

Marketization Mechanism of Environmental Protection Law under Global Governance

Yinge Li (Ingel Lee)^{1,a,*}

¹*Beijing Foreign Studies University, Beijing, China*

a. ylee66@126.com

**corresponding author*

Abstract: The Global Environmental Problem is becoming serious, which needs to maintain the environmental governance mechanism effectively. This study analyzes the marketization mechanism of environmental protection law under global governance to meet the environmental challenge. Analyzing the severe background of environmental problems, highlighting the urgency of global governance in environmental protection, it explores the main content of the market-oriented mechanism of environmental protection law. Using various research methods such as literature analogy and clause research, this topic is elaborated from different perspectives. The market-oriented mechanism of environmental protection laws helps to stimulate the environmental awareness of enterprises and individuals, promote the effective utilization of resources and sustainable development of the environment. Attention should be paid to exploring areas such as improving market supervision, strengthening international cooperation, and promoting technological innovation, in order to provide reference for a better global environmental governance mechanism.

Keywords: Environmental Law, Marketization Mechanism, Global Governance, Carbon Emission Trading, Insurance and Taxation

1. Introduction

The world today is facing increasingly severe environmental challenges such as climate change, loss of biodiversity, and water scarcity, thus urgently requiring global international cooperation and governance to address them. Environmental protection law is one of the important means to address global environmental issues, protecting environmental resources, maintaining ecological balance, and promoting sustainable development through legal means. However, traditional environmental protection laws have problems such as difficulty in implementation and weak effectiveness, which require further innovation and improvement. The market-oriented mechanism, as a new means of environmental governance, stimulates enterprises and individuals to actively participate in environmental protection through spontaneous market regulation and resource allocation, in order to achieve environmental protection goals. This article analyzes the urgency and importance of current global environmental issues, focusing on the theoretical basis, operational mechanism, and implementation effect of environmental governance, and analyzes the marketization mechanism of environmental protection law. Evaluate and prospect the advantages, disadvantages, and development trends of the market-oriented mechanism of environmental protection law and explore its role and position in future global environmental governance. Propose relevant policy recommendations and

response measures to further improve the market-oriented mechanism of global environmental protection laws. In the context of global governance, it is necessary to combine environmental protection laws with market-oriented mechanisms to provide theoretical support and practical reference for building a more sound and efficient global environmental governance system, in order to promote the altogether wins of ecological environment and economic development.

2. The Current Situation and Issues of Environmental Marketization Mechanism

While humans are constantly changing the ecological environment, on the one hand, although social productivity has not only improved, the environment in which humans live has been increasingly severely damaged. For macro-perspective, China's environmental problems are showing an increasingly deteriorating situation. Establishing a socialist market economy with Chinese characteristics and coexisting with green mountains and clear waters in environmental protection will be beneficial for the long-term development of society. The market-oriented mechanism for environmental protection can continuously integrate enterprises and markets into the field of the environment, thereby giving rise to environmentally related products and services. Through lots of environmental protection measures, it is better to alleviate the problem of national environmental protection. The state promotes market protection through various financial and legal means, and it can also maximize the effective supply of the market, thereby achieving effective unity between the market, environment, and government. The specific limitations of China's market-oriented environmental protection are reflected in firstly, the incomplete trading of emission rights. Emission trading is a method of market-oriented treatment of pollutants and establishing a pollution permit system. However, this method has certain limitations, which means it cannot ensure the integration of environmental protection goals and the economic benefits of pollution discharge. However, the pollution trading system also has some advantages. Transaction permits not only minimize transaction costs, but also address the most critical issue of pollution control in the context of uneven environmental governance capabilities. Transaction permits precisely solve the cost problem. On the other hand, those who play a certain role in total quantity control and environmental target management can also effectively control environmental protection through pollution discharge permits. Secondly, the principle of polluter payment. There is a certain degree of uncontrollability regarding the payment made by the polluting party. For small and medium-sized enterprises, it is impossible to process every company quantitatively as various constraints. For environmental polluting units, reasonable control of pollution levels is also another challenge. Thirdly, the ideology of natural resources. If property rights are defined clearly, but it is still impossible to control effectively. The private or public ownership of natural resources are not able to guarantee their effectiveness. Combining the externalization and internalization of natural resources is more conducive to effectively optimizing allocation. For the pricing situation of natural resources, the balance of leverage such as product deposits, user fees, and pollution charges can effectively control the market-oriented mechanism of the environment. Fourthly, property rights issues. China's natural resources, which have always been undervalued, lack clear owners. Clarifying property rights, reasonable pricing, and rational utilization of environmental resources are market-oriented measures for environmental protection. Due to equal market competition, both parties involved in the exchange should adhere to altogether wins starting point, taking the exchange of market property rights as a prerequisite, which is good for the market-oriented allocation of environmental resources.[1]

3. The Applicability of Market Mechanisms in Environmental Protection

The applicability of market-oriented mechanisms in environmental protection is becoming a global focus, promoting active participation and effective management of environmental protection through market regulation and incentive mechanisms.

3.1. Environmental Damage Liability Insurance System

The environmental damage accountability insurance system is a method of collecting insurance premiums from insurance companies on the parties who cause environmental damage. However, in case of environmental damage caused by unexpected events, the relevant insurance companies shall provide the cost of environmental pollution control and economic compensation. By implementing market-oriented management, the transaction cost of environmental protection can be reduced, thereby improving the level of pollution control. In 1970, the environmental protection system appeared in the United States initially. The US insurance industry has developed significantly, with the expansion of this system. Its environmental insurance policy is a form of pollution contracting, and responsibility is also reflected in various expenses and losses incurred in environmental damage, property damage, or personal injury.[2] European countries also made various attempts between 1960 and 1990, continuously promoting the development of environmental damage liability insurance systems, including through insurance systems for aircraft, joint insurance groups setting liability insurance for insured persons, and workplace control. However, this method is influenced by technology, and countries need to hire experts to conduct continuous research to continuously improve the feasibility of the system.

The accountability insurance system for environmental damage needs to break through traditional methods to improve the ecological environment. At the same time, the development of China's insurance industry requires the integration of environmental protection, which can promote the development of China's financial industry. The scope of filing for the Environmental Litigation Law still needs to be further expanded in China. With the continuous determination of environmental rights, it is necessary to establish supporting measures between the environmental legal system and procedural law to ensure the realization of rights. Our country is not familiar with environmental insurance. We can first try using developed coastal areas, and once the trial is successful, we can introduce it to the mainland for development. In the environmental protection content of the litigation law, the conventional litigation law has a model of not filing a case and not hearing it. We should also cooperate with the power of groups, individuals, and social groups to act as agents. For developing countries, properly adjudicating the right to environmental protection is beneficial for taking responsibility for future generations. In order to first carry out restoration in severely polluted areas, and then solve it in underdeveloped areas with fewer populations. Everything is based on the concept of specific problem analysis, constantly cooperating with the double-edged sword of relief and administrative power.[3] When administrative agencies fail to fulfill their duties and administrative power is constrained, it not only damages the rights of the environment, but also insurance system. Environmental marketization is a necessary step for the continuous improvement of the socialist market economy and an inherent requirement of the sustainable development strategy. With the development of national economic increase, the workload of environmental protection gains too. The accountability insurance system for environmental damage is conducive to the country's control over environmental protection, can play an effective role in ensuring environmental protection, and can promote the future development of the insurance system furtherly.

3.2. Environmental Protection Tax Policies Complement Market-Oriented Development

The tax policy for environmental protection has a huge advantage, which is to restrict the intensity of environmental pollution and damage by charging economic fees. For producers seeking profits, the economic benefits consumed can help them reduce environmental damage. From the perspective of cost and benefit leverage analysis, most developed countries have implemented policies of levying taxes and fees on environmental pollution. The European Union Community, which first appeared in the 1970s, was the first country in Germany to impose environmental taxes on lubricants and develop relevant laws and regulations for wastewater discharge taxation. Subsequently, USA also imposed taxes on certain chemical substances. In the early 1990s, Sweden began to impose taxes on sulfur combustion, and subsequently other European countries also extensively revised environmental taxes. European countries generally establish environmental task forces or committees to fully examine the relationship between the environment and taxation. Through environmental and economic methods, control and negotiate to achieve unity. In some countries, such organizations are also granted significant powers and have introduced various laws, regulations, and economic taxation. The tax rates is different in varies countries. There are different charging methods for special items based on the differences in proportional tax rates, differential tax rates, and the differential taxation of different goods, as well as fixed tax rates. The scope of collecting taxes and fees is also relatively broad, ranging from three wastes to garbage taxes, etc., which has fundamentally improved the environmental problems in Western countries. European countries have also implemented market-oriented environmental protection systems, in conjunction with government efforts, as the most important policy.[4]

The tax system in China is mostly based on civil and commercial law, while the tax system in environmental law needs to constantly learn from Western countries. The current preferential methods for environmental protection tax in our country are still single, based solely on current tax exemptions and reductions. In terms of regulatory measures, environmental protection measures are also insufficient, which are not conducive to the market-oriented development of environmental protection in China. The regulatory mechanism needs to be established under the national environmental tax system. Expanding the scope of environmental protection and continuously levying taxes and fees on various environmental issues can help the environmental tax system continuously cooperate with market-oriented development. By drawing on the establishment of environmental tax committees and other institutions in developed Western countries, we continuously promote the marketization of environmental protection in China. Establish an environmental tax system that belongs to our country, starting from areas with heavy pollution or areas with heavy pollution, and continuously establish an environmental tax system that is in line with our national conditions. For the setting of tax types, I suggest that it is not appropriate to have too many at first. Instead, a gradual approach should be adopted to uniformly define the scope of collection for various types of waste and adopt measures such as differential tax rates. For the establishment of polluted water, the Ministry of Environmental Protection should appropriately reduce the collection of costs and change pollution taxes to local or central shared taxes, which could mobilize the enthusiasm of whole parties greatly.[5] For the scope of resource tax collection, various resources should be included in the protection scope, and the basis for tax calculation should be continuously improved. The calculation of production volume should be continuously adjusted through changes in self use quantity or sales volume. The environmental taxation policy is conducive to the environmental marketization.

3.3. Timely Improvement of the Pollutant Discharge Trading System

The emission trading system is the establishment of emission control measures that comply with laws and regulations and continuously control the scope of emissions. Through commodity trading style buying and selling methods, it plays a protective role in the environment. The emission trading system appeared in US initially. At that time, the United States stipulated that factories could control the emission range of pollutants through feasible or practical technologies. Through technical solutions and less consideration of the role of cost, the cost gradually increases, causing individual discharge outlets to continuously adjust. Through long-term improvement, a pollution trading system is established. Subsequently, the United States further adjusted its air quality by gradually replacing companies emitting toxic and harmful gases with low polluting fuels through different types of new technologies and doing its best in the plans of the environmental protection authorities to enable companies to gain more benefits. The surplus generated through emission rights is used as the cost of technology. The government has also significantly reduced license prices. The United States subsequently proposed a "bubble policy". That is to calculate the total amount of pollutants that can be absorbed, divide them into several parts to sell relative companies in order to discharge pollutants within reasonable range. When a company reduces pollution, it will prepare to expand production and establish new workshops or manufacturers.[6] The relative environmental government will support environmental protection by controlling pollutants. Until today, the United States has listed pollution credits on the US futures market, mainly in the areas of water and air pollution.

Emissions trading has a certain foundation in China. Since the late 1980s to the 21st century, China has formed early trading practices by transferring pollution permits and pollution rights to joint ventures to obtain compensation fees. In regional pollution trading pilot projects, China and the United States have formed alliances and cooperated to jointly control sulfur dioxide emissions. Until 2002, China established the first deal of emission trading. The State Environmental Protection Administration was established in Shanghai, with the relative pilot projects in different cities in China. Stable supporting rules for emissions trading need to be further established in China. Through effective measures of laws and regulations, gradually cooperate with the experimental results of pilot projects, and continuously improve unified supporting rules. The regional rules in different regions of the country are inconsistent, some conflict with each other, and some levels are insufficient and ineffective. To build the effective environmental regulations, it is good for a nation to improve the environmental problem.[7] The role of environmental market regulators is gradually changing for our government. The main body of emissions trading is the state, but there is a certain lag or blindness between the government and the law. Effective allocation of market resources is required. The intervention of pollutant discharge permits is a new phenomenon in China that requires strong measures from the government to continuously enhance intervention in the early stages of market establishment and ensure its healthy development. Develop a long-term leasing plan for emissions trading, continuously improve the sanctions mechanism, and implement measures such as emissions rights allocation and trading rules. At the same time, it is necessary to scientifically calculate the specific emission standards for pollutant discharge rights and limit the scope of the pollutant discharge rights trading system to only water pollution and air pollution. It is more appropriate to start from the key and difficult points and solve various environmental pollution problems with a targeted approach.

4. International Cooperation on Marketization Mechanisms for Environmental Laws

International cooperation plays a crucial role in the marketization mechanism of environmental protection law, jointly addressing global environmental challenges through cross-border cooperation and coordination.

4.1. The Trading System of Carbon Pricing Mechanism and Carbon Market

The trading system aims to incentivize enterprises to reduce carbon emissions through economic means, while promoting the development and application of low-carbon technologies. The establishment of a carbon emissions trading system could not be divided from government support. The government guides and regulates the operation of the carbon market through the establishment of carbon emission quotas, the formulation of carbon pricing mechanisms, and other means. To implement the carbon emission trading system, it is necessary to ensure fairness, impartiality, and transparency in transactions, as well as establish sound regulatory mechanisms and market rules. Regulatory authorities need to supervise and manage the operation of the carbon market, prevent manipulation and fraudulent behavior, and ensure the smooth progress of transactions. At the same time, the formulation of market rules needs to consider the interests and behavioral norms of market participants, ensuring the stability and healthy development of the market. In the carbon emissions trading system, enterprises are the main participants, and their participation and behavior are crucial for the stable and effective operation of the carbon market. Therefore, strengthening the supervision and guidance of enterprises, stimulating their environmental awareness and enthusiasm, is the key to the smooth implementation of the carbon emission trading system. In a whole, the carbon emissions trading system is probably an significant measure to face climate change. Achieving carbon reduction goals through market mechanisms requires the joint efforts of the government, regulatory agencies, and enterprises to establish a sound market mechanism and regulatory system, promote the climate change improved and development of the carbon market.[8]

The carbon pricing mechanism refers to determining the cost of carbon emissions, providing a price benchmark and trading basis for the carbon market. In the carbon pricing mechanism, the government can price carbon emissions through carbon taxes, carbon emission quota trading, and other means to guide enterprises and individuals to reduce carbon emissions. The carbon pricing mechanism can also stimulate research and development to apply low-carbon technologies, promoting economic transformation and low-carbon development. It is necessary to ensure fairness, impartiality, and transparency in transactions, and market mechanisms include the allocation of carbon emission quotas and trading rules. The regulatory system should improve the supervision and optimization of the carbon market to prevent the manipulation, fraud and market disorder. In the carbon market, enterprises are the main participants, and their behavior is crucial to the operation and effectiveness of the market. The government needs to strengthen supervision of companies for sake of promoting the conscious environmental protection.[9] In summary, the carbon pricing mechanism and carbon market are key measures to promote moderate gas emissions and improve climate change. It requires the joint efforts of the government, regulatory agencies, and enterprises to establish a sound market mechanism and regulatory system, promoting the development of the carbon market and solving the problem of climate change.

4.2. Theory and Practice of Ecological Compensation Mechanism

According to ecological compensation mechanism policy, ecological compensation mechanism is regarded as a mechanism to improve ecosystems by economic means, aiming at solving the problem of ecosystem. The functions and services of ecosystems often have the attribute of public goods, that is, once provided to one person or group, they can be enjoyed by other people or groups, and cannot exclude the use of others. In the design of ecological compensation mechanisms, it is necessary to take into account the characteristics of public goods and ensure fairness and efficiency. Meantime, the ecological compensation mechanism is another one of the solutions to externalities for the sake of internalizing external costs to encourage conservationists and destroyers of the ecological environment to bear corresponding responsibilities and costs. In practice, ecological compensation

mechanisms can be implemented through ecological protection taxes, ecological restoration funds, ecological rewards, and ecological compensation agreements to ensure the health and sustainable development of ecosystems. Therefore, the theoretical analysis of ecological compensation mechanisms needs to be based on promoting ecosystem protection and restoration, achieving altogether wins situation between economic development and the ecosystem.

The ecological compensation mechanism is widely used and continuously explored in practice, which is an important means of ecological protection. For example, by levying fees from water resource beneficiaries and using them for ecological environment restoration and protection, the enthusiasm of all parties has been effectively mobilized, improving the sustainable use of China's water resource compensation system. By establishing an ecological protection compensation fund to protect and restore the grassland ecosystem, the problems of excessive grassland development and ecological environment degradation have been effectively alleviated, achieving a better development of ecological protection and economic development. By purchasing carbon emission quotas or participating in carbon emission trading markets, enterprises have achieved compensation and offsetting of their own carbon emissions, while providing financial support for ecological protection projects and promoting the achievement of global carbon reduction targets. Meantime, the ecological compensation mechanism has been widely applied in areas such as ecological compensation contracts and ecological protection compensation agreements. Through the cooperation of government, enterprises, social organizations and other parties, ecological compensation projects have been jointly formulated and implemented, promoting the coordinated promotion of ecological protection and sustainable development. In summary, the ecological compensation mechanism has been widely practiced in natural resource management and ecological protection projects, making positive contributions to the protection and restoration of the ecological environment.[10]

4.3. Nature Conservation and Marketization of Biodiversity

The marketization of nature conservation is a new approach that focuses on promoting the rational utilization of ecological environment protection and natural resources through market transactions and economic incentive mechanisms and introduces market mechanisms in the fields of natural resource management and ecological protection. The traditional natural resource management model is often led by the government, but in a market economy system, the single government led management model is no longer able to adapt to the complex and ever-changing ecological environment and resource needs. By introducing market mechanisms, encouraging various stakeholders to participate in resource management and protection, promoting effective resource allocation and sustainable environmental development, market-oriented nature conservation endows natural resources with more economic attributes. For example, in the practice of ecological compensation, carbon emissions trading, and other fields, the marketization of nature conservation has achieved certain results. The altogether wins of economic benefits and ecological environment protection have been achieved through the establishing of economic incentive systems and marketization trading systems. Marketization of nature conservation emphasizes the marketization of ecological value and pricing issues. Natural resources and ecological environment have unique value, but their value is often not fully reflected in traditional market transactions. The marketization of nature conservation has established a market for ecological products and services, clarified the value of natural resources and ecological environment, and promoted their market-oriented pricing and trading. For example, the development and promotion of ecological products such as ecotourism and ecological agriculture not only enrich market supply, but also provide economic assistance for the protection of natural resources.[11] Incorporate carbon emissions into the scope of market-oriented management, achieve quantified pricing of carbon emissions, promote low-carbon economic development through mechanisms such as carbon emissions trading, and achieve carbon reduction

goals. The marketization of nature conservation, as a new model of resource management and ecological protection, provides new paths and ideas for achieving ecological civilization construction and sustainable development.

The marketization of biodiversity emphasizes market-oriented pricing and the trading of ecosystem services. Traditionally, people have often failed to fully realize the importance and value of the various services provided by ecosystems to humanity, leading to sustained loss of biodiversity and ecosystem decline. By establishing a market mechanism for ecosystem services, incentivizing various stakeholders to participate in biodiversity conservation and ecosystem management, promoting ecosystem restoration and protection, and commercializing biodiversity, various functions and services of the ecosystem are included in market transactions, clarifying their economic value and pricing rules. Through ecological compensation mechanisms and the development of ecological industries, the market-oriented value of ecosystem services has been realized, providing economic support and impetus for the protection of biodiversity. However, biodiversity is seriously threatened by human activities and is at risk of further decline and extinction. The marketization of biodiversity encourages various stakeholders to actively participate in the rational utilization and protection of biological resources through establishing a market trading mechanism and property rights system for biological resources, achieving sustainability in utilization and protection. By formulating regulations on the procurement and sales of biological resources and protecting the legitimate rights and interests of biological resources to promote sustainable development and utilization, the use rights and ownership of resources have been clarified. The marketization of biodiversity, as a new model of ecological protection and resource management, provides new ways and ideas for achieving ecological civilization construction and sustainable development.[12]

5. Conclusion

The current vision of global governance is to achieve sustainable economic development and ecological protection. By protecting and improving environmental quality, the stability and health of the ecosystem can be effectively maintained, the deterioration and pollution of the ecological environment can be reduced, and human health and survival can be guaranteed. Meanwhile, sustainable development is an important goal and direction of environmental protection, aimed at meeting the needs of current and future generations, and achieving coordinated economic, social, and environmental development. Sustainable development requires a focus on the rational utilization of resources and environmental protection, promoting the optimization of industrial structure and the transformation of production methods, achieving unity of economic interests, social equity, and environmental friendliness, while also taking into account economic growth. Secondly, achieving altogether wins situation between sustainable development and environmental protection requires the joint collaboration and efforts of the government, enterprises and the public. The government plays an important role in formulating policies, laws, and plans, and should strengthen environmental supervision and management, promote resource conservation and the implementation of sustainable development and environmental protection. As producers and consumers, enterprises should take the initiative to assume social responsibility, reduce resource consumption and emission pollution, actively participate in ecological investment and environmental protection industries and so on. Enhance environmental awareness and sense of responsibility, support government and enterprise environmental protection measures, actively participate in environmental protection actions and public participation, promote the deepening of sustainable development and environmental protection, and the public is the beneficiary of environmental protection as main body. Only with the joint efforts of the government, enterprises and the public can we achieve the altogether wins goals of prosperity of human society, promote the health, sustainable development and environmental protection.

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