DAFTAR PUSTAKA

1. Mandai, P. K.; Choi, K.; Min, S. G.; Lee, C. H.: Application of Nanotechnology in Food Packaging: An Overview. *Korean Jounal Food Science of Animal Resource* 2009, *29* (4), 403–408.
2. Tarafdar, A.; Raliya, R.; Wang, W.; Biswas, P.; Tarafdar, J. C.: Green Synthesis of TiO_2 Nanoparticle Using *Moringa Oleifera* Leaf Extract. *International Research Journal Engineering Technology* 2017, *4* (3), 1–7.
3. Sundrarajan, M.; Gowri, S.: Green Synthesis of Titanium Dioxide Nanoparticles by *Nyctanthes Arbor-Tristis* Leaves Extract. *Chalcogenide Letters* 2011, *8* (8), 447–451.
4. Rajkumari, J.; Magdalane, C. M.; Siddhardha, B.; Madhavan, J.; Ramalingam, G.; Al-Dhabi, N. A.; Arasu, M. V.; Ghilan, A. K. M.; Duraipandiayan, V.; Kaviyarasu, K.: Synthesis of Titanium Oxide *Nanoparticles Using Aloe Barbadensis Mill* and Evaluation of Its Antibiofilm Potential against Pseudomonas Aeruginosa PAO1. *Journal Photochemistry Photobiology B Biology* 2019, *201*, 111667.
5. Goutam, S. P.; Saxena, G.; Singh, V.; Yadav, A. K.; Bharagava, R. N.; Thapa, K. B.: Green Synthesis of TiO_2 Nanoparticles Using Leaf Extract of J*atropha Curcas L.* for Photocatalytic Degradation of Tannery Wastewater. *Chem. Engineering Journal* 2018, *336*, 386–396.
6. Mohammadlou, M.; Jafarizadeh-Malmiri, H.; Maghsoudi, H.: Hydrothermal Green Synthesis of Silver Nanoparticles Using *Pelargonium/Geranium* Leaf Extract and Evaluation of Their Antifungal Activity. *Green Processing Synthesis* 2017, *6* (1), 31–42.
7. Sajidah, H. B. N. Review : Proses Sintesis Material Anorganik Menggunakan Prekursor Oksalat dalam Metode Kopresipitasi. 2017.
8. Bangngalino, H.; Badai, M.; Thahir, R.; Wildasari, A.; Nahu, M. L. N.: Pemanfaatan Polifenol Hasil Ekstraksi dari Daun Ketapang Sebagai Bioreduktor Pembuatan Nanopartikel TiO_2. 2019, 38–43.
9. Fajaroh, F. Sintesis Nanopartikel dengan Prinsip Kimia Hijau. *Seminar Nasional Kimia dan Pembelajarannya* 2018, 03, 24–32.
10. Wahyuni, S.; Syukri; Arief, S.: Green Synthesis of Ag/TiO_2 Nanocomposite Assisted by Gambier Leaf (*Uncaria Gambir Roxb*) Extract. *Journal Kimia Sains dan Aplikasi* 2019, *22*, 250–255.

11. Nabi, G.; Ain, Q. U.; Tahir, M. B.; Nadeem Riaz, K.; Iqbal, T.; Rafique, M.; Hussain, S.; Raza, W.; Aslam, I.; Rizwan, M.: Green Synthesis of TiO_2 Nanoparticles Using Lemon Peel Extract: Their Optical and Photocatalytic Properties. *International Journal Environmental Analytical Chemistry* 2020, 1–9.
12. Thakur, B. K.; Kumar, A.; Kumar, D.: Green Synthesis of Titanium Dioxide Nanoparticles Using *Azadirachta Indica* Leaf Extract and Evaluation of Their Antibacterial Activity. *South African Journal of Botany.* 2019, *124*, 223–227.
13. Rao, K. G.; Ashok, C.; Rao, K. V.; Chakra, C. S.; Tambur, P.: Green Synthesis of TiO_2 Nanoparticles Using *Aloe Vera* Extract. 2016, *2*, 28–34.
14. Khadar, A.; Behara, D. and; Kumar, M.: Synthesis and Characterization of Controlled Size TiO_2 Nanoparticles via Green Route Using *Aloe Vera* Extract. *International Journal Science Research* 2016, *5* (11), 1913–1916.
15. Subhapriya, S.; Gomathipriya, P.: Green Synthesis of Titanium Dioxide (TiO_2) Nanoparticles by *Trigonella Foenum-Graecum* Extract and Its Antimicrobial Properties. *Microbial Pathogenesis* 2018, *116*, 215–220.
16. Rilda, Y.; Arief, S.; Dharma, A.; Alif, A.: Modifikasi dan Karakterisasi Titania (M-TiO_2) dengan Doping Ion Logam Transisi Feni dan Cuni. 2010, *12* (65), 178–185.
17. Wu, A.; Ren, W.: *TiO_2 Nanoparticles Applications in Nanobiotechnology and Nanomedicine*; Wiley-VCH: Germany, 2008; Vol. 53.
18. Bourikas, K.; Kordulis, C.; Lycourghiotis, A.: Titanium Dioxide (Anatase and Rutile): Surface Chemistry , Liquid − Solid Interface Chemistry , and ScientiFic Synthesis of Supported Catalysts. *Chemical Reviews* 2014.
19. Zhang, J.; Zhou, P.; Liu, J.; Yu, J.: New Understanding of the Difference of Photocatalytic Activity among Anatase, Rutile and Brookite TiO_2. *Physical Chemistry Chemical Physic* 2014, *16* (38), 20382–20386.
20. Mansoori, G. A.; Soelaiman, T. A. F. Nanotechnology — An Introduction for the Standards Community. *Journal ASTM International* 2005, *2*, 1–21.
21. Rahman, R.: Pengaruh Proses Pengeringan, Anil dan Hidrotermal terhadap Kristalinitas Nanopartikel TiO_2 Hasil Proses Sol-Gel. *Skripsi* 2008, Depok : Universitas Indonesia.
22. Trisnayanti, N. P.: Metode Sintesis Nanopartikel. *Universitas Indonesia.* 2020, 3, 1–4.
23. Abdullah, M.; Virgus, Y.; Nirmin; Khairurrijal.: Review: Sintesis Nanomaterial. *Journal Nanosains Nanoteknologi* 2008, *1* (2), 33–57.

24. Wizul, Y.; Dewata, I.; Nasra, E.: Studi Kopresipitasi Zn^{2+} Menggunakan $Al(OH)_3$ Sebagai Kopresipitan. *Chemistry Journal of State University of Padang* 2013, *2* (2), 6–10.
25. Ningsih, S. K. W.: *Sintesis Anorganik*; UNP Press: Padang; 2016.
26. Thamima, M.; Subbian, K. Biosynthesis of Titanium Dioxide and Zinc Oxide Nanoparticles from Natural Sources: A Review. *Advanced Science* 2015, *7*.
27. Mbonyiryivuze, A.; Zongo, S.; Diallo, A.; Bertrand, S.; Minani, E.; Yadav, L. L.; Mwakikunga, B.; Dhlamini, S. M.; Maaza, M.: Titanium Dioxide Nanoparticles Biosynthesis for Dye Sensitized Solar Cells Application: Review. *Physical Material Chemistry* 2015, *3* (1), 12–17.
28. Singh, J.; Dutta, T.; Kim, K. H.; Rawat, M.; Samddar, P.; Kumar, P.: Green Synthesis of Metals and Their Oxide Nanoparticles: Applications for Environmental Remediation. *Journal Nanobiotechnology* 2018, *16* (1), 1–24.
29. Ahmad, W.; Jaiswal, K. K.; Soni, S.: Green Synthesis of Titanium Dioxide (TiO_2) Nanoparticles by Using *Mentha Arvensis* Leaves Extract and Its Antimicrobial Properties. *Inorganic Nano-Metal Chemistry* 2020, *50* (10), 1032–1038.
30. Nadeem, M.; Tungmunnithum, D.; Hano, C.; Abbasi, B. H.; Hashmi, S. S.; Ahmad, W.; Zahir, A.: The Current Trends in the Green Synthesis of Titanium Oxide Nanoparticles and Their Applications. *Green Chemistry Letters and Reviews* 2018, *11* (4), 492–502.
31. Muni, F.; Suriati, L.; Semariyani, A. A. M.: Karakteristik Gel Lidah Buaya Sebagai Edible Coating Ditinjau dari Suhu dan Lama Penyimpanan. *Gema Agro* 2019, 24 (2), 90-98.
32. Mujariah, M.; Abram, P. H.; Jura, M. R.: Penggunaan Gel Lidah Buaya (*Aloe Vera*) sebagai Koagulan Alami dalam Penjernihan Air Sumur di Desa Sausu Tambu Kecamatan Sausu. *Jurnal Akademika Kimia* 2017, *5* (1), 16.
33. Pellizzoni, M.; Ruzickova, G.; Kalhotka, L.; Lucini, L.: Antimicrobial Activity of Different *Aloe Barbadensis Mill.* and *Aloe Arborescens Mill.* Leaf Fractions. *Journal of Medicinal Plants Research* 2012, *6* (10), 1975–1981.
34. Fiordalisi, S. de A. L.; Honorato, L. A.; Kuhnen, S.: *Aloe Barbadensis Miller* Leaf Exudate Is a Potential Treatment for Bovine Mastitis. *F1000Research* 2018, *7* (0), 1–9.
35. Nomura, K.; Terwilliger, P.: Self-Dual Leonard Pairs *Aloe Vera* Leaf Extract Mediated Green Synthesis of Selenium Nanoparticles and Assessment of Their in Vitro Antimicrobial Activity against Fungi and Pathogenic Bacteria A. *Green*

Process Synthesis 2019, 399–407.

36. Linsebigler, A. L.; Lu, G.; Yates, J. T.: Photocatalysis on TiO_2 Surfaces: Principles, Mechanisms, and Selected Results. *Chemical Reviews* 1995, *95* (3), 735–758.
37. Welton, J. E.: *SEM Petrology Atlas*; American Association of Petroleum Geologists: Tulsa, Oklahoma, 1984.
38. Wellia, D. V.: Green Preparation of Visible Light Active Titanium Dioxide Films of Visible Light Active Titanium; Nanyang Technological University, Singapore, 2012.
39. Cullity, B. D.; Stock, S. R.: *Elements Of X Ray Diffraction*; 3rd Edition.; Technology & Engineering: U.S.A, 2001.
40. Abdullah, M.; Khairurrijal, K.: Review: Karakterisasi Nanomaterial. *Journal Nano Saintek* 2009, *2* (1), 1–9.
41. Puspitasari, L.; Arief, S.: Ekstrak Daun Andalas sebagai Capping Agent dalam Green Hydrothermal. *Chimica et Natura Acta* 2019, *7* (1), 20–26.
42. Speyer, R. f. *Thermal Analysis of Materials*; Marcel Dekker, INC.; New York, 1994.
43. Basu, P.: Analytical Techniques. *Biomass Gasification, Pyrolysis and Torrefaction* 2018, 479–495.
44. Lambert, J. F.: *Organic Pollutant Adsorption on Clay Minerals*; University Sorbonne-CNRS: France, 2018; 9.
45. Nergis, D. D. B.; Abdullah, M. M. A. B.; Sandu, A. V.; Vizureanu, P.: XRD and TG-DTA Study of New Alkali Activated Materials Based on Fly Ash with Sand and Glass Powder. *Materials (Basel)*. 2020, *13* (2).
46. Jaroniec, M.; Kruk, M.; Sayari, A.: *Adsorption Methods for Characterization of Surface and Structural Properties of Mesoporous Molecular Sieves*; Elsevier Masson SAS, 1998; Vol. 117.
47. Kusumaningtyas, M. P.: Analisis Struktur Nano Batu Apung Lombok Menggunakan Metode BET (Brunauer-Emmet Teller). 2017, 14–15.
48. Perwira, G. Analisis Luas Permukaan Arang Aktif dengan menggunakan Metode BET (SAA), Universitas Negeri Semarang, 2014.
49. Heidari, R. Synthesis , Characterization and Application of Hydro-Phobic Zeolites, Tampere University of Applied Sciences, 2016.
50. Wang, T. H.; Navarrete-López, A. M.; Li, S.; Dixon, D. A.; Gole, J. L. Hydrolysis of $TiCl_4$: Initial Steps in the Production of TiO_2. *Journal Physical Chemistry* 2010,

114 (28), 7561–7570.

51. Jadhav, D. B.; Kokate, R. D.: Characterization of TiO_2 Metal Oxides Nanoparticle Synthesized Using Plant Extracts and Fabrication of 'Solar Cell' Using ITO Glass, TiO_2, Ruthenium, Graphite and Potassium Iodide. *APGRES* 2019.
52. Rasheed, R. T. Preparation and Characterization of TiO_2 Nanostructure by $TiCl_4$ Hydrolysis with Additive NaOH. *Al-Mustansiriyah Journal Science* 2018, *28*.
53. Sari, R. N.; Saridewi, N.; Shofwatunnisa, S.: Biosynthesis and Characterization of ZnO Nanoparticles with Extract of Green Seaweed *Caulerpa Sp. Journal Perikanan Universitas Gadjah Mada* 2017, *19* (1), 17.
54. Ariyanta, H. A.: I Silver Nanoparticles Preparation by Reduction Method and Its Application as Antibacterial for Cause of Wound Infection. *Journal MKMI* 2014, *1*, 36–42.
55. Ningsih, N.; Yasni, S.; Yuliani, S.: Sintesis Nanopartikel Ekstrak Kulit Manggis Merah dan Kajian Sifat Fungsional Produk Enkapsulasinya. *Journal Teknologi dan Industri Pangan* 2017, *28* (1), 27–35.
56. Dwipa Y. Away, R.; Fujii, S.; Ban, T.; Ohya, Y.: Preparation of Mesoporous Titania Thin Films and Their Photocatalytic Activity. *Transactions of Materials Research Society of Japan* 2018, *43* (4), 223–228.
57. Al-shabib, N. A.; Husain, F. M.: Phyto-Mediated Synthesis of Porous Titanium Dioxide Nanoparticles From Phyto-Mediated *Withania Somnifera* Root Extract : Broad-Spectrum Attenuation of Biofilm and Cytotoxic Properties Against HepG2 Ce. *Frontiers in Microbiology* 2020.
58. Ali, I.; Peng, C.; Lin, D.; Naz, I.: Green Synthesis of the Innovative Super Paramagnetic Nanoparticles from the Leaves Extract of *Fraxinus Chinensis Roxb* and Their Application for the Decolourisation of Toxic Dyes. *Green Processing Synthesis* 2019, *8* (1), 256–271.
59. Lakshmnarayanan, S.; Shereen, M. F.; Niraimathi, K. L.; Brindha, P.; Arumugam, A.: One-Pot Green Synthesis of Iron Oxide Nanoparticles from *Bauhinia Tomentosa*: Characterization and Application towards Synthesis of 1, 3 Diolein. *Science Reports* 2021, *11* (1), 1–13.
60. Bekele, E. T.; Gonfa, B. A.; Zelekew, O. A.; Belay, H. H.; Sabir, F. K.: Synthesis of Titanium Oxide Nanoparticles Using Root Extract of *Kniphofia Foliosa* as a Template, Characterization, and Its Application on Drug Resistance Bacteria. *Journal of Nanomaterials* 2020, 1–10.
61. Ambika, S.; Sundrarajan, M.: [EMIM] BF_4 Ionic Liquid-Mediated Synthesis of

TiO_2 Nanoparticles Using *Vitex Negundo Linn* Extract and Its Antibacterial Activity. *Journal Molecular Liquid* 2016, *221*, 986–992.

62. Sethy, N. K.; Arif, Z.; Mishra, P. K.; Kumar, P.: Green Synthesis of TiO_2 Nanoparticles from *Syzygium Cumini* Extract for Photo-Catalytic Removal of Lead (Pb) in Explosive Industrial Wastewater. *Green Processing Synthesis* 2020, *9* (1), 171–181.
63. Abisharani, J. M.; Devikala, S.; Dinesh Kumar, R.; Arthanareeswari, M.; Kamaraj, P.: Green Synthesis of TiO_2 Nanoparticles Using *Cucurbita Pepo* Seeds Extract. In *Materials Today: Proceedings*; Elsevier Ltd, 2019; Vol. 14, 302–307.
64. Kashale, A. A.; Gattu, K. P.; Ghule, K.; Ingole, V. H.; Dhanayat, S.; Sharma, R.; Chang, J. Y.; Ghule, A. V.: Biomediated Green Synthesis of TiO_2 Nanoparticles for Lithium Ion Battery Application. *Composite Part B Engineering* 2016, *99*, 297–304.
65. Bekele, E. T.; Gonfa, B. A.; Zelekew, O. A.; Belay, H. H.; Sabir, F. K.: Synthesis of Titanium Oxide Nanoparticles Using Root Extract of *Kniphofia Foliosa* as a Template, Characterization, and Its Application on Drug Resistance Bacteria. *Journal of Nanomaterials* 2020, 1–10.
66. Wellia, D. V.; Xu, Q. C.; Sk, M. A.; Lim, K. H.; Lim, T. M.; Tan, T. T. Y.: Experimental and Theoretical Studies of Fe-Doped TiO_2 Films Prepared by Peroxo Sol-Gel Method. *Applied Catalys A: General* 2011, *401* (1–2), 98–105.