

The Influence of Share Pledging on Corporate Financial Performance: Evidence from a Case Study in China

Wenxin Guo^{1,a,*}

¹ School of Accounting, Dongbei University of Finance and Economics, Dalian 116025, China
a. millie_gwx@163.com

*corresponding author

Abstract: Share pledging has been developing rapidly in China, which has an essential impact on the capital market and corporate operation. This paper aims to figure out the influence of controlling shareholder's share pledging behavior on corporate financial performance based on a case study. Collecting the data of Nanjing Xinjiekou Department Store Co., Ltd., a series of ratio analyses was made to evaluate the corporate financial performance impacted by the share pledging of controlling shareholders from 2015 to 2021. It is found that large-scale share pledging can lead to poor liquidity and solvency abilities of a company. The profitability and developing capacity can theoretically be decreased by share pledging behavior when the enterprise tend to make in highly risky investments. Furthermore, this study suggests that enterprises should make rational use of funds, improve the internal control mechanism and enhance the information transparency to achieve better development through share pledging behaviors. The findings are theoretically and practically meaningful for the enterprises and capital market.

Keywords: share pledging, financial ratio analysis, corporate financial performance

1. Introduction

1.1. Background

As a new means of financing, share pledging has become an important way of financing in China's financial market. It refers to the practice of shareholders using their shares as collateral to obtain funds from banks or other financial institutions. This financing method converts the capital that has already been invested in the enterprise into a highly liquid currency again. At the same time, shareholders can obtain the funds needed while maintaining the control rights. Therefore, it is widely utilized by plenty of listed companies.

However, forced sales of share pledging have taken place many times in Chinese listed companies since 2018, and its risk has been exposed. Controlling shareholders' large proportion and frequent share pledges of not only make them face the possibility of losing control of the enterprise, but also make influential companies, such as Nanjing Xinjiekou Department Store Co., Ltd., fall into a serious debt crisis. Consequently, the study how share pledging can affect a company's financial performance can provide a reference for both enterprises and market investors.

1.2. Related Research

Existing studies on share pledging mainly consist of its motivations and economic consequences. The motive of share pledging includes maintaining control rights and alleviating financing constraints. Chan et al. brought up and verified a margin call hypothesis to study the impact of share pledges on corporate decisions. The empirical result shows that controlling shareholder has an incentive to initiate repurchases to avoid margin calls on share pledging in order to maintain their control rights and the repurchase is unlikely to provoke positive reactions from investors [1]. Zhang took the data of GEM listed companies from 2014 to 2018 as a research sample and found a positive relationship between the degree of financing constraints and equity pledge rate. After constructing a regression model of equity pledging and investment, it is also found that funds brought by equity pledging are used by shareholders instead of corporate financing activities, which leads to more severe financing constraints and underinvestment [2]. Cheng et al. examined the reciprocal relationship between share pledging and financing constraints. Constructing an individual-level ratio, it is confirmed that financing constraint leads to insiders' share pledging. Share pledging negatively affects a company's ability to raise capital, according to OLS regression analysis, although the share pledges of controlling shareholders can ease financing constraints the next year [3].

It can be concluded that there are controversies about the influence of share pledging and this inevitably prompts to the research into the economic consequences. Plenty of studies have focused on corporate performance. Yi and Zhang took the data of 79 Chinese real estate listed companies from 2015 to 2019 as a sample to investigate the influence of equity pledge rate on ROA. Analysis of correlation and multiple regression reveals that equity pledge behavior hurts firm financial performance [4]. Cai used the sample of A-share listed companies' data collected from Shanghai and Shenzhen Stock Exchange from 2010 to 2017. From the standpoint of dynamic portfolio adjustment by large shareholders, it is found that equity pledge behavior increases corporate risk-taking level, which is accompanied by a decline in corporate performance. This relationship becomes more obvious when large shareholders invest the capital obtained through equity pledging outside the enterprise [5]. Based on empirical evidence, Kao et al. exhibited an inverse relationship between share pledging and corporate performance which is embedded in conglomerate firms. With further analysis, it is found that institutional investor monitoring, creditors and dividend policy can mitigate agency problems related to share pledging and consequently improve firm performance [6].

In addition, the share pledging behavior can also have an impact on firm value. Li et al. examined the relationship between share pledging and firm value based on a sample of nearly 20,000 firm-year observations collected from the Shanghai and Shenzhen Stock Exchange from 2003 to 2015. The regression analysis shows that there is a significant positive relationship between share pledging and firm value, which is supported by robust tests [7]. Li et al. made empirical analyses and found that share pledging of shareholders can impede CSR behavior from the evidence of Chinese listed firms. This impact is more obvious in companies with higher risk-taking levels and agency costs. Furthermore, the poor CSR performance brought by share pledging leads to a decrease in corporate performance and firm value [8].

What is more, corporate activities such as earnings management and cash dividend payment can also be affected by controlling shareholders' share pledging behavior. Xie and Liao took data from Chinese listed companies from 2003-2016 as the research sample and conducted multiple regression analyses. It is found that controlling shareholders' equity pledging behavior leads to real earnings management of companies and the relationship is even stronger in non-SOEs and firms with weaker controlling right balance [9]. Huang and Xue used Chinese listed non-SOEs as the research sample to figure out the influence of share pledging on controlling shareholders' incentives to manage corporate accounting performance. It is found that share pledging is positively related to the behavior

of earnings smoothing and can bring about better market performance [10]. Li et al. investigated how the share pledging behavior of controlling shareholders affects the corporate payout policy. The empirical results based on DID and PSM methods illustrate that controlling shareholders' share pledges significantly decreases the level of cash dividend payment and they frequently pursue their own interests without considering the benefits of outsiders [11].

There are also relationships between share pledging and other elements in corporate governance such as executor pay-for-performance sensitivity and information transparency. In order to determine how insider's share pledging (ISP) behavior affects executive pay-for-performance sensitivity, Ouyang et al. conducted regression analysis. The study's findings using data from China demonstrate that ISP causes a decline in executive pay-for-performance sensitivity. When there is a high danger of ownership shifting, the negative association is amplified, and it is reduced when there is effective corporate governance [12]. Puleo et al. explored how share pledging of corporate insiders affects the cost of debt through OLS, DID and instrumental variable models and event study method. The results demonstrate a significant negative relationship between share pledging and the cost of debt both statistically and economically, which may lead to higher information transparency of share pledging behavior [13].

1.3. Objective

The literature has shown that there is a negative relationship between share pledging behavior and corporate performance. However, the majority of the research results were based on empirical studies and little evidence was found through case studies. This paper aims to verify the theoretical conclusions in practice using a typical case and tries to figure out the influence of controlling shareholder's share pledging behavior on corporate financial performance based on financial ratio analysis.

The remainder of this paper is organized as follows. "CENBEST's share pledging and its motivations" section makes an overview of the case of this study. Financial analysis is made in the "The influence of enterprise equity pledging on financial performance" section and the influences of share pledging are analyzed. In the "Suggestions" section, some suggestions were put forward based on the analysis. The "Conclusion" section makes an overall conclusion of the whole study.

2. CENBEST's Share Pledging and Its Motivations

2.1. Corporate Introduction and Equity Structure

Nanjing Xinjiekou Department Store Co., Ltd. (CENBEST), found in 1952, was listed on Shanghai Stock Exchange in 1993 and the stock code is 600682.SH. As the first commercial listed company in China, CENBEST is a Chinese time-honored enterprise. Although the businesses of CENBEST include healthy pension, biological immunity, storage and application of umbilical cord blood stem cells and modern commerce, it is still recognized as a retail industry company.

By the end of 2021, CENBEST owns 1,346,132,221 shares in total and Sanpower Group held 35.99% of them to become the largest shareholder. The basic information of the top 10 shareholders is shown in Table 1. Although the shareholding structure of CENBEST is relatively scattered, Sanpower Group still takes the controlling position.

Table 1: Basic information of CENBEST's top 10 shareholders.

Name	Number of shares held	Shareholding ratio (%)
Sanpower Group Co., Ltd.	484,482,721	35.99
Yinfeng Biological Group Co., Ltd.	96,722,192	7.19
Xinyu Chuangli Hengyuan Investment & Management Co., Ltd.	55,391,644	4.11
China Huarong Asset Management Co., Ltd.	52,068,803	3.87
Nanjing Huamei Union Marketing Management Co., Ltd.	44,658,856	3.32
Nanjing Tourism Group Co., Ltd.	41,320,000	3.07
Nanjing Zhongsen Taifu Technology Development Co., Ltd.	35,000,000	2.60
China Industrial International Trust Limited	16,503,773	1.23
Guangzhou Jinpeng Group Co., Ltd.	12,773,470	0.95
Wang Wei	9,672,219	0.72

2.2. Share Pledging of Controlling Shareholder

According to the announcement issued by CENBEST, Sanpower Group, as a major shareholder, started its share pledging in 2012. This study attempts to figure out the share pledging behavior of Sanpower after it becomes the controlling shareholder of CENBEST and the details are displayed in Table 2. As is clearly shown in the table, Sanpower pledged most of its shares of CENBEST from 2016 to 2019 and the percentage was up to 99.89%. The frequent share pledging behavior suggests that Sanpower may face financing constraints and is likely to bring financial risks to CENBEST.

Table 2: Share pledging of sanpower group.

Time of announcement	Number of shares pledged (million)	Proportion in total shares of CENBEST (%)	Total number of shares pledged (million)	Proportion in shares of CENBEST it held (%)
10/29/2016	6.40	0.77	258.96	99.89
11/19/2016	17.50	2.11	258.96	99.89
11/19/2016	1.05	0.13	258.96	99.89
11/30/2016	3.00	0.36	258.96	99.89
12/10/2016	7.74	0.93	255.64	98.61
12/21/2016	3.54	0.43	254.23	98.06
12/29/2016	20.00	2.42	255.23	98.45
3/18/2017	33.00	3.00	246.69	81.22
5/27/2017	3.00	0.27	249.69	82.20
8/9/2017	6.40	0.58	294.18	96.85
8/24/2017	1.05	0.09	295.23	97.20
10/31/2017	30.00	2.70	278.18	91.58

Table 2: (continued).

1/8/2018	22.00	1.98	297.68	98.00
4/4/2018	3.20	0.29	297.88	98.06
4/21/2018	12.00	1.08	293.38	96.59
4/28/2018	7.74	0.70	293.38	96.59
6/21/2018	20.00	1.80	285.93	94.14
7/24/2018	10.00	0.90	295.93	97.43
8/17/2018	180.74	13.98	476.67	98.39

2.3. Analysis of Controlling Shareholder's Motives for Share Pledging

Maintaining controlling rights. Compared with other ways of external financing, share pledging is less likely to dilute the control rights of controlling shareholders. As long as the controlling shareholders can fulfill their obligations on time and avoid forced sales, they will not lose control of the company. Sanpower Group has carried out large-scale overseas mergers and acquisitions since 2014 with operations in commercial retailing, healthcare, finance and other industries. Therefore, share pledging is a suitable option if there is a shortage of funding for the company's expansion because it can both alleviate cash flow shortages and preserve its control rights.

Obtaining funds. Sanpower Group had trouble raising funds in its expansion process, and the increased investments did not yield expected profits. Extracting data from cash flow statements, Figure 1 demonstrates that CENBEST's investing activities generated negative net cash flow for several years. In this case, share pledging has lower limits, fewer processes, and faster speeds, making it an easy way to meet enterprises' financing needs.

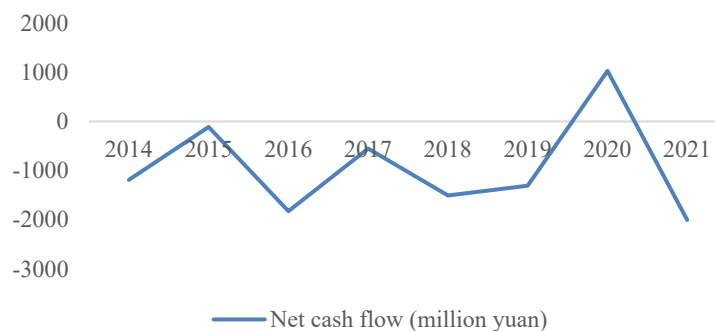


Figure 1: Net cash flow of CENBEST's investment activities.

Encroaching interests. The continuous share pledging of Sanpower Group had gradually reduced its ownership of cash flow. At the same time, the risk is passed on to fund lenders, giving controlling shareholders an incentive to harm other investors and make profits for themselves. In addition, Sanpower Group faces the risk of high debt as a result of its reliance on financial leverage for its overseas expansion. Since 2018, Sanpower has been faced with a series of debt problems, and the capital chain has been broken. The debt disputes were not resolved until the debt restructuring was carried out with the help of the government at the end of 2020. It can be seen that Sanpower Group has sufficient motives to make up for its liquidity crisis through encroaching interests given the peak of share pledging in 2018.

3. The Influence of Enterprise Equity Pledging on Financial Performance

3.1. The Range of Financial Analysis

According to the information in Table 2, Sanpower's share pledging activities mainly occurred between 2016 and 2018. According to the annual reports of CENBEST, due to the slow development and the decline of profitability in the retailing industry, CENBEST began to adjust its development strategy and gradually entered the areas of elderly nursing and medical services in 2014. At the same time, Sanpower Group also began its overseas mergers and acquisitions. However, with the approval of the China Securities Regulatory Commission in March 2018, the Shanghai Stock Exchange issued a stricter regulatory document on share pledging activities. It effectively reduced unreasonable and blind share pledges of enterprises. Therefore, this paper chooses the year 2015 to 2021 as a period to figure out the impact of share pledging behavior of controlling shareholders on corporate financial performance.

This paper also chooses a comparable enterprise to eliminate the interference of external factors. First of all, the selected enterprise should be in the same industry to which CENBEST belongs and their main business should stay consistent so that the industry factor can be controlled. Secondly, this paper analyzes the financial performance of CENBEST from 2015 to 2021, so the year for the selected enterprise to be publicly listed should be earlier than 2015. Finally, to analyze the share pledging behavior of the controlling shareholder of CENBEST, the share pledging ratio of the comparable company must be lower than that of CENBEST. Based on the factors mentioned above, Dashang Co., Ltd. (stock code: 600694) is selected as the comparable company.

3.2. Liquidity Analysis

A higher current ratio or quick ratio indicates a greater ability to meet short-term obligations. The overall current ratio and quick ratio of CENBEST were relatively low from 2015 to 2021, and a downturn appeared from 2015 to 2016. However, the current ratios of Dashang have been slightly higher than that of CENBEST and show a steady upward trend (see Table 3). This tendency illustrates that the liquidity of Dashang is better than that of CENBEST. Sanpower Group, the controlling shareholder of CENBEST, began its concentrated share pledging activities in 2016, so it can be inferred that share pledging can lead to a decline in corporate liquidity. Due to the lack of liquidity before the maturity of short-term debt and the substantial increase in debt caused by share pledging, CENBEST was faced with huge debt repayment pressure in the short term. This pressure can also bring about serious financial risks that the enterprise cannot bear.

Table 3: Liquidity ratios of CENBEST and Dashang.

Year		2015	2016	2017	2018	2019	2020	2021
Current ratio	CENBEST	0.80	0.69	0.75	1.06	1.38	1.48	1.58
	Dashang	1.01	1.12	1.22	1.34	1.48	1.70	1.74
Quick ratio	CENBEST	0.45	0.37	0.51	0.87	1.28	1.40	1.50
	Dashang	0.83	0.70	0.69	0.69	0.98	1.04	1.00

3.3. Solvency Analysis

Figure 2 shows a sharp decline in the financial leverage of CENBEST from 2016 to 2018 and there is an obvious downward trend in the long run. It indicates that share pledging worsens the company's long-term solvency. The financial leverage of Dashang in the same industry as CENBEST has maintained a stable trend with little fluctuation, indicating the good condition of its long-term

solvency. The damage to CENBEST’s long-term solvency is related to its excessive obligations in its blind expansion. The high level of debt in the corporate capital structure will raise the chance of default and make lenders bear higher credit risk. Resulting from the repeated share pledging behavior of CENBEST, the borrowing cost was higher and the funding gap was even larger. This can be verified through the annual reports of CENBEST, which contain negative net cash flows in financing activities from 2016 to 2021. In this situation, CENBEST’s debt-raising mode eventually brought a negative impact on its long-term solvency.

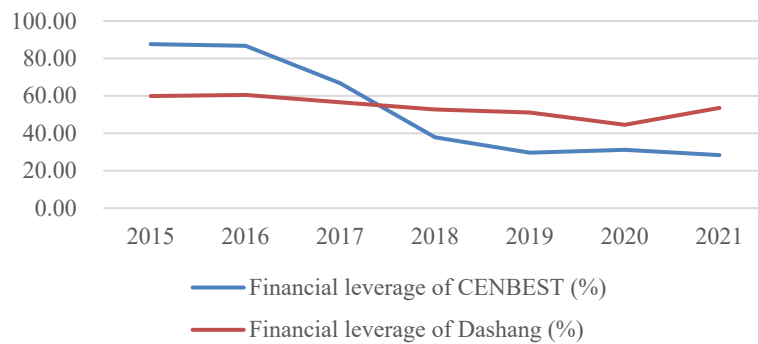


Figure 2: Financial leverage of CENBEST and Dashang.

3.4. Profitability Analysis

One of the most important factors affecting a company’s overall value is its capacity to make a profit on the capital used. It can be easily noticed that the gross profit margin and net profit margin of Dashang maintain a steady upward trend in general from Table 4. Although the return on total assets fluctuates, the change is relatively little, thus ruling out the possibility of a retailing market shock. But profitability ratios of CENBEST had fallen sharply in 2018 and caused huge losses. This phenomenon demonstrates that CENBEST’s mergers and acquisitions did not bring the anticipated income, but worsened the corporate profitability.

However, CENBEST’s annual reports for 2018 and 2019 show that its R & D expenses stay at a high level, growing at an average annual rate of more than 60%, while its sales expenses fell. In the profit boost achieved in 2019, healthy pension and medical manufacturing businesses provide new profit growth points. This shows that large-scale share pledging by controlling shareholders may lead to a significant decline in corporate profitability in the short term. Nonetheless, if the funds are invested in R & D activities, it may be beneficial to the sustainable development of enterprises in the future. If the company continues to increase financial leverage and carry out large-scale expansions, the long-term profitability may be further damaged. Consequently, the company may be seen as less competitive and poor in management.

Table 4: Profitability ratios of CENBEST and Dashang.

Year		2015	2016	2017	2018	2019	2020	2021
Gross profit margin	CENBEST	3.07	3.54	6.21	-1.84	24.72	19.20	23.97
	Dashang	3.18	3.88	5.04	6.84	6.79	12.37	14.16
Net profit margin	CENBEST	2.85	2.48	4.71	-5.50	19.57	15.94	20.21
	Dashang	2.00	2.33	3.18	4.40	4.40	6.57	9.67
Return on total assets	CENBEST	2.25	2.61	3.83	-3.44	8.25	3.78	5.00
	Dashang	3.87	3.51	3.85	4.52	4.28	2.24	3.07

3.5. Developmental Analysis

CENBEST's profits fell straightly in 2018, and net profit fell by 268.97 percent according to Table 5. Referring to the financial report in 2018, it is found that the drop is mainly caused by the bankruptcy trusteeship proceeding of its subsidiary, HOFUKI. What is more, 2018 is the year when Sanpower most concentratedly pledged its shares. It can be speculated that the high proportion of shares pledging transferred part of the risk to medium and small shareholders. Controlling shareholders use funds to carry out high-risk investment activities such as mergers and acquisitions, encroaching on the development of the main business. The external financing cost increases at the same time, resulting in a decline in both operating income and profits. Compared with Dashang, it is found that the sudden decrease in 2020 is likely to be an external shock, that is, the impact of coronavirus pneumonia. To sum up, immoderate share pledging of controlling shareholders can lead to a lack of enterprise developing capacity in the long run.

Table 5: Developmental ratios of CENBEST and Dashang.

Year		2015	2016	2017	2018	2019	2020	2021
Year-on-year growth rate of operating income (%)	CENBEST	102.59	2.67	10.35	-19.04	-34.66	-40.47	9.19
	Dashang	-4.27	-8.90	-4.79	-10.75	-8.29	-62.92	-2.28
Year-on-year growth rate of gross profit (%)	CENBEST	7.58	6.79	85.31	-123.93	979.92	-53.75	36.30
	Dashang	-43.99	11.00	23.61	21.23	-9.03	-32.40	11.86
Year-on-year growth rate of net profit (%)	CENBEST	-17.24	35.10	74.40	-194.57	332.44	-51.52	38.42
	Dashang	-53.36	5.78	30.10	23.65	-8.27	-44.66	43.76

4. Suggestions

4.1. Make Rational Use of Funds

Through the analysis of CENBEST, it can be seen that its large-scale mergers and acquisitions did not bring the desired results, but caused negative effects on investing activities of itself. Therefore, the funds brought by share pledging should not be invested in aggressive expansionary activities. To put it another way, enterprises should never use the funds to participate in overly risky investing activities and irrationally make mergers and acquisitions even though it can possibly promote innovation capability. Only by ensuring that the enterprise's own operating activities produce sufficient cash flow, can its diversification strategy have stable financial support. Most importantly, the development of main businesses is the basis for improving the market competitiveness of the enterprise and realizing its sustainable development.

4.2. Improve the Internal Control Mechanism

Under the institutional background of China, it is far more difficult for private enterprises such as CENBEST to obtain external financing than state-owned enterprises. In this situation, non-state-owned enterprises are faced with greater capital needs. In addition, financial support is an essential part of corporate strategic transformation. The funds brought by share pledging of the controlling shareholders may be used for the development of the enterprise, but it can also be taken to meet the interests of the controlling shareholders and consequently damage the interests of medium and minority shareholders. Hence, the enterprise needs to form an effective internal controlling

mechanism to restrict the rights of controlling shareholders and ensure the effective implementation of strategic plans. Besides, the improvement of internal control is also conducive to the improvement of corporate governance and decision-making mechanism, which will form a healthy developing mode of the company.

4.3. Enhance the Information Transparency

Although regulators have put forward a series of regulations for share pledging behavior of listed companies in recent years, there are still many flaws in the disclosure process. For example, only basic information such as time, lenders, numbers and proportions of pledged shares are listed in the announcements of controlling shareholder's share pledging. Key information such as the use and effect of funds are not known by the investors. The low information transparency causes some large shareholders to use funds for their own profit. This kind of behavior not only harms the interests of medium and small shareholders, but also harms the long-term development of the company. In the long run, it will lead to serious agency problems and weak risk-controlling ability. Therefore, regulators and enterprises should strive to improve information transparency, standardize share pledging behavior, and effectively promote the positive development of enterprises.

5. Conclusion

This paper has made financial ratio analyses based on the annual reports of CENBEST from 2015 to 2021 to find out the possible economic consequences of the controlling shareholder's share pledging behavior. It is discovered that concentrated share pledging is likely to bring about liquidity and solvency crises to the company and may increase firm risk. Evidence has also shown that the profitability and developmental abilities might also be negatively affected by share pledging when the funds obtained are invested in risky activities such as large-scale mergers and acquisitions. Based on these analyses, this paper puts forward several suggestions to guide the positive development of enterprises' share pledging behaviors. Enterprises should make rational use of funds, improve the internal control mechanism and enhance information transparency to achieve better and sustainable development. These findings have examined the theories in a real case, which is of great significance to the healthy operation of both enterprises and the capital market.

References

- [1] Chan, K., Chen, H. K., Hu, S., Liu, Y. J.: *Share pledges and margin call pressure*. *Journal of Corporate Finance* 52, 96–117 (2018).
- [2] Zhang, J.: *The Impact of Equity Pledge on Investment from the Perspective of Financing Constraints*. In: Liu, J., Hee, T. (eds.) *2019 3rd International Conference on Education, Management Science and Economics (ICEMSE 2019)*, vol. 96, pp. 5–11. Atlantis Press (2019).
- [3] Cheng, Z., Liu, Z. (Frank), Sun, Y.: *Share pledging and financial constraints in China*. *Accounting & Finance* 61(3), 4147–4189 (2021).
- [4] Yi, W., Zhang, Y.: *Research of Equity Pledge on the Financial Performance of Real Estate Industry Listed Companies Based on SPSS 23.0*. In: *2021 2nd International Conference on E-Commerce and Internet Technology (ECIT)*, pp. 339–343. The Institute of Electrical and Electronics Engineers, Danvers (2021).
- [5] Cai, H.: *The Influence of Large Shareholders' Equity Pledge on the Corporate Risk-Taking and Performance*. *Journal of Service Science and Management* 12(03), 451–463 (2019).
- [6] Kao, L., Chiou, J. R., Chen, A.: *The Agency Problems, Firm Performance and Monitoring Mechanisms: The evidence from collateralised shares in Taiwan*. *Corporate Governance: An International Review* 12(3), 389–402 (2004).
- [7] Li, M., Liu, C., Scott, T.: *Share pledges and firm value*. *Pacific-Basin Finance Journal* 55, 192–205 (2019).
- [8] Li, W., Huang, J., Shi, C., Yang, X.: *Does share pledging promote or impede corporate social responsibility? An examination of Chinese listed firms*. *Economic Research-Ekonomiska Istraživanja* 35(1), 175–195 (2022).

- [9] Xie, D., Liao, K.: *Share pledging by controlling shareholders and real earnings management of listed firms**. *China Journal of Accounting Studies* 6(2), 109–119 (2018).
- [10] Huang, Z., Xue, Q.: *Re-examination of the effect of ownership structure on financial reporting: Evidence from share pledges in China*. *China Journal of Accounting Research* 9(2), 137–152 (2016).
- [11] Li, W., Zhou, J., Yan, Z., Zhang, H.: *Controlling shareholder share pledging and firm cash dividends*. *Emerging Markets Review* 42, 100671 (2020).
- [12] Ouyang, C., Xiong, J., Fan, L.: *Do insiders share pledging affect executive pay-for-performance sensitivity?* *International Review of Economics & Finance* 63, 226–239 (2019).
- [13] Puleo, M., McDonald, M., Kozlowski, S.: *Share-pledging and the cost of debt*. *Accounting & Finance* 61(1), 1047–1079 (2021).