عنوان مقاله:

Simulations of Tidal Flows in KHUR-MUSA on a Triangular Mesh Using Finite Volume Method

محل انتشار:

ششمین همایش بین المللی سواحل، بنادر و سازه های دریایی (سال: 1383)

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خلاصه مقاله:

Following the successful modeling of the global tidal currents in Persian Gulf [1], this paper introduces a numerical simulation of tidal flows in KHUR-E-MUSA estuary. The model computes water level variation and velocity components in horizontal plane solving continuity and momentum equations of depth averaged equations. The model can consider bed and wall geometric complexities and resistances. Cell vertex finite volume method was applied for discretizing the governing equations. The descritized equations were solved on a triangular unstructured mesh. The solution domain was descretized using Delauni triangulation method. For damping out numerical oscillations of explicit solution procedure, an artificial viscosity formulation suitable for the triangular unstructured meshes was applied. The efficency of the results was assed by simulating flow on Kour-e-Musa.

کلمات کلیدی: