

DAFTAR PUSTAKA

- Ahmad, M., Rajapaksha, A. U., Lim, J. E., Zhang, M., Bolan, N., Mohan (2014). Biochar as a sorbent for contaminant management in soil and water: A review. *Chemosphere*, 99, 19-33.
- Agnestia, P. (2017). Pemanfaatan Biochar dari Bambu sebagai Adsorben Logam Berat pada Air Limbah Industri. *Jurnal Teknologi Lingkungan*, 18(2), 89–97.
- Alfiandari, Yulisa; Ramadhan, Dede; Septiani, Nila; dan Hartati, Sri. (2023). Analisis Karakteristik Biochar Bambu Petung. *Jurnal Ilmiah Mahasiswa Pertanian*, Universitas Andalas.
- Anwar, M. (2023). Karakterisasi Biochar Bambu untuk Aplikasi Remediasi Tanah Terkontaminasi Pestisida. *Jurnal Rekayasa Lingkungan*, 25(1), 15–23.
- Bajwa, U., & Ahmad, R. (2012). Impact of pesticide use in agriculture: their benefits and hazards. *Interdisciplinary Toxicology*, 5(2), 43-48.
- Bambang, S. A. (2012). *Si Hitam Biochar yang Multiguna*. PT. Perkebunan Nusantara X (Persero), Surabaya.
- Batterman, S. (2021). *Pesticides and Human Health: A Focus on Organophosphates*. Environmental Health Perspectives.
- Brady, N.C., & Weil, R.R., *The Nature and Properties of Soils*, 15th Edition, 2017
- Chen, B., Zhou, D., & Zhu, L. (2008). Transitional adsorption and partition of nonpolar and polar aromatic contaminants by biochars of pine needles with different pyrolytic temperatures. *Environmental Science & Technology*, 42(14), 5137–5143.
- Chen, B., Chen, Z., & Lv, S. (2011). A novel magnetic biochar efficiently sorbs organic pollutants and phosphate. *Bioresource Technology*, 102(2), 716–723.
- Chen, H., Zhang, J., Wang, Z., Guo, Z., & Ma, L. (2021). Effect of pH and humic acid on the adsorption of imidacloprid in soil. *Environmental Science and Pollution Research*, 28(14), 17136-17146.
- Chen, L., Wang, X., Xing, B., & Zhou, D. (2020). Adsorption of pesticides on biochar: Role of surface functional groups and environmental conditions. *Journal of Environmental Management*, 256, 109948.
- Chi, Lehmann, J., & Joseph, S. (Eds.). (2015). *Biochar for Environmental Management: Science and Technology*. Earthscan.
- Darusman, D., Syakur, S., Kurniasih, E., Puspita, V., & Zaitun, Z. (2022). *Functional Group Structure of Bamboo and Pine Wood Biochar Due to Differences in Pyrolysis Temperature*. Aceh International Journal of Science and Technology, 11(1): 21–28.

- Dores, C., De-Lamonica-Freire, E. M., & Navickiene, S. (2012). Pesticide residue in rivers of the state of Mato Grosso, Brazil, 2008–2010. *Bulletin of Environmental Contamination and Toxicology*, 89(6), 1191-1194. Link.
- Downie, Fleming, P., Davis, D. D., Horton, R., Wang, B., & Karlen, D. L. (2012). *Impact of biochar amendments on the quality of a typical Midwestern agricultural soil*. *Geoderma*, 158(3-4), 443-449.
- Efimarleni. (2000). *Adsorpsi dan Desorpsi Paraquat pada Fase Organik dan Inorganik Tanah*. Fakultas Pertanian, Universitas Adalas. Padang.
- Gani, A. (2009). Potensi Arang Hayati Biochar Sebagai Komponen Teknologi Perbaikan Produktivitas Lahan Pertanian. *Iptek Tanaman Pangan* 4(1): 33-48.
- Glaser, B., Lehmann, J., & Zech, W. (2002). Ameliorating physical and chemical properties of highly weathered soils in the tropics with charcoal – a review. *Biology and Fertility of Soils*, 35(4), 219-230.
- Gholami M, Mosakhani Z, Barazandeh A, Karyab H. (2022). Adsorption of organophosphorus malathion pesticide from aqueous solutions using nano-polypropylene-titanium dioxide composite: Equilibrium, kinetics and Optimization studies. *J Environ Health Sci Eng*. 24;21(1):35-45.
- Gupta, P. K., Meena, H., Rai, P. K., & Singh, A. (2014). Dimethoate induced oxidative stress and histopathological changes in the liver and kidney of Wistar rats. *World Journal of Pharmaceutical Research*, 3(9), 791-798.
- Grossman, R. B., & Reinsch, T. G. (2002). Bulk Density and Linear Extensibility. *Methods of Soil Analysis: Part 4 Physical Methods*, 201-228.
- Gwenzi, Willis; Chaukura, Nhamo; H muchiwa, Brighton; Mukome, Fungai N.D.; and Mupambwa, Hubert A. (2018). *Biochar-based adsorbents for the removal of organic pollutants from water: A review*. *Environmental Chemistry Letters*, 16(3), 1339–1356.
- Hakim, N., Daryanto, H., & Gani, D. A. (1986). *Dasar-dasar Ilmu Tanah*. Jakarta: Universitas Indonesia Press. Hal. 45-46.
- Hanafiah, K.A., (2018). *Dasar-Dasar Ilmu Tanah*, Edisi 3.
- Handayani, L. (2009). Pengaruh Biochar Bambu terhadap Ketersediaan Hara dan Pertumbuhan Tanaman. *Jurnal Ilmu Tanah dan Lingkungan*, 11(1), 23–29.
- Harjowigeno, S. (1993). *Klasifikasi tanah dan pedogenesis*. Edisi ke-1 Cetakan ke-1. Akademika Pressindo.
- Hartzler, B. (2002). *Absorption of Soil-applied Herbicides*. <http://www.weeds.iastate.edu/mgmt/2002/soilabsorption.htm>. 12 Agustus 2022.
- Herviyanti, Maulana, A. , Lita, A. L., Prasetyo, T. B., Ryswaldi, R. (2022). Characteristics of Biochar Methods from Bamboo as Ameliorant. *IOP Conf. Series: Earth and Environmental Science* 959.

- Herviyanti, Maulana, A., & Lita, A. (2022). Characteristics of biochar methods from bamboo as ameliorant. *IOP Conference Series: Earth and Environmental Science*, 959(1), 012036.
- Herviyanti, Maulana, A. , Lita, A. L., Prasetyo, T. B., Monikasari, M., Ryswaldi, R. (2022). Characteristics of Inceptisol Ameliorated with Rice Husk Biochar to Glyphosate. *Adsorption. Sains Tanah* 19(2): 230-240.
- Islam, M. M., Kadiyala, V., Dharmarajan, R., Annamalai, P., & Megharaj, M. (2020). *Sorption-desorption of dimetoat in urban soils and potential*.
- Ikram Pratama. (2025). *Adsorpsi Insektisida Dimetoat Menggunakan Batubara Subbituminus Yang Diaktivasi Dengan Dolomit Pada Inceptisol*. Universitas Andalas.
- Jokanović, M., & Kosanović, M. (2010). Neurotoxic effects of organophosphorus pesticides and possible therapeutic approaches. *Toxicology Letters*, 193(1), 29-38.
- Jiang, W., Zhang, S., Shan, X.-Q., Feng, M., Zhu, Y.-G., & McLaren, R. G. (2005). Adsorption of arsenate on soils. Part 1: Laboratory batch experiments using 16 Chinese soils with different physiochemical properties. *Environmental Pollution*, 138(2), 278–284.
- Katharina, P., Borchard, N., Siemens, J., Kautz, T., Sequaris, J., Moller, A., & Amelung, W. (2013). Biochar Affected by Composting with Farmyard Manure. *J. Environmental Quality* 42: 164-172.
- Kolton, M., Graber, E. R., Tsehansky, L., Elad, Y., & Cytryn, E. (2017). *Biochar-stimulated plant performance is strongly linked to microbial community structure in tomato rhizospheres*. *New Phytologist*, 213(4), 1393–1404.
- Kookana, R. S., et al. (2011). "Biochar application to soil: agronomic and environmental benefits and unintended consequences." *Advances in Agronomy*, 112, 103–143.
- Lee Y., Park J., Ryu C., Gang K. S., Yang W., Park Y.-K., Jung J., Hyun S., (2013). Comparison of biochar properties from biomass residues produced by slow pyrolysis at 500°C, *Bioresource Technology*, 148, 196–201.
- Lehmann, J., & Joseph, S. (2015). *Biochar for environmental management: Science, technology and implementation*. *Routledge*.
- Liu, Yanfang; Zhou, Dongmei; Xu, Mengyao; Zhou, Lijun; Yang, Yang; Wang, Yaru; Zhang, Hao; Wang, Qi; Wang, Wenhua; Zhu, Yong-Guan. (2022). Enhanced adsorption of pesticides by soil amendment with biochar and mineral combinations. *Science of the Total Environment*, 838, 155809.
- López-Luna, J., Ramírez-Montes, L. E., Martínez-Vargas, S., Martínez, A. I., Mijangos-Ricardez, O. F., González-Chávez, M. del C. A., Carrillo-González, R., Solís-Domínguez, F. A., Cuevas-Díaz, M. del C., & Vázquez-Hipólito, V. (2019). Linear and nonlinear kinetic and isotherm adsorption

models for arsenic removal by manganese ferrite nanoparticles. *SN Applied Sciences*, 1(8).

- Lestiyani, R. (2023). Pembuatan dan Aplikasi Biochar dari Bambu Petung sebagai Adsorben Organik di Air Limbah Pertanian. *Jurnal Pertanian Berkelanjutan*, 12(3), 55–64.
- Mahanim, S., Asma, I. W., Rafidah, J., Puad, E., & Shaharuddin, H., (2011). Production of Activated Carbon from Industrial Bamboo Waste. *Journal of Tropical Forest Science* 23(pp): 417-424.
- Maulana, A., Prima, S., Rezki, D., Sukma, V., Fitriani, A., & Herviyanti. (2021). Penyerapan Karbon dari Biochar Bambu terhadap Produktivitas Tanah Ultisols dan Tanaman Kedelai [*Glycine max* L]. *Seri Konferensi IOP: Ilmu 43 Pengetahuan Bumi dan Lingkungan* 7411: 8-15.
- Mirajkar, N. S. (2014). Dimetoat. In *Encyclopedia of Toxicology: Third Edition* (pp. 155–157). Elsevier.
- Munir, M. (1996). *Tanah Tanah Utama Indonesia*. Dunia Pustaka Jaya.
- Mukherjee, A., & Lal, R. (2013). *Biochar impacts on soil physical properties and greenhouse gas emissions*. *Agronomy*, 3(2), 313-339.
- Negara, Putra, D. N. K., Nindha, T.G.T., Sucipta, I.W., & Sucipta, M. (2016). Potensi Bambu Swat (*Gigantochloa Verticillata*) sebagai Material Karbon Aktif Untuk Adsorbed Natural Gas (ANG). *Jurnal Energi dan Manufaktur* 9(2): 174-179.
- Nuridin. (2012). Morfologi, Sifat Fisik, dan Kimia Tanah Inceptisols dari Bahan Lakustrin Paguyaman Gorontalo Kaitannya dengan Pengelolaan Tanah. *Jurnal Agroteknotropika* 1(1): 13-22.
- Nguyen, K. T., Ahmed, M. B., Mojiri, A., Huang, Y., Zhou, J. L., & Li, D. (2021). Advances in As contamination and adsorption in soil for effective management. In *Journal of Environmental Management* (Vol. 296). Academic Press.
- Ni Nengah Soniari, Ni Wayan Sri Sutari, dan Ni Luh Made Pradnyawathi, Pengaruh Biochar terhadap Sifat Kimia Tanah dan Pertumbuhan Tanaman pada Tanah Inceptisol, *Jurnal Agroekoteknologi Tropika (JAT)*, Vol. 12, No. 2, 2023, hlm. 45–52.
- Nkoh, J.N., Baquy, M.A.-A., Mia, S., Shi, R., Kamran, M.A., Mehmood, K., & Xu, R.A. (2021). *Biochar Improves Soil Properties and Crop Yield: A Review of Mechanisms and Recent Findings*. *Sustainability*, 13(24), 13726.
- Novak, J. M., Busscher, W. J., Laird, D. L., Ahmedna, M., Watts, D. W., & Niandou, M. A. (2014). *Biochars impact on soil-moisture storage and evaporative losses*. *Soil Science*, 179(6), 354–362.
- Obia, A., Børresen, T., Martinsen, V., Cornelissen, G., & Mulder, J. (2017). Vertical and lateral transport of biochar in light-textured tropical soils. *Soil and Tillage Research*, 165, 34–40.

- Ponnuchamy, M., Kapoor, A., Kumar, P. S., Vo, D. V. N., Balakrishnan, A., Jacob, M. M., & Sivaraman, P. (2023). Sustainable adsorbents for the removal of pesticides from water: a review. *Environmental Chemistry Letters*.
- Rajapaksha, A. U., Vithanage, M., Lim, J. E., Ahmad, M., Gunarathna, G., & Ok, Y. S. (2016). Impacts of biochar on the fate and transport of contaminants in soils: A review. *Journal of Environmental Management*, 165, 1-9.
- Sahoo, S. S., Mohanty, K., & Meikap, B. C. (2021). *Production and characterization of biochar from pigeon pea stalk and bamboo*. *Renewable Energy*, 168, 1125-1135.
- Soil Science Society of America. (2020). *Soils 101: Inceptisols*. Soil Science Society of America.
- Soil Survey Staff. (2010). Keys to soil taxonomy. Ed ke-11. USDA, *Natural resources conservation service*. 161-196p.
- Sparks, D.L., (2003). *Environmental Soil Chemistry*, 2nd Edition.
- Sudirja, R., Solihin, MA, & Rosniawaty, S. (2006). Pengaruh Kompos Kulit Buah Kakao dan Kascing terhadap Perbaikan Beberapa Sifat Kimia Fluventic Eutrudepts. *Jurnal Fakultas Pertanian*. Universitas Padjadjaran.
- Sun, Jinhui, Wang, Yanan, Zhao, Yali, Gao, Baoyu, & Wang, Yujie. (2021). Influence of pH and ionic strength on adsorption of organic pollutants on modified biochar. *Chemosphere*, 265, 129063.
- Wilding, L. P., Smeck, N. E., & Hall, G. F. (1983). *Pedogenesis and Soil Taxonomy I. Concepts and Interactions*. Elsevier.
- Wu, C., Zhang, X., Li, H., Wang, J., Xu, J., Zhang, Y., & Pan, C. (2023). Comparative study of biochar and mineral-amended soil for pesticide mitigation. *Environmental Pollution*, 315, 120152.
- Xie, Qian; Wang, Jinhong; Chen, Shuang; Zhang, Jie; Liu, Shaofei; Wang, Xiaoyun; & Zhang, Shaowen. (2023). *Conversion of biochar into sulfonate-bearing solid acids*. *Environ. Sci. Pollut. Res*.
- Yuan, J. H., & Xu, R. K. (2011). *The amelioration effects of biochar on acid soils*. *Soil Use and Management*, 27(3), 289-294.
- Yu, X.-Z., Ying, G.-G., & Kookana, R. S. (2009). Sorption of pesticides and their metabolites by biochars and implications for bioremediation. *Journal of Agricultural and Food Chemistry*, 57(10), 3675-3684.
- Zhang, W., Guo, M., Chow, T., Bennett, D. N., & Rajagopalan, N. (2013). Sorption properties of greenwaste biochar for two triazine pesticides. *Journal of Hazardous Materials*, 79, 231-232.
- Zhong, Zhaohui, Li, Xuefeng, Wang, Ming, Chen, Lihong, dan Zhang, Wei. (2010). Bamboo Biochar As a Potential Source of Soil Humic Substance in Soil Ecosystem. *China National Research Center of Bamboo*.