



DAFTAR PUSTAKA

- [1] “List Data Dasar: Aplikasi Dataku,” *List Data Dasar | Aplikasi Dataku*. [Online]. Available: http://bappeda.jogjaprov.go.id/dataku/data_dasar/index/548-data-kecelakaan-dan-pelanggaran-lalu-lintas?id_skpd=39. [Accessed: 2-May-2019].
- [2] I. Rizianiza and A. Djafar, “Design car braking system using Mamdani Fuzzy Logic Control,” *Proceeding - 4th Int. Conf. Electr. Veh. Technol. ICEVT 2017*, vol. 2018–Janua, pp. 129–133, 2018.
- [3] S. Hirulkar, M. Damle, V. Rathee, and B. Hardas, “Design of automatic car breaking system using fuzzy logic and PID controller,” *Proc. - Int. Conf. Electron. Syst. Signal Process. Comput. Technol. ICESC 2014*, pp. 413–418, 2014.
- [4] L. A. Zadeh, “Fuzzy sets,” *Inf. Control*, vol. 8, no. 3, pp. 338–353, 1965.
- [5] L. A. Zadeh, “Fuzzy logic, neural networks, and soft computing,” *Communications of the ACM*, vol. 37, no. 3, pp. 77–84, 1994.
- [6] N. N. Karnik and J. M. Mendel, “Introduction to type-2 fuzzy logic systems,” *1998 IEEE Int. Conf. Fuzzy Syst. Proceedings. IEEE World Congr. Comput. Intell. (Cat. No.98CH36228)*, vol. 2, pp. 915–920, 1998.
- [7] O. Castillo, “Introduction to Type-2 Fuzzy Logic Control,” *Type-2 Fuzzy Logic in Intelligent Control Applications Studies in Fuzziness and Soft Computing*, pp. 3–5, 2011.
- [8] K. A. Naik and C. P. Gupta, “Performance comparison of Type-1 and Type-2 fuzzy logic systems,” *2017 4th International Conference on Signal Processing, Computing and Control (ISPCC)*, 2017.
- [9] J. M. Mendel, R. I. John, and F. Liu, “Interval Type-2 Fuzzy Logic Systems Made Simple,” *Fuzzy Syst. IEEE Trans.*, vol. 14, no. 6, pp. 808–821, 2006.
- [10] M. A. Abu, Z. Kornain, M. H. Rosli, and I. M. Iqbal, “Automated Car Braking System using Labview,” *ISIEA 2012 - 2012 IEEE Symp. Ind. Electron. Appl.*, pp. 246–250, 2012.
- [11] L. Zadeh, “Fuzzy sets,” *Information and Control*, vol. 8, no. 3, pp. 338–353,



1965.

- [12] E. Mamdani and S. Assilian, "An Experiment in Linguistic Synthesis with a Fuzzy Logic Controller," *Readings in Fuzzy Sets for Intelligent Systems*, pp. 283–289, 1993.
- [13] A. Rastogi, N. K. Gupta and P. K. Tyagi, "Neurofuzzy inference system for diagnosis of malaria," *2014 Innovative Applications of Computational Intelligence on Power, Energy and Controls with their impact on Humanity (CIPECH)*, pp. 24–28, Ghaziabad, 2014.
- [14] R. N. Sharma, N. Chand, V. Sharma, and D. Yadav, "Decision support system for operation, scheduling and optimization of hydro power plant in Jammu and Kashmir region," *Renew. Sustain. Energy Rev.*, vol. 43, pp. 1099–1113, 2015.
- [15] S. Sushilsikchi, S. Sikchi, and A. M. S., "Fuzzy Expert Systems (FES) for Medical Diagnosis," *International Journal of Computer Applications*, vol. 63, no. 11, pp. 7–16, 2013.
- [16] A. B. Elfajar, B. D. Setiawan, and C. Dewi, "Peramalan Jumlah Kunjungan Wisatawan Kota Batu Menggunakan Metode Time Invariant Fuzzy Time Series," *Jurnal Pengembangan Teknologi Informasi dan Ilmu Komputer*, vol. 1, no. 2, pp. 85–94, 2017.
- [17] A. Rikalovic and I. Cosic, "A Fuzzy Expert System for Industrial Location Factor Analysis," *Acta Polytechnica Hungarica*, vol. 12, no. 2, pp. 33–51, 2015.
- [18] Z. Chen, X. Hu, Y. Li, and Z. Zhang, "Speed control system design of automatic parking based on fuzzy-PID control," *2017 IEEE Int. Conf. Inf. Autom. ICIA 2017*, no. July, pp. 989–993, 2017.
- [19] X. W. Chen, J. G. Zhang, and Y. J. Liu, "Research on the Intelligent Control and Simulation of Automobile Cruise System Based on Fuzzy System," *Math. Probl. Eng.*, vol. 2016, pp. 11–14, 2016.
- [20] F. T. Thiang, A. Hannawati, B. Eng, R. Lim, "Sistem Pengembangan Kendali Fuzzy Logic Berbasis Mikrokontroler Keluarga MCS51," *The Institute of Research & Community Outreach - Petra Christian University*, pp. 1-10, 2004.



- [21] M. Muchlas, S. Sunardi, and T. Antoro, "Pengendalian Kecepatan Motor Dc Dengan Metode Look Up Table Berbasis Mikrokontroler At89C51," *TELKOMNIKA (Telecommunication Computing Electronics and Control)*, vol. 4, no. 1, p. 1, 2006.
- [22] A. T. Budiarto, and F. Arifin "Prototype Sistem Pengereman Kendaraan Dengan Fuzzy Logic Dan Sensor Kecepatan Berbasis Mikrokontroler ATMega 8535," *Jurnal Elektronik Pendidikan Teknik Elektronika - Universitas Negri Yogyakarta*, no. 4, pp. 1–5, 2016.
- [23] D. B. Tonara and Y. M. Dinata, "Rancang Bangun Autonomous Braking System Menggunakan Sensor Infrared Berbasis Arduino," *SESINDO*, vol. 2016, 2016.
- [24] Y. Oniz, A. C. Aras, O. Kaynak, and R. Abiyev, "Experimental evaluation of a type-2 fuzzy control algorithm on an Anti-Lock Braking System," *IECON Proc. (Industrial Electron. Conf.)*, pp. 564–568, 2011.
- [25] J. B. Cicchino, "Effectiveness of forward collision warning and autonomous emergency braking systems in reducing front-to-rear crash rates," *Accid. Anal. Prev.*, vol. 99, pp. 142–152, 2017.
- [26] H. Santoso, "Cara Kerja Sensor Ultrasonik, Rangkaian, & Aplikasinya," *Elang Sakti*. [Online]. Available: <https://www.elangsakti.com/2015/05/sensor-ultrasonik.html>. [Accessed: 08-May-2019].
- [27] "Microcontroller," *Wikipedia*, 30-Apr-2019. [Online]. Available: <https://en.wikipedia.org/wiki/Microcontroller>. [Accessed: 08-May-2019].
- [28] L. A. Zadeh, "Fuzzy Sets as a Basis for Information Analysis," *Defense Technical Information Center*, 1979.
- [29] O. Castillo and P. Melin, "Type-2 Fuzzy Logic: Theory and Applications," *Studies in Fuzziness and Soft Computing*, 2008.
- [30] L. Zadeh, "The concept of a linguistic variable and its application to approximate reasoning-III," *Information Sciences*, vol. 9, no. 1, pp. 43–80, 1975.
- [31] J. M. Mendel, "Type-2 fuzzy sets and systems: an overview," *IEEE Computational Intelligence Magazine*, vol. 2, no. 1, pp. 20–29, 2007.



- [32] Q. Liang and J. Mendel, "Interval type-2 fuzzy logic systems: theory and design," *IEEE Transactions on Fuzzy Systems*, vol. 8, no. 5, pp. 535–550, 2000.
- [33] N. Karnik and J. Mendel, "Type-2 fuzzy logic systems: type-reduction," *SMC98 Conference Proceedings. 1998 IEEE International Conference on Systems, Man, and Cybernetics (Cat. No.98CH36218)*, vol. 2046–2051, 1998.
- [34] N. N. Karnik and J. M. Mendel, "Centroid of a type-2 fuzzy set," *Inf. Sci. (Ny)*, vol. 132, no. 1–4, pp. 195–220, 2001.
- [35] J. M. Mendel, "Erratum to: Uncertain Rule-Based Fuzzy Systems," *Uncertain Rule-Based Fuzzy Systems*, 2017.
- [36] D. Wu and J. Mendel, "Enhanced Karnik--Mendel Algorithms," *IEEE Transactions on Fuzzy Systems*, vol. 17, no. 4, pp. 923–934, 2009.
- [37] J. Mendel and D. Wu, *Perceptual Computing :Aiding People in Making Subjective Judgments*. 2010.
- [38] J. M. Mendel, H. Hagras, W.-W. Tan, W. W. Melek, and H. Ying, "Introduction to Type-2 Fuzzy Logic Control," *John Wiley and IEEE Press, Hoboken*, 2014.
- [39] V. Saxena, N. Yadala, R. Chourasia, and F. C.-H. Rhee, "Type reduction techniques for two-dimensional interval type-2 fuzzy sets," *2017 IEEE International Conference on Fuzzy Systems (FUZZ-IEEE)*, 2017.
- [40] J. Keaten, "40 countries agree cars must have automatic braking," *AP NEWS*, 13-Feb-2019. [Online]. Available: <https://www.apnews.com/a0989b2b0fed4a3eba4d461426492de4>. [Accessed: 20-Jul-2019].
- [41] N. N. Karnik and J. M. Mendel, "Introduction to Type-2 Fuzzy Logic Systems," *Fuzzy Syst. Proc.*, pp. 915–920, 1998.
- [42] M. Nie and W. W. Tan, "Towards an efficient type-reduction method for interval type-2 fuzzy logic systems," *2008 IEEE International Conference on Fuzzy Systems (IEEE World Congress on Computational Intelligence)*, 2008.



- [43] A. Taskin and T. Kumbasar, "An Open Source Matlab / Simulink Toolbox for Interval Type-2 Fuzzy Logic Systems," *Comput. Intell. 2015 IEEE Symp. Ser.*, pp. 1561–1568, 2015.
- [44] Wang, L.X. "A Course in Fuzzy System and Control", Prentice Hall International, Inc. United State of America. 1997.
- [45] Raju, K.V.S, and Majumdar, A.K. "Fuzzy Functional Dependencies and Lossless Join Decomposition of Fuzzy Relation Database System". *ACM Transaction on Database Systems*. Vol 13 no:2. Hal 129-166. 1998.
- [46] A. Hidayanto and H. Winarno, "Prototipe Sistem Autobrake Pada Mobil Menggunakan Sensor Jarak Ultrasonik HC-SR04 Berbasis Arduino Mega 2560," *Gema Teknologi*, vol. 18, no. 4, p. 29, 2016.
- [47] A. Khumaedi, "Otomatisasi Pengemerman Motor DC Secara Elektris Sebagai Referensi Sistem Keamanan Mobil Listrik," *ELECTRICIAN – Jurnal Rekayasa dan Teknologi Elektro*, 2014.
- [48] H. Suprapto and P. Y. Mali, "10 Penyebab Kecelakaan Lalu Lintas, Anda Wajib Tahu," *VIVA*, 09-Oct-2017. [Online]. Available: <https://www.viva.co.id/otomotif/tips/964758-10-penyebab-kecelakaan-lalu-lintas-anda-wajib-tahu>. [Accessed: 16-Jun-2019].
- [49] "Apa Itu Rem ABS ? Bagaimana Cara Kerja Rem ABS," *Otoflik*, 12-Jun-2018. [Online]. Available: <https://www.otoflik.com/rem-abs/>. [Accessed: 16-Jun-2019].
- [49] S. K. Das, N. Mondol, M. S. Rana and P. Das, "Genetic algorithm based optimal PI controller for position control of Maxon S-DC motor with dSPACE," *2012 International Conference on Informatics, Electronics & Vision (ICIEV)*, Dhaka, 2012.
- [49] M. Ruderman, J. Krettek, F. Hoffmann, and T. Bertram, "Optimal State Space Control of DC Motor," *IFAC Proceedings Volumes*, vol. 41, no. 2, pp. 5796–5801, 2008.
- [50] S. K. Das, N. Mondol, M. S. Rana and P. Das, "Genetic algorithm based optimal PI controller for position control of Maxon S-DC motor with



dSPACE," 2012 *International Conference on Informatics, Electronics & Vision (ICIEV)*, Dhaka, 2012.

- [51] M. Ruderman, J. Krettek, F. Hoffmann, and T. Bertram, "Optimal State Space Control of DC Motor," *IFAC Proceedings Volumes*, vol. 41, no. 2, pp. 5796–5801, 2008.