



## Prof. Dr. Ir. Ismail AB, M.Sc

<b>Position</b>	Introduction to Physics, Quantum Physics, Quantum Mechanics, Solid State Physics, Composite Physics, Classical Physics.
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<b>Academic Career</b>	<p><b>Doctorate Course:</b> Physics at the University of Tennessee USA (1999)</p> <p><b>Magister Course:</b> Physics at the University of Tennessee USA (1993)</p> <p><b>Bachelor Course:</b> Engineering Physics Department at the Institut Teknologi 10 Nopember Surabaya (1987)</p>
<b>Employment</b>	Professor of Material Physics, Department of Physics, Faculty of Mathematics and Natural Sciences, Universitas Syiah Kuala, Banda Aceh 23111, Indonesia
<b>Research and development projects (last 5 years)</b>	<ol style="list-style-type: none"> <li>1. Rice Straw Biocomposite</li> <li>2. Coconut Shell Biocomposite</li> <li>3. Oil Palm Empty Fruit Bunch Biocomposite</li> </ol>
<b>Collaborations (last 5 years)</b>	<ol style="list-style-type: none"> <li>1. Prof. Dr. H. P. S. Abdul Khalil, School of Industrial Technology, Universiti Sains Malaysia, Penang 11800, Malaysia</li> <li>2. Prof. Dr. Siti Hajar Sheikh Md Fadzullah, Centre for Advanced Research on Energy, Faculty of Mechanical Engineering, Universiti Teknikal Malaysia Melaka, Melaka, Malaysia</li> <li>3. Prof. Dr. M. Adlim, Chemistry Department, FKIP, Universitas Syiah Kuala, Darussalam, Banda Aceh 23111, Indonesia</li> </ol>
<b>Patents and proprietary rights</b>	Manufacturing Process of High-Loaded Oil Palm Empty Fruit Bunch - Epoxy Resin Biocomposite with NaOH Treatment
<b>Selective Publications (last 5 years)</b>	<ol style="list-style-type: none"> <li>1. Ismail, I., Mutiara, D., Rahwanto, A., Jalil, Z., Fathmiah, S., &amp; Fadzullah, S. H. S. M. (2025). Effect of Filler Size on the Properties of Oil Palm Empty Fruit Bunch High-Load Filler Biocomposite. <i>Trends in Sciences</i>, 22(4), 9374-9374.</li> <li>2. Ismail, I., Marni, A., Yufita, E., Rahwanto, A., &amp; Md Fadzullah, S. H. S. (2024). Effect of Composition on Physical, Mechanical, and Thermal Properties of Oil Palm Empty Fruit Bunch Epoxy Resin Biocomposite. <i>Key Engineering Materials</i>, 1001, 99-109.</li> <li>3. Ismail, I., Ikram, M., &amp; Zulfalina, Z. (2024). Physical and Mechanical Properties of Sugarcane Bagasse Epoxy Bio-Composite: Effect of Composition and Particle Size. <i>J. Mater. Environ. Sci.</i>, 15 (5), 638, 647.</li> <li>4. Ismail, I., Aini, Q., Jalil, Z., Mursal, M., &amp; Khalil, H. A. (2023, August). Utilization of coconut shell nanoparticles for thermal insulation. In <i>AIP Conference Proceedings</i> (Vol. 2858, No. 1, p. 060005). AIP Publishing LLC.</li> <li>5. Ismail, I., Aini, Q., Maulida, C. R., Mursal, Jalil, Z., &amp; Fadzullah, S. H. S. M. (2023, January). Thermal properties of spent coffee ground biocomposite using epoxy resin matrix. In <i>AIP Conference Proceedings</i> (Vol. 2613, No. 1, p. 020009). AIP Publishing LLC..</li> </ol>
<b>Membership</b>	Physical Society of Indonesia
<b>External Link</b>	<a href="https://fsd.usk.ac.id/ismailab/">https://fsd.usk.ac.id/ismailab/</a>