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Triaxial Nuclei Floppy or Rigid?¹ WEICHUAN LI, University of Notre Dame, STEFAN FRAUENDORF AND MARK CAPRIO COLLABORATION — Triaxial nuclear shapes are interesting since they are so unusual in the nuclear chart.But whether the triaxial nuclei are soft or rigid in shape is still a question.Softness of triaxial nuclei has primarily been studied in even-even nuclei. We study softness of triaxiality in odd-mass nuclei, using the Core Quasi-Particle Model coupling an even-even core in Algebraic Collective Model with a quasi-particle in the spherical field. We want to know if the quasi-particle outside of the core will influence the rigidness of the core or not? And how the quasi-particle influences the core's properties.

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