

# Nonlinear Differential Equations: New Perspectives and Techniques

## GUEST EDITORS

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## DESCRIPTION

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Describing, forecasting, and controlling the evolution of a wide variety of real-world phenomena (such as those in physics, chemistry, finance, biology, ecology, medicine, sociology, and industrial processes) necessitate the consideration of nonlinear differential equations. Indeed, families of ordinary and partial differential equations encompass a vast range of phenomena, and their comprehensive understanding requires the cooperation of various branches of analysis.

This Special Issue in *Open Mathematics* aims to present recent trends and advances in nonlinear analysis devoted to differential equations, including existence and nonexistence results, as well as qualitative properties of the solutions, such as symmetry and regularity. Both variational and non-variational methods of nonlinear analysis will be explored to highlight different approaches and techniques contributing to the field.

**Topics of interest:** existence, multiplicity, regularity, and qualitative properties of solutions to ordinary or partial differential equations; variational or topological methods in nonlinear analysis

**Keywords:** ODEs, PDEs, nonlinear analysis, variational methods, topological methods

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All submissions to the Special Issue must be made electronically via online submission system **Editorial Manager**: [www.editorialmanager.com/openmath](http://www.editorialmanager.com/openmath)

All manuscripts will undergo the standard peer-review process (single blind, at least two independent reviewers). When entering the submission via online submission system authors should **choose the category "Special Issue on Nonlinear Differential Equations: New Perspectives and Techniques."**

Submission of a manuscript implies that the work described has not been published before and it is not under consideration for publication anywhere else.

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We are looking forward to your submission!

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