



DAFTAR PUSTAKA

- Adelina, Nelsi, Harum, Fransiskus, Schmidt, Lars Holger, & Jøker, Dorthe, 2004, *Aquilaria malaccensis Lam.*, *Seed Leaflet*, **103**, University of Copenhagen
- Alam, Janey, Mujahid, Md., Badruddeen, Jahan, Yasmeen, Bagga, Paramdeep, & Rahman, Md. Aziz, 2016, Hepatoprotective Potential of Ethanolic Extract of *Aquilaria agallocha* Leaves Against Paracetamol Induced Hepatotoxicity in SD rats, *Journal of Traditional and Complementary Medicine*, **XXX**, 1-5.
- Alam, M.N., Bristi, N.J., & Rafiquzzaman, M., 2013, Review on *in vivo* and *in vitro* Methods Evaluation of Antioxidant Activity, *Saudi Pharmaceutical Journal*, **21**, 143-152.
- Amarowicz, R., Naczk, M., & Shalhidi, F., 2000, Antioxidant Activity of Crude Tannins of Canola and Rapeseed Hulls, *JAOCs*, **77**, 957-961.
- Andersen, Øyvind M. & Markham, Kenneth R., 2006, *Flavonoids: Chemistry, Biochemistry, and Application*, CRC Press, Boca Raton.
- Anonim, 2005, *Material Safety Data Sheet Methyl Alcohol MSDS*, <http://www.sciencelab.com/msds.php?msdsId=9927227>, 13 Oktober 2015.
- Apak, R., Gorinstein, S., Böhm, V., Schaich, K.M., Özyürek, M., & Güçlü, K., 2013, Methods of Measurement and Evaluation of Natural Antioxidant Capacity/Activity (IUPAC Technical Report), *Pure Appl. Chem.*, **85** (5), 957-998.
- Barden, Angela, Anak, Noorainie Awang, Mulliken, Teresa, & Song, Michael, 2000, *Heart of The Matter: Agarwood Use and Trade and CITES Implementation for Aquilaria malaccensis*, 1-2, TRAFFIC International, Cambridge.
- Birben, Esra, Sahiner, Umit Munat, Sackesen, Cansin, Erzurum, Serpil, & Kalayci, Omer, 2012, Oxidative Strees and Antioxidant Defense, *World Allergy Organization Journal*, **5**, 9-19.
- Chang, Chia-chi, Yang, Ming-hua, Wen, Hwei-mei, & Chern, Jiing-chuan, 2002, Estimation of Total Flavonoid Content in Propolis by Two Complementary Colorimetric Methods, *Journal of Food and Drug Analysis*, **10** (3), 178-182.
- Convention on International Trade in Endangered Species of Wild Fauna and Flora (CITES), 2009, *Aquilaria malaccensis* (Agarwood), <https://cites.org/eng/node/17934>, 18 April 2016.
- Dai, J. & Mumper, R.J., 2010, Plant Phenolics: Extraction, Analysis and Thei Antioxidant and Anticancer Properties, *Molecules*, **15**, 7313-7352.



- Dash, Manasi, Patra, Jayanta Kumar, & Panda, Prasanna Priyadarshini, 2008, Phytochemical and antimicrobial screening of extracts of *Aquilaria agallocha Roxb.*, *African Journal of Biotechnology*, **7** (20), 3531-3534.
- Depkes., 1986, *Sediaan Galenika*, 1-8, Departemen Kesehatan Republik Indonesia, Jakarta.
- Depkes., 2000, *Parameter Standar Umum Ekstrak Tumbuhan Obat*, 1-12, Departemen Kesehatan Republik Indonesia, Jakarta.
- Duin, C. F. Van, 1954, *Buku Penuntun Ilmu Resep dalam Praktek dan Teori*, diterjemahkan oleh K. Satiadarma, S.P. Nainggolan, dan E. Wangsaputra, Cetakan Kedua, 73-74, Soeroengen, Jakarta.
- Durga, Devi M. & Banu, Narasimhan, 2015, Study of Antioxidant Activity of Chlorophyll from Medicinal Plants, *Indian Journal of Research*, **4** (2), 6-8.
- Farago, R.S., Badel, A.Z.A, & Baroty, G.S.A, 1989, Antioxidants Activity of Some Spice Essential Oil on Linoleic Acid Oxidation in Aqueous Media, *JAOCs*, **66**, 792-799.
- Farmer, Edward E., 2014, *Leaf Defence*, Oxford University Press, Inggris.
- Fatmawati & Hidayat, Rachmat, 2016, Anticancer Activity of *Aquilaria malaccensis* Leaves on Human Cervical Cancer Cells, *European Journal of Pharmaceutical and Medical Research*, **3** (1), 46-49.
- Fessenden, R.J. & Fessenden J.S., 1995, *Kimia Organik Jilid II Edisi Ketiga*, 119-220, penerjemah: A.H., Pujaatmaka, Penerbit Erlangga, Jakarta.
- Fidrianny, Irida, Harnovi, Monika, & Insanu, M., 2014, Evaluation of Antioxidant Activities from Various Extract of Sweet Orange Peels Using DPPH, FRAP Assay and Correlation with Phenolic, Flavonoid, Carotenoid Content, *Asian Journal of Pharmaceutical and Clinical Research*, **7** (3), 186-190.
- Fried, B. & Sherma, J., 1994, *Thin Layer Chromatography Techniques and Applications*, 1-6, Marcel Dekker Inc., New York.
- Halliwell, B., & Gutteridge, J.M.C., 2000, *Free Radical in Biology and Medicine*, 3rd ed., 796-798, Oxford University Press, New York.
- Harborne, 1987, *Metode Fitokimia: Penunun Cara Modern Menganalisis Tumbuhan*, 4-636, penerjemah K., Padmawinata, Penribit ITB, Bandung.
- Hegnauer, R., 1973, *Chemotaxonomie der Pflanzen: Eine Übersicht die Verbreitung und die systematische Bedeutung der Pflanzenstoffe Band 6*, 508-515, Springer, Basel.



International Union Conservation of Nature (IUCN), 1998, *Aquilaria malaccensis, Lign-aloes*, <http://www.iucnredlist.org/details/32056/0>, 26 September 2015.

Kahkonen, M.P., Hopia, A.I., & Fuorella, H.C., 1999, Antioxidant Activity of Extract Containing Phenolic Compound, *Agric. Food Chem.*, **47**, 3954-3962.

Kar, Ashutosh, 2007, *Pharmacognosy and Pharmacobiotechnology*, 306-309, New Age International Publisher, New Delhi.

Kemenkes., 2013, *Farmakope Herbal Indonesia Suplemen III*, Edisi I, 99-114, Kementerian Kesehatan Republik Indonesia, Jakarta.

Khalil, A.S., Rahim, A.A., Taha, K.K., & Abdallah, K.B., 2013, Characterization of Methanolic Extracts of Agarwood Leaves, *Journal of Applied and Industrial Sciences*, **1** (3), 78-88.

Lestariana, W., 2003, Peran Antioksidan pada Proses Penuaan, *Berkala Neurosains*, **5**, 1-5.

Li, Cheng-Ta, Ka, Chiu-Li, Liu, Chi-Ming, Li, Wei-Jen, Li, Hsing-Tan, & Wu, Hui-Ming, 2015, Secondary Metabolites from The Leaves of *Aquilaria agallocha*, *Journal of Advanced in Chemistry*, **11** (3), 3552-3556.

Mabry, T.J., Markham, K.R., & Thomas, M.B., 1970, *The Systematic Identification of Flavonoid*, 50-52, Springer-Verlag, Berlin.

Marxen, Kai, Vanselow, Klaus Heinrich, Lippemeier, Sebastian, Hintze, Ralf, Ruser, Andreas, & Hansen, Ulf-Peter, 2007, Determination of DPPH Radical Oxidation Caused by Methanolic Extracts of Some Microalgal Species by Linear Regression Analysis of Spectrophotometric Mesurements, *Sensors*, **7** (10), 2080-2095.

McMurry, John, 2008, *Organic Chemistry*, Edisi 7, 35-66, Thomson Learning Inc., Amerika Serikat.

Medicinal Plants of Bangladesh Database (MPBD), 2016, *Aqilaria malaccensis Lam.*, <http://www.mpbd.info/plants/aquilaria-malaccensis.php>, 4 Mei 2016.

Molyneux, Philip, 2004, The Use of Stable Free Radical Diphenylpicrylhydrazyl (DPPH) for Estimating Antioxidant Activity, *Songklanakarin J. Sci. Technol.*, **26** (2), 211-219.

Moosa, Salmah, 2010, Phytochemical and Antioxidant Screening of Extracts of *Aquilaria malaccensis* leaves, *Research and Development Seminar 2010*, Malaysian Nuclear Agency, Bangi, Malaysia.

Packer, L., Ong, C.N., & Halliwell, B., 2004, *Herbal and Tradisional Medicine: Molecular Aspects of Health*, iii, Marcel Dekker, New York



- Pavia, D.L., Lampman, G.M., & Kriz, G.S., 2001, *Introduction to Spectroscopy*, 353-358, Brooks/Cole Thomson Learning, Australia.
- Pramono, Suwijiyo, 2015^a, Kuliah Galenika, di Fakultas Farmasi UGM, 27 Februari 2015.
- Pramono, Suwijiyo, 2015^b, Kuliah Analisis Kimia Tumbuhan Obat, di Fakultas Farmasi UGM, 6 November 2015.
- Pokorny, J., Yanishlieva, N., & Gordon, M., 2001, *Antioxidants in Food*, 10-83, CRC Press, Boca Raton.
- Poonia, Priyanka, Niazi, Junaid, Chaudhary, Gagandeep, & Kalia, AN, 2011, In-Vitro antioxidant potential of *Jasminum mesnyi Hance* (Leaves) extracts, *Research Journal of Pharmaceutical, Biological and Chemical Sciences*, **2** (1), 348-357.
- Robinson, T., 1985, *The Organic Constituents of Higher Plants*, 5th ed., 191-209, Cordus Press, North Amherst.
- Sardjiman, 2011, *Belajar Kimia Organik Metode Iqro'*, 73, Pustaka Pelajar, Yogyakarta.
- Sastrohamidjojo, H., 1991, *Spektroskopi*, 1-39, Liberty, Yogyakarta.
- Sastrohamidjojo, H., 2002, *Kromatografi*, 26-86, Liberty, Yogyakarta.
- Sheng-zhuo, Huang, You-xing, Zhao, Wen-li Mei, De-lan, Yang, Shou-bai, Liu, & Hao-fu, Dai, 2013, Chemotaxonomy Studies on The Genus *Aquilaria*, *Journal of Tropical and Subtropical Botany*, **21** (3), 273-280.
- Sherma, J., Basic Technique, Materials, and Apparatus dalam Fried, B., 1996, *Handbook of Thin Layer Chromatography*, 1-7, Marcel Dekker Inc., New York.
- Spangenberg, Bernd, Poole, Colin F., & Weins, Christel, 2011, *Quantitative Thin-Layer Chromatography*, 18-21, Springer-Verlag, Berlin Heidelberg.
- Waksmundzka-Hajnos, M., Sherma, J., & Kowalska, T., 2008, *Thin Layer Chromatography in Phytochemistry*, 5-33, CRC Press, Boca Raton.
- Wijaya, A., 1996, Radikal Bebas dan Parameter Status Antioxidant, *Forum Diagnosticum*, **1**, 1-4.
- Wil, Nik Noor Asma Nik, Omar, Nor Adila Mhd, Ibrahim, Noorhuda Awang, & Tajuddin, Saiful Nizam, 2014, In Vitro Antioxidant Activity and Phytochemical Screening of *Aquilaria malaccensis* Leaf Extracts, *Journal of Chemical and Pharmaceutical Research*, **6** (12), 688-693.



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GADJAH MADA

Perbandingan Metode Ekstraksi Daun Gaharu (*Aquilaria malaccensis Lam.*) secara Maserasi dan Infundasi terhadap Kadar Flavonoid Total dan Aktivitas Antioksidan
FAIRUZ SAKINA MUFIDA, Prof. Dr. Suwijiyo Pramono, DEA., Apt.; Dr. rer. nat. RR. Endang Lukitaningsih, M.Si., Apt
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Wilson, C. W., 1939, A Study of the Boric Acid Color Reaction of Flavone Derivates, *Journal of the American Chemical Society*, **61** (9), 2303-2306.

Winarsi, H., 2007, *Antioksidan Al ami dan Radikal*, 1-21, Kanisisus, Yogyakarta.

Yunus, Sxureha, Zaki, Nurul Asyikin Md, & Hamid, Ku Halim Ku, 2015, Microwave drying Characteristics and Antidiabetic Properties of *Aquilaria subintegra* and *Aquilaria malaccensis* Leaves, *Advanced Materials Research*, **1113**, 352-357.

Zheng, Ke, Gu, Liping, Zhang, Linxin, Ma, Huifen, & Liu, Yurong, 2015, Growth Characteristics of *Aquilaria agallocha* and Volatile Components Content in Branches and Leaves, *Abstrak, Guizhou Agricultural Sciences*, **03**.

Zou, Yanping, Lu, Yanhua, & Wei Dongzhi, 2004, Antioxidant Activity of a Flavonoid-Rich Extract of *Hypericum perforatum* L. in Vitro, *Journal of Agricultural and Food Chemistry*, **52**, 5032-5039.