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Applications of Supercritical Carbon Dioxide

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Message from the Guest Editors

Supercritical carbon dioxide is a green, economic, nonflammable, and recyclable medium that could replace organic solvents in many industrial processes.

These outstanding properties have given rise to many extraction applications, such as the recovery of triglycerides, natural colorants, aromas, and other nutraceuticals from different vegetable sources or food wastes. Supercritical carbon dioxide can also be used as an impregnating medium to achieve. The solvent or antisolvent power of this fluid can also be exploited to set up many micronization. Other applications include the purification and sterilization of foods and polymers, where carbon dioxide can be a suitable environment to conduct innovative catalytic and biocatalytic reactions.

The aim of this Special Issue is to provide an overview of the huge amount of processes that can exploit the properties of supercritical carbon dioxide. Contributions, in the form of research or review articles, that cover innovative aspects of the use of this fluid in extraction, impregnation, drying, micronization, sterilization, and chemical processes will be welcome.









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Message from the Editor-in-Chief

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