



Experimental Food Chemistry: New Paradigms and Challenges

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Received date: December 2, 2015; Accepted date: December 3, 2015; Published date: December 10, 2015

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Editorial

It is with great pleasure that I write this lead-off editorial for the launched inaugural issue of the Journal of Experimental Food Chemistry, a new peer reviewed scientific publication which aims to give the scientific community the opportunity to disseminate the results of their research by offering a panoramic view of the trends, perspectives, innovative projects and new creative ideas that are emerging from food chemistry and in particular from experimental aspects of the food chemistry.

This journal aims to publish high quality research with rapid review process particularly encouraging the research in overlapping multidisciplinary prospective areas. The analytical aspects and composition analysis are of paramount importance, and play a major role considering the new technologies and equipment's available in the field of experimental food chemistry. They allow to quantify with a very high level of detail minor food components and/or contaminants of different origin at a very high resolution. Nevertheless, the actual perspectives of research in food chemistry reveal an emerging interest to new aspects interdisciplinary focused, like the use of by-products from industrial processing of food and foodstuff to recover biologically active substances, the food safety emerging problems and associated risk, the global assessment of food origin, the use of food as pharmaceuticals. Nutraceuticals are an outstanding example of a new important emerging trend in food chemistry area, and represent the new frontier for the use of food or part of food as pharmaceuticals for prevention and, in some cases, also for therapy of pathologic conditions [1]. A new challenging opportunity to explore and substantiate with detailed chemical composition data and with clinical data the mechanism and mode of action of nutraceuticals. These aspects are relevant with the aim of keeping a well-being status and prevent, by their use, the onset of diseases depending on wrong diet/food habits. The correct use of these pharma-foods could reduce, by widening the prevention actions, the cost for the global health care system on a planetary scale.

The use or re-use of food industry by-products as well as the recovery of biologically active compounds is giving also growing

attention in view of the growing interest towards the green economy and the optimization of the available resources. In this perspective, foodstuff and agro-food industry by-products re-use can play a major role. These aspects could contribute to stimulate experimental research in food chemistry and interest towards quality and composition requirements as well as safety, healthy and ethical food and food products [2,3]. Considering the above mentioned aspects, a Journal focused on Experimental Food Chemistry can play a relevant major role when publishing experimental data addressed to assess and substantiate the safety as well as the origin and composition or the mode of action of food and food derivatives meeting both the producers and the consumers need. This new Journal is open to a wide interdisciplinary cooperation with the aim of disseminating the results of new analytical methodology as well as to explore the mechanism of action and effects of food containing healthy compounds of clinically proven efficacy and to substantiate with scientific data the claims related to composition, health, origin and safety: all aspects of food to which people are giving growing attention every day. In this view, the Journal of Experimental Food Chemistry is welcoming the contribution of scientists wanting to contribute to the task of assessing the experimental aspects of food chemistry contributing data and research results on different aspects like analytical, safety, efficacy, composition, in vitro and in vivo clinical data covering a wide range of relevant interesting topics in food and foodstuff chemistry.

References

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