

DAFTAR PUSTAKA

- Abdel-Naim, A., Khalifa, A. & Ahmed, S. 2002, 'Protective Effects of Garlic Oil against Liver Damage Induced by Combined Administration of Ethanol and Carbon Tetrachloride in Rats', *The Egyptian Journal of Hospital Medicine*, vol. 6, no. 1, pp. 27–36.
- Adiwinata, R., Kristanto, A., Christianty, F., Richard, T. & Edbert, D. 2015, 'Tatalaksana Terkini Perlemakan Hati Non Alkoholik', *Jurnal Penyakit Dalam Indonesia*, vol. 2, no. 1, p. 53.
- Ahmad, W., Khan, I., Khan, M.A., Ahmad, M., Subhan, F. & Karim, N. 2014, 'Evaluation Of Antidiabetic and Antihyperlipidemic Activity of Artemisia Indica Linn (Aerial Parts) in Streptozotocin Induced Diabetic Rats', *Journal of Ethnopharmacology*, vol. 151, no. 1, pp. 618–23.
- Araújo, A.R., Rosso, N., Bedogni, G., Tiribelli, C. & Bellentani, S. 2018, 'Global Epidemiology of Non-Alcoholic Fatty Liver Disease/Non-Alcoholic Steatohepatitis: What We Need in The Future', *Liver International*, vol. 38, no. November 2017, pp. 47–51.
- Asrani, S.K., Devarbhavi, H., Eaton, J. & Kamath, P.S. 2019, 'Burden Of Liver Diseases in the World', *Journal of Hepatology*, vol. 70, no. 1, pp. 151–71.
- Baradero, M., Dayrit, M.W. & Siswadi, Y. 2008, *Klien Gangguan Hati : Seri Asuhan Keperawatan*, M. Ester (ed.), Penerbit Buku Kedokteran: EGC, Jakarta.
- Bourne, R.H. & Zastrow, V.M. 2001, *Reseptor dan Farmakodinamika Obat. Dalam Farmakologi Dasar dan Klinik Edisi I*, B.G. Katzung (ed.), 1st edn, Salemba Medika, Jakarta.
- Choi, I.S., Cha, H.S. & Lee, Y.S. 2014, 'Physicochemical and Antioxidant Properties of Black Garlic', *Molecules*, vol. 19, no. 10, pp. 16811–23.
- Derelanko, M.J. & Auletta, C.S. 2014, *Handbook of Toxicology Third Edition*, 3rd edn, CRC Press.
- Elmalí, E., Altam, N. & Bukan, N. 2004, 'Effect of the sulphonylurea glibenclamide on liver and kidney antioxidant enzymes in streptozocin-induced diabetic rats', *Drugs in R and D*, vol. 5, no. 4, pp. 203–8.
- Esparza-Perusquía, M., Alejandra Sánchez-Muñoz, M., Olvera-Sánchez, S., Sierra-

- Campos, E., Avitia-Domínguez, C., Flores-Herrera, Ó., Valdez-Solana, M.A., Téllez-Valencia, A., Campos-Almazán, M.I. & García-Arenas, G. 2018, 'Streptozotocin-Induced Adaptive Modification of Mitochondrial Supercomplexes in Liver of Wistar Rats and the Protective Effect of *Moringa oleifera* Lam', *Biochemistry Research International*, vol. 2018, pp. 1–15.
- Feng, X., Chun-Hua, D., Fu-Rong, H., Pei-Pei, Z., Rong-Hai, H. & Hai-Le, M. 2018, 'Study on The Ageing Method and Antioxidant Activity of Black Garlic Residues', *Czech Journal of Food Sciences*, vol. 36, no. No. 1, pp. 88–97.
- Firdaus, M. 2017, *Diabetes dan Rumput Laut Cokelat*, T.U. Press (ed.), UB Press, Malang.
- Fitri, N.L., Susetyarini, R.E. & Waluyo, L. 2017, 'The Effect of Ciplukan (*Physalis angulata* L.) Fruit Extract on SGPT and SGOT Levels Against White Male Mice (*Mus Musculus*) Hyperglycemia Induced By Alloxan As Biology Learning Resources', *Jurnal Pendidikan Biologi Indonesia*, vol. 2, no. 2, pp. 180–7.
- Gajdošík, A., Gajdošíková, A., Štefek, M., Navarová, J. & Hozová, R. 1999, 'Streptozotocin-Induced Experimental Diabetes in Male Wistar Rats', *General Physiology and Biophysics*, vol. 18, no. SPEC. ISS., pp. 54–62.
- Ghanbari, E., Nejati, V. & Khazaei, M. 2016, 'Improvement in Serum Biochemical Alterations and Oxidative Stress Of Liver And Pancreas Following Use of Royal Jelly in Streptozotocin-Induced Diabetic Rats', *Cell Journal*, vol. 18, no. 3, pp. 362–70.
- Goboza, M., Aboua, Y.G., Chegou, N. & Oguntibeju, O.O. 2019, 'Vindoline Effectively Ameliorated Diabetes-Induced Hepatotoxicity by Docking Oxidative Stress, Inflammation And Hypertriglyceridemia in Type 2 Diabetes-Induced Male Wistar Rats', *Biomedicine and Pharmacotherapy*, vol. 112, no. January, p. 108638.
- Harnani, Y. & Rasyid, Z. 2015, *Statistik Dasar Kesehatan*, Deepublish Publisher, Yogyakarta.
- Kim, M.H., Kim, M.J., Lee, J.H., Han, J. Il, Kim, J.H., Sok, D.E. & Kim, M.R. 2011, 'Hepatoprotective Effect of Aged Black Garlic on Chronic Alcohol-Induced Liver Injury in Rats', *Journal of Medicinal Food*, vol. 14, no. 7–8, pp.

732–8.

- Kim, W.R., Flamm, S.L., Di Bisceglie, A.M. & Bodenheimer, H.C. 2008, 'Serum Activity of alanine Aminotransferase (ALT) as an Indicator of Health and Disease', *Hepatology*, vol. 47, no. 4, pp. 1363–70.
- Kimura, S., Tung, Y.C., Pan, M.H., Su, N.W., Lai, Y.J. & Cheng, K.C. 2017, 'Black Garlic: A Critical Review of its Production, Bioactivity, and Application', *Journal of Food and Drug Analysis*, vol. 25, no. 1, pp. 62–70.
- Kohl, T., Gehrke, N., Schad, A., Nagel, M., Wörns, M.A., Sprinzl, M.F., Zimmermann, T., He, Y.W., Galle, P.R., Schuchmann, M. & Schattenberg, J.M. 2013, 'Diabetic Liver Injury From Streptozotocin is Regulated Through The Caspase-8 Homolog Cflip Involving Activation of JNK2 and Intrahepatic Immunocompetent Cells', *Cell Death and Disease*, vol. 4, no. 7.
- Licata, A., Macaluso, F.S. & Craxì, A. 2013, 'Herbal Hepatotoxicity: A Hidden Epidemic', *Internal and Emergency Medicine*, vol. 8, no. 1, pp. 13–22.
- Liu, Z., Que, S., Xu, J. & Peng, T. 2014, 'Alanine Aminotransferase-Old Biomarker and New Concept: A Review', *International Journal of Medical Sciences*, vol. 11, no. 9, pp. 925–35.
- Lopez-Castejon, G. & Brough, D. 2011, 'Understanding the Mechanism Of IL-1 β Secretion', *Cytokine and Growth Factor Reviews*, vol. 22, no. 4, pp. 189–95.
- Makena, W., Hamman, W.O., Buraimoh, A.A., Dibal, N.I. & Obaje, S.G. 2018, 'Therapeutic Effects of Balanitoside in Streptozotocin-Induced Diabetic Rats', *Journal of Taibah University Medical Sciences*, vol. 13, no. 4, pp. 402–6.
- Mendes-Braz, M. & Martins, J.O. 2018, 'Diabetes Mellitus And Liver Surgery: The Effect of Diabetes on Oxidative Stress and Inflammation', *Mediators of Inflammation*, vol. 2018, pp. 1–11.
- Moghaddasifar, I., Lankarani, K.B., Moosazadeh, M., Afshari, M., Ghaemi, A., Aliramezany, M., Afsar Gharebagh, R. & Malary, M. 2016, 'Prevalence of Non-Alcoholic Fatty Liver Disease and its Related Factors in Iran', *International Journal of Organ Transplantation Medicine*, vol. 7, no. 3, pp. 149–60.
- Mohamed, J., Nazratun Nafizah, A.H., Zariyantey, A.H. & Budin, S.B. 2016, 'Mechanisms of Diabetes-Induced Liver Damage: The Role of Oxidative

- Stress and Inflammation', *Sultan Qaboos University Medical Journal*, vol. 16, no. 2, pp. e132–41.
- Mokdad, A.A., Alan D. Lopez, Shahraz, S., Lozano, R., Mokdad, A.H., Stanaway, J., Murray, C.J. & Naghavi, M. 2014, 'Liver Cirrhosis Mortality in 187 Countries Between 1980 And 2010: A Systematic Analysis', *BMC Medicine*, vol. 12, no. 1, p. no pagination.
- Muriel, P. 2009, 'Role of Free Radicals in Liver Diseases', *Hepatology International*, vol. 3, no. 4, pp. 526–36.
- Naji, K.M., Al-Shaibani, E.S., Alhadi, F.A., Al-Soudi, S.A. & D'souza, M.R. 2017, 'Hepatoprotective and Antioxidant Effects of Single Clove Garlic Against Ccl4-Induced Hepatic Damage in Rabbits', *BMC Complementary and Alternative Medicine*, vol. 17, no. 1, pp. 1–12.
- Naskar, S., Mazumder, U.K., Pramanik, G., Gupta, M., Suresh Kumar, R.B., Bala, A. & Islam, A. 2011, 'Evaluation of Antihyperglycemic Activity of Cocos Nucifera Linn. on Streptozotocin Induced Type 2 Diabetic Rats', *Journal of Ethnopharmacology*, vol. 138, no. 3, pp. 769–73.
- Nithiya, T. & Udayakumar, R. 2018, 'Hepato and Renal Protective Effect of Phloretin on Streptozotocin Induced Diabetic Rats', *Journal of Biomedical and Pharmaceutical Sciences*, vol. 1, no. 1, pp. 1–6.
- Oktora, L., Kumala, R., Staf, S., Program, P., Farmasi, S. & Pendahuluan, U.J. 2006, 'Pemanfaatan Obat Tradisional Dengan Pertimbangan Manfaat dan Keamanannya', *Majalah Ilmu Kefarmasian*, vol. III, no. 1, pp. 1–7.
- Parameswaran, N. & Patial, S. 2010, 'Tumor Necrosis Factor-A Signaling in Macrophages', *NIH Public Access*, vol. 39, no. 2, pp. 415–9.
- Pidada, I.A.A., Setiasih, N.L.E. & Winaya, I.B.O. 2018, 'Daun Kelor Memperbaiki Histopatologi Hati Tikus Putih yang Mengalami Diabetes Melitus', *Buletin Veteriner Udayana*, vol. 10, no. 1, p. 50.
- Prat, L.I. & Tsochatzis, E.A. 2018, *The effect of antidiabetic medications on non-alcoholic fatty liver disease (NAFLD)*, pp. 219–29.
- Prihanti, G.S. 2016, *Pengantar Biostatistika*, Penerbit Universitas Muhammadiyah Malang, Malang.
- Prihanti, G.S., Isnaini, F., Yudistia, R., Faradilla, A. & Rahman, M. 2019, 'Effect

- of Black Garlic Extract on Blood Glucose , Lipid Profile , and SGPT-SGOT of Wistar Rats Diabetes Mellitus Model', *Majalah Kedokteran Bandung*, vol. 51, no. 188.
- Quezada, N., Asencio, M., Valle, J.M., Aguilera, J.M. & Gómez, B. 2006, 'Antioxidant Activity of Crude Extract, Alkaloid Fraction, and Flavonoid Fraction from Boldo (*Peumus boldus* Molina) Leaves', *Journal of Food Science*, vol. 69, no. 5, pp. C371–6.
- Ragbetli, C. & Ceylan, E. 2010, 'Effect of Streptozotocin on Biochemical Parameters in Rats', *Asian Journal of Chemistry*, vol. 22, no. 3, pp. 2375–8.
- Rahman, A.O. 2018, 'Efek Pemberian Tunggal Pinang Muda Dosis Tinggi Pada Hepar Tikus', *Jambi Medical Journal*, vol. 6, no. 2, pp. 132–6.
- Reyes-Gordillo, K., Shah, R. & Muriel, P. 2017, 'Oxidative Stress and Inflammation in Hepatic Diseases: Current and Future Therapy', *Oxidative Medicine and Cellular Longevity*, vol. 2017, no. ii, pp. 2–4.
- Riley, R.T. & Voss, K.A. 2006, 'Differential Sensitivity of Rat Kidney and Liver to Fumonisin Toxicity: Organ-Specific Differences in Toxin Accumulation and Sphingoid Base Metabolism', *Toxicological Sciences*, vol. 92, no. 1, pp. 335–45.
- Rohmatin, A.R., Susetyarini, E. & Hadi, S. 2015, 'Kerusakan Sel Hepar Tikus Putih Jantan (*Rattus Norvegicus*) yang Di Induksi Karbon Tetraklorida (CCL_4) Setelah Diberi Ekstrak Etanol Bawang Dayak (*Eleutherine Palmifolia* Merr.)', *PS Pendidik-FKIP-UMM*, pp. 942–7.
- Roy, V., Biswas, J. & Saraf, A. 2018, *Study of Liver Functions Parameters in Diabetic Patients from Raipur Region*, vol. 8, no. 10, pp. 18–21.
- Ryu, J.H. & Kang, D. 2017, 'Physicochemical Properties, Biological Activity, Health Benefits, and General Limitations of Aged Black Garlic: A Review', *Molecules*, Vol. 22, No. 6.
- Saeed, M.K., Deng, Y. & Dai, R. 2008, 'Attenuation of Biochemical Parameters in Streptozotocin-Induced Diabetic Rats by Oral Administration of Extracts and Fractions of *Cephalotaxus Sinensis*', *Journal of Clinical Biochemistry and Nutrition*, vol. 42, no. 1, pp. 21–8.
- Samsu, N. 2018, *Patogenesis Penyakit Ginjal Diabetik*, UB Press, Malang.

- Saputra, N.T., Suartha, I.N. & Dharmayudha, A.A.G.O. 2018, 'Agen Diabetagonik Streptozotocin untuk Membuat Tikus Putih Jantan Diabetes Mellitus', *Buletin Veteriner Udayana*, vol. 10, no. 2, pp. 116–21.
- Saravanan, G. & Ponmurugan, P. 2013, 'S-Allylcysteine Improves Streptozotocin-Induced Alterations of Blood Glucose, Liver Cytochrome P450 2E1, Plasma Antioxidant System, and Adipocytes Hormones in Diabetic Rats', *International Journal of Endocrinology and Metabolism*, vol. 11, no. 4, pp. 1–8.
- Sargowo, D. 2015, *Patogenesis aterosklerosis*, D. Sargowo (ed.), UB Press, Malang.
- Saryono 2011, *Metodologi Penelitian Keperawatan*, UPT. Percetakan dan Penerbitan Unsoed, Purwokerto.
- Shin, J.H., Lee, C.W., Oh, S.J., Yun, J., Kang, M.R., Han, S.B., Park, H., Jung, J.C., Chung, Y.H. & Kang, J.S. 2014, 'Hepatoprotective Effect of Aged Black Garlic Extract in Rodents', *Toxicological Research*, vol. 30, no. 1, pp. 49–54.
- Sudiana, I.K. 2008, *Patobiologi Molekuler Kanker*, Salemba Medika, Jakarta.
- Syarief, E., Duryatmo, S., S., D.A., Angkasa, S., Setyawan, B. & Rizkika, K. 2013, *My Healthy Life: Ahli Atasi Kolesterol, Hipertensi, Diabetes*, PT. Trubus Swadaya, Depok.
- Thapa, B.R. & Walia, A. 2007, *Liver Function Tests and their Interpretation*, vol. 74, pp. 67–75.
- Tran, G.-B., Dam, S.-M. & Le, N.-T.T. 2018, 'Amelioration of Single Clove Black Garlic Aqueous Extract on Dyslipidemia and Hepatitis in Chronic Carbon Tetrachloride Intoxicated Swiss Albino Mice', *International Journal of Hepatology*, vol. 2018, pp. 1–9.
- Tsai, C.W., Chen, H.W., Sheen, L.Y. & Lii, C.K. 2012, 'Garlic: Health Benefits and Actions', *BioMedicine (Netherlands)*, vol. 2, no. 1, pp. 17–29.
- Tsai, J.C., Chen, Y.A., Wu, J.T., Cheng, K.C., Lai, P.S., Liu, K.F., Lin, Y.K., Huang, Y.T. & Hsieh, C.W. 2019, 'Extracts from Fermented Black Garlic Exhibit a Hepatoprotective Effect on Acute Hepatic Injury', *Molecules*, vol. 24, no. 6, pp. 1–13.
- Ullah, A., Khan, A. & Khan, I. 2016, 'Diabetes Mellitus and Oxidative Stress — A

- concise review', *Saudi Pharmaceutical Journal*, vol. 24, no. 5, pp. 547–53.
- Wahyu, W. 2008, 'Potensi Antioksidan Sebagai Antidiabetes', *Potensi Antioksidan sebagai Antidiabetes*, vol. 7, pp. 1–11.
- WHO 2017, 'Liver Disease Death Rate by Country', *Causes of Death, Health Profile, Life Expectancy*, viewed <<https://causesofdeathin.com/liver-disease-death-rate-by-country/2>>.
- Yakhchalian, N., Hatami, K., Nosrati, H. & Yousofvand, N. 2018, *Hematological and Serum Biochemical Analysis of Streptozotocin-Induced Insulin Dependent Diabetes Mellitus in Male Adult Wistar Rats*, no. Iddm.
- Yazdi, H.B., Hojati, V., Shiravi, A., Hosseinian, S., Vaezi, G. & Hadjzadeh, M.-A.-R. 2019, 'Liver Dysfunction and Oxidative Stress in Streptozotocin-Induced Diabetic Rats: Protective Role of Artemisia Turanica', *Journal of pharmacopuncture*, vol. 22, no. 2, pp. 109–14.
- Zafar, M., Naeem-ul-Hassan Naqvi, S., Ahmed, M. & Kaimkhani, Z.A. 2009, 'Altered Kidney Morphology and Enzymes in Streptozotocin Induced Diabetic Rats', *International Journal of Morphology*, vol. 27, no. 3, pp. 719–25.
- Zhafira, R. 2018, 'Effect of Aging Time on Physical , Chemical , and Antioxidant Activity of Single Clove Black Garlic Product', *Jurnal Pangan dan Agroindustri*, vol. 6, no. 1, pp. 34–42.