



## DAFTAR PUSTAKA

- Ajibola, A., Chamunorwa, J. P. and Erlwanger, K. H. (2013) 'Comparative effect of cane syrup and natural honey on abdominal viscera of growing male and female rats', *Indian Journal of Experimental Biology*, 51(4), pp. 303-312.
- Aliaño-González, M. J. et al. (2019) 'A screening method based on Visible-NIR spectroscopy for the identification and quantification of different adulterants in high-quality honey', *Talanta*, 203, pp. 235–241. doi: 10.1016/j.talanta.2019.05.067.
- Ambaw, M. and Teklehaimanot, T. (2018) 'Study on the quality parameters and the knowledge of producers on honey adulteration in selected districts of Arsi Zone', *International Journal of Agriculture and Veterinary Sciences*, 4(1), pp. 1–6.
- Anggriyani, V. (2019) *Deteksi Adulterasi Madu Menggunakan Metode Spektrofotometri Near Infrared (NIR) dan Kemometrik*. Skripsi. Universitas Jember.
- Arca et al. (2019) 'Sugars' Quantifications Using a Potentiometric Electronic Tongue with Cross-Selective Sensors: Influence of an Ionic Background', *Chemosensors*, 7(3), p. 43. doi: 10.3390/chemosensors7030043.
- Asrizal, M. T. (2015) *Perbandingan Pemberian Madu Hutan dan Madu Budidaya Pada Menit Ke-30 Terhadap Glukosa Darah Mahasiswa Fakultas Kedokteran Universitas Lampung Angkatan 2015*. Skripsi. Universitas Lampung.
- Belobrajdic, D. P. et al. (2012) 'Dietary resistant starch dose-dependently reduces adiposity in obesity-prone and obesity-resistant male rats', *Nutrition & Metabolism*, 9(1), p. 93. doi: 10.1186/1743-7075-9-93.
- Bobiş, O., Dezminean, D. S. and Moise, A. R. (2018) 'Honey and Diabetes: The Importance of Natural Simple Sugars in Diet for Preventing and Treating Different Type of Diabetes', *Oxidative Medicine and Cellular Longevity*, 2018, pp. 1–12. doi: 10.1155/2018/4757893.
- Bocarsly, M. E. et al. (2010) 'High-fructose corn syrup causes characteristics of obesity in rats: Increased body weight, body fat and triglyceride levels', *Pharmacology Biochemistry and Behavior*, 97(1), pp. 101–106. doi: 10.1016/j.pbb.2010.02.012.
- Bogdanov, S. et al. (2015) 'Honey quality and international regulatory standards: review by the International Honey Commission', *Bee World*, 80, pp. 61–69. doi: 10.1080/0005772X.1999.11099428.
- Bogdanov, S. (2016) 'Honey as Nutrient and Functional Food', *Bee Product Science*, 15.
- Bougrini, M. et al. (2016) 'Classification of Honey According to Geographical and Botanical Origins and Detection of Its Adulteration Using Voltammetric Electronic Tongue', *Food Analytical Methods*, 9(8), pp. 2161–2173. doi: 10.1007/s12161-015-0393-2.
- BSN (2018) 'SNI 8664:2018 Madu'. Badan Standardisasi Nasional.
- Budiarti, A. and Arifin, I. (2014) 'Optimasi Dan Validasi Metode Analisis Sukrosa Untuk Menentukan Keaslian Madu Perdagangan Menggunakan Kromatografi Cair Kinerja Tinggi', *Jurnal Ilmu Farmasi dan Farmasi Klinik*, pp. 112–116. doi: 10.31942/jiffk.v0i0.1212.



- Buono, A. and Hermadi, I. (2015) 'Support Vector Regression Untuk Prediksi Produktivitas Kelapa Sawit di Provinsi Riau', *Jurnal Sains dan Teknologi Industri*, 12(2), p. 10.
- Cao, L. et al. (2012) 'Modified High-Sucrose Diet-Induced Abdominally Obese and Normal-Weight Rats Developed High Plasma Free Fatty Acid and Insulin Resistance', *Oxidative Medicine and Cellular Longevity*, 2012. doi: <https://doi.org/10.1155/2012/374346>.
- Choudhary, A. et al. (2020) 'An overview of food adulteration: Concept, sources, impact, challenges and detection', *International Journal of Chemical Studies*, 8(1), pp. 2564–2573. doi: [10.22271/chemi.2020.v8.i1am.8655](https://doi.org/10.22271/chemi.2020.v8.i1am.8655).
- Damto, T. (2019) 'A Review on Effect of Adulteration on Honey Properties', *SSRN Electronic Journal*. doi: [10.2139/ssrn.3359494](https://doi.org/10.2139/ssrn.3359494).
- De-Melo, A. et al. (2017) 'Composition and properties of Apis mellifera honey: A review', *Journal of Apicultural Research*, 57, pp. 1–33. doi: [10.1080/00218839.2017.1338444](https://doi.org/10.1080/00218839.2017.1338444).
- Dias, L. A. et al. (2008) 'An electronic tongue for honey classification', *Microchimica Acta*, 163(1–2), pp. 97–102. doi: [10.1007/s00604-007-0923-8](https://doi.org/10.1007/s00604-007-0923-8).
- Escriche, I. et al. (2012) 'A potentiometric electronic tongue for the discrimination of honey according to the botanical origin. Comparison with traditional methodologies: Physicochemical parameters and volatile profile', *Journal of Food Engineering*, 109(3), pp. 449–456. doi: [10.1016/j.jfoodeng.2011.10.036](https://doi.org/10.1016/j.jfoodeng.2011.10.036).
- Fakhlaei, R. et al. (2020) 'The Toxic Impact of Honey Adulteration: A Review', *Foods*, 9(11), p. 1538. doi: [10.3390/foods9111538](https://doi.org/10.3390/foods9111538).
- Fatinnah, Y. W. (2019) *Pengembangan Lidah Elektronik Berbasis Membran Lipid Untuk Membedakan Jenis Gelatin*. Skripsi. Universitas Gadjah Mada.
- Firmansyah, R. (2019) *Penggunaan Uv-Vis Spectroscopy dan Metode SIMCA Untuk Identifikasi Madu Lebah Hutan (Apis dorsata) Berdasarkan Sumber Nektar*. Skripsi. Universitas Lampung. Available at: <http://digilib.unila.ac.id/59393/> (Accessed: 19 May 2021).
- Gan, Z. et al. (2016) 'Using sensor and spectral analysis to classify botanical origin and determine adulteration of raw honey', *Journal of Food Engineering*, 178, pp. 151–158. doi: [10.1016/j.jfoodeng.2016.01.016](https://doi.org/10.1016/j.jfoodeng.2016.01.016).
- Gebremariam, T. and Brhane, G. (2014) 'Determination Of Quality And Adulteration Effects Of Honey From Adigrat And Its Surrounding Areas', *International Journal of Technology Enhancements and Emerging Engineering ResearchH*, 2(10), p. 6.
- Ghramh, H. A. et al. (2020) 'Quality evaluation of Saudi honey harvested from the Asir province by using high-performance liquid chromatography (HPLC)', *Saudi Journal of Biological Sciences*, 27(8), pp. 2097–2105. doi: [10.1016/j.sjbs.2020.04.009](https://doi.org/10.1016/j.sjbs.2020.04.009).
- Hidayat, S. N. et al. (2019) 'Electronic Nose Coupled with Linear and Nonlinear Supervised Learning Methods for Rapid Discriminating Quality Grades of Superior Java Cocoa Beans', *International Journal of Intelligent Engineering and Systems*, 12(6), pp. 167–176. doi: [10.22266/ijies2019.1231.16](https://doi.org/10.22266/ijies2019.1231.16).



- Jiang, H. et al. (2018) 'Application of electronic tongue for fresh foods quality evaluation: A review', *Food Reviews International*, 34(8), pp. 746–769. doi: 10.1080/87559129.2018.1424184.
- Juan-Borrás, M. et al. (2017) 'Antioxidant activity and physico-chemical parameters for the differentiation of honey using a potentiometric electronic tongue: Parameters for the differentiation of honey', *Journal of the Science of Food and Agriculture*, 97(7), pp. 2215–2222. doi: 10.1002/jsfa.8031.
- Kembaren, A. and Harahap, T. (2014) 'Validasi Metode Penentuan Sakarin Menggunakan Kromatografi Cair Kinerja Tinggi', *Jurnal Pendidikan Kimia*, 6(2), pp. 70–80. doi: 10.24114/jpkim.v6i2.5590.
- Larson-Meyer, D. E. et al. (2010) 'Effect of Honey versus Sucrose on Appetite, Appetite-Regulating Hormones, and Postmeal Thermogenesis', *Journal of the American College of Nutrition*, 29(5), pp. 482–493. doi: 10.1080/07315724.2010.10719885.
- Mahmoudi, R., Ghojoghi, A. and Ghajarbeygi, P. (2016) 'Honey Safety Hazards And Public Health', *Journal Of Chemical Health Risks (JCHR)*, 6(4), pp. 249-267. <https://www.sid.ir/en/journal/ViewPaper.aspx?id=510522>, p. 21.
- Maulana, N. D., Setiawan, B. D. and Dewi, C. (2019) 'Implementasi Metode Support Vector Regression (SVR) Dalam Peramalan Penjualan Roti (Studi Kasus: Harum Bakery)', *Jurnal Pengembangan Teknologi Informasi dan Ilmu Komputer*, 3(3), p. 10.
- Maun, S. (1999) 'Pemalsuan Madu Dengan Sakarosa', *Jurnal Kedokteran Trisakti*, 18(1), pp. 9–18.
- Mumtaza, M. N. (2019) *Unjuk Kerja Lidah Elektronik Untuk Mendiferensiasi Teh Hitam Berdasarkan Jenisnya*. Skripsi. Universitas Gadjah Mada.
- Naila, A. et al. (2018) 'Classical and novel approaches to the analysis of honey and detection of adulterants', *Food Control*, 90, pp. 152–165. doi: 10.1016/j.foodcont.2018.02.027.
- Nisbet, C., Kazak, F. and Ardali, Y. (2018) 'Determination of Quality Criteria that Allow Differentiation Between Honey Adulterated with Sugar and Pure Honey', *Biological Trace Element Research*, 186(1), pp. 288–293. doi: 10.1007/s12011-018-1305-2.
- Nurrahmi, M., Saepudin, R. and Zain, B. (2018) 'Strategi Pemasaran Madu Hutan di Kota Bengkulu', *Jurnal Sain Peternakan Indonesia*, 13(2), pp. 157–171. doi: 10.31186/jspi.id.13.2.157-171.
- Oroian, M., Ropciuc, S. and Paduret, S. (2018a) 'Honey Adulteration Detection Using Raman Spectroscopy', *Food Analytical Methods*, 11(4), pp. 959–968. doi: 10.1007/s12161-017-1072-2.
- Oroian, M., Ropciuc, S. and Paduret, S. (2018b) 'Honey authentication using rheological and physicochemical properties', *Journal of Food Science and Technology*, 55(12), pp. 4711–4718. doi: 10.1007/s13197-018-3415-4.
- Patel, M. et al. (2010) 'Electronic evaluation by sensing device', *Der Pharmacia Lettre*, 2(4), pp. 326-334.
- Peris, M. and Escuder-Gilabert, L. (2016) 'Electronic noses and tongues to assess food authenticity and adulteration', *Trends in Food Science & Technology*, 58, pp. 40–54. doi: 10.1016/j.tifs.2016.10.014.
- Pita-Calvo, C., Guerra-Rodríguez, M. E. and Vázquez, M. (2017) 'Analytical Methods Used in the Quality Control of Honey', *Journal of Agricultural and Food Chemistry*, 65(4), pp. 690–703. doi: 10.1021/acs.jafc.6b04776.



- Prabowo, S. et al. (2020) 'Penentuan karakteristik fisiko-kimia beberapa jenis madu menggunakan metode konvensional dan metode kimia', *Journal of Tropical AgriFood*, 1(2), p. 66. doi: 10.35941/jtaf.1.2.2019.2685.66-73.
- Prabowo, S., Prayitno, Y. A., and Yuliani (2020) 'Chemical Profile and Observing Honey Adulteration Using Fourier Transform Infrared (FTIR) Spectroscopy and Multivariate Calibration', *Journal of Food and Pharmaceutical Sciences*, 8(1), pp. 216–226.
- Pratiwi, E. (2010) *Strategi Pemasaran Industri Madu Pada PT Madu Pramuka di Kabupaten Batang*. Skripsi. Universitas Sebelas Maret.
- Rahmantyo, W. H. (2020) *Analisis Respons Sensor Electronic Tongue Terhadap Sampel Ganja Menggunakan Support Vector Machine*. Skripsi. Universitas Gadjah Mada.
- Rasad, H. et al. (2018) 'The effect of honey consumption compared with sucrose on lipid profile in young healthy subjects (randomized clinical trial)', *Clinical Nutrition ESPEN*, 26. doi: 10.1016/j.clnesp.2018.04.016.
- Rippe, J. M. and Angelopoulos, T. J. (2016) 'Relationship between Added Sugars Consumption and Chronic Disease Risk Factors: Current Understanding', *Nutrients*, 8(11), p. 697. doi: 10.3390/nu8110697.
- Rofiq, H., Ulum, M. and Alfita, R. (2019) 'Rancang Bangun Alat Pendekripsi Kualitas Madu Asli Dan Campuran Dengan Menggunakan Metode Fuzzy', *SinarFe7*, 2(1), pp. 256-259.
- Rostita (2007) *Berkat Madu: Sehat, Cantik, dan Penuh Vitalitas*. Bandung: Penerbit Qanita.
- Samarghandian, S., Farkhondeh, T. and Samini, F. (2017) 'Honey and Health: A Review of Recent Clinical Research', *Pharmacognosy Research*, 9(2), pp. 121–127. doi: 10.4103/0974-8490.204647.
- Samat, S. et al. (2018) 'Adulterated Honey Consumption can Induce Obesity, Increase Blood Glucose Level and Demonstrate Toxicity Effects', *Sains Malaysiana*, 47(2), p. 14.
- Sanaeifar, A., Bakhshipour, A. and de la Guardia, M. (2016) 'Prediction of banana quality indices from color features using support vector regression', *Talanta*, 148, pp. 54–61. doi: 10.1016/j.talanta.2015.10.073.
- Sarah, D., Suryana, R. N. and Kirbrandoko, K. (2019) 'Strategi Bersaing Industri Madu (Studi Kasus: CV Madu Apiari Mutiara)', *Jurnal Aplikasi Bisnis dan Manajemen (JABM)*, 5(1), pp. 71–71. doi: 10.17358/jabm.5.1.71.
- Se, K. W. et al. (2019) 'Detection techniques for adulterants in honey: Challenges and recent trends', *Journal of Food Composition and Analysis*, 80, pp. 16–32. doi: 10.1016/j.jfca.2019.04.001.
- da Silva, P. M. et al. (2016) 'Honey: Chemical composition, stability and authenticity', *Food Chemistry*, 196, pp. 309–323. doi: 10.1016/j.foodchem.2015.09.051.
- Soares, S. et al. (2017) 'A Comprehensive Review on the Main Honey Authentication Issues: Production and Origin: Honey authentication...', *Comprehensive Reviews in Food Science and Food Safety*, 16(5), pp. 1072–1100. doi: 10.1111/1541-4337.12278.
- Sobrino-Gregorio, L. et al. (2018) 'Monitoring honey adulteration with sugar syrups using an automatic pulse voltammetric electronic tongue', *Food Control*, 91, pp. 254–260. doi: 10.1016/j.foodcont.2018.04.003.



- Subari, N. et al. (2012) 'A Hybrid Sensing Approach for Pure and Adulterated Honey Classification', *Sensors*, 12(10), pp. 14022–14040. doi: 10.3390/s121014022.
- Suhandy, D., Yulia, M., and Kusumiyati (2020) 'Klasifikasi Madu Berdasarkan Jenis Lebah (Apis dorsata versus Apis mellifera) Menggunakan Spektroskopi Ultraviolet dan Kemometrika', *Jurnal Ilmu Pertanian Indonesia*, 25(4), pp. 564–573. doi: 10.18343/jipi.25.4.564.
- Suhartini, E. A., Moechtar, J. and Darmawati, A. (2018) 'Mutu Produk Madu yang Dijual di Surabaya', *Jurnal Farmasi dan Ilmu Kefarmasian Indonesia*, 5(1), pp. 45–54.
- Sumantri, S., Budiarti, A. and Parameita, I. (2013) 'Perbandingan Kadar Sukrosa Dalam Madu Randu Dan Madu Kelengkeng Dari Peternak Lebah Dan Madu Perdagangan Di Kota Semarang', *Jurnal Ilmu Farmasi dan Farmasi Klinik*, pp. 1–6. doi: 10.31942/jiffk.v10i1.867.
- Susanto, A. (2007) *Terapi Madu*. Jakarta: Niaga Swadaya.
- Tazi, I. et al. (2017) 'Detection of Taste Change of Bovine and Goat Milk in Room Ambient Using Electronic Tongue', *Indonesian Journal of Chemistry*, 17(3), p. 422. doi: 10.22146/ijc.25288.
- Tazi, I. et al. (2018) 'Dairy products discrimination according to the milk type using an electrochemical multisensor device coupled with chemometric tools', *Journal of Food Measurement and Characterization*, 12(4), pp. 2385–2393. doi: 10.1007/s11694-018-9855-8.
- Thean, J. E. and Funderburk, W. C., Jr (1977) 'High Pressure Liquid Chromatographic Determination of Sucrose in Honey', *Journal of Association of Official Analytical Chemists*, 60(4), pp. 838–841. doi: 10.1093/jaoac/60.4.838.
- Titova, T. and Nachev, V. (2020) "Electronic tongue" in the Food Industry', *Food Science and Applied Biotechnology*, 3(1), pp. 71–76. doi: 10.30721/fsab2020.v3.i1.74.
- Veloso, A. C. A. et al. (2018) 'Honey Evaluation Using Electronic Tongues: An Overview', *Chemosensors*, 6(3), p. 28. doi: 10.3390/chemosensors6030028.
- Wang, W. and Liu, Y. (2019) 'Electronic tongue for food sensory evaluation', in *Evaluation Technologies for Food Quality*. Elsevier, pp. 23–36. doi: 10.1016/B978-0-12-814217-2.00003-2.
- White, J. W., Jr (1979) 'Methods for Determining Carbohydrates, Hydroxymethylfurfural, and Proline in Honey: Collaborative Study', *Journal of Association of Official Analytical Chemists*, 62(3), pp. 515–526. doi: 10.1093/jaoac/62.3.515.
- Wibowo, B. A. (2016) 'Alat Uji Kualitas Madu Menggunakan Polarimeter dan Sensor Warna'. *Jurnal Teknik ITS*, 5, pp. 214145. doi: 10.12962/J23373539.V5I1.15251.
- Wibowo, B. S., Tazi, I. and Triyana, K. (2013) 'Pengembangan Sistem Sensor Rasa Berbasis Membran Selektif Ion Untuk Klasifikasi Buah Jeruk', *Jurnal Fisika Indonesia*, 17(49), p. 5.
- Zábrodská, B. and Vorlová, L. (2014) 'Adulteration of honey and available methods for detection – a review', *Acta Veterinaria Brno*, 83(10), pp. S85–S102. doi: 10.2754/avb201483S10S85.