DAFTAR PUSTAKA

Adiyoga, W. R., Suherman., T. A., Soetiarso, B., Jaya, B. K., Udiarto, R, Rostiani & Mussadad D. (2004). *Profil Komoditas Bawang Putih (Bagian proyek Pengkajian Teknologi Pertanian Partisipatif)*. Badan Penelitian dan Pengembangan Pertanian Kementrian Pertanian.

Afrisco, J. D., Wayudi., & Heriansyah, P. (2023) . Pengaruh pemberian KNO_3 dan KH_2PO_4 pada konsentrasi berbeda terhadap sub kultur anggrek *Dendrobium sp* secara *In Vitro*. *Jurnal Green Swarnadwipa, 12*(2), 130-150. https://ejournal.uniks.ac.id/index.php/GREEN/article/view/3191

Akin, M. (2016). *Statistical Methods for Tissue Culture Medium Optimization and A Multiplexed Fingerprinting Set for Hazelnuts*. State University.

Andaryani, S. (2010). *Kajian Penggunaan Berbagai Konsentrasi BAP dan 2,4-D terhadap Induksi Kalus Jarak Pagar secara In Vitro*. UNS (Universitas Negeri Surakarta).

Anjani, F. P., Rusmiyanto, E., & Zakiah, Z. (2022). Pertumbuhan kultur kalus yang diinduksi dari eksplan hipokotil lakum (*Causonis trifolia* (L.) Mabb. & J.Wen) dengan penambahan NAA (*Naphthalene Acetic Acid*) dan BAP (6-*Benzyl Amino Purin*). *Buletin Kebun Raya, 25*(2), 96-102. https://doi.org/10.55981/bkr.2022.8931

Ardiana, D. W. (2009). Teknik pemberian benzil amino purin untuk memacu pertumbuhan kalus dan tunas pada kotiledon melon (*Cucumis melo* L.). *Buletin Teknik Pertanian*, *14*(2), 50-53. https://lib.ui.ac/detail?id=129964&lokasi=lokal

Atta, R., Laurens, L., Dubuisson E., B. (2009). Pluripotency of Arabidopsis xylem pericycle underlies shoot regeneration from root and hypocotyl explants grown *in vitro*. *Plant journal*. *57*(4), 626–644. https://doi.org/10.1111/j.1365-313X.2008.03715.x.

[BPS] Badan Pusat Statistik. (2024). *Produksi Tanaman Sayuran dan Buah-Buahan Semusim Menurut Jenis Tanaman (ton), 2021-2023*. Badan Pusat Statistik dan Direktorat Jenderal Hortikultura.

Balzan, S., Johal, G. S., & Carraro, N. (2014). The role of auxin transporters in monocots development. *Frontiers in Plant Science*, *393*(5), 1-12. https://doi.org/10.3389/fpls.2014.00393

Benková, E., Michniewicz, M., Saue,r M.,Teichmann, T., Seifertova, D., Jurgens, G., Friml, J. (2003). Local, efflux-dependent auxin gradients as a common module for plant organ formation. *Cell, 115*(5), 591–602. https://doi.org/10.1016/s0092-8674(03)00924-3

Britto, D. T., & Kronzucker, H. J. (2002). NH_4^+ toxicity in higher plants: a critical review. *Plant Physiol, 159*(6), 567–584. https://doi.org/10.1078/0176-1617-0774

Cartika, I., Rahayu, S. T., Basuki, R. S., & Soetiarso, T. A. (2022). Pertumbuhan dan hasil tanaman bawang putih pada berbagai penambahan lama penyinaran lampu LED putih. *Jurnal Agronomi Indonesia*, *50*(1), 57-64. https://doi.org/10.24831/jai.v50i1.39300

Che, P., Lall, S., Howell, S. H. (2007). Developmental steps in acquiring competence for shoot development in *Arabidopsis* tissue culture. *Planta, 226*(5), 1183–1194. https://doi.org/10.1007/s00425-007-0565-4

Chen, C. C., Bates, R., Carlson, J. (2014). Effect of environmental and cultural conditions on medium pH and explant growth performance of Douglas-fir (*Pseudotsuga menziesii*) shoot cultures. *F1000 Research*. 3, 298. https://doi.org/10.12688/f1000research.5919.2

Cokrowati, N., & Diniarti, N. (2019). Komponen *Sargassum aquifolium* sebagai hormon pemicu tumbuh untuk *Eucheuma cottonii*. *Jurnal Biologi Tropis*, *19*(2), 316-321. https://doi.org/10.29303/jbt.v19i2.1107

David, C. H. (2010). Pengaruh Variasi Konsentrasi Sukrosa terhadap Pertumbuhan dan Induksi Embriogenesis Somatik Kultur Kalus Tapak Dara (*Catharanthus roseus* (L.) G. Don). UNS (Universitas Sebelas Maret).

Duan, X., Luo, L., Wang Z., Wang W., Ye, C., Jia, L., Xie, Y., Chen, J., Han, Y., Lv, Y., Qi, W., & Xuan, W. (2023). Promotion of root development by slightly alkaline pH involves an auxin mediated adaption mechanism. *Soil Science and Environment, 2(*6), 1-12. https://doi.org/10.48130/SSE-2023-0006

Fahira, A. (2024). Regenerasi Kalus Embriogenik Bawang Putih (*Allium sativum* L.) Varietas Sangga Sembalun. UNAND (Universitas Andalas).

Fauziah, A., & Wiretno, W. (2015). Regenerasi tanaman dari eksplan kalus bawang putih (*Allium sativum* L.) secara *in vitro*. *Journal of Tropical Byology, 3*(1), 32-35.

George, E. F., Hall, M. A., & de Klerk, G. J. (2008). *Plant Propagation by Tissue Culture*. Springer.

Hachiya, T., Watanabe, C. K., Fujimoto, M., Ishikawa, T., Takahara, K., Kawaiyamada, M., Uchimiya, H., Uesono, Y., Terashima, I., & Noguchi, K. (2012). Nitrate addition alleviates ammonium toxicity without lessening ammonium accumulation, organic acid depletion and inorganic cation depletion in *Arabidopsis thaliana* shoots. *Plant Cell Physiol*, *53*(3), 577–591. https://doi.org/10.1093/pcp/pcs012

Hernita, D. (2018). *Bawang putih Sangga Sembalun di Kabupaten Kerinci: Harapan dan potensi*. BPTP Balitbangtan Jambi.

Hu, W., Fagundez, S., Grazzini, L. K., Li, Y., Chen, Y., Wang, X., Deng, Z., Xie, S., Mcavoy, R. J., & Li, Y. (2017). Endogenous auxin and its manipulation influence *in vitro* shoot organogenesis of *citrus* epicotyl explants. *Horticulture Research*. 4, 17071. https://doi.org/10.1038/hortres.2017.71

Huda, K. M. K., Bhuiyan, M. S .R., Zeba N., Banu S. A., Mahmud F., & Khatun A. (2009). Effect of $FeSO_4$ and pH on shoot regeneration from the cotyledonary explants of Tossa Jute. *Plant Omics Journal, 2*(5), 190-196. https://www.pomics.com/huda_5_3_2009_190_196.pdf

Hussain, A., Qarshi, I. A., Nazir, H. & Ullah, I. (2012). *Plant Tissue Culture: Current Status and Opportunities*. InTech.

Karjadi, A., K., Buchory, A. (2007). Pengaruh penambahan auksin dan sitokinin terhadap pertumbuhan tunas bawang putih. *Jurnal Hortikultura*, *17*(4), 314-320. https://repository.pertanian.go.id/handle/123456789/1023

Kereša, S., Kurtović, K., Ban, S. G., Vončina, D., Jerčić, I. H., Bolarić, S., Lazarević, B., Godena, S., Ban, D., & Mihovilović, A. B. (2021). Production of virus-free garlic plants through somatic embryogenesis. *Agronomy*, *11*(5), 1-13. https://doi.org/10.3390/agronomy11050876

[KEMENTAN] Kementerian Pertanian. (1995). Surat Keputusan Menteri Pertanian Republik Indonesia Nomor: 79/Kpts/TP.240/2/1995. *Deskripsi Bawang Putih Varietas Sangga Sembalun*. Kementerian Pertanian Republik Indonesia.

Khairuna. (2019). *Diktat Fisiologi Tumbuhan*. Universitas Islam Negeri Sumatera Utara.

Koryanti, T., Ningsih, H., Erdiandini, I., Paulina, M., Firgiyanto, R., Junairiah., Sari, V. K. (2022). *Pemuliaan Tanaman*. Yayasan Kita Menulis.

Kristina, N., Yusniwati., Herawati, N., Syukriani, L., Resigia, E. (2023). Sosialisasi penggunaan benih bawang putih varietas sangga sembalun dan pendampingan pembibitan di alahan panjang. *Jurnal Pengabdian Masyarakat Bidang Sains dan Teknologi*, *2*(2), 280-286. https://doi.org/10.55123/abdikan.v2i2.1925

Marhavý, P. Montesinos J. C., Abuzeineh, A., Damme, D. V., Vermeer, J. E., Duclercq, J., Rakusova, H., Novakova, P., Friml, J., Geldner, N., & Benkova, E. (2016) Targeted cell elimination reveals an auxin-guided biphasic mode of lateral root initiation. *Genes and Development, 30*(4), 471–483. https://doi.org/10.1101/gad.27694.115

Marschner, P. (2012). *Marschner's Mineral Nutrition of Higher Plants*. Academic Press.

Mayasari, D. (2018). Induksi Tunas Aksilar Sirsak (*Annona muricate* L.) dengan Penambahan NAA dan BAP secara *In Vitro*. Universitas Islam Negeri Maulana Malik Ibrahim.

Msimbira, L. A., & Smith, D. L. (2020). The roles of plant growth promoting microbes in enhancing plant tolerance to acidity and alkalinity stresses. *Frontiers in Sustainable Food Systems,* 4, 106. https://doi.org/10.3389/fsufs.2020.00106

Muhar, T. J., Handayani, T. T., & Lande, L. M. (2015). Pengaruh KNO_3 dan Cahaya Terhadap Perkecambahan dan Pertumbuhan Kecambah Benih Padi (*Oryza Sativa* L.) Varietas Ciherang. *Prosiding Seminar Nasional Swasembada Pangan, 2*(1), 137-144. https://doi.org/10.25181/prosemnas.v0i0.523

Murashige, T. dan Skoog, F. (1962). A revised medium for rapid growth and bioassay with tobacco tissue culture. *Physiol Plant*, *15*(3), 473-497. https://doi.org/10.1111/j.1399-3054.1962.tb08052.x

Prasonto, D., Riyanti E., Gartika M., (2017). Uji aktivitas antioksidan bawang putih (*Allium sativum*). *Odonto Dental Journal*, *4*(2), 122-128. https://doi.org/10.30659/odj.4.2.122-128

Purnamaningsih, R., Ashrina, M., (2011). Pengaruh BAP dan NAA terhadap induksi kalus dan kandungan artemisin dari *Artemisia annua* L. *Berita Biologi, 10*(4), 481-489. https://doi.org/10.14203/beritabiologi.v10i4.766

Puspitorini, P. (2016). Sumber hormon auksin terhadap pertumbuhan tumbuhan steem batang nanas (*Ananas comosus* L. Merr.). *Journal of Academic Research and Sciences, 1*(1), 45-52. https://doi.org/10.35457/jares.v1i1.41

Ramadani, S., Kristina, N., Syarif, A., & Resigia, E. (2024). Pengaruh warna light emitting diode (LED) terhadap morfogenesis eksplan kalus asal bulbil bawang putih sangga sembalun secara *in vitro*. *Jurnal Agroteknologi*, *14*(2), 63-67. https://doi.org/10.24014/ja.v14i2.25211

Rashid, R., Bhat J.A., Bhat M.I., Bhat B.A. (2018). Effect of pH on callus induction and shoot regeneration from cotyledon and leaf and hypocotyl explants of tomato. *International Journal of Pure & Applied Bioscience*. *6*(2), 806-809. http://dx.doi.org/10.18782/2320-7051.5984

Resigia, E., Herawati, N., & Kristina, N. (2021). Induksi tunas *in vitro* bawang putih pada umur simpan umbi dengan suhu rendah dan komposisi ZPT berbeda. *Jurnal Galung Tropika*, 10(2), 240-248. http://dx.doi.org/10.31850/jgt.v10i2.774

Roy, J. & Banerjee, N. (2003). Induction of callus and plant regeneration from shoot-tip explants of Dendrobium fimbriatum Lindl. var. oculatum Hk. F. *Scientia Hortikultura, 97*(3), 333–340. https://doi.org/10.1016/s0304-4238(02)00156-5

Sandrakirana R., Fauzia, L., Alami, E. N., Aisyawati, L., Rahmawati, D., Handayati, W., Susanti, I. & Baswarsiati. (2018). *Panduan Budidaya Bawang Putih.* Badan Penelitian dan Pengembangan Pertanian Jawa Timur.

Sarasketa, A., González-Moro, M. B., González-Murua, C., & Marino, D. (2016). Nitrogen source and external medium pH interaction differentially effects root and shoot metabolism in *Arabidopsis*. *Frontiers in Plant Science, 7*, 29. https://doi.org/10.3389/fpls.2016.00029

Shah, S., Cai, L., Li, X., Fahad, S., & Wang, D. (2023). Influence of cultivation practices on the metabolism of cytokinin and its correlation in rice production. *Food and Energy Security, 12*(5), 1–23. https://doi.org/10.1002/fes3.488

Sonbai, J. H. H., Prajitno D., Syukur A. (2013). Pertumbuhan dan hasil jagung pada berbagai pemberian pupuk nitrogen di lahan kering regosol. *Ilmu Pertanian*, *16*(1), 77-89. https://doi.org/10.22146/ipas.2527

Sugiarto, L. & Paramita, C. K. (2014). Pengaruh 2,4-diklorofenoksiasetat (2,4-D) dan benzyl aminopurin (BAP) terhadap pertumbuhan kalus daun binahong (*Anredera cordifolia* L.) serta analisis kandungan flavonoid total. *Jurnal Penelitian Saintek*, *19*(1), 23-30. https://doi.org/10.21831/jps.v19i1.2322

Suliansyah, I. (2013). *Kultur Jaringan Tanaman*. PT Leutika Nouvalitra.

Sulichantini, E., D. (2016). Pengaruh konsentrasi zat pengatur tumbuh terhadap regenerasi bawang putih (*Allium sativum* L.) secara kultur jaringan. *Jurnal Agrifor, 15*(1), 29-36. https://doi.org/10.31293/af.v15i1.1831

Sulistyaningrum, A., Kiloes, A. M., & Darudriyo. (2020). Analisis regresi penampilan bawang putih sangga sembalun dan lumbu kuning selama penyimpanan dalam suhu ruang. *Jurnal Agronida*, *6*(1), 33-43. https://doi.org/10.30997/jag.v6i1.2599

Syamsiah, I. S., & Tajudin. (2003). *Khasiat dan Manfaat bawang putih*. Agro Media Pustaka.

Taiz, L., & Zeiger, E. (2012). *Plant Physiology* (3nd ed.). Sinauer Associates Inc.

Ulva, M., Nurchayati, Y., Prihastanti, E., Setiari, N. (2019). Pertumbuhan kalus tomat (*Lycopersicum esculentum* Mill.) varietas permata F1 dari jenis Eksplan dan konsentrasi sukrosa yang berbeda secara *in vitro*. *Ilmu Hayati*. *8*(2), 160-169. https://doi.org/10.15294/lifesci.v8i2.37103

Ung, K. L., Winkler, M., Schulz, L., Kolb, M., Janacek, D. P., Dedic, E., Stokes, D. L., Hammes, U. Z., & Pedersen, B. P. (2022). Structures and mechanism of the plant PIN-FORMED auxin transporter. *Nature. 609*(7927), 605-610. https://doi.org/10.1038/s41586-022-04883-y

Wardani, D. P., Solichantun,. Setyawan, A. D. (2004). Pertumbuhan dan produksi saponin kultur kalus *Talinum paniculatum* Gaertn. pada variasi penambahan asam 2,4 diklorofenoksi asetat (2,4-D) dan kinetin. *Jurnal Biofarmasi, 2*(1), 35-43. https://doi.org/10.13057/biofar/f020106

Widiastoety, D. S., Kartikaningrum, & Purbadi. (2005). Pengaruh pH media terhadap pertumbuhan plantlet anggrek dendrobium. *Jurnal Hortikultura*, *15*(1), 18-21. https://doi.org/10.21082/jhort.v15n1.2005.p%p

Widiastoety, D. (2008). Pengaruh KNO_3 dan $(NH_4)2SO_4$ terhadap pertumbuhan bibit anggrek vanda. *Jurnal Hortikultura*, *18*(3), 84-92. https://repository.pertanian.go.id/handle/123456789/1040

Wen, Y., Liu, X., Liu. H., Wu, C., Meng, H., & Cheng. Z. (2020). High-frequency direct shoot organogenesis from garlic (Allium sativum L.) inforescence and clonal fdelity assessment in regenerants. *Plant Cell, Tissue and Organ Culture (PCTOC)*, *141*, 275-287. https://doi.org/10.1007/s11240-020-01785-7

Zulkarnain. (2011). *Kultur Jaringan Tanaman*. Bumi Aksara

Zulkarnain, (2016). *Budidaya Sayuran Tropis*. Bumi Aksara