

Quantitative Study of Business Environment Policies for Individual Industrial and Commercial Households in the Yangtze River Delta Region^{*}

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Abstract

[Purpose/Significance] This study analyzes policies on the business environment for individual industrial and commercial households in the Yangtze River Delta region, providing reference for the formulation and optimization of subsequent policies. [Method/Process] Using content analysis, a three-dimensional analytical framework of “tools—objectives—regions” is constructed to conduct a quantitative study of policy texts concerning the business environment for individual industrial and commercial households in the Yangtze River Delta region, revealing the logic of policy combinations, implementation deviations, and governance dilemmas. [Results/Conclusion] At present, the three provinces and one municipality in the Yangtze River Delta region have formed differentiated policy implementation paths in creating a business environment for individual industrial and commercial households, but there remains room for further optimization in the allocation of policy tools, the coordination of policy objectives, and regional policy synergy.

Full Text

Quantitative Study of Business Environment Policies for Individual Industrial and Commercial Households in the Yangtze River Delta Region*

—Based on a Three-Dimensional Analytical Framework of “Tools—Objectives—Regions”

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Abstract: [Purpose/Significance] This paper analyzes business environment policies for individual industrial and commercial households in the Yangtze River Delta region, providing reference for subsequent policy formulation and optimization. [Method/Process] Using content analysis, it constructs a three-dimensional analytical framework of “tools—objectives—regions” and conducts a quantitative study of policy texts on the business environment for individual industrial and commercial households in the Yangtze River Delta region, revealing the logic of policy combinations, implementation deviations, and governance difficulties. [Results/Conclusions] At present, the three provinces and one municipality in the Yangtze River Delta region have formed differentiated policy implementation paths in building a business environment for individual industrial and commercial households, but there remains room for further optimization in the allocation of policy tools, the coordination of policy objectives,

and regional policy synergy.

Keywords: individual industrial and commercial households; business environment; policy tools; content analysis; Yangtze River Delta integration

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0 Introduction

The CPC Central Committee and the State Council attach great importance to the development of individual industrial and commercial households. General Secretary Xi Jinping has clearly stated that “we must actively help individual industrial and commercial households solve difficulties related to rent, taxes and fees, social insurance, financing, and other aspects, and provide more direct and more effective policy assistance” [1]. The successive promulgation of policy documents such as the *Regulations on Optimizing the Business Environment*, the *Regulations on Promoting the Development of Individual Industrial and Commercial Households*, and the *Three-Year Action Plan for Building a World-Class Business Environment in the Yangtze River Delta* has laid a solid policy foundation for the high-quality development of the business environment for individual industrial and commercial households in the Yangtze River Delta region. Data released by the State Administration for Market Regulation show that, by the end of September 2024, the number of registered individual industrial and commercial households nationwide had reached 125 million, accounting for 66.8% of all business entities [2]. As the region in China where the private economy started earliest and has reached the largest scale, in the Yangtze River Delta, individual industrial and commercial households, in stabilizing urban—

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...plays an irreplaceable role in rural employment, stimulating market vitality, facilitating consumption for people’s livelihoods, and promoting regional economic development; its business environment directly affects the effectiveness of the integrated development of the Yangtze River Delta.

At present, research on business-environment policies for individual industrial and commercial households in the Yangtze River Delta still lacks sufficient sys-

tematicity and depth. Existing studies mostly focus on business-environment evaluation and analysis of individual difficulties, and lack quantitative research integrating the three dimensions of “Yangtze River Delta + individual industrial and commercial households + policy texts.” Moreover, the construction of analytical frameworks and the application of scientific quantitative methods remain insufficiently rational; the structure of policy tools has not been clearly sorted out; policy objectives and supply pathways have not been explored in sufficient depth; and assessment of the regional layout of policies is still not sufficiently scientific[3], making it difficult to respond to the need for policy coordination in regional integration. Accordingly, this study takes policy texts on the business environment for individual industrial and commercial households in the Yangtze River Delta as its research object, constructs a three-dimensional framework of “tools—objectives—regions,” and, from the perspectives of policy-combination logic and regional coordination, analyzes the main characteristics, implementation status, and existing problems of these policies, thereby providing a theoretical basis for optimizing the business environment in the Yangtze River Delta and promoting the high-quality development of individual industrial and commercial households.

1 Literature Review

1.1 Research Related to the Business Environment in the Yangtze River Delta Region

Current research on the business environment in the Yangtze River Delta mainly focuses on two aspects. First, there are evaluative studies of the business environment in the Yangtze River Delta. For example, Liu Jian et al.[4] found that the business environment in the Yangtze River Delta exhibits a continuously optimized pattern of agglomerative convergence, spreading from Shanghai as the core toward Zhejiang and Jiangsu and forming a gradient effect, but that regional differences of “high in the south and low in the north” persist. Fan Haizhou et al.[5] showed that from 2010 to 2020, the overall development trend of the business environment in the Yangtze River Delta was favorable and improved year by year, but regional balance was insufficient; in terms of business-environment scores, the advantages of Jiangsu, Zhejiang, and Shanghai over Anhui were relatively prominent. Gu Xueqin et al.[6] selected 4 first-level indicators and 25 second-level indicators to calculate scores for business-environment construction in the three provinces and one municipality of the Yangtze River Delta, finding that Shanghai scored the highest, followed by Zhejiang, Jiangsu, and Anhui. Second, there are studies on the configurational allocation of the business environment in the Yangtze River Delta. Liu Yunqing et al.[7] found that the coordinated linkage of business-environment factors forms diversified configurational models; different types of cities in the Yangtze River Delta follow different paths in promoting economic development, but all can achieve high-quality urban economic development. Yan Liling[8] pointed out that a single business-environment factor is not a necessary condition for high-quality

development, but that the market environment plays a universal role. Business-environment ecosystems such as the market-led finance- and innovation-driven type, the government-market dual-logic talent- and innovation-driven type, and the market-government mutually reinforcing dual-strong-driven type can all promote high-quality urban development.

1.2 Research Related to Individual Industrial and Commercial Households

Existing research on individual industrial and commercial households can mainly be divided into three categories. First is research on relevant institutions. Tong Liechun[9] pointed out that individual industrial and commercial households are a type of business-entity system created in the practice of China's reform and opening up, constitute the largest category of market entities in China, and derive their vitality from fitting with the "family culture" characteristics of Chinese society. Xian Yan[10] argued that the commercial-subject status of individual industrial and commercial households should be established, their forms of organization simplified, and their transformation toward sole proprietorships and partnerships promoted. Second is research on the survival difficulties of individual industrial and commercial households. Liu Xueying et al.[11] found that individual industrial and commercial households face the problem of "duality" in identity, and that insufficient government services, difficulties in tax collection, and regional and sectoral imbalance have become important factors hindering their development. Hu Fei[12], through a questionnaire survey, found that individual industrial and commercial households commonly face problems such as rising operating costs, declining operating profits, increasing business closures and shutdowns, and insufficient access to support policies; they are under comprehensive pressure in production and operation and may even fall into survival difficulties. Third is research on credit evaluation of individual industrial and commercial households. Wu Haifeng et al.[13] found that the vast majority of individual industrial and commercial households' understanding of "credit" remains relatively simple

at this stage, the ways in which different individual industrial and commercial households accumulate credit differ significantly. Ren Junxia et al.^[14], based on the Feature Pyramid Full-Perception Feature Fusion (FPFF) algorithm and applying it to a Blending model-fusion framework, established a heterogeneous fusion model for credit evaluation of individual industrial and commercial households and endowed the model with interpretability. Hong Tianxu^[15], in a study on policy-compliance risks faced by public credit evaluation of individual industrial and commercial households, proposed compiling a "Policy Risk Assessment Form for Public Credit Evaluation of Individual Industrial and Commercial Households," so that local governments can conduct self-examinations by comparison.

1.3 Quantitative Research Methods for Policy Texts

At present, the main quantitative research methods for policy texts include content analysis, bibliometrics, text content mining, and related approaches. Content analysis starts from the content characteristics of policy texts, constructs an analytical framework, and studies policy meanings and evolution through manual or semi-manual coding; its process covers such steps as clarifying the problem, acquiring texts, constructing the framework, coding and classification, and statistical analysis. This method has been widely applied; the methods used in the studies of Wei Shuyan et al.^[16], Jiang Nan et al.^[17], Ma Zhong et al.^[18], Liu Cong et al.^[19], and Sun Caihong^[20] all fall into this category. Bibliometrics begins with the external structure of policy literature and some internal content features, and uses frequency statistics, keyword co-occurrence, network analysis, and other methods to describe policy distribution, mine policy themes and changes, and study cooperative relationships among policy-issuing institutions and policy citation networks, thereby assisting macro-level policy analysis. For example, Wei Xiao et al.^[21] took 63 business-environment policy texts in the Yangtze River Delta as research objects and, through semantic network graphs and co-occurrence network analysis, proposed plans for optimizing business-environment evaluation standards. Text content mining aims to realize automated text analysis, using text representation models to decompose texts into processable units, including text acquisition and word segmentation, algorithm selection and computational analysis, model evaluation and validation, and interpretation of results. It can mine large-sample or long-span policy texts. For example, Wan Baicheng^[22] used a dynamic topic model to obtain the aspects of business-environment policy concern in China's three major economic regions, and conducted comparative analysis of regional policies and dynamic evolution.

1.4 Literature Review

In summary, current research findings on the business environment and individual industrial and commercial households in the Yangtze River Delta region are already relatively abundant, but they display a “fragmented” character: business-environment studies emphasize evaluation rather than policy; studies of individual industrial and commercial households emphasize business operation rather than governance; and policy studies emphasize single-dimensional rather than multi-dimensional integration, making it impossible to reveal the combinatory logic and synergistic dilemmas of regional policies for individual industrial and commercial households. In view of this, on the basis of systematically reviewing business-environment policies for individual industrial and commercial households in the Yangtze River Delta region, this study adopts content analysis to construct a three-dimensional framework of “tools—objectives—regions,” thereby filling the theoretical gaps in existing research concerning regional coordination, policy combinations, and objective matching, and providing a reference for subsequent policy formulation and optimization.

2 Construction of the Policy Analysis Framework

Based on the policy content concerning the business environment for individual industrial and commercial households in the Yangtze River Delta region, this study constructs a three-dimensional analytical framework of “tools—objectives—regions,” as shown in Figure 1.

2.1 X Dimension: Policy Tools

Policy tools refer to the policy methods, instruments, and strategies adopted by decision-makers to achieve specific objectives^[23]. They can be classified into different types according to different criteria. Among them, the “supply-oriented—demand-oriented—environment-oriented” classification proposed by Rothwell and Zegveld^[24] can effectively align the selection of policy tools with the objectives to which they apply. Therefore, drawing on this theory, this study divides business-environment policies for individual industrial and commercial households in the Yangtze River Delta region into supply-oriented, demand-oriented, and environment-oriented categories^[17]. Supply-oriented tools refer to policy tools directly supplied by the government to promote optimization of the business environment, including infrastructure, fiscal support, talent services, and information technology; demand-oriented tools are those by which the government, in order to stimulate

the policy tools used for market demand, including government procurement, trade controls, overseas exchanges, and market shaping; environment-oriented tools refer to policy tools used to create a business environment, including tax and fee reductions and exemptions, financial support, laws and regulations, strategic measures, and intellectual property rights, as shown in Table 1.

[Diagram labels:

Y: Policy objectives for the business environment of individual industrial and commercial households;

X: Policy tools for the business environment of individual industrial and commercial households;

Z: Policy regions for the business environment of individual industrial and commercial households;

tool categories: supply-type, demand-type, environment-oriented;

regions: Shanghai Municipality, Zhejiang Province, Jiangsu Province, Anhui Province;

policy objectives: innovation environment, fiscal support, human resources, financial services, public services, market environment, government services.]

Figure 1 Policy analysis framework for the business environment policies of individual industrial and commercial households in the Yangtze River Delta region

Table 1 Classification and connotations of policy tools

Tool category	Tool name	Connotation of the tool
Supply-type	Infrastructure	Improve the supporting infrastructure required for the development of individual industrial and commercial households
Supply-type	Fiscal support	Provide direct financial support for the development of individual industrial and commercial households
Supply-type	Talent services	Provide talent safeguards for the development of individual industrial and commercial households
Supply-type	Information technology	Provide various types of information-technology service support for the development of individual industrial and commercial households
Demand-type	Government procurement	Purchase the products or services of individual industrial and commercial households through public bidding and other means
Demand-type	Trade controls	Regulate import and export matters for individual industrial and commercial households and improve customs-clearance efficiency
Demand-type	Overseas exchanges	Support individual industrial and commercial households in participating in overseas trade cooperation

Tool category	Tool name	Connotation of the tool
Demand-type	Market shaping	Regulate the market conduct of individual industrial and commercial households and purify the market environment
Environment-oriented	Tax and fee reductions and exemptions	Provide tax incentives, fee reductions and exemptions, etc. for individual industrial and commercial households to reduce operating costs
Environment-oriented	Financial support	Strengthen credit support for individual industrial and commercial households, optimize credit products, and improve financial services
Environment-oriented	Laws and regulations	Formulate laws and regulatory systems for the development of individual industrial and commercial households, including administrative law enforcement, government supervision, etc.
Environment-oriented	Strategic measures	Strategic measures adopted to promote the development of individual industrial and commercial households, such as establishing advanced models and promoting the dissemination of experience

Tool category	Tool name	Connotation of the tool
Environment-oriented	Intellectual property rights	Strengthen the protection and utilization of intellectual property rights for individual industrial and commercial households

2.2 Y Dimension: Policy Objectives

Policy objectives refer to the effects and purposes that decision-makers hope to achieve through the formulation and implementation of policies [25]. Some existing studies [26] have used the business-environment evaluation indicator systems formulated by the World Bank and the Economist Intelligence Unit, and have combined them with China's Guangdong Province, Zhejiang

Based on the actual conditions in provinces such as Shandong, from the perspectives of government affairs, rule of law, credit, finance, human resources, and other aspects, a business-environment evaluation system suited to China has been constructed. It not only integrates an international perspective but also takes into account specific domestic circumstances, enabling a comprehensive and systematic assessment of the business environment of Chinese cities [27]. Drawing on the World Bank's business-environment evaluation indicator system and domestic practice, this study classifies the objectives of policy text clauses into seven categories according to their semantic meanings: government services, market environment, public services, financial services, human resources, fiscal and tax support, and innovation environment, as shown in Table 2.

Table 2 Classification and Connotations of Policy Objectives for Business-Environment Policies for Individual Industrial and Commercial Households in the Yangtze River Delta Region

Policy objective	Specific connotation
Government services	Includes using "Internet +" to integrate government resources, enhance service capacity, optimize administrative approval, and facilitate registration for the establishment, change, and exit of business entities
Market environment	Regulate the conduct of market entities, break regional and industry monopolies, oppose unfair competition, and purify the market environment

Policy objective	Specific connotation
Public services	Provide basic services for market entities and facilitate their access to public resources, including institutional guarantees, policy publicity, Party-building guidance, resumption of work and production, etc.
Financial services	Improve the convenience with which market entities obtain financing, including strengthening credit support, optimizing credit products, deferring repayment of principal and interest, etc.
Human resources	Provide recruitment, employment, dismissal, employment services, employment and entrepreneurship subsidies, training, etc.
Fiscal and tax support	Through fiscal and tax measures, including rent reductions or exemptions for premises, reductions or exemptions of value-added tax, income tax, and insurance contributions, etc., reduce operating costs, enhance competitiveness, and promote the development of market entities
Innovation environment	Refers to the creation, utilization, and protection of intellectual property, including investment in scientific and technological R&D, transformation of scientific and technological achievements, etc.

2.3 Z Dimension: Policy Region

Policy region refers to the geographical area covered by policies. According to the *Development Plan for the Yangtze River Delta Urban Agglomeration* approved by the State Council, the provincial-level administrative regions of the Yangtze River Delta include Shanghai Municipality, Zhejiang Province, Jiangsu Province, and Anhui Province (hereinafter referred to as the “three provinces and one municipality”). This study focuses on business-environment policies for individual industrial and commercial households in the Yangtze River Delta region; the policy region referred to specifically denotes these “three provinces and one municipality.”

3 Selection and Coding of Policy Samples

3.1 Selection of Policy Texts

This study relied on the Wolters Kluwer China Law & Reference database to screen policies concerning the business environment for individual industrial and commercial households, and conducted supplementary searches on the official websites of the people's governments and market supervision administrations of the "three provinces and one municipality." The search rules were as follows: the keyword was "individual industrial and commercial households + business environment"; the geographic scope was limited to the Yangtze River Delta region, namely the "three provinces and one municipality"; the publication dates ranged from January 1, 2019, to December 31, 2024; the validity scope was limited to "currently effective"; the issuing bodies were limited to legislative organs and administrative departments at the provincial level of the "three provinces and one municipality"; and the policy types included local regulations, local government rules, and normative documents. To ensure precise semantic interpretation of policy clauses and avoid misjudgments, omissions, and deviations from the theme caused by intelligent scraping, this study manually screened the preliminary search results, ultimately obtaining 169 valid policy texts. Some of the policies are shown in Table 3.

Table 3 List of Business-Environment Policies for Individual Industrial and Commercial Households in the Yangtze River Delta Region (Partial)

No.	Name	Issuing unit	Document number	Implementation time	Region
1	<i>Several Policy Measures of Shanghai Municipality to Support the Healthy Development of Individual Industrial and Commercial Households</i>	Shanghai Municipal Administration for Market Regulation	Shanghai Market Regulation Registration (2022) No. 271	2022	Shanghai Municipality

Continued table

No.	Name	Issuing unit	Document number	Implementation time	Region
.....					
33	<i>Several Policy Measures on Promoting the High-Quality Development of Individual Industrial and Commercial Households</i>	General Office of the Jiangsu Provincial People's Government	Su Government General Office Regulation (2023) No. 3	2023	Jiangsu Province
.....					

No.	Name	Issuing unit	Document number	Implementation time	Region
85	<i>Several Opinions of the General Office of the Zhejiang Provincial People's Government on Fully Implementing the Regulations on Promoting the Development of Individual Industrial and Commercial Households and Promoting the High-Quality Development of the Individual Economy</i>	General Office of the Zhejiang Provincial People's Government	Zhe Government General Office Issuance (2023) No. 33	2023	Zhejiang Province
.....					

No.	Name	Issuing unit	Document number	Implementation time	Region
169	<i>Several Measures on Increasing Support for Individual Industrial and Commercial Households in Response to the Impact of the Epidemic</i>	Provincial Market Regulation Administration; Provincial Development and Reform Commission; Provincial Department of Finance; Provincial Department of Human Resources and Social Security; Provincial Department of Commerce; Provincial Local Financial Supervision Administration; Hefei Central Sub-branch of the People's Bank of China; Anhui Provincial	Wan Market Regulation Issuance (2020) No. 18	2020	Anhui Province

3.2 Policy Text Coding

This study used the qualitative analysis software Nvivo12 plus to conduct content analysis of 169 policy texts. On the basis of manual reading, policy-text provisions or sentences that could reflect the theme of the business environment for individual industrial and commercial households were selected as the units of analysis. Following the format of “policy number–chapter number–item number,” and according to the established three-dimensional analytical framework, coding and classification were carried out respectively along the three dimensions of policy tools, policy objectives, and policy regions, ultimately yielding 4,377 valid reference points. Among them, there were 1,504 reference points in the policy-tool dimension, 1,575 reference points in the policy-objective dimension, and 1,298 reference points in the policy-region dimension. Part of the coding process and results are shown in Table 4. It should be noted in particular that if a policy provision covered multiple policy tools, then that policy had to be coded multiple times according to the categories of tools. To ensure coding accuracy, this paper coded the units of analysis multiple times in both sequential and reverse order at different times; when discrepancies in coding results were found, consensus was reached through team discussion. Meanwhile, 10% of the sample of analysis units was selected and independently coded by two researchers; the coding consistency across all dimensions exceeded 80%, ensuring the reliability of the coding results.

Table 4 Example of the Policy Text Coding Process and Results (Partial)

Policy No.	Policy name	Unit of analysis	Code	Policy tool	Policy objective	Policy region
1	<i>Several Policy Measures of Shanghai Municipality to Support the Healthy Development of Individual Industrial and Commercial Households</i>	Provide free, public-interest recruitment channels for individual industrial and commercial household; they may use an “electronic business license” or the “Legal Person One-Certificate Pass” to log in without registration to the “Shanghai Public Recruitment New Platform” and post recruitment information, thereby	1-2-17	Supply-side	Human resources	Shanghai Municipality

Policy No.	Policy name	Unit of analysis	Code	Policy tool	Policy objective	Policy region
.....						

Continued table

Policy No.	Policy Name	Unit of Analysis	Code	Policy Tool	Policy Objective	Policy Region
17	<i>Key Points of Work of the Anhui Provincial Interdepartmental Joint Conference on Supporting the Development of Individual Industrial and Commercial Households</i>	Use monetary policy tools such as relending for supporting agriculture and small businesses to support financial institutions in expanding credit loans to individual industrial and commercial households..... further innovate financial products; encourage banking financial institutions to tailor financial product services with borrowing and re-	17-5-11	Environmental	Financial services	Anhui Province

4 Policy Text Analysis

4.1 Policy Overview

4.1.1 Release Time

From the perspective of release time, from 2019 to 2022 the issuance of business-environment policies for individual industrial and commercial households in the three provinces and one municipality showed a year-by-year upward trend (Figure 2). The main triggering factor during this period was the release of relevant policies at the national level. On October 22, 2019, in order to continuously optimize the business environment, the State Council promulgated the *Regulations on Optimizing the Business Environment* (State Council Order No. 722), which promoted the successive formulation by the three provinces and one municipality of support policies for optimizing the business environment in different fields. On October 1, 2022, the *Regulations on Promoting the Development of Individual Industrial and Commercial Households* (State Council Order No. 755) were issued, directly driving the formulation of policies related to the development of individual industrial and commercial households in the three provinces and one municipality, and producing a small peak in 2022. After 2023, the number of policy releases began to decline.

Figure 2. Policy Release Time Chart

4.1.2 Issuing Bodies

From the perspective of the entities issuing policies, the business-environment policies for individual industrial and commercial households in the three provinces and one municipality involve joint issuance by multiple entities. This paper uses Python and Gephy software to draw a network-structure diagram to show the joint issuance of documents by various departments, as shown in Figure 3.

Figure 3. Policy-Issuing Entities

The circle size in Figure 3 is proportional to the number of documents issued, and the line thickness is proportional to the frequency of jointly issued documents. By province, Shanghai involves 32 organizations, among which the Shanghai Municipal Finance Bureau, the Shanghai Municipal Development and Reform Commission, the Shanghai Municipal Commission of Economy and Informatization, and the Shanghai Municipal Human Resources and Social Security Bureau are the main joint issuers. Zhejiang Province involves 30 organizations, among which the Zhejiang Provincial Department of Human Resources and Social Security, the Zhejiang Provincial Department of Finance, the Zhejiang Provincial Taxation Bureau, and the Zhejiang Provincial Development and Reform Commission are the main joint issuers. Jiangsu Province involves 20 organizations, among which the Jiangsu Provincial Development and Reform Commission, the Jiangsu Provincial Department of Finance, and the Jiangsu

Provincial Administration for Market Regulation are the main joint issuers. Anhui Province involves 20 organizations, among which the Anhui Provincial Department of Commerce, the Anhui Provincial Administration for Market Regulation, and the Hefei Central Sub-branch of the People's Bank of China are the main joint issuers.

4.2 Single-Dimensional Analysis of Policy Texts

4.2.1 Policy Tool Dimension

From the perspective of policy tools, environmental policy tools are used most frequently, accounting for 61.70%; supply-side policy tools come next, accounting for 30.05%; demand-side policy tools are used least frequently, accounting for only 8.24%. This is shown in Figure 4.

Among supply-side policy tools, the three subcategories of information technology (10.77%), talent services (8.84%), and infrastructure (8.58%) account for roughly similar and relatively modest proportions. This indicates that, although national and local governments have introduced a series of policies to support the development of individually owned businesses, support in information technology, talent services, and infrastructure remains insufficient—for example, there is a lack of talent training, recruitment, and incentive mechanisms tailored to the characteristics of individually owned businesses. In addition, fiscal support tools (1.86%) focus on direct financial supply; constrained by fiscal limitations, their share in policy texts is usually relatively low.

Among environmental policy tools, the subcategories, in descending order of share, are tax and fee reductions/exemptions (19.68%), financial support (14.96%), laws and regulations (13.43%), strategic measures (9.04%), and intellectual property rights (4.59%); the first three categories together account for 48.07%. On the one hand, to effectively help market operators maintain stable operations and achieve sound development, government departments have introduced multiple support policies, including tax and fee reductions/exemptions, financial support, and laws and regulations, making every effort to help individually owned businesses operate steadily. On the other hand, these measures are intended to implement decision-making arrangements at the national level. On October 25, 2022, the State Council established an inter-ministerial joint conference system for promoting the development of individually owned businesses; on August 2, 2023, the Ministry of Finance and the State Taxation Administration issued the *Notice on Matters Concerning Further Support for the Development of Small and Micro Enterprises and Individually Owned Businesses*

The Announcement on Tax and Fee Policies (Announcement No. 12 of 2023 of the Ministry of Finance and the State Taxation Administration); on August 2, 2023, the Announcement of the State Taxation Administration on Matters Concerning the Further Implementation of Preferential Individual Income Tax Policies to Support the Development of Individual Industrial and Commercial

Households (Announcement No. 12 of 2023 of the State Taxation Administration) was issued. Against this background, the three provinces and one municipality have introduced corresponding supporting policies. However, insufficient attention to strategic measures and intellectual-property-related sub-tools will affect the competitiveness and long-term development of individual industrial and commercial households.

Figure 4. Frequency distribution results of policy tools

Bar-chart labels and values shown in the figure:

- **Supply-oriented** (452 items, 30.05%): infrastructure, 129 items, 8.58%; talent services, 133 items, 8.84%; information technology, 162 items, 10.77%; fiscal support, 28 items, 1.86%.
- **Environment-oriented** (928 items, 61.70%): strategic measures, 136 items, 9.04%; regulatory systems, 202 items, 13.43%; financial support, 225 items, 14.96%; tax and fee reductions/exemptions, 296 items, 19.68%; intellectual property, 69 items, 4.59%.
- **Demand-oriented** (124 items, 8.24%): overseas exchanges, 8 items, 0.53%; demonstration projects, 30 items, 1.99%; market shaping, 59 items, 3.92%; government procurement, 27 items, 1.80%.

Among demand-oriented policy tools, the proportions of sub-tools from high to low are market shaping (3.92%), demonstration projects (1.99%), government procurement (1.80%), and overseas exchanges (0.53%). It can be seen that, compared with the other two categories of policy tools, demand-oriented policy tools are used less frequently. Among them, the most frequently used sub-tool, market shaping, accounts for only 3.92%, indicating that policies for the business environment of individual industrial and commercial households provide relatively weak guidance.

4.2.2 Policy Target Dimension

From the perspective of the policy target dimension, the distribution of different targets shows certain differences, as shown in Table 5. Fiscal and tax support (19.11%), public services (24.13%), financial services (17.46%), and market environment (15.43%) all account for more than 15%. This indicates that, in recent years, in order to stabilize the development momentum of individual industrial and commercial households, the government has continuously strengthened fiscal, tax, and financial support, optimized and improved the level of public services, and worked to create a fair and orderly market environment, thereby helping business entities develop soundly and operate stably. By contrast, the proportions for innovation environment (4.32%), human resources (6.98%), and government services (12.57%) are relatively low. This may be because most individual industrial and commercial households have limited funds and resources, and their output value and tax contribution rates are not high; investment in talent cultivation and technological innovation is therefore relatively limited. As a result, the construction of an innovation environment, human resources,

and government services for individual industrial and commercial households is easily overlooked.

Table 5. Frequency distribution of policy targets

Policy target	Reference points (items)	Proportion
Fiscal and tax support	301	19.11%
Innovation environment	68	4.32%

Continued table

Policy objective	Reference points (items)	Proportion
Public services	380	24.13%
Financial services	275	17.46%
Human resources	110	6.98%
Market environment	243	15.43%
Government services	198	12.57%

4.2.3 Policy regional dimension

From the perspective of the policy regional dimension, the province with the largest number of policy issuances is Jiangsu Province (30.97%), followed by Zhejiang Province (27.27%), Anhui Province (21.80%), and finally Shanghai Municipality (19.95%), as shown in Table 6. This is related to the share of individual industrial and commercial households in the economies of different regions. The private economies of Jiangsu and Zhejiang are relatively developed, and the shares of individual industrial and commercial households in both provinces exceed 60%^[28-29]; by contrast, the number and share of individual industrial and commercial households in Shanghai are far below the national average. As of June 2024, Shanghai had about 510,000 individual industrial and commercial households, accounting for only 15% of all market entities, mainly playing a role in meeting basic employment needs and safeguarding people's livelihoods. Although the share of individual industrial and commercial households in Anhui Province is relatively high (68.8%)^[30], the province places greater emphasis on developing high-tech industries and strategic emerging industries, such as new-energy vehicles, liquid-crystal displays, and semiconductors, resulting in relatively fewer supportive policies for traditional individual industrial and commercial households. It can be seen that the frequency with which governments issue supportive policies for individual industrial and commercial households is influenced by factors such as regional economic structure, development orientation, and the degree of association with residents' employment, and represents a comprehensive consideration of local economic development and prosperity.

Table 6 Distribution of frequencies by policy region

Policy region	Reference points (items)	Proportion
Shanghai Municipality	259	19.95%
Zhejiang Province	354	27.27%
Jiangsu Province	402	30.97%
Anhui Province	283	21.80%

4.3 Analysis of the policy-text intersection dimension

4.3.1 Analysis of the “X-Y” intersection dimension

The cross-distribution of policy instruments and the sub-instruments of policy objectives is statistically analyzed, as shown in Figure 5. The realization of policy objectives for the business environment of individual industrial and commercial households in the Yangtze River Delta region makes comprehensive use of multiple policy instruments, but there is a relatively obvious problem of imbalance. Specifically, in terms of fiscal and tax support, environmental policy instruments are mainly used: exemptions from value-added tax and income tax, reductions or exemptions of insurance fees, and other means are adopted to create a more relaxed operating environment. In terms of the innovation environment, the main instrument used is “intellectual property” among environmental policy instruments; by strengthening the protection of rights such as trade names, trademarks, patents, copyrights, geographical indications, and trade secrets of individual industrial and commercial households, the innovation environment is improved. In terms of public services, a relatively wide range of policy-instrument types is used, mainly “laws and regulations” and “strategic measures” among environmental policy instruments. In terms of financial services, “financial support” among environmental policy instruments is mainly used to alleviate the financial pressure on individual industrial and commercial households, reduce financing costs, and improve financing efficiency. In terms of human resources, the main instrument used is the

“Talent services” refers to activities such as skills training for individual practitioners to improve the level of human resources. In terms of the market environment, the main approach is to create a fair and orderly operating environment for individual industrial and commercial households through “laws and regulations” among environment-oriented policy tools and “market shaping” among demand-oriented policy tools. In terms of government services, the focus is mainly on “infrastructure” and “information technology” among supply-oriented policy tools, using government service platforms to promote the handling of high-frequency matters for individual industrial and commercial households online, on mobile devices, and in a single visit.

Figure 5. Frequency distribution chart for the policy tool-policy target cross-dimension

4.3.2 “X-Z” Cross-Dimensional Analysis

The cross-distribution of policy tools and the sub-tools of policy regions is shown in Figure 6. The three provinces and one municipality are relatively similar in their combinations of the three major categories of policy tools: environment-oriented policy tools are used the most, followed by supply-oriented tools, while demand-oriented tools are used the least. This is consistent with the results of the single-dimensional analysis of policy tools. However, the use of some policy sub-tools varies in emphasis across different regions. For example, “tax reductions and exemptions” adop—

Figure 6. Frequency distribution chart for the policy tool-policy region cross-dimension

used more frequently in Shanghai Municipality and Zhejiang Province; “intellectual property” and “government procurement” are used more frequently in Anhui Province; “financial support” and “market shaping” are used more frequently in Zhejiang Province; and “infrastructure,” “talent services,” “information technology,” “strategic measures,” and “regulatory systems” are used more frequently in Jiangsu Province.

4.3.3 Analysis of the “Y-Z” Cross Dimension

The cross-distribution of the two dimensions—policy objectives and policy regions—was calculated, as shown in Table 7. In terms of policy objectives across different regions, Shanghai Municipality emphasizes fiscal and tax support; Zhejiang Province emphasizes financial services, public services, and the market environment; Jiangsu Province emphasizes public services and the market environment; and Anhui Province emphasizes the innovation environment. Overall, Zhejiang Province and Jiangsu Province have broader coverage of policy objectives, whereas Shanghai Municipality and Anhui Province respond more weakly to policy objectives. The differences among regions are evident, which may reduce regional coordination because of the dispersion of objectives.

Table 7 Frequency distribution results for the policy objective-policy region cross dimension

(Unit: items)

Policy objective	Shanghai Municipality	Zhejiang Province	Jiangsu Province	Anhui Province
Fiscal and tax support	76	59	55	62
Innovation environment	1	20	19	68

Policy objective	Shanghai Municipality	Zhejiang Province	Jiangsu Province	Anhui Province
Public services	65	85	127	22
Financial services	46	92	45	52
Human resources	23	27	35	15
Market environment	54	74	71	34
Government services	35	53	52	46
Total	300	410	404	299

5 Summary and Analysis of Policy Implementation Paths

Based on the above analysis, this study further integrates the three dimensions, extracts regional development characteristics, and identifies seven typical paths in the combinations of “policy objectives + policy tools” for the three provinces and one municipality, as shown in Figure 7. From the perspective of regional policy paths, the three provinces and one municipality have formed policy systems with clear goal orientation and differentiated combinations of tools. Shanghai Municipality mainly takes fiscal and tax support as its core policy objective; in terms of tool configuration, it emphasizes “tax and fee reductions/exemptions” among environmental tools and “infrastructure” among supply-oriented tools. Zhejiang Province focuses on three major policy objectives: government services, market environment, and financial services. Under the government-services objective, it primarily relies on “infrastructure” and “information technology” among supply-oriented tools and on “regulatory systems” among environmental tools; under the market-environment objective, it makes integrated use of “regulatory systems” among environmental tools and “market shaping” among demand-oriented tools; under the financial-services objective, it highlights “financial support” among environmental tools and “information technology” among supply-oriented tools. Jiangsu Province mainly concentrates on two major policy objectives: public services and human resources. Under the public-services objective, it emphasizes “regulatory systems” and “strategic measures” among environmental tools, as well as “information technology” among supply-oriented tools; under the human-resources objective, it takes “talent services” among supply-oriented tools and “financial support” among environmental tools as the core sup-

port. Anhui Province primarily takes the innovation environment as its policy objective, focusing on the use of “intellectual property rights” among environmental tools and “overseas exchange” among demand-side tools.

Figure 7. Implementation paths for business-environment policies for

individual industrial and commercial households in the Yangtze River Delta region

In summary, the three provinces and one municipality have already formed differentiated policy implementation paths, but the following shortcomings remain. First, the configuration of policy tools still needs to be optimized. Existing policies mostly rely on supply-side tools such as information technology, talent services, and infrastructure to improve the business environment, while using environmental tools such as tax and fee reductions, financial support, and regulatory systems to reduce implementation barriers. By comparison, demand-side tools—which are better able to aggregate social forces and exert the guiding effect of the market—remain insufficiently applied. Subcategories such as overseas exchange, government procurement, capital investment, and demonstration projects are used relatively infrequently, indicating that there is still room to optimize the overall configuration of policy tools. Second, coordination among policy objectives needs to be improved. Existing policies place greater emphasis on objectives such as public services, fiscal and tax support, financial services, and the market environment, while paying relatively limited attention to human resources and government services. Their emphasis on empowering the development of individual industrial and commercial households through the innovation environment is also evidently insufficient, which to some extent constrains the cultivation of their market competitiveness and the accumulation of momentum for long-term development. Third, regional policy coordination needs to be strengthened. When formulating policies and regulations related to individual industrial and commercial households, the three provinces and one municipality mostly proceed from local development conditions and practical needs, resulting in a certain degree of regional differentiation in policy design. Jiangsu and Zhejiang have solid foundations in the private economy and a high proportion of individual industrial and commercial households; their policies focus more on supporting the development of the individual economy, stabilizing employment, and stimulating market vitality. Shanghai, in light of its own economic structure, urban functional positioning, and employment characteristics, places emphasis in its relevant policies on the role of individual industrial and commercial households in safeguarding people's livelihoods and absorbing basic employment. Anhui, meanwhile, focuses on the layout of high-tech industries and strategic emerging industries, and its support measures for traditional individual industrial and commercial households are relatively limited. This pattern is related to differences in regional development positioning and industrial structure among the three provinces and one municipality. If integrated policy synergy focused on the high-quality development of individual industrial and commercial households can be further promoted, and if the cross-regional allocation of high-quality resources can be facilitated, it will help improve the overall effectiveness of coordinated development among individual industrial and commercial households in the Yangtze River Delta region.

[References]

- [1] Xi Jinping. Speech at the Entrepreneurs' Symposium [EB/OL]. (2020-07-21) [2025-10-20]. http://www.qstheory.cn/yaowen/2020-07/21/c_1126267637.htm.
- [2] Xinhua News Agency. Chart: The number of registered individual industrial and commercial households nationwide reaches 125 million [EB/OL]. (2024-11-08) [2025-11-10]. https://www.gov.cn/zhengce/jiedu/tujie/202411/content_6985570.htm.
- [3] Hong Chuang, Li Zhongming, Xu Jinteng. Quantitative research and implications of China' s health information service policies for older adults—based on a three-dimensional analytical framework of “tools-objectives-subjects” [J]. *Modern Information*, 2024, 44(8): 99–109.
- [4] Liu Jian, Li Xiaowen. Evaluation, spatiotemporal evolution, and convergence analysis of the business environment in the Yangtze River Delta region [J]. *Journal of Chongqing Three Gorges University*, 2023, 39(6): 56–70.
- [5] Fan Haizhou, Yu Menglu. Evaluation of the Development Level of the Business Environment in the Yangtze River Delta Region and Analysis of Differences [J]. *Journal of Xiamen University of Technology*, 2022, 30(6): 64–70.
- [6] Gu Xueqin, Li Yudong, Yu Hongxin. Policy Measures and Effect Evaluation of the Business Environment in the Yangtze River Delta Region [J]. *China Business and Market*, 2020, 34(6): 86–95.
- [7] Liu Yunqing, Tu Yingqi, Wu Yiting. Research on the Path by Which the Business Environment in the Yangtze River Delta Promotes High-Quality Economic Development—An fs-QCA Analysis Based on Data from 41 Cities [J]. *Journal of Anhui Agricultural University (Social Sciences Edition)*, 2024, 33(2): 101–111.
- [8] Que Lijun. Research on Configurational Paths for Optimizing the Business Environment—Taking the Yangtze River Delta Urban Agglomeration as a Sample [J]. *Theoretical Observation*, 2023(1): 91–94.
- [9] Tong Liechun. On the System of Individual Industrial and Commercial Households in Normal Markets [J]. *Journal of Zhejiang Gongshang University*, 2020(2): 63–72.
- [10] Xian Yan. Integration and Reshaping of the System of Individual Industrial and Commercial Households [J]. *Theory and Reform*, 2014(2): 84–87.
- [11] Liu Xueying, Liu Yongkui. Research on the Current Situation, Problems, and Countermeasures of Employment and Entrepreneurship among Individual Industrial and Commercial Households [J]. *China Labor*, 2023(2): 5–16.
- [12] Hu Fei. Main Difficulties and Countermeasures Currently Facing the Development of Individual Industrial and Commercial Households [J]. *China Economic & Trade Herald*, 2022(11): 72–73.

- [13] Wu Haifeng, Yang Wen. Research on Issues in the Credit Evaluation of Individual Industrial and Commercial Households [J]. China Market Regulation Research, 2023(12): 5-12.
- [14] Ren Junxia, Chen Ruiyong, Ye Yuxuan, et al. Research on Credit Evaluation of Individual Industrial and Commercial Households Based on FPDF-Blending Model Fusion [J]. Credit Reference, 2023, 41(4): 64-71.
- [15] Hong Tianxu. Policy Compliance Risks Faced by Public Credit Evaluation of Individual Industrial and Commercial Households: Identification and Optimization [J]. China Market Regulation Research, 2024(5): 18-24.
- [16] Wei Shuyan, Li Fuyu. Strategies for Selecting Policy Tools in China's Business Environment Governance—A Content Analysis Based on 51 Policy Texts [J]. Journal of Northeast Normal University (Philosophy and Social Sciences Edition), 2024(3): 31-44.
- [17] Jiang Nan, Cao Xianqiang. Selection and Allocation of Policy Tools for Optimizing the Business Environment—A Content Analysis Based on Central-Level Policy Texts [J]. Public Administration and Policy Review, 2023, 12(1): 96-113.
- [18] Ma Ran, Ma Shuai. Research on the High-Quality Development of China's Optimization of the Business Environment from the Perspective of Policy Tools [J]. Chongqing Social Sciences, 2021(11): 106-118.
- [19] Liu Cong, Gao Jin. How Can Cities Optimize the Business Environment by Effectively Using a "Combination Punch" of Policy Tools?—A Configurational Analysis Based on 46 Cities [J]. Journal of Guangdong University of Finance & Economics, 2025, 40(2): 104-117.
- [20] Sun Caihong. Characteristics and Improvement Paths of Policy Tools for Optimizing the Business Environment in the New Era [J]. Journal of Shandong Academy of Governance, 2025(4): 33-41.
- [21] Wei Xiao, Yang Jing, Zhou Lijun, et al. Optimization of Business Environment Evaluation Standards Based on Policy Characteristics—Taking the Yangtze River Delta as an Example [J]. Standard Science, 2022(8): 21-26.
- [22] Wan Xiaocheng. Research on Quantitative Evaluation of Business Environment Policy Texts [D]. Wuhan: Zhongnan University of Economics and Law, 2022.
- [23] Ding Huang, Yang Daifu. Perspectives, Research Approaches, and Model Construction for the Selection of Policy Tools [J]. Administrative Tribune, 2009, 16(3): 21-26.
- [24] Rothwell R, Zegveld W. An Assessment of Government Innovation Policies [J]. Review of Policy Research, 1984, 3(34): 436-444.
- [25] Gao Ge. Research on Policy Texts of Basic Pension Insurance for Urban Employees—Based on a Three-Dimensional Analytical Framework of Policy

Tools, Policy Objectives, and Policy Actors [J]. Journal of Beijing University of Aeronautics and Astronautics (Social Sciences Edition), 2023, 36(3): 133-142.

[26] Lou Chengwu, Zhang Guoyong. Construction of a Business Environment Evaluation Framework Based on the Subjective Perceptions of Market Entities—With a Review of the World Bank’s Doing Business Evaluation Model [J]. Contemporary Economic Management, 2018, 40(6): 60-68.

[27] Du Yunzhou, Liu Qiuchen, Cheng Jianqing. What Kind of Business-Environment Ecology Produces High Urban Entrepreneurial Vitality?—An Analysis Based on Institutional Configurations [J]. Management World, 2020, 36(9): 141-155.

[28] People’s Government of Jiangsu Province. Jiangsu Carries Out Precise Assistance for Individual Industrial and Commercial Households by Type and Category [EB/OL]. (2024-07-29) [2026-05-18]. https://www.jiangsu.gov.cn/art/2024/7/29/art_90848_11308179.htm

[29] Xinhuanet. The Number of Business Entities in Zhejiang Reaches 10.9517 Million [EB/OL]. (2025-01-08) [2026-05-18]. <https://www.news.cn/20250108/076939d356d441ec85cd8882e44dcd5c/c.html>.

[30] Anhui Provincial Administration for Market Regulation. Development of business entities across the province as of the end of September 2024 [EB/OL]. (2024-10-30) [2025-11-01]. <https://amr.ah.gov.cn/xwdt/mtjjx/twbd/149667781.html>.

Quantitative Research on the Business Environment Policies for Individual Industrial and Commercial Households in the Yangtze River Delta Region—Based on the Three-Dimensional Analytical Framework of “Tool-Goal-Region”

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Abstract: [**Purpose/Significance**] This study analyzes the business environment policies for individual industrial and commercial households in the Yangtze River Delta region, aiming to provide references for the formulation and optimization of subsequent policies. [**Method/Process**] Using the content analysis method, a three-dimensional framework of “tool-goal-region” is constructed to conduct quantitative research on the policy texts regarding the business environment for individual industrial and commercial households in

the Yangtze River Delta, thereby revealing the logic of policy combinations, implementation deviations, and governance dilemmas. [**Result/Conclusion**] At present, the three provinces and one municipality directly under the Central Government in the Yangtze River Delta have formed differentiated policy implementation paths in improving the business environment for individual industrial and commercial households. However, there is still room for further optimization in the allocation of policy instruments, the overall coordination of policy objectives, and the synergy of regional policies.

Keywords: Individual industrial and commercial households; Business environment; Policy tools; Content analysis; Yangtze River Delta integration

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