Institutional ownership stability and corporate social performance

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Abstract

We examine the influence of institutional ownership stability on corporate social performance (CSP). We find that stable institutional ownership is associated with higher CSP, after controlling for the percentage of institutional ownership. The result is robust to alternative measures of CSP and various techniques to address endogeneity concerns. Additional analysis shows that this positive relation is driven by prudent institutional investors and by CSP dimensions directly pertinent to a specific, primary stakeholder group. Overall, we show that stable institutional investors are an effective mechanism to promote firms' investment in long-term-oriented activities including CSR.

Keywords: institutional ownership stability; corporate social responsibility; corporate social performance; long-term orientation

1. Introduction

This study examines the relation between institutional ownership stability and corporate social performance (CSP) among firms in the United States. Corporate stakeholders (e.g., customers, employees, and suppliers) are becoming increasingly aware of corporate social responsibility (CSR) (Ryou et al. 2021). Institutional investors, as the group of investors with the greatest influence on firms' strategic decisions (Lin and Fu 2017; Fu et al. 2020), face increasing pressure to address CSR concerns raised by regulators and stakeholders and to consider potential improvements in their own wealth that may flow from improved CSP (Cox et al. 2008; Nofsinger et al. 2019). However, the debate about institutional investors' effect on CSR activities is ongoing. Given that institutional investors are well informed and have substantial holdings, it is plausible that their external governance and monitoring can encourage managers to engage in long-term-oriented activities (e.g., CSR) (Shleifer and Vishny 1986; Cella 2020). The opposing view is that a significant portion of institutional investors tend to prefer near-term earnings (e.g., Bushee 2001), and thus they may be less interested in improving long-term CSR activities.

Drawing on prior studies (e.g., Callen and Fang 2013; Fu and Qin 2021), we argue that stable institutional ownership is an important factor that determines institutional investors' choice to monitor and influence firms. Research documents that stable institutional investors play a monitoring role in corporate decisions that enhance firm value (e.g., Elyasiani et al. 2010). Given the long-term nature of CSR, we expect and find supporting empirical evidence that stable institutional ownership is positively associated with CSP. We further show that the positive relation is driven by institutional investors who are subject to less pressure on firms' short-term financial performance and by CSP dimensions directly pertinent to specific, primary stakeholder groups.

This study contributes to the literature in two main ways. First, it adds to the literature on the relation between institutional ownership and CSR. Previous research focuses on the effects of the proportion of shares held by institutional investors and generally finds that shareholding by long-term institutional investors is positively associated with future CSP (e.g., Cox et al.

2008; Kim et al. 2019; Oikonomou et al. 2020). However, the distinction between long-term and short-term institutional investors in the literature assumes that institutional investors act in the same way for all stocks in their portfolio, which may mask the complexity of institutional ownership arrangements (Elyasiani and Jia 2010). Given that institutional investors can display differential stability or trading styles toward equity investment, we extend the literature by documenting the first evidence that institutional ownership stability plays an important role in shaping a firm's CSP, taking into consideration the percentage of institutional ownership.

Second, this study contributes to the emerging literature on the capital market impact of institutional ownership stability. The literature documents that institutional ownership stability is an economically important factor in corporate financial policies and outcomes.[1] We add to this research by providing evidence of the importance of institutional ownership stability for corporate *nonfinancial* policies and outcomes.

2. Hypothesis development

Capital market pressure is a major force that drives corporate managers away from pursuing long-term objectives such as CSR engagement. However, investors' monitoring and governance functions can mitigate this agency problem (Lin and Fu 2017; Cella 2020). For instance, shareholders with large ownership interests such as institutional investors can challenge and influence management's decisions and CSR activities (Jo and Harjoto 2011).

However, institutional investors face a tradeoff between the shared benefits of active monitoring and private benefits of short-term trading (Shleifer and Vishny 1986). The choice between the two strategies is manifested by shareholding stability. Research shows that stable institutional shareholders can reduce myopic managerial behavior and induce managers to pursue long-term-oriented projects and strategies (e.g., Elyasiani et al. 2010). Conversely, unstable institutional shareholders are more likely to engage in frequent trading based on information (Callen and Fang 2013) or increase managerial myopia (e.g., by reducing long-

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[1] For example, it is reported that institutional ownership stability reduces real earnings management (Sakaki et al. 2017), improves banks' performance (Elyasiani and Jia 2008), and leads to a lower debt cost (Elyasiani et al. 2010).

term investments) due to the high pressure they put on managers to meet short-term earnings goals (Gaspar et al. 2005).

Given the long-term-oriented nature of CSR activities and stable institutional shareholders' role in active monitoring and mitigating managerial myopia, we propose that stable institutional shareholders may play an important role in fostering managers' CSR activities. The above discussion leads to the following hypothesis:

Hypothesis 1: Institutional ownership stability (volatility) is positively (negatively) associated with CSP.

3. Research design

3.1. Variable construction

We construct the measure of CSP using social responsibility ratings from the KLD Research & Analytics database. We follow research such as Ryou et al. (2021) and use the six categories of the KLD social ratings: (1) environment, (2) community, (3) diversity, (4) employee relations, (5) human rights, and (6) product. Consistent with prior research, we measure a firm's CSP (*CSPScore*) in a given year as the net of the firm's total strengths and concerns in that year.[2]

To construct the measures of institutional ownership stability, we use institutional stock holdings data from the Thomson Reuters 13F database. Following Elyasiani and Jia (2008) and Elyasiani et al. (2010), we measure institutional ownership stability using institutional ownership volatility (*StdI*), which is the average standard deviation of institutional shareholding proportions across all institutional investors in the firm over a 5-year period including the sample year and the preceding 4 years:

$$StdI_i = \sum_{j=1}^{J_i} Std\left(p_{i,t}^j\right)/J_{i,} \tag{1}$$

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[2] *CSPScore* is typically characterized by a low mean score as documented in studies such as Cook et al. (2019), which raises a concern that the results may be driven by extreme values due to the negatively skewed distribution. To address this concern, we follow Cook et al. (2019) and construct an alternative measure of CSP (*CSP_Q*) based on the quintiles of *CSPScore*. The untabulated results show that our inferences remain unchanged.

where $p_{i,t}^{j}$ is the proportion of outstanding shares of firm i held by investor j in year t (t = 1, 2, 3, 4, and 5), and J_i is the number of institutional investors in firm i. The larger the ownership volatility *StdI*, the lower the ownership stability and the less stable the institutional holdings.

Following the literature (e.g., Ioannou and Serafeim 2012; Firoozi and Keddie 2021), we include the following control variables: *FirmSize*, *ROA*, *LEVERAGE*, *LIQUIDITY*, *RISK*, *RDE*, *MTB*, *ANALYST*, *SCHBI*. Detailed variable definitions are provided in Appendix A.

3.2. Sample

We obtain data from various databases, including KLD, Compustat, the Centre for Research in Security Prices (CRSP), I/B/E/S, and Thomson Reuters 13f Institutional Holdings (see Appendix A for details). We exclude firm-year observations with missing data for variables used in our regression analysis. The final sample consists of 9,013 firm-year observations for the period 1991–2015.[3]

Table 1 reports the sample distribution by industry (Panel A) and year (Panel B). The descriptive statistics are reported in Table 2. Panel A presents the summary statistics for all of the variables. *CSPScore* has an average of -0.06 with a median of 0 (i.e., total strengths and concerns net to 0). This distribution is consistent with the literature (e.g., Ioannou and Serafeim 2012). The test variable *StdI* has a mean of 0.08% and a median of 0.05%, which is comparable to the statistics reported by prior studies (e.g., Elyasiani and Jia 2008). To distinguish the effect of the institutional ownership level on *CSPScore* from the effect of ownership stability, we construct 25 *CSPScore* portfolios sorted by institutional ownership volatility (*StdI*) and percentage (*SCHBI*). Panel B of Table 2 reports the average *CSPScore* for each of the portfolios sorted.[4] From the portfolio analysis we do not find a consistent relation between *CSPScore* and institutional shareholding percentage, although there is a consistent positive relation between *CSPScore* and institutional ownership stability. This indicates that the institutional

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[3] To address the concern that our results may be driven by the 2008–2009 global financial crisis, we exclude 2008 and 2009 from our regression as a robustness check and find that our results remain similar (untabulated).

[4] For each year we divide our sample into quintiles based on the aggregate institutional ownership percentage (*SCHBI*), and then divide each ownership percentage quintile into quintiles based on institutional ownership volatility (*StdI*). This process yields 25 *CSPScore* portfolios.

shareholding percentage is not a substitute for ownership stability, highlighting the importance of examining the effect of ownership stability on CSR performance.

Tables 1 & 2 here

Appendix B presents the Pearson correlation matrix of our key variables. *CSPScore* is negatively correlated with *StdI*, indicating a negative (positive) correlation between institutional ownership volatility (stability) and CSP.

4. Empirical results and discussion

4.1. Main results

The following model is used to test H1:

$$CSPScore_{i,t} = \beta_0 + \beta_1 StdI_{i,t} + \beta_2 SCHBI_{i,t} + \beta_3 FirmSize_{i,t} + \beta_4 ROA_{i,t} + \beta_5 LEVERAGE_{i,t} + \beta_6 LIQUIDITY_{i,t} + \beta_7 RISK_{i,t} + \beta_8 RDE_{i,t} + \beta_9 MTB_{i,t} + \beta_{10} ANALYSTt_{i,t} + Year\ FE_{i,t} + Industry\ FE_{i,t} \quad (2)$$

In all regressions, we follow the literature (e.g., Elyasiani et al. 2010; Fu et al. 2020) and cluster standard errors by firm to account for heteroscedasticity across firms and serial correlations.

Table 3 presents the regression results. We first conduct a baseline regression without the control variables (Column 1). The coefficient on *StdI* is significantly negative, providing initial support for H1. Column (2) reports the results of the full model. The coefficient on *StdI* remains significantly negative (β = -0.636, p < 0.001), which supports H1's prediction that larger institutional ownership volatility or less stable holdings are associated with lower CSP. The effect is also economically significant. A one standard deviation increase in institutional ownership volatility is associated with a 0.07 decrease in CSP rating. [5]

Table 3 here

4.2. Endogeneity concerns

Our institutional ownership stability measure is based on institutional ownership in the firm over a 5-year period including the sample year and the preceding 4 years, which can mitigate the reverse causality concern. To further address this concern, we follow prior research

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[5] The calculation is: $0.636 \times 0.11 = 0.07$, where 0.636 is the absolute value of the coefficient on *StdI* in Column (2) of Table 3, and 0.11 is the standard deviation of *StdI* in Table 2.

(e.g., Elyasiani et al. 2010) and lag all of the variables on the right-hand side of Equation (2) by 1 year and re-run the regression. We find that the coefficient on *StdI* remains significantly negative ($\beta = -0.467$, $p < 0.05$, Table 4 Column 1).

We also use a simultaneous equations model to further account for the potential endogeneity problems. In this model, we treat both *CSPScore* and *StdI* as endogenous variables and estimate it using the three-stage least squares (3SLS) method:

$$
\begin{aligned}
CSPScore_{i,t+3} = {} & \beta_0 + \beta_1 StdI_{i,t} + \beta_2 SCHBI_{i,t} + \beta_3 FirmSize_{i,t} + \beta_4 ROA_{i,t} + \\
& \beta_5 LEVERAGE_{i,t} + \beta_6 LIQUIDITY_{i,t} + \beta_7 RISK_{i,t} + \beta_8 RDE_{i,t} + \\
& \beta_9 MTB_{i,t} + \beta_{10} ANALYSTt_{i,t} + Year\ Dummies_{i,t} + Industry \\
& Dummies_{i,t}
\end{aligned}
\tag{3}
$$

$$
\begin{aligned}
StdI_{i,t+3} = {} & \beta_0 + \beta_1 CSPscore_{i,t} + \beta_2 SCHBI_{i,t} + \beta_3 FirmSize_{i,t} + \beta_4 ROA_{i,t} + \\
& \beta_5 LEVERAGE_{i,t} + \beta_6 RISK_{i,t} + \beta_7 MTB_{i,t} + \beta_8 ANALYSTt_{i,t} + \\
& \beta_9 ln(ShareOutstanding)_{i,t} + Year\ Dummies_{i,t} + Industry\ Dummies_{i,t}
\end{aligned}
\tag{4}
$$

The independent variables included in Equation (3) are the same as those in Equation (2). For Equation (4), we include *CSPScore* and a set of controlled variables selected based on prior studies (e.g., Elyasiani and Jia 2008; Elyasiani et al. 2010). *ln(ShareOutstanding)* is the natural logarithm of the number of shares outstanding. All other variables are defined in Appendix A.

The results are reported in Columns (2) and (3) of Table 4. The significantly negative coefficient on *StdI* in the CSR performance regression (Column 2) indicates that greater institutional ownership stability leads to better CSR performance in subsequent periods. In the *StdI* regression (Column 3), the coefficient on *CSPScore* is positive and insignificant, indicating that there is no significant relation between CSR performance and subsequent institutional ownership stability. These results support a unidirectional causal relation from institutional ownership stability to CSR performance.

Table 4 here

4.3. Sin vs non-sin industries

In general, the growing importance of socially responsible investing to stakeholders constrains the operations of firms in sin industries such as the production of alcohol and tobacco. In addition, these firms are constantly under pressure from societal norms (Cahan et al. 2017). This raises a concern that our results might be driven by firms operating in sin

industries. To address this concern, we exclude the firms in sin industries and re-run Equation (2).[6] The results are reported in Column (4) of Table 4. The coefficient on *StdI* remains quantitatively and qualitatively similar to our main result ($\beta = $ -0.652, $p < 0.001$), confirming that the main results of this study are not driven by firms operating in sin industries.

4.4. Different types of institutions

Studies show that institutional investors' investment practices differ significantly. Mutual funds and investment advisors face greater competitive pressures and are thus more sensitive to the current financial performance of portfolio companies (Bushee 2001), suggesting that they are less likely to monitor the firms and influence management's CSR practices. In contrast, other institutional investors such as banks, insurance companies, and pension funds are subject to more stringent fiduciary standards and tend to tilt their portfolios toward prudent and safer stocks (Del Guercio 1996); thus, they may be more likely to engage in monitoring and influencing management to improve firms' CSR performance.

To test our conjecture, we classify institutional investors into five groups: (1) banks; (2) insurance companies; (3) investment companies; (4) independent investment advisors; and (5) others, including private endowment funds, foundations, and others. We calculate *StdI* for each type of institution, then replace *StdI* in Equation (2) with the *StdI* calculated for each of the five types of institutions and re-run the regression separately.

Panel A of Table 5 reports the regression results. Consistent with our conjecture, we find significant and negative relations between *StdI* and *CSPScore* for banks and insurance companies, but not for investment companies and independent investment advisors. These findings suggest that the relation between institutional ownership stability and CSP is only present for prudent institutional investors who are subject to less pressure on short-term financial performance, which is consistent with our expectation that stable institutional investors tend to place greater emphasis on firms' CSP.

Table 5 here

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[6] The sin industries include SIC codes 2100−2199 (alcohol) and 2080−2085 (tobacco).

4.5. Different dimensions of corporate social performance

In our main analyses, we use an aggregate measure of CSP, *CSPScore*. Given the multidimensional nature of CSP, we further examine how institutional ownership stability affects the different dimensions of CSP. We use *Environment*, *Community*, *Diversity*, *Employee Relations*, *Human Rights*, and *Product* to capture the net of a firm's total strengths and concerns across the environment, community, diversity, employee relations, human rights, and product components of CSP, respectively, and rerun Equation (2) by replacing *CSPScore* with each of the component variables. The results are presented in Panel B of Table 5. We find that institutional stability can enhance all of the components of CSP we examine except for human rights. Unlike the other components of our aggregate CSP measure, the human rights component is not directly associated with any specific, primary stakeholder group. Therefore, our results indicate that institutional ownership stability plays a significant role in enhancing social activities directly pertinent to specific, primary stakeholder groups, which are considered by studies such as Oikonomou et al. (2012) as focal for the implementation of successful stakeholder management.

5. Conclusion

The objective of this study is to investigate the influence of institutional ownership stability on CSP. We find that institutional ownership stability is positively associated with CSP. Additional analysis shows that the positive relation is driven by prudent institutional investors who are subject to less pressure on short-term financial performance (e.g., banks and insurance companies) and by CSP dimensions directly pertinent to specific, primary stakeholder groups. This finding suggests that the stability in equity ownership of institutional investors plays an important role in supporting investments in CSR, especially in areas that are crucial for the implementation of successful stakeholder management. Overall, we show that stable institutional investors can be seen as an effective mechanism in promoting firms' investment in long-term-oriented activities including CSR.

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Appendix A. Definitions of key variables

Variable	Definition	Data source
CSPScore	The net of the firm's total strengths and total concerns across the six KLD categories: environment, community, employee relations, diversity, human rights, and product. A higher value of *CSPScore* indicates a better corporate social performance (CSP).	KLD
CSP_Q	An ordinal variable based on the quintiles of *CSPScore.* It is coded 1 if the firm's *CSPScore* falls in the bottom quintile of the sample distribution, 2 if *CSPScore* is in the second quintile, and so on. A higher value of *CSP_Q* indicates a better CSP.	KLD
StdI	The average standard deviation of institutional shareholding proportions across all institutional investors in the firm over a 5-year period including the sample year and the preceding 4 years. A larger value of *StdI* indicates higher institutional ownership volatility (i.e., lower institutional ownership stability).	Thomson Reuters 13F Institutional Holdings
SCHBI	The aggregate percentage of shares held by institutional investors owning more than 5% of outstanding shares.	As above
FirmSize	The natural logarithm of total assets.	Compustat
ROA	The ratio of net income to total assets.	Compustat
LEVERAGE	The ratio of total long-term debt to total assets.	Compustat
LIQUIDITY	The ratio of current assets to current liabilities.	Compustat
RISK	The standard deviation of monthly stock returns of the issuing firm over a twelve-month period each year.	CRSP
RDE	Research and development expenditure divided by sales.	Compustat
MTB	The ratio of the market value of equity to its book value.	Compustat
ANALYST	The number of analysts issuing earnings forecast for the firm in a year.	I/B/E/S

Appendix B. Correlation matrix of key variables

		1	2	3	4	5	6	7	8	9	10	11
1	CSPScore	1										
2	*StdI*	*-0.18*	1									
3	*SCHBI*	*-0.10*	*0.09*	1								
4	*FirmSize*	*0.25*	*-0.58*	*-0.23*	1							
5	*ROA*	*0.09*	*-0.19*	*-0.19*	*0.27*	1						
6	*LEVERAGE*	0.01	*-0.13*	0.01	*0.33*	*-0.13*	1					
7	*LIQUIDITY*	*-0.09*	*0.23*	*0.11*	*-0.39*	*-0.13*	*-0.25*	1				
8	*RDE*	*-0.02*	*0.17*	*0.09*	*-0.23*	*-0.55*	0.02	*0.34*	1			
9	*RISK*	*-0.11*	*0.31*	*0.106*	*-0.35*	*-0.37*	-0.01	*0.17*	*0.22*	1		
10	*MTB*	*0.11*	*0.03*	*-0.04*	*-0.02*	*0.03*	*0.01*	*-0.01*	0.09	-0.04	1	
11	*ANALYST*	*0.29*	*-0.36*	*-0.21*	*0.62*	*0.17*	*0.07*	*-0.16*	*-0.05*	*-0.19*	*0.15*	1

This table reports a Pearson correlation matrix of the key variables. ***Bold*** indicates that the correlations are statistically significant at the 10% level or better based on two-tailed tests. Refer to Appendix A for variable definitions.

Table 1. Sample distribution

Panel A: By year

Year	Frequency	Percentage (%)
1991	60	0.67
1992	55	0.61
1993	58	0.64
1994	65	0.72
1995	75	0.83
1996	83	0.92
1997	76	0.84
1998	92	1.02
1999	107	1.19
2000	114	1.26
2001	191	2.12
2002	230	2.55
2003	543	6.02
2004	628	6.97
2005	631	7.00
2006	589	6.54
2007	541	6.00
2008	670	7.43
2009	709	7.87
2010	762	8.45
2011	534	5.92
2012	535	5.94
2013	499	5.54
2014	523	5.80
2015	643	7.13
Total	9,013	100.00

Panel B: By industry

Industry	Frequency	Percentage (%)
Agriculture, forestry, and fishing	13	0.14
Mining	99	1.10
Manufacturing	6,136	68.08
Transportation, communication, and utilities	54	0.60
Wholesale trade	224	2.49
Retail trade	968	10.74
Finance, insurance, and real estate	131	1.45
Services	1,383	15.34
Non-classifiable establishments	5	0.06
Total	9,013	100.00

This table presents sample distribution by year (Panel A) and industry (Panel B). Industry classification in Panel B is based on 1-digit SIC codes.

Table 2. Descriptive statistics

Panel A: Descriptive statistics for the full sample

Variable	N	Mean	S.D.	25th	Median	75th
CSPScore	9013	-0.06	1.9	-1	0	1
StdI	9013	0.08	0.11	0.02	0.05	0.1
SCHBI (%)	9013	21.83	11.72	12.65	20.29	29.39
FirmSize	9013	7	1.54	5.84	6.91	8.04
ROA	9013	0.02	0.18	0.01	0.05	0.09
LEVERAGE	9013	0.16	0.18	0	0.12	0.25
LIQUIDITY	9013	3.09	2.77	1.56	2.27	3.57
RISK	9013	0.11	0.06	0.07	0.1	0.14
RDE	9013	2.01	132.18	0.01	0.04	0.14
MTB	9013	4.36	62.96	1.67	2.6	4.12
ANALYST	9013	10.1	7.6	4	8	14

Panel B: CSPScore portfolios sorted by institutional ownership stability (StdI) and percentage (SCHBI)

		SCHBI Low				SCHBI High			
		1	2	3	4	5	H-L	*t*	*p*
StdI Low	1	1.190	0.746	0.525	0.507	-0.026	-1.216	-5.121	<0.001
	2	-0.024	0.038	0.031	-0.037	0.314	0.338	2.212	0.027
	3	-0.227	-0.259	-0.224	-0.363	-0.282	-0.055	-0.437	0.662
	4	-0.446	-0.305	-0.424	-0.319	-0.380	0.066	0.641	0.522
StdI High	5	-0.560	-0.412	-0.530	-0.452	-0.311	0.249	2.533	0.012
H-L		-1.750	-1.158	-1.055	-0.959	-0.285			
t		-9.980	-7.538	-7.271	-7.040	-1.906			
p		<0.001	<0.001	<0.001	<0.001	0.057			

Panel A presents summary statistics for all variables for the full sample of 9,013 firm-year observations. Panel B reports the average *CSPScore* of 25 portfolios sorted in two dimensions: institutional ownership volatility (*StdI*) and aggregate institutional shareholding percentage (*SCHBI*). For each year we divide our sample into quintiles based on the aggregate institutional ownership percentage (*SCHBI*), and then divide each ownership percentage quintile into five quintiles based on institutional ownership volatility (*StdI*). This yields 25 portfolios. The last three columns of Panel B present the differences, *t*-statistics and *p*-values for *t*-tests of the differences in mean *CSRScore* between the highest *SCHBI* portfolio and the lowest *SCHBI* portfolio in the same *StdI* quintile. The last two rows of Panel B present the differences, *t*-statistics and *p*-values for *t*-tests of the differences in mean *CSPScore* between the highest *StdI* portfolio and the lowest *StdI* portfolio in the same *SCHBI* quintile. All variables are defined in Appendix A.

Table 3. The influence of institutional ownership stability on corporate social performance

Dep. Var.	$CSPScore_t$ (1)	$CSPScore_t$ (2)
StdI	-2.524***	-0.636***
	(0.000)	(0.000)
SCHBI		-0.001
		(0.550)
FirmSize		0.130***
		(0.000)
ROA		-0.101
		(0.254)
LEVERAGE		-0.568***
		(0.000)
LIQUIDITY		0.010*
		(0.085)
RDE		0.0002***
		(0.000)
RISK		-0.829**
		(0.020)
MTB		0.0003
		(0.157)
ANALYST		0.046***
		(0.000)
Constant	-1.845***	-3.527***
	(0.000)	(0.000)
Year fixed effects	Yes	Yes
Industry fixed effects	Yes	Yes
N	9,013	9,013
R^2	0.095	0.147

All variables are defined in Appendix A. The *p*-values based on standard errors clustered by firm are reported in parentheses. *, **, and *** represent significance at the 10%, 5%, and 1% levels, respectively.

Table 4. Robustness tests

Model	Lagged regression	Simultaneous equation model (3SLS)		Non-sin industry
Dep. Var.	$CSPScore_t$ (1)	$CSPScore_{t+3}$ (2)	$StdI_{t+3}$ (3)	$CSPScore_t$ (4)
CSPScore			0.001	
			(0.451)	
StdI	-0.467**	-0.528*		-0.652***
	(0.016)	(0.097)		(0.000)
SCHBI	0.0001	-0.001	-0.000***	-0.001
	(0.949)	(0.773)	(0.001)	(0.622)
ln(ShareOutstanding)			-0.003**	
			(0.016)	
Constant	-3.387***	-4.343***	0.171***	-3.496***
	(0.000)	(0.000)	(0.000)	(0.000)
Other controls	Yes	Yes	Yes	Yes
Year fixed effects	Yes	Yes	Yes	Yes
Industry fixed effects	Yes	Yes	Yes	Yes
N	9,013	5,039	5,039	8,989
R^2	0.145	0.156	0.409	0.147

Column (1) presents the results using the lagged regression where all the independent variables are lagged by one year. Columns (2) and (3) report the results of the first and second stage of the 3SLS model, respectively. Column (4) report the results after excluding firms in the sin industries. *ln(ShareOutstanding)* is the natural logarithm of the number of shares outstanding. All other variables are defined in Appendix A. The *p*-values based on standard errors clustered by firm are reported in parentheses. *, **, and *** represent significance at the 10%, 5%, and 1% levels, respectively.

Table 5. Different types of institutions and dimensions of corporate social performance

Panel A: The effect of different types of institutions on the relation between institutional ownership stability and corporate social performance

Types of institutions	Banks	Insurance companies	Investment companies	Independent investment advisors	Other institutions
Dep. Var.	$CSPScore_t$	$CSPScore_t$	$CSPScore_t$	$CSPScore_t$	$CSPScore_t$
	(1)	(2)	(3)	(4)	(5)
$StdI$	-0.181**	-0.326**	-0.076	0.025	-0.087***
	(0.034)	(0.033)	(0.649)	(0.554)	(0.000)
$SCHBI$	-0.001	-0.001	-0.001	-0.001	-0.001
	(0.730)	(0.748)	(0.670)	(0.622)	(0.736)
Constant	-3.590***	-3.648***	-3.700***	-3.776***	-3.552***
	(0.000)	(0.000)	(0.000)	(0.000)	(0.000)
Other controls	Yes	Yes	Yes	Yes	Yes
Year fixed effects	Yes	Yes	Yes	Yes	Yes
Industry fixed effects	Yes	Yes	Yes	Yes	Yes
N	9,013	9,013	9,013	9,013	9,013
R^2	0.146	0.146	0.146	0.146	0.147

Panel B: The effect of institutional ownership stability on the components of corporate social performance

Dep. Var.	$Environment_t$	$Community_t$	$Diversity_t$	$Employee\ Relations_t$	$Human\ Rights_t$	$Product_t$
	(1)	(2)	(3)	(4)	(5)	(6)
$StdI$	-0.158***	-0.056*	-0.269***	-0.133*	0.009	-0.128***
	(0.000)	(0.086)	(0.008)	(0.059)	(0.538)	(0.000)
$SCHBI$	0.000	-0.001	-0.000	0.000	-0.000	0.001
	(0.887)	(0.108)	(0.662)	(0.745)	(0.149)	(0.180)
Constant	-0.194	-0.315*	-1.589***	-0.471**	-0.328**	-0.350
	(0.658)	(0.076)	(0.000)	(0.032)	(0.014)	(0.166)
Other controls	Yes	Yes	Yes	Yes	Yes	Yes
Year fixed effects	Yes	Yes	Yes	Yes	Yes	Yes
Industry fixed effects	Yes	Yes	Yes	Yes	Yes	Yes
N	9,013	9,013	9,013	9,013	9,013	9,013
R^2	0.159	0.091	0.281	0.136	0.077	0.093

Panel A reports regression results of the effect of different types of institutions on the relation between institutional ownership stability and corporate social performance. In Columns (1)–(5) of Panel A, the types of institutional investors used for the calculation of *StdI* are banks, insurance companies, investment companies, independent investment advisors, and other institutions, respectively. Panel B reports regression results of the effect of institutional ownership stability on the components of corporate social performance. *Environment*, *Community*, *Diversity*, *Employee Relations*, *Human Rights*, and *Product* are the net of a firm's total strengths and total concerns across the environment, community, diversity, employee relations, human rights, and product KLD categories, respectively. All other variables are defined in Appendix A. The *p*-values based on standard errors clustered by firm are reported in parentheses. *, **, and *** represent significance at the 10%, 5%, and 1% levels, respectively.