Colorado Virtual Campus of Physics
Mechanics & Nonlinear Dynamics Cluster
Nonlinear Dynamics & Chaos Lab

Instructional Experiments on Nonlinear Dynamics & Chaos (and some related theory papers)

-overviews of nonlinear & chaotic dynamics

To top?

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-prototypical nonlinear equations and their simulation

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-analysis of data from chaotic systems

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-control of chaos

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-fractals

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-solitons

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-nonlinear oscillators, vibrations & strings

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-chaotic electronic circuits

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-coupled systems, mode interaction & synchronization

To top?

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-bouncing ball, dripping faucet, kicked rotor & other discrete interval dynamics

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-nonlinear dynamics of the pendulum

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-inverted pendulum

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-swinging Atwood's machine

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