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Waves and Flows in Basins of Complex Geometry

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Message from the Guest Editors

This Special Issue is devoted to the description of nonlinear dynamics of wave fields (surface, internal, trapped, inertial and others) in horizontally and/or vertically inhomogeneous basins with boundaries having complex geometry. Inhomogeneity can be due to both a variable bottom depth and/or a vertical stratification in density and/or current, which can also be horizontally variable. In fact, this wide class of problems implies the mathematical modeling of the initial-boundary problem for the system of hydrodynamics equations for a horizontally and vertically inhomogeneous fluid (or approximate models of various complexity levels) in a domain of a geometrically complex configuration in the field of gravity and Coriolis forces, taking into account external conditions (tidal currents, various types of boundary conditions, atmospheric forcing, etc.), [...]. For further reading, please follow the link to the Special Issue Website at:

https://www.mdpi.com/journal/water/special_issues/Waves_Geo

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Special issue



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Message from the Editor-in-Chief

In the context of global changes, the sustainable management of water cycles, going from global and regional water cycles to urban, industrial and agricultural water cycles, plays a very important role on the water resources and on their relationships with food, energy, biodiversity, ecosystem functioning and human health. *Water* invites authors to provide innovative original full articles, critical reviews and timely short communications and to propose special issues devoted to new technological and scientific domains and to interdisciplinary approaches of the water cycles. We ensure a critical review process and a quick turnaround between submission and final decision.

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