Research on the Mechanism of Accurately Implementing Fiscal and Taxation Policies in the Greater Bay Area: Taking Technological Innovation as the Entry Point

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ABSTRACT
The Greater Bay Area is one of the power sources of technological innovation. In recent years, the party and the government have relied on the Silicon Valley advantages of its technological innovation and fiscal and taxation policies to induce enterprise intelligence. Its regional innovation and technological power and capabilities rank first in the country. Based on this, this paper uses the policies to support technological innovation as a carrier, sorts out the innovation situation of enterprises in the Greater Bay Area, gains insight into the current government's new problems and new situations in the precise implementation of policies encouraging enterprise innovation, builds a collaborative innovation mechanism between technology and policy, and puts forward lasting and effective enterprise technological innovation suggestions.

Keywords: *Pearl River Delta, Hong Kong and Macau SAR (Special Administrative Region), Fiscal and taxation policies, Technological innovation, Mechanism.*

1. INTRODUCTION

Creative destruction stems from technological innovation. Innovation-driven is not only the engine of enterprise development, but also the cornerstone of connotative economic development. Technological innovation has the attributes of a public product. It can release the positive externalities of "bigger technological innovation capability than ten universities", and it can also overflow the negative external effects of "shortcomings of financial technology investment, risk accumulation, and continuous insufficient motivation", thereby inhibiting the high-quality development of the Bay Area economy. The government not only pays attention to the positive energy of public products such as enterprise technological innovation, but also should be aware of the negative external effects of technological innovation. To this end, the Greater Bay Area government has successively introduced various supportive innovation-driven policies such as tax reductions and exemptions, financial subsidies, etc., to stimulate the enthusiasm of enterprises in innovation, and contribute to the economic and social welfare of the Bay Area. Sublimation provides eternal power, which has primary practical value and academic significance.

2. THE STATUS QUO OF TECHNOLOGICAL INNOVATION IN ENTERPRISES IN THE GREATER BAY AREA

2.1 The Scale of Technological Innovation of Enterprises in the Greater Bay Area

In recent years, the Guangdong-Hong Kong-Macao Greater Bay Area has used innovation as the carrier to create the enterprise technology Silicon Valley in China and even the Bay Area. The two-wing driving ability of enterprise technology innovation has become increasingly prominent. An industrial system with industrial agglomeration and spillover effects has been formed, and the results have been marketized in an orderly manner. During operation, the scale of corporate R&D investment is increasing.

The 2020 "Guangdong Province Science and Technology Statistical Yearbook" shows that Guangdong Province has invested as much as 309.85 billion yuan in R&D in 2019, of which the R&D expenses of enterprises in the Greater Bay Area accounted for more than 95.61%, and there were 23,617 high-tech enterprises, an increase of 4346 during the year, and the number of patents.28 pieces per 10,000 people, with a technical contribution rate of 67%, and its innovation capability ranking first in the country. According to the data of the "China Regional Innovation Capability Evaluation Report 2020", [1]Guangdong Province has a score of 80.27 for the comprehensive indicator of enterprise innovation, and the Greater Bay Area is estimated to have a score of 78, which is unique.

The main force of double-zone innovation for enterprises in the Bay Area, innovation and R&D funds have been rising year by year, and the advantages of location aggregation are prominent as shown in "Table 1".

Table 1. R&D expenses and output of new technology products of enterprises in the Greater Bay Area and enterprises in various provinces in 2019

	R&D topics (items)	R&D investment (100 million yuan)	R&D's share of the country (%)	New technology product R&D projects	New technology product R&D expenditures (100 million yuan)	New technology product R&D expenses account for the national proportion (%)	New technology products Revenue (100 million yuan)
National	685213	17240.2		671799	16985.7		212060.2
Greater Bay Area	224301	2762.4	16.02	146000	3800	22.37	42723.4
Guangdong	224904	2961.6	17.18	146954	3865	22.75	42970.1
Beijing	177259	1845.6	10.71	12142	424.5	2.50	5220.2
Jiangsu	203119	2653.3	15.39	95797	2701.3	15.90	30101.9
Shanghai	99596	1462.4	8.48	20836	851.6	5.01	10140.9
Zhejiang	189699	1758.1	10.20	110063	1531.7	9.02	26099.3

a Data source: China Science and Technology Statistical Yearbook 2020

2.2 *Dual-zone Innovation Drive Leads the Rapid Development of Enterprises*

In terms of Guangdong's scientific and technological dynamic data in 2020, there are 48,353 companies in the Bay Area in 2019, and 4,952 companies have been assessed and put into the database. Their output value is as high as 5,994.452 billion yuan, accounting for 55.67% of the province's total GDP and more than 96% of technological innovation. In 2019, in terms of independent innovation and development in the National Independent Innovation Demonstration Zone, the Greater Bay Area government has successively formulated policies such as tax concessions and financial subsidies, stationed in 18,890 high-tech enterprises and introduced 6,037 doctors, 69219 masters, 44 innovation and entrepreneurship teams, and 77 leading talents. People, forming the driving force for the innovation and development of technology companies in Silicon Valley and service alliances.

2.3 *Enterprises in the Bay Area Have Sufficient Driving Force for Independent Innovation and Development, Steadily Improving the Ability to Transform Scientific and Technological Achievements, and Enterprise R&D Personnel as "Locomotives"*

From 2014 to 2019, the number of companies engaged in R&D innovation also showed an upward trend. In 2019, companies engaged in R&D in the Bay Area accounted for 68.82% of enterprises above designated size in Guangdong. The company owned 23,000 R&D institutions, applied for 1,96031 invention patents (accounting for 96.42% of Guangdong high-end patents), and 58211 patents were granted, and the achievement marketization index Close to 96.8%.

From the perspective of technology market contract turnover, from 2014 to 2019, it increased from 50.9 billion yuan to 226.935 billion yuan, and the transaction amount increased significantly. The average turnover in the five years was 672.804 billion yuan (see "Figure 1"). From the perspective of the revenue elements of new technology products, its revenue in 2019 was 425.372 billion yuan, still ranking first in the revenue of new technology products of enterprises on a national scale.(See "Figure 2")

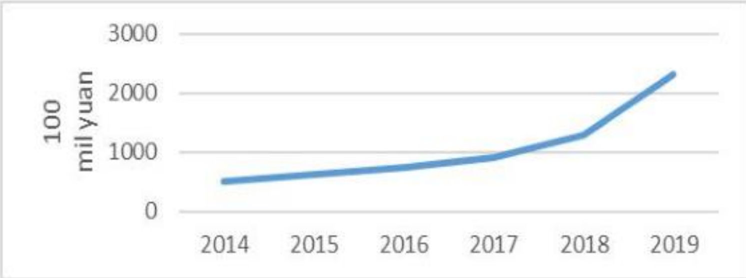

Figure 1 2014-2019 Guangdong-Hong Kong-Macao Greater Bay Area technology market contract turnover.

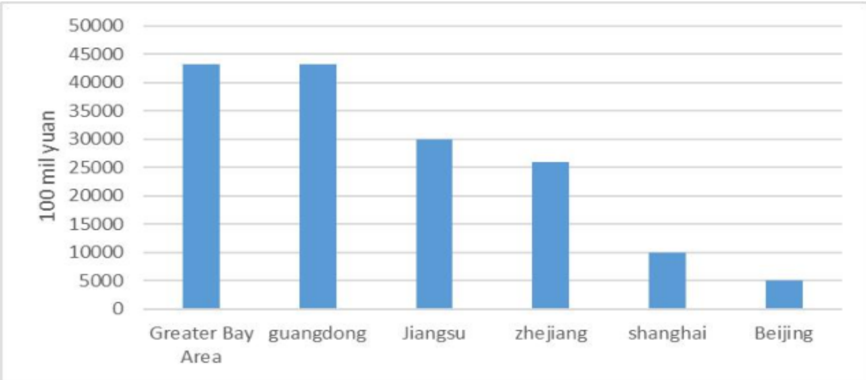

Figure 2 Revenue from new technology products of the planned enterprises in 2019.

The data in "Table 2" shows that the R&D personnel of enterprises in the Bay Area have increased significantly. The investment and full-time equivalent of R&D personnel have reached 815,742 and 603,291 person-years respectively, ranking first in the country. In 2019, the R&D investment of Bay Area enterprises accounted for 82.7% of the total R&D investment of the society. In 2019, the number of R&D investment in enterprises nationwide was 4,440,550, and the number of social R&D investment was 7,129,256. The ratio of the two was 62.3%. The proportion of the number of people is 20.4% higher than that of the whole country, and the location advantage is prominent. It can be seen that Bay Area enterprises have become the main force in R&D innovation activities and have made great contributions.

Table 2. R&D personnel input in the Greater Bay Area and each province in 2019

	Enterprise R&D input number	Enterprise R&D number	Enterprise R&D equivalent (person year)	Social R&D input (Person)	Social R&D equivalent (Person year)
National	4440550	944798	3151828	7129256	4800768
Greater Bay Area	815742	186574	603291	986572	781046
Guangdong	838891	209723	642490	1091544	803208
Jiangsu	693442	147541	508375	897701	635279
Zhejiang	574571	106402	4440550	713684	534724

a Data source: China Science and Technology Statistical Yearbook (2020)

3. THE BOTTLENECK OF POLICIES AGAINST THE BACKGROUND OF TECHNOLOGICAL INNOVATION MANAGEMENT

Technological innovation main body of enterprise not only requires the R&D investment of the enterprise itself, but also requires the support of the government's financial funds and the protection of taxation policies. The government uses financial technology investment, guarantees, subsidies, [2] and tax reductions to create an environment for corporate innovation, build a carrier platform for innovation, and inspire enthusiasm for independent innovation. However, companies are also facing new problems and new situations in innovation and development.

3.1 The Fiscal Intensity of R&D Expenditures Is Not Enough, and the Advantage Space Needs to Be Improved in Terms of Investment

In recent years, fiscal technology expenditure data show one of Silicon Valleys technological innovation in country. The scale of fiscal technology, R&D expenditures and their expenditures and proportions (total fiscal expenditures) have shown a steady upward trend year by year. Compared with other provinces horizontally, it can be seen that the government's financial and technological investment is unique. Comparing with the national average level of financial investment in science and technology, the growth rate of financial investment in science and technology exceeded the country's 24.55 percentage points.

In terms of the intensity of fiscal research expenditures, although the annual investment intensity exceeds of country by 0.17-0.52 percentage points ("Table 3"), it can be seen from the comparison of the R&D intensity data of other provinces. As shown in "Figure 3". In 2017-2019, it ranked sixth, and remained at eighth in other years, which were lower than the 3.56 and 1.25 percentage points of Beijing and Shanghai, which ranked first and second in the rankings. In addition, from 2018 to 2019, the ratio of government investment in science and technology to GDP in the Greater Bay Area has steadily increased. Compared with Jiangsu's 2.69-2.79 R&D/GDP, the gap has narrowed from 0.1. to 0.04 percentage points. Therefore, the intensity of expenditure on technological innovation in the Greater Bay Area does not match its economic aggregate and the image of Silicon Valley, and there is a certain gap compared with the R&D intensity of other bay areas in the world.

Table 3. Fiscal technology and R&D expenditure in the Greater Bay Area

	fiscal expenditure on science and technology (100 million yuan)	Proportion of science and technology expenditure (%)	R&D expenditure (100 million yuan)	R&D expenditure intensity (%)
2014	259.85	2.84	1496	2.19
2015	486.24	3.79	1681	2.25
2016	648.34	4.83	1921	2.34
2017	728.54	4.76	2232.1	2.44
2018	941.69	5.99	2586	2.59
2019	1038.70	6.01	2962.35	2.75

a Data source: China Science and Technology Statistical Yearbook (2015-2020)

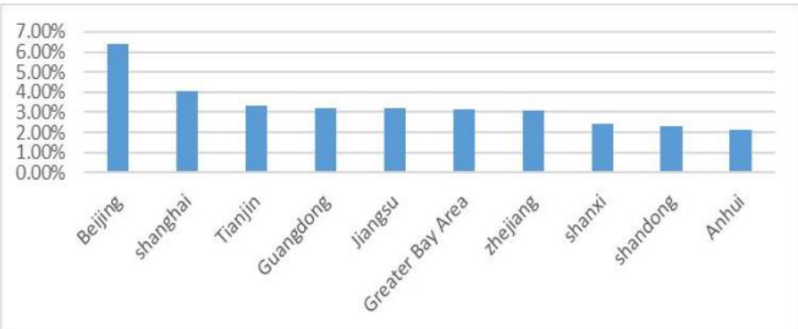

Figure 3 R&D/GDP in selected provinces and cities (2019).

a Data source: China Science and Technology Statistical Yearbook (2015-2020)

3.2 The Transfer and Transformation Efficiency of Scientific and Technological Achievements Is Low, and It Needs to Be Guided and Supported by the Government

Although the ability to market technological achievements of the Greater Bay Area enterprises and the volume of technological contract transactions have gradually increased steadily in recent years. Market transformation index, Guangdong ranks third in the country, and the Greater Bay Area ranks fourth, still lagging behind in Beijing and Shanghai. In terms of the transformation of scientific and technological achievements, the conversion rate of the Greater Bay Area is about 9.24%, which is far lower than the 40%-50% conversion rate of the developed countries in the Bay Area. As far as the R&D and sales of new technology products by enterprises in the Greater Bay Area are concerned, the R&D expenditure on new technology products in 2019 is 296.235 billion yuan, which is 13.38% of the national R&D expenditure, and the revenue of new technology products is 427.234 billion yuan, accounting for 20.15% of the country's total, ranking second in the country, and its output scale is smaller than its input. In terms of R&D projects for new technology products, the number of projects in the Greater Bay Area in 2019 was 224,301, accounting for 11.04% of the national projects, exceeding Jiangsu by 1.05 percentage points, and ranking second in the country (first in Guangdong). To this end, the Greater Bay Area government strengthens the guidance and policy support of enterprises, builds a platform for the transformation of achievements, and improves the level and ability of enterprises to transfer and transform scientific and technological achievements.

3.3 Insufficient Government Investment and Unbalanced Expenditure Structure

Based on the type of R&D activities, R&D activities are composed of three parts: basic, application, and experimental development research. From the perspective of R&D as a whole, the scale and total amount of R&D in the Greater Bay Area have steadily increased, while fiscal science and technology expenditures accounted for only 4.39% of all R&D expenditures. And among the three types of R&D, the structure of fiscal science and technology expenditures is unbalanced, which is manifested in the emphasis on experimental development over basic applied research. For example, experimental development expenditures account for up to 84.92%, and basic and applied research expenditures only account for 15.08%. However, the proportion of experimental development expenditure is still 2.23 percentage points higher than that of the country, and its interval distribution is Jiangsu> Greater Bay Area> Shanghai and Beijing (see "Figure 4").

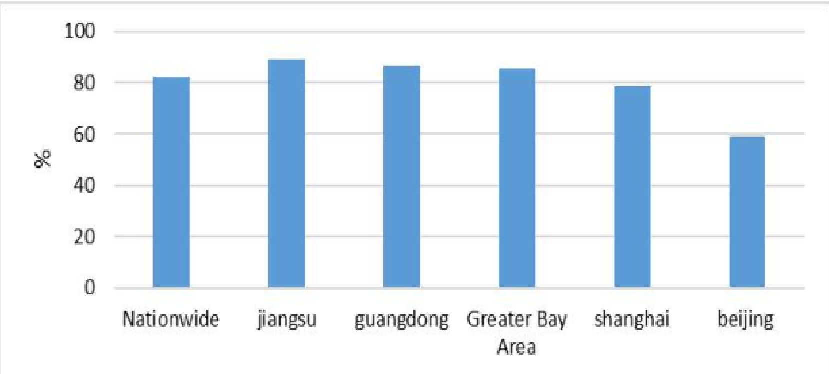

Figure 4 Proportion of experimental development expenditure in R&D (2019).

a Data source: China Science and Technology Statistical Yearbook (2020)

Taking the internal expenses of R&D activities as the standard, the proportion of basic and applied research in the Greater Bay Area in 2019 surpassed Jiangsu and lower than Beijing. Jiangsu's research accounted for 2.74% and 6.77%, and experimental development accounted for 90.49%. Compared with the average proportions of all parts of the country, the basic and applied research expenses of the low, investment research expenses are also relatively low. Compared with the developed countries in the Bay Area (basic and applied research accounts for 6% and 35% on average), it is also low, as shown in "Table 4".

Table 4. National, Beijing, Jiangsu, Guangdong and Greater Bay Area internal expenditures and proportions of R&D activities in 2019

	Beijing		Jiangsu		Guangdong		Greater Bay Area		National,	
	Total(100 million yuan)	Proportion of part (%)	Total(100 million yuan)	Proportion of part (%)	Total(100 million yuan)	Proportion of part (%)	Total(100 million yuan)	Proportion of part (%)	Total(100 million yuan)	Proportion of part (%)
R&D expenses	2233.59		2779.52		3098.49		2962.35		22143.58	
Basic research	355.45	15.91	76.20	2.74	141.86	4.58	138.23	4.67	1335.57	6.03
Applied Research	563.90	25.25	188.04	6.77	247.28	7.98	308.49	10.41	2498.46	11.28
Experimental development	1314.24	58.84	2515.27	90.49	2709.36	87.44	2515.63	84.92	18309.55	82.68

a Data source: China Science and Technology Statistical Yearbook (2020)

Data from the Greater Bay Area reveal that there are prominent problems in the structure of corporate R&D internal expenditures-some proportions are unreasonable-the R&D ratio structure is unbalanced, which severely inhibits the high-tech R&D and technology transfer and transformation capabilities of companies in the Greater Bay Area, resulting in the ‘threshold' of the enterprise's knowledge creation and knowledge acquisition capabilities.

3.4 The R&D Talent Structure Is Unbalanced, and the Innovative Talent Reserve Mechanism Needs to Be Improved

"Table 5" shows that from 2017 to 2019, the R&D personnel equivalent in the Greater Bay Area has risen steadily, while its growth rate has declined, especially in the past three years, and its average equivalent has remained at around 689,515 person-years. As far as the growth rate is concerned, the growth rate has stabilized at around 9% from 2016 to 2017. The growth rate in 2018 was as high as 36.17%. In 2019, it dropped sharply to 5.21%, which is contrary to the high-quality economic development speed of the Greater Bay Area. The talent-team's construction and the creation of a long-term and effective talent reserve environment and mechanism have become the government's primary tasks.

According to the data of scientific and technological talents (professional and technical personnel) in the Greater Bay Area, in 2019, there were 1.03 million R&D personnel in the Bay Area, 590,000 R&D personnel in Guangzhou and Shenzhen, 220,000 in Dongguan and Foshan, and 150,000 in Zhongshan, Huizhou and Zhuhai. Jiangmen Zhaoqing has 60,000 people, and Hong Kong and Macau have the lowest R&D personnel (about 10,000). There is a clear gap in the distribution of R&D personnel. from the exploration of the types of R&D activities, in 2019 (as shown in "Table 6"), the proportion of experimental R&D equivalent (full-time) of scientific and technological personnel in the Bay Area was 65.84%, which was 13.18 percentage points lower than that of the national equivalent, while the equivalent proportion of basic and applied research All are lower than the whole country. It can be seen that the R&D innovation talent structure (regional distribution structure and activity type input structure) is partially unbalanced, the government needs to further strengthen and improve its talent team building.

Table 5. R&D personnel equivalent and growth rate in the Greater Bay Area

Year	2017	2018	2019
R&D personnel equivalent (person-year)	545163	742337	781046
R&D personnel equivalent growth rate (%)	9.26	36.17	5.21

a Data source: China Statistical Yearbook (2018-2020)

Table 6. The proportion of R&D personnel equivalent in the Greater Bay Area and the country in 2019

	R&D equivalent (person year)	R&D equivalent (%)		
		Basic research	Applied research	Experimental development
National	4800768	8.17%	12.82%	79.02%
Greater Bay Area	781046	3.85%	6.82%	65.84%

a Data source: China Science and Technology Statistical Yearbook (2020)

3.5 Policies and Regulations such as Financial Support Guarantee, Tax Reduction and Exemption, and Investment in Technological Development Are Single and Need to Be Improved

A series of policies and regulations, such as financial support guarantees, tax reductions and exemptions, and investment in technological development, promulgated and implemented by the Greater Bay Area government, are numerous and scattered, and the quantitative indicators for enterprise innovation are not specific enough. The preferential targets in the tax policy are limited, and direct tax is the main body, and the tax reduction and exemption of corporate risk investment is not strong enough. In the fiscal policy, the company's follow-up innovation subsidy policy is single, non-mandatory, and the procedures are cumbersome, which inhibits the innovation initiative of enterprises. The government's financial technology support to enterprises is generally low and small in scale, and science and technology policies have little effect in stimulating and guiding enterprises to innovate. At the same time, in the process of investment in technological innovation, companies lack single funds and risks are everywhere. The government needs to improve financial guarantee policies to create a quiet haven for enterprise innovation in the middle and late stages.

4. THE MECHANISM OF GOVERNMENT FISCAL AND TAXATION POLICIES FOR CORPORATE TECHNOLOGICAL INNOVATION

The interaction mechanism of financial and taxation policies for enterprise technological innovation "Figure 5" shows that the network system with enterprise technological innovation as the core is formed by nodes such as government, fiscal and taxation policies, talent platforms, innovation platforms, achievement transformation platforms, financial institutions, and scientific research institutions. [3]The orderly operation of the mechanism, thanks to the leadership of the government, financial investment, tax reduction and exemption, and the technology innovation, talent, achievement transformation and innovation financing platform built by the government, has laid a rock foundation for the technology innovation of enterprises in the Bay Area and played a huge role in promoting it. [4]

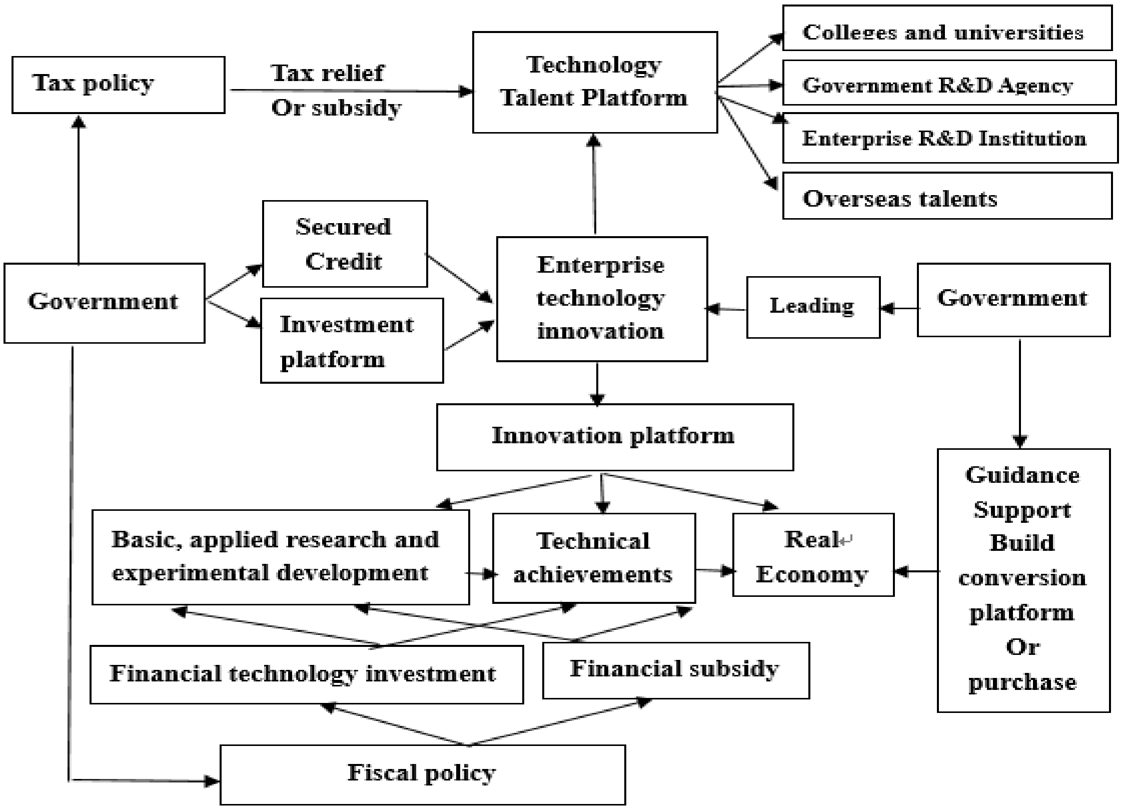

Figure 5 The interaction mechanism of financial and taxation policies for enterprise technological innovation.

4.1 *Financial Mechanism*

4.1.1 *Financial Investment and Subsidies*

The technological innovation of enterprises is inseparable from the implementation and guidance of fiscal policies, especially the policy-led behaviour of the government is extremely important. [5] Financial investment in science and technology and subsidies minimize the risk of corporate R&D innovation, and give the company the follow-up momentum for innovation. As mentioned above, the chain cycle of technological innovation is composed of different stages (including R&D, results and transformation), and the level of technological innovation caused by financial investment and subsidies is also different. The government adopts financial direct investment method, the achievement stage adopts indirect creation of financial fund investment, while the financial subsidy focuses on the stage of transformation of achievements into actual productivity. Increase financial subsidies, build an efficient transformation platform, improve its transformation efficiency, and achieve scientific and technological achievements. Productivity transforms value and proliferation.

4.1.2 *Financial Sharing and Guarantees*

Enterprise scientific and technological innovation includes both scientific research innovation and technological research innovation. The object of scientific research is the basic theory of new knowledge, which is a public product. Any user can use it for free. It has a positive externality. The product can only be provided by the government's finances, and the innovation risk is fully shared by the government's finances. Technological innovation is the development and application of a certain specific technology. It is a complex long-term process. The innovation system will be constrained by internal and external factors. Successful innovation will gain benefits from technological achievements. Unsuccessful innovation will not gain benefits, let alone restore the initial investment. The cost of innovation may even lead to the rupture of the financial capital chain and the risk of bankruptcy.

Technological R&D and innovation of enterprises, due to limited amount of their own funds and government; they often encounter problems of lack of innovation funds and blockage of financing channels. For this reason, they need to apply for loans from financial institutions such as technology banks. In the above-mentioned loan game process, companies are unwilling to provide confidential technological innovation information materials and the market value of the information, and banks' access to corporate technology innovation information is not sufficient and symmetrical. They believe that the bank's technology loan input costs cannot be fully recovered, so reduce corporate technology The amount of innovative loans has induced the "domino effect" of the pace of enterprise innovation-the stagnation of follow-up technology research and development activities. It can be seen that the necessary and sufficient conditions for the effective operation of subsequent scientific and technological research and development of enterprises are: the government provides financial guarantees for enterprises that comply with scientific and technological innovation policies and regulations, avoids enterprise scientific and technologic

4.2 Taxation Mechanism

The tax reduction and exemption policies of the top-level design include corporate income tax, value-added tax, personal income tax incentives and tax incentive policies, which run through all stages and platforms of corporate technological innovation activities, such as R&D-results-transformation, introduction of technological innovation talents and establishment of technological innovation platforms. [6]Eligible innovative companies will be rewarded with income tax concessions, value-added tax reductions, and companies with annual tax payments exceeding one million yuan. Overseas scientific and technological talents introduced through talent platforms and innovation platforms will receive individual income tax reductions or discounts based on personal income, reducing domestic and foreign income. The salary gap will stimulate the enthusiasm for technological innovation of enterprises, efficiency transformation enterprise, and form a good-cycle pattern of enterprise R&D innovation.

4.3 Platform Mechanism

4.3.1 Talent Introduction Platform

The source of enterprise innovation is talents, and the source of talents is colleges and universities and scientific research institutions. The introduction of scientific and technological talents in enterprises requires the government to build a talent platform and the support of scientific and technological talent policies. With the help of the talent platform, enterprises adopt high-paying income methods to introduce overseas scientific and technological talents, and the government will give them personal income preferences and financial subsidies. Wallsten, S.J (2000) research results: the cornerstone of enterprise innovation is the talent platform supported by the government, and the number of talents introduced has a linear relationship with the scientific and technological innovation achievements of enterprises. [7]

4.3.2 Technology Innovation Platform

The innovation platform consists of high-tech enterprises, key laboratories, engineering centers, new research and development institutions, and innovation and entrepreneurship incubators

The platform composition provides a platform for basic research, applied research and experimental development for the main body of scientific and technological innovation. It condenses the joint efforts of the government, enterprises, universities and R&D institutions, promotes the efficient matching of scientific and technological resources, and jointly builds a sharing pattern of elements of scientific and technological innovation activities (such as new technical information, new technical knowledge and innovation intensity), and gives enterprises the ability to innovate in science and technology.

4.3.3 Achievement Transformation Platform

The market transformation of results has always been a shortcoming of technology companies. To solve the transformation problem, the government needs to guide the construction of a platform for the transformation of results and experience. The government plays the role of design, construction and maintenance of the transformation platform. It always pays attention to the melting link between enterprise achievements and consumers, formulates specific long-term policies for achievement transformation, condenses the market mechanism and benefit distribution mechanism of achievement transformation, and captures transformation information. Improve the service level of enterprise technological achievement transfer, and further improve the efficiency of technological achievement transformation.

4.3.4 Financing Innovation Platform

Because enterprise innovation requires a large amount of capital or funds, the potential risks of innovation investment are relatively high, the enterprise itself has insufficient funds for innovation and government investment in science and technology, the efficiency of transformation of scientific and technological achievements is low, and financial institutions are parsimonious on loans, which leads to shortcomings in enterprise technology innovation financing. This kind of shortcoming requires the government to take the lead in building a financing innovation platform for enterprises and building a decentralized mechanism to share the risks of enterprise innovation financing. To this end, the government uses China's capital market policies to encourage companies to raise innovative funds through the issuance of private equity funds to avoid financing risks. It can also allow companies to go public through the technology board and registration system to solve the shortcomings of innovative financing, thereby helping companies financing provides a risk-sharing mechanism.

5. CONCLUSION

Based on the above analysis, it can be seen that the Greater Bay Area government should take the mechanisms related to fiscal and taxation policies that promote enterprise innovation as the overall focus, and implement precise policies in the allocation, structure and performance of financial technology investment, talent introduction and development, tax reduction and exemption, and innovation platforms, so as to enhance its comprehensive strength in scientific and technological innovation.

AUTHORS' CONTRIBUTIONS

Xiaofang Xiong carried out the data analysis, Shizhong Xiong contributed to the design revision of the paper and Qiaozhan Zheng contributed to editing.

REFERENCES

[1] China Academy of Science and Technology Development Strategy. China Regional Science and Technology Innovation Evaluation Report, 2020.

[2] Xu Weijun, Fu Zhineng. Research on financial and taxation policies in the Guangdong-Hong Kong-Macao Greater Bay Area [J]. Journal of South China University of Technology (Social Science Edition), 2019 (07): 1-16.

[3] Lin Jiang. Guangdong-Hong Kong-Macao Greater Bay Area construction and regional fiscal and taxation policy coordination [J]. Financial Supervision, 2018 (17): 26-31.

[4] Lin Xianyang. Discussion on the bottleneck and strategy of technological innovation development in Guangdong-Hong Kong-Macao Greater Bay Area [J]. Lingnan Academic Journal, 2018(04): 27-32

[5] Wang Yanli, Yang Fan. Research on the investment efficiency of new energy companies under the impact of policies — from the perspective of comparing fiscal subsidies and tax incentives [J]. Coal Economic Research (Humanities and Social Sciences Edition), 2019(11): 5-16.

[6] Xu Man. Research on the Fiscal Policy of Jiangsu Province Supporting Enterprise Technological Innovation [J]. Jiangsu Business Forum, 2019(12): 101-105.

[7] Wallsten, S.J. The Effects of Government-industry R&D Programs on Private R&D: the Case of the Small Business Innovation Research Program [J]. RAND Journal of Economics, 2000, 31(1):82-100.