

Special Issue

Railway Dynamics and Ground-Borne Vibrations

Message from the Guest Editors

This Special Issue covers multiple topics related to the prediction and control vibrations induced by railway traffic, including the following:

- Reliable prediction methodologies involving different types of models (numerical, analytical, and empirical tools as well as data mining and intelligent prediction approaches);
- Numerical and/or experimental studies conducted in order to discern the main sources of uncertainty in the system;
- The performance evaluation of conventional and innovative mitigation measures;
- Discussions about the key parameters of the railway system for prediction purposes;
- The identification of performance indicators for the system;
- Ultra-low levels of vibration for laboratory facilities.

Attention will be particularly given to prediction models that can be applied by end users, providing considerable value for engineering practitioners. This Special Issue welcomes the submission of new research, case studies, projects, reviews, and state-of-the-art discussions within these topics.

Guest Editors

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Dr. Pedro Alves Costa

Deadline for manuscript submissions

closed (20 February 2026)



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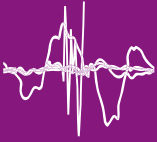


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About the Journal

Message from the Editor-in-Chief

Editor-in-Chief

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manuscripts are peer-reviewed and a first decision is
provided to authors approximately 20.8 days after
submission; acceptance to publication is undertaken in 3.6
days (median values for papers published in this journal in
the second half of 2025).