Special Issue

Advances in Stochastic Differential Equations and Applications to Finance

Message from the Guest Editor

Stochastic differential equations (SDEs) are an active interdisciplinary area at the crossroads of stochastic analysis, partial differential equations, and scientific computing. Statistical physics, fluid dynamics, financial modeling, nonlinear filtering, superprocesses, and continuum physics are among the most interesting topics where SDEs can be applied. This Special Issue welcomes high-quality articles in fields strongly connected to SDEs, such as stochastic differential equations in infinite-dimensional state spaces or probabilistic approaches to solving deterministic partial differential equations (PDEs), numerical solution of SDEs, and applications to financial mathematics.

Guest Editor

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Deadline for manuscript submissions

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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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