

# हरकोर्ट बटलर प्राविधिक विश्वविद्यालय

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# PUBLICATIONS OF FOOD TECHNOLOGY DEPARTMENT (2017-2022)

# 2022

- 1 Arunima Singh, **Vivek Kumar** (2022) Nutritional, phytochemical, and antimicrobial attributes of seeds and kernels of different pumpkin cultivars. Food Frontier, Vol. 3 (1): 182-193
- 2 Shruti Maheshwari, **Vivek Kumar**, Geeta Bhadauria, Abhinandan Mishra (2022) Immunomodulatory potential of phytochemicals and other bioactive compounds of fruits: A review. Vol. 3 (2) 221-238.
- 3 **Vivek Kumar**, H.K. Sharma, Navneet Kumar (2022) Engineering Properties of Foods. In: H.K. Sharma and Navneet Kumar (Eds) Agro-Processing and Food Engineering. Springer Singapore, pp 23-80
- 4 **Vivek Kumar**, Deepika Umrao & Anjali Srivastava (2022) Functional Nanomaterials for Food Packaging Applications. In: Ashutosh Kumar Shukla (Eds) Food Packaging: The Smarter Way. Springer Singapore, pp 243-269.
- 5 Mahendra Kumar, Umesh Kumar, **Alak Kumar Singh** (2022) Therapeutic Nanoparticles: Recent Developments and Their Targeted Delivery Applications. Nano Biomed, Eng. 14(1): 38-52.
- 6 **Vivek Kumar**, Deepika Umrao and Sumaiya Fatima (2022) Importance of food quality analysis (in a relation to food safety and human health and COVID-19 in particular). In: Food Quality Analysis: Applications of analytical methods coupled with artificial intelligence. Elsevier, Singapore (ISBN 9780323959889)
- 7 **Vivek Kumar** and Arunima Singh (2022) Fluorescence spectroscopy for Beer quality analysis. In: Food Quality Analysis: Applications of analytical methods coupled with artificial intelligence. Elsevier, Singapore (ISBN 9780323959889)
- 8 **Anit Kumar**, Atul Dhiman, Rajat Suhag, Rachna Sehrawat, Ashutosh Upadhyay & David Julian McClements (2022) Comprehensive review on potential applications of

- microfluidization in food processing. Food Science and Biotechnology. 31, 17–36. DoI: https://doi.org/10.1007/s10068-021-01010-x
- 9 Rachna Sehrawat, S. Abdullah, Prateek Khatri, Lokesh Kumar, **Anit Kumar** & Arun Sadashiv Mujumdar (2022) Role of drying technology in probiotic encapsulation and impact on food safety, Drying Technology, 40:8, 1562-581, DOI: 10.1080/07373937.2022.2044844
- 10 Atul Dhiman, Rajat Suhag, Kiran Verma, Dhruv Thakur, **Anit Kumar**, Ashutosh Upadhyay, Anurag Singh (2022) Influence of microfluidization on physico-chemical, rheological, thermal properties and cholesterol level of cow ghee. LWT. Volume 160, 113281, ISSN 0023-6438. DOI: <a href="https://doi.org/10.1016/j.lwt.2022.113281">https://doi.org/10.1016/j.lwt.2022.113281</a>.
- 11 Sukh Veer Singh, Rakhi Singh, **Anurag Singh**, Ajay V. Chinchkar, Meenatai G. Kamble, Sadhan Jyoti Dutta and Shyam Beer Singh.2022. A Review on Green Pressure Processing of Fruit Juices using Microfluidization: Quality, Safety and Preservation. Applied Food Research. (2022). 1-13. https://doi.org/10.1016/j.afres.2022.100235 (**SCOPUS INDEXED**)
- 12 Meenatai Kamble, **Anurag Singh**, Sukh Veer Singh, Ajay Chinchkar, Sunil Pareek. 2022. Optimization of convective tray drying process parameters for the green banana slices using response surface methodology and its characterization. Journal of Food Quality(Wiley-Hindawi). Article ID 8208572. Pp 1-17. <a href="https://doi.org/10.1155/2022/8208572">https://doi.org/10.1155/2022/8208572</a> (**IF: 3.200**)
- 13 Meenatai G. Kamble, **Anurag Singh**, Navneet Kumar, Rohini V. Dhenge, Massimiliano Rinaldi, and Ajay V. Chinchkar. 2022. Semi-Empirical Mathematical Modeling, Energy and Exergy Analysis, and Textural Characteristics of Convectively Dried Plantain Banana Slices. Foods, 11, 2825. https://doi.org/10.3390/foods11182825 (**IF: 5.561**)
- 14 Nikhitha Mohan Aringalayan, Rakhi Singh, Shivangi Mishra, S. Thangalakshmi, Barjinder Pal Kaur, Vivek K. Bajpai, **Anurag Singh.** 2022. Optimization and characterization of malted proso millet (*Panicum miliaceum*) based bread. efood (IADNS-Wiley). DOI: 10.1002/efd2.29 (**SCOPUS INDEXED**)
- 15 Sukh Veer Singh, Rakhi Singh, **Anurag Singh**, S. Thangalaksmi, Barjindar P. Kaur, Meenatai G. Kamble, Ayon Tarafdar and Ashutosh Upadhyay (2022). Optimization of enzymatic hydrolysis parameters for Sapodilla fruit (*Manikara achras* L.) juice extraction. Journal of Food Processing and Preservation (Wiley). 46, e16315. <a href="https://doi.org/10.1111/jfpp.16315">https://doi.org/10.1111/jfpp.16315</a> (**IF: 2.190**)

Suheela Bhat, C. S. Saini, **Vivek Kumar**, and H. K. Sharma, (2021) Spray Drying of Bottle Gourd Juice: Effect of Different Carrier Agents on Physical, Antioxidant Capacity,

- Reconstitution, and Morphological Properties: ACS Food Sci. Technology Vol. 1 (2) 282-291.
- 2 Rishika Tewari, **Vivek Kumar** & H.K. Sharma (2021) Pretreated Indian Gooseberry (Emblicaofficinalis) Segments: Kinetic, Quality and Microstructural Parameters. Journal of The Institution of Engineers (India): Series A volume Vol. 102 (2): 523-534.
- 3 Nimisha Tandon, Siddhartha Sachan, **Vivek Kumar** (2021) Isolation, characterization of fenugreek gum and its effect on quality of chapatti (Indian unleavened flat bread): Materials Today: Proceedings, Vol. 43 (2): 2091-2097
- 4 Mahendra Kumar, Aparna Seth, **Alak Kumar Singh**, Manish Singh Rajput, Mohd Sikander (2021) Remediation strategies for heavy metals contaminated ecosystem: A review. Environmental and Sustainability Indicators, Vol. 12. https://doi.org/10.1016/j.indic.2021.100155
- 5 Mahendra Kumar, Anamika Kushwaha, Lalit Goswami, **Alak Kumar Singh**, Mohd Sikander (2021) Review on advances and mechanism for the phycoremediation of cadmium contaminated wastewater. Cleaner Engineering and Technology, Vol. 5. <a href="https://doi.org/10.1016/j.clet.2021.100288">https://doi.org/10.1016/j.clet.2021.100288</a>
- 6 Drishti Kadian, **Anit Kumar**, Prarabdh C. Badgujar, Rachna Sehrawat (2021) Effect of homogenization and microfluidization on physicochemical and rheological properties of mayonnaise. Journal of Food Process Engineering. https://doi.org/10.1111/jfpe.13661
- 7 Rajat Suhag, Atul Dhiman, Dhruv Thakur, **Anit Kumar**, Ashutosh Upadhyay (2021) Physicochemical and functional properties of microfluidized egg yolk. Journal of Food Engineering. Volume 294, 110416, ISSN 0260-8774 DOI: https://doi.org/10.1016/j.jfoodeng.2020.110416.

- 1 Arunima Singh & Vivek Kumar (2020) Cultivars Effect on the Physical Characteristics of Pumpkin (Cucurbitamoschata Duch.) Seeds and Kernels. Journal of The Institution of Engineers (India): Series A. Vol. 101 (4): 631-641.
- 2 Mahendra Kumar, **Alak Kumar Singh**, Mohammad Sikandar, Heliyon (2020).Biosorption of Hg (II) from aqueous solution using algal biomass: kinetics and isotherm studies, Vol 6(1)
- 3 Harloveleen Sandhu, Rachna Sehrawat, **Anit Kumar** & Prabhat Nema (2020). Overview of Food Industry and Role of Innovation in Food Industry. 10.1007/978-981-15-2556-8\_1.

# 2019

1 Rishika Tewari, **Vivek Kumar**, H K Sharma (2019) Physical and chemical characteristics of different cultivars of Indian gooseberry (Emblicaofficinalis). Journal of Food Science and Technology, Vol. 56(3): 1641-1648

- 2 **Vivek Kumar**, H. K. Sharma and K. Singh (2019) Physico-chemical, functional and antinutritional properties of taro (Colocasiaesculenta) flour as affected by cooking and drying methods. African Journal of Food Science (In Press)
- 3 Ravi Kumar, **Alak Kumar Singh** (2019) Effect of Multi-enzyme (Pectinase, Cellulase and Hemicellulase) Treatment on Clarification of papaya fruit juice, International Journal of Recent Technology and Engineering Vol: 8(4): 12708-12721
- 4 Mahendra Kumar, Lalit Goswami, **Alak Kumar Singh**, Mohammad Sikander, (2019) Valorization of coal fired-fly ash for potential heavy metal removal from the single and multicontaminated system. Heliyon, Vol 5(10). <a href="https://doi.org/10.1016/j.heliyon.2019.e02562">https://doi.org/10.1016/j.heliyon.2019.e02562</a>
- 5 Anoop Kumar, Sayyad Abdul, Alak Kumar Singh and **Vivek Kumar (2019)** Modeling sorption isotherms of refractive window dried Indian jujube powder. Journal of Agricultural Engineering and Food Technology, Vol 6 (4): 280-282
- 6 Charu Singh, **Vivek Kumar**, Medha Sharma, Ajit Kumar Singh and Anit Kumar (2019) Study of physicochemical properties of fermented wheat flour (Sheera). Journal of Agricultural Engineering and Food Technology, Vol. 6 (4): 271-274
- 7 Smriti Pandey **Vivek Kumar** and Anjali Srivastava (2019) Effect of process parameters on yield of biosurfactant by Bacillus subtilis. Journal of Agricultural Engineering and Food Technology, Vol. 6 (4): 268-270
- 8 Anjali Srivastava, **Vivek Kumar** and Vivek Kumar Srivastava (2019) Effect of Substrate Concentration and pH on Biosurfactant production from Pineapple peel, , Journal of Energy Research and Environmental Technology, Vol. 6 (1): 56-60

- 1 Anjali Srivastava, **Vivek Kumar** and **Alak Kumar Singh**. (2018) Computerized and Electronic Controls in Food Packaging. Anjali Srivastava, Journal of Applied Packaging Research, Vol 10 (1): 28-45
- 2 Akshay K. Singh, Anjali Srivastava, **Vivek Kumar** and Karunakar Singh (2018) Phytochemicals, Medicinal and Food Applications of Shatavari (Asparagus racemosus): An Updated Review, The Natural Products Journal: Vol 8 (1): 32-44.
- 3 **Vivek Kumar**, H.K. Sharma and Anjali Srivastava (2018) Composition, Properties, and Processing of Mushroom. In: Harish Sharma, Parmjit Panesar (Eds) Technologies in Food Processing. CRC Press, United States, pp 221-264

- 4 **Vivek Kumar** and Anjali Srivastava (2018) The Role of RFID in Agro-Food Sector. Agricultural Research and Technology, Vol 14 (4): 1-5
- 5 Mahendra Kumar, **Alak Kumar Singh**, Mohd. Sikander (2018) Study of sorption and desorption of Cd (II) from aqueous solution using isolated green algae Chlorella vulgaris. Applied Water Science, Vol: 8

- 1 **Vivek Kumar**, H.K.Sharma, K.Singh (2017) Effect of precooking on drying kinetics of taro (colocasiaesculenta) slices and quality of its flours. Food Bioscience, Vol. 20: 178-186
- Vivek Kumar, H.K.Sharma, K.Singh, PragatiKaushal, R.P.Singh (2017) Effect of pre-fry drying on mass transfer kinetics during deep fat frying of taro slices and its fried quality. International Food Research Journal, Vol. 24 (3): 1110-1116
- 3 Akshay Kumar Singh, **Vivek Kumar**, Karunakar Singh (2017) Evaluation of antioxidant potential of oregano leaves (Origanumvulgare L.) and their effects on oxidative stability of ghee. Nutrafoods, Vol. 16 (2): 109-119.
- 4 **Vivek Kumar**, H.K. Sharma (2017) Process optimization for extraction of bioactive compounds from taro (Colocasiaesculenta), using RSM and ANFIS modelling. Journal of Food Measurement and Characterization, Vol. 11(2): 704-718.
- 5 **Vivek Kumar**, H.K. Sharma & Shweta Mishra (2017) Simulation of spray drying of tomato juice using computational fluid dynamics (CFD). Cogent Food & Agriculture, Vol. 3 (1): 1-9
- 6 Saumya Rathore, **K Singh** (2017) A critical optimization study on hydrothermal treatment for decortication of pearl millet to improve its consumption efficiency. Food Measure 11, 1501–1515. https://doi.org/10.1007/s11694-017-9529-y

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