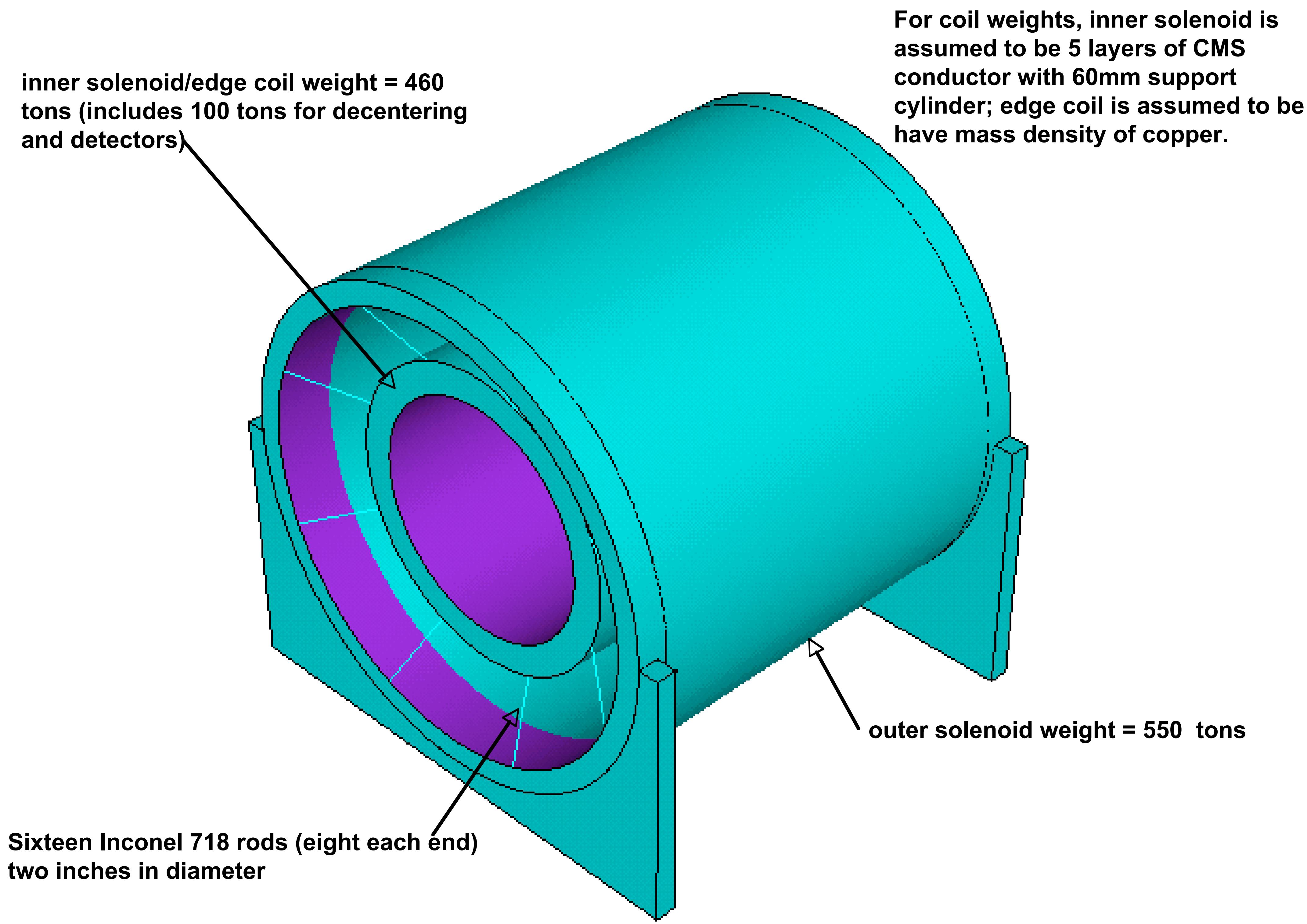
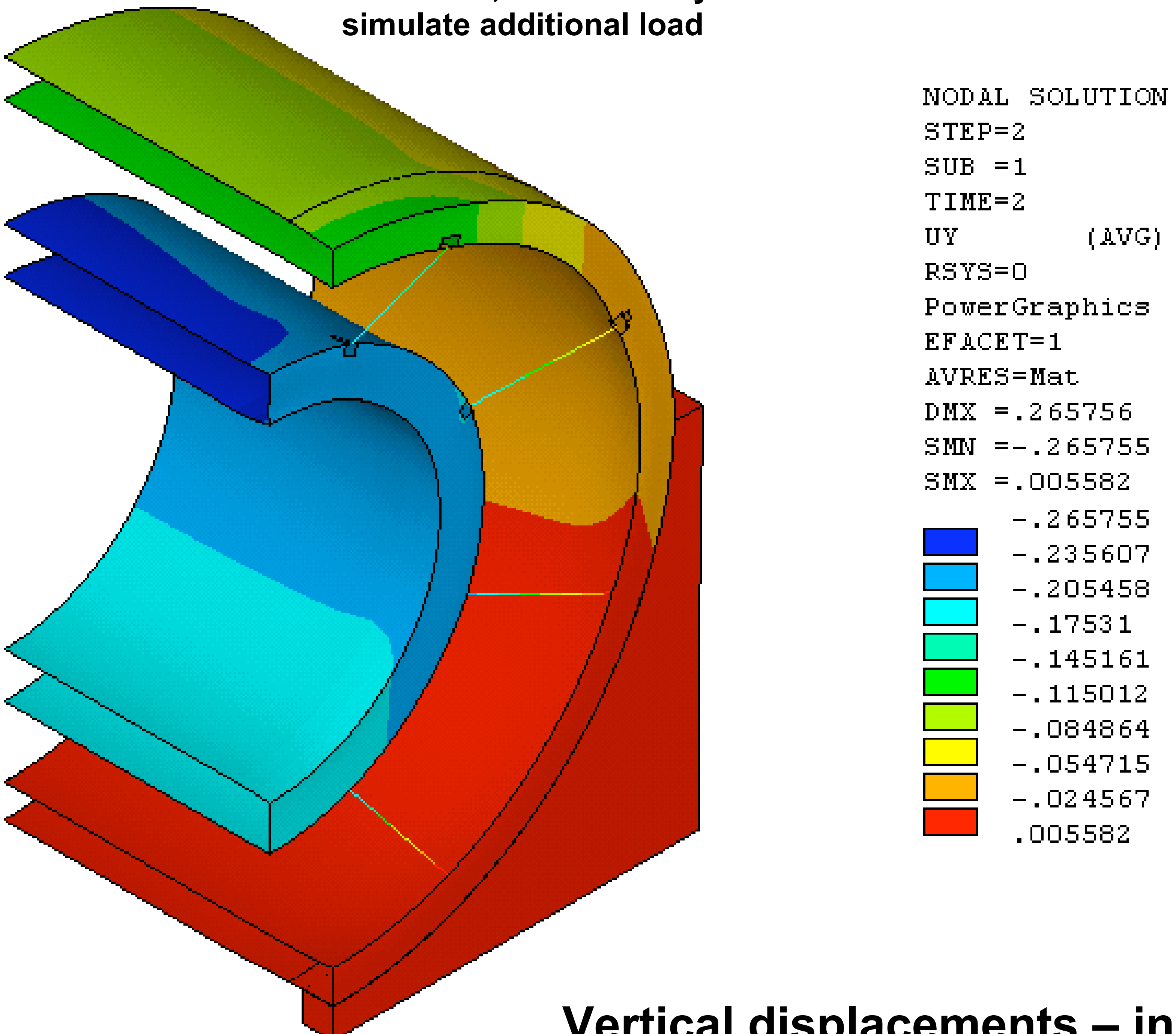


For coil weights, inner solenoid is assumed to be 5 layers of CMS conductor with 60mm support cylinder; edge coil is assumed to be have mass density of copper.
inner solenoid/edge coil weight = 460 tons (includes 100 tons for decentering and detectors)
outer solenoid weight = 550 tons
Sixteen Inconel 718 rods (eight each end) two inches in diameter

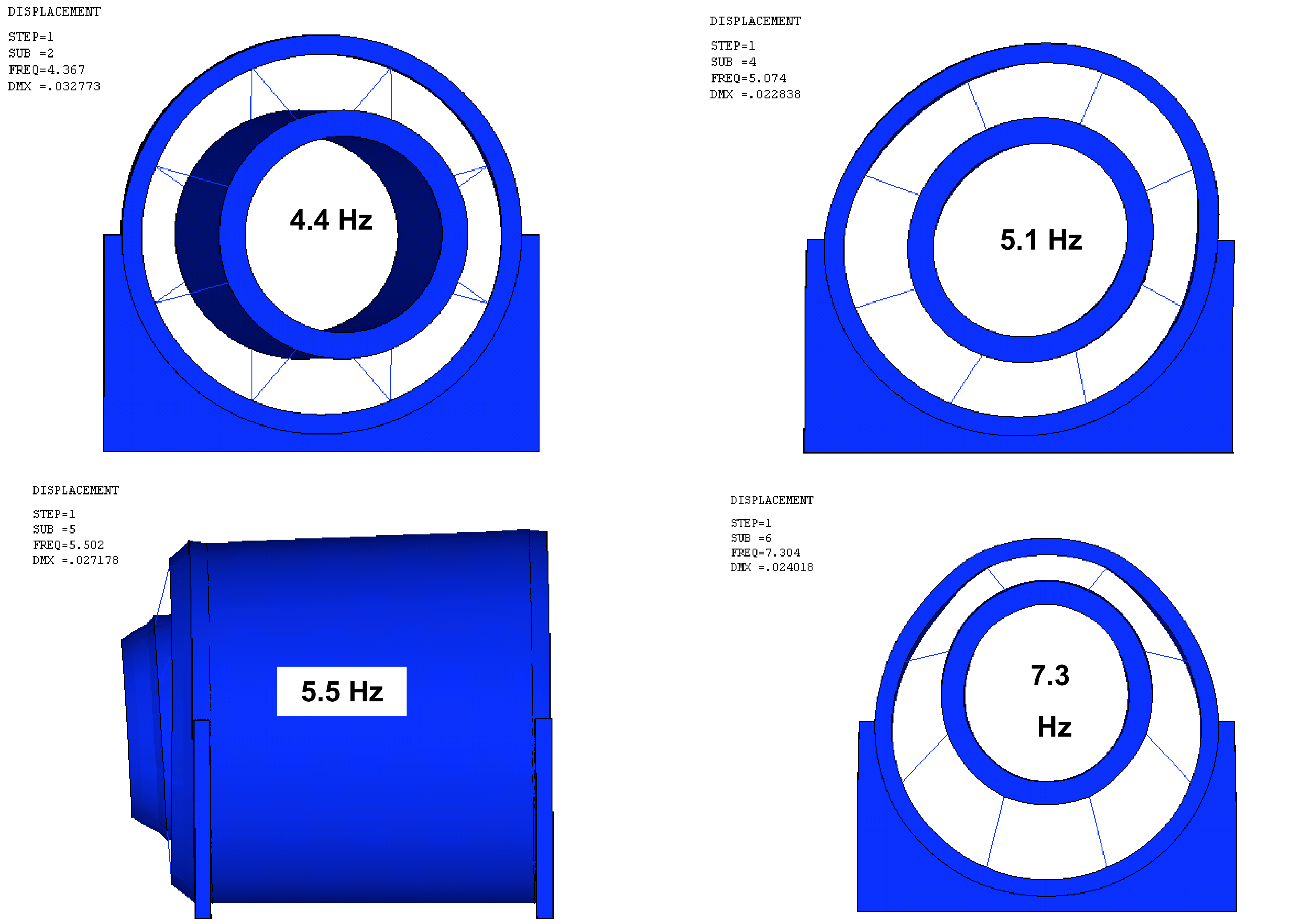
displacements of shells near midplane are unreliable, since density was increased to simulate additional load

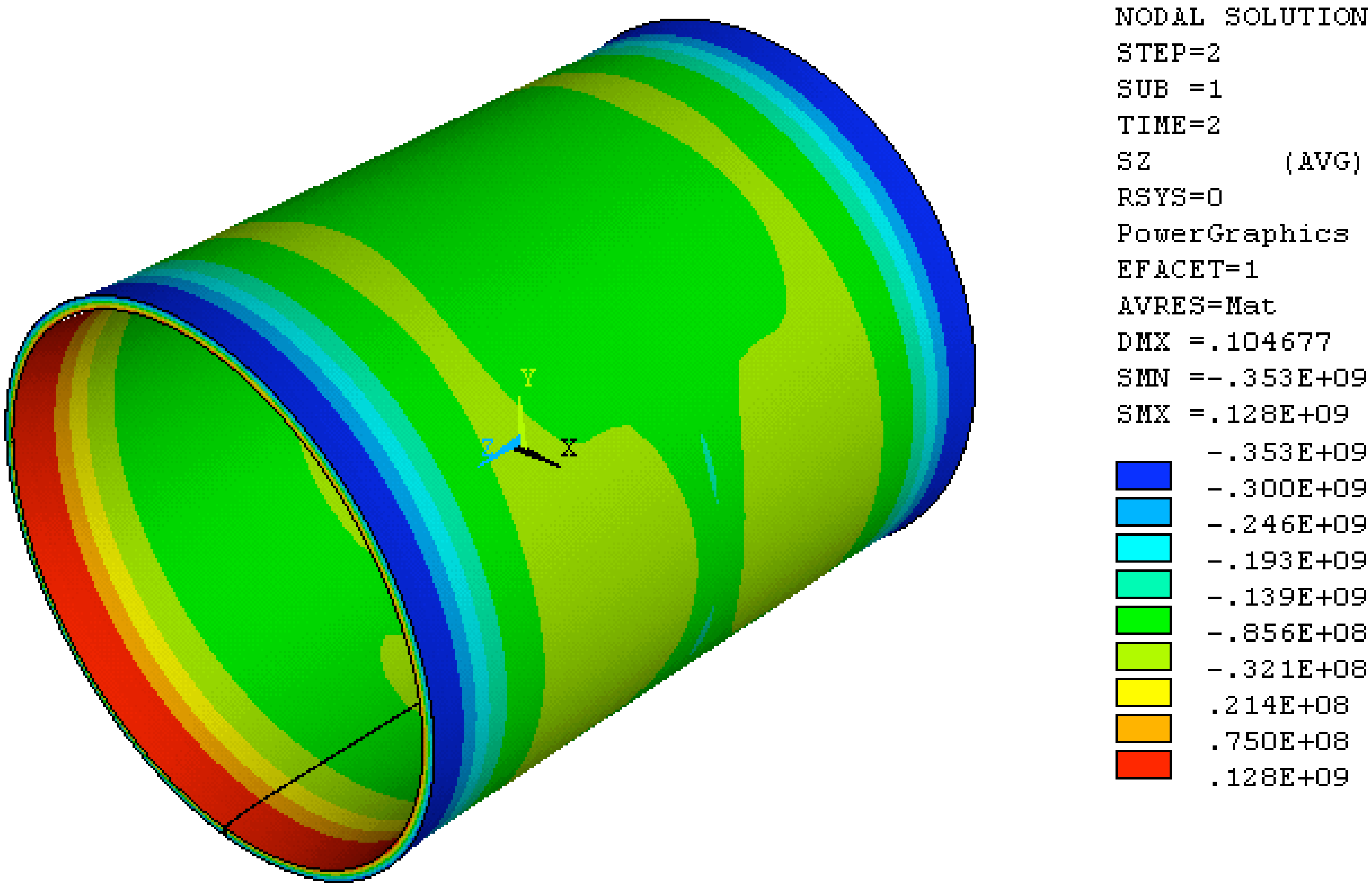


most reliable displacements are at annular endrings

Vertical displacements – inches

The Four Lowest Frequencies of the System





Axial stresses in inner solenoid showing meridianal bending at ends