

The Urgency of Ratification of the New and Renewable Energy Law in Efforts to Develop Sustainable Energy as an Instrument for Climate Change Adaptation and Mitigation

Ikhsan Wahyudi¹, Farhan², Muh. Risnain³, Yulias Erwin⁴

¹Universitas Islam Sultan Agung, Semarang, eyyong137@gmail.com

²Universitas Islam Sultan Agung, Semarang, farhanhalfan16@gmail.com

³Fakultas Hukum Universitas Mataram, risnain82@gmail.com

⁴Universitas Muhammadiyah Mataram, yuliaserwin@gmail.com

Abstract

Energy consumption in Indonesia remains heavily reliant on fossil fuels, including oil, gas, and coal, while new and renewable energy sources are still considered alternatives. This dependence on fossil fuels presents at least three significant risks: 1) the exhaustion of current oil reserves, assuming no new discoveries are made; 2) price volatility and instability due to demand outstripping oil production; and 3) greenhouse gas (GHG) emissions from burning fossil fuels. Consequently, to support Indonesia's commitment to sustainable energy development, the ratification of the Draft Law on New and Renewable Energy (RUU EBT) should be prioritized. This study aims to identify and analyze the urgency of ratifying RUU EBT in promoting sustainable energy development, as well as the regulatory framework within RUU EBT that emphasizes sustainability principles. The research employs a normative legal research methodology, incorporating statutory, conceptual, and case study approaches. The study's findings reveal that the legal framework governing new and renewable energy (EBT) in Indonesia is currently fragmented across various laws and regulations. Moreover, the existing regulations issued by the Government related to EBT frequently undergo changes, which undermines their ability to provide a strong legal foundation and guarantee legal certainty. This is because they have not been comprehensively consolidated into a single law. Additionally, the implementation of EBT is guided by principles such as benefit, efficiency, justice, sustainability, resilience, sovereignty, independence, accessibility, participation, and integration.

Keywords: *New and Renewable Energy, Draft law on EB;*

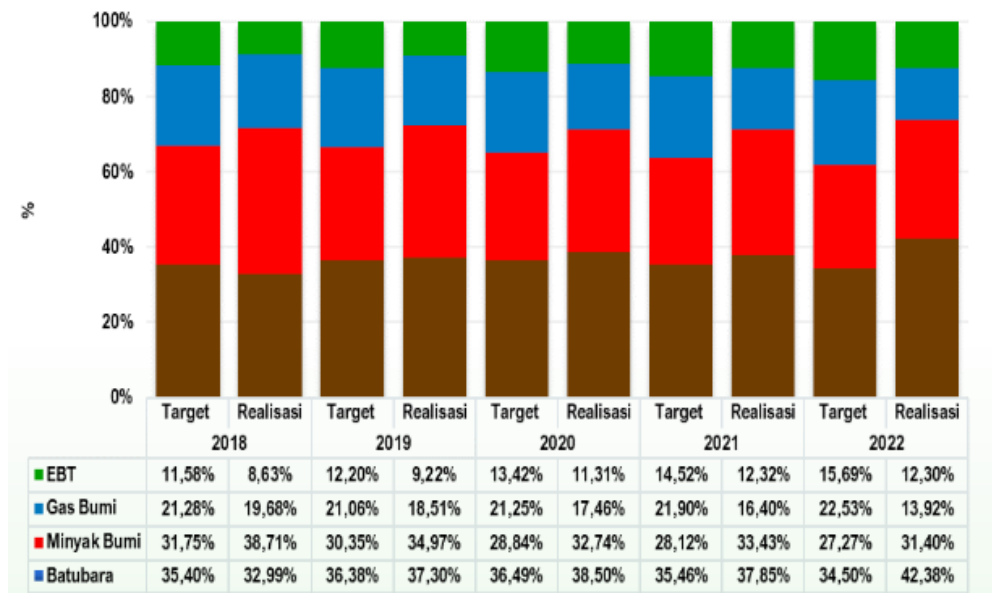
1. INTRODUCTION

Energy consumption in Indonesia continues to be predominantly driven by fossil fuels, including oil, gas, and coal, with new and renewable energy sources still being regarded as supplementary options.¹ Reliance on fossil fuels presents at least three significant risks: 1) the depletion of existing oil reserves, assuming no new oil wells are discovered; 2) price volatility and instability due to demand outpacing oil production; and 3) greenhouse gas (GHG) emissions resulting from the

¹ Vita Puji Lestari, "Ringkasan Permasalahan Dan Tatangan Program Peningkatan Kontribusi Energi Baru Dan Terbarukan Dalam Bauran Energi Nasional" (Jakarta, 2021).

combustion of fossil fuels.² The national primary energy mix remains largely dominated by petroleum and coal. This predominance of fossil energy in the national primary energy mix is depicted in the diagram below:

Diagram 1. National Primary Energy Mixes 2018 to 2022



Source: National Energy Board, Secretariat General Year 2022 (processed).

From the diagram, it can be seen that in the last five years (2018-2022) the EBT mix is targeted to reach 15.7 % in 2022. However, the realization has only reached 12.30 % and even decreased by 0.1 % compared to 2021. The share of natural gas is targeted to continue to rise to 22.53 % in the last 5 years at the lowest position of 13.92 %. The realization of the share of oil decreased to 31.40 % even compared to its target in 2022 of 27.27 %. Coal utilization share increased significantly in 2022 when compared to the previous year.

The high utilization of fossil energy, which currently reaches around 88 % of total national energy consumption, will certainly make it difficult to achieve the share of New and Renewable Energy (EBT) in the national energy mix. This commitment was articulated by Indonesia during the 2015 Conference of Parties of the United Nations Framework Convention on Climate Change (UNFCCC).³ The outcomes of the UNFCCC, also known as the Paris Agreement, were subsequently ratified through Law No. 16 of 2016 concerning the Ratification of the Paris Agreement to The United Nations Framework Convention on Climate Change. This law mandates the Government of Indonesia to actively develop sustainable energy solutions.⁴

In the 2015-2019 National Medium-Term Development Plan (RPJMN), one of the key priorities in the leading sector development targets is energy sovereignty. This

² Abubakar and Lubis, "Energi Terbarukan Dalam Pembangunan Berkelanjutan," *Jurnal Teknik Lingkungan* 8, no. 2 (2007): 155–62.

³ Teddy Prasetyawan, "Kesiapan Indonesia Menuju COP 21 UNFCCC Di Paris," *Info Singkat* 7, no. 16 (2015): 9.

⁴ Ruslan, "Status Pemanfaatan Energi Baru Terbarukan Dan Opsi Nuklir Dalam Bauran Energi Nasional," *Jurnal Pengembangan Energi Nuklir* 23, no. 1 (2021): 40.

priority includes the Program to Increase the Contribution of New and Renewable Energy (EBT) in the National Energy Mix (BEN).⁵ Additionally, the potential of energy resources, particularly EBT, remains substantial, indicating significant opportunities for further development.

Law No. 30/2007 on Energy aims to apply the principles of fairness, sustainability, and environmentally sound, but the current national energy condition is 90 % derived from fossils which are decreasing in existence as well as proving to be an important factor in climate change. Indonesia is equipped with extraordinary renewable energy, including water, wind, solar, biomass, and so on, but in the sustainability of optimizing renewable energy, it cannot be maximized and only reaches a small part of the total renewable energy that this country has. Therefore, the Draft Law on New Energy and Renewable Energy is considered to be a solution step for the country in order to achieve the country's goals coveted by all Indonesian people.

This paper employs a normative legal research methodology, specifically one that focuses on evaluating the application of rules or norms within the framework of positive law. The research utilizes both statutory and conceptual approaches. The statutory approach involves a comprehensive review of all relevant laws and regulations to address the legal issues presented. The conceptual approach, on the other hand, involves the development of theoretical perspectives and doctrines to provide explanations and formulate robust arguments in response to these legal issues.

2. ANALYSIS AND DISCUSSION

2.1. Urgency of Ratification of EBT Bill in Efforts to Develop Sustainable Energy

Statutory law is fundamentally structured as normative prescriptions designed to serve as a guide for human behavior within society and the state. When the law effectively meets its objectives, it fosters the development of an orderly and cohesive social environment.⁶ Consequently, the formulation of statutory regulations must be executed at the highest possible standard to ensure their effective functioning. This principle applies to the development of the RUU EBT (Draft Bill on Renewable Energy), which is intended to operate within a normative framework guiding the use and management of national energy resources. The RUU EBT emphasizes sustainability and the principles of renewable energy, addressing the current predominance of fossil fuels.

The establishment of laws as normative prescriptions has led to the sociological perspective that law is inherently a reflection of society. As long as the provisions stipulated by the law remain substantively aligned with societal norms and values, the law's validity within the community remains unquestioned.⁷

From this perspective, it is anticipated that there will be alignment between the government and the public regarding each draft law, as these laws serve as fundamental frameworks for collaborative efforts toward shared objectives. This includes the

5 Badan Perencanaan Pembangunan Nasional, Buku 1: Agenda Pembangunan Nasional (Jakarta: Kementerian Perencanaan Pembangunan Nasional, 2014).

6 Ana Fauzia, Fathul Hamdani, and Deva Gama Rizky Octavia, "The Revitalization of the Indonesian Legal System in the Order of Realizing the Ideal State Law," *Progressive Law Review* 3, no. 1 (2021): 15.

7 Ana Fauzia, Fathul Hamdani, and Deva Gama Rizky Octavia.

ratification of the EBT Bill, which aims to integrate renewable energy considerations into national policy. To ensure that the essence of the nation (Volksgeist)⁸, as envisioned by Von Savigny, is effectively embodied in the law, it is crucial that legal products align with and serve the national and societal order (positive law). A new law can be deemed to have successfully captured the nation's spirit if it is consistent with and harmonizes with the values enshrined in the Constitution.

The mandate for the development and utilization of sustainable energy is reflected in Article 33, paragraphs (2) and (3) of the 1945 Constitution of the Republic of Indonesia (UUD NRI 1945). According to Article 33, paragraph (2), strategic natural resources, including renewable energy (EBT), which significantly impact the livelihoods of many, are to be controlled by the state for the greatest benefit of the people. Additionally, Article 33, paragraph (3) stipulates that "land, water, and the natural resources contained therein shall be controlled by the state and utilized for the greatest prosperity of the people." Achieving this prosperity is contingent upon a shift from reliance on fossil fuels to the utilization of new and renewable energy sources.

According to data from the Ministry of Energy and Mineral Resources, as reported on the website of the Ministry of Energy and Mineral Resources Indonesia possesses significant potential for renewable energy resources, including: 1) 450 MW from mini/micro hydro; 2) 50 GW from biomass; 3) 4.80 kWh/m²/day of solar energy; 4) wind energy ranging from 3-6 m/s; and 5) 3 GW from nuclear energy.⁹ Effective state control over land, water, and natural resources can ensure that these resources are utilized to their fullest potential, thereby maximizing benefits and prosperity for the community. Prioritizing the use of renewable energy sources (EBT) is crucial for realizing these benefits.

Biomass energy represents a significant and abundant resource in Indonesia, derived from a variety of sources such as wood, agricultural and plantation residues, forest waste, organic components from industrial and household activities, and animal waste, all of which can be converted into fuel. Indonesia's total biomass potential is estimated at 146.7 million tons annually. Specifically, in 2020, the biomass potential from waste alone was estimated at 53.7 million tons.¹⁰

One of the key factors contributing to the abundance of EBT in Indonesia is its geographical setting. The country is situated along the boundaries of three tectonic plates, resulting in numerous volcanoes and a significant geothermal potential along the Pacific Ring of Fire. Geothermal energy, a prominent EBT, offers competitive advantages over conventional energy sources and other renewable energy types.¹¹ Government support for geothermal development has been evidenced by the hosting of the World Geothermal Congress (WGC) 2010 in Bali from April 26-30, 2010.¹² However, to fully realize the

8 Shidarta, "Volksgeist Atau Jiwa Bangsa Merupakan Kristalisasi Nilai-Nilai Yang Dibangun Secara Alamiah Melalui Pengemblemisan Sejarah. Nilai-Nilai Ini Dipengaruhi Oleh Ruang Dan Waktu Sehingga Inilah Yang Membuatnya Unik Dan Berbeda Pada Setiap Bangsa," in *Karakter Penalaran Hukum Dalam Konteks Ke Indonesian* (Bandung: Utomo, 2006), 257.

9 Kementerian ESDM, "Potensi Energi Baru Terbarukan (EBT) Indonesia," June 12, 2024, <https://www.esdm.go.id/id/media-center/arsip-berita/potensi-energi-baru-terbarukan-ebt-indonesia>.

10 Sri Nurhayati Qodriyatun, "Waste to Energy Power Plant: Between Environmental Issue and the Acceleration of Renewable Energy Development," *Aspirasi: Jurnal Masalah-Masalah Sosial* 12, no. 1 (2021): 69.

11 Masyithah Aulia Adhiem, *Pembangkit Listrik Tenaga Surya Bagi Pembangunan Berkelanjutan* (Jakarta: Publica Indonesia Utama, 2021).

12 Hilma Meilani and Dewi Wuryandani, "Potensi Panas Bumi Sebagai Energi Alternatif Pengganti Bahan Bakar Fosil Untuk Pembangkit Tenaga Listrik Di Indonesia," *Dewi Wuryandani* 1, no. 1 (2010): 64.

potential of geothermal energy, and EBT as a whole, it is essential to establish dedicated regulations that provide a robust legal framework for geothermal management and the broader utilization of renewable energy resources.

Currently, regulations pertaining to EBT are addressed in several pieces of legislation, including Law No. 30 of 2007 on Energy, Law No. 30 of 2009 on Electricity, and Law No. 21 of 2014 on Geothermal Energy. However, these laws and regulations are dispersed and lack cohesion. Additionally, the existing regulations frequently undergo revisions, which undermines their effectiveness as a stable legal foundation and impedes the assurance of legal certainty. A comprehensive and unified legal framework specifically for EBT is needed to address these issues and provide a more robust regulatory basis.¹³

Therefore, it is essential to establish a dedicated and comprehensive law specifically for EBT to serve as a primary legal framework and a reference for subordinate regulations. This will address the current fragmentation and provide a cohesive regulatory basis. Indonesia has also demonstrated its commitment to advancing and increasing the utilization of EBT in alignment with the Paris Agreement and as part of its dedication to the Sustainable Development Goals (SDGs). Particularly, this commitment aligns with SDG 7, which aims to ensure access to affordable, reliable, sustainable, and modern energy for all.¹⁴

Indonesia possesses a wealth of new and renewable energy (EBT) that have not been optimally managed or utilized. To ensure and enhance the availability, resilience, and independence of national energy in a sustainable manner, it is imperative to promote their development and utilization. EBT plays a crucial role in accelerating the transition toward a sustainable national energy system and addressing the challenges of climate change, such as rising global temperatures, by providing clean and environmentally friendly energy.¹⁵ As Indonesia strives to advance towards industrialization, it requires substantial energy, which should not rely solely on diminishing fossil fuels but also incorporate diverse sources of renewable energy (EBT). This approach will support Indonesia's commitment to overcoming climate change impacts and achieving long-term sustainability.

Achieving national energy security and independence in a sustainable manner necessitates comprehensive legal instruments that provide a cohesive framework for the management of EBT, which are currently dispersed across various laws and regulations. The law, as a textual document, requires human intervention to be effectively operational and impact. To ensure that legal provisions translate into practical, real-world applications, legal mobilization is essential. Through this process, the theoretical aspects of the law are realized and implemented, transforming textual

13 Pusat Studi Hukum Energi dan Pertambangan, "Mengawal Isu-Isu Krusial Dalam Rancangan Undang-Undang Energi Baru Dan Terbarukan," accessed June 13, 2024, <https://pushep.or.id/mengawal-isu-isu-krusial-dalam-rancangan-undang-undang-energi-baru-dan-terbarukan/>.

14 Faisal, "Urgensi Pengaturan Pengembangan Energi Terbarukan Sebagai Wujud Mendukung Ketahanan Energi Nasional," *Ensiklopedia Social Review* 3, no. 1 (2021): 23.

15 Sugeng Suparwoto, "Penjelasan Naskah Akademik Dan Draft Rancangan Undang-Undang Tentang Energi Baru Dan Terbarukan" (Jakarta, 2020).

provisions into actionable legal frameworks that address and manage EBT resources effectively.¹⁶ However, legal mobilization cannot be effectively achieved if the existing legal rules are not harmonized. To facilitate the effective application of legal provisions related to the utilization of EBT within the community, it is crucial to harmonize the various regulations currently dispersed across multiple laws. This can be accomplished through the ratification of the RUU EBT (Draft Bill on Renewable Energy), which aims to consolidate and streamline EBT-related regulations into a cohesive legal framework. This harmonization will ensure that the legal rules are consistent and functional, thereby enhancing their practical application and effectiveness.

2.2. EBT Regulatory Framework in RUU EBT that Prioritizes on the Principles Sustainability

The establishment of the RUU EBT should ideally foster the development of renewable energy business activities that are independent, reliable, transparent, competitive, efficient, and environmentally friendly. Additionally, it should promote the growth of domestic economic actors' potential and roles. National energy development, with a focus on sustainability and environmental responsibility, is intrinsically linked to the role of the state and the fulfillment of community rights to access high-quality energy resources.

The evolution of human rights, particularly concerning environmental and natural resource management, can be understood through four generations of issues. In the third generation, environmental concerns and natural resource management were primarily influenced by profit-driven development motives. The fourth generation, however, critiques the state's predominant role in economic development, highlighting its negative impacts such as the neglect of public welfare. This era is characterized by significant friction between Eco-fascism, driven by non-governmental organizations (NGOs), and Eco-development, which is propelled by financiers in collaboration with the government.¹⁷

This indicates that the paradigm of natural resource utilization, traditionally oriented towards economic development, must shift to prioritize the needs and welfare of future generations, particularly given the dwindling availability of fossil fuels. Therefore, managing natural resources, especially by advancing renewable energy (EBT) development, represents a crucial and positive step. This shift should be integrated into a national energy management framework that emphasizes sustainability and the long-term well-being of both people and the environment.

¹⁶ Satjipto Rahardjo, "Mengurai Benang Kusut Penegakan Hukum Dalam Sistem Peradilan Di Indonesia," in *Menghadapi Kemelut Dengan Membangun Suatu Kultur Berhukum Yang Baru* (Semarang: Universitas Negeri Semarang, 2004), 6.

¹⁷ Jimly Asshiddiqie, "Konstitusi Dan Hak Asasi Manusia," in *Lecture Peringatan 10 Tahun KontraS* (Jakarta, 2008).

The framework or systematics of RUU EBT can be seen through the table below:

Table 1. Systematic of RUU

BAB	Pengaturan
I	General provisions
II	Principles, Objectives, and Scope
III	Control
IV	Transition and Road map
V	New Energy
VI	Renewable Energy
VII	Environment Management and Occupational Health and safety
VIII	Research and Development
IX	Prices of New and Renewable Energy
X	Incentives
XI	Fund for New and Renewable Energy
XII	Coaching and Supervision
XIII	Community Participation
XIV	Closing Provisions

Meanwhile, with regard to the scope and direction of arrangement of RUU EBT, it is as follows:¹⁸

- a. Renewable Energy Sources
- b. Renewable Energy Management which consists of arrangements regarding planning, licensing, and exploitation.
- c. Provision and utilization which consists of arrangements regarding provision, EBT portfolio, and EBT utilization.

The implementation of EBT in Indonesia is guided by principles such as benefit, efficiency, justice, sustainability, resilience, sovereignty, independence, accessibility, participation, and integration. The primary goals of adopting EBT are to ensure national energy security and independence, position EBT as a cornerstone for sustainable development that bolsters the national economy, and enhance Indonesia's industrial and trade competitiveness. Additionally, it aims to foster national capabilities in EBT to compete on national, regional, and international levels. The initiative also seeks to ensure the efficient and effective availability of EBT both as an energy source and as raw material for domestic needs. It guarantees community access to EBT, develops and adds value to EBT resources, and ensures the effective implementation and control of RES management and utilization business activities through an open and transparent mechanism. Furthermore, it aims to create jobs, improve the welfare and prosperity of the people in a fair and equitable manner, and preserve the environment for future generations.

18 Muhammad Rahjay Pelengkahu, "Urgensi RUU EBT Sebagai Upaya Efisiensi Pemanfaatan Sumber Daya Alam Di Indonesia," accessed June 14, 2024, <https://www.researchgate.net/publication/361107541>.

Based on the draft of the EBT law drafted by the Indonesian House of Representatives, it has accommodated public participation and space for the public to access the implementation of EBT through, first, providing input in determining the direction of New and Renewable Energy policies, second, submitting objections to the implementation of New and Renewable Energy regulations or policies, third, individual initiatives or cooperation in the provision, research, development, and utilization of New and Renewable Energy, and supervision and evaluation of the implementation of New and Renewable Energy regulations or policies. Public participation in the implementation of EBT in the draft of the EBT Law is carried out through the use of public rights to, first, obtain information related to the business of New and Renewable Energy through the Central Government and/or Regional Governments in accordance with their authority, second, obtain benefits from the business activities of New and Renewable Energy; and, third, obtain employment opportunities from the business activities of New and Renewable Energy.

Although the EBT Bill proposed by the DPR has accommodated the mechanism of community participation in the implementation of EBT, the Bill has not accommodated and guaranteed EBT management based on transparency. This is one of the fundamental weaknesses contained in this Bill that needs to be studied and included in the concept of good energy governance where transparency is one of the elements and requirements contained therein.

The national energy development framework that prioritizes the principles of sustainability aligns with the principles established in Environmental Protection and Management Law (Law No. 32 of 2009) and Energy Law (Law No. 30 of 2007). These principles emphasize the obligations and responsibilities of individuals towards future generations and their contemporaries, advocating efforts to preserve the ecosystem's carrying capacity and improve environmental quality.¹⁹ Therefore, EBT is introduced to provide energy that is more environmentally friendly and can be used continuously, ensuring the sustainability of EBT for future generations.

In the concept of the EBT Bill, there is a clear distinction between new and renewable energy. Based on general provisions, New Energy is all types of Energy that originate from or are produced from new technology for processing non-renewable Energy sources and renewable Energy sources, while Renewable Energy is Energy that originates or is produced from renewable Energy sources. In line with the main objective of the existence of EBT, the concept of utilizing EBT in the EBT Bill is aimed at three main objectives of utilization, first, optimizing and prioritizing all potential local New Energy Sources in a sustainable manner, second, considering aspects of technology, social, economic, conservation, environment, and sustainability; and third, prioritizing the fulfillment of community needs and increasing economic activities in the region.

3. CONCLUSION

19 Muhamad Azhar and Dendy Adam Satriawan, "Implementasi Kebijakan Energi Baru Dan Energi Terbarukan Dalam Rangka Ketahanan Energi Nasional," *Administrative Law & Governance Journal* 1, no. 4 (2018): 406–7.

The government in preparing the National Energy Policy has a target of increasing the role of new and renewable energy and decreasing the role of fossil energy. The urgency of the ratification of the EBT Bill is because it sees the potential for Indonesia's fossil and non-fossil energy sources to be abundant but not yet well organized. RUU EBT is the state's response in realizing Indonesia's welfare based on the constitution. In addition, the EBT Bill has been included in the 2021 Priority National Legislation Program. The hope is that this bill will become a stronger legal basis in the development of EBT governance. The ratification of RUU EBT is expected to unify various regulations on EBT suchs *Law No. 30 of 2007 on Energy*, *Law No. 30 of 2009 on Electricity*, and *Law No. 21 of 2014 on Geothermal Energy* which are currently still scattered in various laws and regulations, provide legal certainty, and create a conducive investment climate. In line with that, the government should also plan the issuance of a Presidential Regulation on New Energy and Renewable Energy to accelerate the transition from fossil energy to clean energy so as to emphasize Indonesia's commitment to sustainable energy security.

The implementation of EBT is guided by principles of benefit, efficiency, justice, sustainability, resilience, sovereignty, independence, accessibility, participation, and integration. It is imperative that the House of Representatives, in collaboration with the President, advance the formation of an EBT Law through the following stages: planning, by including the EBT Bill in the National Legislation Program for 2024-2029; drafting, by incorporating principles from the Paris Agreement on climate change; and deliberation, by involving various stakeholders interested in EBT. The final stage involves making a political decision to pass the EBT Bill by 2025 and enacting it to provide binding legal authority.

REFERENCES

- Abubakar, and Lubis. "Energi Terbarukan Dalam Pembangunan Berkelanjutan." *Jurnal Teknik Lingkungan* 8, no. 2 (2007): 155–62.
- Ana Fauzia, Fathul Hamdani, and Deva Gama Rizky Octavia. "The Revitalization of the Indonesian Legal System in the Order of Realizing the Ideal State Law." *Progressive Law Review* 3, no. 1 (2021): 15.
- Badan Perencanaan Pembangunan Nasional. *Buku 1: Agenda Pembangunan Nasional*. Jakarta: Kementerian Perencanaan Pembangunan Nasional, 2014.
- Faisal. "Urgensi Pengaturan Pengembangan Energi Terbarukan Sebagai Wujud Mendukung Ketahanan Energi Nasional." *Ensiklopedia Social Review* 3, no. 1 (2021): 23.
- Grita Anindarini, Etheldreda E.L.T Wongkar, and Mahawira S. Dillon. "Two Crucial Issues Within the Draft Bill on New and Renewable Energy." *Policy Brief, Yayasan Indonesia Cerah*, 2021, 3.
- Hilma Meilani, and Dewi Wuryandani. "Potensi Panas Bumi Sebagai Energi Alternatif Pengganti Bahan Bakar Fosil Untuk Pembangkit Tenaga Listrik Di Indonesia." *Dewi Wuryandani* 1, no. 1 (2010): 64.
- Jimly Asshiddiqie. "Konstitusi Dan Hak Asasi Manusia." In *Lecture Peringatan 10*

- Tahun KontraS. Jakarta, 2008.
- Kementerian ESDM. "Potensi Energi Baru Terbarukan (EBT) Indonesia," June 12, 2024. <https://www.esdm.go.id/id/media-center/arsip-berita/potensi-energi-baru-terbarukan-ebt-indonesia>.
- Masyithah Aulia Adhiem. *Pembangkit Listrik Tenaga Surya Bagi Pembangunan Berkelanjutan*. Jakarta: Publica Indonesia Utama, 2021.
- Muhamad Azhar, and Dendy Adam Satriawan. "Implementasi Kebijakan Energi Baru Dan Energi Terbarukan Dalam Rangka Ketahanan Energi Nasional." *Administrative Law & Governance Journal* 1, no. 4 (2018): 406–7.
- Muhammad Rahjay Pelengkahu. "Urgensi RUU EBT Sebagai Upaya Efisiensi Pemanfaatan Sumber Daya Alam Di Indonesia." Accessed June 14, 2024. <https://www.researchgate.net/publication/361107541>.
- Pusat Studi Hukum Energi dan Pertambangan. "Mengawal Isu-Isu Krusial Dalam Rancangan Undang-Undang Energi Baru Dan Terbarukan." Accessed June 13, 2024. <https://pushep.or.id/mengawal-isu-isu-krusial-dalam-rancangan-undang-undang-energi-baru-dan-terbarukan/>.
- Ruslan. "Status Pemanfaatan Energi Baru Terbarukan Dan Opsi Nuklir Dalam Bauran Energi Nasional." *Jurnal Pengembangan Energi Nuklir* 23, no. 1 (2021): 40.
- Satjipto Rahardjo. "Mengurai Benang Kusut Penegakan Hukum Dalam Sistem Peradilan Di Indonesia." In *Menghadapi Kemelut Dengan Membangun Suatu Kultur Berhukum Yang Baru*, 6. Semarang: Universitas Negeri Semarang, 2004.
- Shidarta. "Volksgeist Atau Jiwa Bangsa Merupakan Kristalisasi Nilai-Nilai Yang Dibangun Secara Alamiah Melalui Pengemblengan Sajarah. Nilai-Nilai Ini Dipengaruhi Oleh Ruang Dan Waktu Sehingga Inilah Yang Membuatnya Unik Dan Berbeda Pada Setiap Bangsa." In *Karakter Penalaran Hukum Dalam Konteks Ke Indonesian*, 257. Bandung: Utomo, 2006.
- Sri Nurhayati Qodriyatun. "Waste to Energy Power Plant: Between Environmental Issue and the Acceleration of Renewable Energy Development." *Aspirasi: Jurnal Masalah-Masalah Sosial* 12, no. 1 (2021): 69.
- Sugeng Suparwoto. "Penjelasan Naskah Akademik Dan Draft Rancangan Undang-Undang Tentang Energi Baru Dan Terbarukan." Jakarta, 2020.
- Teddy Prasetiawan. "Kesiapan Indonesia Menuju COP 21 UNFCCC Di Paris." *Info Singkat* 7, no. 16 (2015): 9.
- Vita Puji Lestari. "Ringkasan Permasalahan Dan Tatangan Program Peningkatan Kontribusi Energi Baru Dan Terbarukan Dalam Bauran Energi Nasional." Jakarta, 2021.