mm to +.04mm.

Joint Probes



Each joint probe shows the magnitude and direction of the force at each probe. The results show that there's a range from 200 N to a whopping 1500N. Fortunately, the 1500N force is in the center, and the flexure mount forces have a value around 400N.

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