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PROTECTION OF WAGES FOR DIGITAL TECHNOLOGY-BASED WORKERS IN THE DIGITAL ECONOMY: A STUDY OF SPANISH LAW AND RECOMMENDATIONS FOR VIETNAM

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ABSTRACT

The rapid development of the digital economy and technology-driven labour models has fundamentally transformed the organisation of work, with workers' income increasingly dependent on algorithmic systems that allocate tasks, evaluate performance, and determine remuneration. However, Vietnamese labour law remains largely grounded in traditional employment relationships, resulting in significant legal gaps in the protection of wages for digital technology-enabled workers. Drawing on Spain's experience under the Ley Rider and comparing it with the Vietnamese legal framework, this article examines the theoretical foundations of wage protection in digital work environments, identifies the limitations of current labour regulations, and proposes legal reforms aimed at establishing a presumption of employment relationship, ensuring algorithmic transparency, and strengthening wage protection mechanisms for digital technology-enabled workers.

Keywords: Wage protection, digital technology-enabled workers, digital economy.

INTRODUCTION:

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The rapid expansion of digital platforms in recent years has given rise to the "platform economy" or "gig economy," in which platforms act as intermediaries connecting service providers with customers through algorithms used for work allocation, pricing, and performance evaluation[2]. According to the ILO's World Employment and Social Outlook: Trends 2025, platform work and gig work are expanding rapidly; however, this growth has been accompanied by less sustainable working conditions, income inequality, and a decline in workers' bargaining power[3].

In Vietnam, alongside the development of logistics and express delivery enterprises that apply digital technologies, delivery workers have increasingly become an important segment of the workforce in the digital economy, and their employment relationships are commonly established through employment contracts and subject to enterprise management. In the context of digitalization, these activities are increasingly coordinated through data and algorithms, ranging from order allocation, GPS tracking, and performance evaluation to the monitoring of working time and task-completion speed[4]. This development makes wage protection particularly urgent, as workers' income is increasingly determined by algorithms rather than traditional mechanisms of agreement, giving rise to the phenomenon of "algorithmic wage discrimination"[5] and increasing workers' dependence on technological systems. Against this background, Spain's legislative experience offers significant reference value for Vietnam. Through Real Decreto-ley 9/2021 and Ley 12/2021 (Ley Rider), Spain introduced a presumption of employment for delivery workers

[2] Cesira Urzi Brancati, *Platform work: Algorithmic management* (30 May 2025), https://www.eurofound.europa.eu/en/publications/all/platform-work-algorithmic-management , accessed 20 August 2026.

[3] International Labour Organization, *World Employment and Social Outlook: Trends 2025* (16 January 2025), https://www.ilo.org/publications/flagship-reports/world-employment-and-social-outlook-trends-2025 , accessed 20 August 2026.

[4] Nguyen Ngoc Kieu Trinh, Lam To Trang, *Quan hệ hợp đồng giữa doanh nghiệp logistics và người giao hàng [Contractual relationship between logistics enterprises anddelivery workers]*, Tạp chí Khoa học Đại học Mở Thành phố Hồ Chí Minh - Khoa học xã hội [Ho Chi Minh City Open University Journal of Science - Social Sciences], 21(2), 49-61 (2026). https://doi.org/10.46223/HCMCOUJS.soci.vi.21.2.5139.2026

[5] Veena Dubal, *On algorithmic wage discrimination*, Columbia Law Review, Vol 123, No 7, 1929-1992 (2023), https://columbialawreview.org/content/on-algorithmic-wage-discrimination/

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operating through digital platforms, while also establishing requirements for algorithmic transparency in labour management in order to strengthen worker protection[6]. This experience is particularly relevant for Vietnam because both countries belong to the civil law tradition and place considerable emphasis on indicators of dependency, management, and control in determining the existence of an employment relationship.

In the context of Vietnam's implementation of Resolution No. 57-NQ/TW of the Politburo on breakthroughs in the development of science, technology, innovation, and national digital transformation, improving the legal framework for protecting the rights and interests of workers who use digital technologies has become an urgent requirement for ensuring the sustainable and inclusive development of the digital economy. This article employs comparative and legal analytical methods to examine and contrast the laws of Spain and Vietnam, thereby identifying existing legal gaps and proposing appropriate directions for legal reform.

THEORETICAL FOUNDATIONS AND THE CURRENT STATE OF THE LAW ON WAGE PROTECTION FOR WORKERS USING DIGITAL TECHNOLOGIES:

Overview of Wage Protection for Workers Using Digital Technologies:

Concept and Legal Nature of Workers Using Digital Technologies:

At present, the term "workers using digital technologies" has not yet developed into a unified legal concept. Research on this category of workers has primarily evolved within the frameworks of platform work and the gig economy. In De Stefano's influential approach, work performed through digital platforms is divided into two common forms: "crowdwork" and "work-on-demand via apps". Despite differences in the organization and location of work, De Stefano argues that these activities should be fully recognized as "work" and brought within the scope of concern and

[6] Adrian Todolí-Signes, Cambios normativos en la Digitalización del Trabajo: Comentario a la "Ley Rider" y los derechos de información sobre los algoritmos, *IUSLabor,* no. 2, 28-65, 2021, https://papers.ssrn.com/sol3/papers.cfm?abstract_id=3884805

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protection of labour law.[7] The ILO (2021) uses the term "digital labour platforms" and classifies them into two main categories: (i) "online web-based platforms", where workers perform tasks online or remotely, (ii) "location-based platforms", where work is carried out in person at a specific physical location, typically in passenger transport, delivery services, and household services.[8]

Research by the Joint Research Centre (JRC) indicates that algorithmic management is no longer confined to purely platform-based work models but is increasingly expanding into traditional workplaces, particularly in logistics, warehousing, delivery services, and highly digitalized service sectors. According to the JRC, algorithmic systems are capable of assigning work shifts, communicating work instructions, monitoring and evaluating performance, as well as supporting decisions concerning rewards, sanctions, and disciplinary measures[9]. This suggests that the concept of "platform work" does not fully capture the range of workers affected by digital technologies, because a segment of workers remain engaged in traditional employment relationships while the organization, management, and evaluation of their work are increasingly carried out through applications, data, and algorithms.

In terms of legal nature, workers using digital technologies do not constitute an entirely new category of labour subject[10], but remain workers within an employment relationship, with their distinctive feature lying in the fact that digital technologies have become an important means of organizing, performing, and managing the

[7] Valerio De Stefano, The Rise of the "Just-in-Time Workforce": On-Demand Work, Crowd Work and Labour Protection in the "Gig-Economy", *Comparative Labor Law & Policy Journal, Forthcoming*, Bocconi Legal Studies Research Paper No. 2682602, 1-51 (2015), https://papers.ssrn.com/sol3/papers.cfm?abstract_id=2682602

[8] International Labour Organization, *World Employment and Social Outlook 2021: The Role of Digital Labour Platforms in Transforming the World of Work*. Geneva: ILO, 2021. https://www.ilo.org/publications/flagship-reports/role-digital-labour-platforms-transforming-world-work

[9] Baiocco, S. and Fernandez Macias, E., The algorithmic management of work: A basic compass, *European Commission, Joint Research Centre*, JRC129819, 2022, https://publications.jrc.ec.europa.eu/repository/handle/JRC129819

[10] Saskia Montebovi, Accommodating platform workas a new form of work in Dutchsocial security law: New work, same rules? *International Social Security Review*, Vol 74, Issue 3-4, 61-83 (2021), https://doi.org/10.1111/issr.12278

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labour process[11]. Accordingly, for the purposes of this study, a worker using digital technologies is understood as a person who performs paid work and is subject to the management, direction, or supervision of an employer, where task allocation, activity monitoring, performance evaluation, or decisions relating to working conditions and income are carried out to a significant extent through digital platforms, software, data, or algorithmic systems, regardless of whether the work is performed on a digital platform or within a traditional enterprise[12].

Concept and Characteristics of Wage Protection for Workers Using Digital Technologies:

Wage protection is understood as the body of legal safeguards designed to ensure that workers receive, in full, on time, and transparently, the wages to which they are entitled, while also restricting unlawful deductions, delays, or refusals of payment. Vietnamese labour law currently provides such protection primarily through minimum wage standards, the principle of full and timely payment of wages, transparency requirements concerning wage payment and deductions, wage regimes applicable to overtime work, night work, and work stoppages, as well as enforcement mechanisms applicable where wage payment obligations are violated.

In the digital work environment, wage protection exhibits a number of distinctive characteristics due to the flexible nature of work models that depend on digital technologies. Workers' income is often calculated on the basis of the volume of successfully completed deliveries rather than working time, resulting in various forms of "invisible labour," such as waiting for work, searching for tasks, maintaining account rankings, or dealing with technical errors, remaining unpaid[13].

[11] Nicola Countouris, Valerio De Stefano, 'Not the usual gig': The personal scope(s) of application of Directive 2024/2831 on improving working conditions in platform work, *European Labour Law Journal*, Vol 16, Issue 4, 432-451 (2025), https://doi.org/10.1177/20319525251375028
[12] Mohammad Hossein Jarrahi, et al., Algorithmic management in a work context, *Big Data & Society*, Vol 8, Issue 2, 1-14 (2021), https://doi.org/10.1177/20539517211020332
[13] David Mangan, Karol Muszyński, Valeria Pulignano, The platform discount: Addressing unpaid work as a structural feature of labour platforms, *European Labour Law Journal*, Vol 14, Issue 4, 541-569 (2023), https://doi.org/10.1177/20319525231210550

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At the same time, the effective exercise and protection of the right to remuneration increasingly depend on the degree of transparency and access to information concerning algorithms, data, and platform evaluation mechanisms. This is particularly significant where automated systems may participate in work allocation, worker evaluation, and the making or support of decisions that directly affect income, including decisions to withhold payment for completed work[14]. Therefore, the effectiveness of wage protection in the digital environment is increasingly linked to the transparency of management systems, the right of access to relevant information and data, the explainability of automated decisions, and mechanisms enabling workers to request human review of decisions affecting their income.

The survey of 270 gig workers in Hanoi conducted by the Institute of Labour Science and Social Affairs (ILSSA) and the Hanns Seidel Foundation found that workers received, on average, approximately 75.7% of the income generated from each transaction after deductions; the deduction rate was approximately 29% for ride-hailing drivers and 26.7% for delivery workers[15]. Although these figures do not directly reflect wage disputes, they indicate that workers' net income may be significantly affected by revenue-sharing mechanisms and the costs associated with the platform-based work model. Accordingly, wage protection for workers using digital technologies should encompass not only the obligation to make full and timely payment, but also transparency in the methods used to determine income, deductions, and algorithmic decisions, the right of access to relevant data, and effective complaint and review mechanisms for technology-driven decisions that affect the right to remuneration.

[14] Michael Veale, Michael 'Six' Silberman, Reuben Binns, Fortifying the algorithmic management provisions in the proposed Platform Work Directive, *European Labour Law Journal*, Vol 14, Issue 2, 308-332 (2023), https://doi.org/10.1177/20319525231167983

[15] Bui, Ton Hien , et al., Một số vấn đề về việc làm trong nền kinh tế việc làm tự do (nền kinh tế Gig) tại Việt Nam: Nghiên cứu trường hợp lái xe/giao hàng công nghệ và giúp việc gia đình [Employment issues of the Gig economy in Vietnam: Case study of ride hailing/delivery service and domestic service workers], *Hanns Seidel Foundation* (2022), https://southeastasia.hss.de/publications/employment-issues-of-the-gig-economy-in-vietnam-case-study-of-ride-hailingdelivery-service-and-domestic-service-workers-pub2289/

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Significance of Wage Protection for Workers Using Digital Technologies:

Wage protection for workers using digital technologies not only safeguards their economic rights and interests but also contributes to the stability of employment relationships, the protection of social security, and the sustainable development of the labour market in the digital economy.

First, wage protection contributes to safeguarding workers' livelihoods and their capacity to reproduce their labour power. Maintaining a minimum wage and ensuring full payment enable workers to meet the essential needs of themselves and their families[16]. At the same time, the consistent application of wage standards also limits the ability of enterprises or digital platforms to gain a competitive advantage by reducing labour costs through non-compliance with worker protection standards[17].

Second, wage protection contributes to ensuring income security and reducing the precariousness of work in the digital environment. For workers whose income depends on the number of tasks performed, time spent working, or decisions made by algorithmic systems, earnings may be affected by waiting time, restricted access to work opportunities, account suspension, or other automated decisions. Wage protection mechanisms therefore play an important role in mitigating the risk of income loss and increasing economic insecurity, thereby strengthening workers' resilience to fluctuations in the digital labour market[18].

Third, wage protection contributes to ensuring the effective realization of labour rights in the digital environment. As technologies and algorithms increasingly participate in work allocation, the recording of working time, performance

[16] José António Pereirinha, Elvira Pereira, Living wages in Portugal: In search of dignity in apolarised labour market, *Social Policy & Administration*, Vol 57, Issue 4, 481-496 (2022), https://doi.org/10.1111/spol.12887
[17] Sandra Fredman, et al., Fair Work for Platform Workers: Lessons from the EU Directive and Beyond, *Industrial Law Journal*, Volume 54, Issue 3, 425-457 (2025), https://doi.org/10.1093/indlaw/dwaf018
[18] Valeria Cirillo, Dario Guarascio, Zachary Parolin, Platform work and economic insecurity in Italy, *Structural Change and Economic Dynamics*, Vol 65, 126-138 (2023), https://doi.org/10.1016/j.strueco.2023.02.011

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evaluation, the calculation of bonuses, deductions, and income payments, the right to remuneration depends not only on wage regulations but also on the transparency and controllability of technological mechanisms that affect workers' income. Accordingly, wage protection also serves to prevent organizational models or digital technologies from being used to undermine the minimum protection standards established by labour law.

Spanish Law on Wage Protection for Workers Using Digital Technologies:

Against the backdrop of the rapid expansion of the platform economy and the increasingly significant role of algorithmic management in the organization of work, Spain has developed a legal framework aimed at adapting the traditional safeguards of labour law to the digital work environment. A prominent example is *Real Decreto-ley 9/2021* of 11 May 2021, whose core provisions, following parliamentary validation, were subsequently enacted through *Ley 12/2021* of 28 September 2021, commonly referred to as the *Ley Rider*. This framework is based on two principal mechanisms: a presumption of the existence of an employment relationship for delivery workers operating through digital platforms and enhanced access by workers' representatives to information concerning algorithmic management[19].

Under the Twenty-third Additional Provision (*Disposición adicional vigesimotercera*) of the *Estatuto de los Trabajadores*[20], the remunerated provision of services involving the delivery or distribution of consumer products or goods through digital platforms is presumed to fall within the scope of an employment relationship where the undertaking exercises the employer's powers of organization, direction, and control, whether directly, indirectly, or implicitly, through algorithmic management of the service or working conditions. This mechanism is generally interpreted as an *iuris*

[19] Martí López-Andreu, Oriol Barranco, 'A Legal Whack-a-Mole'. Escaping the Rider Law in Spain:Platform Strategies and the Hollowing of EnforcementUnder Platform Capitalism, *New Technology, Work and Employment*, 1-12 (2026), https://doi.org/10.1111/ntwe.70043

[20] Spain. Real Decreto Legislativo 2/2015, *De 23 de octubre, por el que se aprueba el texto refundido de la Ley del Estatuto de los Trabajadores*. B.O.E. No. 255, Oct. 24, 2015, Disposición adicional vigesimotercera, https://www.boe.es/buscar/act.php?id=BOE-A-2015-11430

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tantum presumption, thereby reducing the burden on service providers to prove the existence of an employment relationship and placing the platform in the position of having to produce evidence rebutting the presumption once its applicable conditions have been established[21]. However, the scope of this presumption remains limited to the delivery or distribution of goods through digital platforms and does not extend to all forms of platform work. Workers' representatives are entitled to receive information from the undertaking regarding the parameters, rules, and instructions underlying algorithms or artificial intelligence systems used in decisions that may affect working conditions, access to employment, and the maintenance of employment, including profiling activities[22].

The establishment of worker status has direct implications for wage protection because, once such status is recognized, the worker falls within the scope of the wage protection framework established by the *Estatuto de los Trabajadores*. Article 26 defines wages broadly as monetary or in-kind remuneration paid in exchange for the provision of labour services, irrespective of the form of remuneration, while distinguishing wages from expense reimbursements and non-wage payments. Accordingly, bonuses, allowances, or performance-related payments determined with the assistance of algorithms may qualify as components of wages where, in substance, they constitute consideration for the performance of work, rather than merely because they are generated or calculated by an algorithmic system[23]. Article 27 establishes the statutory minimum interprofessional wage (*salario mínimo interprofesional – SMI*), determined annually by the Government, thereby providing a minimum level of income protection for workers. The assessment of actual wages must nevertheless comply with the Spanish rules governing wage structure, overall

[21] Jesús Lahera Forteza, Valeriano Gómez Sánchez, Labor Regulation in Spain of Digital Platforms: Present and future. *Journal of Labor and Social Security Legal Studies*, *7*, 36-55 (2023), https://doi.org/10.24310/rejlss7202317079

[22] Nastazja Potocka-Sionek, Managing the algorithms. The case of platform work, *LABOS Revista de Derecho del Trabajo y Protección Social*, *5*, 47-67, https://doi.org/10.20318/labos.2024.9031

[23] Miguel Ángel Gómez Salado, La ordenación del salario y su dimensión garantista: Viejas y nuevas cuestiones en torno a la prestación salarial en España, *Revista Internacional De Doctrina Y Jurisprudencia,* 34, 53-106 (2025), *https://doi.org/10.25115/ridj.vi34.10647*

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and annual calculation, and the mechanisms of wage offsetting and absorption. Article 28 further guarantees the principle of equal remuneration for work of equal value without discrimination on grounds of sex and requires undertakings to maintain a wage register, thereby providing an additional legal basis for scrutinizing wage disparities that may arise where evaluation criteria or income allocation mechanisms are automated. Article 29 requires wages to be paid on time and with appropriate documentation, stipulates that the payment period for regular and periodic remuneration may not exceed one month, and requires payslips to clearly and separately indicate earnings and deductions. However, this provision does not directly require payslips to disclose the logic or parameters of algorithms; where algorithms affect the determination of working conditions or factors related to income, the wage documentation requirement should therefore be considered in conjunction with the right to information on algorithmic management under Article 64.4(d).

Spanish law also protects the recoverability of wages where the employer becomes insolvent or enters insolvency proceedings through the guarantee mechanism provided by the *Fondo de Garantía Salarial* (FOGASA)[24]. Spanish law safeguards wage recovery through preferential treatment of wage claims and the *Fondo de Garantía Salarial*. Under Article 32 of the *Estatuto de los Trabajadores*, certain wage claims enjoy a special priority over other financial obligations of the employer; at the same time, Article 33 allows FOGASA, within the statutory limits, to pay outstanding wages where the employer is insolvent or bankrupt. Although these are general protective mechanisms under labour law, they also apply to workers in the digital work environment once their relationship is legally classified as an employment relationship, thereby ensuring the possibility of recovering wages even when the employer experiences financial difficulties.

[24] Remedios Ramón Dangla, Reforma económica laboral vs. coyuntura económica: El impacto del fondo de garantía salarial sobre las finanzas españolas, *Revista Finanzas Y Política Económica*, *11*(1), 85-100 (2019), https://doi.org/10.14718/revfinanzpolitecon.2019.11.1.6

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From the perspective of wage protection in the digital work environment, a particularly significant feature of the Spanish model lies in the connection between traditional wage safeguards and mechanisms for transparency in algorithmic management. Algorithms may be involved in task allocation, determining access to work opportunities, performance evaluation, ranking, or the calculation of variable components of income; consequently, such decisions may directly or indirectly affect workers' earnings. The Spanish Ministry of Labour and Social Economy has also acknowledged that employers increasingly use algorithms and artificial intelligence systems to make automated decisions affecting workers, including decisions relating to recruitment, work scheduling, performance evaluation, and productivity monitoring; in this context, the law imposes information obligations intended to enable workers and their representatives to identify and exercise oversight over the use of such systems[25]. Against this background, the right of workers' representatives to access information concerning the parameters, rules, and instructions underlying algorithms under Article 64.4(d) may be regarded as a mechanism supporting the effective enforcement of wage rights, as it reduces information asymmetries and facilitates scrutiny of technology-driven decisions that may affect workers' income. It should, however, be distinguished that the *Ley Rider* does not directly establish for each individual worker a comprehensive right to obtain an explanation of, or to request human review of, every algorithmic decision; rather, the provision primarily establishes a right to information at the level of workers' representatives. The Spanish experience demonstrates that wage protection in the digital work environment depends not only on minimum wage standards, wage structures, and payment guarantee mechanisms, but is also increasingly linked to the ability to identify and exercise oversight over technological mechanisms that affect the allocation of work and the determination of income.

[25] Lefebvre. *Guía práctica y herramienta sobre la obligación empresarial de información algorítmica en el ámbito laboral*. 13 June 2022, https://expertorrhh.lefebvre.es/guia-practica-y-herramienta-sobre-la-obligacion-empresarial-de-informacion-algoritmica-en-el-ambito-laboral/

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Vietnamese Law on Wage Protection for Workers Using Digital Technologies:

Vietnamese law has established a relatively comprehensive system of wage safeguards for workers falling within the scope of an employment relationship. The Labour Code No. 45/2019/QH14, requires employers to pay wages directly, in full, and on time, and prohibits them from restricting workers' right to dispose of their wages; it also regulates the basis, methods, and payment periods for wages, the obligation to provide wage statements, remuneration for overtime work, night work, and work stoppages, as well as limitations on wage deductions. Notably, each time wages are paid, the employer must provide a wage statement specifying the worker's wages, overtime pay, night-work pay, and the content and amount of any deductions, thereby providing a basis for workers to verify the income actually paid to them.

Decree No. 145/2020/ND-CP further specifies a number of relevant matters, including methods for calculating remuneration for overtime and night work, while Decree No. 293/2025/ND-CP prescribes monthly and hourly minimum wage levels applicable from 1 January 2026 to workers employed under employment contracts. Article 17 of Decree No. 12/2022/ND-CP establishes sanctions for wage-related violations, including late or incomplete payment of wages, payment below the statutory minimum wage, and unlawful wage deductions and, where prescribed by law, requires employers to pay the outstanding amount together with accrued interest. In principle, these provisions also apply to workers using digital technologies in the course of their work, because Vietnamese law does not currently establish a separate wage regime based on the technological means used to organize work.

For platform workers, a more complex issue concerns whether the relationship between the service provider and the platform constitutes an employment relationship. Clause 1, Article 3 of the 2019 Labour Code defines an employee as a person who works under an agreement, is paid wages, and is subject to the management, direction, and supervision of an employer; at the same time, Article 13

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provides that an agreement, regardless of its title, shall still be regarded as an employment contract where its substance reflects paid work, wages, and the management, direction, and supervision of one party. This substance-based approach provides a legal basis for reassessing relationships established under the labels of cooperation agreements, service contracts, or other arrangements where, in practice, the characteristics of an employment relationship are present. In the digital work environment, the degree of control exercised through task-allocation systems, activity monitoring, performance evaluation, or automated management tools may constitute relevant factual elements when assessing the existence of management, direction, and supervision[26]. However, unlike Spanish law, Vietnamese labour law has not yet established a specific presumption of employment for platform workers or expressly recognized algorithmic management as a form through which the employer's managerial authority may be exercised.

Alongside traditional labour law, Vietnam's legal framework has recently begun to regulate certain aspects of technology-based labour management. The 2025 Law on Personal Data Protection contains specific provisions on data protection in the recruitment, management, and employment of workers; accordingly, the collection of workers' personal data through technological or technical means may only be carried out in compliance with the law, with due regard for the rights and interests of data subjects, and on the basis that workers are clearly informed of the measures being applied. The 2025 Law on Artificial Intelligence further establishes principles concerning human oversight and the ability to intervene, fairness, transparency, non-discrimination, and accountability for the decisions and consequences of artificial intelligence systems[27]; for high-risk systems, the law also imposes certain

[26] Phan Thi Thanh Huyen, Quản lý lao động bằng thuật toán trong bối cảnh chuyển đổi số: Những vấn đề pháp lý đặt ra và kiến nghị hoàn thiện pháp luật [Algorithmic Labor Management in the Context of Digital Transformation: Emerging Legal Issues and Recommendations for Legal Reform], *Tạp chí Pháp luật và Phát triển [Journal Law & Development]*, 01 July 2026, https://phapluatphattrien.vn/quan-ly-lao-dong-bang-thuat-toan-trong-boi-canh-chuyen-doi-so-nhung-van-de-phap-ly-dat-ra-va-kien-nghi-hoan-thien-phap-luat-d6082.html

[27] Van Thi Hong Nhung, Trách nhiệm giải trình về các quyết định và hệ quả của hệ thống trí tuệ nhân tạo theo Luật Trí tuệ nhân tạo Việt Nam năm 2025 [Accountability for the Decisions and Consequences

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information-provision obligations toward users and affected persons. These provisions indicate that Vietnamese law has begun to develop general safeguards governing the use of technology in the management of individuals. However, they have not yet formed a specialized labour-law mechanism for transparency in algorithmic management. In particular, the law does not specifically require disclosure of the parameters or criteria used for work allocation, performance evaluation, or the determination of income components, nor does it establish a specific right for workers to request an explanation and review of automated decisions that adversely affect their wages.

Recent evidence from Vietnam indicates that platform workers' income is significantly affected by working time and the costs that workers themselves must bear. According to a survey of 470 ride-hailing drivers conducted by the Ho Chi Minh City Institute for Development Studies (HIDS), published and used in policy research during the 2024–2025 period, drivers worked an average of approximately 8.8 hours per day and 25.4 days per month, while earning an average income of only around VND 8.7 million per month; nearly 20% of respondents worked as many as 30 days per month. Notably, fuel constituted one of the largest operating expenses, averaging approximately VND 70,600 per day and reaching up to VND 100,000 per day, equivalent to nearly 20% of the income remaining after fees paid to the platform company had been deducted. In addition, vehicle repair and maintenance costs amounted to approximately VND 3.08 million per year. These data demonstrate that the adequacy of income protection for platform workers cannot be assessed solely on the basis of gross revenue or nominal remuneration from completed rides, but must also take into account actual working time, waiting time, and the necessary costs incurred in generating that income.[28]

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of Artificial Intelligence Systems under Vietnam's 2025 Law on Artificial Intelligence], *Tạp Chí Khoa học Pháp Lý Việt Nam [Vietnamese Journal of Legal Sciences]*, *201*(05), 52-61 (2026), https://doi.org/10.70236/khplvn.659

[28] Ha Mai, Trung bình mỗi tháng kiếm 8,7 triệu, tài xế công nghệ có đủ tiền đổi xe điện? [Earning an Average of VND 8.7 Million per Month, Can Ride-Hailing Drivers Afford to Switch to Electric Vehicles?], *BaoThanhnien*, 17 July 2025,

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At the same time, the ILO's research on the pilot measurement of digital platform employment in Vietnam indicates that identifying this category of workers remains challenging due to the limited sample coverage, short reference period, and the risk of misclassification[29]. These findings suggest that wage protection in the digital work environment depends not only on the existence of standards concerning minimum wages, payment deadlines, and wage deductions, but also on the ability to correctly identify employment relationships and to oversee technological mechanisms that affect access to work opportunities and the process through which income is generated.

Accordingly, it may be concluded that Vietnamese law has established a significant foundation for protecting the wages of workers using digital technologies through the combination of safeguards under the Labour Code and newer regulations on personal data and artificial intelligence. However, when considered against the specific characteristics of digital labour management, the current legal framework remains fragmented and lacks specialized labour-law rules on algorithmic management. In particular, the law does not clearly establish transparency obligations concerning technological criteria that affect work allocation, performance evaluation, and income determination, nor does it provide mechanisms enabling workers to access relevant information, request explanations, and seek review of automated decisions that have a significant impact on their wage-related rights and interests. This regulatory gap means that the effectiveness of traditional wage safeguards increasingly depends on the ability to scrutinize and control the technological mechanisms underlying the organization and evaluation of work.

GAPS AND LIMITATIONS OF VIETNAMESE LAW IN PROTECTING THE WAGES OF WORKERS USING DIGITAL TECHNOLOGIES:

https://thanhnien.vn/trung-binh-moi-thang-kiem-87-trieu-tai-xe-cong-nghe-co-du-tien-doi-xe-dien-185250717163703882.htm

[29] Ian Nicole Generalao, Research brief: Measuring digital platform employment in Viet Nam: Lessons learned from the pilot survey, *International Labour Organization*, 2 July 2025, https://www.ilo.org/publications/research-brief-measuring-digital-platform-employment-viet-nam-lessons

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The most significant gap in Vietnamese law concerning wage protection for workers using digital technologies lies in the absence of a clear mechanism for identifying employment relationships in the digital work environment. Although the 2019 Labour Code adopts a substance-based approach to determining employment relationships, the criteria of management, direction, and supervision remain largely grounded in traditional forms of direct managerial control and do not yet fully encompass algorithmic forms of control. At the same time, the law has not established a presumption of employment, leaving the burden of proof on workers even though the relevant data and algorithms are controlled by digital platforms. Together with weaknesses in enforcement mechanisms and the absence of effective collective protection tools, these limitations have left many platform workers in a "legal grey area" where they are not fully protected by labour law.

At present, Vietnamese law does not impose obligations concerning transparency in algorithmic pricing, recognize workers' rights to obtain explanations of and challenge automated decisions affecting their income, establish mechanisms for controlling dynamic pricing, or set limits on deductions, fees, and financial penalties imposed by platforms. Meanwhile, workers' income increasingly depends on algorithmic systems used to allocate work, evaluate performance, and determine remuneration. This regulatory gap increases the risk that workers may experience reductions in income, restricted access to work opportunities, or opaque deductions without access to effective protection mechanisms.

Algorithms may personalize remuneration, thereby increasing income disparities among workers performing the same type of work, while also creating information asymmetries where workers do not clearly understand how prices, bonuses, or deductions are calculated. In addition, express delivery companies that integrate digital technologies into their labour processes often use measures such as lowering performance ratings, restricting order allocation, suspending accounts, or changing delivery routes in place of traditional forms of labour discipline, without being

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subject to adequate control under labour law. Moreover, a substantial proportion of the time spent waiting for delivery assignments is not remunerated, significantly reducing workers' actual income. These issues indicate that Vietnamese law not only lacks specialized rules on algorithmic management but also lacks mechanisms for interpreting and applying the law in a manner that adequately reflects the distinctive characteristics of the digital work environment.

SOME LESSONS AND POLICY IMPLICATIONS FOR VIETNAM:

Drawing on Spain's experience, Vietnam may consider and adapt several legal reform measures along the following directions:

First, improve the mechanisms for identifying and presuming the existence of employment relationships in the digital work environment. Vietnam should supplement the criteria for determining an employment relationship by taking into account the degree of organizational, managerial, and economic dependency, including forms of algorithmic control. At the same time, consideration should be given to introducing a presumption of employment in highly digitalized sectors such as logistics in order to reduce the evidentiary burden placed on workers.

Second, institutionalize the principles of algorithmic transparency and the right to explanation. The law should require enterprises to disclose the basic criteria underlying algorithmic management systems and ensure that workers have access to information relevant to the calculation of wages and bonuses and to performance evaluation. It should also recognize workers' rights to request explanations of and lodge complaints against automated decisions that affect their income or employment opportunities.

Third, establish wage protection mechanisms tailored to the specific characteristics of work involving digital technologies. The law should clearly determine that remuneration, bonuses, and deductions established or calculated through technological systems fall within the scope of labour law; strengthen oversight of fees and commissions imposed by enterprises; and consider mechanisms to guarantee

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wage payments where an enterprise becomes insolvent or exits the market. Such measures would contribute to ensuring a minimum level of income protection and promoting the sustainable development of the digital labour market.

CONCLUSION:

The protection of wages for workers using digital technologies is creating new challenges for traditional labour law, as income, employment opportunities, and working conditions are increasingly shaped by algorithmic management systems. Spain's experience demonstrates that the law needs to adapt to this reality through two core instruments: the presumption of an employment relationship and algorithmic transparency. In Vietnam, several legal gaps can be identified, including the absence of clear mechanisms for determining employment relationships in the digital work environment, the lack of rules on algorithmic transparency and the right to explanation, limitations in enforcement and collective representation mechanisms, and the absence of specialized provisions on wage protection under algorithmic management models. Based on the principle that the substance of an employment relationship should prevail over its formal characterization, and in line with the development orientation of the digital economy under Resolution No. 57-NQ/TW, Vietnam should reform its legal framework by establishing mechanisms for identifying and presuming employment relationships, introducing obligations of algorithmic transparency and the right to explanation, strengthening enforcement and collective representation mechanisms, and developing wage protection rules tailored to this specific category of workers.

REFERENCES:

1. Cesira Urzi Brancati, Platform work: Algorithmic management (30 May 2025), https://www.eurofound.europa.eu/en/publications/all/platform-work-algorithmic-management , accessed 20 August 2026.
2. International Labour Organization, World Employment and Social Outlook: Trends 2025 (16 January 2025),

© 2026. LEX LUMEN RESEARCH JOURNAL

https://www.ilo.org/publications/flagship-reports/world-employment-and-social-outlook-trends-2025 , accessed 20 August 2026.

3. Nguyen Ngoc Kieu Trinh, Lam To Trang, Quan hệ hợp đồng giữa doanh nghiệp logistics và người giao hàng [Contractual relationship between logistics enterprises anddelivery workers], *Tạp chí Khoa học Đại học Mở Thành phố Hồ Chí Minh - Khoa học xã hội [Ho Chi Minh City Open University Journal of Science - Social Sciences]*, 21(2), 49-61 (2026). https://doi.org/10.46223/HCMCOUJS.soci.vi.21.2.5139.2026
4. Veena Dubal, On algorithmic wage discrimination, *Columbia Law Review*, Vol 123, No 7, 1929-1992 (2023), https://columbialawreview.org/content/on-algorithmic-wage-discrimination/
5. Adrian Todolí-Signes, Cambios normativos en la Digitalización del Trabajo: Comentario a la "Ley Rider" y los derechos de información sobre los algoritmos, *IUSLabor*, no. 2, 28-65 (2021), https://papers.ssrn.com/sol3/papers.cfm?abstract_id=3884805
6. Valerio De Stefano, The Rise of the "Just-in-Time Workforce": On-Demand Work, Crowd Work and Labour Protection in the "Gig-Economy", *Comparative Labor Law & Policy Journal, Forthcoming*, Bocconi Legal Studies Research Paper No. 2682602, 1-51 (2015), https://papers.ssrn.com/sol3/papers.cfm?abstract_id=2682602
7. International Labour Organization, World Employment and Social Outlook 2021: The Role of Digital Labour Platforms in Transforming the World of Work. *Geneva: ILO* (2021), https://www.ilo.org/publications/flagship-reports/role-digital-labour-platforms-transforming-world-work
8. Baiocco, S. and Fernandez Macias, E., The algorithmic management of work: A basic compass, European Commission, *Joint Research Centre*, JRC129819 (2022), https://publications.jrc.ec.europa.eu/repository/handle/JRC129819

© 2026. LEX LUMEN RESEARCH JOURNAL

9. Saskia Montebovi, Accommodating platform workas a new form of work in Dutchsocial security law: New work, same rules? *International Social Security Review*, Vol 74, Issue 3-4, 61-83 (2021), https://doi.org/10.1111/issr.12278
10. Nicola Countouris, Valerio De Stefano, 'Not the usual gig': The personal scope(s) of application of Directive 2024/2831 on improving working conditions in platform work, *European Labour Law Journal*, Vol 16, Issue 4, 432-451 (2025), https://doi.org/10.1177/20319525251375028
11. Mohammad Hossein Jarrahi, et al., Algorithmic management in a work context, *Big Data & Society,* Vol 8, Issue 2, 1-14 (2021), https://doi.org/10.1177/20539517211020332
12. David Mangan, Karol Muszyński, Valeria Pulignano, The platform discount: Addressing unpaid work as a structural feature of labour platforms, *European Labour Law Journal*, Vol 14, Issue 4, 541-569 (2023), https://doi.org/10.1177/20319525231210550
13. Michael Veale, Michael 'Six' Silberman, Reuben Binns, Fortifying the algorithmic management provisions in the proposed Platform Work Directive, *European Labour Law Journal,* Vol 14, Issue 2, 308-332 (2023), https://doi.org/10.1177/20319525231167983
14. Bui, Ton Hien , et al., Một số vấn đề về việc làm trong nền kinh tế việc làm tự do (nền kinh tế Gig) tại Việt Nam: Nghiên cứu trường hợp lái xe/giao hàng công nghệ và giúp việc gia đình [Employment issues of the Gig economy in Vietnam: Case study of ride hailing/delivery service and domestic service workers], *Hanns Seidel Foundation* (2022), https://southeastasia.hss.de/publications/employment-issues-of-the-gig-economy-in-vietnam-case-study-of-ride-hailingdelivery-service-and-domestic-service-workers-pub2289/
15. José António Pereirinha, Elvira Pereira, Living wages in Portugal: In search of dignity in apolarised labour market, *Social Policy & Administration*, Vol 57, Issue 4, 481-496 (2022), https://doi.org/10.1111/spol.12887

© 2026. LEX LUMEN RESEARCH JOURNAL

16. Sandra Fredman, et al., Fair Work for Platform Workers: Lessons from the EU Directive and Beyond, *Industrial Law Journal*, Volume 54, Issue 3, 425-457 (2025), https://doi.org/10.1093/indlaw/dwaf018
17. Valeria Cirillo, Dario Guarascio, Zachary Parolin, Platform work and economic insecurity in Italy, *Structural Change and Economic Dynamics*, Vol 65, 126-138 (2023), https://doi.org/10.1016/j.strueco.2023.02.011
18. Martí López‐Andreu, Oriol Barranco, 'A Legal Whack‐a‐Mole'. Escaping the Rider Law in Spain:Platform Strategies and the Hollowing of EnforcementUnder Platform Capitalism, *New Technology, Work and Employment*, 1-12 (2026), https://doi.org/10.1111/ntwe.70043
19. Spain. Real Decreto Legislativo 2/2015, De 23 de octubre, por el que se aprueba el texto refundido de la Ley del Estatuto de los Trabajadores. B.O.E. No. 255, Oct. 24, 2015, Disposición adicional vigesimotercera, https://www.boe.es/buscar/act.php?id=BOE-A-2015-11430
20. Jesús Lahera Forteza, Valeriano Gómez Sánchez, Labor Regulation in Spain of Digital Platforms: Present and future, *Journal of Labor and Social Security Legal Studies*, 7, 36-55 (2023), https://doi.org/10.24310/rejlss7202317079
21. Nastazja Potocka-Sionek, Managing the algorithms. The case of platform work, *LABOS Revista de Derecho del Trabajo y Protección Social*, 5, 47-67, https://doi.org/10.20318/labos.2024.9031
22. Miguel Ángel Gómez Salado, La ordenación del salario y su dimensión garantista: Viejas y nuevas cuestiones en torno a la prestación salarial en España, *Revista Internacional De Doctrina Y Jurisprudencia*, 34, 53-106 (2025), https://doi.org/10.25115/ridj.vi34.10647
23. Remedios Ramón Dangla, Reforma económica laboral vs. coyuntura económica: El impacto del fondo de garantía salarial sobre las finanzas españolas, *Revista Finanzas Y Política Económica*, 11(1), 85-100 (2019), https://doi.org/10.14718/revfinanzpolitecon.2019.11.1.6

© 2026. LEX LUMEN RESEARCH JOURNAL

24. Lefebvre. Guía práctica y herramienta sobre la obligación empresarial de información algorítmica en el ámbito laboral. 13 June 2022, https://expertorrhh.lefebvre.es/guia-practica-y-herramienta-sobre-la-obligacion-empresarial-de-informacion-algoritmica-en-el-ambito-laboral/
25. Phan Thi Thanh Huyen, Quản lý lao động bằng thuật toán trong bối cảnh chuyển đổi số: Những vấn đề pháp lý đặt ra và kiến nghị hoàn thiện pháp luật [Algorithmic Labor Management in the Context of Digital Transformation: Emerging Legal Issues and Recommendations for Legal Reform], *Tạp chí Pháp luật và Phát triển [Journal Law & Development]*, 01 July 2026, https://phapluatphattrien.vn/quan-ly-lao-dong-bang-thuat-toan-trong-boi-canh-chuyen-doi-so-nhung-van-de-phap-ly-dat-ra-va-kien-nghi-hoan-thien-phap-luat-d6082.html
26. Van Thi Hong Nhung, Trách nhiệm giải trình về các quyết định và hệ quả của hệ thống trí tuệ nhân tạo theo Luật Trí tuệ nhân tạo Việt Nam năm 2025 [Accountability for the Decisions and Consequences of Artificial Intelligence Systems under Vietnam's 2025 Law on Artificial Intelligence], *Tạp Chí Khoa học Pháp Lý Việt Nam [Vietnamese Journal of Legal Sciences]*, 201(05), 52-61 (2026), https://doi.org/10.70236/khplvn.659
27. Ha Mai, Trung bình mỗi tháng kiếm 8,7 triệu, tài xế công nghệ có đủ tiền đổi xe điện? [Earning an Average of VND 8.7 Million per Month, Can Ride-Hailing Drivers Afford to Switch to Electric Vehicles?], *BaoThanhnien*, 17 July 2025, https://thanhnien.vn/trung-binh-moi-thang-kiem-87-trieu-tai-xe-cong-nghe-co-du-tien-doi-xe-dien-185250717163703882.htm
28. Ian Nicole Generalao, Research brief: Measuring digital platform employment in Viet Nam: Lessons learned from the pilot survey, *International Labour Organization*, 2 July 2025, https://www.ilo.org/publications/research-brief-measuring-digital-platform-employment-viet-nam-lessons

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