

## Special Issue

# Bioactivity Mechanisms of Antioxidant Compounds from Natural Products

### Message from the Guest Editor

Natural antioxidants includes polyphenols, carotenoids, tocopherols, coumarins, terpenoids, and bioactive peptides. In particular, they may modulate redox homeostasis, inflammatory responses, cellular signaling, and metabolic pathways. These activities are highly relevant to the prevention and management of chronic diseases associated with oxidative stress. A deeper understanding of the biological efficacy is essential to clarify the health-promoting potential of antioxidant compounds from natural sources.

This Special Issue aims to compile original research articles and review papers focusing on the bioactivity mechanisms of natural antioxidants. Topics of interest include molecular and cellular targets, structure–activity relationships, and various bioactive effects, as well as pharmacokinetics and metabolism. In vitro and in vivo studies relevant to human health are also welcome. Particular attention will be given to contributions that elucidate the molecular and cellular mechanisms underlying the biological activity of natural antioxidants, including the relationships between structural characteristics, chemical composition, bioavailability, and mode of action.

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### Guest Editor

Dr. Joanna Oracz

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### Deadline for manuscript submissions

30 December 2026



## Antioxidants

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## About the Journal

### Message from the Editor-in-Chief

It has been recognized in medical sciences that in order to prevent adverse effects of “oxidative stress” a balance exists between prooxidants and antioxidants in living systems. Imbalances are found in a variety of diseases and chronic health situations. Our journal *Antioxidants* serves as an authoritative source of information on current topics of research in the area of oxidative stress and antioxidant defense systems. The future is bright for antioxidant research and since 2012, *Antioxidants* has become a key forum for researchers to bring their findings to the forefront.

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### Editor-in-Chief

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