

7. Publication List

Structures and Materials

Acharya, A. and A. J. Beaudoin, Consideration of Lattice Incompatibility in the Evolution of Hardening, *Proceedings of the 12th International Conference on Textures of Materials*, National Research Council of Canada Press, Montreal, Canada, August 1999.

Acharya, A. and A. J. Beaudoin, Grain-Size Effect in FCC Viscoplastic Polycrystals at Moderate Strains, submitted.

Acharya, A. and J. L. Bassani, Lattice Incompatibility and A Gradient Theory of Crystal Plasticity, *Journal of the Mechanics and Physics of Solids*, to appear.

Acharya, A., A Connection Between the Continuum Theories of Dislocations and Plasticity: The Problem of Internal Stress, submitted.

Acharya, A., A Distinct Element Approach to Ball Mill Mechanics, submitted.

Acharya, A., A Nonlinear Generalization of the Koiter-Sanders-Budiansky Bending Strain Measure, *International Journal of Solids and Structures*, to appear.

Acharya, A., H. P. Cherukuri, and R. M. Govindarajan, A New Proposal in Gradient Plasticity: Theory and Application in 1-D Quasi-Statics and Dynamics, *Mechanics of Cohesive-Frictional Materials*, 4, 153-170, 1999.

Acharya, A., On a Continuum Model of Crystal Plasticity Based on the Theory of a Continuous Distribution of Dislocations, submitted.

Acharya, A., On Compatibility Conditions for a Left Cauchy-Green Strain Field in 3-Dimensions, submitted.

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Hilton, H. H., Nonlinear Viscoelastic Characterization and Failure Analysis of Solid Propellants and Composite Cases, *Materials Science and Engineering - A*, in press.

- Hilton, H. H., Structural Reliability and Minimum Weight Analysis for Combined Random Loads and Strengths, submitted to *Journal of Probabilistic Engineering Mechanics*.
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- Hjelmstad, K. D. and E. Taciroglu, Analysis and Implementation of Resilient Modulus Models of Response of Granular Solids, *Journal of Engineering Mechanics*, ASCE, submitted.
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- Parsons, I. D., P. V. S. Alavilli, A. Namazifard, J. Hales, A. Acharya, F. Najjar, D. Tafti, and X. Jiao, Loosely Coupled Simulations of Solid Rocket Motors, *5th National Congress on Computational Mechanics (USACM)*, Boulder, Colorado, August 1999.
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Combustion and Energetic Materials

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Computer Science

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