

Special Issue

Mathematical Modeling, Asymptotic Analysis and Stability of Solutions of Nonlinear Dynamical Systems

Message from the Guest Editor

As a rule, modern dynamical systems can be described by means of essential nonlinear differential equations and their systems. In most cases, analytical solutions to such systems cannot be found. In this regard, it is of interest to develop new and modernize known methods for the study of the stability of dynamic systems. In particular, it should be noted that the use of asymptotic methods makes it possible to study the evolution of slow variables and greatly simplifies the analysis of the stability of dynamical systems. The intention of this Special Issue is to collect original and review articles devoted to the latest achievements in the field of mathematical modeling and the development of methods for the analysis of the stability of nonlinear dynamical systems.

Guest Editor

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Deadline for manuscript submissions

closed (15 April 2024)



Mathematics

an Open Access Journal
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Impact Factor 2.2
CiteScore 4.6



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Message from the Editor-in-Chief

The journal *Mathematics* publishes high-quality, refereed papers that treat both pure and applied mathematics. The journal highlights articles devoted to the mathematical treatment of questions arising in physics, chemistry, biology, statistics, finance, computer science, engineering and sociology, particularly those that stress analytical/algebraic aspects and novel problems and their solutions. One of the missions of the journal is to serve mathematicians and scientists through the prompt publication of significant advances in any branch of science and technology, and to provide a forum for the discussion of new scientific developments.

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