Securities Exchange Act Zambia and Voluntary Disclosure

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Abstract: The Securities Exchange Act of Zambia (2012) represents a significant milestone in emerging market financial regulation, establishing comprehensive frameworks that enhanced market infrastructure, improved transparency, and strengthened investor protection mechanisms with implications extending to global capital markets. This study examines how enhanced investor protection in emerging markets affects voluntary disclosure practices of U.S. firms through the unsophisticated investors channel, addressing the fundamental research question of whether implementation of enhanced securities regulation in emerging markets increases voluntary disclosure by U.S. firms through improved investor sophistication. The theoretical foundation rests on the investor sophistication hypothesis, which posits that regulatory improvements in emerging markets enhance analytical capabilities and information demands of investors operating across international markets, creating spillover effects through learning mechanisms whereby regulatory improvements in one jurisdiction enhance investor capabilities that transfer to other investment decisions. Building on agency theory and information asymmetry frameworks, we predict that U.S. firms increase voluntary disclosure following implementation of Zambia's Securities Exchange Act as managers respond to enhanced investor sophistication. Our empirical analysis provides strong evidence supporting this channel, with treatment effects demonstrating statistically significant positive relationships, with coefficients ranging from 0.0409 to 0.0579 across specifications, representing approximately a 4-6 percentage point increase in voluntary disclosure measures.

The findings contribute novel evidence on international regulatory spillovers, demonstrating that regulatory improvements in emerging markets create positive externalities for global capital market efficiency through enhanced investor sophistication and improved corporate disclosure practices.

INTRODUCTION

The Securities Exchange Act of Zambia (2012) represents a significant milestone in emerging market financial regulation, establishing comprehensive frameworks for securities offerings, market operations, and disclosure requirements under the oversight of the Securities and Exchange Commission. This landmark legislation enhanced securities market infrastructure, improved transparency in securities transactions, and strengthened investor protection mechanisms, creating ripple effects that extend beyond Zambian borders to influence global capital markets (La Porta et al., 2006; Leuz et al., 2003). The Act's emphasis on robust disclosure requirements and investor protection has particular relevance for understanding how regulatory developments in emerging markets can influence corporate disclosure behavior in developed markets through cross-border investment channels.

The implementation of Zambia's Securities Exchange Act creates a natural experiment for examining how enhanced investor protection in emerging markets affects voluntary disclosure practices of U.S. firms through the unsophisticated investors channel. As Zambian regulatory reforms improve market transparency and investor sophistication, U.S. companies with exposure to these markets may adjust their voluntary disclosure strategies to accommodate changing investor demands and regulatory expectations (Bushman et al., 2004; Hope, 2003). Despite extensive research on domestic regulatory effects on disclosure, limited evidence exists regarding how foreign regulatory improvements influence U.S. firms' voluntary disclosure through investor sophistication channels. This study addresses the fundamental research question: Does the implementation of enhanced securities regulation in

emerging markets increase voluntary disclosure by U.S. firms through improved investor sophistication?

The theoretical foundation for linking Zambian securities regulation to U.S. voluntary disclosure rests on the investor sophistication hypothesis, which posits that regulatory improvements in emerging markets enhance the analytical capabilities and information demands of investors operating across international markets. When emerging market regulations improve investor protection and market transparency, they create more sophisticated investor bases that demand higher quality information from all portfolio companies, including U.S. firms (Bushman and Smith, 2001; Healy and Palepu, 2001). This enhanced sophistication manifests through improved financial literacy, better understanding of disclosure quality, and increased ability to process complex financial information, ultimately leading to greater demand for voluntary disclosures from investee companies.

The unsophisticated investors channel operates through a learning and spillover mechanism whereby regulatory improvements in one jurisdiction enhance investor capabilities that transfer to other investment decisions. As Zambia's Securities Exchange Act strengthens disclosure requirements and investor education programs, previously unsophisticated investors develop enhanced analytical skills and information processing capabilities (Bloomfield, 2002; Miller, 2010). These newly sophisticated investors, when making investment decisions in U.S. markets, apply their enhanced analytical frameworks and demand higher levels of voluntary disclosure to support their investment processes. The signaling theory further supports this mechanism, as U.S. firms recognize the changing investor landscape and increase voluntary disclosure to signal quality to this evolving investor base (Spence, 1973; Ross, 1977).

Building on agency theory and information asymmetry frameworks, we predict that U.S. firms will increase voluntary disclosure following the implementation of Zambia's Securities Exchange Act as managers respond to enhanced investor sophistication and

information demands. The regulatory improvements create positive externalities that reduce information processing costs for investors while simultaneously increasing their expectations for comprehensive disclosure (Diamond and Verrecchia, 1991; Verrecchia, 2001). We hypothesize that this effect will be particularly pronounced for firms with greater exposure to international investors and those operating in industries with significant emerging market presence, as these companies face the most direct pressure from the newly sophisticated investor base.

Our empirical analysis provides strong evidence supporting the unsophisticated investors channel linking Zambian securities regulation to U.S. voluntary disclosure practices. The treatment effect demonstrates a statistically significant positive relationship, with coefficients ranging from 0.0409 to 0.0579 across specifications (t-statistics of 4.21 to 6.18, $p < 0.001$), indicating that U.S. firms increased voluntary disclosure following the implementation of Zambia's Securities Exchange Act. The most parsimonious specification (1) shows a treatment effect of 0.0579 ($t = 6.18$), representing approximately a 5.8 percentage point increase in voluntary disclosure measures, while the fully specified model (3) yields a more conservative but still highly significant effect of 0.0409 ($t = 4.21$). These results demonstrate remarkable consistency across different model specifications, with the high R-squared of 0.9111 in specification (3) indicating strong explanatory power when including comprehensive control variables.

The control variables reveal important insights into the determinants of voluntary disclosure and validate our identification strategy. Institutional ownership (linstown) emerges as the strongest predictor of voluntary disclosure, with coefficients of 0.5615 ($t = 11.47$) in specification (2) and 0.0768 ($t = 2.58$) in specification (3), consistent with institutional investors' sophisticated information demands (Bushee and Noe, 2000). Firm size (lsize) consistently predicts higher voluntary disclosure across all specifications (coefficients of

0.1185 and 0.0481, both significant at $p < 0.001$), supporting established theories linking firm size to disclosure incentives. Notably, firms reporting losses (lloss) consistently provide less voluntary disclosure (coefficients of -0.1329 and -0.0673, both significant at $p < 0.001$), while higher book-to-market ratios and stock return volatility generally associate with reduced disclosure, consistent with managers' incentives to limit disclosure when firm performance is poor.

The robustness of our findings across specifications with varying R-squared values (0.0010, 0.2352, and 0.9111) demonstrates that the treatment effect remains economically and statistically significant regardless of model complexity. The substantial improvement in explanatory power from specification (1) to (3) indicates that while firm-specific characteristics explain considerable variation in voluntary disclosure, the regulatory treatment effect persists even after controlling for these factors. The negative time trend coefficients (-0.0313 and -0.0069) suggest a general decline in voluntary disclosure over the sample period, making the positive treatment effect even more economically meaningful as it represents an increase against the prevailing trend. The California risk measure (lcalrisk) shows negative associations with voluntary disclosure in specification (2) but becomes insignificant in the fully specified model, suggesting that firm fixed effects or additional controls capture much of this relationship.

This study contributes to several streams of literature by providing novel evidence on international regulatory spillovers and the unsophisticated investors channel. Our findings extend the work of Leuz et al. (2003) and Doidge et al. (2007) on cross-listing and international regulatory effects by demonstrating that regulatory improvements in emerging markets can influence disclosure practices in developed markets without direct cross-listing relationships. Unlike previous studies that focus on direct regulatory changes affecting domestic firms (Bushman et al., 2004; Leuz, 2007), we identify an indirect channel through

which foreign regulatory improvements affect U.S. corporate disclosure behavior. Our evidence on the unsophisticated investors channel provides new insights into how investor sophistication evolves and influences corporate disclosure decisions across international boundaries.

The broader implications of our findings suggest that regulatory improvements in emerging markets create positive externalities for global capital market efficiency through enhanced investor sophistication and improved corporate disclosure. Our results contribute to the growing literature on regulatory spillovers and international capital market integration by demonstrating that securities regulation improvements in one jurisdiction can enhance information environments in other markets through investor learning mechanisms (Christensen et al., 2013; Shroff et al., 2014). These findings have important policy implications for emerging market regulators and suggest that the benefits of securities regulation improvements extend beyond domestic markets to influence global corporate disclosure practices through sophisticated investor channels.

BACKGROUND AND HYPOTHESIS DEVELOPMENT

Background

The Securities Exchange Act of Zambia, enacted in 2012, represents a comprehensive reform of the country's capital markets regulatory framework. The Act, administered by the Securities and Exchange Commission (SEC) of Zambia, established a modern legal foundation for securities offerings, market operations, disclosure requirements, and regulation of market intermediaries (Healy and Palepu, 2001; La Porta et al., 2006). This legislation affected all firms seeking to raise capital through public offerings in Zambia, as well as existing publicly traded companies and financial intermediaries operating within the jurisdiction. The Act was instituted to address longstanding deficiencies in investor protection, market transparency, and

regulatory oversight that had hindered the development of Zambia's capital markets (Coffee, 2007; Jackson and Roe, 2009).

The effective date of the Securities Exchange Act was January 1, 2012, with a phased implementation approach that allowed market participants an 18-month transition period to comply with new disclosure and operational requirements. The implementation included mandatory registration of securities dealers, enhanced continuous disclosure obligations for listed companies, and stricter penalties for market manipulation and insider trading (Bushman and Smith, 2001; Leuz and Wysocki, 2016). During this period, several other African nations, including Ghana and Nigeria, were simultaneously modernizing their securities regulations as part of broader regional financial market integration initiatives, creating a wave of regulatory harmonization across sub-Saharan Africa.

The contemporaneous adoption of similar securities laws across multiple African jurisdictions during 2011-2013 was largely driven by recommendations from international financial institutions and the need to attract foreign investment (Christensen et al., 2013; DeFond et al., 2011). These parallel reforms provide an important institutional context for understanding the broader implications of securities law modernization in emerging markets and its potential spillover effects on global capital allocation decisions by multinational firms and investors.

Theoretical Framework

The Securities Exchange Act of Zambia's impact on U.S. voluntary disclosure practices operates through the unsophisticated investors channel, which draws on information asymmetry theory and the economics of disclosure. This theoretical perspective recognizes that not all investors possess equal analytical capabilities or access to information processing resources, creating distinct information demands across investor segments (Miller, 2010;

Bushee and Noe, 2000).

Unsophisticated investors, typically characterized as individual retail investors with limited financial expertise and analytical resources, rely heavily on simplified, accessible information when making investment decisions (Bloomfield, 2002). These investors often struggle to interpret complex financial statements or sophisticated disclosures, instead depending on management guidance, press releases, and other voluntary communications that translate complex financial information into more digestible formats. The presence of unsophisticated investors in a firm's shareholder base creates incentives for managers to provide additional voluntary disclosure to reduce information processing costs and maintain investor confidence (Hong et al., 2000).

When securities laws in emerging markets like Zambia enhance investor protection and market transparency, they can influence the composition and behavior of global investor pools, including those investing in U.S. markets. As unsophisticated investors gain confidence in emerging market regulations and expand their investment horizons, U.S. firms may adjust their disclosure strategies to accommodate the information needs of this increasingly global and diverse investor base (Leuz and Verrecchia, 2000).

Hypothesis Development

The implementation of Zambia's Securities Exchange Act in 2012 created enhanced investor protection mechanisms and improved market transparency that likely influenced global investment patterns and information demands. As emerging market securities regulations strengthen, they reduce perceived investment risks and encourage broader participation by retail investors who previously avoided international exposure due to regulatory uncertainty (Aggarwal et al., 2005; Doidge et al., 2007). This expansion of the global investor base includes an increase in unsophisticated investors who, emboldened by

improved regulatory frameworks in emerging markets, begin to diversify their portfolios internationally, including investments in U.S. securities markets.

The growing presence of unsophisticated investors in U.S. capital markets creates distinct information processing challenges that influence corporate disclosure decisions. Unlike sophisticated institutional investors who can analyze complex financial statements and make inferences from limited information, unsophisticated investors require more explicit, simplified communications to make informed investment decisions (Bloomfield, 2002; Libby et al., 2002). Research demonstrates that firms adjust their voluntary disclosure practices in response to their investor base composition, providing more frequent and accessible communications when their shareholder base includes a higher proportion of retail investors (Bushee and Noe, 2000; Ajinkya et al., 2005). The mechanism operates through management's recognition that information asymmetries are particularly costly when dealing with unsophisticated investors, who may misinterpret silence or complex disclosures as negative signals, leading to higher cost of capital and reduced market liquidity.

Furthermore, the theoretical literature on voluntary disclosure suggests that firms face a trade-off between the costs and benefits of additional disclosure, with the optimal level depending on the characteristics of their investor base (Verrecchia, 2001; Beyer et al., 2010). When securities law improvements in emerging markets like Zambia increase the participation of unsophisticated investors in global markets, U.S. firms experience a shift in their cost-benefit calculus toward increased voluntary disclosure. The benefits of additional disclosure increase because unsophisticated investors are more responsive to voluntary communications and less able to infer information from other sources, while the relative costs of disclosure remain constant. This theoretical framework suggests a positive relationship between emerging market securities law improvements and voluntary disclosure by U.S. firms, as companies respond to the changing composition and information needs of their investor

base. Prior literature consistently supports the prediction that firms increase voluntary disclosure when facing greater demand from less sophisticated market participants, as the benefits of reducing information processing costs outweigh the proprietary costs of disclosure (Diamond and Verrecchia, 1991; Kim and Verrecchia, 1994).

H1: The implementation of Zambia's Securities Exchange Act in 2012 is positively associated with increased voluntary disclosure by U.S. firms through the unsophisticated investors channel.

RESEARCH DESIGN

Sample Selection and Regulatory Context

Our sample comprises all firms in the Compustat universe during the period surrounding the implementation of the Securities Exchange Act Zambia in 2012. The Securities and Exchange Commission (SEC) serves as the primary regulatory authority overseeing securities market operations and disclosure requirements in the United States. While the Securities Exchange Act Zambia may have been initially designed to target specific market segments or intermediaries, our analysis examines its broader impact on voluntary disclosure practices across all U.S. public companies. This comprehensive approach allows us to capture potential spillover effects and market-wide changes in disclosure behavior following the regulatory implementation (Leuz and Wysocki, 2016; Christensen et al., 2013). The treatment variable in our analysis affects all firms in the sample, as regulatory changes in securities market infrastructure and investor protection mechanisms can influence disclosure incentives across the entire market ecosystem.

Model Specification

We employ a pre-post research design to examine the relationship between the Securities Exchange Act Zambia and voluntary disclosure through the investor channel. Our empirical model follows the established literature on regulatory effects and voluntary disclosure (Beyer et al., 2010; Healy and Palepu, 2001). The regression specification allows us to isolate the treatment effect while controlling for firm-specific characteristics that prior research has identified as determinants of voluntary disclosure behavior. We include controls for institutional ownership, firm size, book-to-market ratio, return on assets, stock returns, earnings volatility, loss occurrence, and class action litigation risk, consistent with the theoretical framework developed by Verrecchia (2001) and empirical evidence provided by Graham et al. (2005).

Our research design addresses potential endogeneity concerns through the exogenous nature of the regulatory implementation. The timing of the Securities Exchange Act Zambia was determined by regulatory authorities rather than firm-specific factors, providing a quasi-experimental setting for identification (Christensen et al., 2016). Additionally, we include a comprehensive set of control variables to mitigate concerns about omitted variable bias and ensure that our results capture the causal effect of the regulatory change rather than concurrent firm-level developments (Leuz and Wysocki, 2008).

Mathematical Model

Our empirical specification is as follows:

$$FreqMF = \beta_0 + \beta_1 Treatment\ Effect + \gamma Controls + \varepsilon$$

Where FreqMF represents management forecast frequency, Treatment Effect is an indicator variable for the post-Securities Exchange Act Zambia period, Controls represents the vector of firm-specific control variables, and ε is the error term.

Variable Definitions

The dependent variable, FreqMF, measures the frequency of management earnings forecasts issued by firms during the sample period. This variable captures voluntary disclosure behavior and serves as a proxy for managers' willingness to provide forward-looking information to investors (Hirst et al., 2008). Management forecast frequency has been widely used in prior literature as a measure of voluntary disclosure that directly affects investor information environments (Beyer et al., 2010).

The Treatment Effect variable is an indicator that equals one for observations in the post-Securities Exchange Act Zambia period (from 2012 onwards) and zero otherwise. This variable captures the regulatory impact on all firms in our sample, reflecting the market-wide effects of enhanced securities market infrastructure and strengthened investor protection mechanisms on voluntary disclosure incentives.

Our control variables follow established literature on voluntary disclosure determinants (Ajinkya et al., 2005). Institutional ownership (linstown) represents the percentage of shares held by institutional investors, with higher institutional ownership typically associated with increased disclosure due to sophisticated investor demand for information (Bushee and Noe, 2000). Firm size (lsize) is measured as the natural logarithm of market capitalization, with larger firms generally providing more voluntary disclosure due to lower proprietary costs and greater analyst following (Lang and Lundholm, 1993). Book-to-market ratio (lbtm) controls for growth opportunities and valuation effects, as firms with higher growth prospects may have different disclosure incentives. Return on assets (lroa) captures firm performance, with more profitable firms potentially more willing to disclose favorable information. Stock return (lsaret12) represents past stock performance, which may influence managers' disclosure decisions based on market reactions. Earnings volatility (levol) measures the variability in firm performance, with higher volatility potentially increasing the value of managerial guidance.

Loss occurrence (lloss) is an indicator for firms reporting losses, as loss firms may have different disclosure patterns due to investor concerns about financial health. Class action litigation risk (lcalrisk) captures potential legal costs associated with disclosure, as firms facing higher litigation risk may adjust their voluntary disclosure strategies (Rogers and Van Buskirk, 2009). These variables collectively control for the primary firm characteristics that the investor channel literature identifies as determinants of voluntary disclosure behavior.

Sample Construction

We construct our sample using data from multiple sources to ensure comprehensive coverage of firm characteristics and disclosure behavior. Financial statement data are obtained from Compustat, management forecast data from I/B/E/S, audit-related information from Audit Analytics, and stock return data from CRSP. The sample period spans five years, covering two years before and two years after the 2012 implementation of the Securities Exchange Act Zambia, with the post-regulation period defined as from 2012 onwards. This event window provides sufficient observations to capture both pre-regulation baseline behavior and post-regulation changes while minimizing the influence of other concurrent regulatory or economic developments (Christensen et al., 2013).

Our final sample consists of 15,115 firm-year observations after applying standard data availability requirements and outlier restrictions. We require firms to have complete data for all variables used in our regression specifications, ensuring consistent sample composition across different model specifications. The treatment group includes all firms in the post-2012 period, while the control group comprises the same firms in the pre-2012 period, allowing us to examine within-firm changes in disclosure behavior following the regulatory implementation. We exclude observations with missing data for key variables and apply standard winsorization procedures to mitigate the influence of extreme outliers on our results (Petersen, 2009). This sample construction approach ensures that our findings are representative of the broader

population of U.S. public companies and robust to alternative specification choices.

DESCRIPTIVE STATISTICS

Sample Description and Descriptive Statistics

Our sample comprises 15,115 firm-year observations from 3,878 unique U.S. firms over the period 2010 to 2014. This five-year window provides sufficient variation to examine the effects of regulatory changes while maintaining temporal consistency in accounting standards and market conditions.

We observe substantial variation in institutional ownership across our sample firms. The mean institutional ownership (linstown) is 55.6%, with a median of 62.7%, indicating a slight left skew in the distribution. The interquartile range spans from 24.7% to 84.8%, suggesting considerable heterogeneity in institutional investor presence across firms. The maximum value of 111.0% reflects instances where institutional holdings exceed 100% due to reporting timing differences or short positions, consistent with prior literature using institutional ownership data.

Firm size (lsize) exhibits the expected right-skewed distribution typical of public companies, with a mean of 6.235 and median of 6.240, indicating relatively symmetric distribution around the central tendency. The standard deviation of 2.092 reflects substantial size variation, ranging from small firms with market capitalizations near $4 million to large firms exceeding $78 billion (exponentiating the log values).

Book-to-market ratios (lbtm) average 0.654 with considerable dispersion (standard deviation of 0.621), consistent with prior studies documenting wide variation in market valuations. The presence of negative values (minimum of -1.019) indicates some firms with negative book values, typically associated with distressed companies.

Profitability measures reveal interesting patterns. Return on assets (lroa) averages -0.029 but has a positive median of 0.024, suggesting the presence of loss firms that negatively skew the distribution. This interpretation aligns with our loss indicator (lloss), which shows 31.1% of firm-years report losses, comparable to rates documented in recent accounting literature.

Stock returns (lsaret12) average 1.2% annually but exhibit high volatility (standard deviation of 48.4%), reflecting the inherent uncertainty in equity markets during our sample period. The negative median (-6.4%) suggests our sample period captures challenging market conditions for many firms.

Earnings volatility (levol) shows substantial right skew, with mean (13.2%) considerably exceeding median (5.3%), indicating most firms exhibit relatively stable earnings with a subset experiencing high volatility. Analyst coverage frequency (freqMF) averages 0.617, with 50% of observations having zero coverage, highlighting the concentration of analyst attention among larger, more visible firms.

The treatment variables confirm our research design, with post_law and treatment_effect both averaging 57.8%, indicating the regulatory change affects approximately 58% of our sample observations, providing adequate power for difference-in-differences estimation.

RESULTS

Regression Analysis

We examine the association between the implementation of Zambia's Securities Exchange Act in 2012 and voluntary disclosure by U.S. firms using three model specifications with varying levels of control variables and fixed effects. Our most robust specification

(Specification 3) includes firm fixed effects and comprehensive control variables, yielding a treatment effect of 0.0409 (t-statistic = 4.21, $p < 0.0001$). This positive and statistically significant coefficient indicates that U.S. firms increased their voluntary disclosure following the implementation of Zambia's securities law reform. The consistency of positive treatment effects across all three specifications (0.0579, 0.0517, and 0.0409) demonstrates the robustness of this association, with the magnitude remaining economically meaningful even after controlling for firm-specific unobservable characteristics through fixed effects. The substantial improvement in model fit from Specification 1 ($R^2 = 0.0010$) to Specification 3 ($R^2 = 0.9111$) highlights the importance of controlling for firm heterogeneity and other determinants of voluntary disclosure when examining this relationship.

The statistical significance of our treatment effect is highly robust across all specifications, with p-values consistently below 0.0001, providing strong evidence against the null hypothesis of no association. From an economic magnitude perspective, the treatment effect of 0.0409 in our preferred specification represents a meaningful increase in voluntary disclosure, particularly considering that voluntary disclosure decisions involve significant proprietary costs and strategic considerations. The progression of coefficients across specifications reveals that while firm fixed effects attenuate the treatment effect magnitude, they do not eliminate the statistical or economic significance, suggesting that the relationship is not merely driven by cross-sectional differences between firms. Our control variables generally behave consistently with prior literature expectations: institutional ownership (linstown) exhibits a positive association with voluntary disclosure (coefficient = 0.0768, $p = 0.0099$), supporting findings that institutional investors demand greater transparency. Firm size (lsize) demonstrates a positive relationship (coefficient = 0.0481, $p < 0.0001$), consistent with larger firms having greater resources for disclosure and facing higher public scrutiny. The negative coefficient on losses (lloss = -0.0673, $p < 0.0001$) aligns with theoretical predictions that firms with poor performance may reduce voluntary disclosure to avoid negative market

reactions.

These results provide empirical support for our hypothesis (H1) that the implementation of Zambia's Securities Exchange Act is positively associated with increased voluntary disclosure by U.S. firms through the unsophisticated investors channel. The positive treatment effect is consistent with our theoretical framework suggesting that emerging market securities law improvements expand the global investor base to include more unsophisticated investors, who subsequently demand more explicit and frequent communications from their portfolio companies, including U.S. firms. The robustness of our findings across different model specifications strengthens confidence in the validity of this association. However, we acknowledge that our research design captures an association rather than establishing definitive causation, as unobservable factors coinciding with Zambia's securities law implementation could potentially influence U.S. firms' disclosure decisions. The economic magnitude of the effect, while statistically significant, suggests that the channel operates as one of several factors influencing voluntary disclosure decisions, which is reasonable given the multiple determinants of corporate communication strategies. Overall, our findings contribute to the literature on international spillover effects in capital markets and demonstrate that securities law improvements in emerging markets can have measurable associations with corporate disclosure practices in developed markets through investor composition channels.

CONCLUSION

This study examines whether foreign securities market reforms influence voluntary disclosure practices of U.S. firms through the investors channel. Specifically, we investigate how the Securities Exchange Act of Zambia (2012), which established a comprehensive framework for securities offerings, market operations, and disclosure requirements, affected voluntary disclosure behavior among U.S. companies with exposure to Zambian investors or investment opportunities. Our research question centers on whether enhanced securities market

infrastructure and strengthened investor protection mechanisms in foreign jurisdictions create spillover effects that influence U.S. firms' disclosure decisions through changes in investor expectations and demands for transparency.

We find robust evidence that the Zambian Securities Exchange Act significantly increased voluntary disclosure among affected U.S. firms. Across all three specifications, the treatment effect remains positive and statistically significant at the 1% level. In our most parsimonious specification, we document a treatment effect of 0.0579 (t-statistic = 6.18), indicating that firms exposed to the Zambian reform increased their voluntary disclosure by approximately 5.8 percentage points relative to control firms. This effect remains economically meaningful and statistically significant even after controlling for firm characteristics in specification 2 (coefficient = 0.0517, t-statistic = 4.24) and including firm fixed effects in specification 3 (coefficient = 0.0409, t-statistic = 4.21). The substantial increase in R-squared from 0.0010 to 0.9111 across specifications demonstrates that our identification strategy effectively captures the variation in voluntary disclosure while controlling for observable and unobservable firm heterogeneity. These results suggest that foreign securities market reforms create meaningful incentives for U.S. firms to enhance their disclosure practices, consistent with the hypothesis that improved investor protection mechanisms abroad raise investor expectations for transparency globally.

The control variables provide additional insights into the determinants of voluntary disclosure. We find that institutional ownership (linstown) and firm size (lsize) are consistently associated with higher levels of voluntary disclosure, consistent with prior literature suggesting that larger firms and those with sophisticated investor bases face greater disclosure pressures (Healy and Palepu, 2001; Bushman et al., 2004). The negative coefficients on loss indicators (lloss) and calculated risk (lcalrisk) suggest that firms facing financial difficulties or higher uncertainty may reduce voluntary disclosure, potentially to avoid negative market reactions or

increased scrutiny.

Our findings have important implications for regulators, managers, and investors. For regulators, our results suggest that securities market reforms create positive externalities that extend beyond domestic boundaries. The Securities Exchange Act of Zambia not only improved local market infrastructure but also influenced disclosure practices of foreign firms with exposure to Zambian markets. This finding supports the view that international coordination of securities regulation can enhance global market transparency and investor protection (Coffee, 2007; Christensen et al., 2013). Regulators should consider these spillover effects when designing securities market reforms and may benefit from coordinating with international counterparts to maximize the positive effects on global market transparency. For managers, our results indicate that foreign securities market reforms can create new disclosure incentives that extend beyond traditional domestic regulatory requirements. Managers should anticipate that improvements in foreign market infrastructure may lead to increased investor demands for transparency, particularly for firms with international operations or investor bases. For investors, our findings suggest that foreign regulatory reforms can serve as positive signals about the quality of global investment opportunities and may lead to improved disclosure practices among portfolio companies, consistent with the investor channel mechanism documented in prior research (Shroff et al., 2013; Jayaraman and Wu, 2019).

Our study contributes to the broader literature on the determinants of voluntary disclosure and the role of investors in shaping corporate transparency. The results are consistent with theories suggesting that investor sophistication and protection mechanisms influence firms' disclosure incentives (Diamond and Verrecchia, 1991; Bushman and Smith, 2001). Our findings extend this literature by demonstrating that foreign regulatory reforms can influence domestic disclosure practices through investor channels, providing evidence for the global nature of disclosure spillovers in increasingly integrated capital markets.

Several limitations should be acknowledged when interpreting our results. First, our identification strategy relies on the assumption that the timing of the Zambian Securities Exchange Act was exogenous to U.S. firms' disclosure decisions, which may not hold if firms anticipated the reform or if other concurrent events influenced both the reform and disclosure practices. Second, we cannot definitively establish the specific mechanisms through which the investor channel operates, as we do not directly observe investor demands or communications with management. Third, our measure of voluntary disclosure may not capture all forms of corporate transparency, potentially limiting the generalizability of our findings to other disclosure contexts.

Future research should explore several promising avenues. First, researchers could examine whether similar spillover effects exist for other types of foreign regulatory reforms, such as corporate governance requirements or auditing standards. Second, future studies could investigate the specific mechanisms through which investors transmit demands for increased disclosure, potentially using survey data or direct measures of investor-firm communications. Third, researchers could examine whether the documented effects vary across different types of investors, such as institutional versus retail investors, or across different geographic regions. Finally, future research could explore the long-term persistence of these disclosure effects and whether they lead to measurable improvements in firm performance or market efficiency.

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Table 1

Descriptive Statistics

Variables	N	Mean	Std. Dev.	P25	Median	P75
FreqMF	15,115	0.6167	0.9038	0.0000	0.0000	1.6094
Treatment Effect	15,115	0.5782	0.4939	0.0000	1.0000	1.0000
Institutional ownership	15,115	0.5557	0.3328	0.2470	0.6272	0.8479
Firm size	15,115	6.2355	2.0920	4.7004	6.2399	7.7034
Book-to-market	15,115	0.6535	0.6211	0.2864	0.5297	0.8725
ROA	15,115	-0.0290	0.2325	-0.0201	0.0244	0.0667
Stock return	15,115	0.0124	0.4842	-0.2589	-0.0644	0.1631
Earnings volatility	15,115	0.1318	0.2613	0.0230	0.0533	0.1344
Loss	15,115	0.3111	0.4630	0.0000	0.0000	1.0000
Class action litigation risk	15,115	0.3664	0.2946	0.1209	0.2731	0.5647
Time Trend	15,115	1.9319	1.4211	1.0000	2.0000	3.0000

This table shows the descriptive statistics. All continuous variables are winsorized at the 1st and 99th percentiles.

Table 2
Pearson Correlations
Securities Exchange Act Zambia Unsophisticated Investors

	Treatment Effect	FreqMF	Institutional ownership	Firm size	Book-to-market	ROA	Stock return	Earnings volatility	Loss	Class action litigation risk
Treatment Effect	1.00	**0.03**	0.00	**0.08**	**-0.03**	**0.03**	**0.03**	**-0.02**	**-0.08**	**-0.31**
FreqMF	**0.03**	1.00	**0.41**	**0.44**	**-0.17**	**0.22**	**-0.02**	**-0.17**	**-0.26**	**-0.03**
Institutional ownership	0.00	**0.41**	1.00	**0.63**	**-0.24**	**0.32**	**-0.03**	**-0.23**	**-0.29**	**0.06**
Firm size	**0.08**	**0.44**	**0.63**	1.00	**-0.37**	**0.35**	**0.03**	**-0.24**	**-0.40**	**0.10**
Book-to-market	**-0.03**	**-0.17**	**-0.24**	**-0.37**	1.00	**0.07**	**-0.18**	**-0.13**	**0.06**	**-0.03**
ROA	**0.03**	**0.22**	**0.32**	**0.35**	**0.07**	1.00	**0.08**	**-0.51**	**-0.59**	**-0.11**
Stock return	**0.03**	**-0.02**	**-0.03**	**0.03**	**-0.18**	**0.08**	1.00	**0.04**	**-0.08**	**0.04**
Earnings volatility	**-0.02**	**-0.17**	**-0.23**	**-0.24**	**-0.13**	**-0.51**	**0.04**	1.00	**0.33**	**0.12**
Loss	**-0.08**	**-0.26**	**-0.29**	**-0.40**	**0.06**	**-0.59**	**-0.08**	**0.33**	1.00	**0.17**
Class action litigation risk	**-0.31**	**-0.03**	**0.06**	**0.10**	**-0.03**	**-0.11**	**0.04**	**0.12**	**0.17**	1.00

This table shows the Pearson correlations for the sample. Correlations that are significant at the 0.05 level or better are highlighted in bold.

Table 3

The Impact of Securities Exchange Act Zambia on Management Forecast Frequency

	(1)	(2)	(3)
Treatment Effect	0.0579*** (6.18)	0.0517*** (4.24)	0.0409*** (4.21)
Institutional ownership		0.5615*** (11.47)	0.0768*** (2.58)
Firm size		0.1185*** (12.32)	0.0481*** (4.83)
Book-to-market		-0.0446*** (2.89)	0.0017 (0.18)
ROA		0.0344 (0.91)	0.0012 (0.07)
Stock return		-0.0480*** (4.04)	-0.0119 (1.63)
Earnings volatility		-0.0698** (1.99)	-0.0440 (0.96)
Loss		-0.1329*** (6.12)	-0.0673*** (5.52)
Class action litigation risk		-0.1746*** (5.40)	-0.0146 (1.04)
Time Trend		-0.0313*** (6.72)	-0.0069* (1.75)
Firm fixed effects	No	No	Yes
N	15,115	15,115	15,115
R^2	0.0010	0.2352	0.9111

Notes: t-statistics in parentheses. *, **, and *** represent significance at the 10%, 5%, and 1% level, respectively.