sustainability

MDPI

Article

Exploitation or Exploration? Managerial Myopia, Economic Policy Uncertainty and Ambidextrous Innovation Investment

Tingyu Yang [1,*], Yongmei Cui [1] and Rui Li [2]

[1] School of Economics and Management, Beijing Jiaotong University, Beijing 100044, China
[2] School of Economics and Management, East China Jiaotong University, Nanchang 330013, China
* Correspondence: tyyang@bjtu.edu.cn

Abstract: In today's increasingly competitive international environment, original technology innovation has become essential for enhancing enterprises' sustainability. As key innovation needs constant exploration rather than growing leaps and bounds, it is often ignored by managers who focus on short-term performance. Taking the data of publicly listed Chinese companies from 2010 to 2020 as a sample, this paper put forward the relation between managerial myopia and ambidextrous innovation investment on the basis of a empirical approach combining machine learning technology. Results revealed that managerial myopia has different effects on the ambidextrous innovation investment of enterprises. Specifically, the study finds a significant negative association between managerial myopia and exploratory innovation investment, while there is no significant relationship with regard to exploitative innovation investment. Further study showed that the negative influence is weakened by economic policy uncertainty and stronger in companies with more severe agency problems. By shedding light on the way that managerial myopia affects enterprises' ambidextrous innovation investment, this research contributes to the literature on the impact of managerial myopia, offering key insights into how to cultivate the core competitiveness of enterprises and ensure their sustainable development.

Keywords: managerial myopia; ambidextrous innovation; economic policy uncertainty; exploratory innovation; exploitative innovation

Citation: Yang, T.; Cui, Y.; Li, R. Exploitation or Exploration? Managerial Myopia, Economic Policy Uncertainty and Ambidextrous Innovation Investment. *Sustainability* **2023**, *15*, 7173. https://doi.org/10.3390/su15097173

Academic Editor: João Carlos Correia Leitão

Received: 15 March 2023
Revised: 11 April 2023
Accepted: 24 April 2023
Published: 25 April 2023

1. Introduction

In recent years, technological innovation has become increasingly crucial in enhancing a country's comprehensive national strength and gaining a sustainable advantage in fierce international competition. In 2021, China invested nearly 3 trillion yuan in research and development, with an expenditure intensity of 2.44%, a 14% increase from the previous year. Enterprises are the micro entities of the national innovation strategy that can implement the technological innovation demands more efficiently and accurately, and the level of enterprises' R&D expenditure directly affects the country's sustainable development. However, at present, many enterprises are stuck in the development and utilization of current mature technologies, neglecting the exploration and research for cutting-edge original technologies. The phenomenon of focusing on exploitation rather than exploration not only makes it difficult for enterprises to cultivate long-term competitiveness thus be eliminated by the future technological development, but also makes increase a nation's vulnerability to the bottle-neck problem of core technologies. In this context, research on the situational factors of different types of enterprises' innovation investment so as to explore the direction of resource allocation and improve the sustainability of technological innovation is of great significance for a country's scientific and technological development.

According to the ambidextrous innovation theory, enterprise technological innovation can be categorized as either exploitative innovation or exploratory innovation. Ambidextrous innovation lays equal emphasis on both established advantage exploitation and new

opportunity exploration, which is the key to overcoming the innovation dilemma faced by enterprises and cultivating dynamic capability [1,2]. Between the two, exploitative innovation is characterized by low risk and predictability which gradually apply and optimize the existing technology with the goal of expanding the current market, while exploratory innovation focuses on the long-term development of enterprises. In other words, exploratory innovation is regarded as breakthrough innovation since it breaks away from the old technology track and aims at the potential market in the future. It can be seen that compared with exploitative innovation, exploratory innovation features higher risk and unpredictability. Therefore it not only requires a longer innovation cycle and greater investment, but also has a higher potential of failure [3,4]. Based on the ambidextrous innovation theory, there are significant differences between exploitative innovation and exploratory innovation in terms of investment return cycle, risk-bearing level, resource demand scale, etc.

It is worth noting that the innovative investment strategy adopted by enterprises is largely affected by management characteristics, especially psychological tendencies [5–7]. Despite the rich research findings, there still exist some scarcity in understanding the relationship between managerial myopia and ambidextrous innovation. Current academic studies predominantly focus on demographic factors such as managers' gender, age, work experience, tenure, and educational background [8], while research that delves into the impact of managerial myopia on corporate innovation investment remains scarce, and could provide valuable insights [9]. Although some scholars have tentatively established that managerial myopia reduces a company's R&D expenditure and undermines long-term performance [10,11], the distinction between the two different types of innovation investment has not been adequately addressed. Drawing on the ambidextrous innovation theory, it is conceivable that short-sighted managers may make different decisions regarding exploitative and exploratory innovation investment. Given that different innovation investment strategies concern whether enterprises are able to obtain sustained competitiveness or not, a comprehensive and nuanced examination of the impact of managerial myopia on corporate ambidextrous innovation investment is imperative to advance our understanding of the topic.

Therefore, this paper studies the questions as follows: What impact does managerial myopia have on corporate investment in exploitative innovation and exploratory innovation investment? What factors will regulate this effect, and what characteristics that differentiate it across companies? To address these research questions, this paper utilizes the data of China's A-share listed companies from 2010 to 2020. The findings indicate that the impact of managerial myopia on ambidextrous innovation investment differs. It significantly inhibits exploratory innovation investment, while its effect on exploitative innovation investment is not significant. The robustness tests, including alternative dependent variable measures, alternative model regression, and instrumental variable, confirm this influence's consistency. Additionally, this paper finds that the negative influence is mitigated by economic policy uncertainty that plays a moderating role. Furthermore, the effect is stronger in companies facing severe agency problems. However, economic policy uncertainty and agency cost do not have a significant impact on the relationship between managerial myopia and exploitative innovation investment.

The main contributions of this paper are as follows: Firstly, despite a vast literature regarding innovation investment as a whole, recent research indicates that there are significant differences between exploitative innovation and exploratory innovation and how to make investment strategies are related to the sustainable competitiveness of enterprises. This paper acknowledges that innovation investment is not a monolithic concept and distinguishes between exploitative and exploratory innovation. We examine the differential impact of managerial myopia on ambidextrous innovation investment, thus improving our understanding of how firms make different innovation investment decisions and their impact on sustainable competitiveness. Secondly, a wide range of researchers focus on demographic factors of management, yet few studies concern the impact of managerial

myopia on corporate innovation investment. This study highlights the importance of cognitive traits in social psychology and their impact on innovation investment. Thirdly, this paper investigates the moderating effect of economic policy uncertainty on the relationship between managerial myopia and ambidextrous innovation investment. We also analyze the differences between enterprises with varying agency cost, thereby refining relevant research on innovation investment management. These findings provide theoretical and practical support for reducing the negative impact of managerial myopia on enterprises.

2. Literature Review

Innovation is often highlighted as a crucial factor for enterprises to achieve sustainability, enhance competitiveness and obtain good performance. However, recent studies have shown that investment in both tangible and intangible assets by enterprises in developed countries has slowed down since the end of the 20th century, prompting extensive research into the reasons behind this phenomenon. According to upper echelon theory, management characteristics play a decisive role in shaping an enterprise's strategic orientation. As the primary decision-makers in an organization, management's characteristics further affect the strategic formulation and investment decisions, including those related to innovation [6]. For innovation investment, management characteristics play an important role in determining whether innovation projects will be carried out, and have an important say in what kind of innovation investment decisions the company makes, which is related to the sustainable competitive advantage of the company [12]. Lavie et al. [5] explored how a CEO's temporal focus and risk propensity affect a firm's product development strategy, and provides insights into how the behavioral inclinations of management can shape firms' exploration tendencies. Zhu et al. [6] addressed the negative impact of managers' job demands on a firm's innovation, highlighting how such demands reduce the share of exploratory innovations and shift the balance towards exploitative ones. The authors also proposed that managers' gender, age, and tenure, as well as an innovative climate, can weaken these negative effects. Ma et al. [7] revealed that entrepreneurial self-efficacy has an inverted 'U' relationship with ambidextrous behavior in new ventures. Therefore, it is essential to investigate management characteristics to better understand the issue of corporate innovation investment. Specifically, managerial myopia is a critical management characteristic that offers one of the best explanations for this phenomenon [9], yet not received sufficient attention in the literature.

Managerial myopia is introduced from the time-oriented focus in the field of social psychology theory. The theory points out that people's perception of time is not only an innate and stable trait, but also a subconscious process [13]. Various perceptions of long-term and short-term time have diverse effects on human behavior. Wilden et al. [14] showed that managers exhibit contrasting tendencies in selecting innovation projects, especially when radical innovation is involved. Time considerations are subjective in managerial decision-making [15], and short-term-oriented management tends to prioritize the present over the future, suggesting a myopic management characteristic. Managerial myopia refers to the tendency of managers to prioritize short-term gains over long-term benefits in order to improve the current financial performance and stock prices [9]. Affected by individual and organizational factors, they tend to value immediate gratification in the face of external pressures such as institutional investors' sell-off, stock market performance, hostile takeovers, as well as internal pressures such as financial performance and dismissal risks [16,17]. Tunyi et al. [18] found that poor management and myopia are positively associated with takeover likelihood, while hyperopia and efficient management are negatively associated with takeover likelihood. Mishra [19] investigated the impact of institutional investor ownership on a firm's investment in R&D and provided partial evidence for managerial myopia, as higher levels of institutional ownership are associated with reduced R&D investment. In this perspective, managers tend to overlook the long-term competitiveness and sustainable development of the company [9,10,16], that is, leading to cautious and conservative short-sighted behavior. A survey has shown that 78% of executives would

sacrifice the long-term value of the enterprise in order to achieve the goal of short-term stable profitability [20]. In terms of investment, they tend to choose projects with short payback periods and low risk [21]. Therefore, managerial myopia is a useful research perspective to explain the reason why an enterprise's innovation investment may be inhibited. Most literature holds the opinion that managerial myopia can lead to a reduction in R&D investment or technological innovation, as well as decisions to delay or cancel investment in long-term intangible assets [22]. For example, Seo et al. [23] examined the relationship between managerial myopia and short-termism of innovation strategy in Korean firms, finding that managerial myopia have a negative effect on long-term innovation both quantitatively and qualitatively.

While there is increasing interest in the impact of managerial myopia on corporate innovation investment, previous research has often treated innovation investment as homogeneous. Cao et al. [11] drawed upon the perspectives of the upper echelons theory and agency theory to contend that myopic managerial behavior is harmful to innovation investment in the long term. However, according to the ambidextrous innovation theory, there are huge differences between exploitative innovation and exploratory innovation in terms of investment payback period and risk-taking level. Compared with exploitative innovation, exploratory innovation is riskier and less predictable, which means that more funds need to be invested, longer innovation cycle to wait for, and a higher possibility of failure to withstand [8]. Under the constraints of limited resources, how to manage tensions between the two types of innovation is a key challenge for companies to balance short-term and long-term competitiveness [24,25]. It can be seen that the issue of whether such managerial traits would affect exploitative or exploratory innovation investment remains resolved, highlighting the need for further study.

On the one hand, what kind of venture capital behavior managers make is affected by the above-mentioned physiological and psychological factors, such as the innate and stable personal characteristics of managerial myopia. On the other hand, it is also affected by the environment in which managers operate, with risk perception varying depending on the situation [26,27]. Nadkarni et al. [28] found that in dynamic environments, firms headed by CEOs with low past focus, high present focus, and high future focus introduced new products faster, suggesting that managers' attentional bias plays an important role in shaping a company's innovation strategy. As such, researchers intend to identify the factors that affect managerial myopia and corporate innovation investment decisions from the aspects of the external environment, internal system, and management's personal characteristics. It is found that the negative impact of managerial myopia on innovation investment can be mitigated by factors such as corporate governance, external investor supervision, and security analysts' attention [12]. However, little attention has been paid to the moderating effect of economic policy uncertainty, namely an external factor, on the relationship between managerial myopia and innovation investment. In a market where technological innovation of enterprises is encouraged, the government continues to introduce or adjust economic policies to support enterprises in adapting to changing economic situations. This leads to a change in management's expectations for the future, that is, the psychological characteristic of managerial myopia is affected by the economic policy uncertainty, which will further alter enterprises' innovation investment strategy to some extent. In this line of thought, it is significant to focus on how the link between managerial myopia and ambidextrous innovation investment is moderated by the role of economic policy uncertainty.

3. Theoretical Analysis and Research Hypotheses

3.1. Managerial Myopia and Ambidextrous Innovation Investment

Drawing on the ambidextrous innovation theory, exploitative innovation investment and exploratory innovation investment are two distinct technological innovation strategies for enterprises. These two strategies differ significantly in terms of investment payback period and risk-taking level, and therefore should not be treated as homogeneous and

static [29]. Although previous studies have provided ample evidence of the negative impact of managerial myopia on innovation investment, it is likely that the effect of managerial myopia varies between exploitative and exploratory innovation investments. Investigating this issue is of great significance as it can help to clarify which type of innovation investment is hindered by managerial myopia.

First of all, managerial myopia reflects the subjective preference for short-term returns. Given that decision-makers pay more attention to the current performance and short-term benefits, they tend to choose projects with short payback periods and high returns [9,21], thus long-term competitiveness is subject to ignorance. Contradicting this preference caused by managerial myopia, exploratory innovation focuses on cultivating the long-term sustainable competitiveness of the enterprise, which requires a longer innovation cycle and a large amount of resource investment in the early stage without immediate returns. In particular, exploratory innovation is groundbreaking that breaks away from the old technological trajectory and leads to fundamental changes in products, services, or production processes. It is easy to see this kind of innovative ability to explore new skills and knowledge requires technical talent reserve at a higher level, correspondingly, will increase the labor cost of the enterprise. If successful, exploratory innovations may bring higher future returns, while it is not valued by managers who are myopia since the effect on short-term returns is insignificant or even negative. By comparison, exploitative innovation focuses on the gradual application and optimization based on mature technology, hence the benefits are more likely to be reflected immediately. As a result, managerial myopia may not have a significant inhibitory impact on exploitative innovation.

Secondly, managerial myopia is characterized by a reluctance to take risks in management. Along with this idea, managers who suffer from this cognitive bias tend to be more cautious when investing in high-risk innovative projects, particularly when faced with internal and external pressures such as poor stock market performance, the possibility of a hostile takeover, or the risk of dismissal. However, since exploratory innovation is oriented to the future market, it is necessary to challenge traditional technologies and predict the potential direction of emerging technologies. In the current VUCA era, which is characterized by variability, uncertainty, complexity, and ambiguity, intertwined with the outbreak of the COVID-19 epidemic, the unpredictability of future markets and technologies is inevitably greater. In this regard, exploratory innovations are more likely to fail due to the higher risks involved and are more easily suppressed compared to exploitative innovations as a consequence of managerial myopia. Thirdly, managerial myopia means that the management's time cognitive horizon is relatively short. For this reason, managers tend to focus on the present rather than the future when making decisions. This type of time preference differs from exploratory innovation, which seeks out future potential customers and emerging markets. In contrast, exploitative innovation devotes energies to improving existing capabilities and aims at serving existing markets [30]. Accordingly, exploratory innovation is more likely to be excluded from the decision-making horizon of managers who are myopia.

In sum, managerial myopia leads to differential investment decisions in ambidextrous innovation strategy based on propensity for risk-taking, short-term returns, and decision-making horizons. Specifically, compared to exploitative innovation, we expect that managerial myopia causes enterprises to significantly reduce investment in exploratory innovation. Based on this analysis, Hypotheses 1 is formulated:

Hypothesis 1a (H1a). *Managerial myopia is negatively associated with enterprises' exploratory innovation investment.*

Hypothesis 1b (H1b). *The impact of managerial myopia on enterprises' exploitative innovation investment is not significant.*

3.2. Moderating Effect of Economic Policy Uncertainty

In the presence of economic policy uncertainty, the government's adjustments or formulation of new macroeconomic policies create an external forcing effect on the development of enterprises at the micro level, prompting them to prioritize technological innovation. As excessive exploitative innovation may not be conducive to the long-term performance and sustainable development of the enterprise, managers are more likely to invest in exploratory innovation that focuses on frontier products and services to meet future market needs especially in crisis environment [31]. It is obvious that this investment strategy helps alleviate managerial myopia, urging managers to keep up with the dynamic changes in economic policy, and avoid making decisions that leave the enterprise vulnerable in the future market. Thus, in a dynamic environment where economic policy uncertainty exists, managers are less likely to focus solely on exploitative innovation investment and will significantly ease the negative impact on exploratory innovation investment, even if they have a tendency towards managerial myopia. Only through this investment strategy can enterprises prevent being eliminated by the growing market. Therefore, the following hypothesis is formulated:

Hypothesis 2a (H2a). *Economic policy uncertainty weakens the negative relationship between managerial myopia and exploratory innovation investment.*

Hypothesis 2b (H2b). *The moderating effect of economic policy uncertainty in the relationship between managerial myopia and exploitative innovation investment is not significant.*

The framework of theoretical analysis is shown in Figure 1.

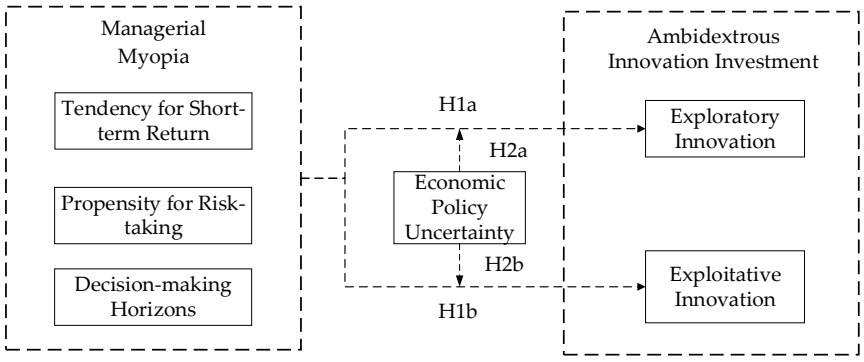

Figure 1. Theoretical analysis framework.

4. Methodology and Data

4.1. Sample and Data

Taking inspiration from the research of Cao et al. [11], this study employs a research methodology that integrates empirical research with advanced machine learning techniques, utilizing data from China's A-share listed companies spanning the period from 2010 to 2020 as the initial sample. Drawing on the existing research, the samples are screened according to the following criteria: Firstly, companies with missing R&D and capitalization expenditure data are removed. Secondly, special treatment (ST) and particular transfer (PT) companies are excluded due to their abnormal financial status. Thirdly, companies with missing financial information are deleted. To eliminate the influence of extreme values, this paper applies winsorization to all continuous variables in the 1% quantile. As a result, the final sample comprises 23,093 firm-year observations of exploratory innovation investment and 18,446 firm-year observations of exploitative innovation investment. The data on managerial myopia distilled from the Management Discussion and Analysis (MD & A) text is obtained from the WinGo financial text data platform. The exploitative innovation investment, exploratory innovation investment, and other company-level and management

characteristic data are collected from the China Stock Market and Accounting Research (CSMAR) and the Chinese Research Data Services (CNRDS) databases. The index compiled by Baker SR et al. [26] and jointly published by Stanford University and the University of Chicago is used as a measure of economic policy uncertainty. The empirical analysis is conducted using STATA 15.0.

4.2. Key Variables

4.2.1. Ambidextrous Innovation Investment

According to "Accounting Standards for Business Enterprises No. 6—Intangible Assets" Application Guide (2006), research and development projects can be classified into two phases: the research phase and the development phase. The research phase is exploratory, and any related expenditures should be included in the current profit and loss for expense treatment. Investment in this stage is associated with greater risks and uncertainties in returns, and it is comparable to exploratory innovation. The development phase is exploitative, which can be capitalized and recognized as an intangible asset when economic benefits can be generated in the current market, so it can be compared with exploitative innovation. Therefore, this study measures exploratory innovation investment using expense expenditures in the research phase and exploitative innovation investment using capitalized expenditures in the development phase. To avoid the impact of the firm scale effect, the study divides the total assets by the measured expenditures. In addition, considering the hysteresis of innovation investment, this study uses the lagged exploratory innovation investment and exploitative innovation investment as the explained variables, following the research models of Filippetti and Archibugi [32], to alleviate the endogeneity problem. It is indicated that the larger the values of expense expenditure in the research phase and capitalization expenditure in the development phase, the more exploratory innovation investment and exploitative investment, respectively, of the enterprise.

4.2.2. Managerial Myopia

The chapter of MD & A in the annual financial report provides a summary of the company's operating conditions during the reporting period and outlines the outlook for future development plans. As such, existing research suggests that MD & A text can reflect the characteristics of the company's managers. Building on the research of Brochet et al. [10], this paper defines the seed word in the MD & A chapter that reflects the management's short-term time orientation, such as "as soon as possible", "within the day", "pressure", "occasion" and so on. Next, we expand the similar vocabulary using the CBOW model in Word2Vec machine learning technology to train the MD & A corpus to obtain similar words to those in the seed word set. Then we determine the final index word set according to the dictionary method and expert opinions. Finally, we calculate the final managerial myopia index (Myopia) using the proportion of the total word frequency of the vocabulary that reflects managerial myopia to the total word frequency of the MD & A chapter and amplify it by 100 times. The size of the index represents the degree of managerial myopia.

4.2.3. Economic Policy Uncertainty

This paper measures economic policy uncertainty (EPU) using the macro index jointly released by Stanford University and the University of Chicago. This index constructs a comprehensive indicator that measures the macroeconomic uncertainty of each country based on representative media reports in the United States, Europe, Canada, China, India and other regions. As for China, the economic policy uncertainty index is compiled by Baker et al. [33] using the South China Morning Post in Hong Kong as a benchmark to conduct keyword searches. Specifically, the index uses text mining and other methods to retrieve keywords or word combinations related to macroeconomic policies in newspapers and periodicals, such as government, interest rate, and budget. The index further reviews the relevance of articles to calculate the articles related to economic policy uncertainty. The ratio of the number of articles to the total number of articles for the month is used as the

final index to measure economic policy uncertainty. Since the index provides monthly data, this paper converts the index into an annual measurement index by calculating the geometric mean of the data within a year and dividing it by 100.

4.2.4. Control Variables

To account for other potential factors that may affect managerial myopia and ambidextrous innovation investment, this study incorporates control variables such as company size, company age, board size, proportion of independent directors, executive compensation, asset-liability ratio, net asset profit margin, operating income, growth rate, investment opportunity, cash flow, capital intensity, shareholding of the largest shareholder, and shareholding of institutional investors. In addition, the fixed effects of industry and year are controlled.

The variables and their measurement methods involved in this paper are presented in Table 1.

Table 1. Variable definitions.

Variable	Symbol	Definition
Exploratory innovation	R	The one-period lag expenditures in the research phase of the R&D project/total assets × 100%.
Exploitative innovation	D	The one-period lag expenditures in the development phase of the R&D project/total assets × 100%.
Managerial myopia	Myopia	(The word frequency of the vocabulary that reflects managerial myopia/MD & A total word frequency) × 100.
Economic Policy Uncertainty	EPU	The geometric mean of the monthly economic policy uncertainty/100.
Agency cost	AC	The management costs over revenue.
Company size	size	The natural logarithm of total assets.
Company age	Age	The number of years since the firm was established.
Board size	Board	The natural logarithm of the board members.
Proportion of independent directors	ID	The proportion of independent directors of the board.
Manager payment	Mpay	The natural logarithm of the total payment of the top three managers.
Asset-liability ratio	Lev	The total liabilities over total assets.
Returns on Assets	ROA	The net profit over total assets.
Revenue growth rate	Growth	(Revenue of the current period − revenue of the previous period)/revenue of the previous period.
Investment opportunities	Tobinq	The market value over total assets.
Cash flow	Cash	The net cash flow from operating activities over total assets.
Capital intensity	TA	The net fixed assets over total assets.
Institutional investor holdings	Inst	Institutional investor shareholding ratio × 100%.
The largest shareholder	Top1	The shareholding ratio of the largest shareholder.
Year	YEAR	The value equals 1 if it is in the year and 0 otherwise.
Industry	IND	The value equals 1 if it is in the industry and 0 otherwise.

4.3. Econometric Models

In order to examine the impact of managerial myopia on corporate ambidextrous innovation investment, the following regression model is constructed:

$$R_{i,t+1}(D_{i,t+1}) = \beta_0 + \beta_1 Myopia + \beta_2 Control + \sum YEAR + \sum IND + \varepsilon_{i.t} \quad (1)$$

In order to investigate the moderating effect of economic policy uncertainty on the relationship between managerial myopia and ambidextrous innovation investment, this paper constructs the following regression model:

$$R_{i,t+1}(D_{i,t+1}) = \beta_0 + \beta_1 Myopia + \beta_2 EPU + \beta_3 Myopia \times EPU + \beta_4 Control + \sum YEAR + \sum IND + \varepsilon_{i.t} \quad (2)$$

5. Empirical Analysis Results

5.1. Descriptive Statistics and Correlation Analysis

Table 2 presents descriptive statistics, including the mean, standard deviation, minimum, median, and maximum of each primary variable. The table shows that there are 23,093 observations for exploratory innovation investment (R) and 18,446 observations for exploitative innovation investment (D), and represents the average ratio of exploratory innovation investment and exploitative innovation investment to total assets, which are 1.785% and 0.268%, respectively. These results indicate that more enterprises make exploratory investments, but the levels of investment in both exploratory and exploitative innovation are not high enough. The standard deviations of R and D are 1.838 and 0.668, respectively, which are largely consistent with previous studies. The maximum and minimum values of the two variables show a significant difference, with the former being greater than the latter. In terms of managerial myopia (Myopia), the mean, standard deviation, and median of the indicators are 0.080, 0.070, and 0.69, respectively, indicating that the text index of managerial myopia has sufficient variability. The descriptive statistics of the remaining control variables are consistent with previous studies.

Table 2. Descriptive statistics of variables.

Variable	Obs	Mean	SD	Min	p50	Max
R	23,093	1.785	1.838	0	1.444	9.568
D	18,446	0.268	0.668	0	0	3.830
Myopia	23,093	0.080	0.069	0	0.065	0.343
EPU	23,093	2.436	1.139	3.639	7.919	4.126
Size	23,093	22.10	1.262	19.34	21.90	26.16
Lev	23,093	0.397	0.199	0.051	0.385	0.908
ROA	23,093	0.042	0.060	−0.293	0.041	0.205
Growth	23,093	0.167	0.371	−0.577	0.110	2.486
Tobinq	23,093	2.027	1.256	0.855	1.624	8.890
Cash	23,093	0.047	0.067	−0.172	0.047	0.248
TA	23,093	0.205	0.146	0.002	0.176	0.690
Inst	23,093	41.86	25.27	0.310	43.38	91.84
Mpay	23,093	14.41	0.688	12.74	14.38	16.44
Top1	23,093	34.26	14.50	8.650	32.27	74.98
Id	23,093	37.57	5.342	33.33	35.71	57.14
Board	23,093	2.123	0.196	1.609	2.197	2.708

Table 3 reports the results of the correlation analysis between the main variables. The findings suggest that managerial myopia has varying effects on exploratory and exploitative innovation investments. To enhance the precision of the test, it is essential to control for other influential factors in the regression analysis and conduct further investigations.

Table 3. Correlation analysis results of variables.

Variable	R	D	Myopia	EPU	Size	Lev	ROA	Growth	Tobinq	Cash	TA	Inst	Mpay	Top1	Id	Board	Age
R	1																
D	0.035 ***	1															
Myopia	−0.092 ***	−0.073 ***	1														
EPU	−0.108 ***	0.196 ***	−0.143 ***	1													
Size	−0.191 ***	−0.019 **	0.056 ***	0.124 ***	1												
Lev	−0.184 ***	−0.067 ***	0.097 ***	0.0110	0.552 ***	1											
ROA	0.127 ***	0.011	−0.075 ***	−0.034 ***	−0.047 ***	−0.356 ***	1										
Growth	0.060 ***	0.025 ***	−0.081 ***	−0.059 ***	0.031 ***	0.030 ***	0.231 ***	1									
Tobinq	0.136 ***	0.161 ***	−0.041 ***	−0.072 ***	−0.339 ***	−0.264 ***	0.178 ***	0.039 ***	1								
Cash	0.040 ***	0.015 **	−0.021 ***	0.129 ***	0.074 ***	−0.150 ***	0.390 ***	0.015 **	0.125 ***	1							
TA	−0.157 ***	−0.112 ***	0.140 ***	−0.071 ***	0.147 ***	0.139 ***	−0.088 ***	−0.075 ***	−0.107 ***	0.205 ***	1						
Inst	−0.081 ***	−0.075 ***	0.082 ***	−0.035 ***	0.429 ***	0.216 ***	0.075 ***	0.015 **	−0.039 ***	0.113 ***	0.157 ***	1					
Mpay	0.081 ***	0.112 ***	−0.092 ***	0.334 ***	0.427 ***	0.109 ***	0.161 ***	0.034 ***	−0.031 ***	0.204 ***	−0.086 ***	0.198 ***	1				
Top1	−0.069 ***	−0.115 ***	0.053 ***	−0.072 ***	0.164 ***	0.049 ***	0.127 ***	−0.008	−0.088 ***	0.092 ***	0.100 ***	0.480 ***	−0.018 ***	1			
Id	0.002	0.025 ***	−0.035 ***	0.047 ***	−0.004	−0.017 ***	−0.009	−0.012 *	0.039 ***	0.001	−0.040 ***	−0.070 ***	−0.002	0.054 ***	1		
Board	−0.053 ***	−0.041 ***	0.071 ***	−0.088 ***	0.267 ***	0.166 ***	−0.005	−0.0110	−0.120 ***	0.019 ***	0.138 ***	0.228 ***	0.084 ***	0.008	−0.556 ***	1	
Age	−0.128 ***	0.024 ***	0.037 ***	0.342 ***	0.210 ***	0.181 ***	−0.087 ***	−0.072 ***	−0.0100	0.056 ***	0.043 ***	0.071 ***	0.187 ***	−0.094 ***	−0.014 **	0.053 ***	1

Note: *, **, and *** represent the significance level of 10%, 5%, and 1%, respectively.

5.2. Regression Results

This study tests Hypothesis H1 using Model (1) to examine the impact of managerial myopia on exploratory and exploitative innovation investments. The results are presented in Table 4. Column (1) shows a significant negative correlation between managerial myopia and one-period lagged exploratory innovation investment ($\beta = -0.547$, $p < 0.01$). The economic significance of this impact shows that with a one standard deviation increase in managerial myopia, exploratory innovation investment decreases by approximately 0.021 standard deviations ($-0.547 \times 0.069/1.838$). This suggests that managerial myopia significantly hinders firms' investment in exploratory innovation both statistically and economically. However, column (2) indicates that the regression coefficient between managerial myopia and one-period lagged exploitative innovation investment is negative but not significant, indicating that managerial myopia does not significantly inhibit exploitative innovation investment. Therefore, Hypothesis H1 is proved.

Table 4. Regression results of managerial myopia and ambidextrous innovation investment.

Variable	(1) R	(2) D
Myopia	−0.547 *** (−3.753)	−0.087 (−1.436)
Size	−0.201 *** (−14.803)	0.019 *** (3.263)
Lev	−0.225 *** (−3.053)	−0.053 * (−1.698)
ROA	1.132 *** (4.275)	−0.151 (−1.513)
Growth	0.071 ** (2.340)	0.019 (1.633)
Tobinq	0.064 *** (4.730)	0.059 *** (9.873)
Cash	1.279 *** (6.449)	−0.095 (−1.291)
TA	−0.899 *** (−11.077)	−0.204 *** (−5.794)
Inst	0.003 *** (5.228)	−0.001 ** (−2.347)
Mpay	0.463 *** (23.957)	0.067 *** (8.209)
Top1	−0.002 ** (−2.184)	−0.002 *** (−5.324)
Id	0.001 (0.422)	0.002 * (1.913)
Board	0.072 (1.000)	0.014 (0.460)
Age	−0.253 *** (−7.054)	−0.062 *** (−4.353)
_cons	−0.689 * (−1.900)	−1.208 *** (−7.742)
YEAR	Yes	Yes
IND	Yes	Yes
N	23,093	18,446
r2_a	0.256	0.171

Note: *, **, and *** represent the significance level of 10%, 5%, and 1%, respectively. The values in parentheses are standard errors.

5.3. Moderating Effect of Economic Policy Uncertainty

This paper tests Hypothesis H2 using model (2) and studies the moderating effect of economic policy uncertainty on the relationship between managerial myopia and investment in both exploratory and exploitative innovation. Table 5 presents the results. As shown in column (1), economic policy uncertainty significantly reduces the negative impact of managerial myopia on exploratory innovation investment ($\beta = 0.191$, $p < 0.01$), but has no significant moderating effect on exploitative innovation investment. These findings verify Hypothesis H2.

Table 5. Regression results of the moderating effect of economic policy uncertainty.

Variable	(1) R	(2) D
Myopia × EPU	0.191 *** (2.944)	−0.053 (−1.274)
EPU	−0.141 *** (−13.523)	0.075 *** (12.561)
Myopia	−1.241 *** (−4.875)	0.064 (0.580)
Size	−0.200 *** (−14.793)	0.019 *** (3.262)
Lev	−0.218 *** (−2.953)	−0.055 * (−1.734)
ROA	1.133 *** (4.278)	−0.151 (−1.510)
Growth	0.070 ** (2.294)	0.020 * (1.647)
Tobinq	0.065 *** (4.788)	0.059 *** (9.848)
Cash	1.283 *** (6.471)	−0.096 (−1.299)
TA	−0.901 *** (−11.106)	−0.203 *** (−5.753)
Inst	0.003 *** (5.258)	−0.001 ** (−2.352)
Mpay	0.462 *** (23.916)	0.067 *** (8.248)
Top1	−0.002 ** (−2.211)	−0.002 *** (−5.322)
Id	0.001 (0.444)	0.002 * (1.904)
Board	0.071 (0.987)	0.014 (0.463)
Age	−0.254 *** (−7.077)	−0.063 *** (−4.368)
_cons	−0.408 (−1.131)	−1.344 *** (−8.700)
YEAR	Yes	Yes
IND	Yes	Yes
N	23,093	18,446
r2_a	0.257	0.171

Note: *, **, and *** represent the significance level of 10%, 5%, and 1%, respectively. The values in parentheses are standard errors.

5.4. Grouping Test for the Agency Cost

This paper further investigates the varying impact of different agency cost (AC) on the relationship between managerial myopia and ambidextrous innovation investment. According to agency theory, information asymmetry exists between a company's share-

holders and management due to the separation of ownership and management rights [34]. Given that the management usually has potential information advantage, this information asymmetry causes inconsistencies in the exploratory and exploitative investment decisions due to divergent objectives between management and shareholders. These inconsistencies are more pronounced in companies with higher agency problems.

Specifically, managers with bounded rationality tend to prioritize their personal interests over the shareholders' interests, resulting in inefficient investments that prioritize short-term benefits over long-term development. As a result, management prefers low-risk investment projects with faster returns to improve their short-term performance, salary, and welfare benefits [35]. This preference leads to a tendency to choose exploitative innovation investment projects rather than exploratory innovation investment projects because the latter has higher unpredictability, longer investment recovery periods, and higher failure rates. Thus, the management may overlook the benefits of exploratory innovation investment even if it enhances long-term competitiveness, which aligns with the shareholders' goals. Consequently, in companies with serious agency problems, managerial myopia has a more substantial negative impact on exploratory innovation investment due to the greater divergence between shareholders and management in their business objectives and their different choices for ambidextrous innovation investment.

Based on the above analysis, we expect that managerial myopia has a significantly greater impact on exploratory innovation investment in high agency cost firms than in low agency cost firms. Therefore, this paper divides the sample into a high agency cost group and a low agency cost group based on the median of the management expense ratio according to prior research [34]. The regression results in Table 6 show that for enterprises with higher agency cost, managerial myopia significantly inhibits exploratory innovation investment (as shown in the first column, $\beta = -1.021$, $p < 0.01$), and this inhibitory effect has a significant easing effect on enterprises with lower agency cost (as shown in the second column, $\beta = -0.882$, $p < 0.05$). Then the Fisher's permutation test method is used to test the coefficient difference between groups, and there are significant differences among the enterprise groups with different agency cost, repeated 100 times. In addition, the impact of managerial myopia on exploitative innovation investment is not significant in different groups. These regression results support the conclusion of the above analysis. By reducing agency cost and reconciling goal consistency between management and shareholders, management can prioritize exploratory innovation from the perspective of enterprises' long-term sustainability, which can effectively reduce the impact of managerial myopia on inhibiting exploratory innovation.

Table 6. Regression results of the grouping test for agency cost.

Variable	(1)	(2)	(3)	(4)
	R		D	
	AC = 1	AC = 0	AC = 1	AC = 0
Myopia	−1.021 ***	−0.882 **	0.081	0.033
	(−2.698)	(−2.566)	(0.418)	(0.298)
Myopia × EPU	0.097	0.121	−0.073	−0.032
	(0.859)	(1.527)	(−0.924)	(−0.794)
EPU	−0.170 ***	−0.096 ***	0.099 ***	0.059 ***
	(−10.089)	(−7.441)	(9.775)	(8.457)
Size	−0.258 ***	−0.153 ***	0.023 **	0.021 ***
	(−11.342)	(−9.035)	(2.281)	(2.900)
Lev	−0.170	−0.112	−0.056	0.029
	(−1.571)	(−1.091)	(−1.179)	(0.712)
ROA	1.020 ***	1.252 ***	−0.010	−0.052
	(2.826)	(3.235)	(−0.070)	(−0.399)

Table 6. *Cont.*

Variable	(1)	(2)	(3)	(4)
	R		D	
	AC = 1	AC = 0	AC = 1	AC = 0
Growth	0.186 *** (3.884)	−0.012 (−0.308)	0.033 * (1.765)	0.018 (1.189)
Tobinq	0.079 *** (4.335)	0.036 * (1.694)	0.056 *** (7.322)	0.053 *** (5.747)
Cash	1.885 *** (6.063)	0.654 *** (2.618)	−0.169 (−1.441)	−0.029 (−0.325)
TA	−1.371 *** (−10.915)	−0.583 *** (−5.531)	−0.291 *** (−5.108)	−0.110 ** (−2.565)
Inst	0.003 *** (3.730)	0.003 *** (4.444)	−0.001 (−1.601)	−0.000 (−0.824)
Mpay	0.650 *** (21.518)	0.299 *** (12.271)	0.088 *** (6.795)	0.039 *** (3.960)
Top1	−0.003 ** (−2.497)	−0.001 (−0.532)	−0.002 *** (−4.309)	−0.001 *** (−3.336)
Id	0.004 (1.191)	−0.003 (−1.000)	0.002 (1.241)	0.001 (0.836)
Board	0.348 *** (3.159)	−0.261 *** (−2.796)	−0.011 (−0.232)	0.022 (0.560)
Age	−0.330 *** (−6.271)	−0.152 *** (−3.141)	−0.091 *** (−4.080)	−0.017 (−1.051)
_cons	−1.993 *** (−3.286)	1.046 ** (2.407)	−1.592 *** (−6.433)	−1.128 *** (−5.845)
YEAR	Yes	Yes	Yes	Yes
IND	Yes	Yes	Yes	Yes
N	11,546	11,547	10,085	8361
r2_a	0.279	0.216	0.174	0.150

Note: *, **, and *** represent the significance level of 10%, 5%, and 1%, respectively. The values in parentheses are standard errors.

5.5. Robustness Test

5.5.1. Substitutional Variable Test

Bi [36] as well as Liu et al. [37] conducted a research that involved using the proportion of expensed and capitalized R&D expenditure in relation to revenue, to reassess an enterprise's exploratory innovation investment (R1) and exploitative innovation investment (D1). The results in Table 7 indicate that the regression coefficient of managerial myopia on the enterprise's exploratory innovation investment is significantly negative ($\beta = -1.648$, $p < 0.01$). However, the regression coefficient of exploitative innovation investment is found to be insignificant. Therefore, even after changing the measurement method of the dependent variable, namely ambivalent innovation investment, the results remain robust.

Table 7. Regression results of the substitutional variable test.

Variable	(1) R1	(2) D1
Myopia	−1.648 *** (−5.315)	−0.120 (−0.798)
Size	−0.139 *** (−4.892)	0.096 *** (6.506)
Lev	−4.278 *** (−24.680)	−0.740 *** (−9.117)

Table 7. *Cont.*

Variable	(1) R1	(2) D1
ROA	−3.990 ***	−1.321 ***
	(−6.243)	(−4.830)
Growth	−0.182 ***	0.002
	(−2.589)	(0.067)
Tobinq	0.277 ***	0.168 ***
	(9.263)	(10.650)
Cash	−0.819 *	−0.888 ***
	(−1.931)	(−4.866)
TA	−2.692 ***	−0.513 ***
	(−15.575)	(−5.941)
Inst	0.002	−0.002 ***
	(1.615)	(−3.179)
Mpay	0.679 ***	0.114 ***
	(16.390)	(5.900)
Top1	−0.011 ***	−0.006 ***
	(−6.031)	(−6.240)
Id	0.013 **	0.005 **
	(2.502)	(1.987)
Board	0.256 *	−0.043
	(1.703)	(−0.576)
Age	−0.917 ***	−0.175 ***
	(−11.436)	(−4.825)
_cons	−0.793	−2.771 ***
	(−1.039)	(−7.457)
YEAR	Yes	Yes
IND	Yes	Yes
N	23,093	18,446
r2_a	0.293	0.167

Note: *, **, and *** represent the significance level of 10%, 5%, and 1%, respectively. The values in parentheses are standard errors.

5.5.2. Alternative Model Regression

Considering that many enterprises invest zero in ambidextrous innovation, which may cause a change in the probability density after tail-docking and lead to bias when using OLS regression directly. To overcome this sample problem, Tobit regression is used in this paper. This model is suitable when the dependent variable is continuously distributed on positive values but contains many observations with a positive probability value of 0. By using Tobit regression, this paper tests the impact of managerial myopia on corporate ambidextrous innovation investment. Table 8 shows that even after using the Tobit model, the negative impact of managerial myopia on the enterprise's exploratory innovation investment remains significant ($\beta = -0.492$, $p < 0.01$), while the impact on the exploitative innovation investment is not significant. The empirical results are consistent with the original conclusion.

Table 8. Regression results of the alternative model test.

Variable	(1) R	(2) D
Myopia	−0.492 ***	−0.207
	(−2.693)	(−1.196)
Size	−0.184 ***	0.155 ***
	(−11.972)	(10.862)
Lev	−0.262 ***	−0.148 *
	(−3.103)	(−1.891)

Table 8. *Cont.*

Variable	(1) R	(2) D
ROA	1.191 ***	−0.842 ***
	(4.622)	(−3.539)
Growth	0.072 **	0.085 ***
	(2.088)	(2.838)
Tobinq	0.068 ***	0.141 ***
	(5.869)	(13.542)
Cash	1.193 ***	−0.526 ***
	(5.593)	(−2.610)
TA	−0.992 ***	−0.753 ***
	(−9.689)	(−7.781)
Inst	0.004 ***	−0.001
	(6.473)	(−1.357)
Mpay	0.484 ***	0.153 ***
	(21.920)	(7.439)
Top1	−0.001	−0.006 ***
	(−1.355)	(−6.774)
Id	0.001	0.006 **
	(0.382)	(2.364)
Board	0.128	0.058
	(1.589)	(0.793)
Age	−0.263 ***	−0.117 ***
	(−6.443)	(−3.035)
_cons	−1.580 ***	−6.786 ***
	(−3.791)	(−17.289)
YEAR	Yes	Yes
IND	Yes	Yes
N	23,093	18,446
r2_a	0.293	0.167

Note: *, **, and *** represent the significance level of 10%, 5%, and 1%, respectively. The values in parentheses are standard errors.

5.5.3. 2SLS Regression

When recruiting managers, companies may have inherent selection criteria, especially those that do not focus on long-term innovation. Such companies are more likely to choose managers who have short-term oriented decision-making horizons rather than long-term. To avoid the impact of this endogeneity problem, this paper uses instrumental variables and 2SLS regression. The average level of managerial myopia of other companies in the same industry and region is used as the instrumental variable for managerial myopia. In the first stage, instrumental and other control variables are regressed to obtain fitted values for managerial myopia. In the second stage, the fitted value of the first stage is used to perform the least squares regression of the model (1), and the results are shown in Table 9. The relationship between managerial myopia and enterprise investment in exploratory innovation is still significantly negative ($\beta = -25.335$, $p < 0.01$), and the impact on investment in exploitative innovation is not significant, indicating that the empirical results are relatively robust.

Table 9. Regression results of the alternative model test.

Variable	(1) R	(2) D
Myopia	−25.335 ***	3.636
	(−3.111)	(1.465)
Size	−0.182 ***	0.015 **
	(−9.046)	(2.239)

Table 9. *Cont.*

Variable	(1) R	(2) D
Lev	−0.007 (−0.055)	−0.096 ** (−2.156)
ROA	−0.001 (−0.003)	0.038 (0.230)
Growth	−0.202 ** (−2.053)	0.063 ** (1.978)
Tobinq	0.054 *** (3.161)	0.058 *** (9.198)
Cash	1.395 *** (5.008)	−0.118 (−1.421)
TA	−0.040 (−0.130)	−0.342 *** (−3.415)
Inst	0.005 *** (4.895)	−0.001 *** (−2.583)
Mpay	0.344 *** (7.296)	0.087 *** (5.560)
Top1	−0.001 (−1.036)	−0.002 *** (−5.000)
Id	−0.002 (−0.636)	0.002 ** (2.026)
Board	0.171 (1.589)	0.001 (0.032)
Age	0.186 (1.222)	−0.124 *** (−2.842)
_cons	1.284 (1.566)	−1.492 *** (−5.856)
YEAR	Yes	Yes
IND	Yes	Yes
N	23,093	18,446

Note: *, **, and *** represent the significance level of 10%, 5%, and 1%, respectively. The values in parentheses are standard errors.

6. Conclusions

This paper examines the impact of managerial myopia on corporate ambidextrous innovation investment based on sample data of China A-share listed companies from 2010 to 2020. It also explores the moderating effect of economic policy uncertainty and examines the difference in impact among companies with different agency costs. Firstly, the study concludes that managerial myopia inhibits ambidextrous innovation investment, but the impacts are different. On one hand, it significantly inhibits the level of exploratory innovation investment, resulting in a decrease of approximately 2.1% in exploratory innovation investment with a one standard deviation increase in managerial myopia. On the other hand, it has no obvious impact on exploitative innovation investment. This suggests that managerial myopia hinders enterprises from breaking away from old technology tracks for long-term development and innovating for future potential markets. Secondly, the moderating effect of economic policy uncertainty significantly weakens the inhibitory effect of managerial myopia on exploratory innovation investment. This implies that the government can use macro policy adjustments to form a "reversed" mechanism for the micro-development of enterprises, promoting them to continuously explore technological innovation. Thirdly, managerial myopia has a more significant inhibitory effect on exploratory innovation in enterprises whose agency cost are higher. This suggests that the severity of agency problems can affect managerial myopia, which is even more detrimental to enterprise exploratory innovation.

The literature review identifies a scarcity of research that specifically delves into the relationship between managerial myopia and corporate ambidextrous innovation investment [9]. This paper addresses this gap by examining the impact of managerial myopia

on both exploitative and exploratory innovation investment, providing valuable insights into how short-sighted managerial behavior may affect different types of innovation investment. First of all, existing studies predominantly focus on demographic factors while overlooking the impact of managerial myopia on innovation investment [5–8]. In contrast, this study emphasizes the role of psychological tendencies, specifically managerial myopia, in influencing ambidextrous innovation investment decisions, contributing to a deeper understanding of the underlying mechanisms. Besides, the distinction between exploitative and exploratory innovation investment has not been adequately addressed in previous research on managerial myopia [10,11]. We examine the impact of managerial myopia on both types of innovation investment separately. In summary, our study could make several unique contributions to the existing literature by addressing the identified research gaps and providing insights into the impact of managerial myopia on corporate ambidextrous innovation investment, examining moderating effects and agency costs, and offering implications for theory and practice.

Based on the conclusions drawn from this study, this paper proposes the following recommendations: Firstly, companies should develop long-term technology development strategies and make informed decisions regarding ambidextrous innovation investments. It is important to consider the trade-off between exploratory innovation and exploitative innovation and prevent management myopia, which may lead to a focus only on current market demand and short-term performance, while neglecting the exploration of future market demand and long-term innovation. Secondly, the government should formulate and adjust policies in a timely manner to encourage technological exploration by companies. While exploratory innovation is associated with higher risks, higher failure rates, and longer payback periods than exploitative innovation, it is critical for companies to break free from the old technology track, gain a competitive edge in international markets, and remain relevant in an increasingly competitive global environment. Therefore, the government should encourage exploratory innovation, which is characterized by originality and breakthrough. Finally, under the agent relationship, management has a higher level of discretionary power in formulating and implementing corporate innovation investment decisions than shareholders. Therefore, companies should be encouraged to establish appropriate equity incentive mechanisms, improve information disclosure levels, and strengthen internal control systems, as well as internal and external governance measures such as analysts and media supervision. This will help alleviate the agency problem, promote the consistency of long-term business goals, strengthen the interest coordination between shareholders and management, and enable companies to unlock the key to ambidextrous innovation dynamic capabilities.

Although this paper attempts to clarify the impact of managerial myopia on ambidextrous innovation, there are still some limitations to this study due to the complexity of the mechanism of action and research methods. Firstly, this paper only uses MD&A texts to construct the managerial myopia index, while other sections of the annual financial report and company announcements can also reflect management characteristics. Future research can expand the scope of text mining and include corporate social responsibility reports, internal control reports, and more. Secondly, this paper only focuses on the impact of managerial myopia on ambidextrous innovation investment. In the next step, a more comprehensive approach could be adopted by considering both input and output variables, and further exploring the impact of managerial myopia on the efficiency of ambidextrous innovation investment, potentially through the utilization of structural equation modeling methods. Thirdly, although this paper has carried out various robustness tests, there may be more appropriate methods. In the future, suitable instrumental variables can be found to alleviate the endogeneity problem.

Author Contributions: Conceptualization, T.Y. and Y.C.; methodology and data processing, T.Y. and R.L.; formal analysis and investigation, T.Y. and Y.C.; writing and editing, T.Y., Y.C. and R.L. All authors have read and agreed to the published version of the manuscript.

Funding: This project received funding from China Energy Investment Corporation (CEZB210206766001).

Institutional Review Board Statement: Not applicable.

Informed Consent Statement: Not applicable.

Data Availability Statement: Not applicable.

Conflicts of Interest: The authors declare no conflict of interest.

References

1. O'Reilly, C.A.; Tushman, M.L. Organizational Ambidexterity: Past, Present, and Future. *Acad. Manag. Perspect.* **2013**, *27*, 324–338. [CrossRef]
2. Benner, M.J.; Tushman, M.L. Exploitation, exploration, and process management: The productivity dilemma revisited. *Acad. Manag. Rev.* **2003**, *28*, 238–256. [CrossRef]
3. Gupta, A.K.; Smith, K.G.; Shalley, C.E. The interplay between exploration and exploitation. *Acad. Manag. J.* **2006**, *49*, 693–706. [CrossRef]
4. Koryak, O.; Lockett, A.; Hayton, J.; Nicolaou, N.; Mole, K. Disentangling the antecedents of ambidexterity: Exploration and exploitation. *Res. Policy* **2018**, *47*, 413–427. [CrossRef]
5. Lavie, D.; Klarner, P. When Does a CEO's Risk Propensity Drive Exploration in Product Development? *Strategy Sci.* **2023**, *8*, 1–23. [CrossRef]
6. Zhu, D.H.; Jia, L.; Li, F. Too much on the plate? How executive job demands harm firm innovation and reduce share of exploratory innovations. *Acad. Manag. J.* **2022**, *65*, 606–633. [CrossRef]
7. Ma, J.; Duan, Y.; Wang, J.; Luo, M. Impact of Self-Efficacy on Entrepreneurs' Ambidextrous Behavior in New Ventures: Moderating Effect of Status. *Behav. Sci.* **2023**, *13*, 108. [CrossRef]
8. Ben Rejeb, W.; Berraies, S.; Talbi, D. The contribution of board of directors' roles to ambidextrous innovation. *Eur. J. Innov. Manag.* **2019**, *23*, 40–66. [CrossRef]
9. Mizik, N. The theory and practice of myopic management. *J. Mark. Res.* **2010**, *47*, 594–611. [CrossRef]
10. Brochet, F.; Loumioti, M.; Serafeim, G. Speaking of the short-term: Disclosure horizon and managerial myopia. *Rev. Acc. Stud.* **2015**, *20*, 1122–1163. [CrossRef]
11. Cao, Q.; Ju, M.; Li, J.; Zhong, C. Managerial Myopia and Long-Term Investment: Evidence from China. *Sustainability* **2023**, *15*, 708. [CrossRef]
12. Berraies, S.; Rejeb, W.B. Boards of directors' roles and size: What effects on exploitative and exploratory innovations? Case of listed Tunisian firms. *Int. J. Entrep. Innov. Manag.* **2019**, *23*, 161–179. [CrossRef]
13. Zimbardo, P.G.; Boyd, J.N. *Putting Time in Perspective: A Valid, Reliable Individual-Differences Metric*; Springer International Publishing: Cham, Switzerland, 2015; pp. 17–55.
14. Wilden, R.; Lin, N.; Hohberger, J.; Randhawa, K. Selecting innovation projects: Do middle and senior managers differ when it comes to radical innovation? *J. Manag. Stud.* **2022**. [CrossRef]
15. Bluedorn, A.C.; Martin, G. The time frames of entrepreneurs. *J. Bus. Ventur.* **2008**, *23*, 1–20. [CrossRef]
16. He, J.J.; Tian, X. The dark side of analyst coverage: The case of innovation. *J. Financ. Econ.* **2013**, *109*, 856–878. [CrossRef]
17. Marginson, D.; McAulay, L. Exploring the debate on short-termism: A theoretical and empirical analysis. *Strateg. Manag. J.* **2008**, *29*, 273–292. [CrossRef]
18. Tunyi, A.A.; Ntim, C.G.; Danbolt, J. Decoupling management inefficiency: Myopia, hyperopia and takeover likelihood. *Int. Rev. Financ. Anal.* **2019**, *62*, 1–20. [CrossRef]
19. Mishra, C.S. Does institutional ownership discourage investment in corporate R&D? *Technol. Soc.* **2022**, *182*, 121837.
20. Graham, J.R.; Harvey, C.R.; Rajgopal, S. The economic implications of corporate financial reporting. *J. Account. Econ.* **2005**, *40*, 3–73. [CrossRef]
21. Narayanan, M.P. Managerial Incentives for Short-term Results. *J. Financ.* **1985**, *40*, 1469–1484. [CrossRef]
22. Edmans, A.; Fang, V.W.; Lewellen, K.A. Equity Vesting and Investment. *Rev. Financ. Stud.* **2017**, *30*, 2229–2271. [CrossRef]
23. Seo, H.J.; Kang, S.J.; Baek, Y.J. Managerial myopia and short-termism of innovation strategy: Financialisation of Korean firms. *Camb. J. Econ.* **2020**, *44*, 1197–1220. [CrossRef]
24. Constant, F.; Calvi, R.; Johnsen, T.E. Managing tensions between exploitative and exploratory innovation through purchasing function ambidexterity. *J. Purch. Supply Manag.* **2020**, *26*, 100645. [CrossRef]
25. March, J.G. Exploration and exploitation in organizational learning. *Organ. Sci.* **1991**, *2*, 71–87. [CrossRef]
26. Buckley, P.J.; Chen, L.; Clegg, L.J.; Voss, H. The role of endogenous and exogenous risk in FDI entry choices. *J. World Bus* **2020**, *55*, 101040. [CrossRef]

27. Holman, E.A.; Zimbardo, P.G. The Social Language of Time: The Time Perspective-Social Network Connection. *Basic Appl. Soc. Psych.* **2009**, *31*, 136–147. [CrossRef]
28. Nadkarni, S.; Chen, J. Bridging yesterday, today, and tomorrow: CEO temporal focus, environmental dynamism, and rate of new product introduction. *Acad. Manag. J.* **2014**, *57*, 1810–1833. [CrossRef]
29. Luger, J.; Raisch, S.; Schimmer, M. Dynamic balancing of exploration and exploitation: The contingent benefits of ambidexterity. *Organ. Sci.* **2018**, *29*, 449–470. [CrossRef]
30. Cho, M.; Bonn, M.A.; Han, S.J. Innovation ambidexterity: Balancing exploitation and exploration for startup and established restaurants and impacts upon performance. *Ind. Innov.* **2020**, *27*, 340–362. [CrossRef]
31. Osiyevskyy, O.; Shirokova, G.; Ritala, P. Exploration and exploitation in crisis environment: Implications for level and variability of firm performance. *J. Bus. Res.* **2020**, *114*, 227–239. [CrossRef]
32. Filippetti, A.; Archibugi, D. Innovation in times of crisis: National Systems of Innovation, structure, and demand. *Res. Policy* **2011**, *40*, 179–192. [CrossRef]
33. Baker, S.R.; Bloom, N.; Davis, S.J. Has Economic Policy Uncertainty Hampered the Recovery? *Q. J. Econ.* **2016**, *134*, 1593–1636. [CrossRef]
34. Ang, J.S.; Cole, R.A.; Lin, J.W. Agency Costs and Ownership Structure. *J. Financ.* **2000**, *55*, 81–106. [CrossRef]
35. Lin, Y.L.; Shi, W.; Prescott, J.E.; Yang, H. In the Eye of the Beholder: Top Managers' Long-Term Orientation, Industry Context, and Decision-Making Processes. *J. Manag.* **2018**, *45*, 3114–3145. [CrossRef]
36. Bi, X.F. Government Subsidies, Financial Slack and Ambidextrous Innovation. *Account. Res.* **2017**, *1*, 46–52.
37. Liu, Z.; Chi, G.-D.; Han, L. Board Human Capital and Enterprise Growth: A Perspective of Ambidextrous Innovation. *Sustainability* **2019**, *11*, 3993. [CrossRef]