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Research Article

REGULATIONS ON EMISSIONS TRADING SYSTEM AND CARBON TAX: EXPERIENCES FROM CHINESE LAW AND LESSONS FOR VIETNAM

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ABSTRACT

Background: *The defining challenge of the 21st century is climate change, which has necessitated countries to incorporate financial instruments ranging from carbon tax to the Emissions Trading System (ETS) for emission abatement. China, the world's biggest CO2 emitter, has implemented an Environmental Protection Tax (EPT) since 2018 and launched a national ETS in 2021. Vietnam, committed to Net Zero by 2050 and currently developing its carbon market, faces significant challenges in strengthening its financial and legal regulations.*

Methods: *This article integrates qualitative methodology and comparative analysis to delineate the nexus between carbon taxation and Emissions Trading Systems (ETS), concomitantly emphasising the human right to a clean environment. The qualitative approach is employed for an in-depth examination of policy, economic, and societal facets within the respective jurisdictions of China and Vietnam. In parallel, comparative analysis serves as the central framework for assessing the efficacy of these two instruments in mitigating greenhouse gas emissions, alongside exploring their potential for synergy and associated challenges.*

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Results and Conclusions: *This article seeks to answer the question: In the process of building and perfecting regulations on the emissions trading system and carbon tax, what lessons can Vietnam learn from China's experience to ensure fairness and the right to live in a clean environment?*

China's ETS currently covers approximately ≈40% of CO2 emissions, predominantly in the power sector. However, the lack of coordination between the EPT and ETS, low quota price and free allocation of allowances have discouraged investments in low-carbon technologies. Drawing on these lessons, Vietnam should consider adopting a carbon tax to replace the current Law on Environmental Protection Tax. Such legislation should incorporate reasonable provisions such as higher tax rates, flexible adjustment mechanisms, and targeted exemptions or reductions to influence consumer behaviour and reduce reliance on fossil fuels.

Furthermore, it is crucial to reform state budget management regulations concerning the utilisation of financial resources derived from carbon taxes and an Emissions Trading System (ETS). These funds should be allocated to finance environmentally friendly agricultural models, mangrove reforestation projects, and the development of irrigation systems resilient to mangrove inundation, thereby promoting environmental protection and long-term livelihood security. Concurrently, establishing a rational long-term roadmap for the development of a national carbon market is essential. This integrated approach, combining both financial instruments, will safeguard Vietnamese citizens' right to live in a clean environment and ensure compliance with the Net Zero commitment by 2050.

1 INTRODUCTION

Climate change is one of the major challenges of the 21st century as it poses significant threats to the global environment, economy and society. To achieve the objective of limiting the global temperature increase to below 2°C, as stipulated in the Paris Agreement (2015), countries are required to implement financial instruments such as carbon taxation and emissions trading systems (ETS). These instruments serve to place a price on carbon, internalise environmental externalities, and incentivise the development of low-carbon technologies.[1] China, the world's largest CO2 emitter—responsible for 30% of total global emissions in 2021—has pioneered the adoption of the Environmental Protection Tax (EPT) since 2018 and subsequently introduced its national ETS in 2021. Consequently, China provides a valuable case study for examining the coordination of these tools.[2] Meanwhile, Vietnam, with its Net Zero target by 2050 at the 26th Conference of the Parties 26 (COP26),

1 Paris Agreement under the United Nations Framework Convention on Climate Change (adoption 12 December 2015) [2016] UNTS 3156/79.

2 International Energy Agency, *Global Energy Review: CO2 Emissions in 2021* (IEA 2022) <https://www.iea.org/reports/global-energy-review-co2-emissions-in-2021-2> accessed 29 May 2025.

is building a carbon market under Decree 06/2022/ND-CP but faces challenges in terms of legal framework, monitoring technology and business awareness.[3]

The selection of China as the primary subject of this study stems not only from the country's important role in efforts to reduce global emissions but also from its considerable similarities with Vietnam in terms of legal regulations, political institutions and cultural foundations. In addition, the similarity in economic structure with the dependence on heavy industries such as coal power and cement, along with Asian cultural values that promote social stability, renders China's experience particularly relevant for Vietnam's reference. These similarities facilitate the application of lessons from China to the Vietnamese context, especially in building legal and institutional frameworks for climate change response finance instruments.

This article critically examines China's climate change finance regulations, focusing on the relationship between the Environmental Protection Tax (EPT) and the Emissions Trading System (ETS) to draw lessons for improving Vietnam's law. The analysis not only considers economic and environmental performance but also assesses four important legal aspects:

i) legal and institutional frameworks such as China's Environmental Protection Tax Law (2016)[4] and Vietnam's Environmental Protection Tax Law (2010);[5]

ii) environmental justice, with particular reference to the rights of affected communities and mechanisms for public participation;[6]

iii) human rights, notably the right to live in a clean environment in accordance with UN Resolution 48/13;[7] and

iv) comparative law, in relation to conformity with the Paris Agreement[8] and insights drawn from the EU ETS.[9]

3 Decree of Vietnam No 06/2022/ND-CP 'On Mitigation of Greenhouse Gas (GHG) Emissions and Protection of Ozone Layer' (adoption 7 January 2022) <https://thuvienphapluat.vn/van-ban/EN/Tai-nguyen-Moi-truong/Decree-06-2022-ND-CP-mitigation-of-green-house-gas-emissions/503148/tieng-anh.aspx> accessed 29 May 2025; 'Socialist Republic of Vietnam: Nationally Determined Contribution (NDC) (updated in 2022) (Vietnam NDC 2022)' (*UN Climate Change*, 9 November 2022) <https://unfccc.int/documents/622541> accessed 29 May 2025.

4 Law of the People's Republic of China 'On Environmental Protection Tax' (adoption 25 December 2016) <https://www.mee.gov.cn/ywgz/fgbz/fl/201811/t20181114_673632.shtml> accessed 29 May 2025.

5 Law of the National Assembly of Vietnam No 57/2010/QH12 'On Environmental Protection Tax' (adoption 15 November 2010) <https://thuvienphapluat.vn/van-ban/EN/Thue-Phi-Le-Phi/Law-No-57-2010-QH12-Environmental-protection-Tax/123975/tieng-anh.aspx> accessed 29 May 2025.

6 Jingbo Cui and others, 'The Effectiveness of China's Regional Carbon Market Pilots in Reducing Firm Emissions' (2021) 118(52) Proceedings of the National Academy of Sciences e2109912118. doi:10.1073/pnas.2109912118.

7 Resolution HRC No 48/13 'The Human Right to a Clean, Healthy and Sustainable Environment' (adoption 8 October 2021) <https://undocs.org/A/HRC/RES/48/13> accessed 29 May 2025.

8 Paris Agreement (n 1).

9 'EU Emissions Trading System (EU ETS)' (*ICAP International Carbon Action Partnership*, 2024) <https://icapcarbonaction.com/en/ets/eu-emissions-trading-system-eu-ets> accessed 29 May 2025.

These aspects elucidate the mechanisms through which China integrates financial instruments, as well as the inherent limitations of such integration, providing Vietnam with critical insights to avert a repeat.[10]

2 RESEARCH METHODS

This article represents the culmination of a comprehensive approach that integrates qualitative methodology with comparative analysis to elucidate the relationship between carbon taxation and Emissions Trading Systems (ETS), while also clarifying the human right to a clean environment. The qualitative method was employed for an in-depth analysis of the policy, economic, and social dimensions within the specific contexts of China and Vietnam. Concurrently, comparative analysis played a central role in assessing the efficacy of these two financial instruments in reducing greenhouse gas emissions, while also exploring their synergistic potential and inherent challenges.

The aspects explored in this research are diverse and detailed, extending beyond mere economic and environmental effectiveness to encompass critical legal and social dimensions. Accordingly, the study delved into the legal and institutional frameworks by comparing China's Environmental Protection Tax Law (2016) and Vietnam's Law on Environmental Protection Tax (2010), aiming to derive lessons on how each nation integrates financial instruments and the limitations encountered. Furthermore, the research also examined issues of environmental justice, focusing on ensuring the rights of affected communities and mechanisms for public participation in the policy-making process. The right to a clean environment was also analysed within this article. Finally, comparative law was employed to assess alignment with the Paris Agreement (2015) and draw insights from the experience of the EU ETS, thereby broadening the perspective for recommendations.

With respect to data collection and analysis, the study conducted a synthesis and analysis of various sources of information, including legal documents from China and Vietnam, as well as reports and statistics from reliable agencies. Qualitative analysis was applied to the entire data set in order to deeply explore policy, economic and social dimensions, while comparative methods were used to evaluate experiences, generate concrete, specific and relevant lessons, and recommendations for Vietnam. The case of China's national ETS serves as an illustrative example of how this methodological framework can be operationalised. The case study focuses on China's ETS as a practical reference point from which Vietnam may draw lessons in pursuit of its Net Zero 2050 objective.[11]

10 Haitao Xu and others, 'Comparing the Impacts of Carbon Tax and Carbon Emission Trading' (2023) 330 Journal of Environmental Management 117156. doi:10.1016/j.jenvman.2022.117156.

11 Vietnam NDC 2022 (n 3)

3 REGULATIONS ON THE EMISSION TRADING SYSTEM AND CARBON TAX: EXPERIENCES FROM CHINESE LAW AND LESSONS LEARNED FOR VIETNAM

3.1. Analysis of the Legal Framework and Climate Finance Institutions

3.1.1. Challenges in Developing Climate Finance Institutions in Vietnam

In Vietnam, the Law on Environmental Protection 2020 is a crucial legal document that establishes a legal framework for developing a carbon market in the country.[12] The law sets out greenhouse gas emission control principles, requires disclosure of environmental information, and encourages the use of economic tools such as carbon pricing to achieve climate goals. In particular, the Law emphasises the role of the carbon market in promoting industries to transition to green and sustainable production models.

Building on this foundation, Decree 06/2022/ND-CP[13] on reducing greenhouse gas emissions and protecting the ozone layer establishes a specific roadmap for establishing a carbon market, including plans to pilot an Emissions Trading System (ETS) by 2028.[14] The decree focuses on two main emission areas: the power sector (accounting for about 29% of Vietnam's total CO2 emissions in 2023) and the cement industry (accounting for about 15% of emissions).[15] Accordingly, the ETS will initially target large emission sources in these sectors, to control about 44% of total national emissions in its first phase. The decree also requires the establishment of a monitoring, reporting and verification (MRV) system to ensure the transparency and accuracy of emissions data, drawing on the experiences of China and the EU.[16]

Although the Law on Environmental Protection and Decree 06/2022/ND-CP are important steps, the implementation of the carbon market is still in its infancy. These regulations have laid the legal foundation, but it is necessary to supplement detailed guiding documents to ensure feasibility, particularly given Vietnam's heavy reliance on fossil energy, with coal power accounting for a significant proportion of the national emission structure.[17]

In parallel, the Law on Environmental Protection Tax (2010) is Vietnam's primary financial tool for addressing environmental pollution, covering several aspects related to greenhouse

12 Law of the National Assembly of Vietnam No 72/2020/QH14 'On Environmental Protection' (adoption 17 November 2020) <https://vanban.chinhphu.vn/?pageid=27160&docid=202613> accessed 29 May 2025.

13 Decree of Vietnam No 06/2022/ND-CP (n 3).

14 World Bank, *Vietnam Country Climate and Development Report* (World Bank Group 2022) <https://openknowledge.worldbank.org/entities/publication/29e72556-d255-5c50-a086-245c1ccc4704> accessed 29 May 2025.

15 Bui Hong Long, 'Vietnam's Net-Zero Commitment: Opportunities, Challenges and Solutions' (2024) 3 Environment 88.

16 Cui and others (n 6).

17 International Energy Agency (n 2).

gas emissions.[18] This law imposes taxes on polluting products such as gasoline, coal, and plastic bags, with gasoline taxes ranging from 1,000 to 4,000 VND/litre (equivalent to 0.04-0.16 USD/litre).[19] The tax is designed to encourage the transition to cleaner energy sources and reduce the consumption of polluting products.

However, the Law on Environmental Protection Tax has several limitations in responding to climate change. Most notably, it does not directly target CO2 emissions but instead applies to products indirectly associated with emissions, thereby resulting in its effectiveness as a carbon pricing mechanism. Compared to international carbon taxes, such as those in Canada ($40/ton of CO2 in 2023) or Sweden ($130/ton of CO2), Vietnam's gasoline taxes are too low to create a strong incentive to reduce emissions.[20] Moreover, environmental tax revenues (estimated at $2.5 billion per year) are directed primarily into the general budget rather than being allocated explicitly for renewable energy projects or for supporting vulnerable groups affected by climate change, such as communities in the Mekong Delta.[21]

Despite progress in developing a legal framework, Vietnam faces major challenges in deploying climate change finance instruments:

Firstly, a lack of detailed regulations on handling violations and quota allocation: Decree 06/2022/ND-CP has not specified the sanctioning mechanism for enterprises that do not comply with ETS or provide inaccurate emission data.[22] In addition, the allocation of quotas (free or auction) is still not clearly regulated, complicating the design of a fair and efficient carbon market. Experience from China shows that the allocation of free quotas in the first phase of its ETS (2021) has reduced financial pressure on businesses but also weakened incentives to invest in clean technology due to excessively low quota prices (~14 USD/ton of CO2).[23] Vietnam must therefore issue detailed guiding decrees to avoid similar restrictions.

Second, the MRV system is weak: the monitoring, reporting, and verification (MRV) system is a core factor in ensuring the transparency and effectiveness of the ETS; however, Vietnam currently lacks the necessary infrastructure and professional human resources to implement MRV comprehensively. According to research by Nguyen Van Hieu and

18 Law of the National Assembly of Vietnam No 57/2010/QH12 (n 5).

19 Nguyen Minh Anh, 'The Significance of Vietnam's Environmental Tax Law in the Green Economy Transition Process' (Fiscal Policies and the Green Economy Transition: Generating Knowledge – Creating Impact : Third Annual Conference of the Green Growth Knowledge Platform, University of Venice, Italy, 29-30 January 2015).

20 Yao Wang, Shulin Xu and Xue Meng, 'Environmental Protection Tax and Green Innovation' (2023) 30(19) Environmental Science and Pollution Research 56628. doi:10.1007/s11356-023-26194-z.

21 Nguyen Van Hieu and Nguyen Hoang Nam, 'The Current Situation of Greenhouse Gas Emissions in Vietnam: Opportunities and Challenges' (2021) 728 Journal of Hydrometeorology 51. doi:10.36335/VNJHM.2021(728).51-66.

22 World Bank (n 14).

23 Da Zhang and others, 'Emissions Trading in China: Progress and Prospects' (2014) 75 Energy Policy 9. doi:10.1016/j.enpol.2014.01.022.

Nguyen Hoang Nam, only a limited number of large industrial facilities in Vietnam had a full greenhouse gas (GHG) emissions reporting system in 2021, primarily due to the absence of measurement technology and trained personnel.[24] This situation mirrors China's early challenges prior to launching its national ETS, which required several years to establish a reliable MRV system.[25] The lack of a robust MRV not only affects the ETS but also hinders the feasibility of applying a direct carbon tax, since accurate emissions data is a prerequisite for calculating taxes.

Third, dependence on fossil fuels and limited financial resources: the coal and cement power sectors—the two main targets of ETS—are important sectors of Vietnam's economy, but also the largest contributors to GHG emissions.[26] According to a World Bank report, Vietnam needs about $368 billion between now and 2040 to transition to clean energy and develop sustainable infrastructure, yet current financial resources remain limited.[27] This situation underscores the need for Vietnam to leverage international funding from the Asian Development Bank (ADB), Green Climate Fund (GCF) and work with the EU to build capacity and implement effective financial instruments.[28]

Finally, low business awareness: commercial centres and medium enterprises (SMEs), which account for more than 90% of all businesses in Vietnam, often perceive environmental taxes or ETS obligations as financial burdens rather than opportunities for technological innovation. For example, according to Mr. Nguyen Minh Anh, by 2023, only about 10% of enterprises in the textile and garment industry will apply green technology, due to high investment costs and a lack of preferential policies.[29] To overcome this, Vietnam could draw lessons from China, where EPT and ETS have raised business awareness through training programs and financial support mechanisms for the public green turmeric.[30]

3.1.2. Experience From China: Strengths and Limitations of a Comprehensive Legal Framework

China has established a comprehensive legal and institutional framework to address climate change, centred on two main financial instruments: the Environmental Protection Tax (EPT) and the Emissions Trading System (ETS). These tools are designed to price carbon, localise environmental costs, and accelerate the transition to a low-carbon economy, in line with China's commitment under the Paris Agreement (2015) to reduce carbon intensity by 60-65% from 2005 levels by 2030.[31] The role of the state is central, with close coordination

24 Hieu and Nam (n 21).
25 Cui and others (n 6).
26 Bui (n 15).
27 World Bank (n 14).
28 Green Climate Fund, 'FP071 Scaling Up Energy Efficiency for Industrial Enterprises in Vietnam' (*GCF Watch*, 16 March 2018) <https://www.gcfwatch.org/project-tracker/fp071-scaling-up-energy-efficiency-for-industrial-enterprises-in-vietnam> accessed 29 May 2025.
29 Nguyen (n 19).
30 Wang, Xu and Meng (n 20).
31 Paris Agreement (n 1).

between central and local agencies to ensure the effective implementation of these financial instruments and their integration into the national development strategy, with the goal of reaching the carbon peak by 2030 and carbon neutrality by 2060.

The Environmental Protection Tax Law, passed by the Chinese People's Congress on 25 December 2016 and effective on 1 January 2018, is the legal basis for imposing taxes on air pollutants (SO2, NOx), wastewater, solid waste, and noise. The tariff ranges from 1.2 to 12 yuan (about $0.17-1.7) per unit of pollution depending on the type of pollutant and the applicable region.[32] The law is administered by the State Tax Administration (STA) in coordination with the Ministry of Ecology and Environment (MEE), with local authorities responsible for collecting taxes and monitoring compliance.[33]

The EPT law replaces the former pollution fee system, which was ineffective due to inconsistency and low fees that were insufficient deterrents.[34] Its primary objective is to encourage businesses to reduce their emissions by internalising environmental costs. However, a major limitation lies in the absence of a direct tax on CO2, which weakens its role as a comprehensive carbon pricing mechanism, despite the fact that reductions in local pollutants indirectly contribute to lowering greenhouse gas emissions.[35] Revenue from EPT is estimated at 22 billion yuan (about $3.1 billion) per year to finance environmental protection projects, including wastewater treatment system improvements, air quality monitoring, and renewable energy development.[36] However, the allocation of this revenue source has not been clearly stipulated in the law, leading to differences in efficiency between localities. For example, developed provinces such as Guangdong and Zhejiang utilise their revenue more efficiently in implementing environmental projects, while less-developed provinces like Shanxi face difficulties in terms of resources and technology.[37]

China's ETS, officially launched on 16 July 2021, is the world's largest carbon trading system in terms of emissions coverage, with about 5.2 billion tons of CO2 per year (more than 40% of total national emissions).[38] Regulated by the *Interim Regulation on the Management of Carbon Emissions Trading* (issued on 10 January 2024, effective from 1 May 2024), ETS currently focuses on the power sector with about 2,225 coal and gas power plants.[39] The system operates on the principle of "limit and trade," in which the MEE sets annual emission limits and allocates allowances to businesses. Businesses can buy and sell quotas on national

32 Law of the People's Republic of China 'On Environmental Protection Tax' (n 4).
33 ibid, art 14.
34 Yu He, Chuanhao Wen and Huan Zheng, 'Does China's Environmental Protection Tax Law Effectively Affect Companies? Evidence from the Stock Market' (2020) 57(15) Emerging Markets Finance and Trade 4436. doi:10.1080/1540496X.2020.1822810.
35 Xu and others (n 10).
36 Wang, Xu and Meng (n 20).
37 Cui and others (n 6).
38 'China National ETS' (*International Carbon Action Partnership (ICAP)*, 2024) <https://icapcarbonaction.com/en/ets/china-national-ets> accessed 29 May 2025.
39 ibid.

carbon exchanges such as the Shanghai Energy and Environment Exchange (SEEE) and the Hubei Carbon Emissions Exchange.[40]

The ETS system is supported by a strict monitoring, reporting and verification (MRV) mechanism with detailed guidelines on emissions data collection, independent audits, and penalties for non-compliance, such as fines of up to 3 million yuan or quota cuts.[41] In the first phase (2021-2023), the ETS mainly allocated free quotas based on emission intensity to reduce financial pressure on power businesses, but simultaneously weakened incentives to invest in low-carbon technology.[42]

The above analysis shows that although certain successes have been achieved, in this context, China's regulations also show limitations, such as the lack of direct taxation of CO2 in the EPT, along with the allocation of free quotas and low carbon prices in the ETS, which have reduced the effectiveness of encouraging investment in technologies to reduce emissions and clean energy transition. These are valuable lessons that Vietnam needs to heed to avoid repeating similar mistakes.

3.1.3. Recommendations for Vietnam: Improving the Legal Framework and Climate Finance Institutions towards Net Zero 2050

To complete the legal framework and climate finance institutions towards the Net Zero 2050 goal, Vietnam needs to implement the following solutions:

First, Vietnam needs to consider promulgating a carbon tax as a financial instrument to replace or supplement the 2010 Law on Environmental Protection Tax. To ensure efficiency and feasibility, the carbon tax rate needs to be designed based on the following criteria:

i. A higher tax rate than the current environmental protection tax rate: currently, the environmental protection tax applied to gasoline (4,000 VND/litre) is equivalent to about 10-15 USD/ton of CO2, much lower than the effective carbon tax recommended by the World Bank (40-80 USD/ton of CO2 by 2030). The proposed starting carbon tax in Vietnam is about 30 USD/ton of CO2 (equivalent to 750,000 VND/ton) with a roadmap to gradually increase to 50 USD/ton by 2035.
ii. A flexible adjustment mechanism: tax rates should be adjusted according to inflation, carbon prices in the international market, and the affordability of economic sectors. For example, heavy industries (cement, steel) may be subject to lower taxes in the early stages to avoid economic shocks.
iii. Exemptions for specific groups: small businesses, agriculture, and industries that use renewable energy should be exempted or reduced from carbon taxes to encourage the green transition.

40 Zhang and others (n 23).
41 ibid.
42 Xu and others (n 10).

Second, Vietnam needs to have policies to support small and medium-sized enterprises (SMEs). SMEs constitute the majority of Vietnam's economy but often lack the resources to comply with carbon tax or ETS regulations. Target support policies are therefore essential:

i. official carbon tax exemption in the period 2028-2030 for small and medium-sized enterprises in the agriculture and transport sectors to reduce financial pressure;
ii. technical assistance and support for small and medium-sized enterprises through the green fund, using the proceeds from ETS quota auctions;
iii. free training courses on MRV and emissions management for small and medium-sized enterprises, in partnership with international organisations such as the EU, to leverage experience and resources.[43]

Third, Vietnam needs to build a long-term roadmap for the national carbon market. To ensure sustainability and international integration, Vietnam needs to develop a long-term roadmap for the carbon market, with specific timelines:

i. 2028-2030: implement ETS testing for the electricity and cement sectors, with a 100% free quota and apply a carbon tax at 5-10 USD/ton of CO2 for transportation and agriculture. Refer to the EU's ETS model on how to set up an early-stage carbon market.[44]
ii. 2030-2035: increase the ETS quota auction rate to 50% and increase the carbon tax to 20-30 USD/ton of CO2. Strengthen cooperation with international carbon markets (such as the EU or South Korea) to link the ETS system.[45]
iii. After 2035: complete the national carbon market, with 100% of ETS quotas auctioned and fully integrated into the international mechanism. This would ensure Vietnam meets its carbon neutrality commitments by 2050, in line with its commitments under the EU's international partnerships.[46]

3.2. Analysis of Environmental Justice Issues and Climate Finance Policy

3.2.1. The Implementation of Environmental Justice In Response to Climate Change in Vietnam

Regarding the impact of pollution on the community: Currently, the provinces of Quang Ninh and Ha Tinh, where many coal-fired power plants and cement production facilities are concentrated, are areas heavily affected by environmental pollution caused by industrial activities.[47] In Quang Ninh, the coal mining industry and coal-fired power plants emit large

43 'International Partnerships: Vietnam' (*European Commission*, 2025) <https://international-partnerships.ec.europa.eu/countries/vietnam_en> accessed 5 June 2025.
44 'International Carbon Market' (*European Commission*, 2025) <https://climate.ec.europa.eu/eu-action/eu-emissions-trading-system-eu-ets/international-carbon-market_en> accessed 5 June 2025.
45 ibid.
46 'International Partnerships: Vietnam' (n 43).
47 Bui (n 15).

amounts of fine dust (PM2.5), sulfur dioxide (SO2) and nitrogen oxide (NOx), which cause air pollution and directly affect local public health.[48] According to a study, PM2.5 concentrations in some areas of Quang Ninh regularly exceed the World Health Organization (WHO) safety threshold, increasing respiratory and cardiovascular diseases in the community.[49] Similarly, in Ha Tinh, cement factories and the Formosa industrial park have caused significant air, water, and soil pollution, as well as slag and industrial wastewater, affecting the livelihood of people, especially farmers and fishermen.[50] These impacts not only violate people's right to live in a clean environment but also exacerbate social inequality, as poor and rural communities bear a greater burden of pollution than urban or wealthier areas.[51]

On the issue of disclosure of information about the environment and the participation of notaries in environmental issues: The Law on Environmental Protection 2020 clearly stipulates the requirement for disclosure of environmental information, including data on greenhouse gas emissions and pollution from industrial facilities, to increase community participation in monitoring and decision-making.[52] Article 137 requires major emitting facilities to publicly publish annual emission reports, and at the same time, create conditions for people and social organisations to access information.[53] This regulation is in line with the principles of environmental justice, providing an opportunity for the community to monitor polluting activities and protect their rights.

In practice, however, the reality of implementation shows that public participation, especially in rural areas, is still very limited. In many areas, such as Quang Ninh and Ha Tinh, rural people often lack access to pollution data or climate policy information due to inadequate internet access, limited education and low legal awareness.[54] Moreover, state management agencies have not organised enough community consultation forums or disseminated easy-to-understand information, leading to a lack of transparency and diminished trust in the policy.[55] Compared to China, where Guangdong province has experimented with community consultation forums to discuss ETS, Vietnam needs to establish similar mechanisms to increase citizen participation, especially in areas heavily affected by pollution.[56]

48 Hieu and Nam (n 21).
49 ibid.
50 Bui (n 15).
51 Resolution HRC No 48/13 (n 7).
52 Law of the National Assembly of Vietnam No 72/2020/QH14 (n 12).
53 ibid.
54 Nguyen (n 19).
55 Bui (n 15).
56 Zhang and others (n 23).

3.2.2. China's Environmental Justice Enforcement and Its Limitations

Impact of environmental pollution on communities near coal-fired power plants: Communities living near coal-fired power plants in provinces such as Shanxi and Inner Mongolia face serious health risks from air pollution, especially from PM2.5 fine particles and pollutants such as SO2 (sulfur dioxide). Research by Cui and colleagues indicates that these coal-dependent regions—China's coal-fired power generation hubs—are hit hard by air pollution with PM2.5 levels regularly exceeding the World Health Organization's (WHO) safety threshold.[57] PM2.5 and SO2 pollution has been linked to respiratory, cardiovascular diseases and increased premature mortality.[58]

Although China's national ETS, launched in 2021, focuses on the power sector (which accounts for about 40% of the country's CO2 emissions), the allocation of free quotas and low carbon prices (about $14 per tonne of CO2 in 2024) has reduced the financial incentive for coal-fired power plants to invest in pollution control or transfer technology. This leads to local[59] communities continuing to be negatively affected by pollution, violating the principle of environmental equity of equitable allocation of costs and environmental benefits.[60]

For example, Shanxi—which supplies more than 25% of China's coal production—illustrates this imbalance. Rural communities near coal-fired power plants often do not benefit from renewable energy projects (such as solar or wind), which are concentrated mainly in coastal provinces such as Guangdong.[61] Inequality in this region exacerbates environmental injustices, as poorer communities in Shanxi and Inner Mongolia incur higher health and environmental costs without adequate support from EPT[62] or ETS revenues. This is an experience that Vietnam needs to learn from to avoid repeating.

On the issue of transparency and disclosure of emissions data: China's Environmental Protection Law (amended in 2014) requires businesses and government agencies to make emissions data public to ensure transparency and accountability.[63] However, the implementation of this requirement is limited, especially in providing information to the public. Emissions data is primarily managed by the Ministry of Ecology and

57 Cui and others (n 6).

58 C Arden Pope III and Douglas W Dockery, 'Health Effects of Fine Particulate Air Pollution: Connecting Lines' (2006) 56(6) Journal of the Air and Waste Management Association 709. doi:10.1080/10473289.2006.10464485.

59 Xu and others (n 10).

60 Da Zhang, Marco Springmann and Valerie Karplus, *Equity and Emissions Trading in China* (MIT Joint Program Report Series: Report 257, MIT Joint Program on the Science and Policy of Global Change 2014) <https://dspace.mit.edu/handle/1721.1/88604> accessed 29 May 2025.

61 Wang, Xu and Meng (n 20).

62 Cui and others (n 6).

63 Law of the People's Republic of China 'On Environmental Protection' (adoption 24 April 2014) <http://www.npc.gov.cn/zgrdw/npc/xinwen/2014-04/25/content_1861279.htm> accessed 6 May 2025.

Environment (MEE), with public access often limited to complex technical reports or technical information that is difficult to access for the unskilled.[64] According to Zhang et al.'s research, although ETS's monitoring, reporting, and verification (MRV) system has improved the accuracy of emissions data, information disclosure is still concentrated in central agencies such as the MEE, rather than being widely disseminated to affected communities.[65] This reduces the chances of being monitored by the public or participating in decisions related to carbon policy.

Moreover, rural communities—such as those in Shanxi—often lack formal channels to access information about emissions or contribute to environmental policymaking.[66] Although the Environmental Protection Law encourages public participation, enforcement mechanisms are weak, resulting in affected communities having no say in shaping policies such as EPT or ETS, violating the environmental justice principle of the right to participate.[67] This issue is also something that Vietnam needs to avoid when promulgating and adjusting regulations in the direction of transparency and publicity for environmental activities.

3.2.3. Recommendations For Vietnam to Improve Regulations to Promote Environmental Justice

To ensure that citizens' voices are incorporated into carbon policies, Vietnam needs to establish community consultation forums and learn from the EU's international cooperation mechanisms. According to the European Commission, the EU has supported Vietnam in sustainable development projects that highlight the central role of community participation in environmental policies.[68] Specific recommendations include:

i. *Organising local forums:* Create consultation platforms in areas heavily affected by pollution, such as Quang Ninh (coal industry) and Ha Tinh (steel industry), enabling people to contribute their opinions on carbon taxes and ETS. These forums should be held periodically (quarterly or annually), with consultation outcomes publicly disclosed to enhance transparency.
ii. *Learning from the EU*: The EU has implemented community consultation programmes to ensure climate policies are formulated based on the actual needs of people, as outlined in collaborative initiatives with partner countries. Vietnam can adopt this model to enhance transparency and accountability in emissions management.

64 Lei Zhang, Arthur PJ Mol and Guizhen He, 'Transparency and Information Disclosure in China's Environmental Governance' (2016) 18 Current Opinion in Environmental Sustainability 17. doi:10.1016/j.cosust.2015.03.009.

65 Zhang and others (n 23).

66 Zhang, Springmann and Karplus (n 60).

67 Julian Agyeman, Robert D Bullard and Bob Evans, 'Trends and Directions in Environmental Justice: From Inequity to Everyday Life, Community, and Equitable Sustainability' (2016) 41 Annual Review of Environment and Resources 321. doi:10.1146/annurev-environ-110615-090052.

68 'International Partnerships: Vietnam' (n 43).

China's experience demonstrates that insufficient implementation of such mechanisms diminishes public participation in state-led climate policies, despite the fact that communities are often the most directly affected. The promotion of the above solutions aims to improve the protection of human rights in climate change financial policies.

3.3 Analysis of the Right to Live in a Healthy Environment

3.3.1. Provisions of Vietnamese law to ensure the human right to live in a healthy environment

The Constitution of Vietnam (2013) in Article 43 affirms: "Everyone has the right to live in a clean environment, to be informed about the environment and to be protected from the adverse effects of the environment."[69] The Law on Environmental Protection (2020) concretises this right through regulations on the responsibilities of the state, businesses and communities in reducing pollution and responding to climate change. Article 4 of this Law clearly states that environmental protection is the right and obligation of each individual and organisation, and emphasises the role of financial instruments such as taxes and environmental protection fees in encouraging[70] environmentally friendly behaviours.

However, the Law on Environmental Protection Tax (2010), promulgated under Law No. 57/2010/QH12,[71] has been ineffective in driving behavioural change among polluters. The law imposes tariffs on eight groups of goods, including gasoline, coal, plastic bags and chemicals such as hydrogen-chloro-fluoro-carbon (HCFC). However, the current tax rate (1,000–4,000 VND/litre for gasoline, equivalent to 0.04–0.16 USD/litre) is considered too low compared to the global average carbon tax rate (2–4 USD/ton of CO2).[72] According to Nguyen Thi Kim Ngan, this tax fails to internalise the negative external costs of CO2 emissions, thus discouraging businesses in heavy industries such as cement, steel and coal-fired power to switch to clean technology.[73] For example, CO2 emissions from industrial sectors in Vietnam continued to rise steadily between 2015 and 2022, reflecting the inadequacy of environmental tax rates.[74] Moreover, the list of taxable objects also ignores serious pollutants such as pesticides and e-waste, limiting the scope of the policy.[75]

69 Constitution of the Socialist Republic of Vietnam (adopted 28 November 2013) <https://www.constituteproject.org/constitution/Socialist_Republic_of_Vietnam_2013> accessed 29 May 2025.

70 Law of the National Assembly of Vietnam No 72/2020/QH14 (n 12).

71 Law of the National Assembly of Vietnam No 57/2010/QH12 (n 5).

72 World Bank, 'Carbon Pricing Dashboard' (*World Bank Group*, 2025) <https://carbonpricingdashboard.worldbank.org> accessed 5 June 2025.

73 Nguyen Thi Kim Ngan, 'Inadequacies from Vietnam's Environmental Tax Policy' (2023) 16 Economics and Forecasts Review <https://kinhtevadubao.vn/nhung-bat-cap-tu-chinh-sach-thue-moi-truong-cua-viet-nam-27918.html> accessed 29 May 2025.

74 World Bank, *The State and Trends of Carbon Pricing 2023* (World Bank Group 2023). doi:10.1596/978-1-4648-2006-9.

75 Tran Linh Huan, 'The Current Status of Laws on Air Environment Protection and Recommendations for Improvement' [2022] Vietnam Lawyer Journal <https://lsvn.vn/thuc-trang-phap-luat-ve-bao-ve-moi-truong-khong-khi-va-kien-nghi-hoan-thien1648255266-a116872.html> accessed 29 May 2025.

The measurement, reporting and verification (MRV) system specified in Decree 06/2022/ND-CP on reducing greenhouse gas emissions also faces critical shortcomings. As noted by Tran Linh Huan, existing regulations lack detailed guidance on measurement methods and verification standards, leading to asynchronous and non-transparent emission data.[76] As a result, environmental protection tax revenues are not effectively used to finance climate change response programs but are mainly integrated into the general budget, reducing public confidence in the fairness of the policy.[77] Experience from European countries such as Sweden shows that the introduction of a high carbon tax (approximately $30 per ton of CO2) and reinvestment of revenue into renewable energy projects has helped increase access to a clean environment.[78] Vietnam could strengthen its framework by establishing a national environment fund to manage environmental tax revenues transparently and effectively.

In addition, the Mekong Delta, which contributes roughly 50% of rice production and 12% of national GDP, is heavily affected by climate change, facing rising sea levels, saltwater intrusion and land subsidence. According to Nguyen Thi Hue, sea levels in the Mekong Delta have risen by an average of 3.5 millimetres per year over the past two decades, flooding 40% of agricultural land and affecting the livelihoods of more than 17 million people, mainly farmers and fishermen.[79] These impacts reduce agricultural productivity, increase the economic burden, and threaten food security in the region. However, the region receives disproportionate support from climate change finance policies. Hue pointed out that the Mekong Delta only receives about 4.7% of the public investment budget for renewable energy in the 2018-2023 period, while provinces such as Quang Ninh and Ninh Binh are prioritised for large-scale wind and solar power projects.[80] This inequality poses the issue of environmental justice as vulnerable communities in the Mekong Delta bear the brunt of climate change without adequate access to resources to adapt or mitigate their impacts.

From a human rights perspective, the lack of investment in clean energy and adaptation solutions in the Mekong Delta violates the principle of equitable access to climate change solutions, highlighted in Resolution 48/13.[81] For example, while the northern provinces have a renewable energy capacity of over 5,000 MW, the Mekong Delta only reaches about 500 MW, mainly from small solar power projects.[82] Financial policies such as environmental tax exemptions or green credits for sustainable solutions (such as water-efficient irrigation systems or solar energy for agriculture) have also not been implemented effectively in the

76 ibid.
77 Tran Luong Quang Minh, 'Environmental Tax Policies in European Countries and Recommendations for Vietnam' (2023) 1(814) Finance 24.
78 ibid.
79 Nguyen Thi Hue, 'The Impact of Climate Change on Agricultural Development and Adaptation Solutions of the Agricultural Sector' (2024) 50 Journal of Natural Resources and Environment Science 158.
80 ibid.
81 Resolution HRC No 48/13 (n 7).
82 World Bank (n 14).

region. As Hue underscores, farmers are often forced to shoulder adaptation costs, such as purchasing water pumps to prevent salinity intrusion, while lacking financial support from the state, thereby increasing the economic vulnerability of disadvantaged communities.[83]

3.3.2. Experience From China in the Regulation to Ensure Human Rights to Live in A Healthy Environment

In China, financial policies such as the Environmental Protection Tax (EPT) and the Emissions Trading System (ETS) are designed to reduce greenhouse gas emissions and improve environmental quality, thus indirectly supporting the right to live in a clean, healthy, and sustainable environment. However, limitations in policy design and implementation, along with regional inequalities and unfair distribution of revenue, have reduced the effectiveness of human rights protections, especially for vulnerable communities.

In China, the EPT has been implemented since 2018, and the national ETS was launched in 2021 to price polluting activities and encourage the transition to clean energy, contributing to the realisation of the right to live in a clean environment as stipulated in Resolution 48/13.[84] The EPT imposes tariffs based on emissions of pollutants such as SO2 and NOx, while the ETS sets CO2 emission limits for the power sector, which accounts for about 40% of total national emissions.[85] These policies have achieved a number of results, such as a 15% reduction in PM2.5 concentrations in major cities between 2018 and 2023, improved air quality, and reduced pollution-related health risks.[86]

However, the low EPT tax rate (about 1.2–12 yuan/ton of pollutants, equivalent to $0.17–1.7) and the allocation of free quotas in the ETS (accounting for more than 90% of the total quota by 2024) have reduced the financial incentive for businesses to invest in pollution control or energy transition technologies.[87] The price of carbon in the ETS market, which hovers around $14 per tonne of CO2 in 2024, is also significantly lower than the $135 per tonne recommended by the World Bank to meet the Paris Agreement target.[88] As a result, coal-fired power plants in Shanxi and Inner Mongolia continue to emit large amounts of PM2.5 and SO2, threatening the right of local communities to live in a clean environment.[89] These restrictions show that China needs to adjust its financial policy to ensure environmental efficiency and protect human rights in a more substantive way. Vietnam also needs to consider and calculate the consequences of issuing financial regulations to avoid repeating China's mistakes.

83 Hue (n 79).
84 Resolution HRC No 48/13 (n 7).
85 Cui and others (n 6).
86 Wang, Xu and Meng (n 20).
87 Xu and others (n 10).
88 World Bank, *The State and Trends of Carbon Pricing 2024* (World Bank Group 2024). doi:10.1596/978-1-4648-2127-1.
89 Pope and Dockery (n 58).

In addition, regional inequalities in the implementation of policies to respond to climate change in China have compromised the human rights of communities in underdeveloped regions. Provinces such as Shanxi and Inner Mongolia, which depend on the coal and coal power industry, suffer high medical costs due to severe air pollution. Research shows that PM2.5 concentrations in Shanxi often exceed 50 μg/m³, double the WHO safety threshold, causing respiratory and cardiovascular diseases, threatening people's right to life and health.[90] Meanwhile, coastal provinces such as Guangdong and Zhejiang benefit from renewable energy projects such as solar and wind power, with total clean energy capacity accounting for more than 60% of the country in 2023.[91] This disparity exacerbates environmental injustice, as poorer communities in Shanxi and Inner Mongolia suffer the consequences of pollution without benefiting from the energy transition.

Moreover, communities in Shanxi and Inner Mongolia often lack access to information and participation in decision-making processes, violating the principle of participatory fairness highlighted in Resolution 48/13.[92] For example, renewable energy projects concentrated in coastal provinces rarely consult with local communities, leading to an unfair distribution of environmental and economic benefits.[93] To protect human rights, China needs to prioritise investment in clean energy in coal-dependent regions and ensure participation of local communities in policy making. In the process of learning from experience, Vietnam also needs to be aware of this limitation in China's regulations to complete its national regulations.

Another weakness lies in the distribution of Environmental Protection Tax (EPT) revenues and policies aimed at protecting vulnerable groups. With annual revenues estimated at $3 billion per year (equivalent to 20 billion yuan), the EPT represents a potentially important resource to support vulnerable communities and promote human rights in the context of climate change.[94] However, much of this revenue is allocated to local government general funds rather than specific programs aimed at supporting groups heavily affected by pollution, such as those in Shanxi and Inner Mongolia.[95] This results in vulnerable communities not receiving adequate compensation or support to mitigate the health and economic impact of air pollution.

For instance, health care programs or environmental infrastructure improvements in heavily polluted areas are rarely funded from EPT revenues, even though these communities bear a high health burden from pollutants such as PM2.5.[96] According to Yi Ma and Wen Xiang, the lack of transparency in the distribution of EPT revenue also reduces the ability

90 Cui and others (n 6).
91 Zhang, Springmann and Karplus (n 60).
92 Resolution HRC No 48/13 (n 7).
93 Agyeman, Bullard and Evans (n 67).
94 Wang, Xu and Meng (n 20).
95 Zhang, Mol and He (n 64).
96 Pope and Dockery (n 58).

of NGOs and local communities to monitor the use of this resource, violating the right to access information.[97] To protect human rights, China needs to establish a transparent revenue distribution mechanism, prioritise projects that support health and the environment in vulnerable areas and refer to international models such as the Green Climate Fund in financing environmental justice initiatives.[98]

Consequently, transparency and clarity in the allocation of carbon tax and EPT revenues are something that Vietnam must pay attention to when building and refining the adjustment model for carbon emission activities into the environment.

3.3.3. Lessons Learned for Vietnam in Perfecting Regulations to Ensure Human Rights to Live in a Healthy Environment

Given Vietnam's current situation, and drawing lessons from China's experience, it is crucial that Vietnam carefully designs and implements policies to improve its regulatory framework and ensure the human right to live in a healthy environment. The Mekong Delta, one of the regions most heavily affected by climate change, faces issues such as sea level rise and land degradation, all of which threaten the livelihoods of millions of people. Learning from China's inefficient use of carbon tax revenues, Vietnam should approach the direction of carbon tax revenue and auction of ETS quotas that need to be allocated to support sustainable solutions in the region:

i. *Renewable energy financing*: The European Commission's document on the international carbon market emphasises that EU ETS revenues are used to finance renewable energy projects, such as wind and solar, thereby reducing dependence on fossil fuels and creating green jobs.[99] In Vietnam, the revenue from the carbon tax (proposed at US$5-10 per tonne of CO2) can be used to deploy small-scale solar farms in provinces such as Can Tho and Bac Lieu, providing clean energy to rural communities and reducing pressure on the national grid.
ii. *Supporting sustainable livelihoods:* The European Commission's *International Partnerships* document states the EU's support for sustainable agriculture projects in Vietnam, including climate-resilient farming.[100] Based on this experience, Vietnam can use carbon tax revenues to finance low-emission rice farming, eco-friendly aquaculture, and mangrove-based livelihood models in the Mekong Delta. These initiatives would help communities maintain their livelihoods while adapting to the impacts of climate change.

97 Yi Ma and Wen Xiang, 'Law Enforcement Through Authoritarian Environmentalism? State and Non-State Actors in China's Environmental Public Interest Litigation' (2023) 52(3) China Current Affairs Journal 464. doi:10.1177/18681026231185791.
98 'About GCF' (*Green Climate Fund*, 2025) <https://www.greenclimate.fund/about> accessed 29 May 2025.
99 'International Carbon Market' (n 44).
100 'International Partnerships: Vietnam' (n 43).

iii. *Community Fund:* In the EU, ETS revenues have been used to support community-driven initiatives such as ecosystem restoration and green infrastructure improvements.[101] Vietnam could establish a community fund for the Mekong Delta, financed by carbon tax revenues to finance locally proposed projects–such as planting mangroves or building irrigation systems—that directly protect the environment and long-term livelihoods.

4 CONCLUSION

To build a legal foundation for financial responses to climate change, Vietnam can learn from China's experience, especially in developing carbon tax laws and ensuring social justice.

First, improve carbon tax laws and effectively use carbon tax revenues. In China, the low EPT rate and free subsidies in the ETS have not provided enough incentive to encourage low-carbon technology investment. Therefore, Vietnam should consider imposing a carbon tax to replace or supplement the current Law on Environmental Protection Tax. Tax rates will need to be set appropriately, increasing over time from current levels and with a complex indexing system that reflects inflation, international carbon prices, and the affordability of economic actors. An initial tariff of around $30 per tCO2, rising to $50 per tonne by 2035, could be a good place to start.

Equally important is the transparent and efficient use of carbon tax revenues and ETS auction revenues. These revenues should be earmarked for priority areas rather than absorbed into general fiscal consolidation funds— a limitation observed in China's practice. Funds could be directed to support sustainable agriculture programs, mangrove planting projects, as well as flood control, irrigation and renewable energy projects. In particular, it is necessary to exempt carbon taxes or provide technical and financial assistance to small and medium-sized enterprises in the early stages to ease the pressure and encourage investment in green production.

Second, ensure the disclosure of environmental information and transparency and the right to a healthy environment and social equality. Transparency in emissions data is a critical issue. China has struggled to publicly release its emissions figures. Therefore, Vietnam must strengthen the MRV system to ensure the accuracy and transparency of emissions data and make it available to affected communities. This would enable the public to easily monitor and participate in carbon policymaking decisions.

Public participation is also an integral part. Environmental consultation forums should be established regularly in heavily polluted areas such as Quang Ninh (coal industry) and Ha

101 ibid.

Tinh (steel industry). Such forums would ensure that communities have their voices heard in environmental decision-making, thereby advancing environmental justice and protecting the constitutional right to a clean, healthy and sustainable environment. China's experience demonstrates that without such mechanisms, public participation in state policies remains.

Finally, human rights and regional justice must be protected. China's experience highlights regional disparities in the distributive impacts of environmental policies. Vietnam must also invest in clean energy and adaptation solutions in these vulnerable areas—most notably the Mekong Delta—to ensure equitable access to climate resources. Revenues from carbon taxes and ETS could finance ecosystem restoration, green infrastructure, enhancement, and livelihood support programs for people living in climate-sensitive bioregions.

Coordinating and selectively drawing on China's experiences, along with shaping a long-term roadmap for the national carbon market and strengthening international cooperation, will help Vietnam effectively and equitably implement its Net Zero commitment by 2050.

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АНОТАЦІЯ УКРАЇНСЬКОЮ МОВОЮ

Дослідницька стаття

ПРАВИЛА РЕГУЛЯЦІЇ СИСТЕМИ ТОРГІВЛІ ВИКИДАМИ ТА ПОДАТКУ НА ВУГЛЕЦЬ: ДОСВІД КИТАЙСЬКОГО ЗАКОНОДАВСТВА ТА УРОКИ ДЛЯ В'ЄТНАМУ

Нам Фан Фуонг

АНОТАЦІЯ

Вступ. *Значним викликом 21-го століття є зміна клімату, яка змусила країни впровадити фінансові інструменти, починаючи від податку на вуглець до Системи торгівлі викидами (СТВ) задля скорочення викидів. Китай, найбільший у світі емітент CO2, запровадив податок, пов'язаний з охороною навколишнього середовища (Environmental Protection Tax – далі EPT), з 2018 року та запровадив національну СТВ у 2021 році. В'єтнам, який прагне досягти нульових викидів до 2050 року та наразі розвиває свій ринок вуглецю, стикається зі значними труднощами у зміцненні своїх фінансових та правових норм.*

Методи. *Ця стаття поєднує якісну методологію та порівняльний аналіз, щоб окреслити зв'язок між оподаткуванням вуглецю та Системою торгівлі викидами (СТВ), одночасно підкреслюючи право людини на чисте навколишнє середовище. Якісний підхід використовується для поглибленого вивчення політичних, економічних та соціальних аспектів у відповідних юрисдикціях Китаю та В'єтнаму. Паралельно, порівняльний аналіз є основою для оцінки ефективності цих двох інструментів у пом'якшенні викидів парникових газів, а також дослідження їхнього потенціалу для синергії та пов'язаних із цим проблем.*

Результати та висновки. *У цій статті поставлено за мету відповісти на питання: у процесі розробки та вдосконалення нормативно-правових актів щодо системи торгівлі викидами та податку на вуглець, які уроки може винести В'єтнам з досвіду Китаю, щоб забезпечити справедливість та право жити в чистому навколишньому середовищі?*

Система торгівлі викидами (СТВ) Китаю наразі охоплює приблизно 40% викидів CO2, переважно в енергетичному секторі. Однак відсутність координації між EPT та СТВ, низька ціна квот та безкоштовний розподіл квот не сприяють інвестиціям у низьковуглецеві технології. Спираючись на ці уроки, В'єтнам повинен розглянути можливість запровадження вуглецевого податку замість чинного Закону про податок на охорону навколишнього середовища. Таке законодавство повинно містити обґрунтовані положення, такі як вищі податкові ставки, гнучкі механізми коригування та цільові пільги або скорочення, щоб впливати на поведінку споживачів та зменшувати залежність від викопного палива.

Крім того, вкрай важливо реформувати нормативно-правові акти управління державним бюджетом щодо використання фінансових ресурсів, отриманих від податків

на вуглець та Системи торгівлі викидами (СТВ). Ці кошти слід виділити на фінансування екологічно чистих сільськогосподарських моделей, проєктів з відновлення мангрових лісів та розвитку іригаційних систем, стійких до затоплення цих лісів, тим самим сприяти довгостроковій безпеці та захисту довкілля. Водночас, важливо розробити раціональний довгостроковий план розвитку національного ринку вуглецю. Такий комплексний підхід, що поєднує обидва фінансові інструменти, захистить право громадян В'єтнаму жити в чистому довкіллі та забезпечить дотримання зобов'язання щодо нульових викидів до 2050 року.

Ключові слова: *податок на вуглець, Система торгівлі викидами, екологічна справедливість, право людини жити в чистому довкіллі, В'єтнам.*