

Quality of Independent Assurance Statements in Corporate Governance and Accountability

Renato Sitompul¹, Ramesh Nair^{2*}, Zuraidah Mohd. Sanusi³,

Syahrul Amar Ahmad⁴ and Farid A. Sobhani⁵

^{1,2,3}Accounting Research Institute, Universiti Teknologi MARA, Malaysia.

⁴Universiti Teknologi MARA, Johor Branch, Segamat Campus, Malaysia.

⁵Eastern University, Bangladesh.

ABSTRACT

This study examines the quality of independent assurance statements in sustainability reports and their implications for corporate governance and accountability in Singapore-listed firms. Drawing on neo-institutional theory, it investigates how assurance providers, applied standards, and reporting practices influence the credibility and decision usefulness of sustainability disclosures. Using deductive content analysis, 52 assurance statements from 26 mainboard-listed companies between 2021 and 2022 were evaluated against 23 quality criteria adapted from established assurance frameworks. Findings reveal that most statements provide only limited or moderate assurance, with the ISAE3000 standard predominantly applied, often in conjunction with minimal methodological detail. Big Four audit firms dominate the market, but evidence of normative isomorphism suggests standardized, repetitive content that may limit stakeholder insight. Limited disclosure of scope, procedures, and professional competencies raises concerns about the depth of verification and alignment with governance objectives. The study offers practical recommendations for assurance providers, regulators, and boards to enhance assurance quality as a governance control mechanism.

Keywords: Assurance Statements, Corporate Governance, Accountability, Sustainability Reporting, Singapore

ARTICLE INFO

Article History:

Received: 1 June 2025

Accepted: 29 July 2025

Available online: 1 August 2025

* Corresponding Author: Ramesh Nair; Accounting Research Institute, Universiti Teknologi MARA, Malaysia; Email E-mail: ramesh@uitm.edu.my

INTRODUCTION

In recent years, independent assurance statements from third parties included in sustainability reporting have become increasingly important in promoting accountability to stakeholders (Farooq & De Villiers, 2017). Designed to provide external verification of reported information, these statements aim to increase the degree of confidence for stakeholders beyond the responsible party (IAASB, 2013). By reducing information asymmetry, reinforcing corporate legitimacy, and addressing stakeholder concerns, assurance statements align with the predictions of neo-institutional theory. In practice, the number of companies issuing sustainability reports has grown significantly, yet no universally binding criteria for sustainability content exist, and assurance procedures remain under development. Previous studies have shown that variations in the presentation of assurance statements can influence the value provided by assurance providers and reflect differences in the design of assurance engagements (Fuhrmann et al., 2017; Wong & Millington, 2014). This variability raises concerns that the design quality of assurance processes may be compromised, reducing the perceived verifiability of sustainability information.

Independent assurance statements are a relatively recent phenomenon in Asia. In Singapore, where mainboard-listed companies have been required to issue sustainability reports since 2017, the adoption of third-party assurance remains voluntary. Despite the mandate, data from 2017–2021 indicate that only 186 mainboard-listed firms issued sustainability reports, and preliminary analysis shows that just 11.29% engaged third-party assurance. Most of these assurance services are provided either by Big 4 audit firms or sustainability specialists. This limited adoption presents challenges to the credibility of sustainability reporting in the eyes of investors and other stakeholders, particularly where the subject matter is closely tied to long-term corporate accountability.

From a responsible business practices perspective, sustainability information is intended to support decision-making and strategy formulation to ensure organisational longevity (Epstein, 2018). Independent assurance strengthens the credibility of these disclosures by assessing measurement accuracy, the balance of positive and negative performance reporting, and adherence to recognised frameworks. However, the heterogeneity of assurance practices, including the use of different standards, creates

uncertainty and can diminish the relevance of the information provided. Research suggests that ambiguous assurance content can mislead stakeholders and undermine the assurance's intended purpose, prompting calls for closer examination of the standards adopted (Gürtürk & Hahn, 2016). Similarly, Bepari and Mollik (2016) question the degree to which assurance standards uphold corporate accountability and transparency, while Khatib (2024) highlights the risk of assurance being reduced to symbolic compliance rather than substantive verification, particularly when commercial interests are at play.

Building on this critique, this study addresses gaps in the literature by moving beyond prior research that has separately examined firms' decisions to adopt assurance (Kend, 2015), stakeholder participation in assurance processes (Bepari & Mollik, 2016), investor perceptions of assurance (Fuhrmann et al., 2017), and cross-country comparisons of assurance providers (Junior et al., 2014). Instead, it focuses on the underexplored issue of normative isomorphism in assurance statements, where prepackaged language, standardised formats, and paraphrased passages dominate, potentially at the expense of substantive, context-specific verification (Khatib, 2024). The study employs quantitative content analysis to measure the degree of normative isomorphism, assess variations in assurance quality, and evaluate how differences in providers, applied standards, and reported content shape governance and accountability outcomes.

By situating the analysis within the Singaporean regulatory environment, this study responds to calls for more context-specific examinations of sustainability assurance in emerging and transitional markets (Khatib, 2024). It contributes to management accounting literature by framing assurance as part of a broader organisational control system, one that validates sustainability performance metrics, supports strategic decision-making, and aligns corporate conduct with stakeholder expectations. Through a deductive content analysis of 21 independent limited assurance statements issued between 2021 and 2022, the study examines the interplay between assurance providers, applied standards, and the scope of verification, while also identifying patterns of normative isomorphism that may undermine governance effectiveness. The findings offer practical insights for policymakers, regulators, and corporate boards seeking to enhance the credibility, transparency, and decision-usefulness of sustainability reporting. In doing so, the study addresses a critical gap in

the literature by moving beyond the binary question of whether firms adopt assurance, to interrogating how assurance is performed, communicated, and valued in practice.

LITERATURE REVIEW

The relationship between assurance quality, governance, and accountability has been widely acknowledged in both sustainability accounting and management accounting research. Independent assurance statements are not only external validation tools but also components of an organisation's broader control and accountability framework, influencing strategic decisions, risk management, and stakeholder trust. This dual role, as a signal to external parties and as a governance mechanism for internal decision-making, forms the foundation for examining how assurance practices contribute to organisational legitimacy and performance measurement.

Independent Assurance Statements, Sustainability Reporting, and Governance

As the issuance of sustainability reporting has expanded (Mnif Sellami et al., 2019; Talbot & Boiral, 2018), stakeholders have increasingly demanded transparency and questioned the integrity of the information provided by companies (Junior et al., 2014). The GRI G4 version recommends six key elements for high-quality sustainability reporting, namely balance, comparability, accuracy, timeliness, and clarity (Khatib, 2024; Diouf & Boiral, 2017). From a governance and management accounting perspective, these elements contribute to effective performance measurement and control, particularly when supported by independent verification.

Stakeholder perceptions of corporate disclosures depend heavily on the perceived reliability of information (Healy & Palepu, 2001). Consequently, many corporations now rely on external independent assurance statements in their sustainability reports to enhance transparency, credibility, and accountability. Such assurance can also improve a company's investment appeal (Reimsbach et al., 2018). Prior studies show that independent assurance statements positively influence the perceived reliability of reported information (Pflugrath et al., 2011), leading report users to place greater confidence in information verified by an objective third party (Hodge

et al., 2009). This aligns with the role of management accounting in ensuring that decision-useful information is generated, validated, and communicated to both internal and external audiences.

However, there is no consensus on the quality of assurance statements, particularly when considering the type of assurance provider, namely, audit firms versus sustainability specialists. Harindahyani and Agustia (2023) find that audit firms generally produce higher-quality assurance than sustainability specialists, attributing this to stronger professionalisation and coercive pressures, which orient services toward the needs of a wide range of stakeholders beyond shareholder wealth maximisation (Martínez-Ferrero & García-Sánchez, 2017). Improved credibility of sustainability information reduces information asymmetry and agency costs (Dhaliwal et al., 2012; Reimsbach et al., 2018), which can in turn influence equity valuations (Liu et al., 2023) and be highly valued by investors and stakeholders (García-Sánchez, 2020). In this way, assurance statements function as part of a broader management control framework, enhancing decision usefulness for both external and internal stakeholders.

O'Dwyer et al. (2011) suggest that the credibility of assurance statements shapes user perceptions and expands demand for accountability in assurance practices, while Caglio et al. (2020) note that third-party verification increases confidence in the credibility of disclosed information. From a performance and governance perspective, Cohen and Simnett (2015) argue that assurance statements can be strategically leveraged to strengthen corporate credibility. Yet, the risk of greenwashing or symbolic reporting remains a concern (Gürtürk & Hahn, 2016; Reimsbach et al., 2018). This tension between substantive verification and symbolic compliance lies at the heart of current debates on the role of assurance in sustainability governance.

Beyond external signalling benefits, third-party assurance serves as a tool for scrutinising and improving internal management systems. As Edgley et al. (2010) highlight, information system limitations can lead to inaccurate disclosure; assurance processes help address these weaknesses and integrate sustainability into organisational systems. This includes identifying key risks that threaten sustainability, providing external guidance to improve data accuracy (Searcy, 2016), and aligning sustainability objectives with broader business goals (Chkanikova & Sroufe, 2021). Assurance providers may also help clarify governance issues and advise on responses (Andon

et al., 2015). Many companies view assurance as a means of overcoming internal barriers, restructuring governance to better address sustainability dimensions (Manetti & Toccafondi, 2012), and enhancing transparency to mitigate risks that could undermine accountability (Al-Shaer et al., 2023; Fonseca, 2010).

Industry-specific factors also influence assurance adoption. Firms may purchase assurance to demonstrate appropriate sustainability action to stakeholders (Harymawan et al., 2020) and as part of the criteria for a successful sustainability strategy (Zorio et al., 2013). Assurance can thus operate as a credibility-enhancing mechanism for external users (Caglio et al., 2020) and necessitates accurate, reliable information. As with financial reporting, effective internal monitoring and audit processes can improve data validity, compliance, and stakeholder trust (Liu, 2018). This underscores the relevance of assurance statements for both operational accountability and strategic decision-making in a management accounting context.

Credible sustainability information expands the internal information set available to managers for decision-making, including resource allocation, performance evaluation, and detection of reporting deficiencies (Steinmeier & Stich, 2019). It also strengthens consideration of stakeholder interests in managerial processes and supports integration of sustainability into strategic planning (O'Dwyer & Owen, 2005; Edgley et al., 2010). Prior studies show that reliable information enhances strategic decision-making, encourages the incorporation of sustainability into organisational strategy, and promotes stakeholder-oriented governance (Gürtürk & Hahn, 2016; Rezaee, 2016; Velte & Stawinoga, 2017). From a critical perspective, however, these benefits are contingent on the assurance process being both rigorous and transparent; if assurance merely confirms pre-determined narratives, its role as a management control mechanism is significantly weakened.

While providing sustainability information is often the first step toward improving practice, gathering such data from multiple departments and aligning it with strategic objectives remains a coordination challenge (O'Rourke & Ringer, 2016). Assurance can support this alignment, with evidence suggesting that it facilitates organisational change when the reliability of both information and systems is ensured (Junior et al., 2014; Lozano et al., 2016; Rossi & Tarquinio, 2017). More specifically, assurance statements respond to user demands by signalling the credibility of disclosed

information, thereby reinforcing governance controls and supporting informed decision-making (Cohen & Simnett, 2015; Dilla et al., 2023). However, meaningful comparisons between companies remain challenging due to variations in assurance content, structure, and depth, including differences in language, conclusions, procedures, and recommendations (Gürtürk & Hahn, 2016).

Normative Isomorphism, Assurance Standards, and Neo-institutional Theory

DiMaggio and Powell's (1983) neo-institutional theory has become an important framework for examining sustainability reporting guidelines and third-party assurance practices. In this context, external assurance services act as a mechanism for translating sustainability commitments into credible corporate reports (Gillet-Monjarret & Rivière-Giordano, 2017). From a legitimacy perspective, companies seek to strengthen their standing by assuring sustainability information in ways that align corporate norms and values with those of wider society (O'Dwyer et al., 2011; O'Dwyer & Owen, 2005). Over time, such practices become institutionalised across industries as norms and routines are embedded in organisational processes.

Institutional theory highlights how organisational structures, norms, practices, and patterns of interaction are shaped by broader social and cultural environments, often becoming taken-for-granted elements of corporate behaviour. This perspective underscores the governance function of assurance statements: building effective interactions with multiple stakeholders to reinforce the perceived reliability of reported information (Bonetti et al., 2023). In management accounting terms, these institutionalised practices can be seen as part of an organisation's control environment, influencing both compliance and performance measurement. In other words, once particular assurance formats or verification routines become institutionalised, they form part of the organisation's "default" control architecture, even if their relevance to the specific risks and material issues of the company is limited.

Neo-institutional theory also explains how reporting and assurance practices evolve in response to environmental pressures, sometimes leading to convergence on similar methods and systems (Brachert & Hornych, 2011). While such convergence can improve comparability, it may also

reduce efficiency and limit innovation. The tendency for organisations to adopt similar rules and routines, known as isomorphism, can take coercive, normative, or mimetic forms (Gillet-Monjarret & Rivière-Giordano, 2017; DiMaggio & Powell, 1983). Professional bodies, for instance, can drive normative isomorphism by mandating compliance, promoting training and certification, and fostering shared professional norms among practitioners.

In sustainability reporting, research has shown that isomorphism contributes to similarities in disclosure and assurance content across organisations (Khatib, 2024; Carungu et al., 2022; de Villiers & Alexander, 2014; Martínez-Ferrero & García-Sánchez, 2017). These similarities often extend to reporting structures and frameworks, such as the GRI or ISO standards, and can be influenced by institutional arrangements (coercive), professionalisation of the reporting field (normative), and imitation of peers (mimetic) (Bebbington et al., 2012; Gürtürk & Hahn, 2016). In assurance, normative isomorphism may arise from pressures exerted by standard setters, professional organisations, and training programmes, all of which promote shared approaches to verification. This convergence can provide a moral basis for legitimacy by aligning assurance practices with widely accepted values and norms, particularly when assurance is used to reduce information asymmetry and enhance corporate image.

However, the presence of normative isomorphism does not necessarily ensure substantive verification. Without scrutiny of content, assurance statements risk becoming symbolic rather than performance-enhancing (Gürtürk & Hahn, 2016). From a governance and management accounting perspective, this raises concerns about whether such statements truly contribute to decision usefulness and accountability. Indeed, if the structure, language, and conclusions of assurance reports are largely pre-packaged or recycled, their incremental value for performance evaluation and control may be marginal. This concern is particularly acute in voluntary regulatory environments where competitive pressures to signal “compliance” may outweigh incentives to innovate or adapt assurance practices to the firm’s specific sustainability risks.

In Singapore, assurance statements remain voluntary, with no regulation mandating their content or the procedures providers must follow. This voluntary environment increases the likelihood of normative isomorphism, as providers may adopt similar formats and wording based on

professional association norms rather than tailoring verification procedures to the specific risks and material issues of each client. Such uniformity is especially evident when providers replicate procedures or statements used by peers. Prior research shows that companies often mimic top-performing peers in formatting and content to signal quality (de Villiers & Alexander, 2014). While this imitation may support stakeholder perceptions of legitimacy, it can dilute the governance value of assurance by downplaying firm-specific performance challenges or omitting contentious sustainability issues.

De Villiers and Alexander (2014) also highlight the role of consultants and peer networks in promoting the adoption of GRI guidelines, further reinforcing uniformity in reporting and assurance practices. Within this landscape, two standards dominate: ISAE3000, issued by the International Audit and Assurance Standards Board (IAASB) in 2005, and AA1000AS, developed by AccountAbility in 2003. ISAE3000 provides general guidance for assurance engagements in non-financial contexts (Khatib, 2024), while AA1000AS is designed specifically to ensure the reliability of sustainability assurance processes through stakeholder inclusivity and principle-based requirements (Khatib, 2024; Gürtürk & Hahn, 2016; O'Dwyer & Owen, 2005).

Both standards seek to improve assurance credibility and professionalism, but their emphases differ. AA1000AS is more explicitly aligned with sustainability principles, while ISAE3000 offers a broader, principles-based framework that can be applied to a wide range of non-financial engagements (Gürtürk & Hahn, 2016). Despite these differences, Manetti and Becatti (2009) find that both standards are frequently applied in ways that align with GRI guidelines, meaning innovative elements of sustainability reporting are not always fully addressed. From a critical standpoint, this suggests that the institutional pull toward uniformity can override the flexibility embedded in the standards themselves.

From a management accounting viewpoint, the choice and application of assurance standards have implications for governance, performance measurement, and stakeholder accountability. If normative isomorphism drives the adoption of standards without substantive adaptation, the potential for assurance to serve as a decision-useful control mechanism is diminished.

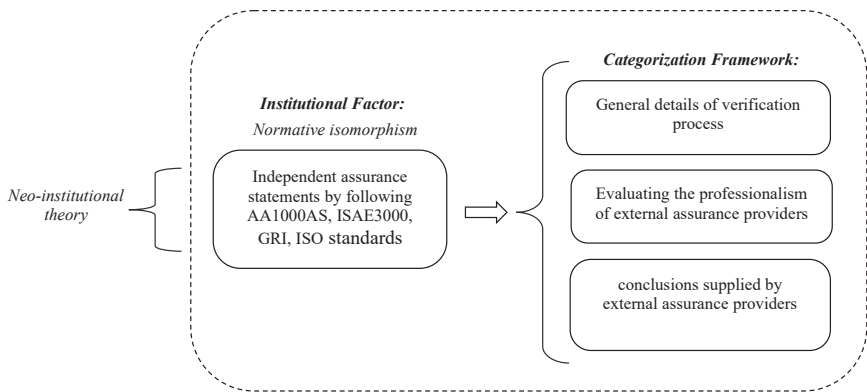


Figure 1: Conceptual Model Linking Normative Isomorphism, Assurance Standards, and Governance Outcomes in Sustainability Reporting

Accordingly, this study examines assurance standards within the context of such institutional pressures, evaluating how professionalism, standard selection, and verification content contribute to the credibility and governance value of assurance statements in Singapore. Figure 1 presents the conceptual model for this study, illustrating how neo-institutional theory frames the influence of normative isomorphism on independent assurance statements, the professionalism of assurance providers, and the evaluation of conclusions supplied, together shaping governance and accountability outcomes.

METHODOLOGY

To address the research objectives, this study adopts a qualitative content analysis approach, consistent with prior assurance quality studies (Gürtürk & Hahn, 2016; Khatib, 2024). The methodology is designed to capture both the structural and substantive characteristics of assurance statements, enabling an evaluation of their governance relevance and alignment with neo-institutional theory. By systematically analysing statements against established quality criteria, the study identifies patterns of normative isomorphism, variations in provider practices, and implications for corporate accountability.

Data Collection

The data for this study comprise assurance statements extracted from sustainability reports issued by companies listed on the Singapore Exchange (SGX) mainboard between 2021 and 2022. Only mainboard-listed companies were considered, as these firms carry greater public accountability and are subject to more stringent reporting expectations than those listed on the catalyst board. In 2021 and 2022, 372 mainboard companies produced either standalone sustainability reports or integrated annual reports with a sustainability section. Of these, 346 companies were excluded because their reports did not contain independent third-party assurance. The final sample consists of 52 assurance statements from 26 companies (Table 1).

Table 1: Sample of Independent Assurance Statements from Mainboard-Listed Companies on the Singapore Exchange (2021–2022)

Company	Sector classification	Company	Sector classification
Capitaland Investment Limited	Residential REITs	Sembcorp Industries Limited	Industrials
Mandarin Oriental Intl Limited	Consumer Discretionary	Singapore Land Group Limited	Residential REITs
Fraser And Neave Limited	Consumer Staples	Singapore Tech Engineering Limited	Industrials
Frasers Centrepoint Trust	Residential REITs	Singapore Telecom Limited (Singtel)	Communication Service
Frasers Property Limited	Residential REITs	Sri Trang Agro-Industry PCL	Consumer Discretionary
Golden Agri-Resources Limited	Consumer Staples	Starhub Limited	Communication Service
Hongkong Land Holdings Limited	Residential REITs	Suntec Real Estate Investment Trust	Residential REITs
Jardine Cycle & Carriage Limited	Consumer Discretionary	Thai Beverage Public Company Limited	Consumer Staples
Jardine Matheson Holdings Limited	Industrials	United Overseas Bank (UOB) Limited	Financials
Keppel Corporation Limited	Industrials	UOL Group Limited	Residential REITs
Oversea-Chinese Banking Corporation	Financials	UPL Limited- Global depositary receipts	Financials
PEC Limited	Industrials	Wilmar International Limited	Consumer Staples
Prudential PLC	Financials	Sembcorp Industries Limited	Industrials

This research involved only publicly available corporate disclosures and did not engage with human participants. Nonetheless, in line with good research governance and ethical practice, the study protocol was reviewed and approved by the Ethics Committee of the Accounting Research Institute, Universiti Teknologi MARA. The clearance process ensured compliance with institutional and national guidelines, including responsible handling of corporate information, accurate attribution of sources, and safeguarding of confidential data where applicable.

Content Analysis

In this study, the content analysis method was employed by creating a coding scheme rooted in the principles articulated by Gürtürk and Hahn (2016). This coding scheme was used to evaluate the content, differences, similarities, and transparency of each criterion within the assurance statements. The criteria are closely connected to the quality of assurance reporting and are derived from widely accepted standards adhered to by external assurance providers. These standards notably include guidelines set forth by the International Federation of Accountants (IFAC), AccountAbility, and the Global Reporting Initiative (GRI), as described by Perego and Kolk (2012).

Given the widespread acceptance of these guidelines, the content analysis process followed four primary stages. First, assurance statements were extracted from sustainability reports. Second, a categorisation framework was developed based on established assurance quality criteria. Next, information was classified in accordance with this framework. Finally, findings and interpretive insights were generated to assess quality patterns.

The sequential process resulted in the identification of 23 distinct criteria, each with a maximum potential score of 33 points. These criteria cover a range of aspects, including the provision of recommendations, the inclusion of objections, and the examination of follow-up or reflective components. This comprehensive coding scheme enables a detailed analytical examination of the content within each assurance statement and the assignment of ratings that effectively communicate overall quality.

To ensure reliability, the content analysis incorporated the involvement of multiple coders. The primary objective was to mitigate potential disparities in judgment and produce consistent evaluations of the criteria. While interpretation in content analysis is inherently qualitative, the coding scheme allows for structured, semi-quantitative analysis when clearly identifiable and measurable information is present (Khatib, 2024). The categorisation framework was rigorously tested to establish a robust foundation for the coding process and to minimise disagreements stemming from subjective judgment. In cases where differences in coding occurred, these were discussed thoroughly until consensus was reached.

The overall reliability of the coding process was further strengthened by meticulous documentation of coding decisions. Construct validity was enhanced through the use of a well-founded, deductively grounded framework, while internal validity was reinforced through triangulation with an extensive literature review. It is acknowledged, however, that external validity and generalisability may be limited, particularly when findings are interpreted in abstraction from their organisational contexts (Avenier, 2010). These limitations are addressed further in the results section.

RESULTS AND DISCUSSION

This section presents the results of the content analysis and interprets them in relation to corporate governance, accountability, and management accounting implications. The discussion is structured to highlight how the characteristics of independent assurance statements, such as verification process details, the type of assurance provider, multidisciplinary expertise, and ethical considerations, affect their usefulness as decision-support tools for management accountants and governance bodies.

Word Verification Process Criteria and Decision-Usefulness of Assurance

Across the assurance statements, the verification process is typically the longest section and consistently addresses five interrelated criteria, namely, (i) level of assurance, (ii) standards applied, (iii) assurance provider's responsibilities, (iv) scope of verification, and (v) methodology. Despite

this common structure, the information provided is generally insufficiently granular to demonstrate the reliability of the verification process. This aligns with prior literature noting limited transparency around methodological criteria in sustainability assurance. In management-accounting terms, such opacity constrains decision-usefulness for boards, audit committees, and management accountants who depend on credible evidence to inform risk assessment, performance measurement, and resource allocation. Overall, the five criteria frequently operate as symbolic disclosures that satisfy reporting conventions rather than enable substantive evaluation of material sustainability issues. Consistent with this, Table 2 shows the predominance of limited/moderate assurance, with most reports referencing the GRI framework.

Table 2: List of Assurance Levels Provided (In Percentages)

Years	Level																	
	Limited/moderate						Reasonable/high						Combination*					
	a	b	c	d	e	f	a	b	c	d	e	f	a	b	c	d	e	f
2021	23.2	10.4	8.3	11.8	12.5	6.0	3.5	0.0	13.4	0.0	0.0	0.0	0.0	0.0	0.0	0.0	3.2	0.0
2022	25.1	11.7	9.1	10.3	13.1	6.5	4.7	0.0	15.6	0.0	0.0	0.0	0.0	0.0	0.0	0.0	5.1	0.0
Overall	24.2	11.1	8.7	11.1	12.8	6.3	4.1	0.0	14.5	0.0	0.0	0.0	0.0	0.0	0.0	0.0	4.2	0.0

Note(s): (a-f): sector classification; (a): REITs; (b): financials; (c): industrials; (d): consumer discretionary; (e): consumer staples; (f): communication service. *) The combination of different levels of assurance generally indicates that most reports have been assured at a limited to moderate level, while certain indicators, especially quantitative indicators, have been assured at a fairly high level.

In the industrials and REITs sectors, eight reports present reasonable/high assurance (14.5% and 4.1%, respectively). However, the statements do not explain why these sectors warrant the highest assurance relative to others, limiting their value for risk prioritisation and control design. Without explicit justification for the higher level of assurance, stakeholders are left to infer whether these engagements are driven by sector-specific sustainability risks, regulatory expectations, or internal governance priorities. From a management accounting perspective, this absence of rationale constrains the usefulness of assurance for risk assessment, as users cannot readily link assurance intensity to the organisation’s control environment or its exposure to material sustainability risks.

Limited or moderate assurance dominates across sectors—REITs (24.2%), financials (11.1%), industrials (8.7%), consumer discretionary (11.1%), consumer staples (12.8%), and communication services (6.3%)—and two statements employ mixed levels (e.g., limited/moderate overall

with selected indicators at reasonable/high; 4.2% in consumer staples). While limited assurance may be more cost-effective and less resource-intensive, it inherently provides less depth in testing controls, data systems, and performance outcomes. This compromises the assurance function as a governance mechanism because it reduces the scope for detecting weaknesses in reporting systems or identifying areas requiring corrective action.

The tendency toward limited assurance suggests that assurance levels may be applied primarily as symbolic signals of compliance rather than as tools for substantive verification of sustainability performance. This aligns with the “symbolic adoption” perspective in legitimacy theory, where organisations adopt assurance practices to meet stakeholder expectations without fully integrating them into governance and performance management systems. From a control systems viewpoint, such symbolic use can create a false sense of security for boards, managers, and investors, potentially delaying necessary interventions when sustainability risks are emerging but not yet visible in financial performance.

Several factors may explain the dominance of limited assurance. On the organisational side, budgetary constraints, competing strategic priorities, or a lack of internal data readiness may limit management’s willingness to commission comprehensive engagements. On the provider side, capacity constraints, such as limited sector-specific expertise or reliance on standardised methodologies, may discourage the application of higher levels of assurance. Normative isomorphism may also be at play. Assurance providers might default to the prevailing practice in their client’s industry, thus reinforcing a sector-wide tendency toward limited engagements.

The mixed-level assurance observed in some consumer staples reports is particularly noteworthy. By applying reasonable assurance to selected indicators (often those with regulatory or reputational significance) and limited assurance to the rest, companies appear to be strategically prioritising certain sustainability metrics while deprioritising others. While this targeted approach can make efficient use of assurance resources, it also risks fragmenting the assurance function, making it harder for stakeholders to form a holistic view of sustainability performance and governance maturity. From a control perspective, this creates uneven assurance coverage, which may leave blind spots in risk oversight.

Ultimately, the observed patterns raise questions about whether current assurance practices are fulfilling their potential as governance and management accounting tools. If assurance is to serve not just as a compliance signal but as a substantive contributor to performance improvement, there is a need for clearer disclosure of the rationale for assurance level selection, stronger linkage between assurance scope and material risk profiles, and a move toward integrating assurance outcomes into ongoing performance monitoring. For both preparers and providers, this implies a shift from assurance as a stand-alone reporting exercise toward assurance as an embedded element of the organisation's control and decision-support systems.

As shown in Table 3, all 52 assurance statements in the dataset explicitly identify the standards used, confirming that providers understand the symbolic and procedural importance of naming an authoritative framework. At face value, this should strengthen user confidence, as reference to established frameworks—such as ISAE 3000, AA1000AS, or both—signals adherence to professional norms and widely accepted verification protocols. Yet, this ostensible transparency masks several substantive gaps in how these standards are applied and communicated. The findings show that some engagements cite multiple standards in a single statement, for example, ISAE 3000 combined with AA1000AS, and in certain cases, additional national standards (e.g., Control Union Certifications, which has an international footprint across 80+ countries and sometimes draws on AA1000AS principles).

Table 3: Essential Standards for Applying Assurance Statements (In Percentages).

Sector classification	2021				2022			
	ISAE3000	AA1000AS	ISAE3000 & AA1000AS	Other	ISAE3000	AA1000AS	ISAE3000 & AA1000AS	Other
REITs (a)	25.9	-	-	3.7	24.0	4.0	-	-
Financials (b)	14.8	-	-	3.7	16.0	-	4.0	4.0
Industrials (c)	11.1	7.4	-	-	16.0	-	-	-
Consumer discretionary (d)	3.7	-	3.7	-	4.0	-	-	-
Consumer staples (e)	14.8	3.7	-	-	8.0	4.0	-	-
Communication service (f)	7.4	-	-	-	8.0	-	-	-
Total	77.8	11.1	3.7	7.4	76.0	16.0	4.0	4.0

Note(s): During the period of 2021 - 2022, approximately half of the assurance statements in the REITs sector used a single standard, while less than half of them used single and dual standards in the financials, industrials, consumer discretionary, consumer staples, and communication service sectors. Additionally, some assurance providers also applied standards specified at the national level, some of which are based on AA1000AS. One example of such a standard is Control Union Certifications, which has a broad track record and a presence in more than 80 countries.

However, the mere mention of a standard does not, in most cases, translate into a clear explanation of why it was chosen, how it was applied, or what procedural differences its selection entails. For non-specialist users, particularly stakeholders, retail investors, and even some management accountants, such omissions diminish interpretability. The rationale for choosing ISAE 3000 over AA1000AS (or vice versa), or for combining the two, is seldom elaborated. This is significant because the two standards have distinct emphases: ISAE 3000 is a principles-based framework applicable across various non-financial contexts, while AA1000AS focuses more explicitly on sustainability principles, stakeholder inclusivity, and accountability. Without clarification, stakeholders cannot easily determine whether the chosen standard reflects a deliberate alignment with assurance objectives or is simply the default choice within a provider's professional repertoire.

The sectoral breakdown reveals telling patterns. In 2021, REITs show the highest single-standard ISAE 3000 usage at 25.9%, dropping slightly to 24.0% in 2022. This consistency might suggest strong sectoral norms or entrenched provider relationships, possibly influenced by the capital-intensive, investor-sensitive nature of real estate investment trusts. The REIT sector also reports occasional adoption of "Other" standards (3.7% in 2021; 0% in 2022), hinting at the influence of specialised property or environmental certification frameworks in earlier periods.

Financials display moderate ISAE 3000 usage (14.8% in 2021; 16.0% in 2022), but are among the few to adopt dual standards in 2022 (4.0% ISAE 3000 & AA1000AS) and to use "Other" standards (4.0%). This could reflect the sector's exposure to both regulatory compliance norms and stakeholder expectations for more principle-oriented sustainability reporting. The industrials sector increases its ISAE 3000 adoption from 11.1% in 2021 to 16.0% in 2022, with notable AA1000AS usage in 2021 (7.4%) disappearing entirely in 2022—a change that warrants closer examination, as it may reflect shifting provider preferences or cost-driven simplification.

Consumer staples and consumer discretionary sectors present a more fragmented picture. In 2021, consumer staples reported both ISAE 3000 (14.8%) and AA1000AS (3.7%) adoption, but in 2022 ISAE 3000 use declines (8.0%) while AA1000AS increases (4.0%). In contrast, consumer

discretionary reports minimal ISAE 3000 adoption (3.7% in 2021; 4.0% in 2022) and some dual-standard use in 2021 (3.7%) disappearing thereafter. Communication services maintains a stable but low ISAE 3000 adoption (7.4% in 2021; 8.0% in 2022).

Aggregating across sectors, ISAE 3000 dominates both years (77.8% in 2021; 76.0% in 2022), followed by AA1000AS (11.1% → 16.0%), dual-standard use (3.7% → 4.0%), and other standards (7.4% → 4.0%). The modest rise in AA1000AS adoption could suggest growing awareness of its stakeholder-inclusive principles, yet without explicit explanation in statements, it remains unclear whether this reflects substantive change or merely symbolic alignment.

Approximately two-thirds of all statements in the dataset emphasise limitations on the assurance provider's responsibility for report content and data reliability. This trend transcends sector boundaries and points directly to a form of normative isomorphism, the replication of disclaimers and scope statements that follow profession-wide templates rather than being tailored to a client's risk profile. Indeed, 90% of statements explicitly disclaim responsibility for the accuracy of reported data, the validity of metric calculations, adherence to GRI requirements, or errors in the company's own disclosures. Even more strikingly, *all* statements (100%) disclaim responsibility for any decisions made or actions taken based on the reports, effectively severing the assurance exercise from operational accountability in the eyes of users.

From a management accounting perspective, this poses a significant problem. If assurance statements are to function as governance tools that validate KPIs, support budgetary control, and feed into enterprise risk management (ERM), then such sweeping disclaimers dilute their usefulness. They transform the engagement from a potential instrument of performance interrogation into a procedural ritual, fulfilling the form of assurance without fully delivering its substance.

A further limitation lies in the specificity of verified content. While most statements outline the reporting period and list general categories of information reviewed, very few identify the precise pages, indicators, or data sets assessed. Only four statements (5.8%) in industrials and one (1.9%)

in REITs provide such specifics. This makes it difficult for users, whether stakeholders, analysts, or management accountants, to map assurance coverage to material sustainability risks or to integrate findings into control and planning frameworks.

The absence of explicit links between verified content and material issues is particularly concerning. Without such linkage, it becomes impossible to judge whether assurance targeted the areas of highest stakeholder concern or operational risk. This aligns with Gürtürk and Hahn's (2016) critique that assurance processes often fail to address the most material issues, focusing instead on easily verifiable or less controversial content.

In method descriptions, a strong pattern emerges. Reliance on company-provided documentation dominates, with relatively limited generation of independent evidence. Field visits are reported in 96.2% of statements, yet these almost never identify the sites visited or the scope of activities reviewed. Only 7.7% of statements omit technique descriptions entirely, but even when provided, these are typically generic and non-quantitative. Interviews are near-universal (97%) but skew towards middle management, with external stakeholder consultations appearing in less than 8% of cases, and even then described as brief, with no evidence of integrating their feedback into the assurance conclusion.

From a governance perspective, the patterns in Table 3 indicate that assurance practices remain heavily standardised in form but lack equivalent substance, which has significant implications for management accounting. The absence of clear criteria, defined scope boundaries, and detailed methodologies reduces the decision usefulness of assurance findings, making it difficult for management accountants to validate key performance indicators (KPIs), assess budget allocations, or inform strategic planning. Furthermore, the weak linkage between verified content and material sustainability risks undermines the ability of boards and audit committees to incorporate assurance outputs into enterprise risk management (ERM) processes. As a result, the prevailing reliance on standardised formats and extensive disclaimers tends to confer symbolic legitimacy, signalling compliance and credibility to external audiences, rather than driving substantive performance improvements within organisations.

To bridge this gap, assurance providers could tailor reports more explicitly to the risk context of each client, provide quantitative descriptions of evidence collection, and clarify the rationale for standard selection. This would not only improve interpretability for stakeholders but also enhance the utility of assurance as a tool for governance and strategic management.

Evaluating the Professionalism of External Assurance Providers

Essentially, assurance statements lack substantial and transparent details regarding auditors’ capacity to credibly analyse the intricate aspects of sustainability issues and to question the normative characteristics commonly found in most reports. While most assurance statements touch upon the competence and independence of assurance practitioners, they lack clear and compelling arguments to substantiate these claims. In Table 4, it shows the key information about the assurance provider distribution, including the types of providers and the sectors covered that use assurance statements in sustainability reports.

Table 4: Assurance Provider Distribution by Profession and Sector (in percentages)

Sector classification	2021			2022		
	Audit firms	Consulting firms	Other	Audit firms	Consulting firms	Other
REITs (a)	7.69	3.84	-	15.37	3.84	-
Financials (b)	3.84	-	-	7.69	-	-
Industrials (c)	1.92	7.69	1.92	5.77	3.84	1.92
Consumer discretionary (d)	1.92	-	3.84	1.92	-	3.84
Consumer staples (e)	3.84	-	3.84	3.84	-	3.84
Communication service (f)	3.84	-	-	3.84	-	-
Total	23.05	11.53	9.60	38.43	7.68	9.60

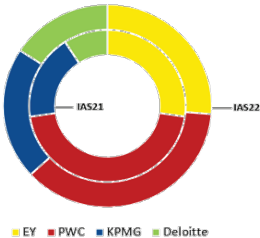


Figure 1: Assuror by Audit Firms

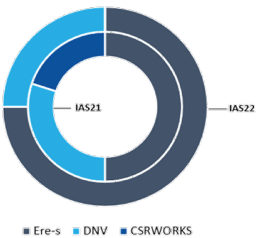


Figure 2: Assuror by Consulting Firms

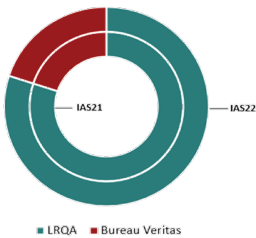


Figure 3: Assuror by Other Pprofessional

From the 52 assurance statements in the 2021–2022 period, 61.5% were issued by assurance providers originating from audit firms. This proportion increased significantly in the REITs, financial, and industrial sectors from 2021 to 2022. In contrast, three other sectors, consumer discretionary, consumer staples, and communication services, showed no change in proportion over the same period. Furthermore, almost 62% of audit firms from the “Big Four” category dominated overall in providing sustainability assurance across all these sectors (see Table 4). Specifically, PwC provided the largest share of assurance services, accounting for 23% of the assurance statements, followed by EY (17%), KPMG (13%), and Deloitte (9%) (see Figure 1). Meanwhile, the proportion of consulting firms (Table 4) decreased by 3.85% from 2021 to 2022. These results indicate a shift in organisations’ choice of assurance providers for sustainability assurance, moving from consulting firms to audit firms during the 2021–2022 period (see Figure 2). For assurance providers outside these two types (audit and consulting firms), namely the “other” professional services category, the proportion remained unchanged during 2021–2022 (see Table 4 and Figure 3).

In practice, the change in the proportion of assurance provider types is not, in itself, a critical issue. The more fundamental question is whether the type of provider (audit firm, consulting firm, or other professional) determines the extent of multidisciplinary engagement, expertise, and team composition, which in turn affects the credibility of assurance statements. Several studies continue to question the use of multidisciplinary approaches, particularly when expertise and team composition are not clearly disclosed in sustainability assurance reports. In fact, the findings of this study reveal that only 4% of assurance statements in 2021–2022 explicitly indicated that a multidisciplinary team had conducted the analysis, with a stronger emphasis on integrating strategic issues into the assurance content. While this proportion still suggests that multidisciplinary approaches remain an exception, often focusing more on multi-stakeholder engagement, it should be noted that assurance providers (audit firms, consulting firms, and others) are registered service providers with supporting certifications related to sustainability assurance.

Detailed information on the expertise or competence of assurance providers is rarely disclosed in assurance statements. Most reports only list the name, organisation, or person responsible for verification, along

with professional certifications such as Certified Sustainability Assurance Practitioner, Certified Public Accountant, or Chartered Accountant. During 2021–2022, about 12% of the 52 assurance statements only provided the name, qualifications, or certifications of the signatory. Meanwhile, 55% identified the institution and the relevant professional certifications, 8% only provided the name of the verification lead who signed the assurance statement, and 23% included only the institutional signature without naming the responsible individual or their professional certifications.

Providing complete information, names of those conducting the verification, qualifications, degrees, or certifications, would be beneficial for future assurance reports to minimise issues related to the lack of professionalism and professionalisation (Abbott, 2014; Khatib, 2024). among assurance providers, thereby strengthening their legitimacy as responsible professionals in sustainability report assurance. In this context, such detailed information enables stakeholders to assess whether the assurance provider truly meets the qualifications to verify a sustainability report.

Furthermore, independence requirements for assurance providers apply equally to the statements reviewed. Of the 52 assurance statements, about 85% (44 reports) declared compliance with independence principles. While independence is more commonly emphasised in financial audit engagements, where it is a mandatory requirement, its practical application in sustainability assurance can be difficult to assess. This difficulty arises because independence in assurance statements is usually tied to the assurance standards applied, such as ISAE 3000 or AA1000AS.

The majority of assurance statements containing independence principles originated from Big Four audit firms, with 38% (20 statements) citing compliance with the Accounting and Corporate Regulatory Authority (ACRA) Code of Professional Conduct and Ethics for Public Accountants and Accounting Entities. A further 15% (8 statements) declared adherence to the International Code of Ethics for Professional Accountants (including International Independence Standards) issued by the International Ethics Standards Board for Accountants. Additionally, some consulting firms and other professional providers (e.g., Eres, DNV, Bureau Veritas) referred to specific internal independence policies and relevant codes of ethics.

However, in the case of independence, a critical ethical principle for assurance providers, the issue is not simply which code is referenced, but whether specific justification is provided, ideally in a dedicated section, beyond general compliance with codes or standards. In 27% of the assurance statements, independence principles and codes of ethics were not clearly consolidated in one section, and justifications were vague. This lack of clarity was observed across audit firms, consulting firms, and other professional providers. This suggests that normative isomorphism remains prevalent in the presentation of assurance statements.

Overall, ethical aspects relating to the independence of assurance providers, including professionalism in the verification process, were not presented in a detailed or transparent manner. Although relevant standards, procedures, and codes of ethics exist, their application in practice is often insufficiently defined, particularly when applied without considering the specific context and characteristics of the organisation receiving the sustainability assurance. Approximately 77% of assurance statements contained formulaic, repetitive wording that failed to address critical issues relating to the assurance of the sustainability report, as illustrated by these excerpts:

“We have complied with the independence and other ethical requirements of the Accounting and Corporate Regulatory Authority (ACRA) Code of Professional Conduct and Ethics for Public Accountants and Accounting Entities (ACRA Code), which is founded on fundamental principles of integrity, objectivity, professional competence and due care, confidentiality and professional behaviour.”

(Golden-Agri, 2022, p. 100)

“Our work was performed in compliance with the requirements of the IFAC Code of Ethics for Professional Accountants, which requires, among other requirements, that members of the assurance team (practitioners) be independent of the assurance client, in relation to the scope of this assurance engagement, including not being involved in writing the report. The code also includes detailed requirements for practitioners regarding integrity, objectivity, professional competence and due care, confidentiality and professional behaviour.”

(UPL Limited, 2021, p. 6)

These independence statements, both from audit firms, illustrate how normative isomorphism is implemented. Assurance providers adopt and comply with certain standards and practices to align with the norms of the organisations using their services, producing statements that communicate their commitment to these norms. However, in practice, 58% of the 52 assurance statements suggest that assurance providers tend to adopt industry-accepted practices and standards when facing strong isomorphic pressures to conform. Consequently, normative isomorphism was linked to 30 of the assurance statements, reflecting an effort by assurance providers to bridge the gap between internal operations and external expectations through the strategic use of standardised practices and compliance reporting. While the intention is to enhance credibility and acceptance among multiple stakeholders, this often results in a lack of clear focus on critical issues such as risk management and sustainability performance, both of which are integral to governance and accountability in organisations using sustainability assurance.

CONCLUSION

This study examined the content and practices of sustainability assurance statements across multiple sectors for the 2021–2022 period, focusing on the verification process, applied standards, provider responsibilities, scope, and methodology. The findings reveal that, despite the growing adoption of external assurance, much of the reported content remains symbolic and procedural rather than substantively enhancing the credibility of sustainability reports. The predominance of limited or moderate assurance, frequent reliance on general standards without detailed application guidance, vague delineation of scope, and limited methodological transparency suggest that assurance practices still fall short of delivering decision-useful information for both internal management purposes and external stakeholders.

From a management accounting perspective, these limitations weaken the potential for assurance statements to serve as effective tools for internal control, risk assessment, and strategic decision-making. Sustainability assurance, if properly executed, could complement management accounting by validating non-financial performance indicators, linking

environmental and social data to operational and financial metrics, and improving governance oversight. However, the observed gaps, particularly in methodological disclosure, stakeholder engagement, and sector-specific risk assessment, diminish its utility for managers seeking to integrate sustainability performance into resource allocation and long-term planning.

For practitioners, the results underscore the need to go beyond minimal compliance with standards and invest in deeper, more transparent assurance processes. This includes specifying the scope of verification, adopting sector-relevant criteria, engaging with multiple stakeholder groups, and aligning assurance outcomes with management accounting systems. Regulators and professional bodies should consider issuing more prescriptive guidance on methodological disclosure, assurance level justification, and multidisciplinary team composition, ensuring that assurance outputs meet both accountability and decision-support objectives.

The study is limited to assurance statements issued during 2021–2022 and focuses on selected sectors, which may restrict the generalizability of findings to other industries or time periods. Content analysis relied on publicly available assurance statements, meaning that certain methodological details, potentially disclosed only in private client communications—were not captured. Additionally, while the study connects assurance practices to their potential implications for management accounting, it does not directly measure the extent to which managers actually use these statements in decision-making.

Future studies should explore the behavioural dimension of assurance by examining how managers, auditors, and other stakeholders interpret and act upon assurance statements in practice. Longitudinal studies could assess whether assurance quality improves over time and whether regulatory changes or professional initiatives enhance its integration with management accounting functions. Comparative research across jurisdictions with different assurance standards could also provide insight into how institutional environments shape assurance quality. Finally, qualitative case studies involving interviews with assurance providers and corporate managers could yield richer insights into the practical challenges and organisational drivers that influence the scope, methodology, and perceived value of sustainability assurance.

In sum, while sustainability assurance holds promise as a mechanism for enhancing accountability and supporting management control, its current application in the sampled sectors remains predominantly formalistic. Bridging the gap between symbolic compliance and substantive verification is essential if assurance is to fulfil its potential as a meaningful extension of management accounting practice.

ACKNOWLEDGEMENTS

The authors acknowledge the support provided by the Accounting Research Institute, Universiti Teknologi MARA, in completing this study.

REFERENCES

- Abbott, A. (2014). *The system of professions: An essay on the division of expert labor*. University of Chicago Press.
- Al-Shaer, H., Albitar, K., & Liu, J. (2023). CEO power and CSR-linked compensation for corporate environmental responsibility: UK evidence. *Review of Quantitative Finance and Accounting*, 60(3), 1025-1063.
- Andon, P., Free, C., & O'Dwyer, B. (2015). Annexing new audit spaces: Challenges and adaptations. *Accounting, Auditing & Accountability Journal*, 28(8), 1400–1430. <https://doi.org/10.1108/AAAJ-11-2013-1525>.
- Avenier, M.-J. (2010). Shaping a constructivist view of organizational design science. *Organization Studies*, 31(9-10), 1229–1255. <https://doi.org/10.1177/0170840610374395>.
- Bebbington, J., Kirk, E. A., & Larrinaga, C. (2012). The production of normativity: A comparison of reporting regimes in Spain and the UK. *Accounting, Organizations and Society*, 37(2), 78–94. <https://doi.org/10.1016/j.aos.2012.01.001>.

- Bepari, M. K., & Mollik, A. T. (2016). Stakeholders' interest in sustainability assurance process: A case study. *Managerial Auditing Journal*, 31(6/7), 655–687. <https://doi.org/10.1108/MAJ-05-2015-1200>.
- Bonetti, L., Lai, A., & Stacchezzini, R. (2023). Stakeholder engagement in the public utility sector: Evidence from Italian ESG reports. *Utilities Policy*, 84, 101649.
- Brachert, M., & Hornych, C. (2011). Entrepreneurial opportunity and the formation of photovoltaic clusters in Eastern Germany. In *Handbook of Research on Energy Entrepreneurship*. Edward Elgar Publishing.
- Caglio, A., Melloni, G., & Perego, P. (2020). Informational content and assurance of textual disclosures: Evidence on integrated reporting. *European Accounting Review*, 29(1), 55–83. <https://doi.org/10.1080/09638180.2019.1677480>.
- Carungu, J., Molinari, M., Nicolò, G., Pigatto, G., & Sottoriva, C. (2022). Implementing SDGs and mandatory non-financial reporting in corporate practices: insight from an Italian global player. In *Non-financial Disclosure and Integrated Reporting: Theoretical Framework and Empirical Evidence* (pp. 61-84). Cham: Springer International Publishing.
- Chkanikova, O., & Sroufe, R. (2021). Third-party sustainability certifications in food retailing: Certification design from a sustainable supply chain management perspective. *Journal of Cleaner Production*, 282, 124344.
- Cohen, J. R., & Simnett, R. (2015). CSR and assurance services: A research agenda. *Auditing: A Journal of Practice & Theory*, 34(1), 59–74. <https://doi.org/10.2308/ajpt-50876>.
- de Villiers, C., & Alexander, D. (2014). The institutionalisation of corporate social responsibility reporting. *The British Accounting Review*, 46(2), 198–212. <https://doi.org/10.1016/j.bar.2014.03.001>.
- Dhaliwal, D. S., Radhakrishnan, S., Tsang, A., & Yang, Y. G. (2012). Nonfinancial disclosure and analyst forecast accuracy: International

evidence on corporate social responsibility disclosure. *The Accounting Review*, 87(3), 723–759. <https://doi.org/10.2308/accr-10218>.

Dilla, W., Janvrin, D., Perkins, J., & Raschke, R. (2023). The influence of sustainability assurance report format and level on nonprofessional investors' judgments. *Sustainability Accounting, Management and Policy Journal*, 14(6), 1209-1241.

DiMaggio, P. J., & Powell, W. W. (1983). The iron cage revisited: Institutional isomorphism and collective rationality in organizational fields. *American Sociological Review*, 48(2), 147–160. <https://doi.org/10.2307/2095101>.

Diouf, D., & Boiral, O. (2017). The quality of sustainability reports and impression management: A stakeholder perspective. *Accounting, Auditing & Accountability Journal*, 30(3), 643–667. <https://doi.org/10.1108/AAAJ-04-2015-2044>.

Edgley, C., Jones, M. J., & Solomon, J. F. (2010). Stakeholder inclusivity in social and environmental report assurance. *Accounting, Auditing & Accountability Journal*, 23(4), 532–557. <https://doi.org/10.1108/09513571011041615>.

Epstein, M. J. (2018). *Making sustainability work: Best practices in managing and measuring corporate social, environmental, and economic impacts*. Routledge.

Farooq, M. B., & De Villiers, C. (2017). The market for sustainability assurance services: A comprehensive literature review and future avenues for research. *Pacific Accounting Review*, 29(1), 79-106.

Fonseca, A. (2010). How credible are mining corporations' sustainability reports? A critical analysis of external assurance under the requirements of the international council on mining and metals. *Corporate Social Responsibility and Environmental Management*, 17(6), 355–370. <https://doi.org/10.1002/csr.230>.

Fuhrmann, S., Ott, C., Looks, E., & Guenther, T. W. (2017). The contents of assurance statements for sustainability reports and information

- asymmetry. *Accounting and Business Research*, 47(4), 369–400. <https://doi.org/10.1080/00014788.2016.1263550>.
- García-Sánchez, I. M. (2020). The moderating role of board monitoring power in the relationship between environmental conditions and corporate social responsibility. *Business Ethics: A European Review*, 29(1), 114–129. <https://doi.org/10.1016/j.jclepro.2019.118582>.
- Gillet-Monjarret, C., & Rivière-Giordano, G. (2017). Sustainability assurance: A literature review. *Accounting Auditing Control*, 23(2), 11–62.
- Gürtürk, A., & Hahn, R. (2016). An empirical assessment of assurance statements in sustainability reports: Smoke screens or enlightening information? *Journal of Cleaner Production*, 136, 30–41. <https://doi.org/10.1016/j.jclepro.2016.01.098>.
- Harindahyani, S., & Agustia, D. (2023). The assurance providers' role in improving the independent assurance statement quality on sustainability reporting. *Accounting Research Journal*, 36(1), 37–54. <https://doi.org/10.1108/JFRA-05-2022-0169>.
- Harymawan, I., Nasih, M., Salsabilla, A., & Putra, F. K. G. (2020). External assurance on sustainability report disclosure and firm value: Evidence from Indonesia and Malaysia. *Entrepreneurship and Sustainability Issues*, 7(3), 1500.
- Healy, P. M., & Palepu, K. G. (2001). Information asymmetry, corporate disclosure, and the capital markets: A review of the empirical disclosure literature. *Journal of Accounting and Economics*, 31(1–3), 405–440. [https://doi.org/10.1016/S0165-4101\(01\)00018-0](https://doi.org/10.1016/S0165-4101(01)00018-0).
- Hodge, K., Subramaniam, N., & Stewart, J. (2009). Assurance of sustainability reports: Impact on report users' confidence and perceptions of information credibility. *Australian Accounting Review*, 19(3), 178–194. <https://doi.org/10.1111/j.1835-2561.2009.00056.x>.
- IAASB. (2013). *International Standard on Assurance Engagements (ISAE) 3000 (Revised), Assurance Engagements Other than Audits or*

Reviews of Historical Financial Information. International Auditing and Assurance Standards Board.

- Junior, R. M., Best, P. J., & Cotter, J. (2014). Sustainability reporting and assurance: A historical analysis on a world-wide phenomenon. *Journal of Business Ethics*, 120(1), 1–11. <https://doi.org/10.1007/s10551-013-1637-y>.
- Kend, M. (2015). Governance, firm-level characteristics and their impact on the client's voluntary sustainability disclosures and assurance decisions. *Sustainability Accounting, Management and Policy Journal*, 6(1), 54–78. <https://doi.org/10.1108/SAMPJ-12-2013-0051>.
- Khatib, S. F. (2024). Sustainability assurance and corporate environmental accountability. *Social and Environmental Accountability Journal*, 44(2), 176–177.
- Liu, J. Y. (2018). An internal control system that includes corporate social responsibility for social sustainability in the new era. *Sustainability*, 10(10), 3382.
- Liu, P., Li, Z., & Luo, P. (2023). External corporate governance and assurance of corporate social responsibility reports: Evidence from China. *Sustainability Accounting, Management and Policy Journal*, 14(2), 420–457.
- Lozano, R., Nummert, B., & Ceulemans, K. (2016). Elucidating the relationship between sustainability reporting and organisational change management for sustainability. *Journal of Cleaner Production*, 125, 168–188. <https://doi.org/10.1016/j.jclepro.2016.03.021>.
- Manetti, G., & Becatti, L. (2009). Assurance services for sustainability reports: Standards and empirical evidence. *Journal of Business Ethics*, 87(1), 289–298. <https://doi.org/10.1007/s10551-008-9809-x>.
- Manetti, G., & Toccafondi, S. (2012). The role of stakeholders in sustainability reporting assurance. *Journal of Business Ethics*, 107(3), 363–377. <https://doi.org/10.1007/s10551-011-1044-1>.

- Martínez-Ferrero, J., & García-Sánchez, I. M. (2017). Sustainability assurance and cost of capital: Does assurance impact on the cost of capital of sustainable companies? *Business Strategy and the Environment*, 26(5), 658–671. <https://doi.org/10.1002/bse.1946>.
- Mnif Sellami, Y., Dammak Ben Hlima, N., & Jarboui, A. (2019). An empirical investigation of determinants of sustainability report assurance in France. *Journal of Financial Reporting and Accounting*, 17(2), 320-342.
- O'Dwyer, B., & Owen, D. L. (2005). Assurance statement practice in environmental, social and sustainability reporting: A critical evaluation. *The British Accounting Review*, 37(2), 205–229. <https://doi.org/10.1016/j.bar.2005.01.005>.
- O'Dwyer, B., Owen, D. L., & Unerman, J. (2011). Seeking legitimacy for new assurance forms: The case of assurance on sustainability reporting. *Accounting, Organizations and Society*, 36(1), 31–52. <https://doi.org/10.1016/j.aos.2011.01.002>.
- O'Rourke, A., & Ringer, A. (2016). The impact of sustainability information on consumer decision making. *Journal of Industrial Ecology*, 20(4), 882–892. <https://doi.org/10.1111/jiec.12310>.
- Perego, P., & Kolk, A. (2012). Multinationals' accountability on sustainability: The evolution of third-party assurance of sustainability reports. *Journal of Business Ethics*, 110(2), 173–190. <https://doi.org/10.1007/s10551-012-1420-5>
- Pflugrath, G., Roebuck, P., & Simnett, R. (2011). Impact of assurance and assurer's professional affiliation on financial analysts' assessment of credibility of corporate social responsibility information. *Auditing: A Journal of Practice & Theory*, 30(3), 239–254. <https://doi.org/10.2308/ajpt-50052>.
- Reimsbach, D., Hahn, R., & Gürtürk, A. (2018). Integrated reporting and assurance of sustainability information: An experimental study on professional investors' information processing. *European Accounting*

- Review, 27(3), 559–581. <https://doi.org/10.1080/09638180.2016.1273787>.
- Rezaee, Z. (2016). Business sustainability research: A theoretical and integrated perspective. *Journal of Accounting Literature*, 36, 48–64. <https://doi.org/10.1016/j.acclit.2016.05.003>.
- Rossi, A., & Tarquinio, L. (2017). An analysis of sustainability report assurance statements: Evidence from Italian listed companies. *Managerial Auditing Journal*, 32(6), 578–602. <https://doi.org/10.1108/MAJ-07-2016-1408>.
- Searcy, C. (2016). Measuring enterprise sustainability. *Business Strategy and the Environment*, 25(2), 120–133. <https://doi.org/10.1002/bse.1861>.
- Steinmeier, M., & Stich, M. (2019). Does sustainability assurance improve managerial investment decisions?. *European Accounting Review*, 28(1), 177–209.
- Talbot, D., & Boiral, O. (2018). GHG reporting and impression management: An assessment of sustainability reports from the energy sector. *Journal of Business Ethics*, 147(2), 367–383. <https://doi.org/10.1007/s10551-015-2979-4>.
- Velte, P., & Stawinoga, M. (2017). Integrated reporting: The current state of empirical research, limitations and future research implications. *Journal of Management Control*, 28(3), 275–320. <https://doi.org/10.1007/s00187-016-0235-4>.
- Wong, R., & Millington, A. (2014). Corporate social disclosures: A user perspective on assurance. *Accounting, Auditing & Accountability Journal*, 27(5), 863–887. <https://doi.org/10.1108/AAAJ-06-2013-1389>.
- Zorio, A., García-Benau, M. A., & Sierra, L. (2013). Sustainability development and the quality of assurance reports: Empirical evidence. *Business Strategy and the Environment*, 22(7), 484–500. <https://doi.org/10.1002/bse.1764>.

