

The Effect of Female Successors on the Financial Performance of Family Firms: Under the Moderation of Governance Structure

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Abstract: Female successors participating in corporate governance is becoming increasingly common, but the impacts through which this influences corporate financial performance remain unclear. Drawing on resource-based theory and social role theory, construct a three-dimensional analytical framework linking "successor gender - governance structure - financial performance": using panel data of Chinese family-owned listed companies from 2010 to 2022, it identifies the performance effects of female successors and reveals the moderating boundaries of governance structure. The findings reveal that female successors have a significant po164sitive impact on the financial performance of family businesses. Governance structure plays a key moderating role in the relationship between female successors and financial performance, with a dynamic effect observed in the moderation of governance structure. Institutional fit determines the long-term value creation capacity of female successors. Additionally, technology-intensive enterprises benefit more from the relational management style of female leaders.

Keywords: Female successor, financial performance, Governance structure moderation

1. Introduction

Gender factors in the intergenerational succession of family businesses have long been simplified into a single narrative of "male dominance." This perception is undergoing a paradigm shift from bloodline priority to ability-based criteria: According to a 2023 McKinsey report, companies led by women have a ROE that is 47 basis points higher than the industry average. Traditional governance theory views the succession process as a linear transfer of ownership and control, ignoring the interactive effects of gender roles and governance structures [1].

The current debate has shifted from "whether women should inherit" to "how to optimize the succession system." New institutional economics suggests that the true challenge for family businesses lies not in the gender of the successor but in the failure to establish gender-neutral governance rules [2]. A controlled experiment involving German mid-sized family businesses showed that female successors who adopted an adaptive committee structure saw their companies' market value increase by 27% over three years [2].

However, while the proportion of female succession in East Asian family businesses rose from 3.7% in 1990 to 18.6% in 2022, the coefficient of performance dispersion expanded by 1.8 times during the same period. This contradictory necessitates a reexamination of the "succession-governance-performance" transmission chain [1]. Therefore, this study will provide new insights into intergenerational transitions in family businesses by examining the three-way interaction between "institutional environment-governance resilience-succession effectiveness."

2. Theoretical Analysis

2.1 The Impact of Successor Gender on Corporate Financial Performance

According to resource-based theory, female successors influence corporate financial performance through the restructuring of heterogeneous resources, demonstrating a cognitive leap from static resource possession to dynamic capability building. At the same time, strategic decision-makings manifest gender differences in risk preference and innovation investment: female managers transform risk aversion into prudent innovation, producing a "conservative advantage" effect during the intergenerational succession of family businesses. Their R&D investment intensity and business scale compatibility are significantly higher than those of male successors, forming a positive cycle of "risk filtering and resource focusing". From the perspective of agency costs, conflicts are transformed into value creation opportunities under the regulation of governance structures [3]. In addition, female successors often face a vicious cycle of "capability questioning-overproving," but when the proportion of independent directors exceeds the boundary, this pressure is transformed into a strategic review advantage.

Through the above mechanisms, female successors are often able to promote the financial performance [2].

2.2 The Regulatory Role of Governance Structures

The cognitive leap from agency theory to resource dependence theory shows that board independence may affect this relationship: it may either inhibit the innovative decision-making of female successors by amplifying risk aversion, or compensate for their lack of experience through professional guidance. Similarly, the equity balance also exhibits non-linear regulatory characteristics: a moderately dispersed equity structure can activate the relationship coordination abilities of female successors, but excessive dispersion can lead to increased strategic differences [4]. In addition, according to resource orchestration theory, the governance structure is essentially a converter that transforms family capital into corporate capabilities. Therefore, when female successors face a "glass cliff," a dual-class share structure can provide the necessary decision-making buffer period. This system is more effective in digitally driven family businesses, as it synergizes with the intuitive advantages of female leadership in decision-making models that require rapid iteration [5, 6].

3. Research Framework

3.1 Variables Selection

The dependent variable uses a weighted combination of return on assets (ROA) and Tobin's Q. The former reflects short-term asset utilization efficiency (Eq. 1), while the latter measures long-term market value (Eq. 2). The two are combined with a weighting of 6:4 to form a financial performance index (FPI) (Eq. 3). The one-sidedness of a single indicator is effectively overcome.

$$ROA = \frac{NetProfits}{TotalAssets} \times 100\% \tag{1}$$

$$Tobin'sQ = \frac{MarketValue}{ReplacementCostofAssets}$$
 (2)

$$FPI = 0.6 \times ROA + 0.4 \times Tobin'sQ \tag{3}$$

In order to break through the limitations of gender binary divisions, the independent variable is constructed as the female successor power intensity index (FSPI): including equity ownership ratio (EOR), number of women on the board of directors (FBN), and decision-making participation (DMP), and is reduced in dimension through principal component analysis (Eq. 4). Converting identity symbols into quantifiable carriers of power can more accurately capture the actual influence of female successors.

$$FSPI = 0.5 \times EOR + 0.3 \times FBN + 0.2 \times DMP \tag{4}$$

The moderating effect of governance structure is achieved through a dual mechanism. Equity concentration (HHI of the top three shareholders) is selected as the structural moderating variable (Eq. 5). The cultural moderating variable is represented by the board gender diversity index (BLAU Index) (Eq. 6). The two types of indicators jointly deconstruct the "hard constraints" and "soft influences" of governance effectiveness.

$$HHI = \sum (ShareholdingRatiosoftheTopThreeShareholders)^{2}$$
(5)

$$BLAU = 1 - \sum (EachGenderRatio)^2$$
 (6)

Corporate size (CS) and marketization level (ML) have been proven to have a significant impact on corporate financial performance, and therefore they are used as control variables. Corporate size is represented by the logarithm of total assets (Eq. 7), and marketization level is represented by the Fangang Index (Eq. 8).

$$CS = \ln(TotalAssets) \tag{7}$$

$$ML = FangangIndex(0 \le \le 10)$$
(8)

3.2 Data Resources

This study uses panel data from Chinese A-share listed family businesses from 2010 to 2022. Corporate governance data is sourced from the Chinese Private Listed Companies Research's sub-database of the CSMAR and the CCER database. Financial performance data is obtained from the Wind database, and marketization indices are sourced from marketization index reports. ST, *ST, and PT companies are excluded, as are 1% of outliers. Missing data is supplemented using interpolation method.

4. Results and Discussions

4.1 Descriptive Statistics

According to Table 1, the mean value of FSPI is 0.42, with a standard deviation of 0.19, indicating that 42% of the companies in the samples are owned by female successors, and that there are differences in intergenerational succession strategies among different families. The range of ROA reaches 21.3% (0.087 \pm 0.054), suggesting significant differentiation in the performance of family businesses. The correlation coefficient matrix shows that FSPI is significantly positively correlated with ROA, elevating the static observation of gender to intergenerational dynamic transmission. Notably, the correlations between HHI, BLAU, and FSPI did not reach significant levels, suggesting that their moderating effects may be achieved through more complex interaction effects.

Table 1. The Results of Descriptive Statistics

Variables	Mean Value	Standard Deviation	ROA	FSPI	ННІ	BLAU
ROA	0.087	0.054	1			
FSPI	0.42	0.19	0.23*	1		
ННІ	0.67	0.21	0.06	-0.09	1	
BLAU	0.38	0.15	-0.15*	0.08	-0.32*	1

Note: N = 1845, *p < 0.05.

4.2 Main Effect and Moderating Effect

According to Table 2, the results of the main effect show that FSPI has a significant positive impact on ROA (β =0.217, p<0.01). This breaks through the cognitive boundaries of gender stereotypes in traditional agency theory and confirms that female successors can enhance corporate value. The moderating effect of governance structure reveals that HHI and BLAU positively reinforce the performance creation ability of female successors, indicating that the dynamic matching of modern enterprise systems and gender cultural diversity is a key boundary condition that affects succession effectiveness.

From the perspective of dynamic capability theory, based on the dynamic effect, the performance-promoting effect of female successors has been verified from the evolutionary path of individual trait advantages to institutional environment adaptation. For every 1 standard deviation increase in HHI, the ROA of female successors increased by 0.142 units, which is due to the complementary effects of the resource network and decision-making supervision brought about by large directors. The moderating effect of BLAU was only marginally significant, suggesting that the restructuring of power among female successors within family businesses requires a longer institutional digestion cycle.

Table 2. Results of Main Effects and Moderating Effects

Variables —	Dependent Variable: ROA				
variables —	Main Effect	Moderating Effect	Dynamic Effect		
FSPI	0.217*	0.203	0.186		
	(0.062)	(0.081)	(0.079)		
ННІ		0.183	0.172		
		(0.074)	(0.071)		
FSPI×HHI		0.148*	0.142*		
		(0.087)	(0.085)		
BLAU		0.039	0.033		
		(0.052)	(0.050)		
FSPI×BLAU		0.156*	0.151*		
		(0.093)	(0.091)		

Variables -	Dependent Variable: ROA			
variables	Main Effect	Moderating Effect	Dynamic Effect	
Control Variables	Be Controlled	Be Controlled	Be Controlled	
\mathbb{R}^2	0.328	0.417	0.439	
F-value	11.27*	9.85*	10.43*	

Note: *, *** represent p<0.1, p<0.05, p<0.01, respectively; the numbers in parentheses are standard errors.

4.3 Robustness Test

To verify the reliability of the conclusions, variables classification and sub-sample regression tests are used. According to Table 3, regarding the moderating effect, continuous type variable is replaced with three-category ordinal variable (low/medium/high), and it is found that the marginal effect of female successors on ROA remained significant. This test not only verifies the robustness of the model setting, but also reveals that the moderating effect of the governance structure had obvious dynamic characteristics. Secondly, the sub-sample test further reinforced the universality of the conclusions. When the manufacturing industry (asset ratio > 50%) was selected and regression tests are conducted, the performance improvement effect of female successors is still significant, but the coefficient of the manufacturing industry sample is higher than the benchmark level. This confirms the resource dependence theory, which states that technology-intensive enterprises benefit more from the relationship-based management style unique to female leaders.

Table 3. The Results of Robustness Test

Method	ROA Coefficient	t Value	Moderating Effect	N
Governance Index Classification	0.136*	3.58	2.17	1845
Manufacturing Sub-sample	0.152*	3.25	2.08^*	1023

Note: * represents p<0.1.

5. Conclusions and Implications

5.1 Conclusions

Using panel data from Chinese A-share listed family businesses from 2010 to 2022, an analytical framework of "gender of successor—governance structure—financial performance" is constructed to systematically examine the impact of female successors on corporate financial performance and the regulatory effect of governance structures. The main conclusions are as follows: First, female successors have a significant positive impact on the financial performance of family businesses and demonstrate differentiated advantages in "risk filtering and resource focusing". This breaks through traditional gender stereotypes and confirms that the characteristics and advantages of female successors can be transformed into corporate value creation capabilities. Second, governance structure plays a key regulatory role in the relationship between female successors and financial performance, and exhibits synergistic effects of "hard constraints" and "soft influences". Third, there is a dynamic effect in the regulation of governance structure, and institutional adaptability determines the long-term value creation capabilities of female successors. The dynamic alignment of modern corporate systems and gender equality culture is key to overcoming the "Glass Cliff" dilemma. Additionally, robustness tests on the manufacturing sub-sample indicate that technology-intensive firms benefit more from female leaders' relational management style, validating the applicability of the resource dependency theory.

5.2 Implications

The following practical insights are proposed for intergenerational succession and governance optimization in family businesses: First, family businesses should establish a "competency-based" succession evaluation system, optimize the gender compatibility of governance structures, and establish governance flexibility buffer mechanisms. Second, policymakers should promote gender-neutral governance institutional development for family businesses and provide targeted support for female succession in technology-intensive industries. Finally, female successors should take the initiative to leverage the advantages of the governance structure and dynamically adapt equity and strategic needs. In short, through the modernization and gender neutrality of the governance structure, institutional flexibility can be created for female successors, enabling differentiated leadership styles to be transformed into sustainable financial performance advantages, ultimately achieving a smooth intergenerational transition and long-term value growth for the enterprise.

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