

## DAFTAR PUSTAKA

- Abdudeen, A. *et al.* (2023) ‘Jatropha’s Rapid Developments and Future Opportunities as a Renewable Source of Biofuel—A Review’, *Energies*, 16(2), pp. 1–28. Available at: <https://doi.org/10.3390/en16020828>.
- Abed, K.A. *et al.* (2019) ‘Effect of biodiesel fuels on diesel engine emissions’, *Egyptian Journal of Petroleum*, 28(2), pp. 183–188. Available at: <https://doi.org/10.1016/j.ejpe.2019.03.001>.
- Adi, A.C. *et al.* (2023) ‘Handbook of Energy & Economic Statistics of Indonesia’, *Kementerian ESDM*, pp. 76–79.
- Agboola, J. *et al.* (2018) ‘A Study Of Combustion Temperature Distribution In The Cylinder Of Compression Ignition Engine’, *American Journal of Engineering Research (AJER)*, (7), pp. 304–312. Available at: [www.ajer.org](http://www.ajer.org).
- Alahmer, A. *et al.* (2022) ‘Modeling and Optimization of a Compression Ignition Engine Fueled with Biodiesel Blends for Performance Improvement’, *Mathematics*, 10(3). Available at: <https://doi.org/10.3390/math10030420>.
- Ali Hasan, H. and Mazin Abdul-Munaim, A. (2021) ‘Study on the effect of diesel engine oil contaminated with fuel on engine performance Knowing the impact of oil contamination on engine performance View project Engine Oil Analysis, THz View project’, *Article in Journal of Mechanical Engineering Research and Developments [Preprint]*, (June). Available at: <https://www.researchgate.net/publication/352568680>.
- Alrazen, H.A. *et al.* (2023) ‘Theoretical investigation of combustion and emissions of CI engines fueled by various blends of depolymerized low-density polythene and diesel with co-solvent additives’, *Energy*, 282(August). Available at: <https://doi.org/10.1016/j.energy.2023.128754>.
- Andreo-Martínez, P. *et al.* (2022) ‘Waste animal fats as feedstock for biodiesel production using non-catalytic supercritical alcohol transesterification: A

- perspective by the PRISMA methodology', *Energy for Sustainable Development*, 69, pp. 150–163. Available at: <https://doi.org/10.1016/j.esd.2022.06.004>.
- Anwar, C. (2015) 'Modifikasi Minyak Sawit Sebagai Pensubstitusi Minyak Solar Modified Palm Oil As Diesel Fuel Substitutes', *Journal Lemigas*, 49(1), pp. 81–90.
- Apouw, A., Mangindaan, G. and Rumbayan, M. (2023) 'The Effect Of Load Changes On Generator Efficiency', 6.
- Armstrong, B., Sera, F. and Gasparrini, A. (2018) 'The Role of Humidity in Associations of High Temperature with Mortality: A Multi-City Multi-Country Study', *ISEE Conference Abstracts*, 2018(1), pp. 1–8. Available at: <https://doi.org/10.1289/isesisee.2018.o04.02.09>.
- Azad, A.K. *et al.* (2023) 'A landscape review on biodiesel combustion strategies to reduce emission', *Energy Reports*, 9, pp. 4413–4436. Available at: <https://doi.org/10.1016/j.egyr.2023.03.104>.
- Babu, D., Thangarasu, V. and Ramanathan, A. (2020) 'Artificial neural network approach on forecasting diesel engine characteristics fuelled with waste frying oil biodiesel', *Applied Energy*, 263(February). Available at: <https://doi.org/10.1016/j.apenergy.2020.114612>.
- Bawane, R.K. *et al.* (2022) 'Impact analysis of emulsified Calophyllum oil biodiesel B100-WIC and B50-WIC on performance and emission characteristic of a diesel engine under variation in compression ratio', *International Journal of Ambient Energy*, 43(1), pp. 3771–3780. Available at: <https://doi.org/10.1080/01430750.2020.1852110>.
- Bello, U. *et al.* (2022) 'Biodiesel, In a Quest For Sustainable Renewable Energy: A Review on Its Potentials and Production Strategies', *Journal of Chemical Reviews*, 4(3), pp. 272–287. Available at: <https://doi.org/10.22034/jcr.2022.343497.1175>.
- Berni, F. *et al.* (2024) 'An integrated 0D/1D/3D numerical framework to predict

- performance, emissions, knock and heat transfer in ICEs fueled with NH<sub>3</sub>–H<sub>2</sub> mixtures: The conversion of a marine Diesel engine as case study’, *International Journal of Hydrogen Energy*, 50(x), pp. 908–938. Available at: <https://doi.org/10.1016/j.ijhydene.2023.09.158>.
- Bhanu Teja, N. *et al.* (2022) ‘Performance and Emission Analysis of Watermelon Seed Oil Methyl Ester and n-Butanol Blends Fueled Diesel Engine’, *Mathematical Problems in Engineering*, 2022. Available at: <https://doi.org/10.1155/2022/2456338>.
- Bhuiya, M. *et al.* (2019) ‘Performance and Emission Characteristics of A Compression Ignition Engine Operated with Beauty Leaf Biodiesel’, *Energy Procedia*, 160(2018), pp. 641–647. Available at: <http://dx.doi.org/10.1016/j.egypro.2019.02.216>.
- Bhushan, B. (2013) *Introduction to Tribology*. 2nd edn. Wiley.
- Birhanu, T.T. and Zeleke, D.S. (2024) ‘Evaluating the effect of diethyl ether and moringa oleifera antioxidant additives on the performance and emission characteristics of jatropha biodiesel-diesel blended fuel on CI engine – An experimental investigation’, *Heliyon*, 10(10). Available at: <https://doi.org/10.1016/j.heliyon.2024.e31436>.
- Blanco-Rodriguez, D.-I.D. (2014) *Modelling and Observation of Exhaust Gas Concentrations for Diesel Engine Control*. Springer Theses. Available at: <http://link.springer.com/10.1007/978-3-319-06737-7>.
- BP (2022) ‘BP Statistical Review of World Energy 2022,( 71st edition)’, <Https://Www.Bp.Com/Content/Dam/Bp/Business-Sites/En/Global/Corporate/Pdfs/Energy-Economics/Statistical-Review/Bp-Stats-Review-2022-Full-Report.Pdf>, pp. 1–60. Available at: <https://www.bp.com/content/dam/bp/business-sites/en/global/corporate/pdfs/energy-economics/statistical-review/bp-stats-review-2022-full-report.pdf>.
- British Petroleum (2023) ‘bp Energy Outlook 2023 edition 2023 explores the key trends and uncertainties’, *Statistical Review of World Energy*, (July), pp. 1–

53.

- Cahyo, N. *et al.* (2023) ‘Impact of crude palm oil on engine performance, emission product, deposit formation, and lubricating oil degradation of low-speed diesel engine: An experimental study’, *Results in Engineering*, 18(May), pp. 0–7. Available at: <https://doi.org/10.1016/j.rineng.2023.101156>.
- Cengel, Y.A., Boles, M.A. and Kanoglu, M. (2020) ‘Gas Power Cycles’, *Thermodynamics and Heat Power*, pp. 446–495. Available at: <https://doi.org/10.1201/b17736-13>.
- Chen, Q. *et al.* (2023) ‘Dry Sliding Wear Behavior and Mild–Severe Wear Transition of the AA2195-T6 Alloy under Different Loads’, *Crystals*, 13(4), pp. 1–12. Available at: <https://doi.org/10.3390/crust13040698>.
- Chen, Y. *et al.* (2023) ‘Utilization of renewable biodiesel blends with different proportions for the improvements of performance and emission characteristics of a diesel engine’, *Heliyon*, 9(9), pp. 1–18. Available at: <https://doi.org/10.1016/j.heliyon.2023.e19196>.
- Chimezie, E.C. *et al.* (2023) ‘Yield optimization and fuel properties evaluation of the biodiesel derived from avocado pear waste’, *Industrial Crops and Products*, 191(PA), p. 115884. Available at: <https://doi.org/10.1016/j.indcrop.2022.115884>.
- Chłopek, Z. *et al.* (2023) ‘Operational Issues of Using Replacement Fuels to Power Internal Combustion Engines’, *Energies*, 16(6). Available at: <https://doi.org/10.3390/en16062643>.
- Chuepeng, S., Pirompugd, W. and Sutheerasak, E. (2022) ‘Performance and emissions of a diesel engine fueled with palm oil ethyl ester combined with fumigated ethanol on a dual fuel mode’, *Energy Reports*, 9, pp. 470–477. Available at: <https://doi.org/10.1016/j.egyr.2022.11.067>.
- Çılğın, E., Deviren, H. and Arpa, O. (2023) ‘Acetone and nanoparticles effect on performance and exhaust emissions of a diesel engine’, *Case Studies in Thermal Engineering*, 52(August). Available at:

- [https://doi.org/10.1016/j.csite.2023.103755.](https://doi.org/10.1016/j.csite.2023.103755)
- Constantine D. Rakopoulos, E.G.G. (2009) *Diesel Engine Transient Operation: Principles of Operation and Simulation Analysis*. Springer.
- Costa do Nascimento, D. *et al.* (2020) ‘Flash point prediction with UNIFAC type models of ethylic biodiesel and binary/ternary mixtures of FAEEs’, *Fuel*, 281(July). Available at: <https://doi.org/10.1016/j.fuel.2020.118717>.
- Dabi, M. and Saha, U.K. (2022) ‘Performance, combustion and emissions analyses of a single-cylinder stationary compression ignition engine powered by Mesua Ferrea Linn oil-ethanol-diesel blend’, *Cleaner Engineering and Technology*, 8(May 2021). Available at: <https://doi.org/10.1016/j.clet.2022.100458>.
- Dani, D.H.T.P., Ilminnafik, N. and Muhammad, A. (2022) ‘The Effect of Transesterification Process Using KOH Catalyst on the Characteristics of Biodiesel from Sterculia Foetida Seeds as Additional Fuel’, *Jurnal Keteknikan Pertanian*, 10(3), pp. 253–267. Available at: <https://doi.org/10.19028/jtep.010.3.253-267>.
- Demirbas, A. (2008) *Biodiesel: A Realistic Fuel Alternative for Diesel Engines*, *Jurnal Sains dan Seni ITS*. Springer. Available at: <http://repositorio.unan.edu.ni/2986/1/5624.pdf> <http://fiskal.kemenkeu.go.id/ejournal> <http://dx.doi.org/10.1016/j.cirp.2016.06.001> <http://dx.doi.org/10.1016/j.powtec.2016.12.055> <https://doi.org/10.1016/j.ijftigue.2019.02.006> <https://doi.org/10.1>.
- Devarajan, Y. *et al.* (2020) ‘An experimental study on the influence of an oxygenated additive in diesel engine fuelled with neat papaya seed biodiesel/diesel blends’, *Fuel*, 268(January), p. 117254. Available at: <https://doi.org/10.1016/j.fuel.2020.117254>.
- Dewan Energi Nasional (2022) ‘Laporan Analisis Neraca Energi Nasional’, *Sekretariat Jenderal Dewan Energi Nasional*, 1(1), pp. 1–108.
- Dey, G.R. (2023) ‘Approach for C1 to C2 products commencing from carbon

- dioxide: A brief review’, *Petroleum* [Preprint], (xxxx). Available at: <https://doi.org/10.1016/j.petlm.2023.07.002>.
- Dimawarnita, F. *et al.* (2021) ‘Produksi Biodiesel Berbasis Minyak Nabati Menggunakan Aspen Hysys’, *Jurnal Teknologi Industri Pertanian*, 31(1), pp. 98–109. Available at: <https://doi.org/10.24961/j.tek.ind.pert.2021.31.1.98>.
- Direktorat Jendral Perkebunan (2022) ‘Statistik Perkebunan Non Unggulan Nasional 2020-2022’, *Sekretariat Direktorat Jendral Perkebunan*, pp. 1–572.
- Ennetta, R. *et al.* (2022) ‘Current Technologies and Future Trends for Biodiesel Production: A Review’, *Arabian Journal for Science and Engineering*, 47(12), pp. 15133–15151. Available at: <https://doi.org/10.1007/s13369-022-07121-9>.
- ESDM, K. (2022) ‘Statistik Minyak dan Gas Bumi 2022’.
- ESDM, K. (2023) ‘Pedoman Implementasi Pencampuran Bahan Bakar Nabati Jenis Biodiesel ke Dalam Bahan Bakar Minyak Jenis Minyak Solar Sebesar 35% (B35)’.
- Estevez, R. *et al.* (2022) ‘Biodiesel Is Dead: Long Life to Advanced Biofuels—A Comprehensive Critical Review’, *Energies*, 15(9). Available at: <https://doi.org/10.3390/en15093173>.
- Fayad, M.A. *et al.* (2024) ‘Effect of FIPs strategy and nanoparticles additives into the renewable fuel blends on NOX emissions, PM size distribution and soot oxidation in CRDI diesel engine’, *Results in Engineering*, 21(October 2023), pp. 1–12. Available at: <https://doi.org/10.1016/j.rineng.2024.101748>.
- Fayaz, H. *et al.* (2021) ‘Collective effect of ternary nano fuel blends on the diesel engine performance and emissions characteristics’, *Fuel*, 293(February), p. 120420. Available at: <https://doi.org/10.1016/j.fuel.2021.120420>.
- Fayyaz, H.H. *et al.* (2023) ‘A comprehensive study on the performance and

- emission analysis in diesel engine via optimization of novel ternary fuel blends: Diesel, manganese, and diethyl ether', *Heliyon*, 9(10). Available at: <https://doi.org/10.1016/j.heliyon.2023.e21133>.
- Figari, M. *et al.* (2022) 'Parametric investigation and optimal selection of the hybrid turbocharger system for a large marine four-stroke dual-fuel engine', *Applied Thermal Engineering*, 208(November 2021). Available at: <https://doi.org/10.1016/j.applthermaleng.2021.117991>.
- Gad, M.S., Abdel Aziz, M.M. and Kayed, H. (2022a) 'Impact of different nano additives on performance, combustion, emissions and exergetic analysis of a diesel engine using waste cooking oil biodiesel', *Propulsion and Power Research*, 11(2), pp. 209–223. Available at: <https://doi.org/10.1016/j.jppr.2022.04.004>.
- Gad, M.S., Abdel Aziz, M.M. and Kayed, H. (2022b) 'Performance, emissions and exergy analyses of adding CNTs to various biodiesel feedstocks', *Propulsion and Power Research*, 11(4), pp. 511–526. Available at: <https://doi.org/10.1016/j.jppr.2022.09.003>.
- Ganesan, V. (2012) *IC ENGINE fourth Edition*, Tata McGraw Hill Education Private Limited.
- Gavhane, R.S. and Kate, A.M. (2022) 'The effect of Sr-doped zinc oxide nanoadditives on the performance and emission parameters of a VCR engine powered by soybean biodiesel', *Heat Transfer*, 51(6), pp. 5481–5496. Available at: <https://doi.org/10.1002/htj.22556>.
- Gizaw, B.M. (2020) 'Improvement of performance , combustion and emission characteristics of diesel engine using different methods ( approaches ) – a review study', (August), pp. 1–10.
- Guerrero, E.E., Portilla, Á.A. and Pontón, P.I. (2022) 'The effect of TiO<sub>2</sub>/ethylene glycol-based nanocoolant on the pollutant emissions from a diesel passenger van at Quito ambient conditions', *Materials Today: Proceedings*, 49, pp. 129–134. Available at: <https://doi.org/10.1016/j.matpr.2021.07.483>.

- Gzate, Y. *et al.* (2024) ‘Performance testing of moringa oleifera seed oil biodiesel with additives in diesel engine’, *Heliyon*, 10(4), p. e26293. Available at: <https://doi.org/10.1016/j.heliyon.2024.e26293>.
- Hamzah, A. *et al.* (2022) ‘Deposit formation in the injector of a diesel engine fueled with higher blended palm biodiesel’, *Jurnal Tribologi*, 33(November 2021), pp. 97–112.
- Hananto, A.L. *et al.* (2023) ‘Elman and cascade neural networks with conjugate gradient Polak-Ribière restarts to predict diesel engine performance and emissions fueled by butanol as sustainable biofuel’, *Results in Engineering*, 19(June). Available at: <https://doi.org/10.1016/j.rineng.2023.101334>.
- Harshavardhan Reddy, K. and Kasianantham, N. (2024) ‘Sustainable assessment of low viscous biofuel for compression ignition engine using wear debris analysis – Tribological investigation’, *Case Studies in Thermal Engineering*, 58(February). Available at: <https://doi.org/10.1016/j.csite.2024.104443>.
- Hartono, Z.A. and Cahyono, B. (2020) ‘Effect of Using B30 Palm Oil Biodiesel to Deposit Forming and Wear Metal of Diesel Engine Components’, *International Journal of Marine Engineering Innovation and Research*, 5(1), pp. 2548–1479.
- Hasnain, S.M.M. *et al.* (2024) ‘Investigation and impact assessment of soybean biodiesel, methyl oleate, and diesel blends on CRDI performance and emissions’, *Materials Science for Energy Technologies*, 7(August 2023), pp. 124–132. Available at: <https://doi.org/10.1016/j.mset.2023.09.002>.
- Hassan, T. *et al.* (2023) ‘Effect of Ni and Al nanoadditives on the performance and emission characteristics of a diesel engine fueled with diesel-castor oil biodiesel-n-butanol blends’, *Case Studies in Chemical and Environmental Engineering*, 8(September). Available at: <https://doi.org/10.1016/j.cscee.2023.100531>.
- Heywood, J.B. (1988) *Internal Combustion Engine Fundamentals*. N. York: McGraw-Hill.

- Hossain, A.K. *et al.* (2023) ‘Energy outputs and emissions of biodiesels as a function of coolant temperature and composition’, *Renewable Energy*, 215(July). Available at: <https://doi.org/10.1016/j.renene.2023.119008>.
- Hossain, A.K. and Hussain, A. (2019) ‘Impact of nanoadditives on the performance and combustion characteristics of neat Jatropha biodiesel’, *Energies*, 12(5). Available at: <https://doi.org/10.3390/en12050921>.
- Huang, Lirong, Minjie Huang, Junhua Du, Zhigang Liu, Wei Li, J.Z. (2024) ‘Study on the friction and wear properties of UHMWPE/SiO<sub>2</sub> composite materials’, *Materials*, 17, pp. 1–12.
- Ikuo Kimura, Atsuhiko Ichimura, Ryuji Ohue-Kitano, and M.I. (2020) ‘FREE FATTY ACID RECEPTORS IN HEALTH AND DISEASE DISEASE’, *Physiological Reviews*, pp. 171–210. Available at: <https://doi.org/10.1152/physrev.00041.2018>.
- Irvin Glassman, R.A.Y. (2008) *Combustion*. Fourth Edi. Elsevier.
- Ismael, M.A. *et al.* (2024) ‘Gas to liquid (GTL) role in diesel engine: Fuel characteristics and emission: A review’, *Cleaner Engineering and Technology*, 18(November 2023). Available at: <https://doi.org/10.1016/j.clet.2023.100706>.
- Jaat, N. *et al.* (2021) ‘Investigation of Performance Characteristics of Plastic Pyrolysis Oil and Crude Palm Oil Fuel on Diesel Engine’, *International Journal of Engineering Trends and Technology*, 69(12), pp. 312–318. Available at: <https://doi.org/10.14445/22315381/IJETT-V69I12P238>.
- Jain, N.L. *et al.* (2019) ‘A durability study of a compression ignition engine operating with Thumba (*Citrullus colocynthis*) vegetable oil’, *Environmental Science and Pollution Research*, 26(9), pp. 8992–9004. Available at: <https://doi.org/10.1007/s11356-019-04237-8>.
- Jikol, F. *et al.* (2022) ‘Deposits Formation, Emissions, and Mechanical Performance of Diesel Engine Fuelled with Biodiesel: A Review’, *International Journal of Nanoelectronics and Materials*, 15(Special Issue),

- pp. 125–145.
- Jit Sarma, C. *et al.* (2023) ‘Improving the combustion and emission performance of a diesel engine powered with mahua biodiesel and TiO<sub>2</sub> nanoparticles additive’, *Alexandria Engineering Journal*, 72(April), pp. 387–398. Available at: <https://doi.org/10.1016/j.aej.2023.03.070>.
- Joshi, R. and Arakeri, J. (2024) ‘Long-distance sinusoidal actuation in self-propelling apparatus: a novel spiral spring-based crank rocker mechanism’, *Sadhana - Academy Proceedings in Engineering Sciences*, 49(1). Available at: <https://doi.org/10.1007/s12046-023-02386-8>.
- Karami, S. *et al.* (2024) ‘Evaluation of the efficiency and exhaust emissions of a diesel engine through the incorporation of nano-materials into the engine lubricant’, *Cleaner Engineering and Technology*, 18(December 2023). Available at: <https://doi.org/10.1016/j.clet.2024.100723>.
- Karami, S. and Gharehghani, A. (2021) ‘Effect of nano-particles concentrations on the energy and exergy efficiency improvement of indirect-injection diesel engine’, *Energy Reports*, 7, pp. 3273–3285. Available at: <https://doi.org/10.1016/j.egyr.2021.05.050>.
- Karin, P., Chammana, P., *et al.* (2022) ‘Impact of soot nanoparticle size and quantity on four-ball steel wear characteristics using EDS, XRD and electron microscopy image analysis’, *Journal of Materials Research and Technology*, 16, pp. 1781–1791. Available at: <https://doi.org/10.1016/j.jmrt.2021.12.111>.
- Karin, P., Tripatara, A., *et al.* (2022) ‘Influence of ethanol-biodiesel blends on diesel engines combustion behavior and particulate matter physicochemical characteristics’, *Case Studies in Chemical and Environmental Engineering*, 6(June). Available at: <https://doi.org/10.1016/j.cscee.2022.100249>.
- Kathumbi, L.K. *et al.* (2023) ‘Performance and emission characteristics of a diesel engine fuelled by biodiesel from black soldier fly larvae: Effects of synthesizing catalysts with citric acid’, *Heliyon*, 9(11). Available at: <https://doi.org/10.1016/j.heliyon.2023.e21354>.

- Kemenkeu (2022) ‘Nota Keuangan RAPBN 2023’, pp. 131–132.
- Khamhuatoey, S. *et al.* (2023) ‘Upgrading Pyrolysis Bio-Oil through Esterification Process and Assessing the Performance and Emissions of Diesel-Biodiesel-Esterified Pyrolysis Bio-Oil Blends in Direct Injection Diesel Engines’, *ACS Omega*, 8(47), pp. 44586–44600. Available at: <https://doi.org/10.1021/acsomega.3c05007>.
- Kim, C. *et al.* (2023) ‘Power characteristics with different types of turbochargers for lean boosted hydrogen direct injection engine in NOx-free operation’, *Heliyon*, 9(3). Available at: <https://doi.org/10.1016/j.heliyon.2023.e14186>.
- Kim, H.Y., Ge, J.C. and Choi, N.J. (2019) ‘Effects of fuel injection pressure on combustion and emission characteristics under low speed conditions in a diesel engine fueled with palm oil biodiesel’, *Energies*, 12(17). Available at: <https://doi.org/10.3390/en12173264>.
- Kirkby, T. *et al.* (2023) ‘Soot wear mechanisms in heavy-duty diesel engine contacts’, *Wear*, 524–525(March), p. 204733. Available at: <https://doi.org/10.1016/j.wear.2023.204733>.
- Klaus Mollehauer, H.T. (2010) *Handbook of Diesel Engine*. Springer. Available at: <https://doi.org/10.1007/978-3-540-89083-6>.
- KLHK (2021) ‘Baku Mutu Emisi Mesin dengan Pembakarna Dalam’, (0), pp. 1–23.
- Koten, H. (2018) ‘Hydrogen effects on the diesel engine performance and emissions’, *International Journal of Hydrogen Energy*, 43(22), pp. 10511–10519. Available at: <https://doi.org/10.1016/j.ijhydene.2018.04.146>.
- Kowalski, S. *et al.* (2023) ‘Analysis of the Operational Wear of the Combustion Engine Piston Pin’, *Lubricants*, 11(3), pp. 1–13. Available at: <https://doi.org/10.3390/lubricants11030100>.
- Krishnakumar, S. *et al.* (2021) ‘Influence of graphene nano particles and antioxidants with waste cooking oil biodiesel and diesel blends on engine performance and emissions’, *Energies*, 14(14). Available at:

- [https://doi.org/10.3390/en14144306.](https://doi.org/10.3390/en14144306)
- Labeckas, G. and Slavinskas, S. (2021) ‘Comparative evaluation of the combustion process and emissions of a diesel engine operating on the cetane improver 2-Ethylhexyl nitrate doped rapeseed oil and aviation JP-8 fuel’, *Energy Conversion and Management*: X, 11(August). Available at: <https://doi.org/10.1016/j.ecmx.2021.100106>.
- Leykun, M.G. and Mekonen, M.W. (2022) ‘Investigation of the Performance and Emission Characteristics of Diesel Engine Fueled with Biogas-Diesel Dual Fuel’, *Fuels*, 3(1), pp. 15–30. Available at: <https://doi.org/10.3390/fuels3010002>.
- Li, K., Chen, J. and Nie, X. an (2023) ‘Synthesis of biodiesel from waste oil by glycerol pre-esterification’, *Energy Reports*, 10(April 2022), pp. 3223–3228. Available at: <https://doi.org/10.1016/j.egyr.2023.09.186>.
- Lin, C.Y. and Lin, Y.W. (2023) ‘Engine Performance of High-Acid Oil-Biodiesel through Supercritical Transesterification’, *ACS Omega* [Preprint]. Available at: <https://doi.org/10.1021/acsomega.3c06997>.
- Lin, J.H., Wang, B.X. and Wei, L.D. (2021) ‘Bench experimental research of cylinder oil on large marine diesel engines’, *Journal of Physics: Conference Series*, 1777(1). Available at: <https://doi.org/10.1088/1742-6596/1777/1/012040>.
- Linhares, F.G. *et al.* (2019) ‘Photoacoustic spectroscopy for detection of N<sub>2</sub>O emitted from combustion of diesel/beef tallow biodiesel/sugarcane diesel and diesel/beef tallow biodiesel blends’, *Biomass Conversion and Biorefinery*, 9(3), pp. 577–583. Available at: <https://doi.org/10.1007/s13399-019-00372-x>.
- Ludema, K.C. (1996) *Friction, Wear and Lubrication: A Textbook in Tribology*, CRC Press. CRC Press. Available at: <https://doi.org/10.1108/ilt.1998.01850eae.001>.
- Manikandan, G. *et al.* (2023) ‘Performance analysis of a diesel engine using

- margosa oil ethyl ester-based biodiesel with diethyl ether as an oxygenated additive’, *Case Studies in Thermal Engineering*, 50(July). Available at: <https://doi.org/10.1016/j.csite.2023.103496>.
- Manivannan, A., Prabu, R. and Kumar, K.M. (2021) ‘Investigation on influence of blending Jatropha biofuel with diesel to improve fuel quality’, *Australian Journal of Mechanical Engineering*, 19(1), pp. 49–56. Available at: <https://doi.org/10.1080/14484846.2019.1567029>.
- Maroa, S. and Inambao, F. (2020) *Biodiesel, Combustion, Performance and Emissions Characteristics*. Available at: <https://doi.org/10.1007/978-3-030-51166-1>.
- Mazuro, P. and Kozak, D. (2024) ‘Effect of variable geometry turbocharger on the performance of the opposed piston engine – An experimental approach’, *Applied Thermal Engineering*, 236(March 2023). Available at: <https://doi.org/10.1016/j.applthermaleng.2023.121602>.
- Milano, J. et al. (2022) ‘Tribological study on the biodiesel produced from waste cooking oil, waste cooking oil blend with Calophyllum inophyllum and its diesel blends on lubricant oil’, *Energy Reports*, 8, pp. 1578–1590. Available at: <https://doi.org/10.1016/j.egyr.2021.12.059>.
- Modi, V. et al. (2024) ‘Nanoparticle-enhanced biodiesel blends: A comprehensive review on improving engine performance and emissions’, *Materials Science for Energy Technologies*, 7(November 2023), pp. 257–273. Available at: <https://doi.org/10.1016/j.mset.2024.02.001>.
- Mofijur, M. et al. (2024) ‘Impact of nanoparticle-based fuel additives on biodiesel combustion: An analysis of fuel properties, engine performance, emissions, and combustion characteristics’, *Energy Conversion and Management: X*, 21(September 2023). Available at: <https://doi.org/10.1016/j.ecmx.2023.100515>.
- Muhaemin, M. et al. (2019) ‘Performance Test of a Diesel Engine with Biodiesel from Kemiri Sunan (Rutealis sperma.)’, *IOP Conference Series: Earth and Environmental Science*, 355(1). Available at: <https://doi.org/10.1088/1755->

1315/355/1/012113.

- Mujtaba, M.A. *et al.* (2020) ‘Ultrasound-assisted process optimization and tribological characteristics of biodiesel from palm-sesame oil via response surface methodology and extreme learning machine - Cuckoo search’, *Renewable Energy*, 158, pp. 202–214. Available at: <https://doi.org/10.1016/j.renene.2020.05.158>.
- Murdiyanto, D., Mbulu, B.C.P. and Yuswantoro, I. (2023) ‘Calculation of Power Requirements to Drive the Belt Winder Prototype Printed by a 3D Printer’, *Jurnal Metal*, 1, pp. 4–9.
- Mustangin, M. *et al.* (2024) ‘Development of high free fatty acid crude palm oil as a biodegradable electrical liquid insulator as an alternative to mineral oil-based insulators’, *Cleaner Engineering and Technology*, 18(November 2023), p. 100712. Available at: <https://doi.org/10.1016/j.clet.2023.100712>.
- Nabi, M.N. *et al.* (2022) ‘Investigation of engine performance, combustion, and emissions using waste tire Oil-Diesel-Glycine max biodiesel blends in a diesel engine’, *Case Studies in Thermal Engineering*, 39(April). Available at: <https://doi.org/10.1016/j.csite.2022.102435>.
- Nadimi, E. *et al.* (2023) ‘Effects of ammonia on combustion, emissions, and performance of the ammonia/diesel dual-fuel compression ignition engine’, *Journal of the Energy Institute*, 107(September 2022). Available at: <https://doi.org/10.1016/j.joei.2022.101158>.
- Nautiyal, P. *et al.* (2020) ‘Experimental assessment of performance, combustion and emissions of a compression ignition engine fuelled with Spirulina platensis biodiesel’, *Energy*, 193, p. 116861. Available at: <https://doi.org/10.1016/j.energy.2019.116861>.
- Ngwaka, U.C., Diyoke, C. and Anosike, N. (2016) ‘Single Zone, Zero Dimensional Model of Diesel Multiple-Injection’, *Energy and Power Engineering*, 08(09), pp. 297–312. Available at: <https://doi.org/10.4236/epe.2016.89028>.
- Obeid, F. *et al.* (2022) ‘Engine performance and emissions from fuels containing

- nitrogen and sulphur', *Energy Conversion and Management: X*, 14(January). Available at: <https://doi.org/10.1016/j.ecmx.2022.100179>.
- Ogunkunle, O. and Ahmed, N.A. (2020) 'Exhaust emissions and engine performance analysis of a marine diesel engine fuelledwith Parinari polyandra biodiesel–diesel blends', *Energy Reports*, 6, pp. 2999–3007. Available at: <https://doi.org/10.1016/j.egyr.2020.10.070>.
- Ooi, J.B. *et al.* (2023) 'Effects of multi-walled carbon nanotubes on the combustion, performance, and emission characteristics of a single-cylinder diesel engine fueled with palm-oil biodiesel-diesel blend', *Energy*, 281(July). Available at: <https://doi.org/10.1016/j.energy.2023.128350>.
- Opalka, M. (2022) 'Static friction of normal and reversed metal-polymer sliding pairs', *Materials Science- Poland*, 40(3), pp. 152–159. Available at: <https://doi.org/10.2478/msp-2022-0040>.
- Palani, Y. *et al.* (2022) 'Performance and emission characteristics of diesel engine using ether additives: A review', *International Journal of Renewable Energy Development*, 11(1), pp. 255–274. Available at: <https://doi.org/10.14710/ijred.2022.42522>.
- Paminto, A., Karuniasa, M. and Frimawaty, E. (2022) 'Potential Environmental Impact of Biodiesel Production from Palm Oil using LCA (Life Cycle Assessment) in Indonesia', *Jurnal Pengelolaan Sumberdaya Alam dan Lingkungan (Journal of Natural Resources and Environmental Management)*, 12(1), pp. 64–71. Available at: <https://doi.org/10.29244/jpsl.12.1.64-71>.
- Pertamina, E.I. (2022) 'Energy outlook 2022'.
- Prabu, A. (2024) 'Influence of introducing clove antioxidant into blends of diesel and biodiesel fuels on engine performance', *Next Energy*, 2(August 2023), p. 100047. Available at: <https://doi.org/10.1016/j.nxener.2023.100047>.
- Prasetyo, J. *et al.* (2024) 'Optimization of used cooking oil for biodiesel using CaO-derived of bovine bone catalyst', *South African Journal of Chemical*

- Engineering*, 48(August 2023), pp. 95–102. Available at: <https://doi.org/10.1016/j.sajce.2024.01.008>.
- Pullagura, G. *et al.* (2024a) ‘Performance, combustion and emission reduction characteristics of Metal-based silicon dioxide nanoparticle additives included in ternary fuel (diesel-SMME-iso butanol) on diesel engine’, *Heliyon*, 10(February), p. e26519. Available at: <https://doi.org/10.1016/j.heliyon.2024.e26519>.
- Pullagura, G. *et al.* (2024b) ‘Performance, combustion and emission reduction characteristics of Metal-based silicon dioxide nanoparticle additives included in ternary fuel (diesel-SMME-iso butanol) on diesel engine’, *Heliyon*, 10(November 2023), p. e26519. Available at: <https://doi.org/10.1016/j.heliyon.2024.e26519>.
- Purwanto, E. *et al.* (2021) ‘Analysis of Diesel Engine Components Durability on Fishing Vessel Fueled with Biodiesel (B30)’, *International Journal of Marine Engineering Innovation and Research*, 6(3), pp. 204–209. Available at: <https://doi.org/10.12962/j25481479.v6i3.9451>.
- Rai, R.K. and Sahoo, R.R. (2019) ‘Effective power and effective power density analysis for water in diesel emulsion as fuel in diesel engine performance’, *Energy*, 180, pp. 893–902. Available at: <https://doi.org/10.1016/j.energy.2019.05.134>.
- Raja. K.S, S. *et al.* (2021) ‘Emissions and Performance Investigation on the Effect of Dual Fuel Injection in Biodiesel Driven Diesel Engine’, *Energy Sources, Part A: Recovery, Utilization and Environmental Effects*, 00(00), pp. 1–11. Available at: <https://doi.org/10.1080/15567036.2021.1877372>.
- Rajak, U. *et al.* (2022) ‘The effects on performance and emission characteristics of DI engine fuelled with CeO<sub>2</sub> nanoparticles addition in diesel/tyre pyrolysis oil blends’, *Environment, Development and Sustainability* [Preprint], (0123456789). Available at: <https://doi.org/10.1007/s10668-022-02358-8>.
- Rajak, U., Nashine, P. and Verma, T.N. (2019) ‘Assessment of diesel engine performance using spirulina microalgae biodiesel’, *Energy*, 166, pp. 1025–

1036. Available at: <https://doi.org/10.1016/j.energy.2018.10.098>.
- Rajendran, S. *et al.* (2023) ‘Effect of injection timing on combustion, emission and performance characteristics of safflower methyl ester in CI engine’, *Results in Engineering*, 20(September). Available at: <https://doi.org/10.1016/j.rineng.2023.101599>.
- Rajkumari, K. and Rokhum, L. (2020) ‘A sustainable protocol for production of biodiesel by transesterification of soybean oil using banana trunk ash as a heterogeneous catalyst’, *Biomass Conversion and Biorefinery*, 10(4), pp. 839–848. Available at: <https://doi.org/10.1007/s13399-020-00647-8>.
- Raju, V.D. *et al.* (2023) ‘Comprehensive Analysis of Compression Ratio, Exhaust Gas Recirculation, and Pilot Fuel Injection in a Diesel Engine Fuelled with Tamarind Biodiesel’, *Sustainability*, 15(21), p. 15222. Available at: <https://doi.org/10.3390/su152115222>.
- Ramalingam, S. and Mahalakshmi, N. V. (2020) ‘Influence of Moringa oleifera biodiesel-diesel-hexanol and biodiesel-diesel-ethanol blends on compression ignition engine performance, combustion and emission characteristics’, *RSC Advances*, 10(8), pp. 4274–4285. Available at: <https://doi.org/10.1039/c9ra09582a>.
- Raman, L.A. *et al.* (2019) ‘Experimental investigation on performance, combustion and emission analysis of a direct injection diesel engine fuelled with rapeseed oil biodiesel’, *Fuel*, 246(January), pp. 69–74. Available at: <https://doi.org/10.1016/j.fuel.2019.02.106>.
- Rathinavelu, V. *et al.* (2024) ‘Production of green hydrogen from sewage sludge / algae in agriculture diesel engine: Performance Evaluation’, *Heliyon*, 10(1). Available at: <https://doi.org/10.1016/j.heliyon.2024.e23988>.
- Ratios, C. (2023) ‘Evaluation of Hydrogen Addition on Combustion and Emission Characteristics of Dual-Fuel Diesel Engines with Different Compression Ratios’.
- Razzaq, L. *et al.* (2020) ‘Maximising yield and engine efficiency using Optimised

- waste cooking oil biodiesel', *Energies*, 13(22), pp. 1–16. Available at: <https://doi.org/10.3390/en13225941>.
- Razzaq, L. *et al.* (2023) 'Influence of varying concentrations of TiO<sub>2</sub> nanoparticles and engine speed on the performance and emissions of diesel engine operated on waste cooking oil biodiesel blends using response surface methodology', *Heliyon*, 9(7). Available at: <https://doi.org/10.1016/j.heliyon.2023.e17758>.
- Reddy, S.M. *et al.* (2018) 'Effect of non-edible oil and its biodiesel on wear of fuel injection equipment components of a genset engine', *Fuel*, 222(May 2017), pp. 841–851. Available at: <https://doi.org/10.1016/j.fuel.2018.02.132>.
- Reif, K. (2014) *Diesel Engine Management: Systems and Components*, *Diesel Engine Management: Systems and Components*. Available at: <https://doi.org/10.1007/978-3-658-03981-3>.
- Rizaldy, N.D. and Johanes, S. (2021) 'Analisa Perubahan Sifat Pelumas Terhadap Keausan Dan Performa Engine SAA12v140E-3 Komatsu HD785-7', *Jurnal Material Teknologi Proses: Warta Kemajuan Bidang Material Teknik Teknologi Proses*, 2(1), p. 6. Available at: <https://doi.org/10.22146/jmtp.66065>.
- Rorimpandey, P. *et al.* (2022) 'ScienceDirect combustion under compression-ignition engine conditions', 8. Available at: <https://doi.org/10.1016/j.ijhydene.2022.09.241>.
- Russo, D., Portarapillo, M. and Di Benedetto, A. (2023) 'Flash point of biodiesel/glycerol/alcohol mixtures for safe processing and storage', *Journal of Loss Prevention in the Process Industries*, 83(May 2022). Available at: <https://doi.org/10.1016/j.jlp.2023.105077>.
- Said, M.A. *et al.* (2022) 'Influence of biogas mixing parameters on the combustion and emission characteristics of diesel RCCI engine', *Alexandria Engineering Journal*, 61(2), pp. 1479–1497. Available at: <https://doi.org/10.1016/j.aej.2021.06.052>.

- Sakthivadivel, D. *et al.* (2022) ‘A neem oil-based biodiesel with DEE enriched ethanol and Al<sub>2</sub>O<sub>3</sub>nano additive: An experimental investigation on the diesel engine performance’, *Case Studies in Thermal Engineering*, 34(April), pp. 0–11. Available at: <https://doi.org/10.1016/j.csite.2022.102021>.
- Santos, T.K. *et al.* (2023) ‘Performance and Emission Characteristics of Sesame Biodiesel Blends in Diesel Engine’, *Engenharia Agricola*, 43(5), pp. 0–1. Available at: <https://doi.org/10.1590/1809-4430-Eng.Agric.v43n5e20220229/2023>.
- Sanyogita Shahi, Tripti Sahu and Shirish Kumar Singh (2023) ‘A Review on Biodiesel and Effect of Oxygenize’, *Journal of Advanced Zoology*, 44(S3), pp. 1684–1689. Available at: <https://doi.org/10.17762/jaz.v44is3.2386>.
- Saputro, W. (2022) *Pengujian Karakteristik Crude Palm Oil*.
- Sari, U. (2019) ‘Using the Arduino for the experimental determination of a friction coefficient by movement on an inclined plane’, *Physics Education*, 54(3). Available at: <https://doi.org/10.1088/1361-6552/ab0919>.
- Saxena, M.R., Maurya, R.K. and Mishra, P. (2021) ‘Assessment of performance, combustion and emissions characteristics of methanol-diesel dual-fuel compression ignition engine: A review’, *Journal of Traffic and Transportation Engineering (English Edition)*, 8(5), pp. 638–680. Available at: <https://doi.org/10.1016/j.jtte.2021.02.003>.
- Sayyed, S. *et al.* (2023) ‘Influence of additive mixed ethanol-biodiesel blends on diesel engine characteristics’, *Alexandria Engineering Journal*, 71, pp. 619–629. Available at: <https://doi.org/10.1016/j.aej.2023.03.091>.
- Sebayang, A.H. *et al.* (2022) ‘Modelling and prediction approach for engine performance and exhaust emission based on artificial intelligence of sterculia foetida biodiesel’, *Energy Reports*, 8, pp. 8333–8345. Available at: <https://doi.org/10.1016/j.egyr.2022.06.052>.
- Sentanuhady, J., Saputro, W. and Muflikhun, M.A. (2021) ‘Metals and chemical

- compounds contaminants in diesel engine lubricant with B20 and B100 biofuels for long term operation’, *Sustainable Energy Technologies and Assessments*, 45(March). Available at:  
<https://doi.org/10.1016/j.seta.2021.101161>.
- Senthilkumar, C. and Dhanalakshmi, C.S. (2023) ‘Performance Study on Diesel Engine Using Various Blends of Epoxidized Soybean Oil’, 10, pp. 3949–3956.
- Shin, J. *et al.* (2022) ‘Pre-chamber combustion system for heavy-duty engines for operating dual fuel and diesel modes’, *Energy Conversion and Management*, 255. Available at:  
<https://doi.org/10.1016/j.enconman.2022.115365>.
- Sieberg, P.M., Kurtulan, D. and Hanke, S. (2022) ‘Wear Mechanism Classification Using Artificial Intelligence’, *Materials*, 15(7), pp. 1–16. Available at:  
<https://doi.org/10.3390/ma15072358>.
- Simhadri, K., Rao, P.S. and Paswan, M. (2024) ‘Improving the combustion and emission performance of a diesel engine with TiO<sub>2</sub> nanoparticle blended Mahua biodiesel at different injection pressures’, *International Journal of Thermofluids*, 21(January), pp. 20–30. Available at:  
<https://doi.org/10.1016/j.ijft.2024.100563>.
- Sitorus, T.B. *et al.* (2022) ‘Pengaruh Bahan Bakar Biodiesel dari Dimetil Ester Terhadap Kinerja Mesin Diesel Empat Langkah’, *SJOME*, 3(2), pp. 106–114.
- Sivamurugan, P. and Devarajan, Y. (2018) ‘Emission analysis of dual fuelled diesel engine’, *International Journal of Ambient Energy*, 42(1), pp. 15–17. Available at: <https://doi.org/10.1080/01430750.2018.1517696>.
- Smail, L., Appleby, M. and Waters, C. (2020) *Biofuels and Bioenergy, The Law of Renewable Energy*. Available at:  
<https://doi.org/10.5040/9781526515155.chapter-008>.
- Soudagar, M.E.M. *et al.* (2022) ‘Investigation on the effect of cottonseed oil

- blended with different percentages of octanol and suspended MWCNT nanoparticles on diesel engine characteristics’, *Journal of Thermal Analysis and Calorimetry*, 147(1), pp. 525–542. Available at: <https://doi.org/10.1007/s10973-020-10293-x>.
- Srinivasan, S.K., Kuppusamy, R. and Krishnan, P. (2021) ‘Effect of nanoparticle-blended biodiesel mixtures on diesel engine performance, emission, and combustion characteristics’, *Environmental Science and Pollution Research*, 28(29), pp. 39210–39226. Available at: <https://doi.org/10.1007/s11356-021-13367-x>.
- Stone, R. (1985) *Introduction to Internal Combustion Engines*, Macmillan. Available at: <https://doi.org/10.4324/9781315116785-4>.
- Swain, B. et al. (2020) ‘Wear: A Serious Problem in Industry’, *Tribology in Materials and Manufacturing - Wear, Friction and Lubrication* [Preprint], (December). Available at: <https://doi.org/10.5772/intechopen.94211>.
- Taheri-Garavand, A. et al. (2022) ‘Application of artificial neural networks for the prediction of performance and exhaust emissions in IC engine using biodiesel-diesel blends containing quantum dot based on carbon doped’, *Energy Conversion and Management: X*, 16(May). Available at: <https://doi.org/10.1016/j.ecmx.2022.100304>.
- Tamoradi, T. et al. (2022) ‘RSM process optimization of biodiesel production from rapeseed oil and waste corn oil in the presence of green and novel catalyst’, *Scientific Reports*, 12(1), pp. 1–15. Available at: <https://doi.org/10.1038/s41598-022-20538-4>.
- Tamrat, S. et al. (2023a) ‘Study on the effect of dimethyl ether and diesel-castor biodiesel blends on emission and combustion characteristics’, *Fuel Communications*, 17(November), p. 100098. Available at: <https://doi.org/10.1016/j.jfueco.2023.100098>.
- Tamrat, S. et al. (2023b) ‘Study on the effect of dimethyl ether and diesel-castor biodiesel blends on emission and combustion characteristics’, *Fuel Communications*, 17(October), p. 100098. Available at:

- [https://doi.org/10.1016/j.jfueco.2023.100098.](https://doi.org/10.1016/j.jfueco.2023.100098)
- Tapas Kumar Dandasena and Sanyogita Shahi (2023) ‘A Renewable Biofuel-Bioethanol: A Review’, *Journal of Advanced Zoology*, 44(S3), pp. 1698–1706. Available at: <https://doi.org/10.17762/jaz.v44is3.2388>.
- Temizer, İ. (2020) ‘The combustion analysis and wear effect of biodiesel fuel used in a diesel engine’, *Fuel*, 270(February). Available at: <https://doi.org/10.1016/j.fuel.2020.117571>.
- TEMİZER, İ. and ARI, A. (2022) ‘Effects on ring wear of bioethanol/diesel fuel blends used at long term endurance tests in a DI engine’, *International Journal of Automotive Engineering and Technologies*, 11(4), pp. 140–151. Available at: <https://doi.org/10.18245/ijaet.1150240>.
- Tesfaye Lamore, M., Seyoum Zeleke, D. and Yitayew Kassa, B. (2023) ‘A comparative study on the effect of nano-additives on performance and emission characteristics of CI engine run on castor biodiesel blended fuel’, *Energy Conversion and Management: X*, 20(November), p. 100493. Available at: <https://doi.org/10.1016/j.ecmx.2023.100493>.
- Thawornprasert, J. *et al.* (2022) ‘Effect of Diesel-Palm Fatty Acid Distillate Ethyl Ester-Hydrous Ethanol Blend on the Performance, Emissions, and Long-Term Endurance Test on an Unmodified DI Diesel Engine’, *ACS Omega*, 7(7), pp. 5894–5907. Available at: <https://doi.org/10.1021/acsomega.1c06082>.
- Thawornprasert, J., Duangsuwan, W. and Somnuk, K. (2023) ‘Investigating the Effect of a Diesel-Refined Crude Palm Oil Methyl Ester-Hydrous Ethanol Blend on the Performance and Emissions of an Unmodified Direct Injection Diesel Engine’, *ACS Omega*, 8(10), pp. 9275–9290. Available at: <https://doi.org/10.1021/acsomega.2c07537>.
- Tipanluisa, L. *et al.* (2022) ‘Investigation of diesel/n-butanol blends as drop-in fuel for heavy-duty diesel engines: Combustion, performance, and emissions’, *Energy Conversion and Management*, 255. Available at: <https://doi.org/10.1016/j.enconman.2022.115334>.

- Tiwari, C. *et al.* (2023) ‘Energy-Exergy Analysis of Diesel Engine Fueled with Microalgae Biodiesel-Diesel Blend’, *Applied Sciences (Switzerland)*, 13(3). Available at: <https://doi.org/10.3390/app13031857>.
- Tosun, Z. and Aydin, H. (2022a) ‘Combustion, performance and emission analysis of propanol addition on safflower oil biodiesel in a diesel engine’, *Cleaner Chemical Engineering*, 3(April), p. 100041. Available at: <https://doi.org/10.1016/j.clce.2022.100041>.
- Tosun, Z. and Aydin, H. (2022b) ‘Combustion, performance and emission analysis of propanol addition on safflower oil biodiesel in a diesel engine’, *Cleaner Chemical Engineering*, 3(June), p. 100041. Available at: <https://doi.org/10.1016/j.clce.2022.100041>.
- Tse, T.J., Wiens, D.J. and Reaney, M.J.T. (2021) ‘Production of bioethanol—a review of factors affecting ethanol yield’, *Fermentation*, 7(4), pp. 1–18. Available at: <https://doi.org/10.3390/fermentation7040268>.
- Vellaiyan, S. *et al.* (2023) ‘Optimisation of fuel modification parameters for efficient and greener energy from diesel engine powered by water-emulsified biodiesel with cetane improver’, *Case Studies in Thermal Engineering*, 48(May), p. 103129. Available at: <https://doi.org/10.1016/j.csite.2023.103129>.
- Verma, T.N. *et al.* (2021) ‘A comprehensive review of the influence of physicochemical properties of biodiesel on combustion characteristics, engine performance and emissions’, *Journal of Traffic and Transportation Engineering (English Edition)*, 8(4), pp. 510–533. Available at: <https://doi.org/10.1016/j.jtte.2021.04.006>.
- Virginie, G. *et al.* (2022) ‘Biofuel Potentiality of Pineapple Peelings in the Presence of the Yeasts *Saccharomyces cerevisiae* and *Saccharomyces carlsbergensis* Phenolic Compounds View project Phenolic Compounds View project Biofuel Potentiality of Pineapple Peelings in the Presence o’, *Article in Russian Journal of Physical Chemistry*, 10(4), pp. 102–109. Available at: <https://doi.org/10.11648/j.ajpc.20221104.13>.

- Viskup, R. (2019) *Diesel and Gasoline Engines*, IntechOpen. Available at: <https://doi.org/10.5772/intechopen.75259>.
- Wahl, M.S. (2023) *Emission Reduction with an Alternative Diesel Combustion Process*.
- Wang, Baohua *et al.* (2023) ‘Enabling Catalysts for Biodiesel Production via Transesterification’, *Catalysts*, 13(4). Available at: <https://doi.org/10.3390/catal13040740>.
- Wang, Q.J. and Chung, Y.-W. (2013) *Encyclopedia of Tribology*. Springer Reference.
- Wen, Q. *et al.* (2022) ‘Experimental Investigation into the Friction Coefficient of Ball-on-Disc in Dry Sliding Contact Considering the Effects of Surface Roughness, Low Rotation Speed, and Light Normal Load’, *Lubricants*, 10(10). Available at: <https://doi.org/10.3390/lubricants10100256>.
- Winangun, K., Setiyawan, A., Sudarmanta, B. and Puspitasari, I. (2023) ‘Case Studies in Chemical and Environmental Engineering Investigation on the properties of a biodiesel-hydrogen mixture on the combustion characteristics of a diesel engine’, *Case Studies in Chemical and Environmental Engineering*, 8(May), p. 100445. Available at: <https://doi.org/10.1016/j.cscee.2023.100445>.
- Winangun, K., Setiyawan, A., Sudarmanta, B., Puspitasari, I., *et al.* (2023) ‘Investigation on properties biodiesel-hydrogen mixture on the combustion characteristics of diesel engine’, *Case Studies in Chemical and Environmental Engineering*, 8(July), p. 100445. Available at: <https://doi.org/10.1016/j.cscee.2023.100445>.
- Winangun, K., Setiyawan, A. and Sudarmanta, B. (2023) ‘The combustion characteristics and performance of a Diesel Dual-Fuel (DDF) engine fueled by palm oil biodiesel and hydrogen gas’, *Case Studies in Thermal Engineering*, 42(November 2022). Available at: <https://doi.org/10.1016/j.csite.2023.102755>.

- Wirawan, S.S. *et al.* (2024) ‘Biodiesel implementation in Indonesia: Experiences and future perspectives’, *Renewable and Sustainable Energy Reviews*, 189(October 2023). Available at: <https://doi.org/10.1016/j.rser.2023.113911>.
- Xu, H. *et al.* (2022) ‘Life Cycle Greenhouse Gas Emissions of Biodiesel and Renewable Diesel Production in the United States’, *Environmental Science and Technology*, 56(12), pp. 7512–7521. Available at: <https://doi.org/10.1021/acs.est.2c00289>.
- Yaqoob, H. *et al.* (2024) ‘Sustainable energy generation from plastic waste: An in-depth review of diesel engine application’, *Environmental Technology and Innovation*, 34. Available at: <https://doi.org/10.1016/j.eti.2023.103467>.
- Yoon, S.K. (2023) ‘Application Characteristics of Bioethanol as an Oxygenated Fuel Additive in Diesel Engines’, *Applied Sciences (Switzerland)*, 13(3). Available at: <https://doi.org/10.3390/app13031813>.
- Zeleke, D.S. and Bezabih, A.A. (2024) ‘Impact of additives from moringa stenopetala leaf extract and ethanol on the emission characteristics and performance of soybean biodiesel for single cylinder CI engine’, *Heliyon*, 10(6). Available at: <https://doi.org/10.1016/j.heliyon.2024.e27619>.
- Zhang, Z. *et al.* (2024) ‘Research and optimization of hydrogen addition and EGR on the combustion, performance, and emission of the biodiesel-hydrogen dual-fuel engine with different loads based on the RSM’, *Heliyon*, 10(1). Available at: <https://doi.org/10.1016/j.heliyon.2023.e23389>.
- Zheng, F. (2024) ‘The Effect of Different Mixing Proportions and Different Operating Conditions of Biodiesel Blended Fuel on Emissions’.