

DAFTAR PUSTAKA

- Ahmaruzzaman, M. (2010). A review on the utilization of fly ash. *Progress in Energy and Combustion Science*, 36(3), 327–363. <http://doi.org/10.1016/j.pecs.2009.11.003>
- Ansari, M., Aroujalian, A., Raisi, A., Dabir, B., & Fathizadeh, M. (2014). Preparation and characterization of nano-NaX zeolite by microwave assisted hydrothermal method. *Advanced Powder Technology*, 25(2), 722–727. <http://doi.org/10.1016/j.appt.2013.10.021>
- Aono, H., Tamura, K., Johan, E., Yamamoto, T., Matsue, N., & Henmi, T. (2013). Preparation of Na-P1-Type Zeolite and its Composite Material with Nanosized Magnetite. *Journal of the American Ceramic Society*, 96(10), 3218–3222. <http://doi.org/10.1111/jace.12557>
- Askari, S., Miar, S., & Rouein, A. (2013). Effects of ultrasound on the synthesis of zeolites : a review, 285–302. <http://doi.org/10.1007/s10934-012-9598-6>
- Belviso, C., Cavalcante, F., Lettino, A., & Fiore, S. (2011). Ultrasonics Sonochemistry Effects of ultrasonic treatment on zeolite synthesized from coal fly ash. *Ultrasonics - Sonochemistry*, 18(2), 661–668. <http://doi.org/10.1016/j.ultsonch.2010.08.011>
- Bertolini, T. C. R., Izidoro, J. C., Magdalena, C. P., & Fungaro, D. A. (2013). Full Paper Adsorption of Crystal Violet Dye from Aqueous Solution onto Zeolites from Coal Fly and Bottom Ashes. *Orbital : The Electronic Journal of Chemistry*, 5(3), 179–191.
- Bukhari, S. S., Behin, J., Kazemian, H., & Rohani, S. (2014). Conversion of coal fly ash to zeolite utilizing microwave and ultrasound energies : A review. *Fuel*, 5G(October), 17. <http://doi.org/10.1016/j.fuel.2014.09.077>
- Çelik, Ö., Damcı, E., & Pi, S. (2008). Characterization of fly ash and it effects on the compressive strength properties of Portland cement. *Indian Journal of Engineering & Materials Sciences*, 15(October), 433–440.
- Chigondo, M., Guyo, U., Shumba, M., Chigondo, F., Nyamunda, B., Moyo, M., & Nharingo, T. (2013). Synthesis and Characterisation of Zeolites From Coal Fly Ash (CFA). *IRACST – Engineering Science and Technology: An International Journal (ESTIJ)*, 3(4), 714–718.
- Deka, R. C. (1998). Acidity in zeolites and their characterization by different spectroscopic methods. *Indian Journal of Chemical Technology*, 5, 109–123.
- Farneth, W. E. (1995). Methods for Characterizing Zeolite Acidity. *American Chemical Society*, 1(I), 615–635

- Franus, W., Wdowin, M., & Franus, M. (2014). Synthesis and characterization of zeolites prepared from industrial fly ash. *Environmental Monitoring and Assessment*, 186(9), 5721–5729. <http://doi.org/10.1007/s10661-014-3815-5>
- Fungaro, D. A., Reis, T. V. S., Logli, M. A., & Oliveira, N. A. (2014). Synthesis and Characterization of Zeolitic Material Derived from Sugarcane Straw Ash, 2(1), 16–21. <http://doi.org/10.12691/env-2-1-4>
- Georgiev, D., Bogdanov, B., Angelova, K., Markovska, I., & Hristov, Y. (2009). Synthetic zeolites—structure, classification, current trends in zeolite synthesis: Review. *International Science Conference “Economics and Society Development on the Base of Knowledge,” VII*(June), 1–5. Retrieved from <http://scholar.google.com/scholar?hl=en&btnG=Search&q=intitle:Synthetic+Zeolites+-+structure,+classification,+current+trends+in+zeolite+synthesis#0>
- Gharibeh, M. (2009). *Microwave Reactor Engineering of Zeolites Synthesis*. University of Massachusetts.
- Hani, H. A., Tewfik, S. R., Sorour, M. H., & Monem, N. A. (2010). Acid Washing Of “Zeolite A”: Performance Assessment And Optimization. *Journal of American Science*, 6(5), 261–271.
- Haryanti, Dini. (2016, Pebruari 18). *PJB: Jangan Hanya Lihat Sisi Keekonomian PLTU Batu Bara*. Diambil kembali dari industri.bisnis.com: <http://industri.bisnis.com/read/20160218/44/520278/pjb-jangan-hanya-lihat-sisi-keekonomian-pltu-batu-bara>
- Itskos, G., Koutsianos, A., Koukouzas, N., & Vasilatos, C. (2015). Zeolite development from fly ash and utilization in lignite mine-water treatment. *International Journal of Mineral Processing*, 139(February 2016), 43–50. <http://doi.org/10.1016/j.minpro.2015.04.011>
- Johan, E., Yoshida, K., Munthali, M. W., Matsue, N., Itagaki, Y., & Aono, H. (2015). Adsorption characteristics of Cs⁺ onto artificial zeolites synthesized from coal fly ash and diatomite. *Journal of the Ceramic Society of Japan*, 123(1444), 1065–1072. <http://doi.org/10.2109/jcersj.2.123.1065>
- Khalil, U., & Muraza, O. (2016). Microporous and Mesoporous Materials Microwave-assisted hydrothermal synthesis of mordenite zeolite: Optimization of synthesis parameters. *Microporous and Mesoporous Materials*, 232, 211–217. <http://doi.org/10.1016/j.micromeso.2016.06.016>
- Li, G. (2005). *FT-IR studies of zeolite materials: characterization and environmental applications*. University of Iowa.

- Li, W., Tu, C., Zheng, J., Luo, Y., & Da, Z. (2016). Influence of Acid Wash on the Structural and Catalytic Properties of the Hierarchical Zeolite Y. *Chemistry Select*, 5, 934–939. <http://doi.org/10.1002/slct.201600089>
- Makowski, W., Mlekodaj, K., & Majda, D. (2013). Characterization of acidic zeolite catalysts by thermodesorption and cracking of n -nonane. *Microporous and Mesoporous Materials*, 166, 137–143. <http://doi.org/10.1016/j.micromeso.2012.04.034>
- Mozgawa, W., Król, M., Barczyk, K., & Science, M. (2011). *FT-IR studies of zeolites from different structural groups*. Kraków.
- Muraza, O., Abdul-lateef, A., Tago, T., Nandiyanto, A. B. D., Konno, H., Nakasaka, Y., ... Masuda, T. (2015). Microporous and Mesoporous Materials Microwave-assisted hydrothermal synthesis of submicron ZSM-22 zeolites and their applications in light olefin production. *Microporous and Mesoporous Materials*, 206, 136–143. <http://doi.org/10.1016/j.micromeso.2014.12.025>
- Musyoka, N. M., Petrik, L. F., Hums, E., Baser, H., & Schwieger, W. (2014). In situ ultrasonic diagnostic of zeolite X crystallization with novel (hierarchical) morphology from coal fly ash. *Ultrasonics*, 54(2), 537–543. <http://doi.org/10.1016/j.ultras.2013.08.005>
- Naser, S., & Maryam, A. (2010). Synthesis of zeolites NaA and analcime using rice husk ash as silica source without using organic template. *Journal of Material Science*, 45, 5692–5697. <http://doi.org/10.1007/s10853-010-4637-7>
- Ojumu, T., Plessis, P. Du, & Petrik, L. (2016). Synthesis of zeolite A from coal fly ash using ultrasonic treatment - a replacement for fusion step. *Ultrasonics - Sonochemistry*. <http://doi.org/10.1016/j.ultsonch.2016.01.016>
- Panitchakarn, P., Klamrassamee, T., Laosiripojana, N., Viriya-empikul, N., & Pavasant, P. (2013). Synthesis and Testing of Zeolite from Industrial- Waste Coal Fly Ash as Sorbent For Water Adsorption from Ethanol Solution. *Engineering Journal*, 18(1), 1–12. <http://doi.org/10.4186/ej.2014.18.1.1>
- Patel, K. G., & Srivastava, V. K. (2014). Recent Advances in the Synthesis of Zeolite from Fly Ash Recent Advances in the Synthesis of Zeolite from. *International Conference on Multidisciplinary Research and Practice*, I(VII), 209–212.
- Querol, X., Alastuey, A., Lopez-Soler, A., Plana, F., Andres, J. M., Juan, R., ... Ruiz, C. R. (1997). A Fast Method for Recycling Fly Ash: Microwave-Assisted Zeolite Synthesis. *Environmental Science and Technology*, 31(9), 2527–2533.

- Querol, X., Moreno, N., Umaa, J. C., Alastuey, A., Hernandez, E., Lopez-Soler, A., & Plana, F. (2002). Synthesis of zeolites from coal fly ash: an overview. *International Journal of Coal Geology*, 50(1-4), 413–423. [http://doi.org/10.1016/S0166-5162\(02\)00124-6](http://doi.org/10.1016/S0166-5162(02)00124-6)
- Querol, X., Umaña, J. C., Plana, F., Alastuey, A., Medinaceli, A., Valero, A., ... Garcia-rojo, E. (1999). Synthesis of Zeolites from Fly Ash in a Pilot Plant Scale . Examples of Potential Environmental Applications. *International Ash Utilization Symposium*.
- Rayalu, S. S., Udhoji, J. S., Meshram, S. U., Naidu, R. R., & Devotta, S. (2005). Estimation of crystallinity in flyash-based zeolite-A using XRD and IR spectroscopy. *Research Communications*, 89(12), 2147–2151.
- Shah, B. A., Shah, A. V., & Jadav, P. Y. (2013). Extractive efficacy for acephate of microwave synthesized zeolitic materials: Equilibrium and kinetics. *Journal of the Serbian Chemical Society*, 78(7), 1055–1077. <http://doi.org/10.2298/JSC120530146S>
- Shaila, K., Nisha, D., Pralhad, P., & Deepa, P. (2015). Zeolite Synthesis Strategies from Coal Fly Ash: A Comprehensive Review of Literature. *International Research Journal of Environment Sciences*, 4(3), 93–99.
- Solanki, P., Gupta, V., & Kulshrestha, R. (2010). Synthesis of Zeolite from Fly Ash and Removal of Heavy Metal Ions from Newly Synthesized Zeolite. *E-Journal of Chemistry*, 7(4), 1200–1205. <http://doi.org/10.1155/2010/356150>
- Sri, H. H., Lestari, P., Widayat, A. A. W., & Sutanto, H. (2016). The development of fly ash-supported CaO derived from mollusk shell of *Anadara granosa* and *Paphia undulata* as heterogeneous CaO catalyst in biodiesel synthesis. *International Journal of Energy and Environmental Engineering*, 2. <http://doi.org/10.1007/s40095-016-0212-6>
- Sudha, G., Subramanian, E., & Ash, F. (2015). Journal of Advanced Chemical Sciences Synthesis , Characterization and Photocatalytic Study of Cerium Oxide / Zeolite-NaX Catalyst with Brilliant Green Dye Degradation. *Journal of Advanced Chemichal Sciences*, 1(3), 117–120.
- Sunardi, Rohman, T., Mikrianto, E., & Rusmayanthi, R. (2007). Pengaruh Waktu Refluks dengan NaOH ... (Sunardi dkk). *Terapan Kimia*, 1(2), 83–92.
- Suzuki, K. (2009). *Quantitative Measurements of Brønsted Acidity in Zeolites by Ammonia IRMS-TPD Method*. Tottori University.
- Wdowin, M., Franus, M., Panek, R., Badura, L., & Franus, W. (2014). The

conversion technology of fly ash into zeolites. *Clean Technologies and Environmental Policy*, 16(6), 1217–1223. <http://doi.org/10.1007/s10098-014-0719-6>

Weddle, B. J., & McManus, J. (n.d.). *TGA Evaluation of Zeolite Catalysts*.

Xiao, L., Mao, J., Zhou, J., Guo, X., & Zhang, S. (2011). Applied Catalysis A: General Enhanced performance of HY zeolites by acid wash for glycerol etherification with isobutene. *Applied Catalysis A, General*, 393(1-2), 88–95. <http://doi.org/10.1016/j.apcata.2010.11.029>

Zhou, L., Liu, Z., Bai, Y., Lu, T., Yang, X., & Xu, J. (2016). Hydrolysis of cellobiose catalyzed by zeolites — the role of acidity and micropore structure, 25, 141–145. <http://doi.org/10.1016/j.jechem.2015.11.010>

Zhu, Z., Qingling, C., Xie, Z., Yang, W., & Li, C. (2006). The roles of acidity and structure of zeolite for catalyzing toluene alkylation with methanol to xylene. *Microporous and Mesoporous Materials*, 88, 16–21. <http://doi.org/10.1016/j.micromeso.2005.08.021>