

Rethinking Auditor Independence: Evidence from High-Corruption Environments

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ABSTRACT

Objectives: This study re-examines the concept of auditor independence in high-corruption environments, arguing that independence is not merely a professional attribute, but an outcome constrained by multilevel institutional, organizational, and individual pressures.

Methodology: The study identifies the determinants of auditor behaviour through a survey analysed using exploratory factor analysis (EFA).

Finding: We identify eleven interrelated factors shaping auditor behaviour, which cluster into three dimensions: (1) Capability and Stance, (2) Alignment and Resourcing, and (3) Protection and Pressure. The findings suggest that auditors operate not as fully independent monitors but as **constrained agents embedded within corruption-prone systems**, where institutional pressures, organizational incentives, and personal risks jointly shape audit outcomes.

Conclusion: This study shifts the conceptualization of auditor independence from an assumed professional condition to a context-dependent outcome. By integrating agency, fraud-triangle, and institutional perspectives, we show that the audit expectation gap reflects structural constraints rather than mere misunderstanding of auditor roles.

Keywords: Audit Expectation Gap; Auditor Independence; Corruption and Governance; AEHCE Framework; Agency Theory; Institutional Theory; Fraud Triangle.

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INTRODUCTION

The dominant view in auditing research conceptualizes auditors as independent monitors who mitigate agency conflicts by providing objective assurance over financial reporting (Jensen & Meckling, 1976; Watts & Zimmerman, 1983; DeAngelo, 1981). However, this assumption becomes increasingly problematic in high-corruption environments, where auditors operate within complex systems characterized by political influence, weak enforcement, and relational contracting (Jeppesen, 2019; Sikka et al., 2009; Hope et al., 2008). In such contexts, independence cannot be treated as an exogenous professional attribute. Rather, it is shaped—and often constrained—by institutional pressures, organizational incentives, and personal risks (DiMaggio & Powell, 1983; Scott, 2008; Bazerman et al., 2002). This study therefore re-examines auditor independence not as a static condition, but as a context-dependent outcome emerging from embedded agency relationships within corruption-prone systems. We argue that auditors in high-corruption environments are better understood as constrained agents, whose ability to act independently is systematically influenced by multilevel factors beyond their formal professional mandate. This perspective shifts the focus from whether auditors are independent to why and under what conditions independence becomes difficult to sustain.

Financial corruption remains a persistent challenge in emerging economies, particularly in sectors such as construction and property, where large public contracts and complex procurement systems create significant opportunities for abuse. Despite decades of governance reforms—including audit rotation, transparency initiatives, and strengthened oversight—corruption scandals continue to undermine confidence in financial reporting and audit quality (Johnston, 2015; Gorshunov et al., 2021; Gandossy & Sonnenfeld, 2005). In Indonesia, these concerns are especially acute, as the construction sector consistently ranks among the most corruption-prone industries (Hansen, 2024; Setiono, 2021). Practices such as inflated project costs, collusive bidding, and bribery expose persistent weaknesses in both corporate governance and external audit oversight.

At the centre of this issue lies the audit expectation gap—the divergence between public expectations of auditors and auditors' perceived responsibilities (Humphrey et al., 1992; Kumari & Ajward, 2023). While auditing standards require reasonable assurance that financial statements are free from material misstatement, they do not explicitly mandate the detection of corruption (Jeppesen, 2019). Nevertheless, auditors are widely expected to act as deterrents to fraud and corruption, particularly in high-risk environments (Kassem & Higson, 2016). The persistence of major corruption scandals despite repeated audits raises critical questions about the practical meaning of auditor independence and the conditions under which it can be sustained.

From a theoretical perspective, this tension reflects the intersection of three complementary frameworks. Agency theory highlights how information asymmetry between principals and agents creates monitoring challenges (Jensen & Meckling, 1976). Fraud-triangle theory explains how pressure, opportunity, and rationalization drive unethical behavior (Cressey, 1953; Skousen et al., 2009). Institutional theory emphasizes how organizational and social environments shape professional behavior through coercive, normative, and cultural pressures (Scott, 2008). Taken together, these perspectives suggest that auditor behavior is not solely governed by professional standards, but is deeply embedded within broader economic, organizational, and institutional structures.

These dynamics are particularly visible in Indonesia's construction sector, where multilayered agency relationships create complex accountability structures. Corporate

managers, government project owners, and citizens occupy interconnected principal–agent roles, while auditors act as intermediaries within this chain. In high-corruption environments, these relationships are often distorted by political patronage, informal payments, and reciprocal obligations. As a result, auditors may face competing pressures that limit their ability to challenge clients or report irregularities, leading to the rationalization of inaction. Such conditions make the construction sector a critical context for examining how auditor independence is shaped—and constrained—in practice.

Although prior studies have examined audit quality and corruption, they typically focus on isolated determinants such as audit fees, experience, or governance mechanisms (Contessotto, et al., 2019; Hadjigavriel et al (2025). Few studies have systematically examined how multilevel factors—individual, organizational, and institutional—interact to shape auditor independence and effectiveness, particularly in high-corruption environments. Moreover, existing evidence is largely drawn from developed economies, limiting our understanding of how these dynamics operate in contexts characterized by weak enforcement and relational contracting.

To address this gap, this study proposes the Auditor Effectiveness in High-Corruption Environments (AEHCE) framework as the final conceptual outcome of the exploratory factor analysis (EFA) conducted in this study. The study addresses the following research question: What factors affect auditors’ behaviour when conducting financial audits in high-corruption environments? The AEHCE framework is presented as a propositional conceptual model grounded in the eleven empirically derived EFA factors and their theoretical interpretation. It is not presented as a statistically validated structural model. Further research is therefore required to operationalise its domains, formulate testable hypotheses, and evaluate its measurement and structural properties using confirmatory factor analysis (CFA) and structural equation modelling (SEM). This study employs an exploratory mixed-methods approach, with EFA used to identify the underlying factor structure (Costello & Osborne, 2005).

This study identifies eleven interrelated components of auditor behaviour. These components are synthesized into three overarching dimensions: (1) Capability and Stance, (2) Alignment and Resourcing, and (3) Protection and Pressure. A central finding of this study is that auditors in high-corruption environments do not operate as fully independent monitors. Instead, they function as constrained agents embedded within corruption systems, where institutional pressures, organizational dependencies, and personal risks limit their ability to act independently. This study contributes to the literature in three ways. First, it challenges the assumption in agency theory that auditors function as independent monitors, showing instead that they are embedded within extended and competing agency relationships. Second, it extends fraud-triangle theory by demonstrating that rationalization is reinforced by systemic conditions rather than solely individual cognition. Third, it advances institutional theory by explaining how coercive, normative, and relational pressures produce an accommodative audit equilibrium, in which independence is maintained symbolically but constrained in practice. Together, these contributions reposition auditor independence as a contingent and emergent outcome, rather than a fixed professional attribute.

The remainder of the paper is organized as follows. Section 2 reviews the literature on auditor independence, audit expectation gaps, and corruption. Section 3 outlines the research methodology. Section 4 presents the findings and introduces the AEHCE framework. Section 5 concludes with implications and directions for future research.

LITERATURE REVIEW

Rethinking the Audit Expectation Gap

Prior research has predominantly conceptualized the audit expectation gap as a knowledge or communication gap between auditors and stakeholders (Humphrey et al., 1992; Kumari & Ajward, 2023). Under this view, the gap arises because users of financial statements overestimate auditors' responsibilities, particularly with respect to fraud and corruption detection. While this perspective has informed regulatory and educational responses, it offers a limited explanation for the persistence of audit failures in environments characterized by systemic corruption. This study reframes the audit expectation gap as a structural outcome of multilevel constraints that limit auditor action. In high-corruption environments, the gap cannot be fully explained by misunderstanding alone; rather, it reflects the conditions under which auditors operate, including institutional weaknesses, organizational dependencies, and personal risks. This shift in perspective redirects attention from communication deficiencies to embedded constraints on auditor independence and effectiveness.

Agency Theory and the Limits of Auditor Independence

Agency theory posits that auditors serve as independent monitors who reduce information asymmetry between principals and agents (Jensen & Meckling, 1976). However, this assumption relies on the premise that auditors can operate independently of the economic and institutional forces surrounding them. In practice, particularly in emerging economies, this condition is rarely met. In high-corruption contexts such as Indonesia, persistent issues including political intervention, concentrated ownership, and weak enforcement mechanisms undermine the effectiveness of formal governance structures (Dragomir et al., 2021; Al-Faryan, 2024). Corruption—defined as the abuse of entrusted authority for private gain (Shleifer & Vishny, 1993)—is often embedded in patron–client relationships, where informal obligations and reciprocity take precedence over formal accountability (King, 2000; Uberti, 2016).

Within such systems, auditors are not external observers but participants in extended and distorted agency chains, where multiple principals—including clients, regulators, and political actors—exert competing demands. As a result, auditor independence becomes constrained by conflicting incentives and relational pressures. This suggests that, rather than functioning as independent monitors, auditors may be better understood as constrained agents operating within complex governance systems.

Fraud Triangle and the Normalization of Auditor Inaction

The fraud triangle framework (Cressey, 1953) explains unethical behaviour as the interaction of pressure, opportunity, and rationalization while behavioural perspectives further suggest that psychological and sociological factors shape how individuals perceive, justify, and respond to fraudulent situations (Ramamoorti, 2008).. While traditionally applied to auditees, this framework is equally relevant to auditors operating in high-risk environments. Auditors may face pressures such as client dependence, time constraints, and fear of retaliation; opportunities arising from weak oversight; and rationalizations that normalize inaction. Empirical evidence suggests that in weak institutional settings, firms may strategically engage auditors who are less likely to challenge management, thereby reinforcing a cycle of reduced audit rigor (Hope et al., 2008). Although analytical tools—such as fraud detection models and AI-driven analytics—have enhanced technical capabilities (Craja et al., 2020), their application

remains limited in practice. Professional norms often prioritize procedural compliance over investigative scrutiny, reinforcing a “check-the-box” approach to auditing.

This perspective highlights that auditor inaction is not merely a function of individual judgment but is shaped by systemic pressures that influence how auditors perceive and rationalize their professional responsibilities (Guan et al., 2016; Sopt, 2020).

Institutional Theory and the Embedding of Audit Behaviour

Institutional theory provides a broader explanation for why auditors may conform to constrained roles. Auditors operate within environments shaped by coercive pressures (regulation and enforcement), normative pressures (professional standards), and cultural-cognitive forces (shared beliefs and practices) (DiMaggio & Powell, 1983; Scott, 2008). In high-corruption environments, weak enforcement and social norms that tolerate informal practices can foster an accommodative audit culture, where auditors prioritize legitimacy over confrontation. Compliance with minimum standards may be sufficient to maintain professional credibility, even when substantive audit quality is compromised (Okike, 2004; Bubandt, 2014).

This institutional perspective suggests that auditor independence is not solely an individual attribute but a socially constructed outcome, shaped by the broader environment in which auditors operate. As a result, independence may be maintained symbolically while being constrained in practice.

Integrating Theoretical Perspectives: Toward a Structural Explanation

Taken together, agency theory, fraud-triangle theory, and institutional theory offer complementary explanations for auditor behaviour. Agency theory highlights incentive misalignment, fraud-triangle theory explains behavioural responses to pressure and opportunity, and institutional theory situates these behaviours within broader social and regulatory contexts. By integrating these perspectives, this study argues that auditors’ failure to detect corruption is not merely a technical limitation, but a systemic outcome arising from the interaction of incentives, constraints, and institutionalized norms. This integrated view provides a foundation for reconceptualizing auditor independence as a contingent and context-dependent phenomenon, rather than a fixed professional condition.

These dynamics are particularly pronounced in Indonesia’s construction and property sectors, where multilayered agency relationships create complex accountability structures. There are three nested agency relationships define the system: (1) between corporate management and project teams, (2) between firms and government project owners, and (3) between government agencies and citizens. This configuration places auditors within an extended governance chain, where they must navigate competing expectations and pressures. Corruption often occurs in the interaction between firms and government project owners, through mechanisms such as inflated contracts, facilitation payments, and reciprocal exchanges (Rose-Ackerman & Palifka, 2016). In such contexts, some auditors may adopt accommodative roles, tacitly accept these practices and thereby legitimize distorted outcomes.

METHOD

Research Design

This study adopts an exploratory research design to investigate auditor independence in high-corruption environments, where existing theoretical explanations remain underdeveloped. Rather than testing predefined hypotheses, the study aims to inductively identify underlying

structures that shape auditor behaviour and effectiveness. Exploratory approaches are appropriate when phenomena are complex, context-dependent, and insufficiently theorized, as they allow researchers to uncover latent patterns that can inform subsequent theory development (Edmondson & McManus, 2007). In this study, the objective is not to establish causal relationships or statistical generalizability, but to develop a theoretically grounded, empirically informed framework that explains how multilevel constraints influence auditor independence.

Variable Identification and Instrument Development

The research was conducted in two phases. The first phase involved a systematic narrative review of the literature on auditing, corruption, and construction-sector governance. Drawing on prior studies (Sylvester et al., 2011; Paré & Kitsiou, 2016), 59 potential variables were initially identified through targeted searches of academic databases, including Google Scholar. To ensure conceptual relevance and contextual validity, the variables were subjected to expert validation involving practicing auditors and representatives from the Indonesian Institute of Certified Public Accountants (IICPA/IAPI). This process resulted in the refinement and consolidation of variables, yielding 50 validated items (X1–X50) representing factors potentially influencing auditor effectiveness in corruption-prone environments (see Table 1).

Table 1. Factors influencing external auditors in fraud detection

Code	Factor	References
X1	Auditor awareness of their role in eradicating corrupt practices in the construction sector	Bondinuba et al. (2017), Jeppesen (2019), Agu (2022), Nugroho et al. (2023)
X2	Acknowledgement of construction financial audits	Bondinuba et al. (2017), Nwiboko et al. (2022), Aloyce et al. (2024)
X3	Audit conducted annually	Obondi (2020), Aloyce et al. (2024)
X4	A comprehensive, effective audit program that covers all priorities	Wang (2017), Yang et al. (2023), Aloyce et al. (2024)
X5	The clarity of financial Standard Operating Procedures (SOP) in construction companies	Wang (2017)
X6	The audit quality control system in the Public Accounting Office	Wang (2017), Aloyce et al. (2024)
X7	An appropriate and effective audit strategy	Kleinman et al. (2020), Aloyce et al. (2024)
X8	Commitment from stakeholders (e.g. users of financial reports, government)	Nalewaik & Mills (2015)
X9	The competence to conduct construction financial audits that require special knowledge and expertise	Kisnawati and Kartini (2014), Bondinuba et al. (2017), Shohihah et al. (2018), Kleinman et al. (2020), Agu (2022), Nwiboko et al. (2022), Wibowo and Dewi (2022), Nugroho et al. (2023), Yang et al. (2023)
X10	The number of reliable auditors in one financial audit assignment of a construction company	Patanakul et al. (2016), Bondinuba et al. (2017), Agu (2022), Yang et al. (2023)
X11	The magnitude of information asymmetry related to construction companies	Yang et al. (2023)
X12	The tendency to assume that audits are carried out merely to fulfill administrative requirements (merely a formality)	Yang et al. (2023)
X13	The auditor's professional skepticism	Putri et al. (2022), Yang et al. (2023)
X14	The auditor's knowledge of laws and regulations regarding the implementation of construction projects	Nwiboko et al. (2022), Yang et al. (2023)

Code	Factor	References
X15	Carefulness (professional prudence) in examining financial statements	Yang et al. (2023)
X16	The temptation of personal gain (bribes, gratuities)	Yang et al. (2023)
X17	The presence of direct intervention from external parties in the financial audit examination of construction companies	Bondinuba et al. (2017), Agu (2022), Nwiboko et al. (2022), Yang et al. (2023)
X18	The audit fee	Wang et al. (2024)
X19	Auditor gender	Mardawi et al. (2023)
X20	The age of the auditor	Mardawi et al. (2023)
X21	The auditor's education level	Mardawi et al. (2023)
X22	Years of audit experience	Indrasti and Karlina (2019)
X23	The auditor's independence attitude	Bondinuba et al. (2017), Shohihah et al. (2018), Kleinman et al. (2020), Agu (2022), Wibowo and Dewi (2022), Putri et al. (2022), Vu and Hung (2023), Miharja et al. (2024), Wang et al. (2024)
X24	The culture of construction companies that have different levels of tolerance towards corrupt practices	Nugroho et al. (2023)
X25	The support of the Public Accounting Office for findings of corrupt practices	Alleyne et al. (2013), Shohihah et al. (2018), Nwiboko et al. (2022)
X26	The culture of Public Accounting Office which have different levels of tolerance towards corrupt practices	Alleyne et al. (2013)
X27	Consideration of social responsibility towards the client's image (the negative impact of the audit report on the client's business)	Alleyne et al. (2013)
X28	Reporting audit findings related to corruption has an impact on the auditor (loss of clients, career delays, dismissal, etc.)	Alleyne et al. (2013)
X29	The low sanctions against corrupt practices	Jeppesen (2019)
X30	Physical and non-physical threats to auditors	Jeppesen (2019)
X31	Internal audit quality	Shohihah et al. (2023), Miharja et al. (2024)
X32	Exposure to foreign culture and other social norms (for example the culture of another country where the auditor studied)	Mardawi et al. (2023)
X33	Financial statement audit standard	Miharja et al. (2024)
X34	The use of technology (e.g. AI, blockchain, software, audit automation, etc.) in conducting construction financial audits	Nwiboko et al. (2022)
X35	The financial condition of the Public Accounting Office	Bondinuba et al. (2017), Kleinman et al. (2020), Agu (2022), Nwiboko et al. (2022)
X36	The managerial capacity of a Public Accounting Office in managing, supervising, and controlling its auditors	Kleinman et al. (2020), Nwiboko et al. (2022)
X37	The government's political will	Bondinuba et al. (2017), Kleinman et al. (2020), Agu (2022)
X38	The whistleblowing mechanism system (reporting violations) of construction companies	Indrasti and Karlina (2019)
X39	Limited time to conduct an audit	Andrianto et al. (2020), Kleinman et al. (2020), Putri et al. (2022)
X40	The auditor's understanding of the fraud triangle (pressure, opportunity, and rationalization)	Wibowo and Dewi (2022)
X41	The auditor's ability to identify potential corruption (red flags)	Wibowo and Dewi (2022)
X42	The auditee's internal control system	Indrasti and Karlina (2019), Kleinman et al. (2020)

Code	Factor	References
X43	Auditor ethics that include integrity, objectivity, competence and due care, maintaining confidentiality, and behaving professionally	Kleinman et al. (2020)
X44	The auditor's sense of urgency regarding the dangers of corrupt practices in the construction sector	Kleinman et al. (2020)
X45	The auditor's ability to see the big picture of a construction project	Kleinman et al. (2020)
X46	Reliance on check-the-box procedures	Kleinman et al. (2020)
X47	The complexity of a construction project	Kleinman et al. (2020)
X48	Financial audit training that does not sufficiently explore construction project finance	Kleinman et al. (2020)
X49	The auditor's understanding of his/her role in serving the public interest (ensuring that clients comply with applicable laws and regulations or NOCLAR)	Kleinman et al. (2020)
X50	Geographical indications (differences in project locations, for example, a company handles many construction projects outside Jakarta)	Beck et al. (2019)

Data Collection

The second phase involved a survey-based data collection targeting practicing auditors in Indonesia. The questionnaire was distributed through the IICPA/IAPI professional network between July 16 and August 15, 2024, reaching approximately 400 auditors. The survey instrument consisted of two sections: respondent demographics and assessment of the 50 factor statements. Responses were measured using a six-point Likert scale (1 = strongly disagree to 6 = strongly agree). An even-numbered scale was intentionally adopted to reduce central tendency bias, which has been observed in survey responses within Indonesian contexts (Mumu et al., 2022). A total of usable responses was retained for analysis after applying eligibility criteria (reported in Section 4). Although exploratory factor analysis does not require a universally fixed sample size, the adequacy of sample size depends on the level of communalities, factor loadings, and variable structure rather than sample size alone (MacCallum et al., 1999). In this study, the observed communalities and factor loadings were sufficiently strong to support the use of EFA with the available sample.

Data Analysis: Exploratory Factor Analysis (EFA)

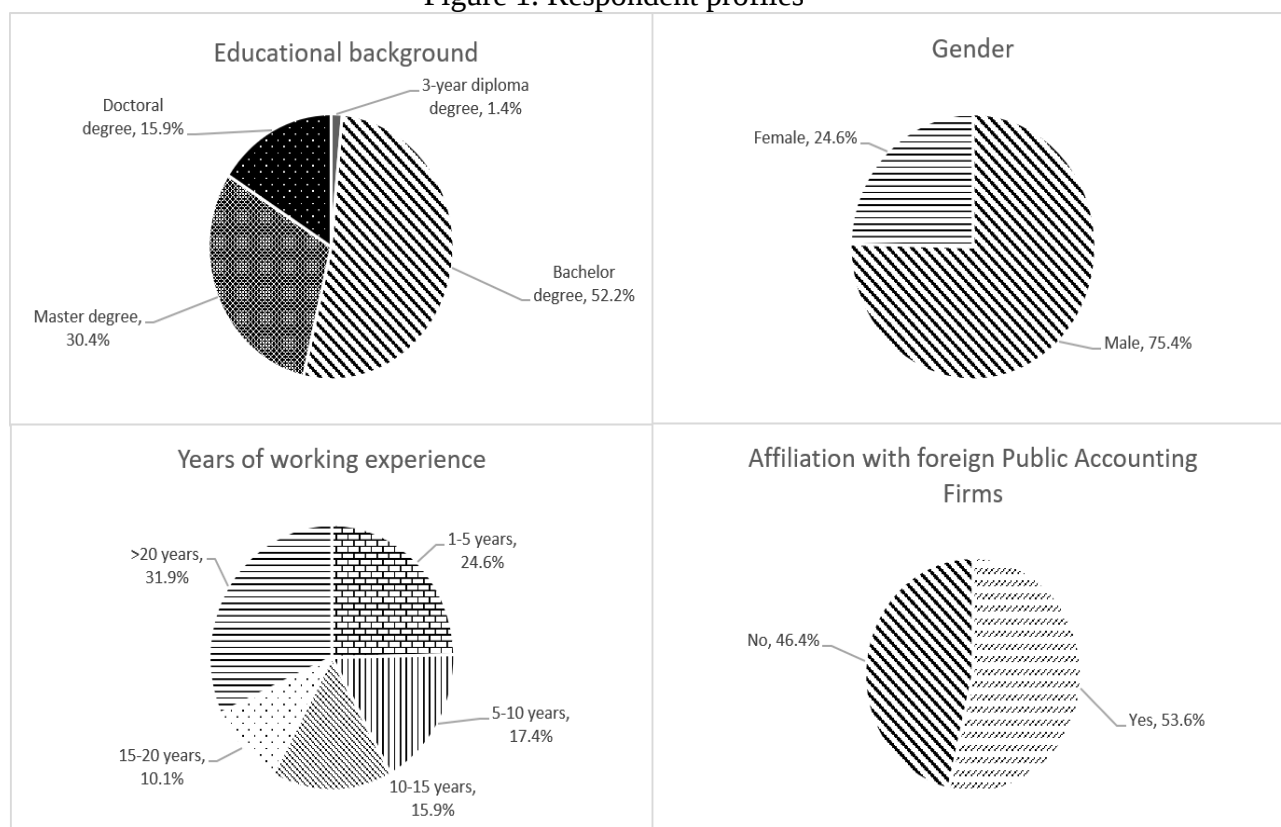
To identify latent dimensions underlying the observed variables, the study employed Exploratory Factor Analysis (EFA) using SPSS Version 25. EFA is suitable for exploratory research as it allows the identification of underlying factor structures without imposing prior theoretical constraints. The analysis followed standard procedures: assessment of sampling adequacy (KMO and Bartlett's Test), factor extraction using Principal Component Analysis (PCA), factor rotation to improve interpretability, and reliability assessment using Cronbach's alpha (Thompson, 2004; Hair et al., 2010; Gorsuch, 2013; Field, 2017).

RESULTS AND DISCUSSION

Results

A total of 77 responses were received, of which 69 met the eligibility criteria for analysis. The respondent profile is presented in Figure 1.

Figure 1. Respondent profiles



To examine the underlying structure of auditor behaviour in high-corruption environments, Exploratory Factor Analysis (EFA) was conducted. The Kaiser–Meyer–Olkin (KMO) value of 0.637 and a significant Bartlett’s Test of Sphericity ($p < 0.001$) (Table 2) confirm the suitability of the data for factor analysis.

Table 2. KMO and Bartlett’s test values

Kaiser-Meyer-Olkin Measure of Sampling Adequacy.		.637
Approx. Chi-Square		3042.936
Bartlett's Test of Sphericity	df	1225
	Sig.	.000

Communality values ranging from 0.52 to 0.78 indicate that the retained variables adequately represent the latent constructs (Table 3).

Table 3. Communalities

Variable	Initial	Extraction
X1	1.000	.776
X2	1.000	.824
X3	1.000	.832
X4	1.000	.758
X5	1.000	.800
X6	1.000	.695
X7	1.000	.752
X8	1.000	.775
X9	1.000	.838
X10	1.000	.750
X11	1.000	.772
X12	1.000	.634
X13	1.000	.831
X14	1.000	.773
X15	1.000	.889
X16	1.000	.786
X17	1.000	.778
X18	1.000	.694
X19	1.000	.729
X20	1.000	.778
X21	1.000	.838
X22	1.000	.784
X23	1.000	.792
X24	1.000	.830
X25	1.000	.751
X26	1.000	.730
X27	1.000	.795
X28	1.000	.815
X29	1.000	.770
X30	1.000	.821
X31	1.000	.810
X32	1.000	.839
X33	1.000	.705
X34	1.000	.767
X35	1.000	.719
X36	1.000	.640
X37	1.000	.823
X38	1.000	.792
X39	1.000	.799
X40	1.000	.720
X41	1.000	.772
X42	1.000	.734

Variable	Initial	Extraction
X43	1.000	.764
X44	1.000	.760
X45	1.000	.777
X46	1.000	.786
X47	1.000	.758
X48	1.000	.853
X49	1.000	.662
X50	1.000	.677

Table 4 shows that the analysis identified eleven components with eigenvalues greater than 1, explaining 77.095% of total variance, with high internal consistency (Cronbach's alpha = 0.943). These components were interpreted as interrelated mechanisms shaping auditor behaviour, rather than independent predictors. The reliability analysis revealed substantial variation across the eleven factors. Cronbach's alpha coefficients ranged from 0.478 to 0.953. Professionalism, Professional Distance, Whistleblowing Propensity, and Client Governance demonstrated good to excellent internal consistency, with alpha coefficients ranging from 0.810 to 0.953. Government Support and Auditor Role Clarity showed acceptable reliability, whereas Demographic Characteristics and Educational Quality demonstrated marginal internal consistency. Audit Experience exhibited relatively low reliability, while Audit Fees had an alpha coefficient of 0.478, indicating inadequate internal consistency. Cronbach's alpha could not be calculated for Personal Consequences because this factor consisted of a single item. Despite these factor-level differences, the overall final 42-item instrument demonstrated excellent internal consistency, with a Cronbach's alpha of 0.929.

Table 4. TVE Matrix
Total Variance Explained

Component	Initial Eigenvalues Total	% of Variance	Cumulative %	Extraction Sums of Squared Loadings Total	% of Variance	Cumulative %	Rotation Sums of Squared Loadings Total
1	16.279	32.558	32.558	16.279	32.558	32.558	12.650
2	6.326	12.653	45.211	6.326	12.653	45.211	8.456
3	2.902	5.803	51.015	2.902	5.803	51.015	9.518
4	2.242	4.484	55.499	2.242	4.484	55.499	5.352
5	1.910	3.820	59.319	1.910	3.820	59.319	2.742
6	1.738	3.476	62.794	1.738	3.476	62.794	8.067
7	1.664	3.329	66.123	1.664	3.329	66.123	2.402
8	1.591	3.182	69.305	1.591	3.182	69.305	2.613
9	1.433	2.867	72.172	1.433	2.867	72.172	3.141
10	1.330	2.660	74.832	1.330	2.660	74.832	1.799
11	1.132	2.263	77.095	1.132	2.263	77.095	2.284
12	.933	1.866	78.961	—	—	—	—
13	.880	1.759	80.721	—	—	—	—
14	.844	1.688	82.408	—	—	—	—

Component	Initial Eigenvalues Total	% of Variance	Cumulative %	Extraction Sums of Squared Loadings Total	% of Variance	Cumulative %	Rotation Sums of Squared Loadings Total
15	.737	1.473	83.881	—	—	—	—
16	.685	1.370	85.251	—	—	—	—
17	.574	1.147	86.399	—	—	—	—
18	.557	1.114	87.513	—	—	—	—
19	.525	1.050	88.563	—	—	—	—
20	.489	.978	89.541	—	—	—	—
21	.479	.958	90.500	—	—	—	—
22	.446	.892	91.391	—	—	—	—
23	.398	.796	92.187	—	—	—	—
24	.385	.769	92.956	—	—	—	—
25	.352	.704	93.660	—	—	—	—
26	.314	.627	94.288	—	—	—	—
27	.283	.566	94.854	—	—	—	—
28	.277	.554	95.408	—	—	—	—
29	.262	.524	95.932	—	—	—	—
30	.251	.503	96.435	—	—	—	—
31	.220	.441	96.876	—	—	—	—
32	.204	.407	97.283	—	—	—	—
33	.180	.361	97.644	—	—	—	—
34	.152	.305	97.949	—	—	—	—
35	.148	.297	98.246	—	—	—	—
36	.126	.252	98.498	—	—	—	—
37	.116	.231	98.729	—	—	—	—
38	.110	.219	98.948	—	—	—	—
39	.085	.171	99.119	—	—	—	—
40	.072	.144	99.262	—	—	—	—
41	.071	.142	99.404	—	—	—	—
42	.063	.126	99.531	—	—	—	—
43	.058	.116	99.646	—	—	—	—
44	.046	.092	99.738	—	—	—	—
45	.040	.080	99.818	—	—	—	—
46	.029	.058	99.876	—	—	—	—
47	.023	.045	99.922	—	—	—	—
48	.020	.039	99.961	—	—	—	—
49	.012	.024	99.985	—	—	—	—
50	.008	.015	100.000	—	—	—	—

Empirical Structure of Auditor Constraints

Table 5. Grouping of Variables into Component Groups
Factor Grouping and Loading Factors

Component No	Var	LF	Factor
C1	X1		Auditor awareness of their role in eradicating corrupt practices
	1 X4	0.716	A comprehensive, effective audit program
	2 X6	0.632	The audit quality control system in the Public Accounting Office
	3 X7	0.787	An appropriate and effective audit strategy
	4 X9	0.782	The competence to conduct construction financial audits
	5 X10	0.795	The number of reliable auditors in one financial audit assignment
	6 X11	0.548	The magnitude of information asymmetry
	7 X13	0.972	The auditor's professional skepticism
	8 X14	0.893	The auditor's knowledge of laws and regulations
	9 X15	0.961	Carefulness (professional prudence) in examining financial statements
	10 X23	0.911	The auditor's independence attitude
	11 X41	0.542	The auditor's ability to identify potential corruption (red flags)
	12 X43	0.647	Auditor ethics that include integrity, objectivity, competence and due care, maintaining confidentiality, and behaving professionally
C2	X49		The auditor's understanding of his/her role in serving the public interest
	1 X16	0.640	The temptation of personal gain (bribes, gratuities)
	2 X17	0.615	The presence of direct intervention from external parties
	3 X26	0.710	The culture of Public Accounting Firms (KAP)
	4 X27	0.862	Consideration of social responsibility towards the client's image
	5 X35	0.514	The financial condition of Public Accounting Firms (KAP)
	X45		The auditor's ability to see the big picture of a construction project
	6 X48	0.632	Financial audit training that does not sufficiently explore construction project finance
	7 X50	0.733	Geographical indications of the construction projects
	1 X24	0.588	The culture of construction companies that have different levels of tolerance towards corrupt practices
C3	2 X25	0.798	The support of the Public Accounting Office for findings of corrupt practices
	3 X34	0.678	The use of technology (e.g., AI, blockchain, software, audit automation, etc.) in conducting construction financial audits
	4 X40	0.676	The auditor's understanding of the fraud triangle
	5 X44	0.539	The auditor's sense of urgency regarding the dangers of corrupt practices
	6 X46	0.569	Reliance on check-the-box procedures
	7 X47	0.517	The complexity of a construction project
	1 X29	0.958	The low sanctions against corrupt practices
C4	2 X30	0.536	Physical and non-physical threats
	X32		Exposure to foreign culture and other social norms
	X36		The managerial capacity of a Public Accounting Office
	3 X37	0.572	The government's political will
	1 X19	0.668	Auditor gender
C5	2 X20	0.915	Auditor age
	X21	0.548	The auditor's education level

Component No	Var	LF	Factor
C6	3 X39	0.565	Limited time to conduct an audit
	1 X3	0.755	Audit conducted annually
	2 X8	0.744	Commitment from stakeholders
	3 X31	0.782	Internal audit quality
C7	X42		The auditee's internal control system
	1 X22	0.869	Years of audit experience
	2 X38	0.684	The whistleblowing mechanism system
C8	1 X12	0.740	The tendency to assume that audits are carried out merely to fulfill administrative requirements
	2 X18	0.762	The audit fee
	X24	0.574	The culture of construction companies that have different levels of tolerance towards corrupt practices
C9	1 X2	0.679	Acknowledgement of construction financial audits
	2 X5	0.723	The lack of clarity of financial Standard Operating Procedures (SOP) in construction companies
C10	1 X21	0.724	The auditor's education level
	2 X33	0.616	Financial statement audit standard
C11	1 X28	0.730	Reporting audit findings related to corruption has an impact on the auditor
	X48	0.592	Financial audit training that does not sufficiently explore construction project finance

The rotated factor structure (Table 5) reveals eleven components derived from 42 retained variables, each representing a distinct cluster of conditions that shape auditor behaviour in high-corruption environments. The analysis began with 50 variables. Six variables were excluded because their factor loadings were below the minimum threshold of 0.50, while two additional variables, X24 and X48, were removed because they exhibited substantial cross-loadings across different components. X24 loaded at 0.588 and 0.574 on two components, producing a difference of only 0.014, whereas X48 loaded at 0.632 and 0.592, with a difference of 0.040. These small differences indicate that the two variables could not be assigned confidently to a single component. Consequently, eight variables were excluded in total, leaving 42 variables in the final eleven-component factor model.

Professionalism as Conditional Capability

Table 5 shows that variables such as prudence, independence attitude, audit strategy, and quality control load strongly onto the professionalism component, indicating that auditors possess the technical and normative foundations required for independent auditing. This aligns with prior research emphasizing the role of professional competence, scepticism, and audit quality systems in enhancing the reliability of financial reporting (DeAngelo, 1981; Hurtt, 2010; Knechel et al., 2013). However, the co-existence of these variables with others reflecting external pressures—such as client dependence, weak enforcement, and personal risk—suggests that professionalism operates under constraint. Recent studies show that even highly competent auditors may fail to act independently when organizational incentives and institutional environments discourage confrontation or increase personal costs (Bazerman et al., 2002; Jeppesen, 2019; Svanström, 2023).

This finding indicates that professionalism functions as a conditional capability: it enables auditors to detect irregularities but does not ensure that they will act upon them. In high-corruption environments, independence is therefore not primarily constrained by a lack of competence, but by the conditions under which professional competence can be exercised, including economic dependence, regulatory credibility, and perceived personal consequences (Christensen et al., 2016; Hope et al., 2008).

Professional Distance and Relational Embeddedness

Table 5 shows that variables related to professional scepticism, empathy, and social interaction cluster under the component labelled professional distance, indicating that auditors' judgments are shaped not only by technical standards but also by their relational proximity to clients and stakeholders. Prior research emphasizes that professional scepticism is a critical attribute for audit quality (Hurt, 2010), yet its application is often influenced by social and organizational contexts rather than purely cognitive factors (Nelson, 2009; Brazel et al., 2016). In relational environments—such as those characterized by patron–client dynamics and strong interpersonal ties—auditors are embedded within social networks that influence their behaviour. Sociological and institutional research suggests that embeddedness fosters trust and cooperation but can also create pressures for conformity and reciprocity (Granovetter, 1985; Uzzi, 1997). In auditing contexts, close auditor–client relationships may reduce the willingness to challenge management, leading to diminished scepticism and increased tolerance of questionable practices (Moore et al., 2006; Svanström, 2016).

The loading pattern in Table 5 indicates that reduced scepticism is not random but systematically associated with relational proximity, supporting the view that independence is socially conditioned. Auditors may internalize client perspectives or prioritize relationship preservation over professional challenge, particularly in environments where long-term engagement and informal ties are valued. In this sense, professional distance represents not merely a personal trait, but a structural boundary condition that determines whether auditors can maintain objectivity in the presence of relational pressures (Bazerman et al., 2002; Jeppesen, 2019).

Whistleblowing Propensity and Organizational Mediation

Table 5 shows that variables such as reporting systems, ethical culture, and technology use cluster under the component labelled whistleblowing propensity, indicating that the decision to report irregularities is not solely an individual ethical choice but is organizationally mediated. Prior research on whistleblowing demonstrates that individuals are significantly more likely to report wrongdoing when supported by formal mechanisms, strong ethical climates, and perceived organizational backing (Kaplan & Schultz, 2007; Taylor & Curtis, 2010; Miceli et al., 2008).

The clustering of these variables suggests that the transition from detection to reporting depends on whether the organization provides three critical enabling conditions: (1) protection, in the form of safeguards against retaliation; (2) legitimacy, through ethical norms that frame reporting as appropriate professional behaviour; and (3) operational support, including accessible reporting channels and technological tools that facilitate evidence collection and communication. Technology-related variables—such as the use of data analytics and AI—further reinforce this mechanism by enhancing auditors' ability to document and substantiate findings, thereby lowering the perceived risk of reporting (Kokina & Davenport, 2017; Vasarhelyi et al., 2015). However, the presence of such tools does not automatically lead to

action; their effectiveness depends on whether the organizational environment encourages their use for investigative purposes rather than procedural compliance.

These findings indicate that whistleblowing is not merely a function of individual integrity but a context-dependent behaviour shaped by organizational structures and incentives. Even when auditors detect irregularities, they may refrain from reporting if organizational conditions fail to provide adequate protection or support. Auditor independence requires not only the ability to detect misconduct, but also organizational authorization and support to act upon that detection. This extends prior research by showing that independence is operationalized through organizational systems that enable—or constrain—the translation of professional judgment into action (Near & Miceli, 1995; Jeppesen, 2019).

Government Support as a System-Level Constraint

Table 5 shows that variables related to sanctions, regulatory enforcement, and political will cluster under the component labelled government support, indicating that auditors' behaviour is conditioned by the credibility and effectiveness of the institutional enforcement environment. Prior research in accounting and governance demonstrates that strong legal systems, credible sanctions, and active regulatory oversight are critical for sustaining auditor independence and deterring opportunistic behaviour (La Porta et al., 1998; Ball et al., 2000; Mungiu-Pippidi & Hartmann, 2019; Xu, 2025).

The clustering of these variables suggests that auditors do not evaluate reporting decisions in isolation but in relation to the broader institutional context. When enforcement mechanisms are weak, inconsistent, or politically influenced, the expected impact of reporting misconduct diminishes. In such settings, the probability that reported irregularities will lead to meaningful consequences—such as investigation, sanction, or corrective action—is perceived as low. As a result, auditors may rationally adjust their behaviour, prioritizing compliance with minimum standards over proactive enforcement of integrity (Jeppesen, 2019; Sikka et al., 2009). This dynamic can be understood as a form of institutional cost–benefit evaluation, where auditors weigh the potential benefits of reporting against the likelihood of institutional response. Weak enforcement not only reduces deterrence for corruption but also increases the perceived risks of acting independently, particularly when political interference or elite capture undermines regulatory credibility (Rose-Ackerman & Palifka, 2016; Xu et al., 2019).

Consequently, government support functions as a system-level constraint that conditions the feasibility of independent action. Even when auditors possess the competence and willingness to detect irregularities, ineffective institutional enforcement reduces the incentive to act, transforming independence from a professional obligation into a contingent choice. Auditor independence collapses not because standards are absent, but because the institutional system fails to reward or enforce integrity, thereby making inaction a rational and, in some cases, necessary response.

Demography and Risk Sensitivity

Table 5 shows that variables such as age, gender, and time pressure cluster under a single component, indicating that auditors' responses to corruption risk are influenced by individual risk sensitivity and situational constraints, not solely by professional standards. Research in auditing and behavioural decision-making suggests that risk judgments are shaped by both demographic attributes and task conditions, including experience, time pressure, and cognitive load (Kahneman & Tversky, 1979; Nelson, 2009; Svanström, 2016). The clustering pattern implies that auditors do not apply scepticism uniformly; instead, their responses are filtered through heterogeneous risk perceptions. For instance, prior studies find that time pressure can

reduce audit effort and increase reliance on heuristics, thereby weakening fraud detection (Svanström, 2016; Gundry & Liyanarachchi, 2007). Demographic factors also matter; evidence suggests that gender and age are associated with differences in ethical sensitivity and risk aversion, which can influence the likelihood of challenging clients or escalating issues (Brennan & Kelly, 2007; Liyanarachchi & Adler, 2011; Mnif & Cherif, 2022; He & Rivai, 2024).

These findings indicate that auditors' behavioural responses to corruption are shaped by a combination of personal traits and situational constraints, rather than purely by technical competence or formal independence requirements. In practice, this means that identical audit conditions may produce different outcomes depending on the auditor's risk tolerance and workload context. Auditor independence is not uniformly applied; it is filtered through individual risk perception, which varies across auditors and is amplified under conditions such as time pressure and uncertainty. This extends prior research by showing that independence operates not as a fixed professional attribute, but as a behaviourally contingent outcome shaped by how auditors perceive and manage risk.

Client Governance and Strategic Avoidance

Table 5 shows that variables related to internal audit quality, governance systems, and stakeholder commitment load onto a single component, indicating that auditor independence is shaped in part by the governance environment of the client organization. Prior research suggests that strong internal controls, effective internal audit functions, and active oversight mechanisms are associated with improved financial reporting quality and reduced information asymmetry (Kaawaase et al., 2021; Knechel et al., 2013).

However, the coexistence of these variables with indicators of weak enforcement environments suggests that governance mechanisms are not inherently effective. In corruption-prone contexts, governance structures may be strategically designed, weakened, or bypassed to limit external scrutiny. Managers may selectively comply with formal governance requirements while undermining their substantive effectiveness, particularly when facing high corruption risk or political pressure (Leuz & Wysocki, 2016; Rose-Ackerman & Palifka, 2016). This pattern reflects a form of strategic avoidance, where organizations maintain the appearance of governance to preserve legitimacy while minimizing the likelihood of detection. Auditors operating within such environments may encounter governance systems that are formally present but functionally constrained, reducing their ability to rely on internal controls and increasing the difficulty of challenging management (Hurley et al., 2020; Sargiacomo et al., 2024).

Consequently, client governance should be understood not as a neutral background condition, but as a strategic variable that can either enable or constrain auditor independence. When governance structures are aligned with transparency and accountability, they support audit effectiveness. Conversely, when they are manipulated or weakened, they act as barriers to independent audit action. Auditor independence depends not only on professional capability but on whether client governance structures support or resist scrutiny, thereby shaping the extent to which auditors can perform their monitoring role effectively.

Auditor Experience as Detection Advantage

Table 5 shows that variables related to audit experience, industry expertise, and technical knowledge load strongly onto a distinct component, indicating that more experienced auditors possess superior capabilities in identifying irregularities and assessing risk. Prior research consistently finds that auditor experience enhances judgment quality, improves the ability to

detect misstatements, and increases resistance to management persuasion (Bonner & Lewis, 1990; Kaplan et al., 2008; Contessotto et al., 2019). However, the separation of this component from whistleblowing propensity and institutional variables suggests a critical disconnect between detection and action. While experienced auditors are better equipped to recognize corruption-related risks, their willingness to act on such findings remains contingent on organizational and institutional conditions. This pattern is consistent with evidence that even highly skilled auditors may moderate their behavior in response to client pressure, economic dependence, or weak enforcement environments (Moore et al., 2006; Svanström, 2023).

The findings therefore indicate that experience functions as a detection advantage rather than an independence guarantee. Expertise enhances the ability to identify red flags but does not eliminate the constraints imposed by systemic factors such as retaliation risk, weak regulatory support, or organizational disincentives. In practice, this means that experienced auditors may recognize irregularities yet still choose not to escalate them when the perceived costs of action outweigh the expected benefits. Auditor experience strengthens the capacity to detect misconduct, but does not overcome systemic constraints on independence, reinforcing the distinction between technical competence and the conditions required for independent action.

Audit Fees and Economic Dependence

Table 5 shows that audit fee variables cluster with indicators of financial pressure and organizational capacity, highlighting the economic dimension of auditor behaviour. Prior research demonstrates that audit fees are not merely compensation for effort, but reflect the interplay between audit risk, resource allocation, and market competition (Simunic, 1980; Hay et al., 2006; Widmann et al., 2021; Yuan et al., 2025). In principle, higher fees are associated with greater audit effort and higher audit quality; however, fee structures also create economic dependencies that may compromise auditor independence. The clustering pattern suggests that when fees are low, misaligned with risk, or driven by competitive pressure, auditors face constraints on both effort and judgment. Limited fees reduce the resources available for thorough investigation, while increasing reliance on client retention for economic survival. Empirical studies show that such dependence can weaken auditors' willingness to challenge management, particularly in settings where client relationships are critical for sustaining revenue (DeAngelo, 1981; Moore et al., 2006; Svanström, 2023).

In high-corruption environments, these dynamics are amplified. Firms may engage auditors strategically based on fee considerations, favouring those willing to accommodate client preferences or limit scrutiny. As a result, audit engagements can shift from substantive assurance toward symbolic compliance, where formal requirements are met but underlying risks are insufficiently challenged (Sikka et al., 2009; Leventis et al., 2011). These findings indicate that audit fees operate as a structural constraint on independence, linking economic incentives to audit behavior. Rather than reflecting purely technical considerations, fee arrangements shape the boundaries within which auditors can act independently. Auditor independence is constrained not only by professional or institutional factors, but by economic structures that discourage confrontation, particularly when auditors' financial sustainability depends on maintaining client relationships.

Role Clarity and Boundary Limitation

Table 5 shows that variables related to the clarity of standard operating procedures (SOPs), audit mandates, and regulatory expectations cluster under a single component,

indicating that auditors' behaviour is strongly influenced by the formal definition of their professional role. Prior research suggests that clear role expectations enhance performance and accountability, whereas ambiguity can lead to reduced effectiveness and defensive decision-making (Rizzo et al., 1970; Prasetyo & Marsono, 2011; Svanberg & Öhman, 2013; Sangkala et al., 2024). The clustering pattern indicates that when auditors face ambiguity regarding the scope of their responsibilities—particularly in relation to corruption detection—they tend to rely on narrow, compliance-oriented interpretations of their mandate. This is consistent with evidence that role ambiguity reduces professional scepticism and increases the likelihood of conservative or risk-averse judgments, as auditors avoid actions that may expose them to professional or legal uncertainty (Nelson, 2009; Svanström, 2016).

In high-corruption environments, this effect is amplified by the absence of explicit regulatory guidance on auditors' responsibilities for detecting and reporting corruption. While auditing standards emphasize reasonable assurance over financial statements, they often provide limited direction on how auditors should respond to suspected corruption beyond material misstatement thresholds (Jeppesen, 2019). As a result, auditors may default to procedural compliance, focusing on formally required tasks while avoiding broader investigative actions that fall outside clearly defined boundaries.

This dynamic reflects a form of boundary limitation, where institutional ambiguity constrains the scope of auditor action. Rather than actively challenging irregularities, auditors may prioritize adherence to minimum standards to maintain legitimacy and reduce exposure to risk. Auditor independence is constrained when the scope of action is institutionally ambiguous, as unclear mandates encourage compliance-oriented behaviour and limit auditors' willingness to extend their role beyond formally defined responsibilities.

Educational Quality as Latent Capability

Table 5 shows that variables related to education, training quality, and mastery of auditing standards cluster as a distinct component, indicating that knowledge and formal training constitute a separate capability base underpinning auditor performance. This is consistent with prior literature demonstrating that higher educational attainment and specialized training improve auditors' analytical ability, professional judgment, and application of auditing standards (Bonner & Lewis, 1990; Knechel et al., 2013; Leocádio et al., 2025). Contemporary developments further emphasize the importance of integrating data analytics, AI, and forensic techniques into auditor education to enhance fraud detection capability (Vasarhelyi et al., 2015; Kokina & Davenport, 2017; Flint, 2025).

However, the empirical separation of this component from whistleblowing, institutional, and organizational factors reinforces a consistent pattern observed across Table 5: capability alone does not ensure independent action. While education enhances auditors' ability to identify irregularities and understand complex transactions, it does not eliminate the external constraints that shape behaviour. Prior studies suggest that even well-trained auditors may moderate their actions when faced with client pressure, weak enforcement, or personal risk, highlighting a gap between competence and conduct (Nelson, 2009; Bazerman et al., 2002; Jeppesen, 2019).

This indicates that educational quality functions as a latent capability—a necessary but insufficient condition for independence. It equips auditors with the tools to detect corruption-related risks but does not determine whether those risks will be acted upon. The translation of knowledge into independent behaviour depends on the presence of enabling conditions at the organizational and institutional levels, including clear mandates, protection mechanisms, and aligned incentives. Auditor independence is not constrained by a lack of knowledge, but by the

absence of enabling conditions that allow professional capability to be exercised in practice, reinforcing the distinction between technical competence and effective independence.

Personal Consequences as a Binding Constraint

Table 5 shows that variables related to retaliation, career risk, and reputational loss cluster strongly into a distinct component, indicating that perceived personal consequences constitute a primary constraint on auditor behaviour. This aligns with prior research demonstrating that fear of retaliation, job insecurity, and reputational damage significantly reduce individuals' willingness to report wrongdoing, even when ethical awareness is high (Near & Miceli, 1995; Miceli et al., 2008; Alleyne et al., 2013). The strength and coherence of this component suggest that auditors' decisions are shaped by an implicit cost–benefit calculus, in which the personal risks of acting independently are weighed against the uncertain benefits of reporting. In high-corruption environments—where enforcement is weak and protection mechanisms are limited—this calculus becomes particularly salient. Empirical studies show that when perceived retaliation risk is high and institutional support is low, professionals are more likely to remain silent despite recognizing misconduct (Liyanarachchi & Adler, 2011; Curtis et al., 2012).

This mechanism directly explains the persistent gap between detection and action identified across Table 5. Even when auditors possess the capability to identify irregularities, the anticipated personal costs—such as career stagnation, loss of clients, or social exclusion—can outweigh professional obligations. As a result, inaction becomes a rational and self-protective response rather than a failure of competence or ethics (Bazerman et al., 2002; Jeppesen, 2019). Conceptually, personal consequences operate as a binding constraint within the broader system of auditor independence. While other components influence capability or organizational alignment, this factor directly determines whether independent action is feasible

Discussion

Reinterpreting Auditor Independence

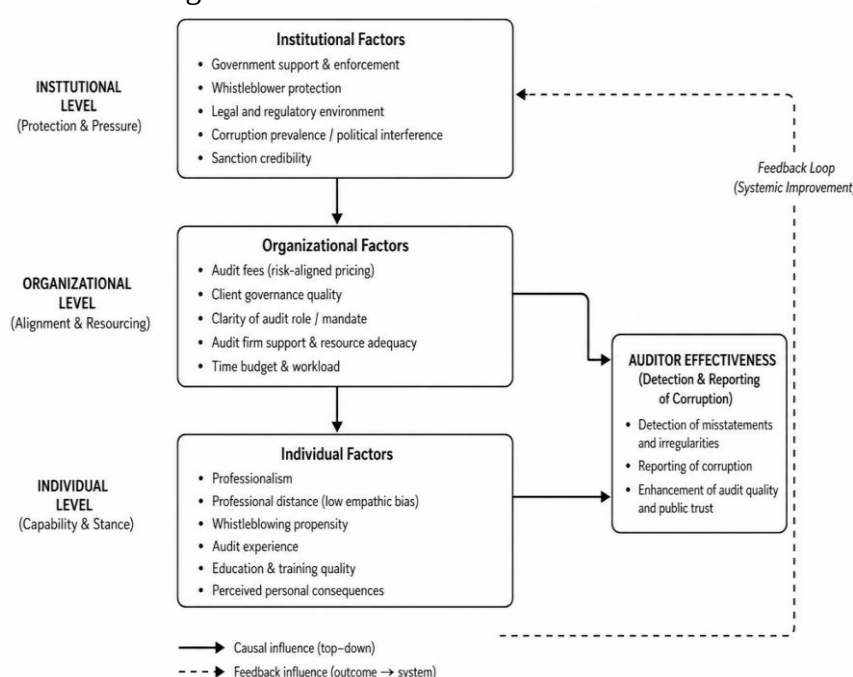
The empirical structure derived from Table 5 supports a fundamental reconceptualization of auditor independence. Rather than a binary condition—*independent* versus *not independent*—independence is better understood as a constrained and context-dependent outcome, shaped by the interaction of multilevel conditions. The pattern of component clustering reveals that auditor independence emerges from three interdependent elements. First, individual capability—including professionalism, experience, and education—is a necessary condition, as it equips auditors with the competence to detect irregularities (Bonner & Lewis, 1990; Nelson, 2009). Second, organizational alignment—reflected in governance structures, audit fees, and reporting systems—serves as an enabling condition that determines whether auditors are supported in exercising professional judgment (Moore et al., 2006; Knechel et al., 2013). Third, institutional protection—including regulatory enforcement, legal safeguards, and political support—is decisive, as it shapes the feasibility and consequences of independent action (La Porta et al., 1998; Jeppesen, 2019).

Importantly, these elements do not operate in isolation. The findings suggest a hierarchical interaction in which institutional conditions shape organizational incentives, which in turn influence individual behaviour. When these conditions are aligned, auditor independence can be effectively exercised. However, when they are misaligned—such as when strong professional capability coexists with weak enforcement or high personal risk—auditors face structural constraints that limit their ability to act independently.

In such environments, auditors operate not as autonomous monitors, but as constrained agents embedded within corruption systems, navigating competing pressures from clients, organizations, and institutional actors. This perspective challenges the traditional assumption of independence embedded in agency theory and suggests that audit effectiveness depends less on formal standards and more on the conditions that enable their application in practice. Auditor independence is an emergent property of a multilevel system, where capability is necessary, alignment is enabling, and protection is decisive. When these conditions are absent or misaligned, independence becomes structurally constrained rather than professionally determined.

The AEHCE Framework

Figure 2. The AEHCE Framework



The Auditor Effectiveness in High-Corruption Environments (AEHCE) framework described in Figure 5 synthesizes the empirical patterns in Table 5 into three interacting domains that jointly determine whether auditor independence can be realized in practice. First, Capability & Stance captures the auditor's ability to detect irregularities, encompassing professionalism, experience, education, and professional distance. This domain reflects the cognitive and ethical foundations of auditing, consistent with prior literature emphasizing expertise and professional scepticism as key drivers of audit quality (Bonner & Lewis, 1990; Nelson, 2009). Second, Alignment & Resourcing represents the organizational conditions that enable or constrain action, including client governance, audit fee structures, role clarity, and whistleblowing support. These factors determine whether auditors are organizationally authorized and resourced to act on identified risks, reflecting the influence of incentive structures and economic dependence on auditor behavior (Moore et al., 2006; Knechel et al., 2013). Third, Protection & Pressure captures the institutional environment in which auditors operate, including regulatory enforcement, political conditions, and personal risk exposure.

This domain determines the feasibility and consequences of independent action, highlighting the role of legal protection and enforcement credibility in sustaining auditor independence (La Porta et al., 1998; Jeppesen, 2019).

Importantly, these domains are not independent. The AEHCE framework conceptualizes a hierarchical interaction, in which institutional pressures shape organizational incentives, which in turn condition individual behaviour. This structure implies that even when auditors possess strong capabilities, their actions are mediated by organizational alignment and ultimately constrained by institutional conditions. This hierarchical dynamic explains a key empirical observation: auditor independence is often formally present but substantively constrained. Auditors may comply with professional standards and maintain the appearance of independence, yet refrain from challenging irregularities when organizational and institutional conditions discourage such actions. The AEHCE framework conceptualizes auditor independence as a multilevel, system-dependent outcome, where detection capability (Capability & Stance), organizational authorization (Alignment & Resourcing), and institutional feasibility (Protection & Pressure) must be simultaneously aligned for independence to be effectively exercised.

CONCLUSION

This study rethinks auditor independence by demonstrating that it cannot be understood as a purely professional or ethical attribute. Instead, independence emerges as a context-dependent outcome shaped by systemic constraints. The findings show that auditors operate within environments where institutional weaknesses, organizational incentives, and personal risks interact to limit independent action. As a result, improving audit quality requires not only strengthening professional standards but also addressing the broader ecosystem in which auditors operate.

This study suggests that improving audit quality in high-corruption environments cannot rely solely on strengthening audit standards. Instead, systemic reforms are required, including aligning audit fees with corruption risk, strengthening whistleblower protection, and reducing institutional retaliation against auditors. Policy recommendations include strengthening confidential whistleblowing systems, enforcing predictable sanctions, and introducing minimum audit-fee regulations to align incentives. Audit firms should innovate through risk-based pricing and technology adoption, while collaboration with civil society, media, and academia can foster safer ecosystems for whistleblowers and greater public accountability.

Our evidence is context-bound (focused on Indonesia's construction and property sectors) and based on a modest respondent pool. Institutional arrangements, corruption patterns, market structures, and audit regulations vary across jurisdictions and sectors; therefore, our findings should be treated as transferable rather than universal claims. Readers should assess boundary conditions, such as procurement regimes, enforcement credibility, auditor-client concentration, and political ties, before applying AEHCE factors elsewhere. Future research should test the AEHCE framework through confirmatory factor analysis (CFA), expand it across sectors and countries, and explore how factors like empathy, technology, and regulatory reforms influence auditor independence and effectiveness over time. While this study is grounded in Indonesia, the identified mechanisms are likely applicable to other emerging economies characterized by weak enforcement, relational contracting, and high corruption risk, such as parts of Southeast Asia, Sub-Saharan Africa, and Latin America.

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