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Sommario/riassunto

Nonlinear models of elastic and visco-elastic onedimensional continuous structures (beams and cables) are formulated by the authors of this title. Several models of increasing complexity are presented: straight/curved, planar/non-planar, extensible/inextensible, shearable/unshearable, warpingunsensitive/sensitive, prestressed/unprestressed beams, both in statics and dynamics. Typical engineering problems are solved via perturbation and/or numerical approaches, such as bifurcation and stability under potential and/or tangential loads, parametric excitation, nonlinear dynamics and aeroelasticit
