Litigation Risk and Corporate ES Misconduct

Yue Li *

July 2023

Abstract

This article investigates how Environmental and Social (ES) litigation risk, measured by the political ideology of circuit judges, affects corporate ES misconduct. I find that firms significantly reduce ES misconduct when *ex ante* ES litigation risk is higher. To verify judge ideology as a valid proxy, I examine ES lawsuits and find liberal judges are more likely to support plaintiffs. Besides, reduced ES misconduct may be attributed to increased pressure from institutional investors. Furthermore, when facing heightened ES litigation risk, firms respond by holding more cash and making fewer M&As. Finally, I find negative stock price reactions around liberal judge appointments and less likelihood of payout in the following year, suggesting that shareholders pay when stakeholders gain. Taken together, this paper explores a novel and important determinant on corporate ES performance.

*Yue Li is with Finance Department at Paul Merage School of Business, University of California Irvine. Email: liy54@uci.edu. All errors are my own.

1 Introduction

US investors care more about sustainable investing now than ever before. By the start of 2020, one in three dollars invested in the United States is under management using sustainable investing strategies [1]. Owing to increased attention and pressure from investors, large companies start to revise their long-standing principle of shareholder primacy to incorporate stakeholder interests [2]. Therefore, how firms treat their stakeholders and what factors influence their relationships become timely questions, attracting a quickly-expanding body of research in corporate finance (Heese, Pérez-Cavazos, and Peter (2022); Zaman, Atawnah, Baghdadi, and Liu (2021); Raghunandan and Rajgopal (2021)).

In this paper, I document that one crucial factor, *ex ante* ES litigation risk, affects firms' performance in environmental and social areas. Motivated by legal research findings that political ideology in the courtroom plays am important role in judge decisions and lawsuit outcomes (Tate (1981); Segal and Cover (1989); Staudt, Epstein, and Wiedenbeck (2006)), I exploit a unique feature of US federal court system to measure ES litigation risk: the ideology of judges in circuit courts. Inspired by previous works that judge ideology has important ramifications in corporate litigation (Huang, Hui, and Li (2019); Liu (2020)), I hypothesize that judges with liberal ideology are likely to be harsher on firms in ES lawsuits, compared to their counterparts [3]. The potential harsher punishment heightens corporate ES risk and anticipation of higher litigation risk has significant implications on corporate ES

[1] Source: Report on US Sustainable and Impact Investing Trends, US SIF. For more details, see https://www.ussif.org/files/Trends%20Report%202020%20Executive%20Summary.pdf

[2] For example, in August 2019, 181 CEOs of large US companies signed a statement in Business Roundtable, committing to lead their companies for the benefit of all stakeholders â customers, employees, suppliers, communities and shareholders. This new statement on the the purpose of a corporation supersedes previous statements which endorsed principles of shareholder primacy.

[3] This hypothesis is motivated by an ever-widening divide between liberals and conservatives in many political topics. Anecdotal evidence shows that the US is becoming increasingly politically polarized. For example, in a NBC News poll, Some 80% of Democrats and Republicans believe that the other political party poses a threat that, if not stopped, "will destroy America as we know it". (Source: https://www.axios.com/2022/10/23/poll-midterm-election-democrats-republicans). Among all partisan divides, environmental and social related topics are among the most contentious ones. For example, *Climate Insights 2020* documents significant partisan divide in terms of climate change and global warming. (Source: https://www.rff.org/publications/reports/climateinsights2020-partisan-divide/)

performance.

My measure of ES litigation risk has a few advantages compared to existing measures. First and foremost, it circumvents the difficulty by measuring *ex ante* litigation risk from an exogenous perspective. In the literature of corporate litigation, it is notoriously difficult to reach causal interpretations as corporate litigation risk measured by firm or industry characteristics may be correlated to unobserved firm-level factors which potentially affect firm operations or managerial decisions [4]. Second, in addition to other measures on litigation risk that mostly capture the *likelihood* that firms will be sued, judge ideology also affects the *cost* of lawsuits to firms (Liu (2020)).

As laws set the minimum standard for ethical behavior, litigation risk may efficiently deter *badwill* but may not necessarily promote *goodwill*. In this regard, I hypothesize that ES litigation risk specifically affects the *dark* side of corporate ES behavior, i.e. ES misconduct. To capture firms' ES misconduct, I apply firms' violations against ES regulations enforced by federal and state agencies. Compared to other ES measures commonly used in the literature such as third-party rating scores or media coverage, this outcome-based measure has the advantage of granularity, transparency and objectivity.

Using a sample covering 6199 unique US public firms from 2000 to 2021, I find rich and robust evidence that ES litigation risk refrains firms from committing ES misconduct. The results hold for both extensive (likelihood of ES misconduct) and intensive (number and penalty amount of ES misconduct) margins and are valid in both environmental and social subgroups. To draw causal inference, I exploit exogenous variations to litigation risk driven by death of judges. The results confirm that the deterrent effect of ES litigation

[4]In recent years, scholars in finance and accounting often utilize law shocks as quasi-natural experiments which presumably affect ex-ante corporate litigation risk from an exogenous perspective. For example, a number of papers utilize Universal Demand Law and Ninth Circuit ruling on July 2, 1999 as exogenous shocks to litigation risk and test implications on a variety of managerial decisions and corporate outcomes. An incomplete list of these studies includes Crane and Koch (2018), Freund, Nguyen, and Phan (2021), Chung, Kim, Rabarison, To, and Wu (2020), Hassan, Houston, and Karim (2021), Lin, Liu, and Manso (2021), Nguyen, Phan, and Lee (2020), Foroughi, Marcus, Nguyen, and Tehranian (2022). However, Donelson, Kettell, McInnis, and Toynbee (2022) warn the validity of using Universal Demand Law as an exogenous shock to litigation risk.

risk on corporate ES misconduct is causal. To validate that judge ideology serves as a good proxy for litigation risk in ES, I provide direct evidence that liberal judges are more likely to support plaintiffs in lawsuits pertaining to environmental and social issues [5].

Next, I dive deep to explore potential channels and corporate response towards heightened ES litigation risk. I find evidence that reduced ES misconduct may be attributed to increased pressure from institutional investors. Specifically, I find the main deterrent effect becomes stronger when a firm has a higher institutional ownership. More importantly, analysis on proxy voting provides direct evidence that institutional investors are more likely to support ES shareholder proposals when ES litigation risk looms high. Besides, I find that when faced with higher ES litigation risk, firms increase cash holdings and decrease M&A activities.

As the old saying goes, *"there ain't no such thing as a free lunch"*. After documenting the main results and potential channels, I explore who pays when stakeholders gain. I discover that heightened ES litigation risk benefits stakeholders at the expense of shareholders. Specifically, I notice significant negative stock price actions around days when judges nominated by democratic presidents are confirmed by the Senate. In addition, echoing prior studies in litigation risk and payout policy (Arena and Julio (2021); Do (2021)), I find that shareholders are less likely to receive dividends when ES litigation risk increases.

Finally, I conduct a battery of ancillary tests to verify the robustness of my results. First, I include firm fixed effect into the baseline model and find the results are largely stable. Second, I use an alternative measure of ES litigation risk based on the proportion of liberal judges. The results are basically unchanged. Third, I repeat the whole analysis using judge ideology at district courts as district judges are gatekeepers at the frontline. I find similar and significant results suggesting deterrent effect of ES litigation risk on corporate ES misconduct.

This paper contributes to several strands of literature. First, to my knowledge, this is one

[5]Using environmental lawsuits in federal courts, Liu (2020) finds that lawsuits with Republican-appointed judges are approximately 12% less likely to succeed in reaching a settlement compared with those adjudicated by Democratic-appointed judges. Echoing her findings, I find the same pattern exists when incorporating "S"-related lawsuits.

of the first papers that examines litigation risk in ES-related issues. Prior studies in finance and accounting mostly focus on either security litigation risk (Lowry and Shu (2002); Kim and Skinner (2012)) or risk from shareholder-initiated lawsuits [6] (Crane and Koch (2018); Freund, Nguyen, and Phan (2021); Lin, Liu, and Manso (2021)), while some others look into all corporate lawsuits (Hutton, Jiang, and Kumar (2015); Arena and Julio (2021)). In this paper, I find that ES litigation risk functions as an important external corporate governance mechanism, which effectively curbs the dark side of firms' ES performance.

Second, this study adds to a rapidly expanding body of research examining stakeholder interests in corporate finance literature. Prior literature in corporate misconduct mostly concentrates on financial and accounting misconduct (Karpoff and Lou (2010); Karpoff, Koester, Lee, and Martin (2017); Parsons, Sulaeman, and Titman (2018)), while more recent studies begin to document a handful of determinants that affect firms' misconduct to their stakeholders, including board composition (Zaman, Atawnah, Baghdadi, and Liu (2021); Neukirchen, Posch, and Betzer (2022)), media monitoring (Heese, Pérez-Cavazos, and Peter (2022)) and asset liquidity (Zaman, Atawnah, Nadeem, Bahadar, and Shakri (2022)). This article provides corroborating evidence about the deterrent effect on ES misconduct from judicial perspective. This angle is new and noteworthy as courts function as the last resort when internal governance and personal negotiations fail.

Third, this paper contributes to the small but growing literature examining judges' roles in corporate finance (Iverson, Madsen, Wang, and Xu (2020); Liu (2020); Huang, Roychowdhury, Sletten, and Xu (2021); Harit, Parupati, Pinto, and Sadka (2022)). Judicial system is one of the cornerstones of the US power structure and judges play extremely important roles in modern finance industry. Huang, Hui, and Li (2019) first argue that judge ideology is a valid proxy for litigation risk, and show that it captures *ex ante* risk in security class action litigation. In this paper, I validate that judge ideology also works as a good proxy for ES litigation risk and has pronounced deterrent effect on corporate ES misconduct. Findings in

[6] For a review of literature in corporate litigation, see Arena and Ferris (2017)

this paper contribute to the literature of law and finance by demonstrating the significant effect of judicial system on managerial decisions and corporate performance.

The remainder of this paper is organized as follows. In section 2, I describe main data sources and sample construction. In section 3, I present main empirical results and address endogeneity concerns. Section 4 validates the usage of judge ideology as proxy for ES litigation risk. Section 5 explores potential channels and firms' response towards heightened ES litigation risk. Section 6 includes a set of robustness tests and section 7 concludes.

2 Data and Sample Selection

Data used in this study are collected from multiple sources. To construct my main sample, I start with corporate misconduct data from Violation Tracker Database, produced by Good Jobs First. I aggregate ES misconducts at firm-year level and then merge with Compustat/CRSP Merged Database through common Central Index Key (CIK) and manual inspections. Next, I keep companies listed on NYSE, AMEX and Nasdaq and exclude companies if the headquarter of the company is not located in the US, as well as companies in financial sectors (SIC 6000-6999), utility sectors (SIC 4900-4949) due to their unique nature of financial statements. Next, I supplement the dataset with information on judge ideology at the circuit court where the company is headquartered. Finally, I obtain a sample with 6199 unique public firms and 59,671 firm-year observations spanning from 2000 [7] to 2021.

[7]The sample starts from 2000 because this is the first year Violation Tracker Database tracks corporate misconduct.

2.1 Federal Judge Ideology

I use judge ideology at circuit courts to proxy for ES litigation risk [8]. I construct judge ideology at circuit-year-month level using judge biographical information provided by Federal Judicial Center (FJC) [9]. Established by Congress in 1967, the Federal Judicial Center is the research and education agency of the judicial branch of the U.S. government. The database contains service records for each federal judge, dating back to as early as late 18th century. For each judge service record, it provides information on judge name, court name, appointing president with his/her party affiliation, confirmation date, termination date and termination reason [10]. Using judge service records, I construct a panel dataset at circuit court-year-month level with information about all judges sitting on the courtroom at that time.

Inspired by prior studies in law and finance (Pinello (1999); Chemerinsky (2002); Huang, Hui, and Li (2019); Liu (2020)), I measure judge ideology using the party affiliation of his/her appointing president [11].Because each case in a circuit court will be assigned to a panel of three randomly selected judges from the circuit, I follow Huang, Hui, and Li (2019) to measure the ex-ante probability that a lawsuit case will be handled by a panel with at least two judges appointed by democratic presidents. Specifically, the probability, denoted as $Liberal\_prob$, can be calculated as:

$$Liberal\_prob = \frac{\binom{x}{3} + \binom{x}{2} * \binom{y-x}{1}}{\binom{y}{3}},$$

where x, y indicate the number of democratic appointees and the total number of incum-

[8]For more background information about US judicial system, see (Huang, Hui, and Li (2019)). The rationale of using judge ideology at circuit courts is that, for the vast majority of cases, circuit courts are the final arbiters because the Supreme Court is not required to hear an appeal. For robustness, I also construct a sample using judge ideology at federal district courts. The results are basically unchanged and are provided in section 6.3.

[9]The website of federal judge biographical database: https://www.fjc.gov/history/judges

[10]FJC classifies termination reason into 8 categories, namely Abolition of Court, Appointment to Another Judicial Position, Death, Impeachment& Conviction, Reassignment, Recess Appointment-Not Confirmed, Resignation and Retirement. As the U.S. Constitution gives federal judges life tenure, most terminations come with judge death. In my sample of judge service from 2000 to 2021, there are 783 cases of judge termination and 519 (66.3%) come from judge death. This unique institutional feature strengthens exogeneity of judge turnover on which my main independent variable is based, and thus guarantees exogenous variations of the variable.

[11]It is extremely rare that one judge was appointed twice or more by presidents from different parties.

bent judges in the circuit, respectively. The binomial coefficient, $\binom{n}{k}$, is defined as:

$$\binom{n}{k} = \frac{n!}{k!(n-k)!}$$

Intuitively, a greater value of *Liberal_prob* implies a more liberal court. In robustness checks, I use an alternative measure, *Liberal_ratio*, defined as the number of democratic appointee divided by the total number of judges. [12].

2.2 Corporate ES Misconduct

To measure corporate ES misconducts, I exploit a novel and comprehensive database named Violation Tracker Database, created by the non-profit organization Good Jobs First [13]. In the updated version of 2022, the database covers facility-level violations against federal and state laws enforced by over 300 agencies since the year 2000 and has been widely used to measure corporate misconduct in recent literature (Soltes (2019); Heese, Pérez-Cavazos, and Peter (2022); Zaman, Atawnah, Baghdadi, and Liu (2021); Heese and Pérez-Cavazos (2020); Raghunandan and Rajgopal (2021)). It tracks violations with penalty amount over $5,000 and provides detailed information on company name, company location, agency name, offense type, penalty date and penalty amount.

As I specifically focus on misconducts towards stakeholders, namely ES violations, I follow prior works (Raghunandan and Rajgopal (2022); Raghunandan and Rajgopal (2021)) to filter out non-ES violations using offense classifications provided by Violation Tracker [14]. As violations are recorded at facility level, I aggregate the total number and penalty amount of violations onto company-year level, using company-facility linking table provided by the database and manual checks. Finally, I construct three measures of corporate ES misconduct

[12]To ensure that my calculation of *Liberal_prob* is correct, I compare my sample with the dataset used in Huang, Hui, and Li (2019) and find that they are very much the same. I am highly thankful to Allen Huang for his generosity in sharing the data with me.

[13]I am highly grateful to Philip Mattera and his colleagues for maintaining the database and sharing it with me.

[14]Violation Tracker classifies violations into nine categories based on offense type, namely competition, consumer protection, employment, environment, financial, government contracting, healthcare, safety, and miscellaneous. I include environment, employment, consumer protection, competition and workplace safety from safety violations as ES violations.

at year level following related studies: an extensive margin, ES_dummy, indicating whether a firm commits a ES violation and two intensive margins, ES_number and ES_amount, indicating the number of ES violations and the total amount of penalty on ES violations that a firm commits.

2.3 Control Variables

I further supplement the main dataset with accounting and stock price variables from Compustat/CRSP Merged Database. In terms of the firm-level control variables, I follow prior studies on corporate misconduct (Johnson, Ryan, and Tian (2009); Zaman, Atawnah, Baghdadi, and Liu (2021); Zaman, Atawnah, Nadeem, Bahadar, and Shakri (2022)) and include following firm characteristics: size, return on asset (ROA), Tobin's Q, market-to-book ratio (MTB), capital expenditure (measured as capital expenditures divided by total assets), leverage, tangibility, firm age, retained earnings, cash holdings and stock volatility. Besides, as both corporate misconduct and court composition may be associated with local political leaning and economic growth (Huang, Hui, and Li (2019)), I further control for time-varying state-level GDP per capita, GDP growth rate and the fraction of voters who support democratic party in presidential elections. Appendix Table 1 shows the definitions and sources of variables in detail.

2.4 Summary Statistics

Table 1 reports summary statistics of all variables used in the main regressions. All continuous variables are winsorized at the 1st and 99th percentiles to adjust for outliers. As can be seen from the table, ES misconduct occurs in about 24% of all firm-year pairs. The average number of ES misconduct equals 0.35 in a given year and the average penalty amount is abour $40,000 [15].

[15]For firm-year observations that have ES misconduct, the average penalty amount is slightly greater than $300,000.

Figure 2 shows the trend of *Liberal_prob* from 2000 to 2021. There are large differences in terms of judge ideology across circuit courts. The Eighth Circuit, for example, has a 20-year average of *Liberal_prob* of 0.12 whereas the same number for the Ninth Circuit equals 0.63. As expected, *Liberal_prob* generally falls when republican presidents are in the white house (2000-2008; 2016-2020) and rises vice versa. In Table 1, for all firm-year pairs, the average of *Liberal_prob* and *Liberal_ratio* equal 0.4 and 0.43, respectively.

[Insert Table 1 Here]

3 Main Results

In this section, I report empirical results of the main question. In section 4.1, I use OLS model to investigate the effect of ES litigation risk, proxied by judge ideology at circuit courts, on corporate misconduct on both extensive and intensive margins. After establishing the main findings, I dive deep into heterogeneous effects on environmental and social misconduct respectively in a subsample regression. In section 4.3, I address the potential endogeneity concern in the baseline results utilizing forced turnover of judges due to death.

3.1 Baseline Results

In the baseline regression, I estimate the effect of judge ideology on corporate misconduct using the following OLS model:

$$ES\_Misconduct_{i,t+1} = \alpha + \beta Liberal\_prob_{i,s,t} + \gamma X_{i,t} + \delta Y_{s,t} + Fixed\,Effects + \epsilon_{i,t}$$

where $ES\_Misconduct_{i,t+1}$ measures corporate misconduct within one year after firm i's fiscal year-end. As mentioned earlier, I adopt three different measures (one extensive

margin and two intensive margins) for robustness consideration. $Liberal\_prob_{i,s,t}$ captures judge ideology in the circuit where firm i is headquartered in year t [16]. $X_{i,t}$ stands for firm-level control variables, including Size, ROA, Q, MTB, Capex, Leverage, Tangibility, Firm age, Retain, Cash and Stock Volatility. $Y_{s,t}$ denotes state-level control variables, namely Log(GDP), GDP Growth and Demo Support. In addition to control variables, I include a set of fixed effects to control for omitted or unobservale shocks at at different granularity levels. Following prior studies, all standard errors are clustered at firm level.

Table 2 presents the baseline results for the extensive margin of corporate misconduct. I sequentially add control variables and fixed effects to verify the results survive across specifications. Following existing literature in corporate misconduct (Haß, Müller, and Vergauwe (2015); Zaman, Atawnah, Baghdadi, and Liu (2021)), all models include year and industry fixed effects [17] to account for time trends and time-invariant industry characteristics. The coefficients of my main independent variable, $Liberal\_prob_{i,s,t}$, are largely stable and also significantly negative across specifications. In column (5), when controlling for state fixed effect [18] and industry-by-year fixed effect, the coefficient estimator equals -0.069 and is significant under the level of 5%. Importantly, the magnitude is also economically significant: a one standard deviation increase in $Liberal\_prob_{i,s,t}$ will lead to a 1.38% decrease in ES_dummy, equivalent to 5.8% of the mean.

[Insert Table 2 Here]

Table 3 further shows the baseline results for intensive margins. In Panel A, where the dependent variable measures the number of misconducts, the coefficient of $Liberal\_prob_{i,s,t}$ are all significantly negative. In terms of the economic magnitude in the most stringent

[16] As I match monthly judge ideology with firms' fiscal year-end date in Compustat-CRSP Merged Database, $Liberal\_prob_{i,s,t}$ indicates judge ideology in the firm's fiscal month end in year t. The results are basically unchanged when I use a year-average measure of judge ideology, as judge turnover within a year is relatively infrequent.

[17] I group firms into 48 industries based on Fama-French 48 Industry Portfolios. See https://mba.tuck.dartmouth.edu/pages/faculty/ken.french/Data_Library/det_48_ind_port.html for more details.

[18] As jurisdictions of circuit courts include multiple states (See Figure 1 for details), adding state fixed effect mechanically absorbs all time-invariant circuit characteristics that might affect the judge ideology in the circuit.

specification (column (5)), a one standard deviation increase in $Liberal\_prob_{i,s,t}$ will lead to a 1.9% decrease in $Log(1 + ES\_number)$, equivalent to 11.8% of the mean. In Panel B, when I replace the dependent variable with $Log(1 + ES\_amount)$, the coefficients are still negative and highly significant. As for the economic significance, a one standard deviation increase in $Liberal\_prob_{i,s,t}$ will result in a 15.7% decrease in $Log(1+ES\_amount)$, namely a 15.7% decline in ES penalty amount.

Taken together, these results unanimously show that firms react to a more liberal litigation environment by decreasing ES misconduct. As ES litigation risk gets intensified when circuit courts consist of more liberal judges, these findings support my hypothesis that firms reduce ES misconduct when faced with heightened litigation risk.

[Insert Table 3 Here]

3.2 Sub-sample Analysis on "E" and "S"

In this section, I disaggregate ES violations into "E" and "S" respectively to explore the respective effect on each type [19]. I then re-run the regressions in the baseline model and the results are reported in Table 4. All specifications include the same firm- and state-level control variables (not shown for the sake of brevity), as well as industry-by-year fixed effect to further control for time-varying unobservable industry shocks. I find indeed that both "E" and "S" misconducts are reduced when the court becomes more liberal-leaning. The coefficients are all negative, significant and largely the same among two groups. This finding is consistent with the argument that liberal judges are more likely to support plaintiffs in both environment- and stakeholder-related suits, compared to conservative counterparts.

[Insert Table 4 Here]

[19] Among ES violations, I group environment violations into category "E", and consumer protection, competition and workplace safety violations into "S".

3.3 Identification

As mentioned earlier, measuring ex-ante litigation risk and cost using judge ideology circumvents the notorious difficulty in causal inference: as my measure of court ideology is simply based on judge individual party affiliation and court composition, it is unlikely that industry or firm level shocks will contaminate the exogeneity of the measure. Furthermore, as federal judges are nominated by presidents and enjoy *life* tenure, turnovers are rare and less likely to correlate with factors that affect managerial decisions. However, one can still argue that some unobservable variables, say firm ideology, may correlate with both circuit's judge ideology and ES misconduct behaviors. Another alarming issue concerns measurement of corporate misconduct, as it is an *equilibrium* outcome determined by both firm misbehavior and agency enforcement. If agency enforcement actions are associated with circuit's judge ideology, my main results might be biased because of omitted variables.

Given these concerns, I address potential endogeneity using an instrumental invariable (IV) by exploiting a unique feature of federal judge turnover. Specifically, the IV is a dummy variable at circuit-year level which equals one if at least one conservative judges died, and zero otherwise. To establish the validity of an IV, one needs to verify both relevance and exclusion conditions. The relevance condition is satisfied mechanically, as death of conservative judges will lead to a higher ratio of liberal judges [20]. Meanwhile, exclusion condition is likely to met as deaths are arguably exogenous shocks. Compared to other termination reasons such as retirement and resignation, termination because of death is least likely to be anticipated and related with socio-economic factors (which could potentially affect agency enforcement).

Table 5 displays the results of the IV regression. For all three different measures of dependent variables and with stringent fixed effects, the coefficients are uniformly negative and significant under at least 5% level. These results further corroborate my previous findings and shows a clear and negative casual effect of court's liberal ideology and corporate ES misconduct.

[20] The first stage result(untabulated) shows that the t-statistics exceeds 30. This is expected given the mechanical feature of the IV.

[Insert Table 5 Here]

4 Validation

Intuitively, if liberal judges are harsher to defendants in E&S lawsuits than conservative judges because of their ideological belief, firms will anticipate a higher litigation cost in the courtroom and reduce E&S misconduct accordingly when the proportion of liberal judges in the local circuit court increases. After displaying the main results and establishing causality, in this section, I collect data on ES lawsuits to verify that judge ideology is a valid proxy for ES litigation risk. Specifically, I propose that judge ideology is associated with two sources of litigation risk, namely higher number of ES lawsuits filed and higher likelihood of loss for defendants conditional on a lawsuit.

To empirically test the association between judge ideology and the number of ES lawsuits filed, I exploit a comprehensive legal database, Integrated Data Base (IDB) of the Federal Judicial Center. The IDB contains data on civil case and criminal defendant filings and terminations in the federal district courts, along with bankruptcy court and appellate court case information.[21] I retrieve IDB data on civil cases filed in the US federal districts from 2000 to 2021, and manually filter a sample to include only environmental and social lawsuits [22]. In the end, I am able to track approximately 1.5 million ES cases in the US federal courts throughout the period.

I further aggregate the number of ES lawsuits filed on a circuit court-year basis, and test the association with court ideology. Panel A of Table 6 shows the results. Column (2), where the dependent variable is the logarithm of ES lawsuits, shows that one standard deviation increase in *Liberal_prob* leads to roughly 16% increase in the number of ES lawsuits, after

[21] The FJC receives regular updates of the case-related data that are routinely reported by the courts to the Administrative Office of the U.S. Courts (AOUSC). The FJC then post-processes the data, consistent with the policies of the Judicial Conference of the United States governing access to these data, into a unified longitudinal database, the IDB. For more information on IDB database, see https://www.fjc.gov/research/idb.

[22] The IDB database provides a case code describing the nature of the suit, which I rely on to identify ES lawsuits.

accounting for court and year-month fixed effects. The coefficients are also significant at 5% level. Column (3) & (4) apply poisson regressions and the coefficients are still positive and significant at 5% level.

To provide direct evidence that liberal judges are more likely to favor plaintiffs in E&S lawsuits, I investigate *ex-post* outcomes of E&S lawsuits to see if they are indeed affected by judge ideology. In a recent article, Liu (2020) studies a similar question whether judge political affiliation affects environmental lawsuit outcomes in federal district courts. She discovers that lawsuits with Republican-appointed judges are approximately 12% less likely to succeed in reaching a settlement compared with those adjudicated by Democratic-appointed judges. Following Liu (2020), I also consider 'reaching a settlement' as the proxy for plaintiff's success. However, a major difference between my test and Liu (2020) is that I incorporate "S"-related lawsuits, as liberals and conservatives are also highly divided in issues such as employee welfare and consumer protections.

I retrieve data on corporate lawsuits from Audit Analytics Database [23]. Audit Analytics collects lawsuit information of US publicly-traded firms since 2000 and the data comes from multiple sources including corporate disclosures, media coverage, as well as legal disclosures or opinions filed with the SEC. It classifies lawsuit cases into over 100 categories by case nature, and provides information about plaintiff and defendant, case filing date, court name, judge name, judge biographic information (gender and race), case outcome and settlement cost if available. I select ES lawsuits according to the class description [24] and merge judge ideology using judge name and court name. To study case outcome, I remove cases without recorded outcomes [25] and consider settlements as proxy for judge's support towards plaintiffs.

[23]The advantage of using Audit Analytics database over IDB database is that Audit Analytics database provides information on the judge who presided over and made rulings in a particular legal case, so that I can match case outcome with judge ideology at case level.

[24]Audit Analytics classifies cases using dummy variables "is_category_type_#" where # is a category number. I manually read category definitions and select following types into ES lawsuits: environmental law (21), labor and employment law (18, 49, 30, 80, 69, 103, 63), consumer law (77, 70, 78, 36, 60, 76, 102) and cybersecurity law (107).

[25]Recording case outcome is difficult as most lawsuits terminate in ways that make it impossible to ascertain the winner of the case Liu (2020).

In the end, the sample consists of 720 lawsuit cases whose outcomes I am able to track.

One unique feature of lawsuits in district courts is that each case is handled by a randomly-selected judge from the cohort. The random assignment hopefully alleviates concerns about the potential endogeneity from judge-case matching. Panel B of Table 6 presents the empirical results between judge ideology and case outcome. As we can see, when accounting for judge personal traits and court, year and birth state fixed effects, judges appointed by democratic presidents are associated with greater likelihood of settlement. The coefficient is significant under 5% level and the magnitude is also economically significant and very close to what Liu (2020) finds: compared to republican judges, the likelihood of a settlement increases by 12.9% when handled by democratic judges. This two tests combined provide direct and convincing support to the validity of using judge ideology to proxy for ES litigation risk.

[Insert Table 6 Here]

5 Discussions

In this section, I discuss a few channels and implications to further explore the mechanism of heightened litigation risk. Specifically, in a cross-sectional analysis, I find that the main effects are stronger in firms with higher institutional ownership. This finding is consistent with the hypothesis that pressure from institutional investors force managers to behave more ES friendly. I find direct evidence for this hypothesis in proxy voting as mutual funds are more likely to support ES shareholder proposals when judge ideology becomes more liberal. In addition, I find some evidence from manager decisions which is consistent with the argument of heightened litigation risk: firms significantly increase cash holdings and decrease M&A activities after local courts become more liberal-leaning. Finally, I find that an increase in stakeholder welfare is not a free lunch, as there is evidence that shareholders pay for it. I find a significantly negative stock price reaction towards confirmation of liberal

judges and a decrease in dividends when more liberal judges are on board.

5.1 Institutional Investors

As ESG investing becomes more and more popular, there is plenty of anecdotal evidence that institutional investors push managers to pursue ESG goals. Recent literature finds that institutional investors may exert pressure on corporate ESG performance through engagement, activism and proxy voting (Hoepner, Oikonomou, Sautner, Starks, and Zhou (2018); DesJardine and Durand (2020); Dikolli, Frank, Guo, and Lynch (2022)). If liberal courts raises corporate ES litigation risk, one potential channel for a decrease in ES misconduct could be pressure from institutional investors. Thus, I hypothesize that the deterrent effect of litigation risk will be stronger for firms with higher institutional ownership.

To test it empirically, I collect institutional holding data from Refinitiv's Institutional (13f) Holdings Database. According to Refinitiv, the primary source for the institutional holdings data is the 13f form that investment companies and professional money managers are required to file with the SEC on a quarterly basis. I calculate firms' institutional ownership immediately before each fiscal year-end and merge with my main sample using tikcer symbols. I create an interaction term, $Instiratio * Liberal\_prob$, to capture the cross-sectional effect of institutional ownership on my main results.

Table 7 presents the cross-sectional analysis results. For all the three alternative dependent variables about ES misconduct, the coefficients on $Instiratio * Liberal\_prob$ are uniformly significantly negative, implying that a higher institutional ownership intensifies the negative effect of liberal courts on corporate ES misconduct. This finding is consistent with the argument that institutional investors might engage in corporate ES decisions when potential litigation risk becomes more intensified.

[Insert Table 7 Here]

Inspired by the suggestive evidence of institutional investors engagement in firm ES

management shown above, I explore a direct tunnel, namely proxy voting, through which institutional investors can express their attitudes towards ES topics. Specifically, I focus on shareholder proposals pertaining to ES topics and test whether mutual funds will be more likely to support these proposals when perceived ES risk increases.

To analyze institutional investors' proxy voting, I retrieve data from the Institutional Shareholder Services (ISS) Voting Analytics database from 2003 to 2015. I follow He, Kahraman, and Lowry (2021) to select ES shareholder proposals. I then merge Compustat-CRSP Database with proxy voting data via common ticker symbols. In the end, I obtain a sample of 677,210 voting records from 12,656 funds.

In Table 8, I add firm and state level controls and sequentially include institution (fund family), institution-by-year and fund fixed effects. The coefficients of interest, *Liberal_prob*, are significantly positive across different specifications. This implies that when circuit courts consist of more liberal judges, mutual funds are more likely to support ES shareholder proposals. This finding sheds light on the potential channel through which institutional investors could incentivize managers to respond to heightened ES litigation risk.

[Insert Table 8 Here]

5.2 Corporate Response

In this section, I investigate how firms respond to increased ex ante litigation risk proxied by court judge ideology. Prior studies discover that an increase in shareholder-initiated litigation risk encourages firms to hold more cash (Arena and Julio (2015); Nguyen, Phan, and Sun (2018); Malm and Kanuri (2017)) and decrease investment (Arena and Julio (2015)). Therefore, if judge ideology is a valid proxy for ex ante litigation risk, similar effects on cash holding and capital investment might be anticipated.

Panel A of Table 9 shows the results of cash holdings, where I regress corporate cash holdings (cash-asset ratio) in the following year on circuit judge ideology. I sequentially

add control variables and fixed effects, and find that the coefficients of *Liberal_prob* are significantly positive across different specifications. In column (4), a one standard deviation increase in *Liberal_prob* will lead to a 0.9% increase in cash-asset ratio, which is about 5.2% of the mean. This finding is consistent with the hypothesis that firms hold more cash in anticipation of higher litigation risk (Arena and Julio (2015)).

As to the effect on capital investment, Schwartz (2020) finds that higher judicial risk, as reflected by judge ideology, decreases corporate investment (Capex). To corroborate and extend this finding, I examine a specific and important type of corporate investment, i.e. merger & acquisitions (M&A). I collect data on M&As of US public companies from Refinitiv's SDC M&A Database [26] and create two variables to measure M&A activity: whether a firm has any M&A transactions in a given year (MA_dummy) and the number of M&A transactions a firm has (MA_number). To merge SDC database with Compustat/CRSP sample, I utilize the link table provided by Michael Ewens (Phillips and Zhdanov (2013); Ewens, Peters, and Wang (2018)). In the end, for 59,263 firm-year observations, 27.5% has at least one M&A. For those firm-years with at least one M&A, the average number of M&A equals 1.76.

Panel B of Table 9 shows the results on M&A. Consistent with the argument that firms cut capital expenditures in anticipation of higher litigation risk (Arena and Julio (2015)), I find a significantly negative effect of judge ideology on corporate M&A activity. Specifically, a one standard deviation increase in *Liberal_prob* will lead to a 1.2% decrease in M&A probability, which is about 4.4% of the mean.

Taken together, I find that firms respond to increased litigation risk by holding more cash on hand and cutting large-scale capital expenditures such as M&As. These findings provide supporting evidence that heightened litigation risk is a major consequence of judge

[26] Following prior works on M&A, for a transaction to be included in my sample, it must satisfy following requirements: 1. Acquirers must be US public companies. 2. The status of transaction must be "completed". 3. Transaction form must be one of the followings: "Acquisition of major interest", "Merger", "Acquisition of assets". 4. Acquirer own less than 50% of target's shares before the transaction and acquire more than 50% of target's shares in the transaction.

liberal ideology.

[Insert Table 9 Here]

5.3 Who Pays When Stakeholders Gain?

So far, my results confirm that firms improve their ES performance and increase stakeholders' welfare by refraining from ES misconduct when circuit courts become more liberal. However, there ain't no such thing as a free lunch. A natural follow-up question is who pays when stakeholders gain. Corporate finance literature documents widespread evidence of conflict of interests between shareholders and other stakeholders (Barnea and Rubin (2010); Vinten (2001); Raghunandan and Rajgopal (2021)). In this section, I explore whether shareholders are negatively affected when stakeholders become better off.

Following Huang, Hui, and Li (2019), I first focus on stock price reactions towards the official appointments of liberal judges. According to the US law, a federal judge nominee must be officially confirmed by the Senate before he/she comes to power in the courtroom. Therefore, I study stock price reactions of firms around confirmation dates of circuit judges. To capture different reactions due to judge ideology, I calculate stock price reactions for confirmations of democratic/republican nominees, respectively. To ensure robustness, I apply four different asset pricing models [27] to estimate cumulative abnormal returns (CAR) within [-1,1] window, and test the difference of CAR between the confirmation of liberal/conservative federal judges. As shown in panel A of Table 10, compared to appointment of conservative judges at circuit courts, firms experience significantly negative abnormal returns (from 0.2% to 0.4%) when the Senate confirms the nominations of liberal judges [28]. Consistent with heightened litigation risk posed by liberal judges, this finding reveals that investors react more negatively towards appointment of liberal judges, echoing the findings in Huang, Hui,

[27] I use Market-adjusted Model, Market Model, Fama-French Three Factor Model and Fama-French-Carhart Four Factor Model to calculate abnormal returns.

[28] CARs are about 0.3% to 0.5% for confirmation of liberal judges but 0 to 0.1% for confirmation of conservative judges.

and Li (2019).

Besides, I also investigate whether firms change their payout policies when they have to care more about stakeholders' interests. Intuitively, if firms are capital-constrained, they are less likely to pay to shareholders when violating stakeholders' interests becomes more costly. Recent studies unanimously find that firms reduce payouts to shareholders when faced with intensified litigation risk (Arena and Julio (2021); Do (2021); Malm and Kanuri (2020)). Following this strand of literature, I examine whether judge ideology affects corporate payout.

Panel B of Table 10 presents the results. To capture the likelihood of payout, I create an indicator variable, *Payout*, which equals 1 if a firm pays dividends or repurchase stock in the subsequent year. Column (1) & (2) shows negative effect of liberal judges on payout. Specifically, one standard deviation increase in *Liberal_prob* will result in a decrease of 1.2% in payout probability. I further analyze which type of payout reacts more. In column (3) to (6), I regress a dummy for paying dividends and a dummy for repurchasing stocks on *Liberal_prob*, respectively. The results show that decrease in payout activity mainly results from decrease in dividend payment: one standard deviation increase in *Liberal_prob* will lead to a decrease of 1.9% in the probability of paying dividends.

To summarize, I find supporting evidence that shareholders pay the price for better ES performance. Shareholders suffer from negative abnormal returns around confirmations of liberal judges and are less likely to receive payouts in the following year.

[Insert Table 10 Here]

6 Robustness Tests

6.1 Firm Fixed Effect

My previous results show that firms reduce ES misconduct due to anticipation of harsher litigation outcomes when the local circuit court becomes more liberal-leaning. In the baseline

regressions, I sequentially add industry, year, industry-by-year and state fixed effects to account for unobservable omitted factors. However, one can still argue that some firm-level confounding issues may contaminate my results. For example, if corporate ideology is somehow aligned with court ideology and firms with liberal ideology will commit fewer ES misconducts, then my results might be biased because of the omitted variable concern. To further address such concerns, I include a stringent firm fixed effect, along with year fixed effect, to control for all time-invariant firm characteristics.

Panel A of Table 11 shows the results for the fixed effect model. Although for the extensive margin (column (1)) the coefficient is marginally insignificant, coefficients in both column (2) & (3) are still significantly negative with comparable magnitudes to the baseline results [29]. Therefore, my main results are largely robust even after controlling for firm fixed effect.

6.2 Alternative Measure of Court Ideology

In previous analyses, I follow Huang, Hui, and Li (2019) and measure judge ideology using the probability of a liberal-dominated panel (consisting of three judges). Justification for this measure is that three judges will be randomly assigned to handle an appeal in circuit courts. However, as this paper focuses on firm's reaction in ES performance towards judge ideology, it is likely that managers are not sophisticated enough to correctly interpret circuit judge ideology in the way defined above. Therefore, I use a straightforward measure, $Liberal\_ratio$, to proxy for judge ideology alternatively, as firm managers may naively perceive ex-ante litigation risk by simply counting on the ratio of liberal judges.

Panel B of Table 11 displays results when using $Liberal\_ratio$ as the main independent variable in the baseline regressions. In column (1), (3) and (5), I regress each of my three dependent variables on $Liberal\_ratio$ with standard fixed effects as in the baseline. In

[29] A plausible explanation for reduced significance could be that as my outcome variables vary at firm-year level, firm fixed effect is strong enough to absorb much variation given that the independent variable, $Liberal\_prob$, varies at circuit-year level

column (2), (4) and (6), I add firm fixed effect to strengthen the specifications. The results show that the coefficients on *Liberal_ratio* are all significantly negative across specifications and the magnitudes are also comparable to those in the baseline models. Therefore, this test adds validity and robustness towards the main findings in this paper.

6.3 Analysis on Federal District Courts

I carry out all previous tests at circuit courts mostly because rulings of district courts can be reversed by circuit courts, but the case will be barely likely for circuit courts as the Supreme Court rarely hears review request (Barnes Bowie and Songer (2009); Huang, Hui, and Li (2019)). Nevertheless, as suits are first handled by one randomly-assigned judge at district courts, it is plausible to expect that if my hypothesis is true, the same story also holds at district courts. For robustness, I repeat the analysis but focus on district courts in this section.

To start with, I construct a sample containing district judges' appointment information from FJC Judge Biographical Directory. I then calculate the proportion of democratic judges in a certain district court to proxy for litigation risk [30]. However, as there are multiple district courts in some states (See Figure 1 for details), I match firms with district courts using county information [31]. I then re-run the baseline regressions using judge ideology at district courts.

The results are shown in Panel C of Table 11. For all the three measures of ES misconduct, the coefficients on *Liberal_ratio* are significantly negative. This supports the argument that judge ideology at district courts also affect ex-ante litigation risk and incentivizes firms to reduce ES misconduct. Moreover, I find the magnitudes in this test are highly comparable to those in the baseline. For example, a one standard deviation increase in *Liberal_ratio* at

[30] Since only one judge will be randomly assigned to handle a lawsuit, the proportion of democratic judges can well indicate the probability that a case will be heard by a liberal judge.

[31] I obtain firm county information from its zip-code provided in the Compustat-CRSP Merged Database. For county-level jurisdiction boundaries of fedral district courts, I manually collect the information from the U.S. Code Title 28: https://www.law.cornell.edu/uscode/text/28/part-I/chapter-5.

district courts will lead to a 1.3% decrease in ES_dummy, equivalent to 5.4% of the mean. These findings further lend support to my main argument about the deterrent effect from heightened litigation risk, proxied by judge ideology.

[Insert Table 11 Here]

7 Conclusion

When sustainable investing goes mainstream in the United States and the globe, understanding what deters firms from committing ES misconduct becomes more important now than ever. Speaking to what curbs corporate ES misconduct, this paper identifies and verifies an important deterrent factor, i.e. *ex ante* ES litigation risk. Motivated by findings from legal scholars that judge political ideology affects lawsuit outcomes, I apply judge ideology in circuit courts as a proxy for ES litigation risk.

I find robust evidence that increase in litigation risk stifles ES misconduct. To address endogeneity concerns, I exploit exogenous shocks to litigation risk caused by judge death and find corroborating causal evidence. Importantly, an empirical test on ES lawsuit outcomes confirms the validity of judge ideology as a proxy for ES litigation risk. I also conduct a battery of robustness tests to further validate the main results and the proposed mechanism.

In the investigation of how litigation risk penetrates into managerial ES decisions, I find that institutional investors seem to play an important role, as the main effect is stronger for firms with higher institutional ownership. Moreover, institutional investors are more likely to support ES shareholder proposals, implying that firms may be subject to higher ES pressure from institutional investors. Meanwhile, firms respond to increased litigation risk by holding more cash and cutting capital investments. In the analysis on welfare, I find that stakeholders are better off but shareholders pay the price. Event studies around judge confirmation dates reveal that investors react much more negatively towards appointments of liberal judges. Besides, shareholders are less likely to receive dividend payments following

heightened litigation risk.

This paper provides important implications to law enforcement agencies and the judicial system in the US. It also alerts ESG investors and asset managers of the potentially significant influence from the courtroom. As literature in corporate ESG performance and stakeholder interests are gaining increasing attention, it is anticipated that researchers will produce more fruitful findings in this area in the future.

References

Arena, M., and S. Ferris (2017): "A survey of litigation in corporate finance," *Managerial Finance*.

Arena, M., and B. Julio (2015): "The effects of securities class action litigation on corporate liquidity and investment policy," *Journal of Financial and Quantitative Analysis*, 50(1-2), 251–275.

Arena, M. P., and B. Julio (2021): "Litigation risk management through corporate payout policy," *Journal of Financial and Quantitative Analysis, forthcoming*.

Barnea, A., and A. Rubin (2010): "Corporate social responsibility as a conflict between shareholders," *Journal of business ethics*, 97(1), 71–86.

Barnes Bowie, J., and D. R. Songer (2009): "Assessing the applicability of strategic theory to explain decision making on the courts of appealsschwartz2020judicial," *Political Research Quarterly*, 62(2), 393–407.

Chemerinsky, E. (2002): "Ideology and the Selection of Federal Judges," *UC Davis L. Rev.*, 36, 619.

Chung, C. Y., I. Kim, M. K. Rabarison, T. Y. To, and E. Wu (2020): "Shareholder litigation rights and corporate acquisitions," *Journal of Corporate Finance*, 62, 101599.

Crane, A. D., and A. Koch (2018): "Shareholder litigation and ownership structure: Evidence from a natural experiment," *Management Science*, 64(1), 5–23.

DesJardine, M. R., and R. Durand (2020): "Disentangling the effects of hedge fund activism on firm financial and social performance," *Strategic Management Journal*, 41(6), 1054–1082.

Dikolli, S. S., M. M. Frank, Z. M. Guo, and L. J. Lynch (2022): "Walk the talk: ESG mutual fund voting on shareholder proposals," *Review of Accounting Studies*, 27(3), 864–896.

Do, T. K. (2021): "Shareholder litigation rights and corporate payout policy: Evidence from universal demand laws," *Research in International Business and Finance*, 58, 101440.

Donelson, D. C., L. Kettell, J. McInnis, and S. Toynbee (2022): "The need to validate exogenous shocks: Shareholder derivative litigation, universal demand laws and firm behavior," *Journal of Accounting and Economics*, 73(1), 101427.

Ewens, M., R. Peters, and S. Wang (2018): "Acquisition prices and the measurement of intangible capital," *Working Paper*.

Foroughi, P., A. J. Marcus, V. Nguyen, and H. Tehranian (2022): "Peer effects in corporate governance practices: Evidence from universal demand laws," *The Review of Financial Studies*, 35(1), 132–167.

Freund, S., N. H. Nguyen, and H. V. Phan (2021): "Shareholder litigation and corporate social responsibility," *Journal of Financial and Quantitative Analysis*, pp. 1–64.

Harit, T., S. Parupati, J. Pinto, and G. Sadka (2022): "Judge Financial Holdings and Case Outcomes: Evidence from Judge Financial Disclosures," *Available at SSRN 4265987*.

Hass, L. H., M. A. Müller, and S. Vergauwe (2015): "Tournament incentives and corporate fraud," *Journal of Corporate Finance*, 34, 251–267.

Hassan, M. K., R. Houston, and M. S. Karim (2021): "Courting innovation: The effects of litigation risk on corporate innovation," *Journal of Corporate Finance*, 71, 102098.

He, Y., B. Kahraman, and M. Lowry (2021): "ES risks and shareholder voice," *European Corporate Governance Institute–Finance Working Paper*, (786).

Heese, J., and G. Pérez-Cavazos (2020): "When the boss comes to town: The effects of headquarters' visits on facility-level misconduct," *The Accounting Review*, 95(6), 235–261.

Heese, J., G. Pérez-Cavazos, and C. D. Peter (2022): "When the local newspaper leaves town: The effects of local newspaper closures on corporate misconduct," *Journal of Financial Economics*, 145(2), 445–463.

Hoepner, A. G., I. Oikonomou, Z. Sautner, L. T. Starks, and X. Zhou (2018): "ESG shareholder engagement and downside risk," .

Huang, A., K. W. Hui, and R. Z. Li (2019): "Federal judge ideology: A new measure of ex ante litigation risk," *Journal of Accounting Research*, 57(2), 431–489.

Huang, S., S. Roychowdhury, E. Sletten, and Y. Xu (2021): "Just Friends? Managersâ Connections to Judges," *Managersâ Connections to Judges (August 7, 2021)*.

Hutton, I., D. Jiang, and A. Kumar (2015): "Political values, culture, and corporate litigation," *Management Science*, 61(12), 2905–2925.

Iverson, B., J. Madsen, W. Wang, and Q. Xu (2020): "Financial costs of judicial inexperience: Evidence from corporate bankruptcies," *Journal of Financial and Quantitative Analysis*, pp. 1–53.

Johnson, S. A., H. E. Ryan, and Y. S. Tian (2009): "Managerial incentives and corporate fraud: The sources of incentives matter," *Review of Finance*, 13(1), 115–145.

Karpoff, J. M., A. Koester, D. S. Lee, and G. S. Martin (2017): "Proxies and databases in financial misconduct research," *The Accounting Review*, 92(6), 129–163.

Karpoff, J. M., and X. Lou (2010): "Short sellers and financial misconduct," *The Journal of Finance*, 65(5), 1879–1913.

Kim, I., and D. J. Skinner (2012): "Measuring securities litigation risk," *Journal of Accounting and Economics*, 53(1-2), 290–310.

Lin, C., S. Liu, and G. Manso (2021): "Shareholder litigation and corporate innovation," *Management Science*, 67(6), 3346–3367.

Liu, C. (2020): "Judge political affiliation and impacts of corporate environmental litigation," *Journal of Corporate Finance*, 64, 101670.

Lowry, M., and S. Shu (2002): "Litigation risk and IPO underpricing," *Journal of Financial Economics*, 65(3), 309–335.

Malm, J., and S. Kanuri (2017): "Litigation risk and cash holdings," *Journal of Economics and Finance*, 41(4), 679–700.

——— (2020): "Litigation risk and payout policy," *Managerial Finance*.

Neukirchen, D., P. N. Posch, and A. Betzer (2022): "Board Age Diversity and Corporate Misconduct," *Available at SSRN 4099382*.

Nguyen, H. T., H. V. Phan, and L. S. Sun (2018): "Shareholder litigation rights and corporate cash holdings: Evidence from universal demand laws," *Journal of Corporate Finance*, 52, 192–213.

Nguyen, N. H., H. V. Phan, and E. Lee (2020): "Shareholder litigation rights and capital structure decisions," *Journal of Corporate Finance*, 62, 101601.

Parsons, C. A., J. Sulaeman, and S. Titman (2018): "The geography of financial misconduct," *The Journal of Finance*, 73(5), 2087–2137.

Phillips, G. M., and A. Zhdanov (2013): "R&D and the Incentives from Merger and Acquisition Activity," *The Review of Financial Studies*, 26(1), 34–78.

Pinello, D. R. (1999): "Linking party to judicial ideology in American courts: A meta-analysis," *The Justice System Journal*, pp. 219–254.

Raghunandan, A., and S. Rajgopal (2021): "Do socially responsible firms walk the talk?," *Available at SSRN 3609056*.

Raghunandan, A., and S. Rajgopal (2022): "Do ESG funds make stakeholder-friendly investments?," *Review of Accounting Studies*, 27(3), 822–863.

Schwartz, A. (2020): "Judicial Philosophy and Corporate Investment in the United States," *Available at SSRN 3736928*.

Segal, J. A., and A. D. Cover (1989): "Ideological values and the votes of US Supreme Court justices," *American Political Science Review*, 83(2), 557–565.

Soltes, E. (2019): "The frequency of corporate misconduct: public enforcement versus private reality," *Journal of Financial Crime*.

Staudt, N., L. Epstein, and P. Wiedenbeck (2006): "The ideological component of judging in the taxation context," *Wash. UL Rev.*, 84, 1797.

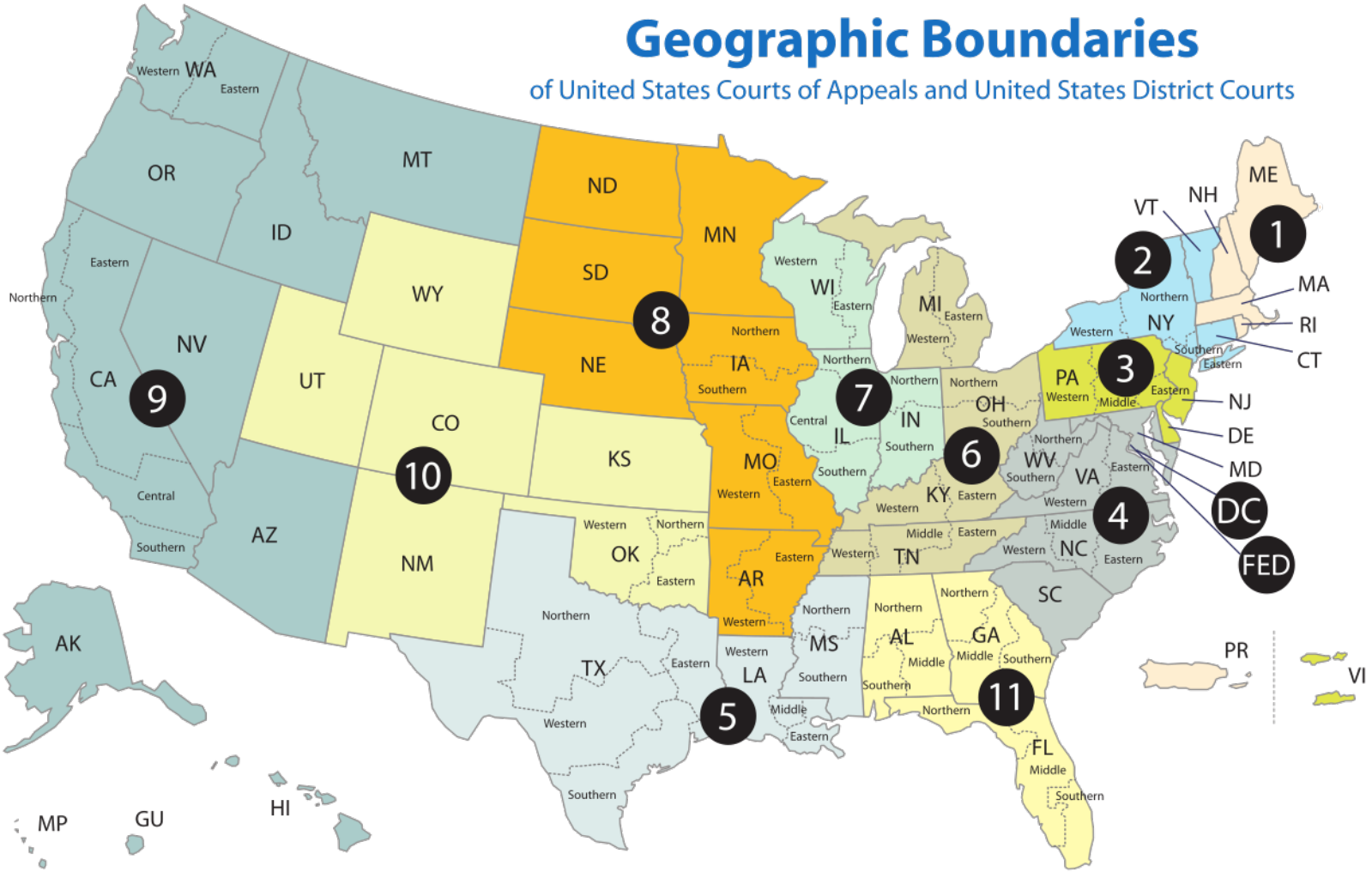
Tate, C. N. (1981): "Personal attribute models of the voting behavior of US Supreme Court justices: Liberalism in civil liberties and economics decisions, 1946–1978," *American political Science review*, 75(2), 355–367.

Vinten, G. (2001): "Shareholder versus stakeholder–is there a governance dilemma?," *Corporate Governance: An International Review*, 9(1), 36–47.

Zaman, R., N. Atawnah, G. A. Baghdadi, and J. Liu (2021): "Fiduciary duty or loyalty? Evidence from co-opted boards and corporate misconduct," *Journal of Corporate Finance*, 70, 102066.

Zaman, R., N. Atawnah, M. Nadeem, S. Bahadar, and I. H. Shakri (2022): "Do liquid assets lure managers? Evidence from corporate misconduct," *Journal of Business Finance & Accounting*.

Figure 1: US Federal District and Circuit Court Boundaries



Note: Map of the geographic boundaries of the various United States courts of appeals (numbered and colored) and United States district courts (marked by state boundaries or dotted lines). Source: https://en.wikipedia.org/wiki/United_States_courts_of_appeals

Figure 2: Ideology Trends of US Circuit Courts Since 2000

Note: This figure shows the dynamic trend of my main variable of judge ideology, *Liberal_prob*, in each of the twelve circuit courts. The number on top of each graph indicates the number of circuit court and number "0" corresponds to D.C. circuit.

Table 1: Summary Statistics

This table presents the summary statistics of main variables used in the empirical analyses.

	Obs.	Mean	STD	Min	Median	Max
Panel A: ES Misconduct						
ES_dummy	59263	0.24	0.43	0	0	1
ES_number	59263	0.35	1.18	0	0	8
ES_amount	59263	41395.9	254095.3	0	0	2250000
Log(1+ES_number)	59263	0.16	0.44	0	0	2.20
Log(1+ES_amount)	59263	1.59	3.92	0	0	14.8
Panel B: Court Partisanship						
Liberal_prob	59263	0.40	0.20	0	0.40	0.72
Liberal_ratio	59263	0.43	0.13	0.056	0.43	0.65
Panel C: Firm Characteristics						
Size	59232	6.25	2.00	2.04	6.19	11.1
ROA	59209	-0.055	0.27	-1.51	0.029	0.30
Q	59157	2.25	1.78	0.62	1.65	11.0
MTB	56443	3.93	5.41	0.33	2.33	38.9
Capex	52750	0.049	0.061	0	0.030	0.37
Leverage	58970	0.22	0.22	0	0.17	1.01
Tangible	59185	0.23	0.23	0.0010	0.15	0.90
Firmage	59263	18.5	15.6	1	14	72
Retain	59232	-0.62	2.25	-14.6	0.051	1.02
Cash	58745	0.17	0.20	0.00045	0.10	0.92
Return Volatility	52845	0.50	0.33	0.12	0.41	1.94
Panel D: State-level Controls						
Log(GDP)	59263	10.9	0.16	10.5	10.9	11.2
GDP Growth	56056	0.020	0.025	-0.051	0.021	0.078
Demo Support	59263	0.52	0.081	0.25	0.53	0.92

Table 2: Litigation Risk and Corporate ES Misconduct: Extensive Margin

	(1)	(2)	(3)	(4)	(5)
Liberal_prob	**-0.061*****	**-0.069*****	**-0.055****	**-0.091*****	**-0.069****
	(0.020)	(0.020)	(0.021)	(0.029)	(0.030)
Size		0.067***	0.069***	0.069***	0.069***
		(0.003)	(0.003)	(0.003)	(0.003)
ROA		-0.047***	-0.049***	-0.049***	-0.050***
		(0.007)	(0.008)	(0.008)	(0.008)
Q		-0.001	-0.000	-0.000	0.000
		(0.002)	(0.002)	(0.002)	(0.002)
MTB		0.001*	0.001*	0.001**	0.001**
		(0.001)	(0.001)	(0.001)	(0.001)
Capex		0.006	0.013	0.013	0.024
		(0.056)	(0.058)	(0.056)	(0.060)
Leverage		-0.074***	-0.077***	-0.079***	-0.074***
		(0.020)	(0.021)	(0.021)	(0.021)
Tangible		0.097***	0.091***	0.086***	0.081***
		(0.026)	(0.027)	(0.026)	(0.027)
Firmage		0.003***	0.003***	0.003***	0.003***
		(0.000)	(0.000)	(0.000)	(0.000)
Retain		-0.009***	-0.009***	-0.009***	-0.010***
		(0.001)	(0.001)	(0.001)	(0.001)
Cash		0.007	0.010	0.011	0.011
		(0.012)	(0.013)	(0.013)	(0.013)
Return Volatility		0.014**	0.012	0.015**	0.010
		(0.007)	(0.007)	(0.007)	(0.007)
Log(GDP)			-0.044	-0.124**	-0.099*
			(0.037)	(0.053)	(0.054)
GDP Growth			-0.457***	0.081	0.110
			(0.127)	(0.098)	(0.101)
Demo Support			-0.060	-0.293***	-0.187**
			(0.068)	(0.089)	(0.090)
Constant	0.261***	-0.329***	0.171	1.178**	0.835
	(0.009)	(0.020)	(0.380)	(0.565)	(0.578)
Industry FE	Yes	Yes	Yes	Yes	
Year FE	Yes	Yes	Yes	Yes	
State FE				Yes	Yes
Industry*Year FE					Yes
R^2	0.225	0.259	0.269	0.285	
N	59049	42194	42194	42192	

Table 3: Litigation Risk and Corporate ES Misconduct: Intensive Margin

Panel A	(1)	(2)	(3)	(4)	(5)
Liberal_prob	**-0.116*****	**-0.088*****	**-0.068****	**-0.126*****	**-0.094****
	(0.031)	(0.028)	(0.029)	(0.036)	(0.037)
Size		0.088***	0.090***	0.091***	0.091***
		(0.005)	(0.005)	(0.005)	(0.005)
ROA		-0.069***	-0.073***	-0.072***	-0.073***
		(0.010)	(0.011)	(0.011)	(0.011)
Q		-0.002	-0.001	-0.002	-0.001
		(0.002)	(0.003)	(0.003)	(0.003)
MTB		0.002**	0.002**	0.002**	0.002**
		(0.001)	(0.001)	(0.001)	(0.001)
Capex		-0.118	-0.114	-0.109	-0.115
		(0.090)	(0.093)	(0.091)	(0.097)
Leverage		-0.137***	-0.144***	-0.146***	-0.143***
		(0.029)	(0.030)	(0.031)	(0.031)
Tangible		0.156***	0.149***	0.142***	0.139***
		(0.038)	(0.038)	(0.038)	(0.039)
Firmage		0.004***	0.004***	0.004***	0.004***
		(0.001)	(0.001)	(0.001)	(0.001)
Retain		-0.014***	-0.014***	-0.014***	-0.015***
		(0.002)	(0.002)	(0.002)	(0.002)
Cash		0.029*	0.033**	0.035**	0.034**
		(0.016)	(0.017)	(0.017)	(0.017)
Return Volatility		0.024***	0.022**	0.024***	0.019*
		(0.009)	(0.010)	(0.009)	(0.010)
Log(GDP)			-0.043	-0.110	-0.065
			(0.053)	(0.067)	(0.068)
GDP Growth			-0.395**	0.151	0.151
			(0.170)	(0.114)	(0.116)
Demo Support			-0.115	-0.403***	-0.290**
			(0.098)	(0.117)	(0.116)
Constant	0.211***	-0.463***	0.054	0.946	0.385
	(0.014)	(0.033)	(0.549)	(0.722)	(0.731)
Industry FE	Yes	Yes	Yes	Yes	
Year FE	Yes	Yes	Yes	Yes	
State FE				Yes	Yes
Industry*Year FE					Yes
R^2	0.128	0.271	0.275	0.286	0.302
N	52677	44581	42178	42178	42176

Panel B	(1)	(2)	(3)	(4)	(5)
Liberal_prob	**-1.026*****	**-0.773*****	**-0.612****	**-1.039*****	**-0.788****
	(0.261)	(0.227)	(0.239)	(0.324)	(0.333)
Size		0.782***	0.801***	0.805***	0.803***
		(0.033)	(0.034)	(0.034)	(0.035)
ROA		-0.559***	-0.592***	-0.586***	-0.600***
		(0.084)	(0.088)	(0.088)	(0.090)
Q		-0.010	-0.006	-0.005	-0.002
		(0.021)	(0.022)	(0.021)	(0.022)
MTB		0.015**	0.016**	0.017**	0.017**
		(0.008)	(0.008)	(0.008)	(0.008)
Capex		-0.460	-0.366	-0.363	-0.243
		(0.665)	(0.691)	(0.677)	(0.723)
Leverage		-1.024***	-1.067***	-1.086***	-1.042***
		(0.231)	(0.238)	(0.239)	(0.244)
Tangible		1.222***	1.164***	1.109***	1.045***
		(0.296)	(0.301)	(0.298)	(0.304)
Firmage		0.034***	0.034***	0.031***	0.032***
		(0.004)	(0.004)	(0.004)	(0.004)
Retain		-0.109***	-0.113***	-0.112***	-0.116***
		(0.015)	(0.015)	(0.015)	(0.016)
Cash		0.131	0.165	0.174	0.186
		(0.139)	(0.143)	(0.144)	(0.146)
Return Volatility		0.183**	0.160*	0.185**	0.131
		(0.075)	(0.082)	(0.080)	(0.084)
Log(GDP)			-0.423	-1.214**	-0.925
			(0.419)	(0.589)	(0.604)
GDP Growth			-4.503***	1.038	1.258
			(1.434)	(1.073)	(1.106)
Demo Support			-0.745	-3.050***	-1.996**
			(0.783)	(1.001)	(1.007)
Constant	1.997***	-3.946***	0.962	10.861*	7.086
	(0.120)	(0.238)	(4.336)	(6.315)	(6.482)
Industry FE	Yes	Yes	Yes	Yes	
Year FE	Yes	Yes	Yes	Yes	
State FE				Yes	Yes
Industry*Year FE					Yes
R^2	0.120	0.266	0.269	0.278	0.294
N	52677	44581	42178	42178	42176

Table 4: E and S Subsample Analysis

	Environmental Misconduct			Social Misconduct		
	Dummy	Log(1+Number)	Log(1+Amount)	Dummy	Log(1+Number)	Log(1+Amount)
	(1)	(2)	(3)	(4)	(5)	(6)
Liberal_prob	**-0.035****	**-0.030****	**-0.387****	**-0.038***	**-0.043***	**-0.401***
	(0.014)	(0.014)	(0.154)	(0.020)	(0.025)	(0.213)
Firm Controls	Yes	Yes	Yes	Yes	Yes	Yes
State Controls	Yes	Yes	Yes	Yes	Yes	Yes
Industry*Year FE	Yes	Yes	Yes	Yes	Yes	Yes
R^2	0.198	0.207	0.204	0.228	0.237	0.232
N	42192	42176	42176	42192	42176	42176

Table 5: IV Estimation

IV:Judge Death	Dummy		Log(1+Number)		Log(1+Amount)	
	(1)	(2)	(3)	(4)	(5)	(6)
Liber_prob	**-0.257****	**-0.307*****	**-0.308****	**-0.374*****	**-2.980****	**-3.567*****
	(0.113)	(0.114)	(0.126)	(0.126)	(1.219)	(1.224)
Firm Controls	Yes	Yes	Yes	Yes	Yes	Yes
State Controls	Yes	Yes	Yes	Yes	Yes	Yes
Industry FE	Yes		Yes		Yes	
Year FE	Yes		Yes		Yes	
Industry*Year FE		Yes		Yes		Yes
State FE	Yes	Yes	Yes	Yes	Yes	Yes
R^2	0.153	0.154	0.168	0.169	0.167	0.167
N	42194	42192	42178	42176	42178	42176

Standard errors in parentheses

* $p < 0.1$, ** $p < 0.05$, *** $p < 0.01$

Table 6: Validation

Panel A: # of ES Lawsuits	OLS: Log(1+Number)		Poisson: Number	
	(1)	(2)	(3)	(4)
Liber_prob	**0.965*****	**0.809****	**0.728****	**1.570****
	(0.237)	(0.327)	(0.296)	(0.656)
Constant	5.400***	3.209***	5.935***	2.764***
	(0.106)	(0.146)	(0.137)	(0.266)
Court FE		Yes		Yes
Year-Month FE		Yes		Yes
R^2	0.033	0.760		
N	3168	3168	3168	3168

Standard errors in parentheses

* $p < 0.1$, ** $p < 0.05$, *** $p < 0.01$

Panel B: Case Outcome	(1)	(2)	(3)	(4)
Liberal Judge	**-0.020**	**0.105***	**0.009**	**0.129****
	(0.039)	(0.055)	(0.043)	(0.063)
Age			0.001	0.005**
			(0.002)	(0.002)
Female			-0.036	-0.001
			(0.042)	(0.061)
White			0.115*	0.008
			(0.059)	(0.065)
Constant	0.590***	1.346***	0.442***	1.046***
	(0.032)	(0.220)	(0.120)	(0.262)
Court FE		Yes		Yes
Year FE		Yes		Yes
BirthState FE		Yes		Yes
R^2	0.000	0.330	0.012	0.335
N	720	710	704	704

Table 7: Institutional Ownership

	Dummy		Log(1+Number)		Log(1+Amount)	
	(1)	(2)	(3)	(4)	(5)	(6)
Liber_prob	0.029	0.008	0.020	-0.024	0.319	0.073
	(0.036)	(0.047)	(0.051)	(0.060)	(0.411)	(0.526)
Instiratio	0.003	-0.001	-0.067	-0.075*	-0.232	-0.271
	(0.029)	(0.028)	(0.042)	(0.042)	(0.330)	(0.328)
Instiratio*Liberal_prob	**-0.147*****	**-0.139****	**-0.155****	**-0.138***	**-1.617*****	**-1.524****
	(0.054)	(0.054)	(0.075)	(0.075)	(0.606)	(0.611)
Firm Controls	Yes	Yes	Yes	Yes	Yes	Yes
State Controls	Yes	Yes	Yes	Yes	Yes	Yes
Industry FE	Yes	Yes	Yes	Yes	Yes	Yes
Year FE	Yes	Yes	Yes	Yes	Yes	Yes
State FE		Yes		Yes		Yes
R^2	0.286	0.297	0.308	0.321	0.299	0.310
N	32350	32350	32340	32340	32340	32340

Table 8: Proxy Voting on ES Issues

	(1)	(2)	(3)	(4)
Liberal_prob	**0.213***	**0.236****	**0.246****	**0.239****
	(0.120)	(0.117)	(0.113)	(0.112)
ISS_for	0.395***	0.393***	0.391***	0.389***
	(0.013)	(0.013)	(0.013)	(0.013)
Firm Controls	Yes	Yes	Yes	Yes
State Controls	Yes	Yes	Yes	Yes
Firm FE	Yes	Yes	Yes	Yes
Industry*Year FE	Yes	Yes	Yes	Yes
Institution FE		Yes		
Institution*Year FE			Yes	Yes
Fund FE				Yes
R^2	0.286	0.412	0.471	0.530
N	633838	633826	633703	632662

Table 9: Corporate Response

Panel A: Cash Holdings	(1)	(2)	(3)	(4)
Liberal_prob	**0.069*****	**0.018****	**0.053*****	**0.044****
	(0.010)	(0.009)	(0.017)	(0.017)
Firm Controls		Yes	Yes	Yes
State Controls		Yes	Yes	Yes
Industry FE	Yes	Yes	Yes	Yes
Year FE	Yes	Yes	Yes	Yes
Industry*Year FE				Yes
State FE			Yes	Yes
R^2	0.266	0.439	0.443	0.454
N	52213	42173	42173	42171

	M&A Dummy			M&A Number		
Panel B: M&A	(1)	(2)	(3)	(4)	(5)	(6)
Liberal_prob	**-0.063*****	**-0.060*****	**-0.061*****	**-0.126****	**-0.120****	**-0.118****
	(0.021)	(0.020)	(0.020)	(0.052)	(0.050)	(0.050)
Firm Controls		Yes	Yes		Yes	Yes
State Controls		Yes	Yes		Yes	Yes
Industry FE	Yes	Yes		Yes	Yes	
Year FE	Yes	Yes		Yes	Yes	
Industry*Year FE			Yes			Yes
R^2	0.050	0.136	0.153	0.050	0.151	0.166
N	52677	42178	42176	52677	42178	42176

Table 10: Shareholder Welfare

Panel A: CAR	(1)	(2)	(3)	(4)
Market Adjusted	**-0.003*****			
	(0.001)			
Market		**-0.004*****		
		(0.001)		
FF Three Factor			**-0.003*****	
			(0.001)	
FFC Four Factor				**-0.002*****
				(0.001)
N	36234	36234	36234	36234

	Payout		Dividend		Repurchase	
Panel B: Payout	(1)	(2)	(3)	(4)	(5)	(6)
Liberal_prob	**-0.065****	**-0.062****	**-0.094*****	**-0.094*****	**-0.008**	**-0.002**
	(0.026)	(0.026)	(0.034)	(0.034)	(0.025)	(0.025)
Firm Controls	Yes	Yes	Yes	Yes	Yes	Yes
State Controls	Yes	Yes	Yes	Yes	Yes	Yes
Industry FE	Yes	Yes		Yes	Yes	
Year FE	Yes	Yes		Yes	Yes	
Industry*Year FE		Yes		Yes		Yes
R^2	0.293	0.306	0.310	0.319	0.223	0.248
N	38521	38519	42132	42130	38564	38562

Table 11: Robustness Tests

Panel A: Firm Fixed Effect	(1) Dummy	(2) Log(1+Number)	(3) Log(1+Amount)
Liberal_prob	**-0.039**	**-0.051***	**-0.444***
	(0.025)	(0.029)	(0.264)
Firm Controls	Yes	Yes	Yes
State Controls	Yes	Yes	Yes
Year FE	Yes	Yes	Yes
Firm FE	Yes	Yes	Yes
R^2	0.592	0.706	0.617
N	41936	41920	41920

	Dummy		Log(1+Number)		Log(1+Amount)	
Panel B: Liberal Judge Ratio	(1)	(2)	(3)	(4)	(5)	(6)
Liberal_ratio	**-0.104****	**-0.060***	**-0.136*****	**-0.086****	**-1.190****	**-0.702***
	(0.042)	(0.035)	(0.053)	(0.041)	(0.468)	(0.376)
Firm Controls	Yes	Yes	Yes	Yes	Yes	Yes
State Controls	Yes	Yes	Yes	Yes	Yes	Yes
Year FE		Yes		Yes		Yes
Industry*Year FE	Yes		Yes		Yes	
State FE	Yes		Yes		Yes	
Firm FE		Yes		Yes		Yes
R^2	0.285	0.592	0.302	0.706	0.294	0.617
N	42192	41936	42176	41920	42176	41920

	Dummy		Log(1+Number)		Log(1+Amount)	
Panel C: District Court	(1)	(2)	(3)	(4)	(5)	(6)
Liberal_ratio	**-0.100*****	**-0.097*****	**-0.113*****	**-0.144*****	**-1.099*****	**-1.122*****
	(0.027)	(0.035)	(0.041)	(0.050)	(0.307)	(0.398)
Firm Controls	Yes	Yes	Yes	Yes	Yes	Yes
State Controls	Yes	Yes	Yes	Yes	Yes	Yes
Industry FE	Yes		Yes		Yes	
Year FE	Yes		Yes		Yes	
Industry*Year FE		Yes		Yes		Yes
State FE		Yes		Yes		Yes
R^2	0.262	0.288	0.277	0.306	0.271	0.297
N	42031	42029	42016	42014	42016	42014

Panel D: Poisson Regression	(1)	(2)	(3)
Liberal_prob	**-1.710*****	**-0.463****	**-0.501***
	(0.241)	(0.205)	(0.274)
Firm Controls		Yes	Yes
State Controls		Yes	Yes
Industry FE			Yes
Year FE			Yes
State FE			Yes
N	52874	42360	42048

Standard errors in parentheses

* $p < 0.1$, ** $p < 0.05$, *** $p < 0.01$

Table A1: Variables Definitions

Variable	Definition	Source
A. Independent Variables		
Liberal_prob	Probability that a randomly selected three-judge panel in a circuit court has at least two judges appointed by Democratic presidents	FJC Judge Biographical Directory
Liberal_ratio	Number of judges appointed by democratic presidents divided by total number of judges	FJC Judge Biographical Directory
B. Dependent Variables		
ES_dummy	An indicator about whether a firm commits ES misconduct	Violation Tracker Database
Log(1+ES_number)	Natural logarithm of one plus the number of ES misconducts that a firm commits	Violation Tracker Database
Log(1+ES_amount)	Natural logarithm of one plus the total penalty amount of ES misconducts that a firm commits	Violation Tracker Database
C. Control Variables		
Size	Natural logarithm of total assets	Compustat/CRSP Merged Database
ROA	Return on asset	Compustat/CRSP Merged Database
Q	Market value of the firm divided by the replacement cost of its assets.	Compustat/CRSP Merged Database
MTB	market-to-book ratio	Compustat/CRSP Merged Database
Capex	Capital expenditures divided by total assets	Compustat/CRSP Merged Database
Leverage	The ratio of total liabilities over total assets	Compustat/CRSP Merged Database
Tangibility	Net property, plant and equipment(PPE) divided by total assets	Compustat/CRSP Merged Database
Firm age	Number of years since the firm first appears in Compustat/CRSP Database	Compustat/CRSP Merged Database
Retain	Retained earning divided by total assets	Compustat/CRSP Merged Database
Cash	Cash holdings divided by total assets	Compustat/CRSP Merged Database
Stock Volatility	The annualized standard deviation of monthly stock returns	Compustat/CRSP Merged Database
Log(GDP)	Natural logarithm of GDP per capita of a state	U.S. Bureau of Economic Analysis
GDP Growth	Growth rate of GDP	U.S. Bureau of Economic Analysis
Demo Support	The ratio of votes that support democratic presidential candidate. For non-election years, applied to the value with the most recent presidential election.	MIT Election Lab