Special Issue

Applications of Supercritical Carbon Dioxide

Message from the Guest Editors

Supercritical carbon dioxide is a green, economic, non-flammable, 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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Deadline for manuscript submissions

closed (31 March 2021)

Molecules

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Impact Factor 4.6
CiteScore 8.6
Indexed in PubMed

mdpi.com/si/41035

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As the premier open access journal dedicated to experimental organic chemistry, and now in its 25th year of publication, the papers published in *Molecules* span from classical synthetic methodology to natural product isolation and characterization, as well as physicochemical studies and the applications of these molecules as pharmaceuticals, catalysts and novel materials. Pushing the boundaries of the discipline, we invite papers on multidisciplinary topics bridging biochemistry, biophysics and materials science, as well as timely reviews and topical issues on cutting edge fields in all these areas.

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