

## عنوان مقاله:

Finite Element Analysis of Pulsatile Blood Flow in Elastic Artery

## محل انتشار:

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## خلاصه مقاله:

New hybrid Eulerian/Lagrangian model is presented accounting for the two-way coupling between the pulsating blood flow and the artery deformability. The Streamline-Upwind/Petrove--Galerkin (SUPG) finite element technique is used to treat for the convective nature of the momentum equation. The deformability of the artery walls is accounted for by treating the wall as an elastic beam under transverse unsteady distributed load, namely the fluid pressure. The results of the present contribution compare well against the available published data.

## کلمات کلیدی:

Fluid structure interaction, Incompressible viscous flows, Pulsating flows, Deformable boundaries

## لینک ثابت مقاله در پایگاه سیویلیکا:

<https://civilica.com/doc/1369654>

