

**Assessing Financial Reporting Quality through MSCORE Model:
Economic Policy Uncertainty, Corporate Governance, and the
Moderating Role of Audit Quality**

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Abstract

Building financial confidence between businesses and their stakeholders depends on the accuracy and applicability of financial reporting. When making decisions about investments, financing, dividends, and working capital management, financial statements play a crucial role. Maintaining the financial statements' transparency is critical since users require high-quality financial information to make wise judgments in their decision making. However, the high level of economic policy uncertainty may compromise financial reporting. In contrast, the strong corporate governance mechanism plays a vital role in enhancing the financial reporting quality. This study investigated the impact of economic policy uncertainty (EPU) as macroeconomic variable on financial reporting quality and analyzes effect of corporate governance on as microeconomic variable on financial reporting quality. The study filled in the literature gap, by examining how audit quality moderate the economic policy uncertainty and corporate governance systems with financial reporting quality. The non-financial companies listed on the Pakistan Stock Exchange (PSX) between 2013 and 2024 are tapped to collect the data used in the study. To compute the financial reporting quality the earnings manipulation in the financial reports was detected using the M-Score model. This model is best tools which makes use of both specific and total accruals in the detection of earnings management. The results found that high economic policy uncertainty negatively impact the quality of financial reporting.

Conversely, corporate governance mechanism is found to have a positive relationship with financial reporting quality. Nevertheless, the earnings manipulation is mitigated by the strong corporate governance mechanism and improves the quality of financial reporting. The results also revealed that the induction of audit quality like of Big4 auditors mitigate the relationship of EPU and financial reporting quality. Moreover, the audit quality combine with the corporate governance mechanism gives a combo to enhance the financial reporting quality. This research useful in confirming the accuracy of financial reporting for the regulators. This study demonstrated that companies with high levels of economic policy uncertainty need to concentrate on providing openness in their financial statements. Additionally, in order to improve the integrity of financial reporting and lessen earnings management, businesses must implement an efficient corporate governance framework. This study is fruitful for the firms in appointing the quality auditors for auditing their financial statements. Moreover, this study provide confidence to the auditors to encourage them in building and developing more professional competencies.

Keywords: FRQ, EPU, Corporate Governance, Audit Quality, M-Score Model

Introduction

The determinants of the financial reporting quality (FRQ) are critical aspects that has drawn the attention of the accounting researchers. This disclosure is dominating the factors including, the macro-level influences, especially economic policy uncertainty (EPU), and the observable adverse effect of the EPU on financial reporting quality (Bremptie 2022; Kim & An, 2025). The later examines the firm-level mechanisms and in particular the corporate governance and its pre-existing positive impact on FRQ (Mardessi, 2022; Pobric, 2022; Chowdhury et al., 2023). However, despite the previous research done on these direct relationships, there is a critical question that has not been discussed, that the third factor, which is the audit quality, influence the relationship of these determinants with FRQ. The gap in this study is filled by investigating whether audit quality is a moderator of the EPU and FRQ. The study further investigates the audit quality as a moderator between corporate governance and FRQ. Although in the previous studies, audit quality is a direct predictor of FRQ (Dellai & Slimene, 2021; Logie & Maroun, 2021; Nguyen, 2024;). This study believe that based on the agency theory it is suggested that audit quality is not only a predictor of FRQ but also a restructure between the predictors and FRQ. The purpose of study is to investigates the relationships among EPU, corporate governance mechanisms and FRQ. Furthermore, this study also analyzes the moderating impact of Big-4 auditing firms between the relationship of EPU, corporate governance and FRQ, positing that their engagement enhances the reliability and credibility of financial statements. This research aims to bridge existing gaps in the literature by providing a comprehensive analysis of EPU (macroeconomic factors) and corporate governance mechanism to impact FRQ. Specifically, the study hypothesizes that the presence of Big 4 auditors mitigates the adverse effects of EPU on FRQ, while simultaneously reinforcing the positive impact of robust corporate governance structures. This study

contributes significantly to the discourse on FRQ by empirically analyzing the interplay between external economic conditions, internal governance mechanisms, and the crucial role of external assurance providers, such as Big 4 auditors. It examines how the enhanced audit quality provided by these prominent firms can serve as a buffer against opportunistic earnings management, thereby improving the overall credibility of financial disclosures. The financial reporting quality deteriorated when the financial reports consisted of earnings management. Earnings management (EM) is defined as the incorrect illustration of a firm's actual performance made by its insiders (Klein, 2002). Earnings management is the manipulation in the financial statements by the management to achieve personal advantage (Li et al., 2024). This investigation of this study delves into the underlying mechanisms through which Big 4 audit engagements contribute to superior financial reporting quality, considering their extensive resources, specialized expertise, and established methodologies for risk assessment in financial reporting due to earnings management. Moreover, the study considers how the reputational incentives and deeper technical capabilities inherent in Big 4 firms might enhance financial reporting quality by deterring the aggressive earnings management, among heightened economic uncertainty. It also assesses that the disciplinary function of corporate governance, particularly through mechanisms like board size, independent board, gender diversity, CEO duality, board meetings and audit committees, is further strengthened by the involvement of Big 4 auditors in restriction earnings management.

This study proposed that the joint presence of good corporate governance and Big 4 audit engagement presents a severe obstacle to the prevalence of the aggressive accounting practices and, therefore, makes the reported earnings more reliable. After all, the study will aim to offer viable suggestions to the regulators and corporate boards on how to promote a healthy financial reporting environment by a symbiotic integration of proper governance and quality external assurance. The rationale behind the research is based on the rising number of corporate failures that can be explained by fraudulent accounting reports and gaps in corporate governance and ethics, which demonstrate an urgent necessity to know how opportunistic behavior of managers affects the credibility of reported earnings (Shah et al., 2024). This will require further analysis of the determinants of earnings management and the mitigating elements that have the potential of improving the quality of financial reporting, particularly when there is volatile economic environment. As a result, the study has added to the literature by breaking down the moderating effect of Big 4 auditors and acknowledging their substantial contribution to the reduction of information asymmetry and increased transparency of the financial reporting, which is vital to the market efficiency and investor confidence. Particularly, earnings management has been at the core of corporate scandals, which leads to the emphasis on earnings management because it compromises the quality of financial reports and distorts adequate value evaluations (Lizińska & Czapiewski, 2018). Thus, the proposed study will make an extension to the previous research by taking into account the concomitant effect of macroeconomic variables, including EPU on financial reporting quality. This study further extends the current academic and practitioner controversy

on the effectiveness of different corporate governance mechanisms and external auditing to enhance the FRQ by limiting the earning management practices.

Literature Review

Agency Theory

The theoretical background to the proposed study is the agency theory, which is proposed by Jensen and Meckling (1976) elaborates on conflict of interest that may occur when ownership and control are separated, which is why the agency theory requires the application of a monitoring mechanism as a means of ensuring managerial behaviour is aligned to shareholder interests. The theory argues that the agency costs are caused by information asymmetry and risk preference differences, which are reduced with good corporate governance structures, external audit procedures. The uncertainty in economic policies worsens the problems of agency because it raises the discretion of the managers and undermines the usefulness financial information (Hassan et al., 2025). Economic Policy Uncertainty is capable of influencing the integrity of financial reporting because of increased uncertainty that may create more chances of income smoothing when the informational gap among the management and investors is more increased. Information asymmetry is being made worse by agency conflicts that prevents investors to make informed decisions in their investments because of information distortion. The benefits of shareholder costs to management are achieved by earnings management of annual reports to serve the interests of management rather than investors (Nagar et al., 2019). Corporate governance in that regard is an internal control system that reduce the opportunism of managers and improves the quality of financial reporting (Armstrong et al., 2014). whereas audit quality is an external control system that lowers the information asymmetry and guarantees the quality of financial reporting (DeFond & Zhang, 2014). The study of Dharmawati et al. (2025) reveal that independent audit committees decrease earnings management by improving audit oversight, whereas Ragab and Saleh (2025) indicate that attributes of the board and audit committee greatly affect quality audit in the emerging markets. This study contributes to the agency theory by extending the body of knowledge while introducing an interaction between the relationships of EPU corporate governance and FRQ. This analysis is more fruitful in mitigating the agency conflict in a better way.

Financial Reporting Quality

Financial reporting quality (FRQ) involves comprehensive corporate systems that provide precise financial data to accurately reflect the firm performance and maintain transparency and credibility (Ozer et al., 2024). Since all choices about financing, investments, working capital management, and dividend policy are based on the financial statements, the integrity of financial reporting is the most important factor in decision-making. Maintaining the integrity of financial accounts is necessary to maintain the users' ability to make sound decisions. Hasan et al. (2022) asserted that financial reporting is primarily prepared by management to serve their interests, which is why they engage in earnings management activities. Earnings management is the misleading portrayal of firm's real picture of performance by management (Klein, 2002). This occurs when managers improperly exercise their discretion to manipulate

contractual outcomes affected by disclosed information, or when they misrepresent transactions in financial reports and deteriorate the quality of financial reporting. Over the last decades, the earnings management has remained a major issue among corporations worldwide, being compounded by the increase in competition and the introduction of new players into the market (Marchellina & Firnanti, 2021). This has resulted in many financial scandals that managers have indulged in fallacious and discretionary reporting to hide financial woes, overstate revenues, and artificially inflate profits, and thus, undermining the integrity of financial statements (Akhtar et al., 2019). This is especially common in the emerging markets and tends to enhance information asymmetry and high cost of debt to firms that are perceived to be carried out with respect to such activities (Shen and Huang, 2011). There is some evidence that effective corporate governance systems and investor protection play a vital role in impeding the managerial motivation and capacity to practice earnings management, thus improving the quality of earnings reported (Campa, 2018). On the other hand, the financial reports may be easier to control by managers with weak governance structures and a lack of strict controls, especially when they strive to obtain certain earnings or obtain personal gains (Wagener, 2023).

Nexus between EPU and FRQ

This study examines the intersection point between the uncertainty of economic policies and quality of financial reporting, and hypothesizes that the increased economic policy uncertainty (EPU) will encourage the managers to practice earnings management because of the uncertainty of economic conditions and regulatory environments. This uncertainty usually prompts companies to smooth earnings in a bid to minimize the perceived risk and retention of investors hence affect the credibility and reliability of disclosure of financial information (Bhattacharya et al., 2009). The motive of such behavior is often the need to create the impression of a sound financial perspective within the fluctuating external environment, which can result in the general decline of the quality of financial reporting (Omolorun & Abilogun, 2017). Additionally, the managers can use the earnings management methods strategically to either meet or exceed the earnings forecast so as to reduce the negative market responses to EPU-related volatility (Saleh et al., 2020). This is a strategic control that transforms to be a compensatory mechanism and enables the firms to present a sense of stability even in the face of significant external economic pressure. This phenomenon poses considerable problems to investors and regulators who strive to get transparent and reliable financial information because EPU can increase incentives to manage earnings and at the same time complicate its detection. Therefore, EPU has a complex effect on the quality of financial reporting, as it affects either the discretionary nature of the accounting practice or it is directly related to the operational decisions that are underlie financial performance reporting. In particular, when uncertainty is high, it may make firms resort to either accrual-based or real activities earnings management as a strategic reaction to stay financially stable and earn the trust of investors (Pustylnick et al., 2017). Mainly due to the fact that EPU enhances risk and uncertainty of future cash flows and investment opportunities, firms would change their financial reporting to depict a more stable and positive situation to

their stakeholders (Appiah-Otoo, 2021). Moreover, the increased level of EPU has been empirically associated with higher volatility in the returns on assets and negative effect on the firm-level investment decision that can indirectly affect the range and practice of earnings management by firms and deteriorate quality of financial reporting (Sadhvani et al., 2019; Chu & Fang, 2020). This study posits that;

H1: Economic Policy Uncertainty declines the FRQ.

Nexus between Corporate Governance and FRQ

The firm's corporate governance practices that are effective play a critical role in improving the quality of financial reporting by ensuring that effective internal controls are put in place, creating transparency, and reducing the opportunistic earnings management (Bhasin, 2015). The oversight established by a robust governance structure including well governed board size, independence of board, free from CEO duality, enough board meetings, and presence of an effective audit committee would restrict managerial discretion and increase compliance with accounting standards, therefore, lowering the risk of biased financial disclosure (Garcia-Sanchez & Noguera-Gamez, 2018; Nguyen, 2024). This is an important oversight in making sure that financial statements do not just represent a legal form but the economic substance of the transactions (Zhang, 2023). Corporate governance processes including strong internal audit departments and well-developed codes of ethics are also useful in instilling a culture of responsibility that will deter fraudulent reporting and increase the quality of financial information (Natto & Mokoaleli-Mokoteli, 2025). The studies suggested that an ample board size compliance with code of corporate governance with the large independent board of directors is helpful to increase the governance monitoring (Khan, 2022). Moreover, a mix of gender in the board increase the capability of governance mechanism. According to Abu-Afifa et al. (2024) the presence of even one female director makes the board stronger for monitoring. The CEO whose is also a chairman is good for a robust governance as it creates opportunistic behaviour for manipulation in the earnings (Idris et al., 2018). The consistent board meetings make the organizational control more effective. The frequency meeting of the board enables the board to see the picture of the firm more clearly. the existence. Finally, the presence of an audit committee is a crucial element of the board which is responsible for overseeing a company's financial reporting, auditing processes and internal controls (Idris et al., 2018; Khan, 2022; Waris & Din, 2023).

H2: Corporate Governance mechanism improve the FRQ.

EPU and FRQ are Moderated by Audit Quality

The likelihood of corporate fraudulent activities is relatively higher in high economic policy uncertainty. EPU enables the managers to more prone to opportunistic behaviour in elevated uncertainty and impair the quality of financial reporting (Hou et al., 2021). According to Dellai and Slimene, (2021) the quality auditors such as Big 4 auditors ensure the transparency and trustworthiness of financial statements by providing the services in accordance with accounting standards. The Big 4 auditors

have the expertise in working the diverse environment so they have the capability to cope up with the auditing challenges even in high EPU (Logie & Maroun, 2021). An essential skill for an auditor to possess is a deep comprehension of the laws, regulations, risks, and challenges specific to a given firm. Professional auditors may evaluate the market, the company's model, and the critical success factors in order to forecast financial performance and risks (Vitali & Giuliani, 2024). Big audit firms are more motivated to offer high-quality audit services. These companies are more likely to work to safeguard them against litigation and reputational danger. Compared to small audit firms, these large audit organizations are more adept at providing high-quality audits. This growing uncertainty brought to light the crucial role that Big 4 auditors and other external assurance providers play in mitigating possible agency problems and bolstering the accuracy of financial statements. Yu et al. (2021) suggested that the Big 4 auditors' involvement and activities, which are noteworthy for their substantial resources, expertise, and reputation, significantly moderate the relationship between EPU) and FRQ, thereby supporting market efficiency and investor confidence. Given that Big 4 organizations suffer more reputational damage, Big 4 auditors lessen opportunistic executive behavior. The idea that Big 4 firms have superior legal and technical knowledge, enabling them to recognize and challenge aggressive accounting practices more effectively than non-Big 4 firms, increases the preventative impact (Alles & Gray, 2016). This study posits that in heightened EPU the Big-4 auditors audit the financial reports more rigorously and mitigate the effect of EPU on FRQ.

H3: EPU and FRQ are substantially mitigated by Audit Quality.

Corporate Governance and FRQ are Moderated by Audit Quality

One of the fundamental elements of the earnings management is the intentional interference in the financial reporting process that is aimed at the realization of certain personal benefits or stable profitability (Tulcanaza-Prieto et al., 2020). This entails the discretion of the management in the application of accounting principles to affect the reported earnings towards different aims like achieving the analyst forecasts or agreements (Yassin et al., 2024). Such manipulation may result in gross financial frauds, which can be seen in the example of Enron and WorldCom, which seriously affected stakeholders and shook public confidence in financial markets (Arita et al., 2021). The moral consequences of such fraudulent activities are enormous because they weaken the honesty and integrity of financial reports that play a vital role in making informed decisions by stakeholders endangering the smooth operation of the economy (Fowler, 2023). Internal controls, such as board size, board independence, CEO duality, board meetings, and effective audit committee, are the key factors with the potential to reduce propensity to earnings management, which can help improve the quality of financial reporting (Khan, 2022; Nguyen, 2024). This system of internal oversight, in combination with external auditing, produces a synergistic effect, which further limits the opportunities to engage in opportunistic accounting (Fang et al., 2022). Having an independent board and an active audit committee can greatly

decrease the chances of the opportunistic character of the management, which would encourage increased transparency in the financial disclosures (Wati et al., 2020). In the case of Big 4 auditors, their high scrutiny of financial statements adds to these internal controls, and the principles of corporate governance are converted into the real reporting integrity (Derbali et al., 2020). Their independence and expertise also increase the credibility of financial reports that can help avoid earnings manipulation even in operational settings with different levels of volatility (Chan et al., 2012; Widarti et al., 2018). This mutual relation amidst adequate internal control and high-quality external audit is an effective deterrence against the cosmetic hiding of earnings, which is a typical pursuit by companies to attain intended motives (Busirin et al., 2015). This concealment is sometimes done through the application of creative accounting, in which professional judgment is deployed to deliberately distort financial information to create positive results (Abed et al., 2022). This deception, which is commonly referred to as earnings management, may result in the variance between reported earnings and the financial performance in reality contemplating whether a company is in a healthy financial situation or not (Chu et al., 2019). This financial reporting manipulation, which is usually motivated by management motives, is a big challenge to investors and even the regulation bodies aiming to get the right financial information (Soon, 2011). Therefore, transparency and quality of earnings should be enhanced to avoid these intentional misstatements and provide the stakeholders with quality financial information, but regulatory actions to do so may lead to unintentional amplification of real earnings management (Ibrahim et al., 2020). This brings out the improvement landscape of financial reporting, where governance and quality auditing interaction do play a major role in determining the veracity of the disclosed financial information, and contributes to the reliability of the information used by the users and continues to enhance the quality of financial reporting.

H4: The relationship between Corporate Governance mechanisms and FRQ is greatly improved by Audit Quality.

Theoretical Framework

The study comprises one dependent variable (DV) financial reporting quality. Economic policy uncertainty and corporate governance are taken as independent variables. This study inducted audit quality as a moderator between economic policy uncertainty, corporate governance and FRQ.

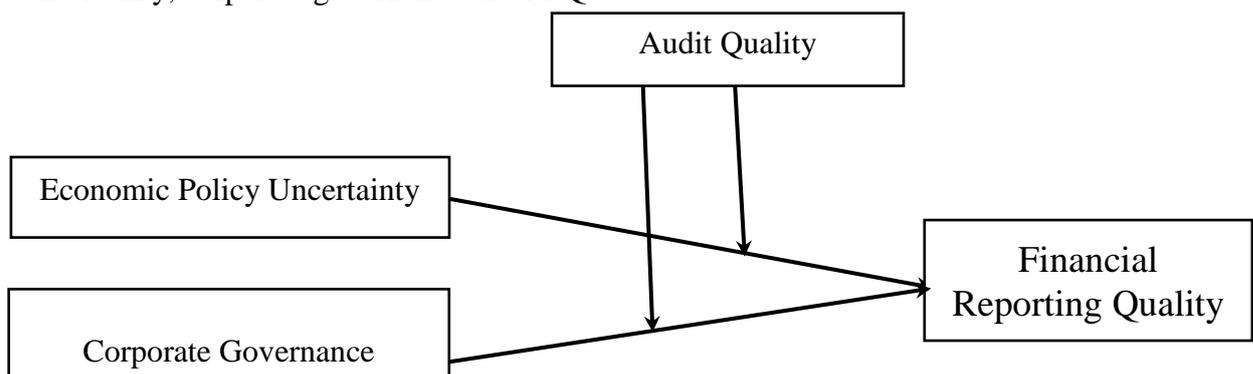


Figure 2.1: Theoretical Framework

Methodology

According to Masud et al. (2018) there is inadequate shareholder protection in the developing nations. Pakistan is a developing nation and prior literature highlighted the financial reporting and governance challenges in Pakistan (Shah et al., 2024). This study has used the non-financial sector of Pakistan as a sample size. The non-financial sector of Pakistan, is a leading contributor to the economy, and sharing the highest portion in the GDP of the country (Rashid & Bilal, 2020). The data is collected through the annual reports of non-financial firms listed on Pakistan stock exchange (PSX). The firms with missing data have been removed and the final set of 358 firms are selected. The timeframe scope for the data utilized in the analysis of this study spans 12 years, specifically from 2013 to 2024. This study spans from 2013 owing to particular contextual considerations. The time period of the study is underpinned based on the governance measures subsequent to the implementation of significant corporate governance reforms in 2012. According to Shakri et al. (2024) over the last two decades, there are significant regulatory improved in the corporate governance framework in Pakistan. The Companies Act of 2013 included modifications to financial disclosure, auditor independence, and corporate governance. The security exchange commission of Pakistan started the implementation of these reforms to increase the financial transparency. Financial firms are excluded from the analysis due to their separate accounting systems, capital structures, disclosure requirements, legislative and governance system comparative to non-financial firms (Akter et al., 2024). In order to maintain data homogeneity this study covers only non-financial sector firms.

Measurement of Variables

This section describes the measurement strategy that will be adopted in all the variables incorporated in the study. All variables are operationalized with the help of different proxies and formulas which are widely used in the previous literature in order to achieve consistency, reliability, and comparability of the results.

Computation of Financial Reporting Quality

In this study FRQ is measured through the detection of earnings management by using the Beneish M-Score model created by Messod Beneish that identifies the probability of earnings management by a combination of financial ratios (Beneish, 1999). The model is comprised of eight indices that include Days' Sales in Receivables Index (DSRI), Gross Margin Index (GMI), Asset Quality Index (AQI), Sales Growth Index (SGI), Depreciation Index (DEPI), Sales General and Administrative Expenses Index (SGAI), Leverage Index (LVGI), and Total Accruals to Total Assets (TATA). The fact that M-Score is above the threshold value of -2.22, makes a firm a potential manipulator and a score lower than this indicates a reduced likelihood of earnings manipulation. It is believed that M-Score model is a powerful tool of earnings management discovery, and has been previously used in numerous

studies. Different studies are confirming that during the determination of the quality of the financial reporting, MSCORE is the most suitable instrument in identifying the earnings management in the financial statements (Beneish et al., 2013; Talab et al., 2017; Holda, 2020). The manipulators and the non-manipulators firms are given the values of 1 and 0 respectively. Such a binary coding scheme, in its turn, permits this study to execute the determinants of the reporting quality on the basis of the logistic regression. The firms with M-Score value lower than (-2.22) represent the high financial reporting quality and assigned the value 1 (FRQ = 1). In contrast, the firms with M-Score value greater than (-2.22) benchmark, that company is said to be an earnings manipulator and represents the lower financial reporting quality by assigning the value 0 (FRQ = 0). The following is the M-Score model to gauge the financial reporting quality:

$$\begin{aligned} \text{M - Score} = & -4.84 + 0.920 * \text{DSRI} + 0.528 * \text{GMI} + 0.404 * \text{AQI} \\ & + 0.892 * \text{SGI} + 0.115 * \text{DEPI} - 0.172 * \text{SGAI} + 4.679 \\ & * \text{TATA} - 0.327 * \text{LVGI} \dots \dots \dots \text{(Eq 1)} \end{aligned}$$

Economic Policy Uncertainty

An Economic Policy Uncertainty Index created by Baker et al. (2016) is used to measure EPU. Uncertainty associated with economic policy is captured by the index based on the frequency of newspaper-based coverage of the uncertainty terms associated with policies. In particular, the index uses words related to economic conditions (economic or economy), policy-related ones (fiscal policy, taxation, regulation, government spending, or central banking), and words related to uncertainty (uncertain, uncertainty, or risk). The increase of index values means that there is increased uncertainty in economic policy environment. The standardized monthly indexes are summed to generate annual averages to be used in the empirical analysis. An increase in the index values shows more uncertainty in the economic policies of the government, regulatory measures, and reasonable decision-making on the macroeconomic front. The second empirical study of the effect of policy uncertainty on corporate behavior involves the annual EPU values being used as a proxy of macroeconomic uncertainty, as has been done in previous empirical studies (Baker et al., 2016; Choudhary et al., 2020 Lee & Jeong, 2024). “EPU Index t ” represents the economic policy uncertainty index for month (t). “ C_t ” refers the number of the words or sentences in a given month (t). “ T_t ” represents the quantity of articles published during the month (t).

$$EPU\ Index_t = (C_t) \times 100 \dots \dots \dots \text{(Eq 2)} \\ T_t$$

Corporate Governance

Corporate governance has a broad spectrum of attributes, which indicate the management framework, practices of a company, and aspects of culture. According to the literature on corporate governance a well governed board size, independence of

board, free from CEO duality, presence of female on the board, enough board meetings, and presence of an effective audit committee are considered as the important features of strong corporate governance mechanism (Khan, 2022). When a corporation governance index is constructed, a firm could be considered well-governed when it has more than the minimum number of board of directors specified in the law (Idris et al., 2018; Nguyen et al., 2024). When the board is well regulated, the value of the board is one, otherwise it is zero. The agency theorists emphasize the importance of the external directors as an important internal governance structure that controls the self-serving actions of managers and removes managerial opportunism, which improves the efficacy of boards (Jensen & Meckling, 1976). When the majority of the directors are the non-executive directors of the board, then the indicator is given a value of one; when they are not, the indicator has a value of zero. Arun et al. (2015) evaluated the relationship between the earnings management and female directors and revealed that the more female directors one has, the lower the earnings manipulation they have. The diversity of gender indicator, therefore, takes a value of one when there is at least one female representative on the board of directors; otherwise, the diversity of the genders will be zero (Abu-Afifa et al., 2024). The study of Lo et al. (2010) found that chief executive duality encourages opportunistic behaviour amongst the managers, especially in manipulation of transfer pricing. The indicator is given a value of one when the CEO is not a chairman or a value of zero when he (CEO) is not a chairman. The number of board meetings can be increased to improve corporate governance. The board of directors also holds periodic meetings and this has led to the reduction of fraud cases and improved financial performances (Salleh & Othman, 2016). The board meetings should be as per the code of governance, it should have a value of one, and otherwise, it is zero. Audit committee is an important part of corporate governance as it is involved in control of financial reporting. This creates transparency and accountability as a guarantee that financial statements are not compromised and that they abide by law (Al-Baidhani, 2014). When the audit committee exist then it is given a value of one and in case not then a value of zero. The total of all the indexes will make the CG-Index (Thanh et al., 2024) highlighting that the indices are meeting the requirements of code of corporate governance (CCG).

CG-Index = Sum of all 6 Index

Table 3.1: Elements of Corporate Governance

Indicator	Indices	Measurement Description	References
Board Size	Index 1	Shows the board of directors' composition. When the size of the board is in line with the requirements of the CCG the board size will be assigned a value of 1, otherwise, the size will be assigned 0.	Idris et al., (2018) Khan, (2022) (Waris & Din, 2023)

Board's Independence	Index 2	Portray the independent directors on the board. If the number of independent directors meets requirement of CCG, give value 1, otherwise 0.	Abu-Afifa et al., (2024)
Gender diversity	Index 3	If there is presence of even a single female on the board, allot the value 1, otherwise 0.	
CEO duality	Index 4	It is equals to 1 in case of no CEO duality, otherwise 0.	
Board meeting	Index 5	If the number of meetings attending by the board is as per CCG, assigned value 1, otherwise 0.	
Aduit committee	Index 6	The presence of internal audit committee show value 1, otherwise 0.	

Audit Quality

The previous literature suggests the importance of quality audit in monitoring the firms. Audit quality effects have received a lot of research on the effects of audit quality on the FRQ. The quality of auditing appears to be the quality of non-observable competency that is the most valuable attribute in the past studies. Analytically, the audit firms (as big 4) are likely to undertake tasks in a competent manner because they have more information and expertise based on their skilled teams. Boubaker et al. (2018) documented that the Big-4 auditors possess abundant information and proficiency due to the huge client base they have. The large portfolio enables the auditors to interact and socialize with numerous clients at the same time and improves their field of expertise. The auditors work in big audit firms, which provides them with a better local network support in the context of collaborative team support (Garcia-Blandon et al., 2019). In the research conducted by Lopes (2018) to investigate the earnings management within the firms, the study highlighted that employment of Big 4 audit firms offers an efficient scale of services in regards to audit quality to mitigate the earnings manipulations. The Leung et al. (2019) also concluded that big audit firms provide the quality of audit in comparison with other auditors. The greater incentives that large auditors have is to provide valuable services since they expose their clients to a greater reputational risk and exposes big litigation risk to their deep pockets. The Big 4 auditor gives strong and useful way of quantifying audit quality. Big 4 auditor is a common tool to be used in measuring audit quality in recent studies Garcia-Blandon et al. (2019); Rajeevan and Ajward (2020); Chowdhury and Eliwa (2021); Bawuah (2024). The Big 4 audit firm proxy is the measurement of audit quality that is being selected in this study. With the use of a dummy variable, the firms with Big 4 auditors will be assigned 1 and the firms with non-Big 4 audit firms will be assigned 0.

Econometric Model

FRQ refers to financial reporting quality and computed through the M-Score model. EPU refers to economic policy uncertainty and computed with the help of EPU index. CG refers to Corporate Governance and measured with the help of CG Index. The Big4 is the proxy used to measure the audit quality as a dummy variable. The econometric model of the study is as follows:

$$\ln\left(\frac{P(FRQ_{it}=1)}{1-P(FRQ_{it}=1)}\right) = \beta_0 + \beta_1(EPU)_{it} + \beta_2(CG)_{it} + \beta_3(EPU * Big4)_{it} + \beta_4(CG * Big4)_{it} + e_{it} \dots \dots \dots (Eq 3)$$

Results and Analysis

Table 4.1: Descriptive Statistics of Variables

Variables	Obs	Mean	SD	Min	Max
FRQ	4,296	0.664	0.473	0	1
EPU	4,296	105.322	47.741	50.130	190.362
CG	4,296	4.907	1.388	2	6
Big4	4,296	0.624	0.484	0	1

Table 4.1 reports the descriptive statistics for the study variables. Financial reporting quality has a mean of 0.664, indicating that approximately 66% of firm-year observations are associated high financial reporting quality (FRQ = 1). Economic policy uncertainty has an average value of 105.322 with substantial variation (SD = 47.741) with a minimum value of 50.130 and maximum value of 190.362 indicating the fluctuation in the uncertainty in economic policies during the observation period. Corporate governance shows an average value of 4.907, standard deviation of 1.388 and values range from 2 to 6 scale, indicating reasonable governance strength across firms. The audit quality has a mean value of 0.624 and variation of 0.484 with a minimum and maximum value if 0 and 1 respectively, reflecting the firms audited by Big 4 auditors

Table 4.2: Correlation

	FRQ	EPU	CG	AQ
FRQ	1			
EPU	-0.033**	1		
CG	0.189***	-0.005*	1	
Big4	0.101**	0.001*	0.038**	1

p < .05. ** p < .01. *** p < .001

Table 4.2 presented the correlation coefficients among the study variables. Financial reporting quality is negatively correlated with EPU with value of -0.033, highlighting in high EPU there is low financial reporting quality. The correlation between FRQ and corporate governance is positive with a correlation value of 0.189 indicating that stronger governance is associated with high quality of financial reporting. Financial reporting quality is showing correlation value of 0.101 with Big 4 auditors, portraying that high audit quality tend to have slightly improved financial reporting quality. Corporate governance is showing correlation values of -0.005 with EPU. This is showing that an increase in the EPU is correlated with the slight decline in the corporate governance. Big 4 audit quality is positively related to EPU, which shows a direct relationship with a correlation value of 0.001. Corporate governance is showing correlation value of 0.038 with Big 4 auditors signifying that the quality of audit is slightly better in firms with higher governance mechanisms.

Table 4.3: Likelihood Ratio (LR) Test (Pooled vs Panel Logit)

Test	Chi-square	df	p-value
LR test of rho = 0	0.84	1	0.180

The likelihood-ratio test is used to test the statistical relevance of unobserved firm-level heterogeneity. The null hypothesis (H0) is that $\rho = 0$, which means that no firm-level variance and that pooled logit is adequate. The second hypothesis (H1) is the ρ is greater than zero, meaning that there is a heterogeneity that is specific to firm, and a panel logit is needed. The LR test yields $\chi^2(1) = 0.84$, $p = 0.180$. The p-value is greater than 0.05 and therefore we cannot reject the null hypothesis. It means that the heterogeneity of firms is not statistically significant and, in this case, the pooled logit model is more suitable (Baltagi, 2021; Greene, 2019).

Table 4.4: Pooled Logit Regression Results
 Dependent Variable: Financial Reporting Quality

Variable	Coefficient	Std. Error	z	Prob.
EPU	-0.003	0.001	-2.92	0.002**
CG	0.297	0.028	10.60	0.000***
Big4	0.176	0.090	1.966	0.049
Big4*EPU	-0.008	0.003	-2.54	0.011
Big4*CG	0.216	0.041	5.19	0.000
C	2.608	0.167	15.56	0.000

LR chi2(5) = 418.20 Prob > chi2 0.000 Pseudo R²
 of 0.076

The pooled logistic regression results in Table 4.4 indicated that the model is highly significant with LR $\chi^2(5) = 418.20$, $p < 0.001$ and with a Pseudo R^2 of 0.076. EPU exerts a negative and statistically significant influence with $\beta = -0.003$ and $p = 0.002$, suggesting that higher policy uncertainty reduces the likelihood of FRQ. The findings are in line with the study of Yung and Root (2019) that economic policy uncertainty reduce financial reporting quality. Corporate governance is strongly positive and statistically significant with FRQ with $\beta = 0.297$ and $p = 0.000$, demonstrating that better governance substantially enhances the FRQ. The findings are consistent with Salehi et al. (2023) that a robust governance mechanism help in improving the financial reporting quality by mitigating earnings management. The moderating role of Big 4 auditors is underscored by the significant interaction terms. The interaction of Big 4 with EPU is negative with $\beta = -0.008$ and $p = 0.011$, suggesting that the presence of Big 4 auditors help in mitigating effect of economic policy uncertainty on FRQ. The interaction of Big 4 with CG is negative with $\beta = 0.216$ and $p = 0.001$, indicating that Big 4 auditors strengthen the disciplining role of corporate governance. According to Cui et al. (2021) in situations of higher uncertainty, the management can resort to earnings manipulation to achieve the financial goal and keep investors trusting them. The engagement of well-known auditors, the Big-4 can further scrutinize the financial reporting process. Furthermore, the practices of earnings management are being mitigated by the high-quality auditors having a robust corporate governance mechanism. External auditors like the Big 4 who verify the integrity and adherence to the accounting standards make the financial statements more reliable. Quality audit related to financial reporting system of a company is linked to the value of financial reporting system, and the induction of quality auditors contributes to enhance the creditability of the financial reporting system (Rehman & Hashim, 2018).

Conclusion

This study offered insights in examining the factors that effecting the financial reporting quality. This included a synthesis of the current understanding of factors influencing financial reporting quality particularly in volatile economic environments (Lee & Juang, 2024). This study also investigated the critical moderating role of Big 4 audit firms in this dynamic, assessing their influence on mitigating earnings management practices amidst these economic and governance pressures (Mwangi, 2024). This comprehensive approach aims to contribute significantly to the existing body of literature by offering a nuanced understanding of the complex interplay between macroeconomic factors, internal governance structures, and external assurance mechanisms in shaping FRQ. Specifically, it investigated that the presence and characteristics of Big 4 auditors reduce the tendency for earnings management. This research is therefore poised to offer critical insights into the efficacy of robust corporate governance frameworks and the role of external audit mechanisms in fostering financial reporting credibility under varying economic conditions, ultimately reinforcing the foundational principles of transparency and accountability in capital markets (Surifah, 2017). This study found that the economic policy uncertainty

reduces the FRQ (Biswas et al., 2025). Moreover, the study revealed that the corporate governance mechanism enhances the FRQ (Pobric, 2022). This study contributed by revealing the findings that Big 4 auditors moderate the relationship of EPU and corporate governance with financial reporting quality. The Big 4 auditors mitigate the adverse effect of EPU on financial reporting quality. In addition, the Big 4 auditors also enhance the relationship of corporate governance and financial reporting quality by providing high auditing services and mitigating the impact of earnings management, hence improve the financial reporting quality. The study thus aims to support to the ongoing discourse regarding financial transparency and accountability, particularly by contributing that external auditing influences the relationships of EPU and corporate governance with quality of financial reporting. This study endeavors to bridge this gap by providing empirical evidence on these complex interrelationships, offering valuable insights for regulators, investors, and corporate managers. The study is helpful for the firms to ensure the robust corporate governance mechanism to enhance the integrity of financial reports. Moreover, the study is fruitful for the firms to appoint the Big 4 auditors to ensure the credibility of financial reports. This study is also a motivation for the non-big 4 auditors to increase their audit skills and competences. The study has few limitations including that the study is limited to some factors effecting the financial reporting quality. Due to time constraints all factors effecting the financial reporting quality are not able to undertaken in the study. The study's time span started from 2013 due to data availability of economic policy uncertainty. The study has some recommendations for the future research. Future research can be conducted by covering the risk factors effecting the financial reporting quality. Moreover, future research can be conducted by investigating the factors effecting financial reporting quality by tapping the financial sector.

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