DO POLITICALLY CONNECTED BANKS PERFORM BETTER IN A DEMOCRATIC ENVIRONMENT?

Jiayuan Tian, Mohammad Kabir Hassan, Rashedul Hasan

^aUniversity of New Orleans, United State of America, ^bCoventry University, United Kingdom Email: jtian@my.uno.edu; mhassan@uno.edu; ad6284@coventry.ac.uk (corresponding author)

Submitted: 24 March 2023 - Last revised: 1 October 2023 - Accepted: 4 January 2024

Abstract

This paper elucidates the intricate relationship among bank performance, political connections, and the democratic environment. The existing body of evidence is notably limited in illustrating the impact of a democratic environment on bank performance. Our study examines a sample of 397 banks spanning 14 countries and districts, encompassing both politically affiliated and non-politically affiliated banks in both democratic and non-democratic settings. The empirical findings reveal a reduction in non-performing loans but an escalation in loan loss provision within a democratic environment. This phenomenon may be attributed to the diminished level of financial constraints prevalent in democratic settings. Furthermore, our investigation reveals that political connections exert a deleterious effect on the non-performing loans (NPL) ratio, coupled with a salutary impact on loan loss provision. Conclusively, our research identifies that the stock return of politically connected banks in democratic environments is inferior to their counterparts in non-democratic environments. Additionally, the non-performing loans ratio (NPL) of politically connected banks in democratic environments tends to be higher compared to their non-democratic counterparts. Conversely, the loan loss provision of politically connected banks in democratic environments tends to be lower than that in non-democratic environments. This nuanced analysis contributes to a more comprehensive understanding of the interplay between democratic environments, political connections, and bank performance.

Keywords: bank, democracy, loss loan provision, performance, political connection

I. INTRODUCTION

This paper elucidates the intricate relationship between bank performance, political connections, and the democratic environment. Drawing on the findings of Huang, which underscored that government banks helmed by

¹ Min Huang, Mengyao Li, and Zhihan Liao, "Do Politically Connected CEOs Promote Chinese Listed Industrial Firms' Green Innovation? The Mediating Role of External Governance Environments," *Journal of Cleaner Production* 278 (2021): 123634, https://doi.org/10.1016/j.jclepro.2020.123634.

politically connected CEOs exhibit significantly higher loan default rates and diminished operating performance during crises compared to banks led by non-politically connected CEOs, our study delves into the nuanced dynamics across 678 banks spanning over 40 countries and districts.

In our investigation, we utilised the democracy index from the Economist Intelligence Unit for our sample, juxtaposing it with the corresponding Non-Performing Loans (NPL) data for each bank in the particular political environment. Surprisingly, we discovered that NPL in a democratic environment is generally lower than in a non-democratic environment, prompting us to question whether politically connected banks fare better or worse in a democratic milieu.

Divergent goals emerge for banks in democratic versus non-democratic settings. Banks in non-democratic environments prioritise governmental objectives such as housing prices, financing for small and medium-sized businesses, and broader macroeconomic goals. Conversely, banks in democratic environments align with personal or political party demands, with reciprocal benefits provided by politicians. In light of these distinctive conditions, our research focuses on unravelling which type of bank performs more robustly.

Politically connected entities, both firms and banks, often reap more substantial benefits from the government compared to their unconnected counterparts. This aligns with findings by Huang, revealing that politically connected CEOs of government banks leverage their political power to ease lending standards, obtaining private benefits that amplify their banks' susceptibility to crises. Additionally, in non-democratic settings like Vietnam, politically connected firms and banks receive exclusive privileges, contributing to a certain degree of monopoly power.

Conversely, in democratic environments such as South Korea, conglomerates like the Samsung Group exert pervasive influence, impacting diverse aspects of people's daily lives. Samsung, with close ties to the South Korean government, plays a pivotal role in economic development and high-tech industries. This symbiotic relationship, while fostering economic growth, raises pertinent questions about its societal implications.

Our empirical evidence posits that politically connected banks, especially during financial distress, are more likely to receive government funds and liquidity support, potentially propping up their performance. However, the objectives of politically connected banks diverge in non-democratic environments, focusing on societal goals rather than profit maximisation.

Unravelling the complexities of the relationship between banks and governments in democratic environments, our research scrutinises whether politically connected banks exhibit superior performance. This includes a consideration of the potential influence of a democratic milieu on the performance of banks.

Comparing our research to previous studies, we introduce the democracy factor into our regression model and construct an interaction term (democratic dummy * political dummy). Our goal is to explore how politically connected factors influence banks' accounting and market performance across different democratic environments. Additionally, we address the endogeneity issue in the model, employing the GMM method to estimate coefficients and employing correlation analysis to mitigate multicollinearity concerns.

Our results, consistent with the EIU and fixed-effect regression models, underscore a negative relationship between politically connected factors and the non-performing loans ratio. Furthermore, politically connected banks in a democratic environment exhibit a lower level of loss loan provision, contributing to a higher non-performing loans ratio than their non-democratic counterparts. This nuanced analysis contributes valuable insights into the complex interplay between democratic environments, political connections, and bank performance.

Section 2 summarises the theoretical perspective and hypothesis development. In Section 3, we compare the average NPL between politically connected and non-connected banks in democratic and non-democratic countries and evaluate these two types of banks comprehensively. In Section 4, we run basic OLS, fixed effect and GMM regression models to examine the relationship between financial performance and politically connected banks in democratic and non-democratic environments. Finally, in Section 5, we present our conclusions.

II. LITERATURE REVIEW AND HYPOTHESIS DEVELOPMENT

In the realm of relevant literature, Delis² posit a negative correlation between the democratic environment and the cost of credit, as measured by the Polity IV country-year index for institutional democracy. Their study indicates that democratic countries, fostering a freer information flow compared to autocracies, experience a commensurately lower cost of credit. Shamshur and Weill³ affirm that enhanced bank efficiencies contribute to reduced credit costs, facilitated by lower competition. Moreover, the Economist Intelligence Unit (EIU) provides a democratic index, revealing a discernible relationship between bank performance and democratic indexes, as evidenced in Table 1.

² Manthos D. Delis, Iftekhar Hasan, and Steven Ongena, "Democracy and Credit," *Journal of Financial Economics* 136, no. 2 (2020): 571-596, https://doi.org/10.1016/j.jfineco.2019.09.013.

³ Anastasiya Shamshur and Laurent Weill, "Does Bank Efficiency Influence the Cost of Credit?." *Journal of Banking & Finance* 105 (2019): 62-73, https://doi.org/10.1016/j.jbankfin.2019.05.002.

Previous studies by Delis² affirm a significant correlation between a bank's performance and political connections with the government. Sapienza⁴ observes that the lending behaviour of state-owned banks aligns with the electoral results of the affiliated political party. Goldman⁵ demonstrate a positive abnormal stock return following the nomination of politically connected individuals to the board, potentially impacting banks' market performance. Jackowicz⁶ reveal that state-owned banks report smaller net interest income ratios during parliamentary election years, indicating their role as tools serving political objectives in Central European countries. Government control over banks translates into significant political influence over firms' decision-making, particularly those eligible for government bank lending. Chen⁻ underscore that countries with low corruption witness increased lending by government banks, associated with better performance and more favourable GDP and employment growth during a crisis period.

Democratic countries, characterised by lower corruption levels, appear to demonstrate a connection between the democratic environment and banks' performance. This prompts a critical investigation into the relationship between banks' performance and democratic environments, a focal point of this paper. Addressing a notable gap in previous research, this paper contributes by exploring the relationship between a democratic environment and bank performance. Additionally, while prior studies indicate that politically connected banks exhibited higher Non-Performing Loan (NPL) ratios before and during the 2008 financial crisis, this paper posits an expectation for politically connected banks to decrease NPLs due to excessive credit risk. Furthermore, prior research often fails to differentiate politically connected banks in democratic environments from their counterparts in non-democratic countries.⁸

Table 1 illustrates that banks in democratic environments manifest lower NPLs compared to their non-democratic counterparts. In light of the

⁴ Paola Sapienza, "The Effects of Government Ownership on Bank Lending," *Journal of Financial Economics* 72, no. 2 (2004): 357-384, https://doi.org/10.1016/j.jfineco.2002.10.002.

Eitan Goldman, Jörg Rocholl, and Jongil So, "Do Politically Connected Boards Affect Firm Value?" The Review of Financial Studies 22, no. 6 (2009): 2331-2360, https://doi.org/10.1093/rfs/hhn088.

⁶ Krzysztof Jackowicz, Oskar Kowalewski, and Łukasz Kozlowski, "The Influence of Political Factors on Commercial Banks in Central European Countries," *Journal of Financial Stability* 9, no. 4 (2013): 759-777, https://doi.org/10.1016/j.jfs.2012.08.001.

Hung-Kun Chen, Yin-Chi Liao, Chih-Yung Lin, and Ju-Fang Yen, "The Effect of the Political Connections of Government Bank CEOs on Bank Performance during the Financial Crisis," *Journal of Financial Stability* 36 (2018): 130-143, https://doi.org/10.1016/j.jfs.2018.02.010.

Mehmet Asutay and Noor Zahirah Mohd Sidek, "Political Economy of Islamic Banking Growth: Does Political Regime and Institutions, Governance and Political Risks Matter?" *International Journal of Finance & Economics* 26, no. 3 (2021): 4226-4261, https://doi.org/10.1002/ijfe.2011.

aforementioned results and discussions, we formulate the first and second hypotheses:

H₁: Ceteris Paribus, banks perform better in a democratic environment.

Examining loan loss provision (LLP) set aside to cover anticipated future loan losses, Bouvatier and Lepetit⁹ contend that non-discretionary LLP intensifies credit fluctuations. Thus, the inquiry arises as to whether such provisioning exacerbates the non-performing loan ratio, considering political and democratic factors. Kanagaretna¹⁰ propose viewing loan loss provision from a bank performance perspective. Anticipating that politically connected banks are more inclined to increase LLP due to heightened crisis awareness of credit risk, we formulate the third hypothesis:

H₂: Ceteris Paribus, politically connected banks perform better than their counterparts.

Politically connected banks in non-democratic environments wield privileged status, enjoying lower taxation¹¹ and a positive impact on credit risk. Notably, these banks are more likely to receive government funds and liquidity support during financial distress.¹² This paper posits that politically connected banks in non-democratic environments stand to benefit in the long term, whereas those in democratic environments face potential discontinuation of benefits if the supporting parties lose elections. Thus, the fourth hypothesis is formulated:

H₃: Ceteris Paribus, politically connected banks perform better than in a democratic environment.

⁹ Vincent Bouvatier and Laetitia Lepetit, "Banks' Procyclical Behavior: Does Provisioning Matter?" Journal of International Financial Markets, Institutions and Money 18, no. 5 (2008): 513-526, https://doi.org/10.1016/j.intfin.2007.07.004.

Kiridaran Kanagaretnam, Gerald J. Lobo, and Dong-Hoon Yang, "Determinants of Signaling by Banks Through Loan Loss Provisions," *Journal of Business Research* 58, no. 3 (2005): 312-320, https://doi.org/10.1016/j.jbusres.2003.06.002.

Mara Faccio, "Differences Between Politically Connected and Nonconnected Firms: A Cross-Country Analysis," *Financial management* 39, no. 3 (2010): 905-928, https://doi.org/10.1111/j.1755-053X.2010.01099.x.

Agyenim Boateng, Yang Liu, and Sanjukta Brahma, "Politically Connected boards, Ownership Structure and Credit Risk: Evidence from Chinese Commercial Banks," Research in International Business and Finance 47 (2019): 162-173. https://doi.org/10.1016/j.ribaf.2018.07.008.

The overarching objective is to amalgamate democratic and political factors, examining their collective impact on banks' performance across different countries. This entails introducing interaction terms for political and democratic factors (dummy variables) to construct our model. Ultimately, our aim is to discern whether politically connected banks in a democratic environment outperform their counterparts.

III. METHODOLOGY

Our dataset comprises annual panel data obtained from REFINITIV spanning the years 2010 to 2019. The decision to restrict our data to this period is motivated by the extraordinary impact of the COVID pandemic on the banking sector, potentially introducing variations in risk and performance dynamics within our sample. This comprehensive dataset encompasses 14 countries.

In alignment with the methodology proposed by Huang, we meticulously gathered data for 397 banks. Diverging from Chen, ¹³ our operationalisation of politically connected banks involves the use of a dummy variable. Specifically, politically connected banks are designated a value of 1 if they have made any political contributions, and 0 otherwise. The categorisation of democratic and non-democratic environments is executed through the application of the Polity 5 index. The Polity conceptual framework assesses concurrent attributes of democratic and autocratic authority within governing institutions, eschewing a dichotomous classification. A high score signifies a democratic environment, while a low score indicates an autocratic environment.

To appraise differences in performance between politically connected banks and their corresponding democratic or non-democratic environments, we plan to utilise the Ordinary Least Squares (OLS) method, as advocated by Boateng, Liu, and Brahma, and employ Generalised Method of Moments (GMM) instruments to address potential endogeneity issues in our empirical model. Our performance metrics encompass various proxies: (1) return on assets: (2) stock return: (3) loan-loss provisions: (4) interest income; and (5) non-interest income.

In concurrence with the findings of Huang, non-politically connected CEOs of government banks demonstrate a greater concern for loan quality, aligning with their focus on a bank's financial health. Conversely, politically connected CEOs of government banks, tasked with fulfilling social goals,

¹³ Chen, Hung-Kun, Yin-Chi Liao, Chih-Yung Lin, and Ju-Fang Yen. "The effect of the political connections of government bank CEOs on bank performance during the financial crisis." *Journal of Financial Stability* 36 (2018): 130-143.

¹⁴ Boateng, Liu, and Brahma, "Politically Connected Boards".

exhibit a more lenient attitude towards loan quality, insulated from market pressures by government protection. Consequently, politically connected banks are inclined to issue a greater volume of loans to firms with higher default rates. This predisposes politically connected banks to assume higher credit risk than their non-connected counterparts.

The inclusion of the Price-to-Earnings (PE) ratio as a performance measure adds a dimension to our analysis, offering insights into the profitability and valuation of banks' stocks. Additionally, the consideration of loss loan provisions provides a mechanism for banks to set aside funds to address default or problematic loans. This expense, reflected in an income statement, serves as a financial buffer that banks can access when borrowers encounter delinquencies, signalling an inability to repay their loans.

Figure 1. NPL between democratic and non-democratic environments

NPL between democratic and non-democratic environment

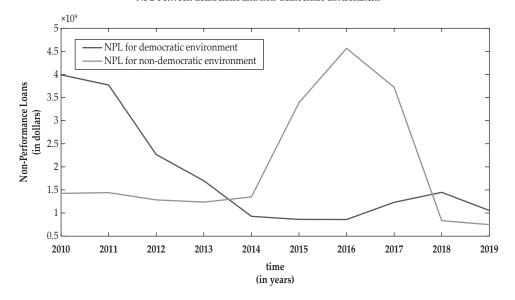


Figure 1 shows the non-performing loans of banks between democratic and non-democratic environments. The non-performing loan ratios in democratic environments go down over a period. On the other hand, higher volatility is shown in non-democratic environments, especially after 2014, when NPL significantly went up. Figure 2 shows non-performing loan ratios between politically connected and non-politically connected banks, NPL in politically connected banks is globally higher than their non-politically connected counterparts. The possible empirical explanations are that politically connected banks are devoted to realising economic goals ordered by the government, thus

reducing review time and quality to quickly release a large number of loans to market. Moreover, these politically connected banks are less concerned with credit risk caused by high NPL resulting from government assistance.

Figure 2. NPL between politically connected and non-politically connected banks

NPL between political connected banks and non-political connected banks

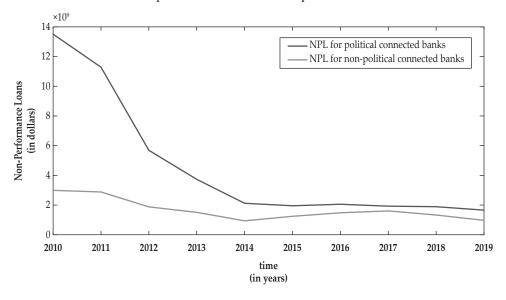


Figure 3 shows the variations in loan loss provision between banks in democratic and non-democratic environments. The loan loss provision of two environments both display a downward trend over the period, but it improves in the democratic environment after 2017. Figure 4 shows the loan loss provision between politically connected and non-politically connected banks. The loan loss provision in both politically and non-politically connected banks is seemingly stable over the period, but there is a sharp upward trend after 2016 in politically connected banks.

Figure 3. Loan loss provision between democratic and non-democratic environments loss loan provision between democratic and non-democratic environments

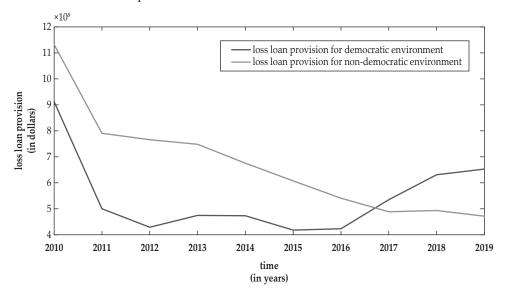
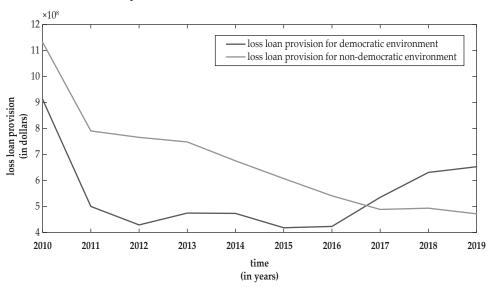


Figure 4. Loan loss provision between politically connected and non-connected banks

loss loan provision between democratic and non-democratic environments



We obtained the democracy index of 2020 data from the Economist Intelligence Unit (EIU) and operationalised it through the creation of a dummy variable. This variable takes on the value of 1 if the democratic index

exceeds 7 and 0 otherwise. The sample includes 18 major democratic countries and 18 major non-democratic countries. Subsequently, we gathered data on each country's nonperforming loans as a percentage of total gross loans from Index Mundi. Notably, the nonperforming loans (NPL) in democratic countries over the subject period, were significantly lower than those in non-democratic countries. This initial evidence suggests that financial performance in democratic countries surpasses that in non-democratic countries, aligning with the Economist Intelligence Unit's perspective, as indicated in Table 1B.

Panel A of the table presents the definitions of all variables used in our analysis for the period 2010-2019. Panel B provides a comparative overview of non-performing loans between democratic and non-democratic environments, as sourced from the EIU.

Loan loss provision (LLP) serves to set aside funds for default or problematic loans, constituting an income statement expense that banks can utilise when borrowers encounter delinquencies and are unlikely to repay their loans. While higher LLP can erode banks' profits, it plays a crucial role in the stability and safety of banks.¹⁵ We view LLP as indicative of positive performance, considering credit risk as a key metric of banks' performance.

Building on the findings of Bouvatier that non-discretionary LLP set aside to cover expected future loan losses can amplify credit fluctuations, drawing attention to the perspective of Kanagaretnam. They argue that LLP can be interpreted from a bank performance perspective, as an increase in LLP sends a positive signal to the market and signifies lower anticipated credit risk in the future. Given this, we anticipate that politically connected banks are more inclined to increase LLP compared to their non-politically connected counterparts due to a heightened awareness of credit risk in times of crisis. Consequently, LLP is expected to exhibit a positive correlation with bank performance.

IV. RESULTS

Our dataset comprises 397 banks across 14 countries. The data covers the period from 2010 to 2019, presenting a comprehensive analysis of both democratic and non-democratic environments, considering banks with political affiliations and those without.

Table 1 provides descriptive statistics derived from the regression model. The left-hand side presents data for the democratic environment, while the right-hand side illustrates data for the non-democratic environment. All figures

¹⁵ Peterson K. Ozili, "Bank Income Smoothing, Institutions and Corruption," Research in International Business and Finance 49 (2019): 82-99, https://doi.org/10.1016/j.ribaf.2019.02.009.

are reported on an annual basis, with GDP growth and inflation expressed as percentages. Log Asset, Log Debt, Log Equity, and Log NPL are denominated in US dollars, while other variables are presented as ratios. The variations in observations stem from distinct samples of banks in democratic and non-democratic environments.

Similarly, Table 1 furnishes descriptive statistics from the regression model, presenting data for politically connected banks on the left-hand side and non-politically connected banks on the right-hand side. The annual frequency and unit measurements remain consistent with those in Table 3. The differing observations result from the unique samples of political and non-political connected banks.

Table 1.

Descriptive statistics

Mean Std

Variable	Obs	Mean	Std. dev.	Min	Max
Return on asset	2,689	0.010	0.006	-0.009	0.032
Stock return	2,689	-0.001	0.011	-0.032	0.037
Loan loss provision	2,410	0.002	0.004	-0.003	0.025
Interest income	2,685	0.694	0.172	0.173	0.961
Non-interest income	2,685	0.306	0.172	0.039	0.827
Political connection 1	2,689	0.057	0.232	0.000	1.000
Political connection 2	2,684	12.761	2.660	3.482	17.946
Size	2,410	23.884	1.958	20.773	28.570
Tier1 Capital	2,689	0.120	0.052	0.000	0.294
Board Size	2,689	11.708	3.298	5.000	22.000
Independent directors	2,689	73.358	20.836	9.091	94.118
Audit Committee	2,689	90.124	24.177	0.000	100.000
Executive compensation	2,306	13.825	0.877	11.537	15.788
Board diversity	2,391	21.328	10.679	5.556	50.000
GDP Growth	2,293	1.911	2.960	-7.988	7.525
Inflation	2,689	2.886	2.418	-0.233	8.302

Table 1 systematically details the main variables used in the regression analysis, comparing banks in democratic and non-democratic environments. Notably, the Return on Assets (ROA) for banks in democratic environments is observably lower than that in non-democratic environments. Conversely, the stock return for banks in democratic environments surpasses that in non-democratic environments. This comparative analysis sets the stage for a nuanced exploration of the factors influencing banks' performance in distinct political and environmental contexts.

Our Pearson correlation statistic shows that there are significant relationships among variables, and the regression models will be more precise if correlations among independent variables are low. Overall, the correlations among variables are generally low, therefore there are fewer multicollinearity problems in the regression model. Therefore, the regression models will better reflect the relationships among variables.

We consider three cases in the regression models, including only the democratic environment dummy variable, and the political connections dummy variable in the regression model and both of them plus their interaction terms included in the model. The main interesting variables and control variables are reflected in Appendix A.

The model is constructed by panel fixed effect and GMM regression models, and displayed by the following:

$$Performance_{it} = \alpha_{it} + \beta_1 Democracy_{it} + \int_{\epsilon}^{i} Controls + v_i + u_i + \varepsilon_{it}$$
 (1)

$$Performance_{it} = \alpha_{it} + \beta_1 Political \ connection_{it} + \int_t^i Controls + v_i + u_i + \varepsilon_{it}$$
 (2)

$$Performance_{it} = \alpha_{it} + \beta_1 Democracy_{it} + \beta_2 Political \ connection_{it} + \beta_3 Democracy * Political \ connection_{it} + \int_{t}^{t} Controls + v_i + u_i + \varepsilon_{it}$$

$$(3)$$

The coefficient of a democratic environment on interest income is 0.058, indicating that one unit increase in a democratic environment, interest income increases by 0.058 units. We find similar results with the robust proxy of a democratic environment. These results are significant at 5 percent level. Such findings indicate that a more democratic environment increases the demand for credit and the availability of borrowers for banks.

We also investigate the influence of a democratic environment on non-interest income and report a statistically significant positive result at the five percent level. This outcome suggests that a more democratic environment may limit banks' opportunities to generate income from non-lending sources, potentially attributed to enhanced transparency and accountability within banks.

Analysing the coefficient of a democratic environment on stock return (-0.004), we observe a statistically significant decrease of 0.004 units in stock return for every one-unit increase in the democratic environment, indicating that a more democratic setting diminishes investors' expectations and confidence in the future performance of banks. Our findings imply that a heightened democratic environment may lead to a reduction in investor confidence.

Our final performance proxy, loan loss provision, does not yield a significant result, indicating an absence of a substantial relationship between the democratic environment and loan-loss provision.

Table 3 presents regression results for empirical model 2, exploring the impact of political connections on bank performance. The findings reveal a nuanced relationship. A more favourable political environment correlates with higher Return on Assets (ROA), suggesting that banks can generate increased income from their assets amid a stable and supportive political climate.

Conversely, political connections are associated with lower interest income, indicating that such affiliations reduce the interest rates banks can impose on loans or receive from investments. However, a positive association exists between political connections and non-interest income. This implies that a favourable political environment provides opportunities for banks to diversify services, such as financial advice, insurance, or brokerage.

Table 4 extends the analysis by introducing the Democracy*Political connection interaction variable, examining the moderating influence of the democratic environment on the relationship between political connections and bank performance. We find the interaction variable to be significant for ROA, interest income, and non-interest income. However, no significant impact is observed for stock return and loan loss provision. These results suggest that politically connected banks can enhance their ROA and non-interest income within a democratic environment.

To ensure the robustness of our findings, we conduct GMM regression to address endogeneity issues, and the results remain consistent across all empirical models.

Table 2.

Democratic environment and bank performance

		Ba	Baseline results	9			R	Robust results	9	
	(1)	(2)	(3)	(4)	(5)	(9)	(2)	(8)	(6)	(10)
	ROA	I	Z	SR	LLP	ROA	II	ΞZ	SR	LLP
Democracy (Dummy)	-0.002**	0.058**	-0.058**	-0.004**	0.001					
	(0.001)	(0.020)	(0.020)	(0.001)	(0.000)					
Democracy (Polity 5)	,	,	,			-0.005***	0.135***	-0.135***	-0.010***	0.000
						(0.001)	(0.039)	(0.039)	(0.003)	(0.001)
Bank size	-0.001***	-0.047***	0.047***	-0.000	***000.0	-0.001***	-0.047***	0.047***	_0.00 <u>0</u>	0.000***
	(0.000)	(0.003)	(0.003)	(0.000)	(0.000)	(0.000)	(0.003)	(0.003)	(0.000)	(0.000)
Tier1 capital).000).009	-0.332***	0.332***	0.008	0.004	0.00 *	-0.322***	0.322***	0.008	0.004
+	(0.004)	(0.093)	(0.093)	(0.006)	(0.003)	(0.004)	(0.093)	(0.093)	(0.000)	(0.003)
Board size	0.000	-0.009***	0.000	0.000	0.000	0.000	-0.009***	0.000	0.000	0.000
	(0.000)	(0.001)	(0.001)	(0.000)	(0.000)	(0.000)	(0.001)	(0.001)	(0.000)	(0.000)
Board independence	-0.000	0.002***	-0.002***	0.000	-0.000***	0.000	0.002***	-0.002***	0.000	-0.000***
•	(0.000)	(0.000)	(0.000)	(0.000)	(0.000)	(0.000)	(0.000)	(0.000)	(0.000)	(0.000)
Audit comm. independence	-0.000	-0.001	0.001	-0.000	-0.000	-0.000	-0.000	0.000	-0.000	-0.000
	(0.000)	(0.000)	(0.000)	(0.000)	(0.000)	(0.000)	(0.000)	(0.000)	(0.000)	(0.000)
Executive compensation	0.000	0.031***	-0.031***	-0.000	-0.000	*000.0	0.030***	-0.030***	0.000	-0.000
•	(0.000)	(0.007)	(0.007)	(0.000)	(0.000)	(0.000)	(0.007)	(0.007)	(0.000)	(0.000)
Board diversity	-0.000*	-0.001**	0.001**	0.000	-0.000	-0.000*	-0.001**	0.001**	0.000	-0.000
	(0.000)	(0.000)	(0.000)	(0.000)	(0.000)	(0.000)	(0.000)	(0.000)	(0.000)	(0.000)
GDP growth	0.000	0.005	-0.002	*000°-	-0.000**	0.000	0.002	-0.002	-0.00·	***0000-
)	(0.000)	(0.001)	(0.001)	(0.000)	(0.000)	(0.000)	(0.001)	(0.001)	(0.000)	(0.000)
Inflation	0.001***	-0.003	0.003	0.001***	0.00 0.00	0.001***	-0.002	0.002	0.001***	,000.0
	(0.000)	(0.003)	(0.003)	(0.000)	(0.000)	(0.000)	(0.003)	(0.003)	(0.000)	(0.000)
Intercept	0.022***	1.424***	-0.424***	0.001	0.004*	0.024***	1.382***	-0.382***	0.004	0.004*
	(0.002)	(0.063)	(0.063)	(0.006)	(0.002)	(0.002)	(0.067)	(0.067)	(0.000)	(0.002)
Observation	1623	1622	1622	1623	1623	1623	1622	1622	1623	1623
\mathbb{R}^2	0.186	0.425	0.425	0.030	0.184	0.191	0.427	0.427	0.032	0.183

Note: Table 2 provides OLS regression results based on the following regression model:

Performance_{it} = $\alpha_{it} + \beta_1 Democracy_{it} + \int_t^t Controls + \nu_i + u_i + \varepsilon_{it}$

control: GDP growth and inflation. Our empirical analysis also uses country and year-fixed effects. *, ** and *** to indicate significance at 1, 5 and 10 per cent levels. The figures in include bank size, tire 1 capital, the board size, board independence, audit committee independence, executive compensation, and board diversity. We also introduce country-level We use five measures of bank performance: (1) return on assets (ROA): (2) interest income (II); (3) non-interest income (NII); (4) stock return (SR); and (5) loan-loss provisions (LLP). We also introduce two measures of democracy in this empirical model: (1) democracy dummy and (2) democracy scores from the Plity5 index. Our control variables parentheses are standard errors.

Table 3. Political connection and bank performance

		Ba	Baseline results	d			R	Robust results		
	(I)		(3)		(5)	9)		(8)		(10)
	ROA	II	IZ	SR	LLP	ROA	II	Z	SR	LLP
Political connection 1	0.002***	-0.033**	0.033**	-0.001	0.001					
	(0.000)	(0.012)	(0.012)	(0.001)	(0.000)					
Political connection 2	,	,	,	,	,	0.001*	-0.044***	0.044***	0.382***	0.001**
						(0.000)	(0.010)	(0.010)	(0.101)	(0.000)
Bank size	-0.001***	-0.046***	0.046***	0.000	*000.0	-0.001***	-0.043***	0.043***	1.022***	0.000
	(0.000)	(0.003)	(0.003)	(0.000)	(0.000)	(0.000)	(0.003)	(0.003)	(0.034)	(0.000)
Tier1 capital	,6000,	-0.330***	0.330***	0.008	0.004	,600.0	-0.332***	0.332***	-0.800	0.004
•	(0.004)	(0.093)	(0.093)	(0.007)	(0.003)	(0.004)	(0.093)	(0.093)	(1.039)	(0.003)
Board size	0.000	***600.0-	0.003***	0.000	0.000	0.000	-0.009***	0.009***	0.026*	0.000
	(0.000)	(0.001)	(0.001)	(0.000)	(0.000)	(0.000)	(0.001)	(0.001)	(0.012)	(0.000)
Board independence	-0.000	0.002***	-0.002***	-0.000	-0.000***	-0.000	0.002***	-0.002***	-0.017***	-0.000***
1	(0.000)	(0.000)	(0.000)	(0.000)	(0.000)	(0.000)	(0.000)	(0.000)	(0.003)	(0.000)
Audit comm. independence	-0.000	-0.001	0.001	-0.000	-0.000	-0.000	-0.001	0.001	-0.001	-0.000
'	(0.000)	(0.000)	(0.000)	(0.000)	(0.000)	(0.000)	(0.000)	(0.000)	(0.004)	(0:000)
Executive compensation	0.000	0.032***	-0.032***	-0.000	-0.000	0.000	0.032***	-0.032***	-0.024	-0.000
•	(0.000)	(0.007)	(0.007)	(0.000)	(0.000)	(0.000)	(0.007)	(0.007)	(0.079)	(0.000)
Board diversity	÷0000-	-0.001*	0.001*	0.000	-0.000	*000.0-	-0.001*	0.001*	0.005	-0.000
	(0.000)	(0.000)	(0.000)	(0.000)	(0.000)	(0.000)	(0.000)	(0.000)	(0.004)	(0.000)
GDP growth	0.000	0.002	-0.002	*000.0-	***000.0-	0.000	0.001	-0.001	-0.132***	-0.000***
	(0.000)	(0.001)	(0.001)	(0.000)	(0.000)	(0.000)	(0.001)	(0.001)	(0.016)	(0.000)
Inflation	0.001***	-0.002	0.002	0.001***	*000.0	0.001***	-0.001	0.001	*080.0	*000.0
	(0.000)	(0.003)	(0.003)	(0.000)	(0.000)	(0.000)	(0.003)	(0.003)	(0.039)	(0.000)
Intercept	0.024***	1.404***	-0.404**	-0.004	0.005**	0.023***	1.342***	-0.342***	-5.671***	0.006**
	(0.003)	(0.067)	(0.067)	(0.006)	(0.002)	(0.003)	(0.072)	(0.072)	(0.706)	(0.002)
Observation	1623	1622	1622	1623	1623	1623	1622	1622	1230	1623
\mathbb{R}^2	0.189	0.424	0.424	0.026	0.184	0.186	0.428	0.428	0.803	0.188

Note: Table 3 provides OLS regression results based on the following regression model:

Performance_{it} = $\alpha_{it} + \beta_1$ Political connection_{it} + \int_r^i Controls + $v_i + u_i + \varepsilon_{it}$

We use five measures of bank performance: (1) return on assets (ROA); (2) interest income (II); (3) non-interest income (NII); (4) stock return (SR); and (5) loan-loss provisions (LLP). We also introduce two measures of political connection: (1) political connection 1 (dummy variable, indicating cash donation made to a political party) and (2) political connection 1 (dummy, indicating political affiliation to a political party). Our control variables include bank size, tire 1 capital, the board size, board independence, audit committee independence, executive compensation, and board diversity. We also introduce country-level control: GDP growth and inflation. Our empirical analysis also uses country and year-fixed effects. *, ** and *** to indicate significance at 1, 5 and 10 per cent levels. The figures in parentheses are standard errors.

Observation

R2

	(1)	(2)	(3)	(4)	(5)
	ROA	II	NII	SR	LLP
Democracy	-0.007***	0.172***	-0.172***	-0.009**	0.000
	(0.001)	(0.044)	(0.044)	(0.003)	(0.001)
Political connection	-0.007*	0.115	-0.115	0.003	0.000
	(0.003)	(0.060)	(0.060)	(0.006)	(0.002)
Democracy*Political connection	0.010**	-0.186**	0.186**	-0.005	0.000
	(0.003)	(0.070)	(0.070)	(0.006)	(0.002)
Bank size	-0.001***	-0.042***	0.042***	0.000	0.000
	(0.000)	(0.003)	(0.003)	(0.000)	(0.000)
Tier1 capital	0.009*	-0.332***	0.332***	0.007	0.004
	(0.004)	(0.093)	(0.093)	(0.006)	(0.003)
Board size	0.000	-0.010***	0.010***	0.000	0.000
	(0.000)	(0.001)	(0.001)	(0.000)	(0.000)
Board independence	-0.000	0.002***	-0.002***	0.000	-0.000***
	(0.000)	(0.000)	(0.000)	(0.000)	(0.000)
Audit comm. independence	-0.000	-0.000	0.000	-0.000	-0.000
	(0.000)	(0.000)	(0.000)	(0.000)	(0.000)
Executive compensation	0.000*	0.029***	-0.029***	0.000	-0.000
	(0.000)	(0.007)	(0.007)	(0.000)	(0.000)
Board diversity	-0.000*	-0.001*	0.001*	0.000	-0.000
•	(0.000)	(0.000)	(0.000)	(0.000)	(0.000)
GDP growth	0.000	0.002	-0.002	-0.000*	-0.000***
	(0.000)	(0.001)	(0.001)	(0.000)	(0.000)
Inflation	0.001***	-0.001	0.001	0.001***	0.000
	(0.000)	(0.003)	(0.003)	(0.000)	(0.000)
Intercept	0.029***	1.217***	-0.217**	-0.000	0.006***
•	(0.003)	(0.082)	(0.082)	(0.006)	(0.002

Table 4.

Democratic environment, political connection and bank performance

Note: Table 4 provides OLS regression results based on the following regression model:

1623

0.199

Performance_{it} = $\alpha_{it} + \beta_1 Democracy_{it} + \beta_2 Political connection_{it} + \beta_3 Democracy * Political connection_{it} + \int_*^t Controls + v_i + u_i + \varepsilon_{it}$

We use five measures of bank performance: (1) return on assets (ROA); (2) interest income (II); (3) non-interest income (NII); (4) stock return (SR); and (5) loan-loss provisions (LLP). Democracy is democracy scores from the Plity5 index. Political connection is a dummy variable, indicating cash donation made to a political party. We also introduce an interaction variable. Democracy*Political connection to examine whether politically connected firms perform better in a democratic environment. Our control variables include bank size, tire 1 capital, the board size, board independence, audit committee independence, executive compensation, and board diversity. We also introduce country-level control: GDP growth and inflation. Our empirical analysis also uses country and year-fixed effects. *, ** and *** to indicate significance at 1, 5 and 10 per cent levels. The figures in parentheses are standard errors

1622

0.436

1622

0.436

1623

0.034

1623

0.188

Table 5. GMM regression results

	ROA	II	IIN	SR	LLP	ROA	II	IIN	SR	LLP	ROA	II	IIN	SR	LLP
Performance.,	0.156***	0.147***	0.229***	-0.033	-0.020**	0.152***	0.137***	0.218***	-0.025	-0.011	0.149***	0.150***	0.228***	-0.033	-0.011
ī	(0.030)	(0.025)	(0.023)	(0.031)	(0.007)	(0.030)	(0.025)	(0.024)	(0.031)	(0.025)	(0.030)	(0.025)	(0.023)	(0.031)	(0.025)
Democracy	-0.004***	0.084***	-0.072**	-0.011***	0.000						-0.005***	0.110***	-0.094***	-0.010**	0.001
	(0.001)	(0.020)	(0.021)	(0.003)	(0.001)	0			0	1	(0.001)	(0.022)	(0.023)	(0.003)	(0.001)
Political connection						0.001×	-0.032***	0.026***	-0.001	0.001***	-0.006**	0.080	-0.068	0.005	0.001
Democratical						(0.000)		(0.000)	(0.001)	(0.000)	(0.002)	(0.041)	(0.042)	(0.000)	(0.001)
connection											0.008**	-0.130**	0.109*	-0.007	-0.000
COINICCION											(0.003)	(0.048)	(0.049)	(2000)	(0.002)
Bank size	-0.001***	-0.041***	0.038***	-0.000	0.000***	-0.001***	-0.038***	0.036***	-0.000	0.000	-0.001***	-0.037***	0.034***	-0.000	0.000
	(00:00)	(0.002)	(0.002)	(0.000)	(0.000)	(0.000)	(0.002)	(0.002)	(0.000)	(0.000)	(0.000)	(0.002)	(0.002)	(0.000)	(0.000)
Tier1 capital		-0.376***	0.349***	0.010	***900.0	0.008***	-0.387***	0.360***	0.010	0.006***	0.008**	-0.386***	0.359***	0.000	0.006***
	(0.002)	(0.044)	(0.045)	(0.007)	(0.001)	(0.002)	(0.044)	(0.045)	(0.007)	(0.002)	(0.002)	(0.044)	(0.045)	(0.007)	(0.002)
Board size		(0.001)	(0.001)	(0.000)	(0.000)	(0.000)	(0.001)	(0.001)	(0.000)	(0.000)	(0.000)	(0.001)	(0.001)	(0.000)	(0.000)
		0.002***	-0.002***	0.000	-0.0000***	-0.000	0.002***	-0.002***	0.000	-0.000***	-0.000	0.002***	-0.002***	0.000	-0.000***
Board independence		(0.000)	(0.000)	(0.00)	(0000)	(0.000)	(0.000)	(0.000)	(0000)	(0.000)	(0.000)	(0.000)	(0.000)	(0.000)	(0.000)
		*000.0-	*0000	-0.000	-0.000	-0.000	-0.001**	*000.0	-0.000	*000.0-	-0.000	*000.0-	*000.0	-0.000	*000.0-
Audit comm.	(0000)	(0000)	(0000)	(0000)	(0000)	(0000)	(0000)	(000 0)	(0000)	(0000)	(0000)	(0000)	(0000)	(0000)	(0000)
independence	(000:0)	(0,000)	(0,000)	(000.0)	(0.000)	(0.000)	(0,000)	(0.000)	(000.0)	(0.000)	(0,000,0)	(0,000)	(0000)	(0.000)	(000.0)
-	**000.0	0.024***	-0.022***	0.000	-0.000	*000.0	0.026***	-0.024***	-0.000	-0.000	0.000**	0.024***	-0.021***	0.000	-0.000
Executive compensation	(0.000)	(0.003)	(0.004)	(0.001)	(0.000)	(0.000)	(0.003)	(0.004)	(0.001)	(0.000)	(0.000)	(0.003)	(0.004)	(0.001)	(0.000)
	-0.000***	-0.001***	0.001***	0.000	-0.000	-0.000***	-0.001***	0.001***	0.000	-0.000	-0.000***	-0.001***	0.001***	0.000	-0.000
Board diversity	(0.000)	(0.000)	(0.000)	(0.00)	(0.000)	(0.000)	(0.000)	(0.000)	(0000)	(0000)	(0.000)	(0.000)	(0.000)	(0.000)	(0.000)
	*000.0	0.002**	-0.002***	-0.000	***0000-	*000.0	0.002*	-0.002**	-0.000	-0.000***	*0000	0.002**	-0.002**	-0.000	-0.000***
GDP growth	(0.000)	(0.001)	(0.001)	(0.000)	(0.000)	(0.000)	(0.001)	(0.001)	(0.000)	(0.000)	(0.000)	(0.001)	(0.001)	(0.000)	(0.000)
	0.001***	-0.003	0.003*	0.001**	0.000**	0.001***	-0.002	0.003	0.001**	0.000**	0.001***	-0.002	0.003	0.001**	**000.0
Inflation	(0.000)	(0.002)	(0.002)	(0.000)	(0.000)	(0.000)	(0.002)	(0.002)	(0.000)	(0.000)	(0.000)	(0.002)	(0.002)	(0.000)	(0.000)
	0.018***	1.245***	-0.376***	0.014*	0.004**	0.018***	1.216***	-0.345***	0.002	0.008***	0.023***	1.124***	-0.278***	0.010	0.008***
Intercept	(0.002)	(0.049)	(0.039)	(0.006)	(0.001)	(0.002)	(0.049)	(0.041)	(0.006)	(0.001)	(0.002)	(0.049)	(0.044)	(0.007)	(0.002)
	1717	1101	1101	17171	1717	1717	17171	17171	1717	0671	1717	17171	1101	1317	0.71

Our control variables include bank size, tire 1 capital, the board size, board independence, audit committee independence, executive compensation, and board diversity. We also Note: Table 5 provides GMM regression results. We use five measures of bank performance: (1) return on assets (ROA); (2) interest income (II); (3) non-interest income (NII); (4) stock return (SR); and (5) loan-loss provisions (LLP). Democracy is democracy scores from the Plity5 index. Political connection is a dummy variable, indicating cash donation made to a political party. We also introduce an interaction variable. Democracy*Political connection to examine whether politically connected firms perform better in a democratic environment. introduce country-level control: GDP growth and inflation. Our empirical analysis also uses country and year-fixed effects. *, ** and *** to indicate significance at 1, 5 and 10 per cent levels. The figures in parentheses are standard errors

V. DISCUSSION

Our findings diverge somewhat from prior research, which predominantly concentrated on scrutinising the nexus between political connections and bank performance. In contrast, our paper embarks on a novel trajectory by introducing the factor of a democratic environment into the analysis. This stems from our identification of a discernible relationship between Non-Performing Loans (NPL) and the democratic index, derived from an investigation by the Economist Intelligence Unit (EIU). Theoretically, the prevalence of political connections would exhibit a notable dichotomy between democratic and non-democratic environments.

In democratic environments, politically connected banks or firms actively support the election campaigns of certain government officials. Conversely, in non-democratic environments, where elections are not a requisite, politically connected banks or firms are often under government control, with some even holding governance positions. Consequently, the inclusion of the democratic environment factor in our study may yield results varying from previous findings.

Moreover, our research delves into the shifts in financial policies following the 2008 financial crisis, potentially altering the established relationships between bank performance, political connections, and the democratic environment. Spanning the period from 2010 to 2019, our data period contributes to outcomes that differ somewhat from earlier studies. Novel insights emerge from our research, such as the suggestion that politically connected banks exhibit lower NPLs than their non-politically connected counterparts post-financial crisis. Governments, cognisant of the elevated NPLs in politically connected banks and the ensuing repercussions, have exerted pressure on these banks to mitigate their NPL levels.

Regarding the democratic environment factor, our results align with prior research, indicating improved NPL performance for banks in democratic settings. However, fixed effect and Generalised Method of Moments (GMM) outputs reveal that politically connected banks in a democratic environment exhibit higher NPLs than their counterparts, signifying subpar performance. We introduce an additional metric, loan loss provision, to elucidate the potential reasons behind the heightened NPLs in politically connected banks within a democratic environment.

Our findings indicate that politically connected banks in a democratic setting maintain lower loan loss provisions, implying poorer performance compared to their counterparts and offering an indirect explanation for their elevated NPLs. In summary, our overarching conclusion posits that politically connected banks in a democratic environment demonstrate inferior

performance relative to their counterparts. Moreover, our summary descriptive aligns with past research outcomes, except for disparities in GDP growth, inflation rate, and NPLs, which we attribute to variances in sample periods. In essence, our results represent a comprehensive departure from prior research paradigms by incorporating the critical factor of a democratic environment.

VI. CONCLUDING REMARKS

This paper's primary contribution lies in elucidating the relationship between bank performance and political connection factors, taking into account the democratic environment—an aspect overlooked in previous research. Additionally, we reassess this relationship in the aftermath of the financial crisis. Notably, our findings reveal that politically connected banks exhibit lower Non-Performing Loans (NPLs) than their non-politically connected counterparts post-crisis. One plausible explanation is that governments, cognisant of the elevated NPLs in politically connected banks and the ensuing severity post-crisis, exert pressure on these banks to curtail their NPL levels.

Furthermore, our exploration highlights a negative correlation between the democratic factor and non-performing loans, coupled with a positive association with loan loss provision. This suggests that a democratic environment, characterised by lower degrees of financial constraints, enables governments to extend more funds without the apprehension of soaring NPLs, thereby influencing the setting of loan loss provisions.

In a nuanced analysis, the interaction term between political connection and the democratic environment reveals that the stock return of politically connected banks in democratic settings fares worse than in non-democratic environments. This offers an indirect explanation for the elevated Non-Performing Loans ratio in politically connected banks within the democratic milieu. While the interaction term seems to lack a significant impact on market performance variables, it significantly influences accounting performance. To fortify our conclusions, we introduce loan loss provision as a dependent variable, yielding consistent results that align with our main findings.

However, a conspicuous correlation between politically connected factors, democratic environment factors, and market performance proves elusive. One plausible explanation is the general lack of investor interest in bank stocks. This is corroborated by the undervaluation of most bank stocks in both emerging and developed markets. Consequently, establishing a concrete relationship between market performance and political connections, and democratic environment factors becomes challenging.

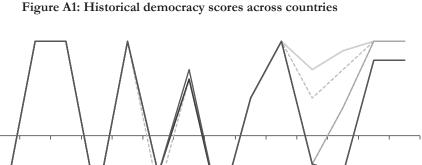
REFERENCES

- Asutay, Mehmet, and Noor Zahirah Mohd Sidek. "Political Economy of Islamic Banking Growth: Does Political Regime and Institutions, Governance and Political Risks Matter?" *International Journal of Finance & Economics* 26, no. 3 (2021): 4226-4261. https://doi.org/10.1002/ijfe.2011.
- Boateng, Agyenim, Yang Liu, and Sanjukta Brahma. "Politically Connected Boards, Ownership Structure and Credit Risk: Evidence from Chinese Commercial Banks," *Research in International Business and Finance* 47 (2019): 162-173. https://doi.org/10.1016/j.ribaf.2018.07.008.
- Bouvatier, Vincent, and Laetitia Lepetit. "Banks' Procyclical Behavior: Does Provisioning Matter?" *Journal of International Financial Markets, Institutions and Money* 18, no. 5 (2008): 513-526. https://doi.org/10.1016/j.intfin.2007.07.004.
- Chen, Hung-Kun, Yin-Chi Liao, Chih-Yung Lin, and Ju-Fang Yen. "The Effect of the Political Connections of Government Bank CEOs on Bank Performance during the Financial Crisis." *Journal of Financial Stability* 36 (2018): 130-143. https://doi.org/10.1016/j.jfs.2018.02.010.
- Delis, Manthos D., Iftekhar Hasan, and Steven Ongena. "Democracy and Credit," *Journal of Financial Economics* 136, no. 2 (2020): 571-596. https://doi.org/10.1016/j.jfineco.2019.09.013.
- Faccio, Mara. "Differences Between Politically Connected and Nonconnected Firms: A Cross-Country Analysis," *Financial Management* 39, no. 3 (2010): 905-928. https://doi.org/10.1111/j.1755-053X.2010.01099.x.
- Goldman, Eitan, Jörg Rocholl, and Jongil So. "Do Politically Connected Boards Affect Firm Value?" *The Review of Financial Studies* 22, no. 6 (2009): 2331-2360. https://doi.org/10.1093/rfs/hhn088.
- Huang, Min, Mengyao Li, and Zhihan Liao. "Do Politically Connected CEOs Promote Chinese Listed Industrial Firms' Green Innovation? The Mediating Role of External Governance Environments." *Journal of Cleaner Production* 278 (2021): 123634. https://doi.org/10.1016/j.jclepro.2020.123634.
- Jackowicz, Krzysztof, Oskar Kowalewski, and Łukasz Kozlowski. "The Influence of Political Factors on Commercial Banks in Central European Countries." *Journal of Financial Stability* 9, no. 4 (2013): 759-777. https://doi.org/10.1016/j.jfs.2012.08.001.
- Kanagaretnam, Kiridaran, Gerald J. Lobo, and Dong-Hoon Yang. "Determinants of Signaling by Banks Through Loan Loss Provisions," *Journal of Business Research* 58, no. 3 (2005): 312-320. https://doi.org/10.1016/j.jbusres.2003.06.002.

- Ozili, Peterson K. "Bank Income Smoothing, Institutions and Corruption," Research in International Business and Finance 49 (2019): 82-99, https://doi.org/10.1016/j.ribaf.2019.02.009.
- Sapienza, Paola. "The Effects of Government Ownership on Bank Lending," *Journal of Financial Economics* 72, no. 2 (2004): 357-384. https://doi.org/10.1016/j.jfineco.2002.10.002.
- Shamshur, Anastasiya, and Laurent Weill. "Does Bank Efficiency Influence the Cost of Credit?" *Journal of Banking & Finance* 105 (2019): 62-73. https://doi.org/10.1016/j.jbankfin.2019.05.002.

12 -10

APPENDIX



8 2 2011 2012 2010 2013 2014 2015 2016 2017 -10 Austria China Denmark France Iran Japan Morocco Nepal Oman Russia Sweden Thailand Turkey United United Kingdom States

Figure A2. Bank non-performing loans for gross loans across countries in 2019

