SOLVING EQUATIONS OF THIN-WALLED MULTISTRINGER TORSION BOX DESIGN IN VIEW OF GEOMETRICAL NON-LINEARITY

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A procedure of thin-walled multistringer torsion box design in view of geometrical non-linearity is proposed. Initial non-linear relations are linearized by the successive loading method. Solving equations are obtained by using the Lagrange principle; these are presented in the form of a boundary problem for a system of ordinary linear differential equations.

Prismatic shells, geometrical non-linearity, boundary problem, numerical integration

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