

DAFTAR PUSTAKA

- Abbas, F., Y. Ke, R. Yu, Y. Yue, S. Amanullah, M.M. Jahangir, and Y. Fan. 2017. Volatile terpenoids: multiple functions, biosynthesis, modulation and manipulation by genetic engineering. *Planta*, 246(5): 803-816.
- Abd-ElGawad A.M., A.I. Elshamy, S.L Al-Rowaily, Y.A. El-Amier YA. 2019. Habitat Affects the Chemical Profile, Allelopathy, and Antioxidant Properties of Essential Oils and Phenolic Enriched Extracts of the Invasive Plant *Heliotropium curassavicum*. *Plants (Basel)*, 8(482): 1-20.
- Abdallah, I.I. and W.J. Quax. 2017. A Glimpse into the Biosynthesis of Terpenoids. *KnE Life Sciences*, 3(5): 81-98.
- Ahmad, I., dan G. Alam. 2011. Analisis Hubungan Kuantitatif Struktur-Aktivitas (HKSA) dari Senyawa Aktif Antimalaria Diterpen Kassin Hasil Isolasi dari Biji Bagore (*Caesalpinia crista* Linn.) dengan Parameter Elektronik. *Journal of Tropical Pharmacy and Chemistry*, 1(2): 116–124.
- Ahsan, M. dan H. Khusna. Evaluasi Performa dari Diagram Kontrol Multivariat Berbasis Independen Principal Component Analysis (PCA). *Inferensi*, 1(2): 89-92.
- Akiel, M.A., O.Y. Alshehri, S.A. Aljihani, A. Almuaysib, A. Bader, A.I. Al-Asmari, H.S. Alamri, B.M. Alrfaei, M.A. Halwani. 2022. Viridiflorol induces anti-neoplastic effects on breast, lung, and brain cancer cells through apoptosis. *Saudi Journal of Biological Sciences*, 29(2): 816-821.
- Angeli, F., G. Reboldi, and P. Verdecchia. 2021. SARS-CoV-2 infection and ACE2 inhibition. *Journal of Hypertension*, 39(8): 1555-1558.
- Ashokhan S, R. Othman, M.H.A. Rahim, S.A. Karsani, and J.S. Yaacob. 2020. Effect of Plant Growth Regulators on Coloured Callus Formation and Accumulation of Azadirachtin, an Essential Biopesticide in *Azadirachta indica*. *Plants (Basel)*, 9(352): 1-17.
- Asif, M., M. Saleem, M. Saadullah, H.S. Yaseen, and R. Al Zarzour R. 2020. COVID-19 and therapy with essential oils having antiviral, anti-inflammatory, and immunomodulatory properties. *Inflammopharmacology*, 28(5): 1153-1161.
- Assis, D.B., H. Neto, Humberto D. Fonseca, H. Andrade, R. Braga, N. Badr, M. Maia, R. Castro, L. Scotti, M. Scotti, and R. Almeida. 2020. Antinociceptive Activity of Chemical Components of Essential Oils That Involves Docking Studies: A Review. *Frontiers in Pharmacology*, 11(777): 1-19.
- Astani, A., J. Reichling, and P. Schnitzler. 2011. Screening for antiviral activities of isolated compounds from essential oils. *Evid Based Complement Alternat Med*, 1-8.
- Ayatollahi S.A., J. Sharifi-Rad, P.V.T. Fokou, G.B. Mahady, H.A.R. Suleria, S.K. Kapuganti, K. Gadhave, R. Giri, N. Garg, R. Sharma, D. Ribeiro, C.F. Rodrigues, Z. Reiner, Y. Taheri, and N. Cruz-Martins. 2022. Naturally Occurring Bioactives as Antivirals: Emphasis on Coronavirus Infection. *Front Pharmacol*, 12: 1-19.
- Aydin, D.Y. and S. Guru. 2022. Potential of Natural Therapeutics Against SARS-CoV-2: Phenolic Compounds and Terpenes. *Namik Kemal Medical Journal*, 10(2): 119-128.

- Baday, S.J.S. 2019. Plant tissue culture. *International Journal of Agriculture and Environmental Research*, 4(4): 977-990.
- Baidya, N., N. Ghosh, and A. Chattopadhyay, Asoke. 2021. Inhibitory capacity of Chloroquine against SARS-COV-2 by effective binding with Angiotensin converting enzyme-2 receptor: An insight from Penambatan molekuler and MD-simulation studies. *Journal of Molecular Structure*, 1230: 1-8.
- Baylon, J.L., I.L. Lenov, S.G. Sligar, and E. Tajkhorshid. 2013. Characterizing the membrane-bound state of cytochrome P450 3A4: structure, depth of insertion, and orientation. *J Am Chem Soc*, 135(23): 8542-8551.
- Benoit-Biancamano, M.O., J.P. Adam, O. Bernard, M.H. Court, M.H. Leblanc, P. Caron, and C. Guillemette. 2009. A pharmacogenetics study of the human glucuronosyltransferase UGT1A4. *Pharmacogenet Genomics*, 19(12): 945-954.
- Berti, D.A., C. Morano, L.C. Russo, L.M. Castro, F.M. Cunha, X. Zhang, J. Sironi, C.F. Klitzke, E.S. Ferro, and L.D. Fricker. 2009. Analysis of intracellular substrates and products of thimet oligopeptidase in human embryonic kidney 293 cells. *J Biol Chem*, 284(21): 14105-14116.
- Bnyan, I.A., A.T. Abid, and H.N. Obied. 2014. Antibacterial Activity of Carvacrol Against Different Types of Bacteria. *Journal of Natural Sciences Research*, 4(9): 13-16.
- Botahala, L., Sukarti, W. Arifuddin, A.R. Arif, Ischaidar, M. Arafah, D. Kartina, Z. Armah, M. Yasser, I. Pratama, O. Patarru, Santi, and H. Hamsah. 2020. *Deteksi Dini Metabolit Sekunder pada Tanaman*. Mitra Cendekia Media. Kapalo Koto. pp: 11 – 14.
- Bourgonje, A.R., A.E. Abdulle, W. Timens, J.L. Hillebrands, G.J. Navis, S.J. Gordijn, M.C. Bolling, G. Dijkstra, A.A. Voors, A.D. Osterhaus, P.H. Voort, D.J. Mulder, H. Goor. 2020. Angiotensin-converting enzyme 2 (ACE2), SARS-CoV-2 and the pathophysiology of coronavirus disease 2019 (COVID-19). *J Pathol*, 251(3): 228-248.
- Bro, R., and A.K. Smilde. 2014. Principal component analysis. *Analytical Methods*, 6(9): 2812- 2831.
- Broad, L.M., A.J. Mogg, E. Eberle, M. Tolley, D.L. Li, and K.L. Knopp. 2016. TRPV3 in Drug Development. *Pharmaceuticals (Basel)*, (55): 1- 17.
- Caceres, A.I., B. Liu, S.V. Jabba, S. Achanta, J.B. Morris, and S.E. Jordt. 2017. Transient Receptor Potential Cation Channel Subfamily M Member 8 channels mediate the anti-inflammatory effects of eucalyptol. *Br J Pharmacol*, 174(9): 867-879.
- Cai, N., L. Lou, N. Al-Saadi, S. Tetteh, and L.W. Runnels. 2018. The kinase activity of the channel-kinase protein TRPM7 regulates stability and localization of the TRPM7 channel in polarized epithelial cells. *J Biol Chem*, 293(29): 11491-11504.
- Chasteen, T.G. 2009. *Split/Splitless Gas Chromatography Injection*. Sam Houston State University. Huntsville. pp: 1-3.
- Chen, Y., S. Chen, X. Li, X. Wang, and S. Zeng. 2006. Genetic variants of human UGT1A3: functional characterization and frequency distribution in a Chinese Han population. *Drug Metab Dispos*, 34(9): 1462-1467.
- Cho, K.S., Y.R. Lim, K. Lee, J. Lee, J.H. Lee, I.S. Lee. 2017. Terpenes from Forests and Human Health. *Toxicol Res*, 33(2): 97-106.

- Choque-Guevara, R., A. Poma-Acevedo, R. Montesinos-Millán, D. Rios-Matos, K. Gutiérrez-Manchay, A. Montalvan-Avalos, S. Quiñones-García S, M.G. Cauti-Mendoza, A. Agurto-Arteaga, I. Ramirez-Ortiz, M. Criollo-Orozco, E. Huaccachi-Gonzales, Y.K. Romero, N. Perez-Martinez, G. Isasi-Rivas, Y. Sernaque-Aguilar, D. Villanueva-Pérez, F. Ygnacio, K. Vallejos-Sánchez, M. Fernández-Sánchez, L.A. Guevara-Sarmiento, M. Fernández-Díaz, and M. Zimic. 2022. Squalene in oil-based adjuvant improves the immunogenicity of SARS-CoV-2 RBD and confirms safety in animal models. *PLoS One*, 17(8): 1-19.
- Ciocca, B.E., A.J. Munhoz, and R.M. Filho. 2021. In silico evaluation of most used drugs on the treatment of slight and mild covid-19 cases in Brazil. *International Journal of Development Research*, 11(06): 48146-48150.
- Cooper, D. and M. Dimri. 2021. *Biochemistry, Calcium Channels*. StatPearls Publishing. pp: 9.
- Daina, A., O. Michielin, and V. Zoete. 2017. SwissADME: a free web tool to evaluate pharmacokinetics, drug-likeness and medicinal chemistry friendliness of small molecules. *Sci Rep*, 7: 1-13.
- Doorandishan, M., M. Gholami, P. Ebrahimi, A.R. Jassbi. 2021. Spathulenol as the most abundant component of essential oil of *Moluccella aucheri* (Boiss.) Scheen. *Natural Volatiles and Essential Oils*, 8(2): 37-41.
- Duncan, R.E. and M.C. Archer. 2006. Farnesol induces thyroid hormone receptor (THR) beta1 but inhibits THR-mediated signaling in MCF-7 human breast cancer cells. *Biochem Biophys Res Commun*, 343(1): 239-243.
- Efferth, T. 2018. Biotechnology applications of plant callus cultures. *Engineering*, 5: 50-59.
- Enomoto, H., N. Mittal, T. Inomata, T. Arimura, T. Izumi, A. Kimura, K. Fukuda, and S. Makino. 2021. Dilated cardiomyopathy-linked heat shock protein family D member 1 mutations cause up-regulation of reactive oxygen species and autophagy through mitochondrial dysfunction. *Cardiovasc Res*, 117(4): 1118-1131.
- Ernawati., E. Suprayitno, Hardoko., and U. Yanuhar. 2019. Extraction of Bioactive Compounds Fruit from *Rhizophora mucronata* Using Sonication Method. *IOP Conf. Series: Earth and Environmental Science*, 236: 1-5.
- Etxebarria, N., O. Zuloaga, M. Olivares, L.J. Bartolome, and P. Navarro. 2009. Retention-time locked methods in gas chromatography. *J Chromatogr A*, 1216(10): 1624-1629.
- Eweas, A.F., A.A. Alhossary, and A.S. Abdel-Moneim. 2021. Penambatan molekuler Reveals Ivermectin and Remdesivir as Potential Repurposed Drugs Against SARS-CoV-2. *Front Microbiol*, 11: 1-15.
- Fadlam, A., T. Warsito, dan Sarmoko. 2022. Studi *In Silico* Potensi Antikanker Senyawa Kaempferida. *Alchemy: Journal of Chemistry*, 10(1): 14-21.
- Faqiha, A.F., Y.Y.A. Indrawijaya, A. Suryadinata, M. Amiruddin, and R. Mutiah. 2022. Potensi Senyawa Nitazoxanide dan Arbidol sebagai Antivirus SARS-CoV-2 terhadap Reseptor NSP5 (7BQY dan 2GZ7) dan ACE2 (3D0G dan 1R4L). *Journal of Food and Pharmaceutical Sciences*, 10(1): 570-583.
- Francesco, C., C.M. Everly, Conway, and M. Alberto, JL. 2015. HSPD1 (Heat Shock 60kDa Protein 1). *Atlas of Genetics and Cytogenetics in Oncology and Haematology*. 19(9): 575-585.

- Frimayanti, N., A. Lukman, dan L. Nathania. 2021. Studi *Molecular Docking* Senyawa 1,5-benzothiazepine sebagai Inhibitor *Dengue* DEN-2 NS2B/NS3 Serine Protease. *Chempublish Journal*, 6(1): 54 – 62.
- Gaba, M., G. Punam, and S. Sarbjot. 2010. An overview on Penambatan molekuler. *International Journal of Drug Development and Research*. 2: 219-231.
- Gao, W., N. Guo, S. Zhao, Z. Chen, W. Zhang, F. Yan, H. Liao, and K. Chi. 2020. HTR2A promotes the development of cardiac hypertrophy by activating PI3K-PDK1-AKT-mTOR signaling. *Cell Stress Chaperones*, 25(6): 899-908.
- Garcia-Iriepa, C., C. Hognon, A. Francés-Monerris, I. Iriepa, T. Miclot, G. Barone, A. Monari, and M. Marazzi. 2020. Thermodynamics of the Interaction Between SARS-CoV-2 Spike Protein and Human ACE2 Receptor Effects of Possible Ligands. *The Journal of Physical Chemistry Letters*, 11: 9272–9281.
- Gendy, A.E.G., A.F. Essa, A.A. El-Rashedy, A.M. Elgamal, D.D. Khalaf, E.M. Hassan, A.M. Abd-ElGawad, A.M. Elgorban, N.S. Zaghloul, S.F. Alamery, and A.I. Elshamy. 2022. "ntiviral Potentialities of Chemical Characterized Essential Oils of *Acacia nilotica* Bark and Fruits against Hepatitis A and Herpes Simplex Viruses: In Vitro, In Silico, and Molecular Dynamics Studies. *Plants*, 11(21): 1-18.
- González-Maldonado, P., A. Alvarenga, A. Burgos-Edwards, M.E. Flores-Giubi, J.E. Barúa, M.C. Romero-Rodríguez, R. Soto-Rifo, F. Valiente-Echeverría, P. Langjahr, G. Cantero-González, P.H. Sotelo. 2022. Screening of Natural Products Inhibitors of SARS-CoV-2 Entry. *Molecules*, 27(1743): 1-10.
- Grogan, S. and C.V. Preuss. 2022. *Pharmacokinetics*. StatPearls Publishing. pp: 1-3.
- Guerrini A., G. Sacchetti, A. Grandini, A. Spagnoletti, M. Asanza, and L. Scalvenzi. 2016. Cytotoxic Effect and TLC Bioautography-Guided Approach to Detect Health Properties of Amazonian *Hedyosmum sprucei* Essential Oil. *Evid Based Complement Alternat Med*, 1-8.
- Gulhan, P.Y., R. Eroz, O. Ataoglu, N. İnce, F. Davran, C.E. Öztürk, Z. Gamsızkan, and O.A. Balbay. 2022. The evaluation of both the expression and serum protein levels of Caspase-3 gene in patients with different degrees of SARS-CoV2 infection. *J Med Virol*, 94(3): 897-905.
- Gunes, F.E. 2013. Medical use of squalene as a natural antioxidant. *Journal of Marmara University Institute of Health Sciences*, 3(4): 220-228.
- Ha, N.T., and C.H. Lee. 2020. Roles of Farnesyl-Diphosphate Farnesyltransferase 1 in Tumour and Tumour Microenvironments. *Cells*, 9(2352): 1-33.
- Hanus, L.O. and Y. Hod. 2020 Terpenes/Terpenoids in *Cannabis*: Are They Important?. *Med Cannabis Cannabinoids*, 3(1): 25-60.
- Harika, S., T.R. Kumar, and L.S.S. Reddy. 2017. Docking Studies of Benzimidazole Derivates Using Hex 8.0. *International Journal of Pharmaceutical Sciences and Research*, 8(4): 1677-1688.
- Hariyati, M., I. Bachtiar, dan P. Sedijani. 2016. Induksi Kalus Tanaman Krisan (*Chrysanthemum morifolium*) dengan Pemberian Benzil Amino Purin (BAP) dan Dichlorofenoksi Acetil Acid (2,4 D). *Jurnal Penelitian Pendidikan IPA*, 2(1): 89-96.

- Hayya, A. 2021. Penggunaan Klorokuin pada Infeksi Virus COVID-19. *Jurnal Inovasi Penelitian*, 1(8), 1761-1766.
- Hermayani, N., A. Retnoningsih, and E.S. Rahayu. 2016. Optimising Sterilisation Techniques and Callus Induction of Nodes *Durio Zibethinus* Murr in Vitro Method with Various Media. *Journal of Physics: Conference Series*, 824: 1-6.
- Hsu, K., C. Wu, L.Y. Wei, H. Ho, M. Yang, and C. Ho. 2022. Chemical Compositions and Anti-Mildew Effects of *Cinnamomum micranthum* Leaf and Twig Essential Oils on Paper. *Natural Product Communications*, 17(7): 1-7.
- Huang, Z.R., Y.K. Lin, and J.Y. Fang. 2009. Biological and Pharmacological Activities of Squalene and Related Compounds: Potential Uses in Cosmetic Dermatology. *Molecules*, 14(1): 540-554.
- Huang, Y., F.J. Xie, X. Cao, and M.Y. Li. 2021. Research progress in biosynthesis and regulation of plant terpenoids. *Biotechnology & Biotechnological Equipment*, 35(1): 1799-1808.
- Hussain, S. Z and K. Maqbool. 2014. GC-MS: Principle, Technique and its application in Food Science. *INT J CURR SCI*. 13: 116 – 126.
- Iriawati, A. Rahmawati, and R. Esyanti. 2014. Analysis of Secondary Metabolite Production in Somatic Embryo of Pasak Bumi (*Eurycoma Longifolia* Jack.). *Procedia Chemistry*, 13: 112-118.
- Isaac-Lam, M.F. 2021. Molecular modeling of the interaction of ligands with ACE2-SARS-CoV-2 spike protein complex. *In Silico Pharmacol*, 9(55): 1-16.
- Iskandar, D. dan A. Suhendra. 2012. Uji Inokulasi *Fusarium* sp untuk Produksi Gaharu Pada Budidaya *A. beccariana*. *Sains dan Teknologi Indonesia*, 14 (3): 182-188.
- Jamil, S.Z.M.R., E.R. Rohani, S.N. Baharum and N.M. Noor. 2018. Metabolites profiles of callus and cell suspension cultures of mangosteen. *Biotech*, 8(322): 1-14.
- Javed, H., M.F.N. Meeran, N.K. Jha, and S. Ojha. 2021, Carvacrol, a Plant Metabolite Targeting Viral Protease (M^{pro}) and ACE2 in Host Cells Can Be a Possible Candidate for COVID-19. *Front Plant Sci*, 11: 1-10.
- Jiang, Z., C. Kempinski, and J. Chappell. 2016. Extraction and Analysis of Terpenes/Terpenoids. *Curr Protoc Plant Biol*, 1: 345-358..
- Julianto, T.S. 2019. *Fitokimia tinjauan metabolit sekunder dan skrining fitokimia*. Universitas Islam Indonesia. Yogyakarta. pp: 8, 37, 47-48, 56-57.
- Khayrani, A.C., R. Irdiani, R. Aditama, D.K. Pratami, K. Lischer, M.J. Ansari, A. Chinnathambi, S.A. Alharbi, H.S. Almoallim, and M. Sahlan. 2021. Evaluating the potency of Sulawesi propolis compounds as ACE-2 inhibitors through Penambatan molekuler for COVID-19 drug discovery preliminary study. *J King Saud Univ Sci*, 33(2): 1-12.
- Kilo, A.L., L.O. Aman, I. Sabihi, J.L. Kilo 2019. Studi Potensi Pirazolin Tersubstitusi 1-N dari Thiosemicarbazone sebagai Agen Antiamuba Melalui Uji *In Silico*. *Indo. J. Chem. Res*, 7(1): 9-24.
- Kim D.Y., M.K. Kang, E.J. Lee, Y.H Kim, H. Oh, S.I Kim, S.Y. Oh, W. Na, Y.H. Kang. 2020. Eucalyptol Inhibits Amyloid- β -Induced Barrier Dysfunction in

- Glucose-Exposed Retinal Pigment Epithelial Cells and Diabetic Eyes. Antioxidants (Basel). *Antioxidants*, 9(1000): 1-19.
- Kim, M.T., A. Sedykh, S.K. Chakravarti, R.D. Saiakhov, H. Zhu. 2014. Critical evaluation of human oral bioavailability for pharmaceutical drugs by using various cheminformatics approaches. *Pharm Res*, 31(4):1002-1014.
- Koentjoro, M.P., A. Donastin, and E.N. Prasetyo. 2021. Potensi Senyawa Bioaktif Tanaman Kelor Penghambat Interaksi Angiotensin-Converting Enzyme 2 pada Sindroma SARS-COV-2. *Jurnal Bioteknologi dan Biosains Indonesia (JBBI)*, 7(2): 259–270.
- Kuhn, M., D. Szklarczyk, S. Pletscher-Frankild, T.H. Blicher, C. Mering, L.J. Jensen, and P. Bork. 2014. STITCH 4: integration of protein-chemical interactions with user data. *Nucleic Acids Res*, 42: 401-407.
- Kumar, R., A. Sharma, and P.K. Varadwaj. 2011. A prediction model for oral bioavailability of drugs using physicochemical properties by support vector machine. *J Nat Sci Biol Med*, 2(2): 168-173.
- Latief, M., N. Meriyanti, N. Fadhillah, I.L. Tarigan, A. Ayu, R. Maharani, E. Aulia, and D. Siregar. 2022. Isolasi Senyawa Triterpenoid, Ekstrak Etanol Daun Jeruju (*Achantus ilicifolius*) dan Aktivitas Antibakterinya terhadap *S. aerus* dan *E. coli*. *Jurnal Kimia*, 16(1): 35-44.
- Lei, T., Y. Li, Y. Song, D. Li, H. Sun, and T. Hou. 2016. ADMET evaluation in drug discovery: 15. Accurate prediction of rat oral acute toxicity using relevance vector machine and consensus modeling. *J Cheminform*, 8(6): 1-19.
- Lovestead, T.M. and K. Urness. 2019. Gas Chromatography - Mass Spectrometry (GC-MS). *ASM Handbook*, 10: 1-16.
- Li X., J.N. Ren, G. Fan, L.L. Zhang, and S.Y. Pan. 2021. Advances on (+)-nootkatone microbial biosynthesis and its related enzymes. *J Ind Microbiol Biotechnol*, 1-11.
- Li, Y., T. Meng, Y. Wang, and X. Zhang. 2016. Study on enzymatic browning in suspension cultures of licorice cells. *Biotechnology & Biotechnological Equipment*, 30(2): 277-283.
- Ligina, A.S. and Sudarmin. 2022. Isolation and Identification of Secondary Metabolic Compounds from Mangrove (*Rhizophora mucronata*) and their Bioactivity Against *Escherichia coli* and *Staphylococcus aureus* Bacteria. *Indonesian Journal of Chemical Science*, 11(1): 62-68.
- Liu, X., Y. Li, Y. Guo, Z. Zeng, B. Li, T.K. Wood, X. Cai, and X. Wang. 2015. Physiological Function of Rac Prophage During Biofilm Formation and Regulation of Rac Excision in *Escherichia coli* K-12. *Sci Rep*, 5(16074): 1-12.
- Lutfiah, A. dan N.A. Habibah. 2022. Pengaruh Pemberian Elisitor Ekstrak Khamir pada Pertumbuhan Kultur Kalus Gembili dengan Penambahan ZPT 2,4-D dan Kinetin. *Indonesian Journal of Mathematics and Natural Sciences*, 45(2): 77-83.
- Luu, W., G. Hart-Smith, L.J. Sharpe, and A.J. Brown. 2015. The terminal enzymes of cholesterol synthesis, DHCR24 and DHCR7, interact physically and functionally. *J Lipid Res*, 56(4): 888-897.

- Mahalakshmi, R., P. Eganathan, and A.K. Parida. 2013. Salicylic acid elicitation on production of secondary metabolite by cell cultures of *Jatropha curcas* L. *International Journal of Pharmacy and Pharmaceutical Sciences*, 5(4): 655-659.
- Mahmudatussa'adah, A., D. Fardiaz, N. Andarwulan, F. Kusnandar. 2015. Pengaruh Pengolahan Panas terhadap Konsentrasi Antosianin Monomerik Ubi Jalar Ungu (*Ipomoea batatas* L). *Jurnal Agritech*, 35(2): 129-136.
- Malik, S., R.M. Cusidó, M.H. Mirjlili, E. Moyano, J. Palazón, and M. Bonfill . 2011. Production of the anticancer drug taxol in *Taxus baccata* suspension cultures: A review. *Process Biochemistry*, 46(1): 23–34.
- Mardhiyetti, M., Z. Syarif, N. Jamarun, dan I. Suliansyah. 2017. Pengaruh BAP (Benzil Adenin Purin) dan NAA (Naphthalen Acetic Acid) terhadap Ekstrak Tanaman Turi (*Sesbania grandiflora*) dalam Media Multiplikasi *In Vitro*. *Pastura*, 5(1): 35-38.
- Martinez, C.S., P.D. Ribotta., & A.E. León. 2016. Influence of The Addition of Amaranthus Mantegazzianus Flour on The Nutritional and Health Properties of Pasta. *Cogent Food & Agriculture* 2(1136097): 1-12.
- Mega, I.M. and D.A. Swastini. 2010. Screening fitokimia dan aktivitas antiradikal bebas ekstrak methanol daun gaharu (*Gyrinops versteegii*). *Jurnal Kimia*, 4(2): 187-192.
- Mishra, A.K. and K.H. Baek. 2021. Salicylic Acid Biosynthesis and Metabolism: A Divergent Pathway for Plants and Bacteria. *Biomolecules*, 11(5):1-16.
- Misselwitz, M. and J. Cochran. 2011. Large Volume Splitless Injection Using an Unmodified Split/Splitless Inlet and GC-TOFMS for Pesticides and Brominated Flame Retardants. *Restek Corporation*, 1-7.
- Mora, J., S. Cuesta, A. Belhassan, S. Guillermo, T. Lakhli, M. Bouachrine, C. Peña, L. Gerli, and L. Mendoza-Huizar. 2022. Molecular Docking and Molecular Dynamics Studies of SARS-CoV-2 Inhibitors: Crocin, Digitoxigenin, Beta- Eudesmol and Favipiravir: Comparative Study. *Biointerface Research in Applied Chemistry*, 12(4): 5591-5600.
- Moreno E., J. Canet, E. Gracia, C. Lluís, J. Mallol, E.I. Canela, A. Cortés, and V. Casadó. 2018. Molecular Evidence of Adenosine Deaminase Linking Adenosine A_{2A} Receptor and CD26 Proteins. *Front Pharmacol*, 9: 1-18.
- Muhseen, Z.T., A.R. Hameed, H.M.H Al-Hasani, M.T.U. Qamar, and G. Li. 2020. Promising terpenes as SARS-CoV-2 spike receptor-binding domain (RBD) attachment inhibitors to the human ACE2 receptor: Integrated computational approach. *J Mol Liq*, 320: 1-10.
- Munasinghe, S., S. Somaratne, S. Weerakoon, C. Ranasinghe. 2021. Sustainable utilization of *Gyrinops walla* Gaertner: in vitro production of sesquiterpenes by chemical and biological elicitation. *Journal of Genetic Engineering and Biotechnology*, 19(134): 1-18.
- Munawaroh, S., L. Purwaningroom, D.R. Putri, dan C.H. Rosjidi. 2019. Prediksi Protein Target Bioaktif Ekstrak Metanol Buah Belimbing (*Averrhoa carambola*) dalam Regulasi Tekanan Darah. *Jurnal Biotek Medisiana Indonesia*, 8(1): 9-22.
- Murugan, N.A., C. Muvva, C. Jeyarajpandian, J. Jeyakanthan, and V. Subramanian. 2020. Performance of Force-Field- and Machine Learning-Based Scoring Functions in Ranking MAO-B Protein-Inhibitor Complexes

- in Relevance to Developing Parkinson's Therapeutics. *International Journal of Molecular Sciences*, 21(7648): 1-15.
- Mustika, I., A. Indrawati, dan A. Warsyidah. 2018. Uji Efektifitas Biji Kelor (*Moringa Oleifera*) Terhadap Penurunan Kadar Besi (Fe) Air Sumur Gali Di Desa Buhung Bundang Kecamatan Bontotiro Kabupaten Bulukumba. *Jurnal Media Laboran*, 8(1): 9-14.
- Najem, M., J. Ibijbjen, and L. Nassiri. 2022. Phytotherapy in response to COVID-19 and risks of intoxication: A field study in the city of Meknes (Morocco). *Journal of Pharmacy & Pharmacognosy Research*, 10: 357-386.
- Nam, D.H., D.W. Lee, C.H. Kim, S.G. Kang, H.S. Shin, and Y.M. Lee. 2016. Expression of AKR1C3 Protein in Human Keloid Skin Tissue. *Archives of Aesthetic Plastic Surgery*, 22(1): 35-39.
- Nasrollahi, I. E. Talebi, and Z. Bashardoost. 2022. In-vitro Study of Chemical Composition, Antimicrobial and Antioxidant Properties of *Adiantum capillus-veneris* L. Essential Oil. *Preprints*, 1-13.
- Nguyen, T.D., S. Riordan-Short, T.T. Dang, R. O'Brien, and M. Noestheden. 2020. Quantitation of Select Terpenes/Terpenoids and Nicotine Using Gas Chromatography–Mass Spectrometry with High-Temperature Headspace Sampling. *ACS Omega*, 5(10): 5565-5573.
- Nugraha, R., I. Faratisha, K. Mardhiyyah, D. Ariel, F. Putri, Nafisatuzzamrudah, S. Winarsih, T. Sardjono, and L. Fitri. 2020. Antimalarial Properties of Isoquinoline Derivative from *Streptomyces hygroscopicus* subsp. *Hygroscopicus*: An In Silico Approach. *BioMed Research International*, 1-15.
- Nuringtyas, T.R. 2013. *Pyrrolizidin Alkaloid Variation in Jacobaeae Plants: from Plant Organ to Cell*. Doctoral Thesis, Leiden University.
- Ogbuehi, I.H., O.O. Ebong, and A.W. Obianime. 2015. Oral acute toxicity (LD₅₀) study of different solvent extracts of *Abrus precatorius* Linn leaves in wistar rats. *European Journal of Experimental Biology*, 5(1): 18-25.
- Ohara, K., T. Fukuda, Y. Ishida, C. Takahashi, R. Ohya, M. Katayama, K. Uchida, M. Tomunaga, and K. Nagai. 2017. β -Eudesmol, an oxygenized sesquiterpene, stimulates appetite via TRPA1 and the autonomic nervous system. *Sci Rep* 7(15785): 1-16.
- Ohara K., A. Misaiz, Y. Kaneko, T. Fukuda, M. Miyake, Y. Miura, H. Okamura, J. Yajima, and A. Tsuda. 2018. β -Eudesmol, an Oxygenized Sesquiterpene, Reduces the Increase in Saliva 3-Methoxy-4-Hydroxyphenylglycol After the "Trier Social Stress Test" in Healthy Humans: A Randomized, Double-Blind, Placebo-Controlled Cross-Over Study. *Nutrients*, 11(9): 1-12.
- Oktavia, G.A.E. dan Sutomo. 2019. Ekologi jenis penghasil gaharu (*Gyrinops versteegii*) di Pulau Lombok Indonesia. <http://lipi.go.id/publikasi/ekologi-jenis-penghasil-gaharu-gyrinops-versteegii-di-pulau-lombok-indonesia-/29802>. Diakses pada Jumat, 9 April 2021 pukul 21.40 WIB.
- Okudera, Y. and M. Ito. 2009. Production of agarwood fragrant constituents in *Aquilaria calli* and cell suspension cultures. *Plant Biotechnology*, 26(3): 307-315.
- Padyana, A.K., S. Gross, L. Jin, G. Cianchetta, R. Narayanaswamy, F. Wang, R. Wang, C. Fang, X. Lv, S.A. Biller, L. Dang, C.E. Mahoney, N. Nagaraja, D. Pirman, Z. Sui, J. Popovici-Muller, and G.A. Smolen. 2019. Structure and

- inhibition mechanism of the catalytic domain of human squalene epoxidase. *Nat Commun*, 10(97) 1-10.
- Pan, Z., S.K. Wang, X.L. Cheng, X.W. Tian, and J. Wang. 2016. Caryophyllene Oxide Exhibits Anti-Cancer Effects in MG-63 Human Osteosarcoma Cells via the Inhibition of Cell Migration, Generation of Reactive Oxygen Species and Induction of Apoptosis. *Bangladesh Journal of Pharmacology*, 11(4): 817-823.
- Pandey, P., D. Singhal, F. Khan, and M. Arif. 2021. An In Silico Screening on *Piper nigrum*, *Syzygium aromaticum* and *Zingiber officinale roscoe* Derived Compounds Against SARS-CoV-2: A Drug Repurposing Approach. *Biointerface Research in Applied Chemistry*, 11(4); 11122-11134.
- Panikar, S., G. Shoba, M. Arun, J.J. Sahayarayan, A.U.R. Nanthini, A. Chinnathambi, S.A. Alharbi, O. Nasif, and H.J. Kim. 2021. Essential oils as an effective alternative for the treatment of COVID-19: Molecular interaction analysis of protease (M^{Pro}) with pharmacokinetics and toxicological properties. *J Infect Public Health*, 14(5): 601-610.
- Parikrama, R. and R. Esyanti. 2013. Effect of UV Elicitation on Callus Growth, Alkaloid and Terpenoid Contents in *Eurycoma longifolia*. *International Journal of Advances in Chemical Engg, & Biological Sciences* 1(1):12-15.
- Patel, H. and R. Krishnamurthy. 2013. Elisitors in Plant Tissue Culture. *J Pharmacogn Phytochem*, 2(2): 60-65.
- Permanasari, Y., N. Jadid, dan E.N. Prasetya. 2015. Pengaruh Asam Salisilat Dan Fenilalanin Terhadap Kandungan Total Asam Fenol Pada Kultur Suspensi Sel *Moringa oleifera* Lam. *Jurnal Sains dan Seni ITS*, 4(1): 1-6.
- Pichersky, E. and R.A.Raguso. 2018. Why do plants produce so many terpenoid compounds. *New Phytologist*, 220: 655-658.
- Pinzi, L. and G. Rastelli. 2019. Penambatan molekuler: Shifting Paradigms in Drug Discovery. *Int J Mol Sci*, 20(18): 1-23.
- Pollastri, M.P. 2010. Overview on the Rule of Five. *Current Protocols in Pharmacology*, 49: 9-12.
- Pratama, O.A., W.A.S. Tunjung, S. Sutikno, and B.S. Daryono. 2019. Bioactive compound profile of melon leaf extract (*Cucumis melo* L. 'Hikapel') infected by downy mildew. *Biodiversitas*, 20(11): 3448-3453.
- Proce, G. and D.A. Patel. 2022. *Drug Bioavailability*. StatPearls Publishing. pp: 1.
- Purwaniati, P. dan A. Asnawi. 2020. Target Kerja Obat COVID-19: Review. *Jurnal Farmagazine*, 7(2): 30-42.
- Raies, A.B. and V.B. Bajic. 2016. In silico toxicology: computational methods for the prediction of chemical toxicity. *Wiley Interdiscip Rev Comput Mol Sci*, 6(2): 147-172.
- Raj J, M. Chandra, T.D. Dogra, M. Pahuja, and A. Raina. 2013. Determination of median lethal dose of combination of endosulfan and cypermethrin in wistar rat. *Toxicol Int*, 20(1) :1-5.
- Rajesh, K.D., V. Subramanian, A. Panneerselvam, N. V. Rajesh, and N. Jeyathilakan. 2016. GC-MS Analysis of Secondary Metabolites from The Whole Plant Methanolic Extract of *Drynaria quercifolia* (L) J. Smith. *Journal of Advanced Applied Scientific Research*. 84-89.

- Rampe, H., S. Umboh, M. Rumondor, dan M. Rampe. 2019. Pemanfaatan Elisitor Ekstrak Tumbuhan dalam Budidaya Tanaman Ubi Jalar (*Ipomoea batatas* L.). *Jurnal Pengabdian Multidisiplin*, 1(1): 26-33.
- Rastini, M., N. Giantari, K. Adnyani, dan N. Laksmiani. 2019. *Molecular Docking* Aktivitas Kanker dari Kuersetin terhadap Kanker Payudara secara *In Silico*. *Jurnal Kimia Journal Of Chemistry*, 13(2): 180-184.
- Ringel, M., N. Dimos, S. Himpich, S. Himpich, M. Haack, C. uber, W. E. G. Schenk, B. Loll, and T. Bruck. 2022. Biotechnological potential and initial characterization of two novel sesquiterpene synthases from Basidiomycota *Coniophora puteana* for heterologous production of δ -cadinol. *Microb Cell Fact*, 21(64): 1-15.
- Riyadi, P.H., Romadhon, I. Sari, R. Kurniasih, T. Agustini, F. Swastawati, V. Herawati, and W. Tanod. 2021. SwissADME predictions of pharmacokinetics and drug-likeness properties of small molecules present in *Spirulina platensis*. *IOP Conference Series: Earth and Environmental Science*, 890: 1-12.
- Romano, M.T., A. Tafazzoli, M. Mattern, S. Sivalingam, S. Wolf, A. Rupp, H. Thiele, J. Altmüller, P. Nürnberg, J. Ellwanger, R. Gambon, A. Baumer, N. Kohlschmidt, D. Metze, S. Holdenrieder, R. Paus, D. Lütjohann, J. Frank, M. Geyer, M. Bertolini, P. Kokordelis, and R.C. Betz. 2018. Bi-allelic Mutations in LSS, Encoding Lanosterol Synthase, Cause Autosomal-Recessive Hypotrichosis Simplex. *Am J Hum Genet*, 103(5): 777-785.
- Sadiq, A., A. Zeb, F. Ullah, S. Ahmad, M. Ayaz, U. Rashid, N. Muhammad. 2018. Chemical Characterization, Analgesic, Antioxidant, and Anticholinesterase Potentials of Essential Oils From *Isodon rugosus* Wall. ex. Benth. *Front Pharmacol*. 9(623): 1-12.
- Santos, S., P. Barata, A. Charmier, I. Lehmann, S. Rodrigues, M.M. Melosini, P.J. Pais, A.P. Sousa, C. Teixeira, I. Santos, A.C. Rocha, P. Baylina, R. Fernandes. 2022. Cannabidiol and Terpene Formulation Reducing SARS-CoV-2 Infectivity Tackling a Therapeutic Strategy. *Front Immunol*, 13: 1-12.
- Sari, I.W., Junaidin, dan D. Pratiwi. 2020. Studi Molecular Docking Senyawa Flavonoid Herba Kumis Kucing (*Orthosiphon stamineus* B.) pada Reseptor α -Glukosidase sebagai Antidiabetes Tipe 2. *Jurnal Farmagazine*, 7(2): 54-60.
- Setiawati, T., A. Ayalla, M. Nurzaman, V. Kusumaningtyas, and I. Bari. 2020. Analysis of Secondary Metabolites of Shoot, Callus Culture and Field Plant of *Chrysanthemum morifolium* Ramat. *Jurnal ILMU DASAR*, 21(1): 1-10.
- Shaki, F., H.E. Maboud, and V. Niknam. 2019. Effects of salicylic acid on hormonal cross talk, fatty acids profile, and ions homeostasis from salt-stressed safflower. *Journal of Plant Interactions*, 14(1): 340-346.
- Shalihat, H.K. 2018. Potensi Carvacrol Dalam Daun Bangun-bangun Sebagai Antimikroba dan Imunostimulator. *CDK-270*, 45(11): 849-853.
- Sharma, A.D. and I. Kaur. 2020. Eucalyptol (1,8 cineole) from Eucalyptus Essential Oil a Potential Inhibitor of COVID 19 Corona Virus Infection by Penambatan molekuler Studies. *Preprints*, 1-8.
- Sharma, H., and B.D. Vashistha. 2015. Plant Tissue Culture: A Biological Tool for Solving The Problem of Propagation of Medicinally Important Woody Plants - A Review. *Advanced Research*, 3(2): 402-411.

- Silvina, F., Isnaini, dan W. Ningsih. 2022. Induksi kalus daun binahong merah (*Basella rubra* L.) dengan pemberian 2,4-D dan kinetin. *Jurnal Agro*, 8(2): 274-286.
- Sitepu, I.R., E. Santoso and M. Turjaman. 2011. *Identification of Eaglewood (Gaharu) Tree Species Susceptibility*. Indonesia's Work Programme. Bogor. pp: 1,3,23.
- Su Y.C., K.P. Hsu, E.I. Wang, C.L. Ho. 2015. Composition, in vitro Cytotoxic, and Antimicrobial Activities of the Flower Essential Oil of *Diospyros discolor* from Taiwan. *Nat Prod Commun*. 10(7): 1311-13144.
- Suhartati, T. 2017. *Dasar-dasar Spektrofotometri UV-Vis dan Spektrometri Massa untuk Penentuan Struktur Senyawa Organik*. Penerbit Aura. Bandar Lampung. pp: 2.
- Suhud, Farida., D.H. Tjahjono, T. Yuniarta, G. Putra, and J. Setiawan. 2019. Penambatan molekuler, drug-likeness, and ADMET study of 1-benzyl-3-benzoylurea and its analogs against VEGFR-2. *IOP Conference Series: Earth and Environmental Science*, 293: 1-9.
- Sulastris, H. Riza, and I. Fajriaty. 2019. Study In Silico Flavonoid Derivate Compounds on The Enzyme HMG-CoA Reductase. *Jurnal Mahasiswa Farmasi Kedokteran UNTAN*, 4(1): 1-7.
- Sulichantini, E.D. 2015. Produksi Metabolit Sekunder Melalui Kultur Jaringan. *Proceeding of Mulawarman Pharmaceuticals Conferences*, 1(1): 205-212.
- Sun W., C. Hu, T. Wang, J. Wang, J. Zhang, F. Gao, Q. Ou, H. Tian, C. Jin, J. Xu, J. Zhang, G.T. Xu, and L. Lu. 2021. Glia Maturation Factor Beta as a Novel Biomarker and Therapeutic Target for Hepatocellular Carcinoma. *Front Oncol*, 11: 1-16.
- Susanto, H., V. Kharisma, D. Listyorini, A. Taufiq, Sunaryono, and A. Aulani. 2018. Effectivity of Black Tea Polyphenol in Adipogenesis Related IGF-1 and Its Receptor Pathway Through In Silico Based Study. *Journal of Physics Conference Series*. 1093: 1-13.
- Susilo, A., T. Kalima and E. Santoso. 2014. *Panduan lengkap pengenalan jenis pohon penghasil Gaharu *Gyrinops* spp. di Indonesia*. Pusat Penelitian dan Pengembangan Konservasi dan Rehabilitasi. Bogor. pp: 1,14,27.
- Syaban, M.F.R., I.F.D. Faratisha, K.C. Yunita, N.E. Erwan, B.D. Kuriniawan, and G.F.A. Putra. 2022. Penambatan molekuler and Interaction Analysis of Propolis Compounds Against SARS-CoV-2 Receptor. *Journal of Tropical Life Science*, 12(2): 219-230.
- Szklarczyk, D., A. Santos, C. Mering, L.J. Jensen, P. Bork, and M. Kuhn. 2016. STITCH 5: augmenting protein-chemical interaction networks with tissue and affinity data. *Nucleic Acids Res*, 44: 380-384.
- Szymczyk, P., G. Szymanska, E. Kochan, J. Szemraj, and R. Grąbkowska. 2021. Elicitation of solid callus cultures of *Salvia miltiorrhiza* Bunge with salicylic acid and a synthetic auxin (1-naphthaleneacetic acid). *Plant Cell, Tissue and Organ Culture (PCTOC)*. 147: 1-12.
- Talamond, P., J.L. Verdeil, G. Conejero. 2015. Secondary metabolite localization by autofluorescence in living plant cells. *Molecules*, 20(3): 5024-5037.

- Teonata, N., V. Wijaya, V. Vitaloka, M. Attamimi, and M. Kartikawati. 2021. An introduction of different types of gas chromatography. *Jurnal Sains dan Terapan Kimia*, 15(1):8-17.
- Thabet A.A., S. Moghannem, I.M. Ayoub, F.S. Youssef, E. Al Sayed, A.N.B. Singab. 2022. GC/MS profiling of essential oils from *Bontia daphnoides* L., chemometric discrimination, isolation of dehydroepingaione and evaluation of antiviral activity. *Sci Rep*, 12(17707): 1-14.
- Thakur, M. and B.S. Sohal. 2013. Role of Elisitors in Inducing Resistance in Plants against Pathogen Infection: A Review. *ISRN Biochem*, 1-10.
- Tomko, A.M., E.G. Whynot, L.D. Ellis, and D.J. Dupre. 2020. Anti-Cancer Potential of Cannabinoids, Terpenes, and Flavonoids Present in Cannabis. *Cancers (Basel)*, 12(7): 1-81.
- Venkatraman, V. 2021. FP-ADMET: a compendium of fingerprint-based ADMET prediction models. *J Cheminform*, 13(75): 1-12.
- Vincent, S., S. Arokiyaraj, M. Saravanan, M. Dhanraj. 2020. Molecular Docking Studies on the Anti-viral Effects of Compounds From *Kabasura Kudineer* on SARS-CoV-2 3CL^{pro}. *Front Mol Biosci*, 7: 1-12.
- Wahyuni, A., B. Satria, dan A. Zainal. 2020. Induksi Kalus Gaharu dengan NAA dan BAP Secara In Vitro. *Agrosains Jurnal Penelitian Agronomi*, 22(1): 39 – 44.
- Wang, P., Q. Luo, H. Qiao, H. Ding, Y. Cao, J. Yu, R. Liu, Q. Zhang, H. Zhu, L. Qu. 2017. The Neuroprotective Effects of Carvacrol on Ethanol-Induced Hippocampal Neurons Impairment via the Antioxidative and Antiapoptotic Pathways. *Oxidative Medicine and Cellular Longevity*, 2017: 1-17.
- Wang, G., B. Xiao, J. Deng, L. Gong, Y. Li, J. Li, and Y. Zhong. 2022. The Role of Cytochrome P450 Enzymes in COVID-19 Pathogenesis and Therapy. *Front Pharmacol*, 13(791922): 1-15.
- Wardana, T.A.P., T.R. Nuringtyas, N. Wijayanti and L. Hidayati. 2019. Phytochemical analysis of agarwood (*Gyrinops versteegii* (Gilg.) Domke) leaves extracts as anticancer using GC-MS. *AIP Conference Proceedings* 2194, 020136 (2019); doi.org/10.1063/1.5139868.
- Wardani, D.P., Solichatun and A.D. Setyawan. 2004. Pertumbuhan dan produksi saponin kultur kalus *Talinum paniculatum* Gaertn. pada variasi penambahan asam 2,4-diklorofenoksi asetat (2,4-D) dan kinetin. *Biofarmasi*, 2(1): 35-43.
- Xiong, G., Z. Wu, J. Yi, L. Fu, Z. Yang, C. Hsieh, M. Yin, X. Zeng, C. Wu, A. Lu, X. Chen, T. Hou, and D. Cao. 2021. ADMETlab 2.0: an integrated online platform for accurate and comprehensive predictions of ADMET properties. *Nucleic Acids Res*, 49: 5-14.
- Xiong, Q., L. Cao, C. Ma, M.A Tortorici, C. Liu, J. Si, P. Liu, M. Gu, A.C. Walls, C. Wang, L. Shi, F. Tong, M. Huang, J. Li, C. Zhao, S. Shen, Y. Chen, H. Zhao, K. Lan, D. Corti, D. Veisler, X. Wang, and H. Yan. 2022. Close relatives of MERS-CoV in bats use ACE2 as their functional receptors. *Nature*, 612: 748-757.
- Yelnititis. 2014. Perbanyakan tunas *Gyrinops versteegii* (Gilg.) Domke. *Jurnal Pemuliaan Tanaman Hutan*, 8(2): 108-120.
- Yueniwati, Y., M. Syaban, N. Erwan, G. Putra, and A. Krisnayana. 2021. Penambatan molekuler Analysis of *Ficus religiosa* Active Compound with Anti-Inflammatory Activity by Targeting Tumour Necrosis Factor Alpha

- and Vascular Endothelial Growth Factor Receptor in Diabetic Wound Healing. *Open Access Macedonian Journal of Medical Sciences*, 9: 1031-1036.
- Yunita, E., D. Yulianto, S. Fatimah, and T. Firanita. 2020. Validation of UV-Vis Spectrophotometric Method of Quercetin in Ethanol Extract of Tamarind Leaf. *Journal of Fundamental and Applied Pharmaceutical Science*, 1(1): 11-18.
- Yin C., B. Liu, P. Wang, X. Li, Y. Li, X. Zheng, Y. Tai, C. Wang, and B. Liu. 2020. Eucalyptol alleviates inflammation and pain responses in a mouse model of gout arthritis. *Br J Pharmacol*, 177(9): 2042-2057.
- Zeng Y., Y. Pan, B. Zhang, Y. Luo, J. Tian, Y. Wang, X. Ju, J. Wu, and Y. Li. 2022. Integrating Network Pharmacology, Penambatan molekuler, and Experimental Validation to Investigate the Mechanism of (-)-Guaiol Against Lung Adenocarcinoma. *Med Sci Monit*, 28: 1-29.
- Ziraluo, Y.P.B. 2021. Metode Perbanyakan Tanaman Ubi Jalar Ungu (*Ipomea batatas poiret*) dengan Teknik Kultur Jaringan atau Stek Planlet. *Jurnal Inovasi Penelitian*, 2(3): 1037-1046.
- Zou, L., L. Li, and T.D. Porter. 2011 7-Dehydrocholesterol reductase activity is independent of cytochrome P450 reductase. *J Steroid Biochem Mol Biol*, 127(3-5):435-438.
- Zuo, D., J. Subjeck, and X.Y. Wang. 2016. Unfolding the Role of Large Heat Shock Proteins: New Insights and Therapeutic Implications. *Front Immunol*, 7(75): 1-15.