



# Research on the Construction of Modern Public Environmental Governance System in China

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**Abstract.** The rapid industrialization process in China has brought many environmental problems. It is urgent to build a modern public environmental governance system. The key is to establish a scientific value system based on in-depth reflection and removal of institutional shortcomings of China's current system, adjust the structural relationship between government, market, and society, enhance social autonomy and self-governance, and maximize the vitality and creativity of all types of governance bodies in participating in public environmental governance. This study analyzes the current environmental governance system in China from three perspectives: value, structure, and mechanism. Construct a new public environmental governance structure that is in line with China's new model from these three perspectives. The current system has also been further improved.

**Keywords:** Public Environment, environmental governance, governance system

## 1 Introduction

China currently faces some of the most complex environmental problems in the world. Hacking<sup>[1]</sup>'s research suggests that the types and extent of environmental problems are closely related to economic growth and industrialization. The rapidly expanding economy has brought about a huge total amount of pollution emissions. Crowther TW<sup>[2]</sup> believe that the compressed industrialization process has brought about compound environmental problems. The "Dual Structure" of economic development has led to a trend of "Dualization" of environmental problems. Kurganova I<sup>[3]</sup> find that the concept of public environmental governance is difficult to meet the needs of real environmental governance; Ran<sup>[4]</sup> believes that the main problems stem from a single governing body and means of governance, as well as a low level of public participation. Sothe C<sup>[5]</sup> analyzes the basic situation of water governance in A city. The thesis is concerned with how to give full play to the leading position of the government in water governance. Pay attention to the regulating role of the market. Provide reference for the development of urban water environment governance in China With health and safety-related environmental risks becoming more and

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more prominent, environmental health issues are on the agenda, and these problems need to be solved urgently. Lamont K<sup>[6]</sup> concludes that we need to learn from the legislative systems of developed countries in soil pollution prevention and control. The proposed legislation on soil pollution prevention and control in China should be constructed on the basis of the actual situation in China. This is also a reflection of the government's authority and professionalism in environmental governance. With the rapid development of industrial production in China, the problem of environmental pollution is becoming increasingly serious. People do not anticipate the negative effects of highly developed industry enough, and prevention is not conducive, which leads to environmental pollution and ecological destruction. China has established a comprehensive environmental management system for the Yellow River and Yangtze River basins, which has increased environmental awareness and played a positive role in reducing pollution sources and protecting the environment. A modern public environmental governance system is a well-functioning and efficient structural and operational system that embodies the core values of modern society, coordinates the government's governance functions, gives full play to the market's role in resource allocation, and involves public participation in public environmental governance, under the macro framework of modernization of governance capacity.

## **2 Establishment of a Value System Compatible With Modern Public Environmental Governance**

Public environmental governance necessarily involves the selection and sorting out of values. In modern society, values are diversified, and different voices will appear, which will make us face the problem of choice in governance decisions. To establish a modern public environmental governance system, it is necessary to start from China's practice since reform and opening up. Draw on the excellent traditional Chinese governance culture, learn from advanced foreign governance ideas and practices, and establish a value system that is integrated with the national governance goals of contemporary China. In line with the core socialist values, and compatible with modern public environmental governance, based on the requirements of modernity, people's nature and public nature of modern social governance.

The most prominent problem with China's various social governance and regulatory systems is fragmentation. In the process of managing complex public affairs, the government-led single administrative mechanism is "dysfunctional," and traditional government management is facing increasing challenges and exposing more shortcomings. In terms of the concept of development and governance, the speed-oriented development model has become unsustainable. In terms of the management system, the "departmentalization" of management has dispersed power and resources among various departments, with functions misaligned and overlapping, and the comprehensive coordination and supervision system fragmented. In terms of the governance system, the "departmental" management system disperses power and resources among various departments, with misplaced and overlapping functions, and the lack of comprehensive coordination, consultation and decision-making capacity, as well as non-

conventional management, leads to ad hoc and inefficient responses to social actions. In terms of social cooperation, the key words for participation in environmental governance are still distance and unfamiliarity. In response to the current reality of social development, the central government has put forward five new development concepts: innovation, coordination, greenness, and openness, Sharing. These five concepts are the value orientation of the new changes in the modernization of China's governance capacity. From the perspective of China's current public environmental governance, this value system has a richer content. Its core development concept and governing philosophy is publicness and people-orientation, which is determined by the characteristics of social development at this stage, and is specifically manifested in the transformation of government and society from antagonism to dialogue, the promotion of "interaction rationality" or "communicative rationality," and the promotion of harmonious interpersonal, intergenerational, and harmonious human relations. The specific manifestation of this is that the government and society are moving from antagonism to dialogue, advocating "communicative rationality" or "communicative rationality," advocating harmonious interpersonal relations, intergenerational relations, and harmonious relations between human beings and nature, transforming the governing mode from traditional to modern, expanding openness and cooperation, sharing and common construction, and realizing the unity of the leadership of the Party and the government and the participation of diversified subjects in public affairs, the unity of management and service, and seeking unity in the governance of diversified social subjects. Focusing on the public nature and people's nature, we will establish a modern value system for public environmental governance with "innovation, coordination, greenness, openness and sharing" as its main content, promote the transformation of the government from an all-powerful government to a limited government, from a speedy developmental government to a regulatory developmental government, and from a government of power to a government of responsibility, and establish a "government-market-society" system. "government-market-society" integrated public governance system, strengthen the comprehensive coordination between the government and the society, and ensure that the vitality of the market and the society goes hand in hand with the strengthening of order, supervision and regulation, which is in line with the requirements of the times of China's reform and development, and provides theoretical, public opinion and psychological conditions for the promotion of public environmental governance.

### **3 Towards a New Public Environmental Governance Structure**

The construction of a public environmental governance system is a highly complex and systematic project. The governance structure of the public environment involves the allocation of status, power, and responsibility among the various governing bodies, which is directly related to the ability of each type of governing body to fully perform its governance function. Therefore, in order to promote the transformation of the public environmental governance system from fragmentation to systematization, it

is necessary to establish a systematic view of public governance, give top priority to the reform of the governance structure, and make systematic and scientific preparations for the environmental institutions and systems for the evaluation and allocation of resources and the environment, the exploitation and utilization, the monitoring and supervision, and the protection, restoration and reconstruction of resources and the environment, and to set up a unified supervision, strict law enforcement and multi-party participation system with the effective functioning of three major mechanisms of the government, the market, and the society.

The first step is to give full play to the leading role of the government. The two major causes of resource and environmental problems are market failure and government failure, both of which are closely related to development and inappropriate government institutional settings and policy distortions. At the same time, the environmental externalities of social and economic behavior and the public goods nature of environmental quality determine the need for public action to solve environmental problems. Environmental protection is an important area where the government must play a central role, and the government's environmental protection work should not be a gradual relaxation of regulations, but should be constantly strengthened regulations.

To give full play to the leading role of the government, the establishment of a strong governmental environmental management system and the continuous improvement of the governmental governance structure are the basic prerequisites. It is necessary to reform the basic system of environmental governance, rationally divide the functions of public environmental governance. Further, clarify the public environmental governance responsibilities and powers of all levels of government and all types of departments and units. Rationalize the institutional setup and responsibilities of all levels and types of development agencies and environmental regulatory agencies. Establish a unified regulatory mechanism to comprehensive coordination and decision-making mechanism, to ensure the overall and long-term benefits of environmental resources.

It is recommended that a strong and unified coordinating body for the supervision and management of the ecological environment be established at the national level. Accelerate the implementation of the vertical management system for monitoring, supervision and law enforcement of environmental protection agencies at the sub-provincial level. This will improve environmental regulatory authority and comprehensive decision-making capacity.

Subsequently, it is necessary to fully utilize market and scientific and technological means to govern and protect the environment. Enterprises are the mainstay of public environmental governance, and the mechanisms for assuming environmental responsibility must be strengthened. On the basis of giving full play to the leading role of the government and the role of the main body of environmental supervision. It is necessary to make full use of the market mechanism, adopt economic means, and through reasonable prices, taxes, subsidies, license trading, etc. Effectively combine incentive policies with control policies, internalize the external costs of the environment, and guide enterprises to set up a green supply chain, change the unsustainable mode of production, and shift to a sustainable mode of production and consumption, thus establishing a green and sustainable socio-economic system, which will also help re-

duce the cost of environmental governance. It is necessary to actively develop the environmental services industry, encourage the development and application of new environmental technologies, and encourage the private sector to invest in resource- and environmentally friendly production and environmental infrastructure projects.

The next step is to actively encourage social participation in public environmental governance. The socialization of public environmental governance is an important direction of environmental governance reform. Public environmental governance is a common endeavor of the whole society, the public is the main body of supervision and participation in public environmental governance, and public participation is of great significance to environmental governance. Compared with the role of the government, the environmental law is insufficient to define the environmental rights or interests of the public, and social organizations and individual citizens are weaker and have limited space to play a role in participating in environmental governance. In order to build a modern public environmental governance system. It is necessary to actively encourage the development of civil environmental protection organizations, to provide adequate organizational structures and institutional preparations for public participation in environmental decision-making, environmental protection consultation and environmental supervision, and to enhance the ability of social groups and the public to participate in public environmental governance and their awareness of environmental self-discipline.

#### **4 Improvement of Operational Mechanisms for Public Environmental Governance**

Establishing a long-term mechanism for government, market and society to collaborate in environmental governance and improving the operational mechanism of public environmental governance is the key to improving the government's environmental governance capacity and the ability of other types of governance bodies to participate in public environmental governance, as well as to enhance governance efficiency. The key is to take institutional innovation and innovation in governance as the driving force, highlighting institutional supply, and establishing a public environmental governance operational mechanism that is comprehensive in coverage, coordinated in objectives. Also synergistic in governance, centered on the enhancement of environmental standards and norms, quality monitoring and evaluation, monitoring and law enforcement, risk early warning, emergency response and control, environmental self-regulation, rights and interests protection, information disclosure, a credit system, and social participation.

In the first place, it is necessary to improve the internal operating mechanisms of the government and raise the level of governance. Based on integrating the functions of institutions, establish and improve the coordination mechanism and comprehensive decision-making mechanism of environmental governance among governments and departments, strengthen the ability of environmental regulatory departments to participate in economic and social macroeconomic regulation and control and comprehensive decision-making. As well as supervision and law enforcement, and shift the cen-

ter of gravity of governance resource allocation downward to give full play to the activeness and creativity of local governments. Based on establishing and improving the system of responsibility for environmental governance, set up a system of objectives for environmental governance. Establish a long-term working mechanism based on task objectives and responsibilities; establish a performance-oriented environmental budget system, improve the assessment system of environmental governance and environmental quality improvement, and strengthen the assessment of government environmental responsibility. Based on the tasks and objectives, implement the responsibilities and establish a long-term working mechanism. Establish a performance-oriented environmental budget system, improve the assessment system of environmental governance and environmental quality improvement, strengthen the government's environmental responsibility assessment and investigation mechanism, increased the assessment weight of ecological and environmental protection indexes. Strengthen the investigation of the responsibility of dereliction of duty and malfeasance of major environmental problems; allocate more resources to the environmental protection department in terms of human resources, funds and technical equipment, strengthen team building, and cultivate environmental protection personnel, and provide the environmental protection department with more resources. Resources in terms of manpower, funding and technical equipment for environmental protection departments, strengthen team building, and cultivate high-level environmental talents to better fulfill their duties in environmental supervision and services.

Next, it is necessary to innovate economic instruments based on market mechanisms to promote environmental governance and development transformation. The benefits of environmental governance relying too much on administrative means such as closure and transfer and penalties are limited, and it is necessary to establish a market system for environmental resources reflecting market supply and demand and the scarcity of resources, and to introduce taxes, fees and other economic measures based on the criterion of "the polluter pays". Make full use of resource price reform, green taxes and fees, green finance, environmental insurance, ecological compensation, emissions trading and other economic means to guide enterprises to enhance their awareness of green production, and promote the transformation of the public environmental governance model from end-to-end governance to source governance. Accelerate the construction of a system of assessment and appraisal of environmental pollution damages and compensation, and set up a credit system for corporate environmental responsibility to raise the cost of environmental pollution and the awareness of corporate environmental responsibility. Transform the mode of growth of trade, and adjust the relationship between trade and resources and the environment, shifting to improving quality, efficiency and optimizing the structure, to reduce the resource and environmental deficits. Formulate a "national environmental technology strategy" to promote the research and development of environmental science and technology as well as the development of the environmental service industry, to provide advanced technological support for the governance of public environment.

Finally, it is necessary to improve the social participation mechanism and establish an extensive system of social participation and communication and cooperation, so that the public can become the backbone of the drive to transform environmental

governance and development. It is necessary to establish a cooperation mechanism between the government and enterprises, social groups and the public, create a policy environment for social participation in public environmental governance. Promote the marketization and socialization of public environmental governance, explore diversified ways to solve environmental problems in various forms, which can not only alleviate the pressure on the government's financial and human resources, but also help to improve the efficiency of governance. Improve the consultation and dialogue mechanism for public environmental governance on the basis of universal trust between the government and enterprises, improve the consultation and dialogue mechanism for social groups and the public, and improve the communication and cooperation mechanism for social groups and the public to become the backbone of promoting environmental governance and development transformation. It is necessary to improve the consultation and dialogue mechanism for public environmental governance based on general trust, improve the institutionalized channels for social groups and the public to participate in decision-making, supervision and rights protection in public environmental governance. Broaden the scope of public participation based on environmental needs, optimize the methods and approaches for public participation in environmental governance, improve the system for monitoring and guiding environmental public opinion, improve the level of environmental protection information disclosure, and set up effective participation platforms and platforms for information disclosure and exchange. At the same time, it will build up general trust in information disclosure, participation and consultation and dialogue. It is necessary to actively establish and improve a professional and socialized environmental education and publicity service system that integrates family, school and society. We should set up an environmental education system, formulate an environmental hygiene and safety service handbook, popularize environmental protection knowledge and advocate an environmentally friendly culture, so as to effectively enhance the public's environmental awareness and their ability to participate in public environmental governance.

## 5 Discussion

Since the reform and opening up of China, China has made great achievements in economic development, but it is also facing unprecedented environmental problems. Serious environmental problems are bound to hinder sustainable economic and social development. Environmental governance is an important part of the modernization of the national governance system and governance capacity, and an important task in accelerating the construction of an ecological civilization system. In the face of the difficult situation of a weaker-than-expected recovery of the world economy and increased downward pressure on the domestic economy, how to improve China's environmental governance system has become an important issue in the current comprehensive deepening of reform.

Multiple subjects governance combined with collaborative governance, in addition to the government, social forces including individuals, enterprises, families, and various social organizations and institutions are all subjects of environmental governance

as a basic concept, often facing challenges in actual operation. At present, China's environmental governance system is still dominated by administration, i.e., the combination of unified supervision and management and hierarchical and subsectoral management. Completely rely on administrative means to force enterprises to environmental protection behavior are short-term, through sewage charges and other means of restraining corporate behavior, although a certain degree of success, but its constraints on the behavior is difficult to sustain, and even more difficult to effectively play a regulatory function. Government departments to cope with the lack of capacity has become the current node to improve environmental information transparency, step through the government dare to improve environmental information transparency node, in order to provide channels for the public to participate in environmental governance, improve the effect of participation.

## 6 Conclusions

This paper elaborates on the value orientation of the five perspectives of innovation, coordination, greenness, openness and sharing for the new changes in the modernization of China's governance capacity from the perspective of establishing a value system compatible with modern public environmental governance. From the perspective of building a new type of public environmental governance structure, the paper analyzes the three perspectives of giving full play to the leading role of the government, utilizing market and scientific and technological means to govern and protect the environment, and encouraging social participation in public environmental governance. Finally, from the perspective of improving the internal operation mechanism of the government, the perspective of innovating economic means based on the market mechanism and the perspective of improving the social participation mechanism, it puts forward the viewpoints on improving the operation mechanism of public environmental governance.

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