

## Special Issue

# Recent Research on Functions with Non-Independent Variables

### Message from the Guest Editor

The use of independent input variables leads to the development of highly limited mathematical and statistical tools for functional analysis. Non-independent variables arise when two or more variables do not vary freely and are widely encountered in different scientific fields such as data analysis, quantitative risk analysis, inverse problems, and uncertainty quantification. Such variables are often characterized by their covariance matrices, distribution functions, copulas, and weighted distributions. Recently, dependency models have provided explicit functions that link these variables together by means of additional independent variables. This Special Issue will focus on mathematical and statistical analysis of functions with non-independent variables in different aspects of model development, such as model calibration, model validation, robustness analysis, optimization, model uncertainty, and model reduction.

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### Deadline for manuscript submissions

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### Message from the Editor-in-Chief

*Axioms* is dedicated to the foundations (structure and axiomatic basis, in particular) of mathematical theories, not only from a crisp or strictly classical sense, but also from a fuzzy and generalized sense. This includes the more innovative current scientific trends, devoted to discover and solve new challenging problems. The prime goal of *Axioms* is to publish first-class, original research articles under an open access policy with minimal fees for the authors. We would be pleased to welcome you as one of our authors.

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