

## TAX REGULATION CHALLENGES IN THE DIGITAL ECONOMY ERA: LEGAL ANALYSIS AND IMPLICATIONS IN INDONESIA

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### **Abstract**

*The rapid growth of the digital economy has transformed global business landscapes, creating significant challenges for tax regulation in Indonesia. This study aims to identify the obstacles in regulating the digital economy, analyze the impact of legal uncertainty on taxpayer compliance, and evaluate how technological infrastructure limitations hinder effective tax enforcement. Applying normative legal methods and an exploratory approach, this research employs statute and case-based approaches, with data collected from primary legislation and secondary literature sources. The findings indicate that legal uncertainties regarding micro-businesses, small-businesses, and medium-businesses identification in digital transactions, digital economy subjects, permanent establishment status, and tax collection mechanisms significantly reduce taxpayer compliance. Additionally, the limited technological infrastructure is the major obstacle to enforcing tax regulations effectively. This research contributes to emphasize the need of the clear legal frameworks and robust technological systems to address those challenges. In conclusion, to resolve the issues requires regulatory reforms to provide unambiguous guidelines for digital transactions, increased investments in technological infrastructure, and the development of comprehensive frameworks to enhance compliance and enforcement. The study recommends a strategic focus on harmonizing legal standards and technological advancements to support a sustainable tax ecosystem in the digital economy.*

**Keywords:** *Digital economy, Tax regulation, Legal implication*

### **Introduction**

The digital economy has changed how businesses interact, transact, and manage. Information and Communication Technology (ICT) is fueling the significant growth of Indonesia's digital economy sector, making it one of the main pillars of the

national economy.<sup>1</sup> This sector includes e-commerce, fintech, and various tech startups, thriving through platforms such as Bukalapak, Tokopedia, Shopee, and others.<sup>2</sup> The growth of the digital economy also brings new challenges to the conventional tax system.<sup>3</sup> These challenges arise due to the characteristics of the digital economy, such as mobility and dependence on data, which creates complexity in tax regulation.<sup>4</sup> Large digital companies such as Google and Netflix, for instance, can earn revenue from Indonesian consumers without having a physical presence in the country. This causes a dilemma in the tax system that still relies on the concept of "permanent establishment" based on physical presence.<sup>5</sup>

Indonesia's traditional taxation system heavily based on the physical presence of the company has become less relevant in the digital era.<sup>6</sup> The concept of permanent establishment, which is the basis for income tax collection in Indonesia, requires a physical presence in the country as the basis for tax imposition.<sup>7</sup> In the digital era, this concept is no longer effective, as many international digital companies, such as Google, Amazon, and Netflix, can reap huge revenues from consumers in Indonesia without having a physical presence in the country.<sup>8</sup>

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<sup>1</sup> Trina Fizzanty, "Digitalization of Indonesian MSMEs: Innovation Challenges and Opportunities," in *The Digitalization of Indonesian Small and Medium Enterprises* (Singapore: Springer International Publishing, 2024), 13–28, [https://doi.org/10.1007/978-981-97-0029-5\\_2](https://doi.org/10.1007/978-981-97-0029-5_2).

<sup>2</sup> Susanna Hartanto, "Tax Challenges Of Digital Economy in Indonesia," *Jipak: Jurnal Informasi, Perpajakan, Akuntansi, Dan Keuangan Publik* 16, no. 2 (2021): 163, <https://doi.org/10.25105/jipak.v16i2.6181>.

<sup>3</sup> Favourate Y. Mpofu, "Taxation of the Digital Economy and Direct Digital Service Taxes: Opportunities, Challenges, and Implications for African Countries," *Economies* 10, no. 9 (September 8, 2022): 219, <https://doi.org/10.3390/economies10090219>.

<sup>4</sup> Sih Yuliana Wahyuningtyas, "Regulating Algorithms in the Digital Market: A Revisit of Indonesian Competition Law and Policy," *International Review of Law, Computers & Technology* 38, no. 1 (January 2, 2024): 21–42, <https://doi.org/10.1080/13600869.2023.2202290>.

<sup>5</sup> Arif Ayluctarhan, "An Evaluation of Permanent Establishment / Digital Nexus Concepts in the E-Commerce Field and Taxation in Terms of Income Taxes," *34. International Public Finance Conference*, 2019, 545. <https://doi.org/10.26650/pb/ss10.2019.001.084>.

<sup>6</sup> Tonni Agustiono Kurniawan et al., "Unlocking Digital Technologies for Waste Recycling in Industry 4.0 Era: A Transformation towards a Digitalization-Based Circular Economy in Indonesia," *Journal of Cleaner Production* 357 (July 2022): 131911, <https://doi.org/10.1016/j.jclepro.2022.131911>.

<sup>7</sup> Prianto Budi Saptono and Cyntia Ayudia, "Income Tax Issues on the Omnibus Law and Its Implications in Indonesia," *AKRUAL: Jurnal Akuntansi* 12, no. 2 (2021): 169, <https://doi.org/10.26740/jaj.v12n2.p164-178>.

<sup>8</sup> I Nyoman Darmayasa and Nyoman Sentosa Hardika, "Core Tax Administration System: The Power and Trust Dimensions of Slippery Slope Framework Tax Compliance Model," *Cogent Business & Management* 11, no. 1 (December 31, 2024), <https://doi.org/10.1080/23311975.2024.2337358>.

The presence of digital businesses without physical form creates a dilemma for the Indonesian tax system where the potential for tax revenue from the digital economy sector is threatened to be lost. This loss of tax potential occurs due to the inability of the traditional of permanent establishment concept to capture the economic value generated by digital businesses in Indonesia.<sup>9</sup> This raises the urgent need to reform the taxation framework to accommodate the unique characteristics of the digital economy.<sup>10</sup> The Indonesian government is in attempt to address this issue by issuing regulations, such as Minister of Finance Regulation Number 60/PMK.03/2022, which regulates value-added tax collection for trading through electronic systems.<sup>11</sup> However, the implementation of this regulation faces various obstacles, including legal uncertainty that reduces certainty for businesses as well as limited technological infrastructure in the country.

Developed countries are starting to integrate big data and artificial intelligence (AI) technologies to detect digital transactions in real time.<sup>12</sup> However, such technology is still very limited in Indonesia, so the potential for tax revenue from the digital sector has not been fully optimized. Concepts such as "significant economic presence" promoted by Organization of Economic Cooperation and Development (OECD) countries should also be considered to be applied in Indonesia to match the tax systems in other countries.<sup>13</sup> Therefore, the Indonesian government needs to immediately create harmonized and implementable tax regulations to improve the ability of tax authorities. It is even the need of digital investment to build better monitor digital transactions and ensure fairness and effectiveness in the tax system.

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<sup>9</sup> Eko Heru Prasetyo, "Digital Platforms' Strategies in Indonesia: Navigating between Technology and Informal Economy," *Technology in Society* 76 (March 2024): 102414, <https://doi.org/10.1016/j.techsoc.2023.102414>.

<sup>10</sup> Isabella Isabella et al., "Empowering Digital Citizenship in Indonesia: Navigating Urgent Digital Literacy Challenges for Effective Digital Governance," *Journal of Governance and Public Policy* 11, no. 2 (June 14, 2024): 142–55, <https://doi.org/10.18196/jgpp.v11i2.19258>.

<sup>11</sup> Sean Eric Catubig et al., "From Pixels to Taxes: A Comparative Study of Digital Economy Tax Policies in the Philippines to Selected ASEAN Member States," *European Journal of Theoretical and Applied Sciences* 2, no. 2 (March 1, 2024): 240–53, [https://doi.org/10.59324/ejtas.2024.2\(2\).21](https://doi.org/10.59324/ejtas.2024.2(2).21).

<sup>12</sup> Mallikarjuna Paramesha, Nitin Rane, and Jayesh Rane, "Big Data Analytics, Artificial Intelligence, Machine Learning, Internet of Things, and Blockchain for Enhanced Business Intelligence," *SSRN Electronic Journal*, no. July (2024): 123, <https://doi.org/10.2139/ssrn.4855856>.

<sup>13</sup> Galih Ardin, "Taxing Digital Advertising: A Proposal To Indonesia," *Scientax* 3, no. 1 (2021): 3, <https://doi.org/10.52869/st.v3i1.103>.

Therefore, an in-depth analysis of the legal aspects of taxation on the digital economy in Indonesia is required to further understand its implications. Strategic steps in regulating the tax law framework will help the country adjust to the unique characteristics of the digital economy for ensuring sustainable tax revenue.<sup>14</sup> Based on the current cases, the problem formulation in this study is: What are the challenges faced in tax regulation for the digital economy sector in Indonesia? How does legal uncertainty in tax regulations related to the digital economy affect business compliance? How do technological infrastructure limitations affect the effectiveness of tax system enforcement in the digital economy sector?

Several researches discussing tax regulations in the digital economy era has been conducted with various cases. In this case, we will take five previous studies that have a strong correlation with the research plan to be carried out. First, a research article was conducted by Aulia Malik in *Equity: Journal of Economics and Finance*, with the title "Determination of Digital Economy Taxation Policy in Indonesia with Analytical Hierarchy Process (AHP) Approach."<sup>15</sup> This research aims to build a decision support system for the selection of digital economy taxation policies with unilateral measures or global consensus using qualitative methods with an Analytical Hierarchy Process (AHP) approach that has never been used in previous similar research with the scope of income tax.

Second, a research article was conducted by Pebriana Arimbhi et al in *Transparency: Scientific Journal of Administrative Sciences*, with the title "Opportunities and Challenges of Digital Taxes in Indonesia."<sup>16</sup> The purpose of the study is to analyze the opportunities and challenges of implementing digital tax in Indonesia. The results of this study are in terms of optimizing tax revenue, the

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<sup>14</sup> Kai Li et al., "How Should We Understand the Digital Economy in Asia? Critical Assessment and Research Agenda," *Electronic Commerce Research and Applications* 44 (November 2020): 101004, <https://doi.org/10.1016/j.elerap.2020.101004>.

<sup>15</sup> Aulia Malik And Acwin Hendra Saputra, "Penentuan Kebijakan Perpajakan Ekonomi Digital Di Indonesia Dengan Pendekatan Analytical Hierarchy Process (Ahp)," *Ekuitas (Jurnal Ekonomi Dan Keuangan)* 7, No. 2 (2023): 195–196, <https://doi.org/10.24034/J25485024.Y2023.V7.I2.5241>.

<sup>16</sup> Pebriana Arimbhi Et Al., "Peluang Dan Tantangan Pajak Digital Di Indonesia," *Jurnal Ilmiah Ilmu Administrasi* 4, No. 2 (2021): 148–54, [Http://Ojs.Stiami.Ac.Id](http://Ojs.Stiami.Ac.Id).

Government expands the Objects and Tax Subjects of Value Added Tax and Income Tax and Increases Taxpayer Compliance.

Third, a research article conducted by Endang Mahpudin in the *Journal of Infrastructure, Policy and Development*, with the title "Digital tax reform in Indonesia: Perspective on tax policy development."<sup>17</sup> This research aims to investigate the concept of digital taxation in Indonesia through tax-related laws in clarifying tax reform.

Fourth, a research article was conducted by Sri Mulyani et al in the *International Journal of Cyber Criminology*, with the title "Regulations and Compliance in Electronic Commerce Taxation Policies: Addressing Cybersecurity Challenges in the Digital Economy".<sup>18</sup> This research focuses on efforts to address security challenges in the digital economy in Indonesia by examining current legislation.

Fifth, a research article was conducted by Muhammad Hidayat in *Accounting Studies and Tax Journal (COUNT)*, with the title *Digitalization and the Changing Landscape of Tax Compliance (Challenges and Opportunities)*.<sup>19</sup> The research focuses on analyzing the impact of digital transformation on tax compliance by systematically reviewing several related literatures. This research seeks to address specific challenges in the taxation regulation of the digital economy sector in Indonesia, which is slightly different from the approach in previous studies. Broadly speaking, this research will not only delve into analyzing the policies that have been implemented but also identify specific aspects that affect tax implementation, such as legal uncertainty and limited technological infrastructure.

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<sup>17</sup> Endang Mahpudin, "Digital Tax Reform in Indonesia: Perspective on Tax Policy Development," *Journal of Infrastructure, Policy and Development* 8, no. 8 (2024): 1–17, <https://doi.org/https://doi.org/10.24294/jipd.v8i8.7032>.

<sup>18</sup> Sri Mulyani, Suparno Suparno, and Retno Mawarini Sukmariningsih, "Regulations and Compliance in Electronic Commerce Taxation Policies: Addressing Cybersecurity Challenges in the Digital Economy," *International Journal of Cyber Criminology* 17, no. 2 (2023): 133–146, <https://doi.org/10.5281/zenodo.4766709>.

<sup>19</sup> Muhammad Hidayat and Siska Yulia Defitri, "Digitalization and the Changing Landscape of Tax Compliance (Challenges and Opportunities)," *Accounting Studies and Tax Journal (COUNT)* 1, no. 1 (2024): 131–39, <https://doi.org/10.62207/c2gyc030>.

The fifth previous studies provide an important foundation for understanding how digital tax policy is structured and its key opportunities and challenges. However, this research will fill the remaining gaps by examining several aspects that have not been touched upon in the previous research, including the main challenges faced in tax regulation for the digital economy sector, the impact of legal uncertainty on business compliance, and the influence of technological infrastructure limitations on the effectiveness of tax system enforcement in this sector.

Some challenges faced in the regulation of digital economy taxation in Indonesia include the complexity of determining cross-border tax subjects and objects, difficulties in adapting international tax regulations, and constraints in ensuring compliance with existing tax policies.<sup>20</sup> This is complicated by the growing digital economy that involves cross-border transactions, thus creating new obstacles in tax administration. Legal uncertainty in tax regulations in the digital sector also affects business compliance, as businesses often face doubts regarding the appropriate regulations for certain transactions, especially in cases involving multinational companies or cross-border transactions.<sup>21</sup> This uncertainty also reduces the investment interest in the digital sector due to concerns about unanticipated tax risks or uncertain compliance costs.

Limited technological infrastructure also hampers the effectiveness of tax enforcement in the digital economy sector. The lack of accessing data integrated with digital payment systems has made it difficult for tax authorities to track business actors' digital transactions, potentially causing tax revenue leakage and hampering tax compliance monitoring.<sup>22</sup> On the other hand, businesses also

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<sup>20</sup> Dwi Pangestu Ramadhani and Yoonmo Koo, "Comparative Analysis of Carbon Border Tax Adjustment and Domestic Carbon Tax under General Equilibrium Model: Focusing on the Indonesian Economy," *Journal of Cleaner Production* 377 (December 2022): 134288, <https://doi.org/10.1016/j.jclepro.2022.134288>.

<sup>21</sup> Ria Novitasari, Noor Shodiq Askandar, And Abdul Wahid Mahsuni, "Pengaruh Pengetahuan Perpajakan Dan Sosialisasi Pajak Terhadap Kepatuhan Wajib Pajak Umkm Sesuai Pp 23-2018 Di Kpp Pratama Malang Selatan," *E-Jra Fakultas Ekonomi Dan Bisnis Universitas Islam Malang* 10, No. 09 (2021): 84–94.

<sup>22</sup> Liliana Inggrit Wijaya et al., "Scope of E-Commerce Use, Innovation Capability, and Performance: Food Sector MSMEs in Indonesia," *Journal of Open Innovation: Technology, Market, and Complexity* 11, no. 1 (March 2025): 100459, <https://doi.org/10.1016/j.joitmc.2024.100459>.

experience obstacles in ensuring digital tax compliance, especially for companies which have no an integrated technology system.<sup>23</sup> Hence, this research aims to provide a comprehensive understanding of the challenges and opportunities in tax regulation in the digital economy era in Indonesia.

## Methods

To gain a better understanding of tax regulation issues in the digital economy era in Indonesia, this research uses an explorative approach in normative legal research. The purpose of this research is to find, analyze, and resolve legal issues that arise when tax regulations are applied in the digital economy sector. This method combines two main approaches: the statuta approach and the case approach.<sup>24</sup> Relevant regulations, such as the Income Tax Law, Government Regulations, Minister of Finance Regulations, and other policies relating to digital taxation, are used in the statutory approach.<sup>25</sup> The clarity of the norms, the consistency of the regulations, and their relationship with the progress of the digital economy are the main topics of this analysis. In addition, the purpose of this method is to evaluate the extent to which existing regulations are able to address legal certainty issues and accommodate digital innovation. Court decisions, tax disputes, or concrete cases relating to the application of taxation in the digital sector are discussed under the case approach. The purpose of this case analysis is to gain an understanding of how regulations are applied in practice, discover the obstacles faced by businesses and tax authorities, and evaluate how well or poorly tax policies are implemented in the digital economy.

The data collected in this study consists of two types: primary data and secondary data. The first type consists of official legal documents, such as laws and

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<sup>23</sup> Ferozi Ramdana Irsyad Et Al., "Menghadapi Era Baru : Strategi Perbankan Dalam Menghadapi Perubahan Pasar Dan Teknologi Di Indonesia," *Transformasi: Journal Of Economics And Business Management* 3, No. 2 (2024): 29–46, <https://doi.org/10.56444/Transformasi.V3i2.1594>.

<sup>24</sup> Pradeep M.D., "Legal Research- Descriptive Analysis on Doctrinal Methodology," *International Journal of Management, Technology, and Social Sciences* 4, no. 2 (2019): 95–103, <https://doi.org/10.47992/ijmts.2581.6012.0075>.

<sup>25</sup> Gareth Davies, "The Relationship between Empirical Legal Studies and Doctrinal Legal Research," *Erasmus Law Review* 13, no. 2 (September 2020): 3–12, <https://doi.org/10.5553/ELR.000141>.

regulations, government policies, and other documents related to taxes. The second type consists of other relevant sources to support the analysis, such as academic literature, books, journal articles, and research reports. Data analysis was conducted qualitatively using a descriptive-analytical approach. The stages of analysis included identification, classification, interpretation, and data processing. The purpose of the analysis was to identify the relationship between legal standards, tax policies, and prevailing practices. In addition, this research looks at the comparison of digital taxation policies in other countries to obtain international views that can be used as a reference in drafting a more adaptive taxation policy in Indonesia. The results are expected to not only help develop legal theory but also offer practical policy recommendations for policymakers to build a more efficient, fair, and just taxation system.

## **Discussion**

### **Challenges in Digital Economy Tax Regulation**

#### **1) Limitations in Establishing a Permanent Establishment**

Limitations in determining permanent establishment, where in Law Number 36 Year 2008 on Income Tax, permanent establishment is classified as a permanent establishment with physical elements such as having a building and certain fixed facility.<sup>26</sup> However, the majority of business actors engaged in the digital economy today are actively operating without any form of physical presence in the country, so the identification of the corporate form as a business tax subject that is subject to tax is a limitation of the definition of Permanent Establishment.<sup>27</sup>

However, there is a breakthrough made by the government in determining permanent establishment by publishing government regulations in lieu of law Number 1 of 2020 has been passed into Law No. 7 of 2021 concerning Harmonization of Tax Regulations which is then outlined in Law Number 6 of 2023

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<sup>26</sup> Fany Inasius et al., "Tax Compliance After the Implementation of Tax Amnesty in Indonesia," *Sage Open* 10, no. 4 (October 25, 2020), <https://doi.org/10.1177/2158244020968793>.

<sup>27</sup> Maurizio Iacopetta and Pietro F. Peretto, "Business Taxes, Management Delegation, and Growth," *European Economic Review* 170 (November 2024): 104850, <https://doi.org/10.1016/j.eurocorev.2024.104850>.



concerning Job Creation, regulates the adjustment of permanent establishment which is no longer determined by physical presence.<sup>28</sup> This provision, specifically for foreign e-commerce players can be treated as a permanent establishment if they meet the requirement of the significant economic presence and can be subject to income tax.<sup>29</sup>

This identification factor summarizes certain factors that can serve as benchmarks for testing the presence of significant economies. The first is income-based factors, factors that can be considered on this basis include what types of transactions will be covered, what the income threshold level is, and the associated administration.<sup>30</sup> The second is digital factors, factors that can be considered on this basis include local domain names, local digital platforms, and local payment options. The third is user-based factors. This factor can be based on the data reflecting the level of participation such as the number of monthly active users, the number of final online contracts, and the volume of digital content collected through the digital platform.<sup>31</sup>

Further regulations on trading through electronic systems are regulated in Minister of Finance Regulation Number 60/PMK.03/2022, which in article 1 (number 16) defines Business Actors of Trading Through Electronic Systems as individuals or entities conducting business activities in the field of Trading Through Electronic Systems consisting of Foreign Traders, Foreign Service Providers, Foreign Trading Through Electronic Systems Organizers, and/or Domestic Trading Through Electronic Systems Organizers.<sup>32</sup>

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<sup>28</sup> Edwin Jurriëns and Ross Tapsell, "Challenges and Opportunities of the Digital 'Revolution' in Indonesia," in *Digital Indonesia* (ISEAS Publishing, 2017), 1–18, <https://doi.org/10.1355/9789814786003-007>.

<sup>29</sup> Nagy K. Hanna, "Assessing the Digital Economy: Aims, Frameworks, Pilots, Results, and Lessons," *Journal of Innovation and Entrepreneurship* 9, no. 1 (December 7, 2020): 16, <https://doi.org/10.1186/s13731-020-00129-1>.

<sup>30</sup> Fany Inasius, "Factors Influencing SME Tax Compliance: Evidence from Indonesia," *International Journal of Public Administration* 42, no. 5 (April 4, 2019): 367–79, <https://doi.org/10.1080/01900692.2018.1464578>.

<sup>31</sup> Dani Rusli Utama et al., "Developing a Digital Transformation Maturity Model for Port Assessment in Archipelago Countries: The Indonesian Case," *Transportation Research Interdisciplinary Perspectives* 26 (July 2024): 101146, <https://doi.org/10.1016/j.trip.2024.101146>.

<sup>32</sup> Inasius et al., "Tax Compliance After the Implementation of Tax Amnesty in Indonesia."

Furthermore, Article 2 a quo stipulates that tax collection on trading through electronic systems is carried out by determining Value Added Tax (VAT) on digital business actors, on goods or services from abroad with a base using a digital system, and domestically carried out. In other words, all parties involved in digital trade practices, the organizers, consumers, or producers, are equally subject to value-added tax by the government.

Determination of permanent establishment for trading through electronic systems by determining as income tax, Income tax collection for foreign taxpayers who run businesses in other countries can be done with the concept of Permanent Establishment.<sup>33</sup> The permanent establishment criteria stipulated in domestic regulations and tax treaties still require physical presence. In principle, the tax treaty regulates that for the taxation of business profits, the source country cannot tax the foreign taxpayer if there is no permanent establishment in the source country.<sup>34</sup>

This is certainly problematic, as not all countries have the same definition and criteria for permanent establishment, causing legal uncertainty for cross-border business actors. In other words, establishing a trading through electronic systems as a permanent establishment still faces many obstacles. As the result, many countries have taken unilateral steps in establishing of trading through electronic systems as a permanent establishment without any binding international agreement.<sup>35</sup> In addition, it is difficult to impose Income Tax on digital companies such as Google, Facebook, Amazon, and so on because the definition of permanent establishment does not cover digital businesses.<sup>36</sup>

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<sup>33</sup> Adhitya Rendra Kusuma et al., "Factors Influencing the Digital Transformation of Sales Organizations in Indonesia," *Heliyon* 10, no. 5 (March 2024): e27017, <https://doi.org/10.1016/j.heliyon.2024.e27017>.

<sup>34</sup> Kurniawan, "Pemajakan Perdagangan Melalui Sistem Elektronik (PMSE) Lintas Negara (Unilateral Measure Vs Global Consensus).," *Simposium Nasional Keuangan Negara* 2, no. 1 (2020): 315–34.

<sup>35</sup> Amelia Cahyadini et al., "Technology Architecture as an Instrument for Digital Taxation," *Laws* 13, no. 1 (February 1, 2024): 7, <https://doi.org/10.3390/laws13010007>.

<sup>36</sup> Yujia He, "Chinese Digital Platform Companies' Expansion in the Belt and Road Countries," *The Information Society* 40, no. 2 (March 14, 2024): 96–119, <https://doi.org/10.1080/01972243.2024.2317058>.

Basically, the principle of income tax imposition is a physical entity. Although these multinational companies have a permanent establishment, the presence of third parties in facilitating economic transactions can be one of the obstacles in determining taxes. The facts of the cases show that currently business activities are simpler and broader without being accompanied by complex requirements so those changes in business models must be responded to by the government with appropriate regulations and by existing characteristics.

## **2) Regulatory Differences between Countries**

The challenges faced by countries in the world require an international agreement in facing the challenges of the digital economy. The agreement in the Organization of Economic Cooperation and Development (OECD) attended by more than 135 countries proposes the provisions for the expansion of the permanent establishment concept initially based on the physical presence to the significant economic presence. The Permanent Establishment concept is considered unable to accommodate challenges in the digital economy so that it can be easily avoided by digital companies. This trading through electronic systems income tax is popularly known as Digital Service Tax (DST) in the international world.<sup>37</sup>

The determination of the amount of DST on digital taxation as a reference for all countries is once proposed by the European Commission, but the failure of the proposal in the international forum leads several countries both in Europe and outside Europe to impose DST unilaterally.<sup>38</sup> The absence of a comprehensive international reference plus differences in the views of countries in determining permanent establishment causes differences in tax treatment in each country.

In Indonesia, the implementation of trading through electronic systems is regulated by Government Regulation in Lieu of Law Number 1 of 2020. In addition to value-added tax on trading through electronic systems, Article 6 of government regulations in lieu of law 1/2020 also regulates the imposition of Income Tax or

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<sup>37</sup> Ines Mergel, "Digital Service Teams in Government," *Government Information Quarterly* 36, no. 4 (October 2019): 101389, <https://doi.org/10.1016/j.giq.2019.07.001>.

<sup>38</sup> Luca Belli, Water B. Gaspar, and Shilpa Singh Jaswant, "Data Sovereignty and Data Transfers as Fundamental Elements of Digital Transformation: Lessons from the BRICS Countries," *Computer Law & Security Review* 54 (September 2024): 106017, <https://doi.org/10.1016/j.clsr.2024.106017>.

electronic transaction tax on trading through electronic systems activities or what is often referred to as value-added tax and trade through electronic systems. For this taxation policy, Malik & Saputra (2023) as cited by Destiny Wulandari call it unilateral measures or unilateral actions in taxing transactions in the digital economy.<sup>39</sup>

Unilateral taxation indirectly affects bilateral relations between countries.<sup>40</sup> Unilateral actions to impose direct taxes on digital products and services by foreign providers may cause disputes, especially with partner countries that have double taxation agreements with Indonesia. The Indonesian government itself may have suspended the imposition of taxes on digital services until a multilateral solution is found and pending an agreement within the OECD framework on corporate income tax on permanent establishments.

Developing countries generally relying on tax revenue face significant challenges in the digital era. In addition, developing countries also become the destination of the investment from multinational digital companies. The unilateral implementation of digital tax policies by developed countries has created loopholes in the international tax system. As a result, developing countries probably miss out on substantial tax revenue potential, especially from the fast-growing digital economy sector. This condition can hamper economic and social development efforts in developing countries.

### **3) Digital Development**

The digital economy sector in the last few decades has been so progressive in terms of its development, this can be seen from the rise of economic actors who are involved in this sector. In 2016 there were more than 1,500 start-ups in Indonesia, until in January 2024 the number of start-ups in Indonesia had reached 2,566 start-ups, and this ranked 6th largest in the world. With such massive development, in

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<sup>39</sup> Nurlita Sukma Alfandia, "Literature Review on Digital Service Tax as Reference for New Business Model in Indonesia," in *Proceedings of the 2nd Annual International Conference on Business and Public Administration (AICoBPA 2019)* (Paris, France: Atlantis Press, 2020), <https://doi.org/10.2991/aebmr.k.201116.037>.

<sup>40</sup> Paul Atagamen Aidonojie et al., "The Prospect and Legal Issues of Income Tax in the Nigerian Metaverse," *Trunojoyo Law Review* 6, no. 1 (February 26, 2024): 17–50, <https://doi.org/10.21107/tlr.v6i1.23874>.

just seven years, digital economy businesses have experienced a significant increase of 155% or more than double.

Seeing the rapid growth of digital economy players, policymakers face great challenges in formulating effective and adaptive regulations.<sup>41</sup> Existing regulations are often unable to keep up with the speed of technological change and innovative business models have made existing regulations increasingly irrelevant, resulting in the term "het recht hink achter de feiten aan" which describes a condition where the law always lags behind the times.

The rapid development in the digital economy sector poses challenges in identifying tax objects in determining value-added tax.<sup>42</sup> Fundamentally, value-added tax includes two principles, namely the principle of neutrality and the principle of destination.<sup>43</sup> The principle of neutrality means that the collection should not affect the economic decisions of business actors or consumers, while the principle of destination is the imposition of value-added tax on consumption carried out domestically, regardless of where the goods and/or services come from.

The development of digital technology that allows cross-border businesses has made it difficult for the government and business actors to determine the appropriate income tax imposition.<sup>44</sup> The characteristics of digitization mean that corporate income is not confined to a single jurisdiction, creating challenges in determining which country's tax authorities are entitled to collect taxes. This triggers the need for clear international regulations to avoid tax evasion and ensure tax fairness between countries. Moreover, by using the internet network, all national borders can be connected.

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<sup>41</sup> Lastuti Abubakar and Tri Handayani, "Investor Protection Through Exchange Transaction Settlement Guarantee and Investor Protection Fund," *Trunojoyo Law Review* 1, no. 1 (February 5, 2019): 46–60, <https://doi.org/10.21107/tlr.v1i1.5256>.

<sup>42</sup> Tibor Hanappi, Adam Jakubik, and Michele Ruta, "Fiscal Revenue Mobilization and Digitally Traded Products: Taxing at the Border or behind It?," *Journal of Policy Modeling* 46, no. 4 (July 2024): 779–801, <https://doi.org/10.1016/j.jpolmod.2024.04.001>.

<sup>43</sup> Putri Andreana and Inayati Inayati, "Principles of Tax Collection in Value Added Tax (VAT) on Digital Services in Indonesia," *Jurnal Public Policy* 8, no. 1 (2022): 31, <https://doi.org/10.35308/jpp.v8i1.4692>.

<sup>44</sup> Supardianto, Ridi Ferdiana, and Selo Sulisty, "The Role of Information Technology Usage on Startup Financial Management and Taxation," *Procedia Computer Science* 161 (2019): 1308–15, <https://doi.org/10.1016/j.procs.2019.11.246>.

The Organization for Economic Cooperation and Development (OECD), a multilateral organization with 38 member countries working together to promote economic growth, prosperity, and sustainable development, formulates several principles for taxing the digital economy. First, efficiency: efficiency is intended to keep the cost of compliance with the cost of business and administration by the government to a minimum. Second, effectiveness and fairness: this principle requires that the tax system should generate the right amount of tax at the right time, and avoid double taxation and non-taxation. Third, flexibility: this principle requires the tax system to be flexible and dynamic so that it can adapt to technological developments.<sup>45</sup> This means that the tax system must be durable in the context of changing policies, yet flexible and dynamic to allow the government to respond to keep pace with technological developments, taking into account that future developments are often difficult to achieve.

### **Legal Uncertainty Affects Tax Compliance of Digital Economy Actors**

Indonesia already has several tax regulations, namely Law Number 6 of 1983 concerning General Provisions and Procedures for Taxation which has been amended several times most recently by Law Number 6 of 2023 concerning Stipulation of Government Regulation in Lieu of Law Number 2 of 2022 concerning Job Creation into Law.<sup>46</sup> The change occurred because, during the COVID-19 pandemic, there was a shift in people's habits, which initially involved their activities being offline and then online.<sup>47</sup> This is also inseparable from the transaction process, which offline has decreased and online transactions have increased significantly.<sup>48</sup> This is also influenced by the continued increase in

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<sup>45</sup> Noor Romy Rahwani et al., "XBRL Based Corporate Tax Filing in Indonesia," *Procedia Computer Science* 161 (2019): 133–41, <https://doi.org/10.1016/j.procs.2019.11.108>.

<sup>46</sup> Sudharto P. Hadi, Rizkiana S. Hamdani, and Ali Roziqin, "A Sustainability Review on the Indonesian Job Creation Law," *Heliyon* 9, no. 2 (February 2023): e13431, <https://doi.org/10.1016/j.heliyon.2023.e13431>.

<sup>47</sup> Daniël Bossen et al., "Online and Offline Behavior Change Techniques to Promote a Healthy Lifestyle: A Qualitative Study," *International Journal of Environmental Research and Public Health* 19, no. 1 (January 4, 2022): 521, <https://doi.org/10.3390/ijerph19010521>.

<sup>48</sup> Marcel Broersma and Joëlle Swart, "Do Novel Routines Stick After the Pandemic? The Formation of News Habits During COVID-19," *Journalism Studies* 23, no. 5–6 (April 26, 2022): 551–68, <https://doi.org/10.1080/1461670X.2021.1932561>.

internet users in Indonesia, especially from 2018 to the present. As of 2018, Indonesia's internet penetration reached 64.8%. Then sequentially, 73.7% in 2020, 77.01% in 2022, 78.19% in 2023, and 79.5% in 2024.<sup>49</sup>

The law a quo regulates tax collection based on electronic transactions. One of the arrangements is the description of tax subjects consisting of individuals, undivided inheritance, entities, and permanent establishments. In addition, tax subjects are re-divided into two criteria, namely:<sup>50</sup> domestic tax subjects and foreign tax subjects. Interestingly, in the criteria of foreign tax subjects, it must be physically present in Indonesia or a permanent establishment in Indonesia. Such regulations will automatically open up opportunities for platforms that are not physically located in Indonesia to avoid tax collection.<sup>51</sup> This is also related to the notion of permanent establishment clearly requiring physical presence.

Electronic tax arrangements are also contained in the provisions of Minister of Finance Regulation Number 60/PMK.03/2022 concerning Procedures for Appointment of Collectors, Collection, Deposit, and Reporting of Value Added Tax on the Utilization of Intangible Taxable Goods and/or Taxable Services from Outside the Customs Area within the Customs Area through Trading Through Electronic Systems (Minister of Finance Regulation, 60/2022). The regulation defines trading through electronic systems (PMSE) as trading in which transactions are conducted through a series of electronic devices and procedures. However, this regulation does not provide detailed confirmation regarding who is a digital economy actor or the qualifications of parties that can be said to be trading through electronic systems actors.

The identification of tax subjects that do not have a physical presence in a country also has no explanation or further information regarding the tax burden

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<sup>49</sup> Nindyo Cahyo Kresnanto and Wika Harisa Putri, "Subsidies for Electric Vehicles as a Form of Green Transportation: Evidence from Indonesia," *Transportation Research Interdisciplinary Perspectives* 27 (September 2024): 101230, <https://doi.org/10.1016/j.trip.2024.101230>.

<sup>50</sup> Dina Silvia Puteri, "Making Indonesia Sustainable: Shaping the Law to Reduce Digital Carbon Footprint," *Indonesian Journal of Advocacy and Legal Services* 6, no. 1 (April 23, 2024): 77-102, <https://doi.org/10.15294/ijals.v6i1.78500>.

<sup>51</sup> Rina Arum Prastyanti and Ridhima Sharma, "Establishing Consumer Trust Through Data Protection Law as a Competitive Advantage in Indonesia and India," *Journal of Human Rights, Culture and Legal System* 4, no. 2 (May 28, 2024): 354-90, <https://doi.org/10.53955/jhcls.v4i2.200>.

that will be given to whom. This provides uncertainty for tax subjects, so many subjects avoid it due to a lack of understanding or because there are loopholes in the regulation. The regulatory vacuum related to the identification of detailed tax subjects, causes many third parties to have difficulty collecting taxes.

The permanent establishment arrangement is also problematic dealing with tax collection from the digital economy, especially in cross-border transactions.<sup>52</sup> There is still no consensus on whether permanent establishment requires physical or non-physical presence. Especially for countries that adhere to the Double Taxation Avoidance Agreement (DTAA).<sup>53</sup> It is interpreted as an agreement made between the Government of Indonesia and the government of a partner country or can be said to be a partner jurisdiction in preventing double taxation and tax manipulation that leads to tax evasion. This agreement has several benefits for the countries involved, one of which is that the tax rate will be lower than that of countries that do not implement DTAA or can also be interpreted as an exclusion of tax imposition from the tax source country. So what about the foreign trade office "representative office", will it be taxed with such permanent establishment arrangements?

Based on the provisions of Article 5 paragraph (2) of the OECD, "The term 'permanent establishment' includes especially: (a) a place of management; (b) a branch; (c) an office; (d) a factory; (e) a workshop, and (f) a mine, an oil or gas well, a quarry or any other place of extraction of natural resources." As it has been included as a substance in the provision of permanent establishment in the Ciptakerja Law, it can be seen that the foreign trade office is not included in the type of business in forming permanent establishment. the foreign trade office is included in the category of exclusion from permanent establishment when referring to the provisions of Article 5 paragraph (4) of the OECD which states:

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<sup>52</sup> Henry Dianto Pardamean Sinaga And Nabitatus Sa;Adah, "Reformulasi Pajak Penghasilan Atas Transaksi Lintas Batas Di Era Digital Di Indonesia," *Jurnal Pembangunan Hukum Indonesia* 6, No. 1 (2024): 87. <https://doi.org/10.14710/jphi.v6i1.82-95>.

<sup>53</sup> Suparna Wijaya And Herlina Utamawati, "Pajak Penghasilan Dari Ekonomi Digital Atas Cross-Boarder Transaction," *Jurnal Online Insan Akuntan* 3, No. 2 (2018): 139, <https://Tirto.Id/Kesempatan-Dan-Kesempitan-Ekonomi-Digital-Indonesia-Vxu>].



*“Notwithstanding the preceding provisions of this Article, the term “permanent establishment” shall be deemed not to include: a) the use of facilities solely for the purpose of storage, display or delivery of goods or merchandise belonging to the enterprise; b) the maintenance of a stock of goods or merchandise belonging to the enterprise solely for the purpose of storage, display or delivery; c) the maintenance of a stock of goods or merchandise belonging to the enterprise solely for the purpose of processing by another enterprise; d) the maintenance of a fixed place of business solely for the purpose of purchasing goods or merchandise or of collecting information, for the enterprise; e) the maintenance of a fixed place of business solely for the purpose of carrying on, for the enterprise, any other activity; f) the maintenance of a fixed place of business solely for any combination of activities mentioned in subparagraphs a) to e), provided that such activity or, in the case of subparagraph f), the overall activity of the fixed place of business, is of a preparatory or auxiliary character”.*<sup>54</sup>

In the sense that it is not considered as a business establishment if it only has a supporting status and does not perform the main actions such as contracting etc. the foreign trade office is not included in permanent establishment if it is only a place to store or maintain goods, as a place to collect information, or is still preparatory. On that basis, the foreign trade office should not be able to be used as a business entity so it is not included in the subject to be taxed.

However, to answer these problems, Indonesia must look at 2 aspects. First, does the country used as domicile have a DTAA agreement with Indonesia? Second, if it is known to have such an agreement, can the agreement be implemented because several administrative requirements must be met, one of which is a domicile certificate. If the foreign trade office has a DTAA agreement relationship and fulfills the administrative requirements as required, then, in taxation, it is not included in the criteria of permanent establishment, or it can be said that permanent establishment is exempted. Therefore, it cannot be taxed. Meanwhile, if it does not have a permanent establishment, even though it is by the provisions in Article 5 paragraph (4) of the OECD based on the provisions in SE-18/PJ/431/1992, it states that the foreign trade office conducting business activities and/or free work is subject to tax because it meets the permanent establishment. However, if it has a

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<sup>54</sup> Oecd Committee On Fiscal Affairs, *Model Tax Convention On Income And On Capital 2005, Model Tax Convention On Income And On Capital 2005*, 2007, <https://doi.org/10.1787/9789264061507-En>.

DTAA agreement, it is not subject to tax because there are exceptions.<sup>55</sup> Such a concept of permanent establishment creates legal uncertainty, when it comes to cross-border, not all countries accept the concept that permanent establishment requires physical presence or not. This was also conveyed during the G-20 in which Indonesia was also involved. Although permanent establishment is simply defined in Article 5 paragraph (7) of the OECD as:

*“The fact that a company which is a resident of a Contracting State controls or is controlled by a company which is a resident of the other Contracting State, or which carries on business in that other State (whether through a permanent establishment or otherwise), shall not of itself constitute either company a permanent establishment of the other.”*

In that provision, although it states that a legal entity in the sense of a subsidiary company that is separate from the parent company in its activities controlled by the parent company is not necessarily referred to as a permanent establishment. However, another opinion states that when a subsidiary is factually controlled by the parent company, it can be called a permanent establishment.<sup>56</sup>

The different views on permanent establishment and the lack of regulation to clarify the meaning of permanent establishment, of course, become confusing for tax subjects and the government in conducting tax collection. This lack of clarity will be an opportunity for entrepreneurs to avoid taxpayers. Other problems will also arise in dispute resolution if there is a dispute. This can be seen from the cases that have occurred in several countries, including the UK, France, and India. First, in the Zimmer case, is a company whose parent company is Zimmer Ltd which is domiciled in the UK.<sup>57</sup>

Meanwhile, in carrying out its product sales activities, Zimmer is affiliated with Zimmer SAS in France. Over time, Zimmer SAS was restructured so that it could act

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<sup>55</sup> Demeiati Nur Kusumaningrum, Dion Maulana Prasetya, and Novin Farid Styo Wibowo, “Unveiling Creative Economy Resilience in Indonesia amidst the Global Pandemic,” *Innovation in the Social Sciences* 2, no. 1 (January 23, 2024): 86–118, <https://doi.org/10.1163/27730611-bja10022>.

<sup>56</sup> Oliver-Christoph Günther And Luís Eduardo Schoueri, “The Subsidiary As A Permanent Establishment,” *Bulletin For International Taxation* 2 (2011): 69.

<sup>57</sup> Ratih Dyah Kusumastuti et al., “Analyzing the Factors That Influence the Seeking and Sharing of Information on the Smart City Digital Platform: Empirical Evidence from Indonesia,” *Technology in Society* 68 (February 2022): 101876, <https://doi.org/10.1016/j.techsoc.2022.101876>.

on its behalf (commissionaire), but its function remained the same to represent Zimmer Ltd. Zimmer SAS began to make sales on its behalf, but the profits and risks were borne by Zimmer Ltd. At the time of the sale, consumers did not know that Zimmer SAS was behind Zimmer Ltd. In this case, the French court ruled that Zimmer Ltd had indirectly established a business establishment and was obliged to pay tax, as an indirect result of the practices carried out by Zimmer SAS. This was based on the opinion of the French tax authorities that Zimmer SAS already had authority which indirectly bound Zimmer Ltd to its customers.

In making sales, agreements, and tender applications, Zimmer SAS is not justified if it only stands alone because it has indirectly bound Zimmer Ltd. Therefore, the argument from Zimmer Ltd that it is not bound as a tax subject because it is not a permanent establishment cannot be justified. A different opinion from the Conseil d'Etat court which stated that Zimmer SAS cannot bind Zimmer Ltd in performing acts of sale, contracts, etc. because it stands alone in the formal legal approach. In essence, the Conseil d'Etat court emphasized that contracts cannot be factually binding, but must be following formal legal. A subsidiary can form a permanent establishment or tax subject if it can provide formal legal attachment to its parent company. Factual contractual attachment cannot be used in a civil law country but with formal legal.<sup>58</sup> This is different when referring to the US Tax Court's view.<sup>59</sup> Which states that Zimmer SAS has created a permanent establishment for Zimmer Ltd. That is due to the authority possessed by Zimmer SAS in performing actions on its own behalf. In the case of Rolls Royce, between the UK company RR, RRIL which also has an office in India, there was a difference of opinion on this case, particularly on the determination of permanent establishment.<sup>60</sup>

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<sup>58</sup> Nina Bittner, Nicole Bakker, and Thomas B. Long, "Circular Economy and the Hospitality Industry: A Comparison of the Netherlands and Indonesia," *Journal of Cleaner Production* 444 (March 2024): 141253, <https://doi.org/10.1016/j.jclepro.2024.141253>.

<sup>59</sup> United States Tax Court, *Inverworld, Inc. V. Commissioner: T.C. Memo.* (United States Tax Court, 1996).

<sup>60</sup> Inda D Lestantri et al., "The Perceptions towards the Digital Sharing Economy among SMEs: Preliminary Findings," *Procedia Computer Science* 197 (2022): 82–91, <https://doi.org/10.1016/j.procs.2021.12.121>.

The conclusion remark is that differences in legal systems, legal culture, and legal formalities are one of the uncertainties in determining cross-border permanent establishment.<sup>61</sup> As of this writing, Indonesia still does not have clarity on Permanent Establishments that cross countries with different legal systems and also with companies that are not physically present in Indonesia.

Furthermore, the value-added tax collector for trading through electronic systems transactions is appointed by the Minister of Finance and the collector is obliged to collect.<sup>62</sup> Tax collection in digital economic activities can also be carried out if there has been an appointment by the relevant minister. Therefore, the relevant minister will appoint based on his knowledge of the economic transaction activity and will impose a tax burden.<sup>63</sup> However, Indonesia still does not have a sophisticated application to detect digital economic activities precisely and accurately.

In addition, the unclear identification of tax subjects and definitions, digital economy players, and permanent establishments make the designation very difficult to carry out, and the designated parties will easily fail to comply. Regardless, the Government has recorded the collection of value-added tax on trade through electronic systems amounting to 18.74 trillion, crypto tax amounting to 580.2 billion, fintech tax (P2P lending) amounting to 1.95 trillion, and taxes collected by other parties on transactions of procurement of goods and/or services through the Government Procurement Information System (SIPP) amounting to Rp23.04 trillion. Indonesia is committed to continuing to appoint digital economy tax subjects to continue to develop revenue from the tax sector.

Therefore, the absence of detailed identification related to the meaning of trade through electronic systems actors, identification of legal subjects, the meaning

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<sup>61</sup> Satrio Abdillah, Norhasliza Ghapa, and Maheran Makhtar, "A Comparative Study Between Indonesia and Malaysia on the Role of Notaries and Advocates," *Jurnal Usm Law Review* 6, no. 3 (2023): 953, <https://doi.org/10.26623/julr.v6i3.7853>.

<sup>62</sup> Wildan Arif and Ning Rahayu, "Implementation of the Electronic System for Collection of Value-Added Tax on Trade: Appointing Foreign and Local Companies as Collectors," *Jurnal Public Policy* 9, no. 3 (July 30, 2023): 172, <https://doi.org/10.35308/jpp.v9i3.7590>.

<sup>63</sup> Amelia Cahyadini, Josep Irvan Gilang Hutagalung, and Zainal Muttaqin, "The Urgency of Reforming Indonesia's Tax Law in the Face of Economic Digitalization," *Cogent Social Sciences* 9, no. 2 (December 15, 2023), <https://doi.org/10.1080/23311886.2023.2285242>.

of permanent establishment, and the concept of tax collection makes it difficult for the government to collect taxes, and tax subjects can avoid to be taxed. The lack of clarity provides legal uncertainty for both the government, the tax subject, and the tax object itself.<sup>64</sup> Legal certainty is defined as a provision or determination made by a country's legal apparatus that can provide guarantees for the rights and obligations of every citizen. This has implications for the confusion of law enforcement to enforce norms in taxation. This lack of clarity affects taxpayer compliance to pay their taxes.

Compliance is the most important variable in the amount of tax revenue of a country.<sup>65</sup> The main factor that can influence taxpayer compliance is tax knowledge.<sup>66</sup> Tax knowledge includes an understanding of everything within the scope of taxation, which will increase awareness and compliance. Taxation knowledge is essential for compliance because better understanding will cause a person to be more compliant in paying state taxes.<sup>67</sup> According to research, knowledge of taxes has a positive and significant impact on taxpayer compliance.<sup>68</sup> Based on the data above, tax revenue in the digital economy sector is not proportional to digital users in Indonesia.<sup>69</sup> Therefore, there is still no maximization in tax collection and tax compliance.

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<sup>64</sup> Yoga Pamungkas et al., "Evaluation of Interoperability Maturity Level: Case Study Indonesian Directorate General of Tax," *Procedia Computer Science* 157 (2019): 543–51, <https://doi.org/10.1016/j.procs.2019.09.012>.

<sup>65</sup> Thu Hien Nguyen, "The Impact of Non-Economic Factors on Voluntary Tax Compliance Behavior: A Case Study of Small and Medium Enterprises in Vietnam," *Economies* 10, no. 8 (2022), 1, <https://doi.org/10.3390/economies10080179>.

<sup>66</sup> Retnaningtyas Widuri, Michella Shan Christabel, and Evelyn Lavinia, "The Effect of Tax Knowledge and Tax Sanctions on Tax Compliance: The Role of Tax Awareness as Intervening Variable," *InFestasi* 20, no. 1 (2024): 67, <https://doi.org/https://doi.org/10.21107/infestasi.v20i1.23623>.

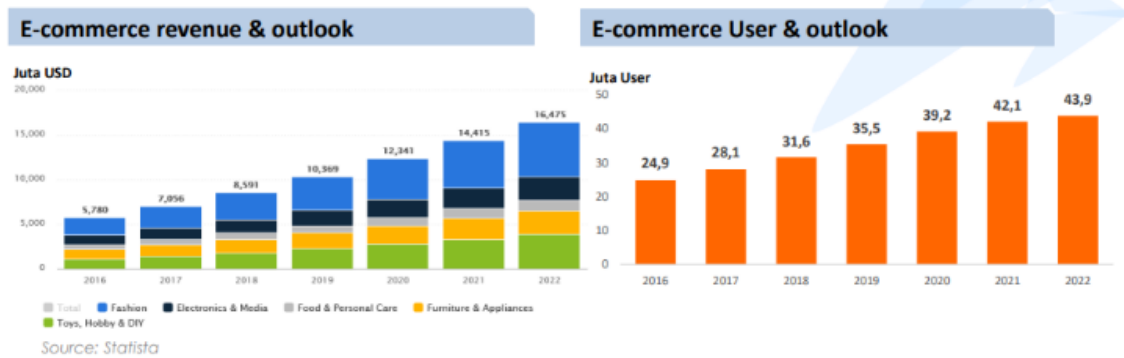
<sup>67</sup> Anna Yulianita, Subardin Subardin, and Zulfikri Zulfikri, "Government Size and Digital Inequality in Indonesia," *Journal of Governance and Accountability Studies* 4, no. 1 (June 7, 2024): 31–41, <https://doi.org/10.35912/jgas.v4i1.1981>.

<sup>68</sup> Novitasari, Shodiq Askandar, And Wahid Mahsuni, "Pengaruh Pengetahuan Perpajakan Dan Sosialisasi Pajak Terhadap Kepatuhan Wajib Pajak Umkm Sesuai Pp 23-2018 Di Kpp Pratama Malang Selatan."

<sup>69</sup> Dewi Noor Fatikhah Rokhimakhumullah et al., "Analysis of Implications of Digital Economy Development on Tax Treatment of E-Commerce," in *Proceedings of the Fifth Annual International Conference on Business and Public Administration (AICoBPA 2022)* (Paris, France: Atlantis Press, 2023), 166–77, [https://doi.org/10.2991/978-2-38476-090-9\\_16](https://doi.org/10.2991/978-2-38476-090-9_16).

The following data is attached to the comparison of the number of digital economy actors and the amount that has been withdrawn.<sup>70</sup>

**Figure 1.** The Comparison of The Number of Digital Economy Actors



*Source: government data on the increase in e-commerce users*

The data above shows that by January 2016, internet users in Indonesia had reached 88.1 million with an average of 48% being daily internet users. Meanwhile, the number of e-commerce buyers in Indonesia in the same year reached 24.74 million people, or 9% of the total population, with a total transaction value of USD 5.6 billion. The highest rate of the e-commerce customers growth in Indonesia was in January 2017 with a percentage of 155%.

Taxpayer non-compliance, especially for digital economy players, is certainly a challenge for the government, especially dealing with taxpayers with no physical permanent establishment in Indonesia. Of course, this can be resolved by DTAA involving several related countries to create a cross-country joint tax collection model. This is to avoid cross-border conflicts and comply international agreed Tax principles.

### Limited Technological Infrastructure in the Enforcement of Digital Economy Taxation Regulations in Indonesia

Amidst the rapid development of the digital economy in Indonesia, taxation policy continues to face new complex challenges.<sup>71</sup> One of the fundamental issues is

<sup>70</sup> Badan Kebijakan Fiskal Kementerian Keuangan, “Kebijakan Perpajakan Atas Ekonomi Digital,” 2018.

<sup>71</sup> Aries Pratama Putra, Fitri Nuraisah, and M.Wahyu Kuswanto, “The Role of Digital Transformation On The Performance of Indonesia’s Biggest Dry Bulk Port,” *Procedia Computer Science* 234 (2024): 900–908, <https://doi.org/10.1016/j.procs.2024.03.078>.

the limited technological infrastructure that hinders the effective implementation of tax regulations.<sup>72</sup> The digital economy, which includes e-commerce, fintech, and various other digital services, has different characteristics from the traditional economy, especially in terms of the non-physical and cross-border nature of transactions. Along with that, tax regulations that were originally designed for the physical-based economy have difficulty adjusting to these digital dynamics.

The Indonesian government has tried to respond to the development of the digital economy through various policies.<sup>73</sup> However, the reality on the ground shows that technological limitations and human capacity in enforcing these policies are still far from adequate. This has led to an imbalance between the rapid growth of the digital economy and the country's ability to collect taxes from the sector. In this context, it is important to understand that without adequate technological infrastructure, efforts to enforce tax regulations will continue to be hampered, and the potential for state revenue from the digital sector will be difficult to optimize.

### **1) Critical Review of Taxation Policy in the Digital Era**

In response to the current development of digital transactions, Indonesian government issued Minister of Finance Regulation Number 48/PMK.03/2020 on Value Added Tax for digital transactions of intangible goods and services from abroad that are marketed in Indonesia. This regulation is a follow-up to the provisions of Article 6 paragraph (13) letter a of government regulations in lieu of law Number 1 of 2020 concerning State Financial Policy and Financial System Stability for Handling the Corona Virus Disease 2019 (COVID-19) Pandemic and dealing with threats that endanger the national economy and/or financial system stability, which has been promulgated into Law Number 2 of 2020.<sup>74</sup> The policy is

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<sup>72</sup> Ivan Darma Wangsa, Iwan Vanany, and Nurhadi Siswanto, "The Optimal Tax Incentive and Subsidy to Promote Electric Trucks in Indonesia: Insight for Government and Industry," *Case Studies on Transport Policy* 11 (March 2023): 100966, <https://doi.org/10.1016/j.cstp.2023.100966>.

<sup>73</sup> Yoga Affandi et al., "Digital Adoption, Business Performance, and Financial Literacy in Ultra-Micro, Micro, and Small Enterprises in Indonesia," *Research in International Business and Finance* 70 (June 2024): 102376, <https://doi.org/10.1016/j.ribaf.2024.102376>.

<sup>74</sup> Nafis Dwi Kartiko And Agustin Widjiastuti, "Potensi Pajak Dalam Ekonomi Digital Dan Rekomendasi Kebijakannya," *Jurnal Indonesia Sosial Teknologi* 3, No. 1 (2022): 59. <https://doi.org/10.59141/jist.v3i01.326>.

the government's first step to capture state revenue from the digital sector which was previously difficult to reach by tax authorities.

Through this Minister of Finance Regulation, foreign companies that provide digital services such as applications, streaming, or software to consumers in Indonesia are required to collect value-added tax at 10% of the transaction value. However, there are still several technical issues that hinder tax revenue from the digital economy sector. One of them is that the reporting and monitoring system used by the Directorate General of Taxes (DGT) which is still not fully integrated with the digital ecosystem, so the tax collection still depends on the voluntary compliance of service providers.<sup>75</sup> This is due to the absence of an automated technology mechanism that can detect cross-border transactions in real-time to monitor many undetected transactions by the Indonesian tax system, especially transactions involving global digital companies with no physical presence in Indonesia.

This limitation creates problems in terms of tax revenue in Indonesia. The Government potentially lose considerable tax revenue from the digital sector which is currently growing rapidly.<sup>76</sup> This problem can be solved by updating digital tax regulations that include improvements in compliance and enforcement mechanisms that utilize technology to detect violations committed by digital companies in Indonesia.<sup>77</sup> It is expected that the potential tax from digital sector can be optimized and make a significant contribution to state revenue.

## **2) Technology Limitations in Monitoring Digital Transactions**

Technological limitations in monitoring digital transactions are a challenge that cannot be ignored. Indonesia faces technological limitations in enforcing digital

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<sup>75</sup> Ahmad Aridho Et Al., "Implementasi Pajak Digital Di Kota Medan: Tantangan Dan Solusi," *Jurnal Hukum, Politik Dan Ilmu Sosial* 3, No. 3 (2024): 59 <https://doi.org/10.55606/jhpis.v3i3.3915>.

<sup>76</sup> Nina Rahayu Et Al., "Pembangunan Ekonomi Indonesia Dengan Tantangan Transformasi Digital," *Adi Bisnis Digital Interdisiplin Jurnal* 4, No. 1 (2022): 1. <https://doi.org/10.34306/abdi.v4i1.823>.

<sup>77</sup> Chirmala Wisnu Permata Affardi, "Dampak Dan Tantangan Penerapan Pajak Digital Di Indonesia: Studi Kasus Pt.Sii Dan Pt. T," *Jurnal Ilmiah Mea* 8, No. 2 (2024): 890. <https://doi.org/10.31955/mea.v8i2.4093>.



taxation regulations.<sup>78</sup> One of the main challenges is the lack of a comprehensive tracking system for cross-border transactions, especially since in the digital economy, transactions often take place without the physical presence of the seller in the country where the buyer is located.<sup>79</sup>

To enable countries such as Indonesia in demanding taxes from such companies without physical presence, the OECD has formulated a policy of redefining "significant economic presence".<sup>80</sup> This policy is part of Pillar One in a broader framework to address the challenge of tax avoidance while ensuring that taxes are paid where value is created. However, the implementation of this policy in Indonesia is constrained by limited technological infrastructure (IT). Indonesia's tax system still relies heavily on manual reporting by digital service providers, which is often non-transparent and difficult for tax authorities to verify.

The Directorate General of Taxes (DGT) also faces difficulties in monitoring transaction flows on e-commerce platforms and international streaming services.<sup>81</sup> Like many other developing countries, Indonesia faces great challenges in adapting digital taxation regulations due to limited technological infrastructure and poorly integrated tax administration. Developing countries still rely on manual record-keeping and do not have adequate data management systems, making it difficult to collect and process tax data automatically.<sup>82</sup>

In contrast, developed countries have started using technologies such as big data and artificial intelligence (AI) to detect digital transactions and collect taxes

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<sup>78</sup> Irsan Rahman et al., "Harmonization of Digital Laws and Adaptation Strategies in Indonesia Focusing on E-Commerce and Digital Transactions," *Innovative: Journal Of Social Science Research* 4, no. 1 (2024): 4315.

<sup>79</sup> Siti Wahyu Utami, "Tinjauan Yuridis Terhadap Pajak Digital: Implementasidan Tantangannya Di Indonesia," *Jurnal Studi Interdisipliner Perspektif* 23, No. 1 (2024): 93. <https://www.ejournal-jayabaya.id/Perspektif/article/view/150>.

<sup>80</sup> Ibrahim Mu'azu Usman and Tapash Ranjan Saha, "An Overview of Tax Challenges of Digital Economy," *Asia-Pacific Journal of Management and Technology* 03, no. 02 (2022): 56, <https://doi.org/10.46977/apjmt.2022v03i02.005>.

<sup>81</sup> Milla Sepliana Setyowati et al., "Strategic Factors in Implementing Blockchain Technology in Indonesia's Value-Added Tax System," *Technology in Society* 72 (February 2023): 102169, <https://doi.org/10.1016/j.techsoc.2022.102169>.

<sup>82</sup> E. M. Bird, R. M., & Zolt, "Technology And Taxation In Developing Countries: From Hand To Mouse," *National Tax Journal* 61, No. 4 (2008): 2-4. <https://dx.doi.org/10.2139/ssrn.1086853>.

more efficiently.<sup>83</sup> These systems enable greater scrutiny of digital transactions, including through big data analysis from multiple sources to identify unreported transactions. Developed countries have integrated machine learning to predict potential tax fraud, providing huge advantages in terms of efficiency and timeliness of tax collection.<sup>84</sup> Meanwhile, Indonesia with its limited technological infrastructure has yet to implement a similar system, posing a major challenge in ensuring tax compliance in the increasingly complex digital era.

Furthermore, Indonesia needs to develop an advanced technological infrastructure to overcome the limitations in tracking digital transactions and ensuring tax compliance. By doing so, Indonesia can improve the efficiency of tax collection and ensure that digital companies that derive revenue from its citizens also fulfill their tax obligations. In addition to the issue of digital transaction tracking, the integration between the tax system and the financial technology (fintech) ecosystem in Indonesia is also still very limited. Currently, digital payments, whether through digital wallets, credit cards, or other fintech platforms, increasingly dominate e-commerce transactions in Indonesia.

However, Indonesia's tax system has not been able to fully adapt this change yet, mainly because no mechanism automatically records and reports transactions through the fintech platforms. Most transactions in Indonesia still rely on voluntary report from businesses, and the database is often not available in real time. To overcome this limitation, Indonesia needs to invest for integrated technology between the tax system and fintech platforms.<sup>85</sup> This step will ensure that all digital transactions can be recorded and taxed correctly so that potential tax leaks can be minimized.

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<sup>83</sup> Odunayo Adewunmi Adelekan, "Evolving Tax Compliance in The Digital Era: A Comparative Analysis of AI-Driven Models and Blockchain Technology in U.S. Tax Administration," *Computer Science & IT Research Journal*, Volume 5, Issue 2, February 2024 5, no. 2 (2024): 321, <https://doi.org/10.51594/csitrj.v5i2.759>.

<sup>84</sup> Setyowati et al., "Strategic Factors in Implementing Blockchain Technology in Indonesia's Value-Added Tax System."

<sup>85</sup> Faisal Salistia, Dedi Junaedi, and Rika Sri Amalia, "Ekosistem SDM Dan Inovasi Ekonomi Digital Di Indonesia," *Sci-Tech Journal* 2, no. 1 (2022): 20, <https://doi.org/10.56709/stj.v2i1.60>.

Furthermore, integrated technology can accelerate the tax law enforcement process as well,<sup>86</sup> reducing reliance on voluntary reporting that is often inaccurate. Without a well-connected system, the Directorate General of Taxes (DGT) faces major challenges in ensuring tax compliance from digital transactions. With the increasing use of digital payments among consumers, integration between tax systems and digital payment platforms should be the most priority in Indonesia's digital tax reform.

Data security is a critical issue that has not been fully addressed in the implementation of digital taxation policies in Indonesia.<sup>87</sup> Digital transactions often involve highly sensitive personal data and financial information, and if not handled properly, can become a target for hackers. In the context of taxation, this data leakage can not only harm consumers but also weaken trust in the digital taxation system itself. To date, there has been no concrete step from the government in terms of strengthening the cybersecurity system in the taxation sector, and this creates a huge vulnerability to potential cyberattacks.

The OECD (2020) emphasizes that the increase in the collection and sharing of personal data must be balanced with adequate protection measures to prevent the leakage of sensitive information.<sup>88</sup> Therefore, there is a need for serious attention from the government to build a strong cybersecurity infrastructure in order to protect tax data and increase public trust in the digital taxation system. With the right steps, it is expected that the problem of limited technological infrastructure can be overcome so that the enforcement of tax regulations in Indonesia can run more effectively and efficiently.

Limited technological infrastructure is one of the main factors hindering the effectiveness of tax regulation enforcement in Indonesia in facing the development

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<sup>86</sup> Retta Farah Pramesti and Deasy Emalia, "Studi Literatur : Artificial Inteligence Dalam Dunia Perpajakan Di Indonesia," *Jurnal Ekonomi Bisnis, Manajemen Dan Akuntansi (Jebma)* 4, no. 3 (2024): 1335, <https://doi.org/doi.org/jebma.v4n3.2024> Studi.

<sup>87</sup> Rulandari et al., "Analysis of the Effectiveness of Taxpayer Data Security in Implementing Tax Obligations at the Directorate General of Taxes," *Journal of Governance and Public Policy* 9, no. 3 (2022): 250, <https://doi.org/https://doi.org/10.18196/jgpp.v9i3.15976>.

<sup>88</sup> Alin Halimatussadiyah et al., "Co-Management of Large-Scale and Medium-Scale Fisheries: An Assessment of the Fishery Tax System in Indonesia," *Marine Policy* 148 (February 2023): 105458, <https://doi.org/10.1016/j.marpol.2022.105458>.

of the digital economy.<sup>89</sup> Therefore, it is expected that the government will immediately carry out major reforms in terms of technology. This reform includes not only the development of IT infrastructure but also the capacity building of human resources involved in tax administration to understand and implement new technologies. Thus, Indonesia can optimally utilize the potential of the digital economy and ensure that the taxes that should be received can be properly accumulated.

Furthermore, collaboration between the government and the private sector is also crucial in overcoming the limitations of technology infrastructure.<sup>90</sup> The government needs to establish partnerships with technology companies to develop digital solutions that can assist in monitoring and collecting taxes from digital transactions. With the right technology support, it is expected that the taxation process can run more transparently and efficiently. In addition, this collaboration can also provide better insight into best practices in the digital taxation sector that can be adopted by Indonesia.

In facing these challenges, education and training for tax employees should not be neglected. Tax employees need to be equipped with adequate knowledge and skills to manage a technology-based taxation system.<sup>91</sup> The qualified tax employees will help them in understanding and implementing new tax policies, as well as in using technological tools to detect and prevent tax evasion.

To improve tax compliance, the government also needs to consider incentives for businesses that comply with tax regulations. These incentives can be in form of reduced tax rates or ease in the tax administration process. By providing attractive incentives, it is expected that business actors will be more motivated to fulfill their tax obligations so that the potential for tax revenue from the digital sector can

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<sup>89</sup> Septyani Yohana Lumban Gaol, "Analisis Implementasi Kebijakan E-Tax Invoice Di Indonesia Dan Korea Selatan: Sebuah Studi Komparatif," *Jurnal Nova Idea* 1, no. 2 (2024): 110, [https://doi.org/https://doi.org/10.14710/nova\\_idea.47995](https://doi.org/https://doi.org/10.14710/nova_idea.47995).

<sup>90</sup> Fazli Abdillah, "Dampak Ekonomi Digital Terhadap Pertumbuhan UMKM Di Era Industri 4.0," *Benefit: Journal of Bussiness, Economics, and Finance* 1, no. 1 (2024): 28, <https://doi.org/10.37985/benefit.v2i1.335>.

<sup>91</sup> Haiyan Feng and Yan Li, "The Role of Fintech, Natural Resources, Environmental Taxes and Urbanization on Environmental Sustainability: Evidence from the Novel Panel Data Approaches," *Resources Policy* 92 (May 2024): 104970, <https://doi.org/10.1016/j.resourpol.2024.104970>.

increase. In addition, socialization and education efforts for business actors regarding the importance of tax compliance also needs to be carried out in an ongoing basis.

The importance of international cooperation in enforcing tax regulations in the digital era cannot be ignored.<sup>92</sup> Given the cross-border nature of digital transactions, collaboration between countries in terms of tax information exchange is crucial. Indonesia needs to be active in international forums to share experiences and to gain the best practices in digital taxation enforcement. Thus, Indonesia can learn from the experience of other countries that have implemented digital taxation regulations earlier and avoid the same mistakes.

Briefly, the limited technological infrastructure in enforcing tax regulations in Indonesia is a challenge that requires serious attention and immediate action.<sup>93</sup> Indonesia hopefully can overcome these challenges and maximize the potential tax revenue from the digital economy sector by reforming technological infrastructure, improving human resource capacity, collaborating with the private sector, providing incentives for businesses, and strengthening international cooperation. Only with comprehensive and integrated measures can Indonesia ensure that existing tax regulations can be implemented effectively and efficiently, and support the sustainable growth of the digital economy.

## Conclusion

The definition of significant economic presence (SEP) is a proposal to look at profits, both routine and non-routine, or the presence of customers as the starting point for defining a permanent establishment. However, regulatory differences between countries, the need for dynamic regulatory updates, and unilateral initiatives by developed countries create imbalances in the international tax system

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<sup>92</sup> Andy Winardi, Albert Lodewyk, and Sentosa Siahaan, "Tinjauan Hukum Administrasi Negara Terhadap Pembayaran Pajak," *Jocoro; Journal Of Constitution Review* 2, no. 2 (2023): 16, <https://doi.org/https://doi.org/10.54259/jocore> e-ISSN 2961-7421.

<sup>93</sup> Junwook Chi, "Exploring the Drivers of Ecological Footprint: Impacts of Road Transportation Infrastructure, Transport Tax, and Environment Technologies," *International Journal of Sustainable Transportation* 18, no. 11 (November 4, 2024): 920–34, <https://doi.org/10.1080/15568318.2024.2423726>.

that affect developing country revenues. Legal uncertainty over the regulation of PSME identification in digital transactions, identification of digital economy subjects, identification of permanent establishment, and the concept of tax collection affects the level of compliance of taxpayers to pay their taxes. This is evidenced by the incompatibility of the graph between e-commerce and internet users in general with state tax revenues from the digital economy sector. Limited technological infrastructure is still a major problem in enforcing tax regulations in Indonesia. The Indonesian government still relies on conventional tax collection processes, where until now the government does not have an automated tracking system that can track digital transactions comprehensively. This limitation has the potential to reduce state revenue from the rapidly growing digital sector.

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