







Special Issue Reprint

Physicochemical, Sensory and Nutritional Properties of Foods Affected by Processing and Storage

www.mdpi.com/books/reprint/4781

Edited by Sidonia Martinez Javier Carballo

ISBN 978-3-0365-2732-1 (Hardback) ISBN 978-3-0365-2733-8 (PDF)



Processing and storage can cause changes and interactions in food components that have effects on nutritional value, organoleptic characteristics or even food safety. This book includes 19 research works showing important and interesting advances, and new new approaches, in this research topic. Four articles are dedicated to studying the effect of canning conditions (filling media and some ingredients) on the diverse parameters of quality for fish and pet foods. Three are devoted to studying the effects of dehydration (pretreatments and drying procedures). One is dedicated to monitoring the elaboration of a fermented and dehydrated product (sausage) using a portable NIRS device. The ninth article studies the effect of low-dose electron beam irradiation on cooking quality, moisture migration, and thermodynamics, as well as the digestion properties of the isolated starches in newly harvested and dried rice. The next contribution studies the use of different preservatives to avoid the formation of undesirable volatile organic compounds in stracciatella cheese. Another examines the impact of source material, kibble size, temperature, and duration on the efficiency of the aqueous extraction of sugars and phenolics from carob kibbles by conventional heat-assisted (HAE) and ultrasound-assisted (UAE) methods. In two articles, marinating with different extracts, alone or combined with other seasoning/conditioning methods, was essayed to tenderize beef or to improve the sensory quality of chicken leg and breast meat. The effect of various cooking methods on the



MDPI Books offers quality open access book publishing to promote the exchange of ideas and knowledge in a globalized world. MDPI Books encompasses all the benefits of open access – high availability and visibility, as well as wide and rapid dissemination. With MDPI Books, you can complement the digital version of your work with a high quality printed counterpart.



Open Access

Your scholarly work is accessible worldwide without any restrictions. All authors retain the copyright for their work distributed under the terms of the Creative Commons Attribution License.



Author Focus

Authors and editors profit from MDPI's over two decades of experience in open access publishing, our customized personal support throughout the entire publication process, and competitive processing charges as well as unique contributor discounts on book purchases.



High Quality & Rapid Publication

MDPI ensures a thorough review for all published items and provides a fast publication procedure. State-of-the-art research and time-sensitive topics are released with a minimum amount of delay.



High Visibility

Due to our global network and well-known channel partners, we ensure maximum visibility and broad dissemination. Title information of books is sent to international indexing databases and archives, such as the Directory of Open Access Books (DOAB), and the Verzeichnis Lieferbarer Bücher (VLB).



Print on Demand and Multiple Formats

MDPI Books are available for purchase and to read online at any time. Our print-on-demand service offers a sustainable, cost-effective and fast way to publish MDPI Books printed versions.

MDPI AG St. Alban-Anlage 66 4052 Basel Switzerland Tel: +41 61 683 77 34 www.mdpi.com/books books@mdpi.com

