

## DAFTAR PUSTAKA

- Bageshwar, D. V., Pawar, A. S., Khanvilkar, V. V dan Kadam, V. J., 2010, *Photoacoustic Spectroscopy and Its Applications – A Tutorial Review*, Eurasian J. Anal. Chem., 5, 2, pp. 187–203.
- Brigham, E. O., 1974, *The Fast Fourier Transform*, Prentice Hall, New Jersey
- Coldren, L. A., Corzine, S. W., dan Masanovic, M. L., 2012, *Diode Lasers and Photonic Integrated Circuits*, second edition.
- Darmawan, M. Y., Mitrayana, dan Wasono, A. J., 2015, *Kinerja Spektrometer Fotoakustik Laser CO<sub>2</sub> untuk Deteksi Gas Etilen (C<sub>2</sub>H<sub>4</sub>), Aseton (C<sub>3</sub>H<sub>6</sub>O), Amonia (NH<sub>3</sub>) pada Gas Hembus Perokok*, Jurnal Fisika Indonesia, 19(57), pp. 35–42.
- Diosi, A. dan Kleeman, L., 2005, *Laser scan matching in polar coordinates with application to SLAM*, 2005 IEEE/RSJ International Conference on Intelligent Robots and Systems, IROS, hal. 1439–1444. doi: 10.1109/IROS.2005.1545181.
- El-sharkawy, Y. H., dan Elsherif, F., 2011, *Laser Ultrasound Characterization of Normal and Decayed Teeth by Measuring Elastic Properties of Surface Layers*, 7897, pp. 1–12. doi: 10.1117/12.868322.
- Es, V. P., Biswas, S.K., Moend, H. J. B., Steenberg, W., dan Manohar, S., 2014, *Initial result of finger imaging using photoacoustic computed tomography*, Journal of Biomedical Optic, vol 19(6).
- He, W., Ai, K., Jiang, C., Li, Y., Song, X., dan Lu, L., 2017, *Plasmonic titanium nitride nanoparticles for in vivo photoacoustic tomography imaging and photothermal cancer therapy*, *Biomaterials*. Elsevier Ltd, 132, pp. 37–47. doi: 10.1016/j.biomaterials.2017.04.007.
- Hennen, S. N., Xing, W., Shui, Y. B., Zhou, Y., Kalishman, J., Kaminsky, L. B. A., Kass, M. A., Beebe, D. C., Maslov, K. I., dan Wang, L. V., 2015, *Photoacoustic tomography imaging and estimation of oxygen saturation of hemoglobin in ocular tissue of rabbits*, *Experimental Eye Research*. Elsevier Ltd, 138, pp. 153–158. doi: 10.1016/j.exer.2015.05.022.
- Hu, S. dan Wang, L. V., 2010, *Photoacoustic imaging and characterization of the microvasculature*, *Journal of Biomedical Optics*, 15, 1, pp. 1–15, doi: 10.1117/1.3281673
- Jansen, K., van Soest, G., dan van der Steen, A. F. W., 2014, *Intravascular Photoacoustic Imaging: A New Tool for Vulnerable Plaque Identification*, *Ultrasound in Medicine & Biology*, 40(6), hal. 1037–1048. doi: 10.1016/j.ultrasmedbio.2014.01.008.

- Jo, J., Xu, G., Caio, M., Marquardt, A., Francis, S., Gandikota, G., dan Wang, X., 2017 *A Functional Study of Human Inflammatory Arthritis Using Photoacoustic Imaging*, *Scientific Reports*, 7(1), pp. 1–9. doi: 10.1038/s41598-017-15147-5.
- Kim, G. R., Kang, J., Kwak, J. Y., Chang, J. H., Kim, a. i., Youk, J. H., Moon, H. J., Kim, M. J., dan Kim, E. K., 2014, *Photoacoustic imaging of breast microcalcifications: A preliminary study with 8-gauge core-biopsied breast specimens*, *PLoS ONE*, 9(8), hal. 8–10. doi: 10.1371/journal.pone.0105878.
- Kristanto, W., B., R., 2018, *Karakterisasi Sistem Citra Tomografi Fotoakustik dan Aplikasinya untuk Deteksi Daging Ayam Berformalin*, Yogyakarta : Universitas Gadjah Mada.
- Ku, G., Wang, X., Xie, X., Stoica, G. dan Wang, L. V., 2005, *Imaging of tumor angiogenesis in rat brains in vivo by photoacoustic tomography*, *Applied Optics*, 44, pp. 770–775
- Kolkman, R. G. M., Steenbergen, W., van Leeuwen, T. G., 2006, *In vivo photoacoustic imaging of blood vessels with a pulsed laser diode*, pp. 134–139. doi: 10.1007/s10103-006-0384-z.
- Kurniawan, E., 2016, *Sistem Citra Fotoakustik Sederhana Berbasis Laser Dioda dan Mikrofon Condenser Untuk Pengukuran Konsentrasi Darah*, Yogyakarta : Universitas Gadjah Mada.
- Lao, Y., 2008, *Noninvasive photoacoustic imaging of the developing vasculature during early tumor growth*, *Phys. Med. Biol.*, 53, 15, pp. 4203–4212, doi: 10.1088/0031-9155/53/15/013
- Mallidi, S., Luke, G. P. dan Emelianov, S., 2011, *Photoacoustic imaging in cancer detection , diagnosis , and treatment guidance*, *Trends in Biotechnology*, Elsevier Ltd, 29, 5, pp. 213–221, doi: 10.1016/j.tibtech.2011.01.006
- Maton, A., Hopkin, J., McLaughlin, C. W., Johnson, S., Warner, M. Q., LaHart, D. dan Wright, J. D., 1993, *Human Biology and Health*, Englewood Cliffs, Prentice Hall, New Jersey
- Mehrmohammadi, M., Yoon, S. J., Yeager, D. dan Emelianov, S. Y., 2013, *Photoacoustic Imaging for Cancer Detection and Staging*, *Curr Mol Imaging*, 2(1), pp. 89–105, doi: 10.2174/2211555211302010010.Photoacoustic
- Miklós, A. dan Hess, P., 2000, *Modulated and Pulsed Photoacoustics in Trace Gas Analysis*, *Analytical Chemistry*, pp. 30–37
- Miklós, A., Schäfer, S. dan Hess, P., 1999, *Photoacoustic Spectroscopy , Theory*, pp. 1815–1822

- Montigny, E. De, 2014, *Photoacoustic Tomography : Principles and applications Photoacoustic Tomography : Principles and applications*, (June).
- platin, 2003, *Spektroskopi Fotoakustik untuk Pelacakan Gas Etilen (C<sub>2</sub>H<sub>4</sub>)*, Jurnal Penelitian Sains : 21-29, no. 13, ISSN : 1410-7058.
- Pikatan, S., 1991, *Laser*, Seminar Intern Fakultas Teknik Universitas Surabaya, kristal no.4/juni/1991.
- Platini, L. T., 2010 , *Aplikasi Detektor Fotoakustik Berbasis Laser CO<sub>2</sub> dalam Pengukuran Konsentrasi Gas Etilen Secara Real-Time*, Yogyakarta : Universitas Sanata Dharma.
- Press, W. H., Teukolsky, S. A., Vetterling, W. T. dan Flannery, B. P., 1992, *Numerical Recipes in Fortran 77: The Art of Scientific Computing*, 2nd edn, Cambridge University Press, Cambridge.
- Riley, K. F., Hobson, M. P. dan Bence, S. J., 2006, *Mathematical Methods for Physics and Engineering*, 3rd edn, Cambridge University Press, Cambridge.
- Rosencwaig, A., 1980, *Photoacoustic and Photoacoustic Spectroscopy*, John Willey and Sons Inc., New York.
- Rumsey, F., dan McCormick, T., 2009. *Sound and Recording*, sixth edition.
- Silalahi, H. M., 2017, *Sistem Citra Fotoakustik Sederhana Berbasis Laser Dioda dan Mikrofon Condenser*, Yogyakarta : Universitas Gadjah Mada.
- Singh, S. C., Zeng, H., Guo, C. dan Cai, W., 2012, *Lasers  $\mu$  Fundamentals , Types , and Operations*.
- Solihat, I., 2015, *Pengukuran Konsentrasi Gas Etilen (C<sub>2</sub>H<sub>4</sub>) dari Gas Hembus Perokok dan Mantan Perokok Menggunakan Spektrometer Fotoakustik Laser CO<sub>2</sub>*, Prosiding Pertemuan Ilmiah XXIX Jateng & DIY, ISSN : 0853-0823, pp. 318–320.
- Stoica, P. dan Moses, R. L., 2005, *Spectral analysis of signals*, Pearson Prentice Hall Upper Saddle River, NJ.
- Strohm, E. M., Moore, M. J. dan Kolios, M. C., 2016, *Single Cell Photoacoustic Microscopy  $\mu$  A Review*, 22, 3
- Sugiarto, I. T., Srtiono, A., dan Hanto, D., 2013, *Karakterisasi dioda laser untuk pengujian stabilitas daya dan frekuensi*, Proceeding seminar ilmu pengetahuan teknik 2013, Pusat Penelitian Fisika-LIPI.
- Sun, Y., dan Jiang, H., 2009, *Quantitative three-dimensional photoacoustic tomography of the finger joints: Phantom studies in a spherical scanning geometry*, *Physics in Medicine and Biology*, 54(18), pp. 5457–5467. doi: 10.1088/0031-9155/54/18/007.

- Wakerly, J. F., 2006, *Digital Design Principles and Practices*, 4th edn, Pearson Education, Inc., New Jersey
- Wang, L. V., 2008, *Prospects of photoacoustic tomography*, *Medical Physics*, 35(12), pp. 5758–5767. doi: 10.1118/1.3013698.
- Wang, X., Chamberland, D. L., dan Jamadar, D. A., 2007, *Noninvasive photoacoustic tomography of human peripheral joints toward diagnosis of inflammatory arthritis*, *Optics Letters*, 32(20), pp. 3002–3004. doi: 10.1364/OL.32.003002.
- Wang, W. J., Lin, R. M., dan Li, X. X., 2004, *Modeling and characterization of a silicon condenser microphone*, *Journal of Micromechanics and Microengineering*, 14(3), pp. 403–409. doi: 10.1088/0960-1317/14/3/013.
- Wang, X., Ppang, Y., Ku, G., Xie, X., Stoica, G., dan Wang, L. V., 2003, *Noninvasive laser-induced photoacoustic tomography for structural and functional in vivo imaging of the brain*, *Nature Biotechnology*, 21(7), pp. 803–806. doi: 10.1038/nbt839.
- Wasono, M., 1990, *Spektrometer fotoakustik untuk pelacakan gas*, Yogyakarta : Universitas Gadjah Mada.
- Xiao, J., Yao, L., Sun, Y., Sobel, A. S., He, J., dan Jiang, H., 2010, *Quantitative two-dimensional photoacoustic tomography of osteoarthritis in the finger joints*, *Optics Express*, 18(14), p. 14359. doi: 10.1364/OE.18.014359.
- Xin, H., Li, H., Gates, R. S., Overhult, D. G., dan Earnest Jr, J. W., 2009, *Use of CO<sub>2</sub> concentration difference or CO<sub>2</sub> balance to assess ventilation rate of broiler houses*, *Transactions of the ASABE*, 52(4), hal. 1353–1361.
- Xu, G., Rajian, J. R., Girish, G., Kaplan, M. J., Fowkles, J.B., Carson, P. L., dan Wang, X., 2012, *Photoacoustic and ultrasound dual-modality imaging of human peripheral joints*, *Journal of Biomedical Optics*, 18(1), p. 010502. doi: 10.1117/1.JBO.18.1.010502.
- Xu, M. dan Wang, L. V., 2006, *Photoacoustic imaging in biomedicine*, *Rev. Sci. Instrum.*, 77, pp. 1–22, doi: 10.1063/1.2195024.
- Yao, J., dan Wang, L. V., 2011, *Photoacoustic tomography: Fundamentals, advances and prospects*, *Contrast Media and Molecular Imaging*, 6(5), pp. 332–345. doi: 10.1002/cmml.443.
- Yuan, J., Xu, G., Yu, Y., Zhou, Y., Carson, P. L., Wang, X., dan Liu, X., 2013, *Real-time photoacoustic and ultrasound dual-modality imaging system facilitated with graphics processing unit and code parallel optimization*, *Journal of Biomedical Optics*, 18(8), p. 086001. doi: 10.1117/1.JBO.18.8.086001.
- Zhang, J., Yang, S., Ji, X., Zhou., X., Zhou, Q., dan Xing, D., 2014, *Characterization of lipid-rich aortic plaques by intravascular photoacoustic*

*tomography: Ex vivo and in vivo validation in a rabbit atherosclerosis model with histologic correlation*, Journal of the American College of Cardiology, 64(4), pp. 385–390. doi: 10.1016/j.jacc.2014.04.053.

Zhou, Q., Li, Z., Zhou, J., Joshi, B. P., Li, G., Duang, X., Kuick, R., Owens, S. R., dan Wang, T. D., 2016, *In vivo photoacoustic tomography of EGFR overexpressed in hepatocellular carcinoma mouse xenograft*, *Photoacoustics*. Elsevier GmbH., 4(2), pp. 43–54. doi: 10.1016/j.pacs.2016.04.001.

Zhou, Y., Yao, J. dan Wang, L. V., 2016, *Tutorial on photoacoustic tomography*, *Journal of Biomedical Optics*, 21(6), p. 061007. doi: 10.1117/1.JBO.21.6.061007.