Special Issue

Impact of Extreme Weather Events on Forest Functions

Message from the Guest Editors

Since the 1950s, global climate change has caused an increase in the frequency, intensity, and scale of extreme weather events (e.g., droughts, flooding, heat waves, windstorm, frost). Such events are recognized among the major drivers of current and future forest dynamics, affecting their productivity and composition. Extreme weather events affect the physiology of trees, with responses that are related both to tolerance and resilience. Globally, drought is recognized as the most widespread factor affecting forest functions and tree mortality. Future climate change scenarios forecast an increased frequency of such conditions, calling for a better understanding of forest response to extreme weather events.

With this aim, we invite colleagues to contribute to this Special Issue with studies from several fields, targeting physiological and ecophysiological mechanisms; short, medium-, and long-term responses of forests, experimental and modeling analyses, and others, in order to promote better knowledge on how forests respond to extreme events with a view to inform adaptation strategies for the preservation, management, and future development of forest ecosystems.

Guest Editors

Dr. Ettore D'Andrea

Dr. Giorgio Matteucci

Dr. Negar Rezaie

Prof. Dr. Achim Bräuning

Deadline for manuscript submissions

closed (15 December 2021)



Forests

an Open Access Journal by MDPI

Impact Factor 2.5 CiteScore 4.6



mdpi.com/si/86617

Forests
Editorial Office
MDPI, Grosspeteranlage 5
4052 Basel, Switzerland
Tel: +41 61 683 77 34
forests@mdpi.com

mdpi.com/journal/ forests





Forests

an Open Access Journal by MDPI

Impact Factor 2.5 CiteScore 4.6



About the Journal

Message from the Editor-in-Chief

Forests (ISSN 1999-4907) is an international and cross-disciplinary, scholarly forestry journal. The distinguished editorial board and refereeing process ensures the highest degree of scientific rigor and review of all published articles. Original research articles and timely reviews are released online, with unlimited free access. Our goal is to have Forests be recognized as one of the foremost publication outlets for high quality, leading edge research in this broad and diverse field. We therefore invite you to be one of our authors, and in doing so share your important research findings with the global forestry community.

Editor-in-Chief

Prof. Dr. Giacomo Alessandro Gerosa

Department of Mathematics and Physics, Catholic University of Brescia, I-25121 Brescia, Italy

Author Benefits

High Visibility:

indexed within Scopus, SCIE (Web of Science), Ei Compendex, GEOBASE, PubAg, AGRIS, PaperChem, and other databases.

Journal Rank:

JCR - Q2 (Forestry) / CiteScore - Q1 (Forestry)

Rapid Publication:

manuscripts are peer-reviewed and a first decision is provided to authors approximately 17.1 days after submission; acceptance to publication is undertaken in 2.4 days (median values for papers published in this journal in the first half of 2025).

