

DAFTAR PUSTAKA

- Agbafor, K. N., A. G. Engwa, & I. K. Obiudu. 2015. Analysis of Chemical Composition of Leaves and Roots of *Ageratum conyzoides*. *International Journal of Current Research and Academic Review*, 3(11): 60-65.
- Ahmad, T., T. Rasheed, S. A. Qamar, & M. Bilal. 2021. Phytochemical Screening of Different Root Extracts of *Ageratum conyzoides* and Their Potential Bioactivate Properties. *Journal of Experimental Biology and Agricultural Sciences*, 9(5): 639-646.
- Alfaridz, F. & R. Amalia. 2018. Review Jurnal: Klasifikasi dan Aktivitas Farmakologi dari Senyawa Aktif Flavonoid. *Farmaka*, 16(3): 1-9.
- Anggraito, Y. U., R. Susanti, R. S. Iswari, A. Yuniastuti, Lisdiana, W. H. Nugrahaningsih, N. A. Habibah, & S. H. Bintari. 2018. *Metabolit Sekunder dari Tanaman: Aplikasi dan Produksi*. Semarang: FMIPA Universitas Negeri Semarang. hal. 1-3.
- Arif, M. R., M. T. Islam, & A. H. K. Robin. 2019. Salinity Stress Alters Root Morphology and Root Hair Traits in *Brassica napus*. *Plants*, 8(192): 1-14.
- Atabayeva, S., A. Nurmahanova, S. Minocha, A. Ahmetova, S. Kenzhebayeva, S. Aidosova, A. Nurzhanova, A. Zhardamalieva, S. Asrandina, R. Alybayeva, & T. Li. 2013. The Effect of Salinity on Growth and Anatomical Attributes of Barley Seedling (*Hordeum vulgare* L.). *African Journal of Biotechnology*, 12(18): 2366-2377.
- Barus, W. A. & A. Rauf. 2020. *Budidaya Padi di Tanah Salin*. Medan: UMSU Press. hal. 50-65.
- Boughalleb, F., R. Abdellaoui, N. Ben-Brahim, & M. Neffati. 2014. Anatomical Adaptations of *Astragalus gombiformis* Pomel. under Drought Stress. *Central European Journal of Biology*, 9(12): 1215-1225.
- Brodowska, K. M. 2017. Natural Flavonoids: Classification, Potential Role, and Application of Flavonoid Analogues. *European Journal of Biological Research*, 7(2): 108-123.
- Çavuşoğlu, K., S. Kiliç, & K. Kabar. 2008. Effects of Growth Regulators on Anatomy of Radish Roots Under Saline Conditions. *Journal of Applied Biological Sciences*, 2(3): 61-64.
- Chahal, R., A. Nanda, E. K. Akkol, E. Sobarzo-Sánchez, A. Arya, D. Kaushik, R. Dutt, R. Bhardwaj, & M. H. Rahman. 2021. *Ageratum conyzoides* L. and Its Secondary Metabolites in the Management of Different Fungal Pathogens. *Molecules*, 26(2933): 1-28.
- Colin, L., F. Ruhnnow, J. K. Zhu, C. Zhao, Y. Zhao, & S. Persson. 2023. The Cell Biology of Primary Cell Walls during Salt Stress. *The Plant Cell*, 35: 201-217.
- Dalimartha, S. 2006. *Atlas Tumbuhan Obat Indonesia Jilid 2*. Cetakan Kedelapan. Depok: Trubus Agriwidya. hal. 6.
- Daniel, A. R., D. D. Pioh, R. Kawulusan, & A. M. W. Lumingkewas. 2020. Pengaruh Pemberian Mol Sabut Kelapa terhadap Pertumbuhan Tanaman Sawi Pakcoy (*Brassica rapa* L.). *Cocos*, 3(3): 1-7.

- Dorly, B. A. Wiryo, I. Nurfaizah, & R. R. S. Nidyasari. 2015. Struktur Sekretori dan Uji Histokimia Tumbuhan Obat Anggota Suku *Asteraceae* di Hutan Pendidikan Gunung Walat. *Seminar Nasional XII Pendidikan Biologi FKIP UNS*, SP-014-7: 667-673.
- Dorly, R. K. Ningrum, N. K. Suryantari, & F. L. R. Anindita. 2016. Studi Anatomi Daun dari Tiga Anggota Suku *Malvaceae* di Kawasan Waduk Jatiluhur. *Proceeding Biology Education Conference*, 13(1): 611-618.
- Duan, L., D. Dietrich, C. H. Ng, P. M. Y. Chan, R. Bhalerao, M. J. Bennett, J. R. Dinnyen. 2013. Endodermal ABA Signaling Promotes Lateral Root Quiescence during Salt Stress in *Arabidopsis* Seedling. *The Plant Cell*, 25: 324-341.
- Ergina, S. Nuryanti, & I. D. Pursitasari. 2014. Uji Kualitatif Senyawa Metabolit Sekunder pada Daun Palado (*Agave angustifolia*) yang Diekstraksi dengan Pelarut Air dan Etanol. *Jurnal Akademika Kimia*, 3(3): 165-172.
- Gutiérrez-Grijalva, E. P., L. X. Lopez-Martinez, L. A. Contreras-Angulo, C. A. Elizalde-Romero, & J. B. Heredia. 2020. Plant Alkaloids: Structures and Bioactive Properties. in *Plant-derived Bioactives*. Chapter 5. Singapore: Springer Nature. pp. 86-95.
- Haridjaja, O., D. P. T. Baskoro, & M. Setianingsih. 2013. Perbedaan Nilai Kadar Air Kapasitas Lapang Berdasarkan Metode Alhricks, Drainase Bebas, dan *Pressure Plate* pada Berbagai Tekstur Tanah dan Hubungannya dengan Pertumbuhan Bunga Matahari (*Helianthus annuus* L.). *Jurnal Tanah Lingkungan*, 15(2): 52-59.
- Hasan, R. & H. Miyake. 2017. Salinity Stress Alters Nutrient Uptake and Causes the Damage of Root and Leaf Anatomy in Maize. In ICBS Conference Proceedings, International Conference on Biological Science (2015). *KnE Life Sciences*, pp. 219–225.
- Hasanuddin, Muhibbuddin, Wardiah, & Mulyadi. 2017. *Anatomi Tumbuhan*. Banda Aceh: Syiah Kuala University Press. hal. 26-27.
- Hilaliyah, R. 2021. Pemanfaatan Tumbuhan Liar Bandotan (*Ageratum conyzoides* L.) sebagai Obat Tradisional dan Aktivitas Farmakologinya. *Bioscientiae*, 18(1): 28-36.
- ITIS. 2022. *Ageratum conyzoides* L. Retrieved on 6 April 2022, from the Integrated Taxonomic Information System online database. <http://www.itis.gov>.
- Janarthanan, L., V. Karthikeyan, B. Jaykar, B. R. Balakrishnan, K. L. Senthilkumar, & G. Anandharaj. 2016. Pharmacognostic Studies on the Whole Plants of *Ageratum conyzoides* Linn. (*Asteraceae*). *European Journal of Pharmaceutical and Medical Research*, 3(5): 618-626.
- Job, R. 2020. *Electrochemical Energy Storage: Physics and Chemistry of Batteries*. Berlin: Walter de Gruyter GmbH & Co. Kg. pp. 48.
- Joseph, B. & D. Jini. 2010. Salinity Induced Programmed Cell Death in Plants: Challenges and Opportunities for Salt-Tolerant Plants. *Journal of Plant Sciences*, 5(4): 376-390.
- Julianto, T. S. 2019. *Fitokimia Tinjauan Metabolit Sekunder dan Skrining Fitokimia*. Yogyakarta: Universitas Islam Indonesia. hal. 7-11, 35-57.

- Julkowska, M. M., H. C. J. Hoefsloot, S. Mol, R. Feron, G. J. de Boer, M. A. Haring, & C. Testerink. 2014. Capturing *Arabidopsis* Root Architecture Dynamics with ROOT-FIT Reveals Diversity in Responses to Salinity. *Plant Physiology*, 166: 1387-1402.
- Junandi, Mukarlina, & R. Linda. 2019. Pengaruh Cekaman Salinitas Garam NaCl terhadap Pertumbuhan Kacang Tunggak (*Vigna unguiculate* L. Walp) pada Tanah Gambut. *Protobiont*, 8(3): 101-105.
- Junialdi, R., A. Zein, & A. Anhar. 2019. Pengaruh Pemberian Bokhasi Bandotan (*Ageratum conyzoides* L.) terhadap Pertumbuhan dan Mutu Gizi Tomat (*Lycopersicum esculentum* Mill.). *UNES Journal of Scientech Research*, 4(1): 8-26.
- Kaiser, S. & D. Scheuring. 2020. To Lead or to Follow: Contribution of the Plant Vacuole to Cell Growth. *Frontiers in Plant Science*, 11(553): 1-6.
- Kamboj, A. & A. K. Saluja. 2008. *Ageratum conyzoides* L.: A Review on Its Phytochemical and Pharmacological Profile. *International Journal of Green Pharmacy*, 2(2): 59-68.
- Karolinoerita, V. & W. A. Yusuf. 2020. Salinisasi Lahan dan Permasalahannya di Indonesia. *Jurnal Sumberdaya Lahan*, 14(2): 91-99.
- Kartika, T. 2017. Potensi Tumbuhan Liar Berkhasiat Obat di Sekitar Pekarangan Kelurahan Silaberanti Kecamatan Silaberanti. *Sainmatika*, 14(2): 89-99.
- Keller, M. 2015. *The Science of Grapevines: Anatomy and Physiology*. 2nd Edition. London: Academic Press. pp. 292.
- Kheloufi, A. & L. M. Mansouri. 2019. Anatomical Changes Induced by Salinity Stress in Root and Stem of Two Acacia Species (*A. karroo* and *A. saligna*). *Agriculture & Forestry*, 65(4): 137-150.
- Khoirunisa, I., Budiman, & R. Kurniasih. 2021. Pengaruh Kadar Air Tanah Tersedia dan Pengelolaan Pupuk terhadap Pertumbuhan Meniran (*Phyllanthus niruri*). *Jurnal Pertanian Presisi*, 5(2): 138-146.
- Lange, B. M., J. T. Fishedick, M. F. Lange, N. Srividya, D. Šamec, & B. C. Poirier. 2017. Integrative Approaches for the Identification and Localization of Specialized Metabolites in *Tripterygium* Roots. *Plant Physiology*, 173: 456-469.
- Lintunen, A., L. Lindfors, E. Nikinmaa, & T. Hölttä. 2016. Xylem Diameter Changes during Osmotic Stress, Desiccation, and Freezing in *Pinus sylvestris* and *Populus tremula*. *Tree Physiology*, 37: 491-300.
- Maathuis, F. J. M., I. Ahmad, & J. Patishtan. 2014. Regulation of Na⁺ Fluxes in Plants. *Frontiers in Plant Science*, 5(467): 1-9.
- Maghfiroh, L., T. Rahayu, & A. Hayati. 2018. Profil Histokimia dan Analisis *In Silico* Senyawa Metabolit Sekunder pada Daun Zaitun (*Olea europaea* L.). *e-Jurnal Ilmiah SAINS ALAMI (Known Nature)*, 1(1): 74-86.
- Marliana, S. D., V. Suryanti, & Suyono. 2005. Skrining Fitokimia dan Analisis Kromatografi Lapis Tipis Komponen Kimia Buah Labu Siam (*Sechium edule* Jacq. Swartz.) dalam Ekstrak Etanol. *Biofarmasi*, 3(1): 26-31.
- Matraszek, R., B. Hawrylak-Nowak, & M. Chwil. 2015. Protein Hydrolysate as a Component of Salinized Soil in the Cultivation of *Ageratum houstonianum* Mill. (Asteraceae). *Acta Agrobotanica*, 68(3): 247-253.

- Mengkido, M., O. Lambui, & W. Harso. 2019. Uji Daya Hambat Ekstrak Daun Bandotan (*Ageratum conyzoides* L.) terhadap Pertumbuhan Bakteri *Staphylococcus aureus*. *Biocelbes*, 13(2): 121-130.
- Morsy, N. 2017. Cardiac Glycosides in Medicinal Plants. In *Aromatic and Medicinal Plants (Back to Nature)*. Chapter 2. London: Intech Open. pp. 29-36.
- Nagata, T. 2008. Histochemistry, General, and Special. *ARBS Annual Review of Biomedical Sciences*, 10: 105-159.
- Novita, E., I. Andriyani, Z. Romadona, & H. A. Pradana. 2020. Pengaruh Variasi Jenis dan Ukuran Limbah Organik terhadap Kadar Air Kompos Blok dan Pertumbuhan Tanaman Cabai. *Jurnal Presipitasi*, 17(1): 19-28.
- Nurhidayati, T., H. Purnobasuki, & S. Hariyanto. 2019. *Tanaman tembakau pada Cekaman Genangan*. Yogyakarta: Deepublish. hal. 12-13.
- Ojewale, A., S. Mada, S. Oyebadejo, A. Afodun, O. Aladeyelu, & B. Kolawole. 2020. Cardioprotective Activities of Ethanolic Extract Root of *Ageratum conyzoides* on Alloxan-Induced Cardiotoxicity in Diabetic Rats. *Biomed Research International*, 3: 1-9.
- Pantilu, L. I., F. R. Mantiri, N. S. Ai, & D. Pandiangan. 2012. Respons Morfologi dan Anatomi Kecambah Kacang Kedelai (*Glycine max* (L.) Merrill) terhadap Intensitas Cahaya yang Berbeda. *Jurnal Bioslogos*, 2(2): 79-87.
- Patnaik, P. 2003. *Handbook of Inorganic Chemicals*. New York: McGraw-Hill. pp. 856-857.
- Paul, S., B. K. Datta, M. B. Ratnaparkhe, & B. B. Dholakia. 2022. Turning Waste into Beneficial Resource: Implication of *Ageratum conyzoides* L. in Sustainable Agriculture, Environment, and Biopharma Sectors. *Molecular Biotechnology*, 64: 221-244.
- Pratiwi, D. R., Y. C. Sulistyaningsih, & D. Ratnadewi. 2020. Localization of Alkaloid and Other Secondary Metabolites in *Cinchona ledgeriana* Moens: Anatomical and Histochemical Studies on Fresh Tissues and Cultured Cells. *HAYATI: Journal of Biosciences*, 27(1): 1-7.
- Purwaningrahyu, R. D. & A. Taufiq. 2017. Respon Morfologi Empat Genotip Kedelai terhadap Cekaman Salinitas. *Jurnal Biologi Indonesia*, 13(2): 175-188.
- Putra, J. A. & D. Mayangsari. 2015. Aplikasi Pembelajaran Anatomi Tubuh Manusia pada Siswa Sekolah Menengah Atas Berbasis Multimedia. *Jurnal Teknik Universitas Janabadra Yogyakarta*, 5(1): 65-73.
- Rogomulyo, R., D. Kastono, S. N. H. Utami, T. Alam, J. Sartohadi, J. Widada, Hardaningsih, I. Istiqomah, W. Fitriya, R. I. Wati, & A. Widiastuti. 2021. *Teknologi Tepat Guna: 75 Tahun Fakultas Pertanian UGM Mengabdi*. Yogyakarta: Lily Publisher. hal. 324.
- Santos, R. F., B. M. Nunes, R. D. Sá, L. A. L. Soares, & K. P. Randau. 2016. Morpho-Anatomical Study of *Ageratum conyzoides*. *Brazilian Journal of Pharmacognosy*, 26: 679-687.
- Sari, P. K., D. Rosanti, & Y. P. Putri. 2022. Karakteristik Morfologi Jenis Tanaman Hias Pekarangan Rumah di Kelurahan Plaju Ulu Kota Palembang. *Jurnal Indobiosains*, 4(1): 15-21.

- Schwab, W., T. Fischer, & M. Wüst. 2015. Terpene Glucoside Production: Improved Biocatalytic Processes Using Glycosyltransferases. *Engineering in Life Science*, 15(4): 376-386.
- Schweingruber, F. H. 2012. Microtome Sectioning of Small Plant Stems without Embedding. *IWA Journal*, 33(4): 457-460.
- Shafi, M., Z. Guoping, J. Bakht, M. A. Khan, E. U. Islam, M. D. Khan, & Raziuddin. 2010. Effect of Cadmium and Salinity Stresses on Root Morphology of Wheat. *Pakistan Journal of Botany*, 42(4): 2747-2754.
- Shaikh, J. R. & M. K. Patil. 2020. Qualitative Tests for Preliminary Phytochemical Screening: An Overview. *International Journal of Chemical Studies*, 8(2): 603-608.
- Sharif, I., S. Aleem, J. Farooq, M. Rizwan, A. Younas, G. Sarwar, & S. M. Chohan. 2019. Salinity Stress in Cotton: Effects, Mechanism of Tolerance, and Its Management Strategies. *Physiology and Molecular Biology of Plants*, 25(4): 807-820.
- Shelden, M. C. & R. Munns. 2023. Crop Root System Plasticity for Improved Yields in Saline Soils. *Frontiers in Plant Science*, 14(1120583): 1-14.
- Silalahi, M. 2018. *Ageratum conyzoides* L. (Pemanfaatan sebagai Obat dan Bioaktivitasnya). *Jurnal Dinamika Pendidikan*, 11(3): 197-209.
- Singh, P., N. Singh, K. D. Sharma, & M. S. Kuhad. 2010. Plant Water Relation and Osmotic Adjustment in *Brassica* Species under Salinity Stress. *Journal of American Science*, 6(6): 1-4.
- Sukardiman, M. Agil, B. Prajogo, & A. Rahman. 2020. *Buku Ajar Farmakognosi*. Jilid 1. Surabaya: Ailangga University Press. hal. 7-10.
- Sulistiyarti, H. 2017. *Kimia Analisa Dasar untuk Analisis Kualitatif*. Malang: UB Press. hal. 82.
- Tavakkoli, E., P. Rengasamy, & G. K. McDonald. 2010. High Concentrations of Na⁺ and Cl⁻ Ions in Soil Solution have Simultaneous Detrimental Effects on Growth of Faba Bean under Salinity Stress. *Journal of Experimental Botany*, 61(15): 4449-4459.
- Tian, X., Z. Wang, Q. Zhang, H. Ci, P. Wang, L. Yu, & G. Jia. 2018. Genome-Wide Transcriptome Analysis of the Salt Stress Tolerance Mechanism in *Rosa chinensis*. *PLoS ONE*, 13(7): 1-19.
- Tofighi, Z., N. G. Saeidi, A. Hadjiakhoondi, & N. Yassa. 2016. Determinations of Cardiac Glycosides and Total Phenols in Different Generations of *Securigera securidaca* Suspension Culture. *Research Journal of Pharmacognosy*, 3(2): 25-31.
- Utama, Z. H. 2015. *Budidaya Padi pada Lahan Marginal Kiat Meningkatkan Produksi Padi*. Yogyakarta: Penerbit ANDI. hal. 76-77.
- Varila, T., H. Romar, T. Luukkonen, & U. Lassi. 2019. Physical Activation and Characterization of Tannin-based Foams Enforced with Boric Acid and Zinc Chloride. *AIMS Materials Science*, 6(2): 301-314.
- Wahua, C. & B. C. Nwuzi. 2021. Morphological, Anatomical, and Proximate Properties of *Ageratum conyzoides* Linn A Member of Asteraceae. *Scholars Academic Journal of Biosciences*, 9(3): 63-67.
- Wang, Y., K. Li, & X. Li. 2009. Auxin Redistribution Modulates Plastic Development of Root System Architecture under Salt Stress in *Arabidopsis thaliana*. *Journal of Plant Physiology*, 166: 1637-1645.

- Wiraatmaja, I. W. 2017. *Bahan Ajar Gerak Pada Tumbuhan*. Denpasar: Universitas Udayana. hal. 3-5.
- Witjaksana, B., G. Sarya, & H. Widhiarto. 2016. Pembuatan Batu Bata Tanpa Bakar dengan Campuran Sodium Hidroksida (NaOH) dan Sodium Silikat (Na_2SiO_3). *Jurnal Hasil Penelitian LPPM Untag Surabaya*, 1(1): 25-32.
- Xu, H. M., N. F. Y. Tam, Q. J. Zan, M. Bai, P. K. S. Shin, L. L. P. Vrijmoed, S. G. Cheung, & W. B. Liao. 2014. Effects of Salinity on Anatomical Features and Physiology of a Semi-Mangrove Plant *Myoporum bontioides*. *Marine Pollution Bulletin*, 85: 738-746.
- Yang, W., X. Chen, Y. Li, S. Guo, Z. Wang, & X. Yu. 2020. Advances in Pharmacological Activities of Terpenoids. *Natural Product Communications*, 15(3): 1-13.
- Yao, X. C., L. F. Meng, W. L. Zhao, & G. L. Mao. 2023. Changes in the Morphology Traits, Anatomical Structure of the Leaves, and Transcriptome in *Lycium barbarum* L. under Salt Stress. *Frontiers in Plant Sciences*, 14 (1090366): 1-18.
- Yasemin, S., N. Köksal, A. Özkaya, & M. Yener. 2017. Growth and Physiological Responses of '*Chrysanthemum paludosum*' under Salinity Stress. *Journal of Biological & Environmental Sciences*, 11(32): 59-66.
- Zahra, N., Z. A. Raza, & S. Mahmood. 2020. Effect of Salinity Stress on Various Growth and Physiological Attributes of Two Contrasting Maize Genotypes. *Brazilian Archives of Biology and Technology*, 63: 1-10.
- Zou, Y., Y. Zhang, & C. Testerink. 2022. Root Dynamic Growth Strategies in Response to Salinity. *Plant, Cell, & Environment*, 45: 695-704.