

CURRICULUM VITAE



Ts. Dr. Mohd Zuhair Mohd Nor

¹Department of Process and Food Engineering
Faculty of Engineering, Universiti Putra Malaysia,
43400 UPM Serdang, Selangor

²Laboratory of Halal Science Research, Halal
Products Research Institute, Universiti Putra
Malaysia, 43400 Serdang, Selangor, Malaysia

Email: zuhair@upm.edu.my
Tel: +603-9769 4303

Education

1. Ph.D (Food Processing Engineering), 2017, Victoria University, Melbourne, Australia
2. M.Sc (Food Engineering), 2012, Universiti Putra Malaysia
3. B. Eng (Hons) Process & Food Engineering, 2007, Universiti Putra Malaysia

Areas of Interest

1. Membrane processing
2. Food product development
3. Protein separation
4. Agro waste utilization

Professional Qualification/ Membership/ Affiliation

1. Malaysia Board of Technologists (MBOT) – Professional Technologist
2. Board of Engineers Malaysia (BEM) - Graduate Member
3. Institute Engineers of Malaysia (IEM) - Graduate Member
4. Malaysia Society of Agricultural Engineers (MSAE) – Member
5. Global Harmonization Initiative (GHI) - Member

Appointments

Position	Duration
1. Senior Lecturer, Department of Process and Food Engineering, Faculty of Engineering, Universiti Putra Malaysia	June 2017 – to-date
2. Interim Researcher, Laboratory of Halal Science Research, Halal Products Research Institute, Universiti Putra Malaysia	May 2019 – to-date
3. Editor of Advances in Agricultural and Food Research Journal	2019 – to-date
4. Tutor, Department of Process and Food Engineering, Faculty of Engineering, Universiti Putra Malaysia	Feb 2009 – June 2017
5. Mill Engineer, Sime Darby Plantations Sdn. Bhd.	July 2007 – Feb 2009
6. Trainee, Ayamas Food Corporation Sdn. Bhd.	April 2006 – July 2006

Appointments at the University/Faculty/Departmental Level	
Position	Duration
1. President of Sport and Social Club, Faculty of Engineering UPM	2020 – to-date
2. Coordinator of Student Affairs, Department of Process and Food Engineering	2019 – to-date
3. Committee of Publication and Promotion, Faculty of Engineering	2018 – 2019
4. Head of Physical Unit Operations Laboratory	2018 – 2019

Publications

Journals

- Al-Hilphy, A.R., Ahmed, A.H.K., Gavahian, M., Chen, H.H., Chemat, F., Al-Behadli, T.K.M., **Nor, M.Z.M.** & Ahmad, S., (2022). Solar energy-based extraction of essential oils from cloves, cinnamon, orange, lemon, eucalyptus, and cardamom: A clean energy technology for green extraction. *Journal of Food Process Engineering*, e14038.
- Yusree, F.I.F.M., Peter, A.P., Zulkifli, N.A., **Nor, M.Z.M.**, Basri, M.S.M., Mokhtar, M.N., Awasthi, M.K. & Show, P.L., (2022). Towards green recovery of β -amylase from slurry of sweet potato (*Ipomoea batatas*) of VitAto variety via liquid biphasic system. *Sustainable Chemistry and Pharmacy*, 25.
- Sopi, N.Z.M., Hamzah, M.H., Man, H.C., **Nor, M.Z.M.** & Radzuan, M.N. (2021). Process optimization of ultrasonic-assisted-soxhlet-extraction of essential oil from citrus hystrix using response surface methodology. *Agricultural Mechanization in Asia, Africa and Latin America*, 52(3), 4043–4061.
- Katibi, K.K., Yunus, K.F., Che Man, H., Aris, A Z., **Nor, M.Z.M.**, Azis, R.S., & Umar, A.M. (2021). Contemporary techniques for remediating endocrine-disrupting compounds in various water sources: advances in treatment methods and their limitations. *Polymers*, 13(19), 3229.
- Katibi, K.K., Yunus, K.F., Che Man, H., Aris, A Z., **Nor, M.Z.M.**, Azis, R.S., & Umar, A.M. (2021). An Insight into a Sustainable Removal of Bisphenol A from Aqueous Solution by Novel Palm Kernel Shell Magnetically Induced Biochar: Synthesis, Characterization, Kinetic, and Thermodynamic Studies. *Polymers*, 13(21), 3781.
- Basri, M.S.M., **Nor, M.Z.M.**, Shamsudin, R., Tawakkal, I.S.M.A., Ghani, N.H.A., Kamarudin, K.M. & Mustafah, A.M (2021). Effects of different fluting medium geometries on von-Mises stress and deformation in single fluted board: A three-dimensional finite element analysis. *Advances in Agricultural and Food Research Journal*, 2(1).
- Roslan, J., Boniface, B.A., Ling, H.C., Shya, L.J., Akanda, M.J.H., & Saallah, S. & **Nor, M.Z.M.** (2021). Effect of heat treatment on physicochemical properties of bambangan (*Mangifera pajang kosterm*) fruit juice. *Transactions on Science and Technology*, 8(3), 545-551.
- Razali, S.N.M., Hamzah, M.H., Man, H.C., & **Nor, M.Z.M.** (2021). Converting durian-based traditional dessert into ready-to-eat durian stick through sausage technology application. *Advances in Agricultural and Food Research Journal*, 2(1).
- Azman, W.M.F.W., Shamsudin, R., **Nor, M.Z.M.**, & Hamzah, A. (2021). Effect of moisture content on the angle of repose and coefficient of kinetic friction of sago trunk (*Metroxylon spp.*). *Advances in Agricultural and Food Research Journal*, 2(1).
- Azman, W.M.F.W., Shamsudin, R., **Nor, M.Z.M.**, & Hamzah, A. (2021). Evaluation and optimization of disc grating machine for sago starch production (*Metroxylon spp.*), *Advances in Agricultural and Food Research Journal*, 2(2).
- Sanchez, P.D.C., Hashim, N., Shamsudin, R., & **Nor, M.Z.M.** (2021). Effects of different storage temperatures on the quality and shelf life of Malaysian sweet potato (*Ipomoea Batatas* L.) varieties. *Food Packaging and Shelf Life*, 28, 100642.
- Basri, M.S.M., **Nor, M.Z.M.**, Shamsudin, R., Tawakkal, I.S.M.A., Ghani, N.H.A., Kamarudin, K.M., & Mustafah, A.M. (2021). Effects of different fluting medium geometries on von-mises stress and deformation in single fluted board: a three-dimensional finite element analysis. *Advances in Agricultural and Food Research Journal*, 2(1).
- Yusree, F.I.F.M., Peter, A.P., **Mohd Nor, M.Z.**, Show, P.L., & Mokhtar, M.N. (2021). Latest advances in protein-recovery technologies from agricultural waste. *Foods*, 10(11), 2748.
- Othman, S.H., Abdullah, N.A., Nordin, N., Shah, N.N.A.K., **Nor, M.Z.M.**, & Yunus, K.F.M. (2021). Shelf life extension of Saba banana: Effect of preparation, vacuum packaging, and storage temperature. *Food Packaging and Shelf Life*, 28, 100667.
- Shaari, N., Shamsudin, R., **Nor, M.Z.M.**, & Hashim, N. (2021). Quality attributes of malaysia purple-fleshed sweet potato at different peel condition. *Agronomy*, 11(5), 872.

16. Idris, S.B., Shamsudin, R., **Nor, M.Z.M.**, Mokhtar, M.N., & Abd Ghani, S.S. (2021). Proximate composition of different parts of white cassava (*Manihot esculenta crantz*) plant as a ruminant feed. *Advances in Agricultural and Food Research Journal*, 2(1).
17. Mohd Basri, M.S., Abdul Karim Shah, N.N., Sulaiman, A., Mohamed Amin Tawakkal, I.S., **Mohd Nor, M.Z.**, Ariffin, S.H., Ghani, N.H.A. & Mohd Salleh, F. S. (2021). Progress in the valorization of fruit and vegetable wastes: active packaging, biocomposites, by-products, and innovative technologies used for bioactive compound extraction. *Polymers*, 13(20), 3503.
18. Rosdi, F.N., **Nor, M.Z.M.**, Mohamad, W.A.F.W., & Mokhtar, W.M.F.W. (2021). Physical properties of kelulut honey emulsions with different oil types and emulsifier concentrations. *Journal Of Agrobiotechnology*, 12(1S), 92-100.
19. Yee, W.P., **Nor, M.Z.M.**, Basri, M.S.M. & Roslan, J. (2021). Membrane-based clarification of banana juice: pre-treatment effect on the flux behaviour, fouling mechanism and juice quality attributes. *Food Research*, 5(Suppl. 1), 57 – 64. (SCOPUS indexed)
20. Zulkifli, N.A., **Nor, M.Z.M.**, Omar, F.N., Sulaiman, A & Mokhtar, M.N. (2021). Proximate composition of Malaysian local sweet potatoes. *Food Research*, 5(Suppl. 1), 73 - 79. (SCOPUS indexed)
21. Siti Amirah Razali, **Mohd Zuhair Mohd Nor**, Mohd Shamsul Anuar, Rosnah Shamsudin & Wan Anwar Fahmi Wan Mohamad (2020). Banana puree powder production via foam mat drying. *Advances in Agricultural and Food Research Journal*, 1(1), a0000104.
22. Nurul Ainina Zulkifli, Nurhanisah Mohammed Salleh, **Mohd Zuhair Mohd Nor**, Farah Nadia Omar, Alifdalino Sulaiman & Mohd Noriznan Mokhtar (2020). Nutritional properties of orange-fleshed sweet potato juice. *Advances in Agricultural and Food Research Journal*, 1(2), a0000142
23. Mohamad Mazlan, M., Talib, R A., Chin, N.L., Shukri, R., Taip, F.S., **Mohd Nor, M.Z.**, & Abdullah, N. (2020). Physical and Microstructure Properties of Oyster Mushroom-Soy Protein Meat Analog via Single-Screw Extrusion. *Foods*, 9(8), 1023. (IF: 4.092, Q1)
24. Sanchez, P.D.C., Hashim, N., Shamsudin, R., & **Nor, M.Z.M.** (2021). Potential application of laser-based imaging technology in the quality evaluation of agricultural products: A review. *Advances in Agricultural and Food Research Journal*, 1(2).
25. Mohd Basri, M.S., Mohd Jais, N., Sulaiman, A., **Mohd Nor, M.Z.**, Abdul Karim Shah, N.N., & Ariffin, S. H. (2020). Optimizing the processing factor and formulation of oat-based cookie dough for enhancement in stickiness and moisture content using response surface methodology and superimposition. *Processes*, 8(7), 797. (IF: 2.753, Q1)
26. Mohamad Mazlan, M., Talib, R.A., Taip, F.S., Chin, N.L., Sulaiman, R., Shukri, R., & **Mohd Nor, M.Z.** (2020). Changes in the physical properties and specific mechanical energy of corn-mango peel extrudates. *CyTA-Journal of Food*, 18(1), 417-426. (IF: 1.653, Q3)
27. Shaari, N., Shamsudin, R., **Mohd Nor, M.Z.** & Hashim, N. (2020). Phenolic, flavonoid and anthocyanin contents of local sweet potato (*Ipomoea batatas*). *Food Research*, 4 (Suppl. 1). 74 – 77. (SCOPUS indexed)
28. Idris, S., Rosnah, S., **Nor, M.Z.M.**, Mokhtar, M.N. & Abdul Gani, S.S. (2020). Physicochemical composition of different parts of cassava (*Manihot esculenta* Crantz) plant. *Food Research*, 4 (Suppl. 1). 78 – 84. (SCOPUS indexed)
29. Sanchez, P.D.C., Hashim, N., Shamsudin, R., & **Nor, M.Z.M.** (2020). Applications of imaging and spectroscopy techniques for non-destructive quality evaluation of potatoes and sweet potatoes: A review. *Trends in Food Science & Technology*, 96, 208-221. (IF: 11.077, Q1)
30. Sanchez, P.D.C., Hashim, N., Shamsudin, R., & **Nor, M.Z.M.** (2020). Laser-light backscattering imaging approach in monitoring and classifying the quality changes of sweet potatoes under different storage conditions. *Postharvest Biology and Technology*, 164, 111163. (IF:4.303, Q1)
31. Wan Mohd Fariz, W.A., Rosnah, S., **Mohd Zuhair, M.N.**, Azman, S. & Noramina, H. (2020). Effects of various grated sago sizes, steeping periods and trunk sections on sago starch recovery (*Metroxylon* spp.). *Food Research*, 4(4), 1172 – 1180. (SCOPUS indexed)
32. W.A. Wan Mohd Fariz, S. Rosnah, **M.N. Mohd Zuhair**, H. Azman, A. Mohd Shahrir, A.K. Faewati, S. Amir Redzuan, J. Mohammad Shukri, S. Mohd Azmirredzuan, M.A.T. Mohd Hafiz, Z. A. Mohd Zaimi, J. Muhammad Aliq & A. Sha'fie (2020). The assessment of grated sago size produced by different type of grating machine. *ASM Science Journal*, 13, 59-66. (SCOPUS indexed)
33. Philip Donald C Sanchez, Norhashila Hashim, Rosnah Shamsudin & **Mohd Zuhair Mohd Nor** (2020). Quality evaluation of sweet potatoes (*Ipomoea batatas* L.) of different varieties using laser light backscattering imaging technique. *Scientia Horticulturae*, 260, 108861. (IF: 1.961, Q2)
34. Omar, J.M., **Nor, M.Z.M.**, Basri, M.S.M. & Che Pa, N.F. (2020). Clarification of guava juice by an ultrafiltration process: analysis on the operating pressure, membrane fouling and juice qualities. *Food Research*, 4(Suppl. 1), 85 – 92. (SCOPUS indexed)
35. Umar Etsu Shehu, Mohd Noriznan Mokhtar, **Mohd Zuhair Mohd Nor**, Azhari Samsu Baharuddin & Nazmi Mat Nawi (2019). A study on the use of water as a medium for the thermal inactivation of endogenous lipase in oil of palm fruit. *Energies*, 12, 3981 (IF:2.707, Q1)
36. Safwan Sulaiman, Mohd Noriznan Mokhtar, **Mohd Zuhair Mohd Nor**, Khairul Faezah Md. Yunos & Mohd Nazli Naim (2019). Mass transfer with reaction kinetics of the biocatalytic membrane reactor using a

- fouled covalently immobilised enzyme layer (α -CGTase-CNF layer). *Biochemical Engineering Journal*, 152, 107374. (IF: 3.371, Q1)
37. Mohamad Mazlan, M., Talib, R. A., Mail, N. F., Taip, F. S., Chin, N. L., Sulaiman, R., Shukri, R., & **Mohd Nor, M. Z.** (2019). Effects of extrusion variables on corn-mango peel extrudates properties, torque and moisture loss. *International Journal of Food Properties*, 22(1), 54-70. (IF: 1.845, Q2)
 38. Mohd Salahuddin, M.B., Fatin Atikah A., Rosnah S. & **Mohd Zuhair M.N.** (2019). Conceptual design and finite element analysis of a high inclusion dough shaping machine using solidworks, *Materialwissenschaft und Werkstofftechnik*, 50(3), 267-273. (IF: 0.625, Q4)
 39. Basri, M.S.M., Shamsudin, R. & **Nor M.Z.M.** (2019). Mechanical analysis of a wedge device in sawing technology. *Pertanika Journal of Science & Technology*, 27(1), 197-209. (Indexed by Scopus)
 40. Ying, H.Y., Anuar, M.S., & **Nor, M.Z.M.** (2018). Drying, colour and sensory characteristics of 'berangan' banana (*Musa accuminata*) flesh dried using a microwave oven. *Malaysian Journal of Halal Research*, 1(1), 10-14.
 41. **Nor, M.Z.M.**, Ramchandran, L., Duke, M., & Vasiljevic, T. (2018). Performance of a two-stage membrane system for bromelain separation from pineapple waste mixture as impacted by enzymatic pre-treatment and diafiltration. *Food Technology and Biotechnology*, 56(2), 218-227. (IF:1.168, Q3)
 42. **Nor, M.Z.M.**, Ramchandran, L., Duke, M., & Vasiljevic, T. (2017). Integrated ultrafiltration process for the recovery of bromelain from pineapple waste mixture. *Journal of Food Process Engineering*, 40(3). (IF: 1.955, Q2)
 43. **Nor, M.Z.M.**, Ramchandran, L., Duke, M., & Vasiljevic, T. (2017). Application of membrane-based technology for purification of bromelain. *International Food Research Journal*, 24(4), 1685-1696. (IF: 0.559, Q4)
 44. **Nor, M.Z.M.**, Ramchandran, L., Duke, M., & Vasiljevic, T. (2016). Separation of bromelain from crude pineapple waste mixture by a two-stage ceramic ultrafiltration process. *Food and Bioproducts Processing*, 98, 142-150. (IF: 2.744, Q1)
 45. **Nor, M.Z.M.**, Ramchandran, L., Duke, M., & Vasiljevic, T. (2015). Characteristic properties of crude pineapple waste extract for bromelain purification by membrane processing. *Journal of Food Science and Technology*, 52(11), 7103-7112. (IF: 1.797, Q3)
 46. **Nor, M.Z.M.**, Talib, R. A., Noranizan, M. A., Chin, N. L., & Hashim, K. (2015). Effects of cooking temperature in repetitive cooking-chilling cycles on resistant starch content and quality characteristics of fish crackers. *Pertanika Journal of Science & Technology*, 23(2), 311-323. (Indexed by Scopus)
 47. **Nor, M.Z.M.**, Talib, R. A., Noranizan, M. A., Chin, N. L., & Hashim, K. (2014). Increasing resistant starch content in fish crackers through repetitive cooking-chilling cycles. *International Journal of Food Properties*, 17(5), 966-977. (IF: 1.845, Q2)

Books

1. Wan Mohd Fariz Wan Azman, Rosnah Shamsudin, Azman Hamzah & **Mohd Zuhair Mohd Nor** (2023). *Sagu: Potensi dan Kepelbagaian Kegunaan*. Serdang, Selangor: UPM Press. (In press)

Book Chapters

1. **Mohd Zuhair Mohd Nor**, Mohd Salahuddin Mohd Basri, Noor Zafira Noor Hasnan Intan Syafinaz Mohamed Amin Tawakkal and Nur 'Aliaa Abdul Rahman. Lab Work Video (LWV): a tool for course assessment and teaching aid in undergraduate program. In *National Innovation Invention in Engineering and Built Environment (PRIN-KAB 2019)* (pp. 30-32). Bangi, Selangor: Center of Engineering and Built Environment Education Research (PEKA), UKM.

Conference Proceedings

1. Sukri, N., **Nor, M.Z.M.**, Mokhtar, M.N., Yunus, K.F.M., Shamsudin, R. and Show, P.L. (2022). Two-stage ultrafiltration for the separation of α -amylase from red pitaya peel, paper presented at the 6th International Conference and Postgraduate Colloquium for Environmental Research 2022 (POCER 2022), Langkawi, 9-11 June 2022.
2. **Nor, M.Z.M.**, Basri, M.S.M., Zulkifli, W.N.S.W., Shukeri, N.J.M., Othman, N.N. (2022). Banana puree powder production by foam mat drying, paper presented at the 8th International Conference on Food Engineering Network of Thailand (FENETT2022), On-line, 4 April 2022.
3. Yusree, F.I.F.M., Peter, A.P., **Nor, M.Z.M.**, Show, P.L. (2021). Liquid biphasic system (LBS) for purification of α -amylase from agricultural waste, paper presented at the International Conference on Agriculture, Animal Sciences and Food Technology (ICAFT) 2021, On-line, 2-3 March 2021.
4. Jefriniza, M.S., Nor, M.Z.M., Basri, M.S.M. & Hamzah, M.H. (2021). Strategic approaches on traditional foods innovation: The concept and principles, paper presented at the International Conference On Agriculture, Animal Sciences and Food Technology (ICAFT) 2021, On-line, 2-3 March 2021.

5. Selvadurai, S., Zulkifli, N.A., **Nor, M.Z.M.**, Mokhtar, M.N. & Sulaiman, A. (2021). Characteristic properties of the lab-produced sweet potato starch of vitato variety, paper presented at the International Conference on Agriculture, Animal Sciences and Food Technology (ICAFT) 2021, On-line, 2-3 March 2021.
6. Yusree, F.I.F.M., Peter, A.P., Zulkifli, N.A., **Nor, M.Z.M.**, Basri, M.S.M., Mokhtar, M.N., Awasthi, M.K. & Show, P.L., (2021). Recovery of β -amylase from sweet potato slurry via liquid biphasic system, paper presented at the 1st International Conference on Plantation Technology (ICPTech 2021), On-line, 23-24 November 2021.
7. Nurelyzurina Sukri and Mohd Zuhair Mohd Nor (2020). Rheological properties of crude red pitaya extracts at different pH and temperatures, paper presented at the 8th International Symposium on Applied Engineering and Sciences (SAES2020), On-line, 12-19 December 2020.
8. Zulkifli, N.A, **Nor, M.Z.M.**, Mokhtar, M.N., and Sulaiman, A (2019), Strategies for Sustainable Production of Starch from Sweet Potato, paper presented at the National Convention of Agricultural and Food Engineering 2019, Putrajaya, Malaysia, 21 March 2019.
9. Omar, J.M., **Nor, M. M. Z.** (2019), Clarification of Guava Juice Through Membrane-based Process, paper presented at the National Convention of Agricultural and Food Engineering 2019, Putrajaya, Malaysia, 21 March 2019.
10. Zakaria, N. Z., **Nor, M. M. Z.** (2019), Characteristics of Powders Produced from Different Parts of Sweet Potato, paper presented at the National Convention of Agricultural and Food Engineering 2019, Putrajaya, Malaysia, 21 March 2019.
11. Mohd Salahuddin, M.B., Fatin Atikah A., Rosnah S., **Nor, M.Z.M.** (2018), Conceptual Design and Finite Element Analysis of a High Inclusion Dough Shaping Machine Using Solidworks, paper presented at the 4th International Conference on Mechanical, Manufacturing and Plant Engineering, Malacca, Malaysia, 14-15 November 2018.
12. Husaini, H., **Nor, M.Z.M.**, Shamsudin, R., Adoption of Sausage Technology to Convert Banana-Based Traditional Dessert to a Ready-to-eat Food, paper presented at the 4th International Conference on Agriculture and Food Engineering (CAFEi 2018), Putrajaya, Malaysia, 7-9 November 2018.
13. Razali, A., **Nor, M.Z.M.**, Preparation of Banana Puree Powder via Foam Mat Drying Technique, paper presented at the Malaysian Society of Agricultural Engineers (MSAE) Conference 2018, Serdang, Malaysia, 7-8 February 2018.
14. Woo, P.Y., **Nor, M.Z.M.**, Effect of Enzymatic Treatment on the Viscosity and Color Properties of Banana Juice, paper presented at the Malaysian Society of Agricultural Engineers (MSAE) Conference 2018, Serdang, Malaysia, 7-8 February 2018.
15. Husaini, H., **Nor, M.Z.M.**, Converting Banana-based Traditional Dessert to a Ready-to-eat Food via Sausage Technology, paper presented at the Malaysian Society of Agricultural Engineers (MSAE) Conference 2018, Serdang, Malaysia, 7-8 February 2018.
16. **Nor, M.Z.M.**, Ramchandran, L., Duke, M., Vasiljevic, T., Membrane Process for Separation of Bromelain from Crude Pineapple Waste Mixture, paper presented at the Malaysian Postgraduate Colloquium 2015, Melbourne, Australia, 19-20 December 2015.
17. **Nor, M.Z.M.**, Ramchandran, L., Duke, M., Vasiljevic, T., Bromelain extraction from pineapple waste by membrane processing - The effects of feed pH and processing temperature, paper presented at the College of Health and Biomedicine Postgraduate Research Students Seminar 2015, Victoria University, Melbourne, Australia, 7 August 2015.
18. **Nor, M.Z.M.**, Ramchandran, L., Duke, M., Vasiljevic, T., Purification of Bromelain from Pineapple Waste by 2-Stage Ceramic Ultrafiltration, paper presented at the 9th Conference of Aseanian Membrane Society, Taipei, Taiwan, 19-21 July 2015.
19. **Nor, M.Z.M.**, Ramchandran, L., Duke, M., Vasiljevic, T., Characterization of Crude Pineapple Waste Extract Properties for Membrane-based Purification of Bromelain, paper presented at the 5th AIFST Food Science Summer School, Melbourne, Australia, 28-30 January 2015.
20. **Nor, M.Z.M.**, Ramchandran, L., Duke, M., Vasiljevic, T., Characteristic Properties of Crude Pineapple Waste Extract for Bromelain Purification by Membrane Processing, paper presented at the College of Health and Biomedicine Postgraduate Research Conference 2014, Victoria University, Melbourne, Australia, 2 October 2014.
21. Syahidah K., Shamsuddin, R., Ahmedov, A., Zaulia, O., Noranizan, M.A., **Nor, M.Z.M.**, Effects of Active Packaging on the Physico-Chemical Properties of Fresh-Cut Cantaloupe (Cucumis Melo L. Var. Glamour), paper presented at the 19th IAPRI World Conference on Packaging, Melbourne, Australia, 15-18 June 2014.
22. **Nor, M.Z.M.**, Talib, R.A., Noranizan, M.A., Chin, N.L., Hashim, K., Increasing Resistant Starch Content in Fish Crackers Through Different Cooking Temperatures in Repetitive Cooking-Chilling Cycles, paper presented at the International Conference on "Agricultural and Food Engineering for Life" (CAFEi 2012). Palm Garden Hotel, Putrajaya, 26-28 November 2012.
23. **Nor, M.Z.M.**, Talib, R.A., Noranizan, M.A., Chin, N.L., Hashim, K., Resistant Starch Yield and Linear Expansion of Lab-Prepared and Commercial Fish Crackers, paper presented at the 11th International

Research Grants

No	Project Title	Amount (RM)	Year	Source of Fund
1	Intrinsic mass transfer mechanism and thermodynamic interaction of solute particle in wastewater and magnetic responsive polymer membrane (Co-Researcher)	80,000.00	2019-2021	FRGS
2	Effect of operating parameters on the clarification of bambangan juice using ultrafiltration membrane on juice quality (Co-Researcher)	20,000.00	2020-2021	UMS
3	Integrated membrane-based technology for the processing of tropical fruit juice (Leader)	60,000.00	2018-2021	UPM
4	Meningkatkan ekonomi penternak itik teluk di daerah Bacok, Kelantan dengan menggunakan teknologi tanaman bertingkat bagi meningkatkan pengeluaran <i>Azolla pinnata</i> sebagai sumber makananan (Co-Researcher)	25,000.00	2018-2019	UPM
5	Investigating relationships of extrusion parameters using master curve in low-cost oyster mushroom/soy protein meat substitute (Co-Researcher)	25,000.00	2018-2019	UPM
6	Processing and product development of local sweet potatoes for sustainable value-added products (Co-Researcher)	356,000.00	2018-2021	UPM

Patents/Copyright

- 1 Mohd Salahuddin Mohd Basri, **Mohd Zuhair Mohd Nor**, Intan Syafinaz Mohamed Amin Tawakkal, Noor Zafira Noor Hasnan, Khairul Manami Kamarudin, "Biodegradable Fruit Waste-Based Polycaprolactone (PCL) Plastic Composite", app. no. LY2019001670, notification no. RLY00017559.
- 2 Mohd Salahuddin Mohd Basri, **Mohd Zuhair Mohd Nor**, Intan Syafinaz Mohamed Amin Tawakkal, Noor Zafira Noor Hasnan, Siti Hajar Ariffin, Mohd Roslan Rosnon, Muhammad Hazwan Hamzah, "Modul Makanan – Penerokaan Sains dan Matematik Menerusi Alam Berteraskan Makanan", app. no. LY2019005965, notification no. CRLY00020303.

Awards/Recognition (Current)

No.	Name of awards	Title	Award Authority	Award Type	Year
1	Gold Award (Food Process Engineering)	Banana puree powder production by foam mat drying	the 8th International Conference on Food Engineering Network of Thailand (FENETT2022)	International	2022
2	Silver Award (Food Process Engineering)	β -amylase green extraction from sweet potato slurry by liquid biphasic system	the 8th International Conference on Food Engineering Network of Thailand (FENETT2022)	International	2022
3	Silver Medal (International Putra Innocreative Poster Competition)	Certification system approach: Completion of safety quizzes as health and hazards awareness for undergrad laboratory entry	International Putra Innocreative Carnival in teaching and Learning (PicTL 2021)	International	2021
4	Gold Award	Comparison on Texturization Index and Microstructural Properties	Virtual Materials Technology Challenges (v-MTC 4.0)	University	2020

		of Cooked Oyster Mushroom-Soy Protein Extrudate			
5	Poster Gold Award (Food)	Commercialization Values Enhancement of Tropical Fruit Juices via Integrated Membrane- based Process	The 6 th Southeast Asian Agricultural Engineering Student Chapter Annual Regional Convention 2020 (ARC2020)	International	2020
6	Poster Bronze Award (Food) & people Choice Award	Sustainable Sweet Potato Starch Production through Strategic Approaches	The 6 th Southeast Asian Agricultural Engineering Student Chapter Annual Regional Convention 2020 (ARC2020)	International	2020
7	Third place (Food & Beverages Cluster - University)	VERSMAP	Ekspo Penyelidikan, Pembanguna dan Inovasi Negeri Selangor 2019.	National	2019
8	Gold Award (Teaching Innovation)	Lab Work Video (LWV): A Tool For Course Assessment and Teaching Aid in Undergraduate Program	Pertandingan Rekacipta Inovasi Nasional- Kejuruteraan dan Alam Bina (PRIN-KAB 2019)	National	2019
9	Gold Award and Special Juries Award	Production Of Fruit Puree Powder Through Foam Mat Drying Technique	The 5 th Southeast Asian Annual Regional Convention 2019 (ARC2019)	International	2019
10	Silver Award	Utilization of Restaurant Waste As Poultry Feed	The 5 th Southeast Asian Annual Regional Convention 2019 (ARC2019)	International	2019
11	Bronze Medal – Student's Final Year Project	Clarification of Guava Juice Through Membrane-Based Process	Final Year Project Open Day, Faculty of Engineering, UPM	Faculty	2019
12	Gold Award and The Most Creative Project Award	Texture-modified Puree for Dysphagia Patients	International STEM Olympiad Malaysia (iSTEMO)	National	2018
13	The Best Paper award	Mechanical Analysis of a Wedge Device in Sawing Technology	The 4 th International Conference on Agricultural and Food Engineering (CAFEi 2018)	International	2018
14	Gold award	VERSMAP	International Engineering Invention and Innovation Exhibition (i-ENVEX) 2018	International	2018
15	Gold Medal – Student's Final Year Project	Converting the banana- based traditional dessert into a ready-to-eat food by adopting the sausage technology	Final Year Project Open Day, Faculty of Engineering, UPM	Faculty	2018
16	Gold Medal and The Most Commercialize Project Award	Instant banana puree powder	Global I-Lead Stem Camp 1 Malaysia & UPM	National	2017
17	The Best Presenter award	Malaysian Postgraduate Colloquium 2015	Victorian Malaysian Postgraduate Association (VMPGA), Australia	International	2015

18	1 st Runner Up	Victoria University Three Minutes Thesis Competition (3MT)	Victoria University, Melbourne Australia	International	2014
19	Silver award	Increasing resistant starch content in fish crackers through repetitive cooking-chilling cycles	International Engineering Invention and Innovation Exhibition (i-ENVEX) 2012	International	2012
20	Silver award (Co-curriculum)	Malam Gemilang 10, 2006	10 th College, UPM	University	2006
21	Silver award (Co-curriculum)	Malam Gemilang 10, 2005	10 th College, UPM	University	2005
22	The Most Promising Leadership award	Malam Gemilang 10, 2004	10 th College, UPM	University	2004

Student Supervision

Ph.D.

No.	Name	Title	Status
1	Sarah Idris (Co-Supervisor)	Utilization of Cassava (<i>Manihot Utilissima</i> , Pohl) Wastes as Animal Feed	On-going
2	Kamil Kayode Katibi (Co-Supervisor)	Synthesis of Magnetic biochar and Composite Membrane for the removal of Bisphenol A from aqueous solution	On-going
3	Yahya Sahari (Co-Supervisor)	Drying kinetics and behavior of desiccated coconut using various drying techniques and strategies of convective and infrared drying	On-going

Master with thesis

No.	Name	Title	Status
1	Wan Mohd Fariz Wan Azman (Co-Supervisor)	Design and development of a grating machine for sago starch production	Completed (2020)
2	Sanchez Philip Donald Cabuga (Co-Supervisor)	Quantitative analysis of micro-structure properties of sweet potatoes (<i>Ipomoea batatas</i> L.) using laser-induced backscattering imaging technique	Completed (2020)
3	Nurfahana Shaari (Co-Supervisor)	Physico-chemical, mechanical, functional properties and storage quality of sweet potatoes	Completed (2021)

Bachelor (Final Year Project)

No.	Name	Title	Status
1	Wan Nur Syafiza Wan Zulkifli	Effervescent-assisted foam mat drying of pineapple powder	On-going (2022)
2	Kiishhen Kobbin	Liquid biphasic floatation system for the separation of protein from <i>azolla pinnata</i>	On-going (2022)
3	Maria Shahirah Jefriniza	Integration of modern food processing approaches for the enhancement of Malaysian traditional foods commercial values	Completed (2021)
4	Farhana Ilyia Fatinee Mohd Yusree	Liquid biphasic system (LBS) for the purification of α -amylase from sweet potato waste stream	Completed (2021)
5	Suganthi Selvadurai	Process design of an efficient starch production from sweet potato (VitAto™)	Completed (2020)
6	Nurelyzurina Sukri	Separation of alpha amylase from red pitaya peel through membrane filtration	Completed (2020)
7	Jusrianti Mohd Omar	Clarification of guava juice using membrane-based process	Completed (2019)
8	Nur Zuriati Zakaria	Potential food development from different parts of sweet potato plant	Completed (2019)

Student Supervision

Ph.D.

No.	Name	Title	Status
9	Siti Amirah Razali	Production of banana puree powder by foam mat drying method	Completed (2018)
10	Hasnim Husaini	Converting the banana- based traditional dessert into a ready-to-eat food by adopting the sausage technology	Completed (2018)
11	Woo Pei Yee	Clarification of banana juice by membrane-based process	Completed (2018)

Teaching Experiences

Course Code	Course Name
EPF3110	Mass and Energy Balance (3+0)
EMM3518	Computer-aided Engineering Drawing (1+2)
EPF3104	Food Process Engineering Laboratory I (0+1)
EPF4702	Fabricated Food Technology (3+0)

Social Networking

Researchgate	https://www.researchgate.net/profile/Zuhair_Nor
Academia	https://upm.academia.edu/ZuhairNor
Google Scholar	https://scholar.google.com.au/citations?hl=en&user=49PCAHkAAAAJ&sortby=pubdate
LinkedIn	https://www.linkedin.com/in/zuhair-nor-80184baa/
ORCID	https://orcid.org/0000-0001-5537-4251
Scopus	https://www.scopus.com/authid/detail.uri?authorId=25825366500