Multi-theoretical perspectives for corporate risk disclosure: a literature review

Erastus Mbithi* and David Wang’ombe
Strathmore University,
P.O. Box 59857, Nairobi, Kenya
Email: embithi@strathmore.edu
Email: dwangombe@strathmore.edu
*Corresponding author

Tankiso Moloi
University of Johannesburg,
P.O. Box 524, Auckland Park, South Africa
Email: smoloi@uj.ac.za

Abstract: The purpose of this article is to review and discuss theoretical approaches commonly used to study corporate risk disclosure (CRD) behaviour. The review presents areas of convergence and divergence in understanding CRD so as to build a case for an integrated theoretical perspective. The multi-theoretical approach will provide wide conceptual lens to understand, explain CRD behaviour, and identify ways in which CRD can attain high quality. The paper reviewed 52 articles from accounting and non-accounting journals published between 1990–2019. The journals reviewed were identified according to the UK’s Association of Business Schools (ABS) journal quality ranking guide. The paper responds to literature calling for CRD quality to improve among policymakers, regulators, and academicians. The paper argues that any attempts to enhance CRD quality should start by establishing an integrated framework that will help in understanding the phenomena in several perspectives in order reconcile inconsistent results of prior studies.

Keywords: agency theory; resource dependency theory; signalling theory; stakeholder theory; legitimacy theory; institutional theory; multi-theoretical perspective.

Reference to this paper should be made as follows: Mbithi, E., Wang’ombe, D. and Moloi, T. (2020) ‘Multi-theoretical perspectives for corporate risk disclosure: a literature review’, Int. J. Critical Accounting, Vol. 11, No. 2, pp.125–143.

Biographical notes: Erastus Mbithi is a Doctoral Fellow at Strathmore University working on a PhD proposal in the area of corporate risk reporting. He holds MCOM (Finance) from Strathmore University, and BBM (Finance and Banking) from Moi University. For the last five years, he has lectured accounting and finance courses to undergraduate students, including: financial accounting, financial reporting, management accounting, financial management and corporate finance. He is also Certified Public Accountant-Finalist of Kenya.

Copyright © 2020 Inderscience Enterprises Ltd.
1 Introduction

Corporate risk disclosure (CRD) has become an increasing expectation for various stakeholder groups (regulators, investors, financial analysts) after episodes of unexpected high profile corporate failure (e.g., Enron, WorldCom, Lehman Brothers) and financial distress linked to inadequate disclosure in the annual reports (Ibrahim et al., 2019; Elshandidy et al., 2018b; Elamer et al., 2019). CRD is useful to investors in assessing the company’s performance, dealing with risk diversification and portfolio investment decision making, specifically risk-return decisions (Mokhtar and Mellett, 2013; Abdelrehim et al., 2016). High quality risk disclosure is associated with a lower cost of capital, better risk management, investor protection and usefulness in financial reporting (Ibrahim et al., 2019; Linsley and Shrives, 2006; Oliveira et al., 2011b). Notwithstanding its usefulness, the quality of CRD in the annual report varies in nature, extent, and scope across firms within the same industry and country overtime (ACCA, 2014; Elshandidy et al., 2018b; UNCTAD, 2017). Such variation in CRD quality has generated academic interest among researchers to understand how and to what extent the CRD practice should be communicated to achieve high quality across firms (ACCA, 2014; Ntim et al., 2013; Buckby et al., 2015).

Though the empirical literature provides different theoretical lens behind CRD practice, accounting researchers have not agreed on a universal and comprehensive theoretical lens to explain corporate behaviour relating to CRD practices (Ntim et al., 2013; Oliveira et al., 2018). Instead, they have employed different theoretical perspectives, resulting to variation in the way CRD is conceptualised and different levels of CRD usefulness to the users (Beretta and Bozzolan, 2004; Oliveira et al., 2018). This inconsistency in findings impairs comparability among researchers and adds little to the improvement of CRD practice by practitioners. In order to enhance comparability and improvement of CRD practice, literature invites accounting researchers to reconcile differences in finding through the development of a common and integrated theory that would adequately explain CRD phenomenon in totality and establish ways in which CRD quality can be attained (Elshandidy et al., 2018b; Ntim et al., 2013; Oliveira et al., 2018).
CRD practice entails the provision of principal risks (mandatory or voluntary) facing the company and strategies put in place to mitigate the risks (ACCA, 2011, 2014; Alzead, 2017). CRD may be categorised in many ways, but the reporting of them tend to follow two distinct axes, one for financial risk, and the other for non-financial risk. Financial risk reporting contains a significant amount of quantitative information while non-financial risk involves a qualitative description of risks relating to the company as a whole that cannot be quantified (ACCA, 2014; Linsley and Shrives, 2006; Ntim et al., 2013; Oliveira et al., 2012).

The paper reviews different theoretical strands presented in CRD literature to justify a case for the multi-theoretical framework. The rest of the paper is organised as follows: Section 1 – introduction, Section 2 – theoretical lenses of CRD, Section 3 – agency theory, Section 4 – resource dependency theory, Section 5 – signalling theory, Section 6 – stakeholder theory, Section 7 – legitimacy theory, Section 8 – institutional theory, Section 9 – multi-theoretical perspective and Section 10 – conclusion.

2 Theoretical lenses of corporate risk disclosure

To identify the appropriate theory used in CRD literature, it is critical first to understand what constitutes a theory? Theory, in its simplest terms, is a conception of the relationship between things (Gray et al., 2009). Similarly, Corley and Dennis (1990) define theory as a set of conceptual links between concepts providing explanations about how and why such a phenomenon occurred. In this context, the theory will explain how we perceive CRD and its variation across firms within the same industry and across the country over time. On the other hand, an integrated CRD framework will constitute a collection of interrelated and complementary concepts providing explanations about the drivers of CRD practice.

The theoretical lenses used to explain CRD behaviour have evolved with the evolution of accounting research. Before the mid-1960s, accounting research was purely normative (Avelé, 2014), i.e., seeking to prescribe what accounting ought to be (Avelé, 2014) and limited in ability to explain and predict the accounting practice empirically. To overcome this inadequacy, positive accounting theory (modern accounting theory) which focused on information perspective was borne by Ball and Brown (1968), when they applied methods of empirical finance in accounting (Watts and Zimmerman, 1990).

However, the focus on the information perspective was considered narrow because it ignored the opportunistic aspect of accounting information (Watts and Zimmerman, 1990; Avelé, 2014). This inadequacy was later addressed by Jensen and Meckling (1976) and Watts and Zimmerman (1990). From the accounting research evolution, there is an infinite array of theories available in corporate disclosure (Gray et al., 2009). For instance, Thomson (2007) identified 33 groups of theories. Gray et al. (1995) categorised corporate disclosure theories studies into three categories; decision-usefulness studies (test the extent and usefulness of corporate disclosures), economic theory studies (rely heavily on positive accounting theory which is based on self-interest and profit maximisation of economic agents) and socio-political theory studies (based on social and political relationship between the firm and the society) (Oliveira et al., 2010).

In this context, to identify a specific theory explaining the quality of CRD among firms, an electronic search was first carried out on journals database to identify how the
word ‘quality’ and the term ‘corporate risk reporting’ have been used among scholars similar to Wangombe (2013). The appropriate journals that appear in internationally recognised peer-reviewed journals were established, and word search carried (Elshandidy et al., 2018b). The identified journals were defined according to the UK’s Association of Business Schools (ABS) Journal quality ranking guide (i.e., those termed 1*, 2*, 3* and 4* journals) (Elshandidy et al., 2018b).

Although, some scholars have challenged the theoretical validity of the journal rankings quality guides (Guthrie et al., 2000) owing to the difficulties of establishing objective assessment (Bonner et al., 2006) for the study, it was assumed that journal ranking quality may be used as the first step to identify the usage of a given term (Wangombe, 2013). From the electronic search, researchers have used the term ‘risk disclosure’ and ‘risk reporting’ interchangeably. Studies that have used the risk disclosure quality and risk reporting quality were considered while studies that have used risk disclosure and risk reporting without paying attention to quality were eliminated from the list of articles similar to Wangombe (2013).

The search produced 33 articles from the peer-reviewed journals articles ranked as 1*, 2*, 3* and 4* based on ABS (ABCD) (1990–2019) similar to Elshandidy et al. (2018b), as presented in Appendix 1. Since risk disclosure is a multidisciplinary concept (Folami and Jacobs, 2016), it can be published in other journals other than the accounting journals. Therefore, a similar word search was carried out in Google Scholar and produced 19 articles, as presented in Appendix 2 (Wangombe, 2013).

The articles from both accounting journals and other non-accounting journals produced two streams of theories that are commonly used to explain and predict CRD behaviour as presented in Appendices 1 and 2. One strand of theories focus on economic perspective, which includes; agency theory, resource dependency theory, and signalling theory. The other focuses on socio-political perspectives, namely; stakeholder theory, legitimacy theory, and institutional theory. The paper presents how the two strands of literature have evolved to explain the quality of risk disclosure among firms and the implications of choosing one theoretical lens over the other to understand CRD behaviour.

3 Agency theory

Agency theory is the most dominant of all corporate disclosure theories and widely used in risk disclosure studies (Ntim et al., 2013; Tan et al., 2017). The theory argues that a firm is a nexus of contracts between self-seeking agents (managers) and principals (owners) operating in efficient capital markets (Jensen and Meckling, 1976). An agency contract is assumed to exist where one or more persons (owner/principal) engage another person to perform some service (managers/agent) on their behalf (Jensen and Meckling, 1976), i.e., the owners (principal) may delegate some decision making authority to the agents (managers).

The theory maintains that because of the separation between ownership and control, managers have access to more information about the firm and may be driven by their self-interests (Jensen and Meckling, 1976). This may lead to agency problems between owners and managers and consequently, agency costs (monitoring, bonding, and residual loss) (Jensen and Meckling, 1976). To mitigate the agency cost, both agents and principals recognise that it may be beneficial to reduce this information asymmetry
Multi-theoretical perspectives for corporate risk disclosure

through providing more risk-related disclosures (Jensen and Meckling, 1976; Abraham and Cox, 2007; Mehadi et al., 2018).

Theoretically, the theory suggests that a company that wishes to reduce information asymmetry in the capital market will provide more useful risk related information in their annual reports voluntarily. Thus, providing risk-related disclosures is seen as a monitoring mechanism from the agency theory perspective. Corporate governance structure plays an active role as a monitoring mechanism to encourage extensive risk communication in an organisation (Elshandidy and Neri, 2015; Mehadi et al., 2018). However, ownership structure influences the attitudes of corporate governance and CRD, because directors who oversee the preparation of annual reports on behalf of the owners play a vibrant role in risk disclosure (Abraham and Cox, 2007).

Several empirical studies have examined the suitability of agency theory in different contexts in explaining CRD practices using some corporate characteristics as proxies for agency cost in financial and non-financial institutions, such as (Ntim et al., 2013; Saggar and Singh, 2017). Discussing all the corporate characteristics and studies used in CRD literature is not feasible; thus, the study will provide insight into the theory usage by drawing a few individual studies and variables reviews as illustrations. For instance, Ntim et al. (2013) employed agency theory to examine the influence of ownership structure on CRD practices using a sample of 169 South African non-financial firms listed on the Johannesburg Stock Exchange (JSE). Their finding suggests a positive association between corporate ownership mechanisms (e.g., concentrated ownership) and CRD. This finding supports agency theory as a primary explanation for CRD.

Similarly, using a sample of 60 non-financial Portuguese and Spanish companies, Oliveira et al. (2018) tested agency theory by examining the determinants of risk reporting, in agreement with the expectations of agency theory, their reported finding indicates a positive relationship between higher ownership concentration and risk reporting practice. Additionally, using a sample of 105 non-financial Egyptian companies, Mokhtar and Mellett (2013) tested agency theory by investigating the effect of competition, corporate governance, and ownership structure on risk reporting. Their findings suggest a positive association between concentrated ownership and risk reporting, which confirms support for agency theory.

On the other hand, Abraham and Cox (2007) tested agency theory by analysing the determinants of risk disclosure in the UK using a sample of 100 non-financial listed firms. Their results failed to support the expectations of agency theory. Similarly, Oliveira et al., 2011b confirmed no support for agency theory consistent with Abraham and Cox (2007) that ownership structure is not significant in explaining CRD using a sample of 81 companies both listed and unlisted non-financial firms in Portuguese. In another study, Saggar and Singh (2017) examined the relationship between corporate governance and CRD from the lens of agency theory, using a sample of 100 Indian non-financial firms. Their finding suggests a negative association between concentrated ownership in the hands of the largest shareholder and CRD. This finding failed to support the expectations of agency theory.

Given the inconsistent results from prior studies, the effect of ownership structure (concentrated ownership) on CRD through the lens of agency theory is yet to substantiated. Empirically, some scholars seem to support agency theory with varied levels of CRD (Ntim et al., 2013; Mokhtar and Mellett, 2013; Sekome and Lemma, 2014; Oliveira et al., 2018) while others fail to support (Saggar and Singh, 2017; Abraham and
Cox, 2007; Oliveira et al., 2011b). Thus, the suitability of the theory alone to explain CRD using ownership structure in different contexts is not conclusive.

Notwithstanding its applicability, agency theory has also been challenged on the following basis; reducing information asymmetry through CRD in the annual reports is more relevant to financial stakeholders when making investment decisions, specifically assessing risk-return decisions (Ntim et al., 2013). This implies that agency theory places more importance to financial stakeholders and assumes that other stakeholders are irrelevant and if they happen to benefit from CRD, then its unintentional. The focus on financial stakeholders is a narrow view in that, it does not meet the societal needs in general (Abraham and Cox, 2007; Ntim et al., 2013). Thus, the ability of agency theory to explain corporate risk disclosure is limited to only financial stakeholders instead of balancing the interests of all the stakeholders in a firm. Similarly, the theory maintains that there is a clear separation between managers and owners at the objective level, this separation is still debatable in corporate disclosure literature because what motivates individual calculative action by managers may be informed by their perception (Donaldson and Davis, 1991).

4 Resource dependency theory

Resource dependency theory was borne by (Pfeffer and Salancik, 1978) and applied in CRD studies (e.g., Barakat and Hussainey, 2013; Al-Hadi et al., 2016). The theory maintains that an organisation that is committed to high levels of transparency in enhancing CRD enjoys certain benefits and privileges (Pfeffer and Salancik, 1978). Engaging in CRD is an expensive activity for companies because it exposes them to certain costs (legal costs, financial commitment, completion and proprietary cost) which may lead to competition cost (Pfeffer and Salancik, 1978). Since it’s an expensive undertaking, firms which engage in CRD stand to benefit from gaining access to critical resources such as finance and business contracts through access to cheaper cost of capital, internal risk management, management expertise, improved reputation and image which reduces political costs (Lajili and Zéghal, 2005; Ntim et al., 2013). According to Pfeffer and Salancik (1978), firms are interest-driven entities that seek to gain, regain and sustain legitimacy by using dynamic choice behaviours to manipulate relevant stakeholders who are crucial resource providers and exert power or influence over them. From the resource dependency perspective, firms wish to manage the capital market participants through increasing CRD quality for their strategic reasons.

Resource dependency theory has been employed in empirical literature to examine CRD practices in different contexts using financial and non-financial firms such as; (Elamer et al., 2019; Mokhtar and Mellett, 2013; Ntim et al., 2013; Barakat and Hussainey, 2013). For instance, a more recent study by Elamer et al. (2019) employed resource dependency theory to examine the impact of multi-layer governance using a sample of 100 Middle East and North Africa (MENA) financial firms. Their findings support the expectations of resource dependency theory that corporate board mechanism is associated with CRD (e.g., board size and independence). A similar kind of result was obtained by Ntim et al. (2013) in the South African context, Ntim et al. (2013) reported a positive association between corporate board mechanism (e.g., the board size, board diversity, and independence).
Equally, in the Egyptian context, Mokhtar and Mellett (2013) reported a positive association between corporate governance (e.g., CEO duality) and CRD. In addition, Al-Hadi et al. (2016) examined risk committee, firm lifecycle, and market risk disclosures using a sample of 677 Gulf Cooperation Countries (GCC). In their findings, they reported such association in support for resource-based view, that mature firms have adequate resources to form risk committees with adequate size, skills, and independence to enhance their risk disclosure and entice the stakeholders such as investors, customers, and suppliers.

However, Barakat and Hussainey (2013) used a sample of 85 European Union banks, tested resource dependency theory by examining the effect of corporate governance on risk reporting quality (proxied by operating risk reporting quality) and reported negative association. Although, Elamer et al. (2019) reported a positive association between ownership structure (e.g., government and family ownership), sharia supervisory board and CRD, the effect of political stability and absence of violence at country level was found to be negative and against the resource dependency theory. Empirically, the previous literature provides mixed results on the effect of corporate governance mechanisms on risk disclosure using the lens of resource dependence theory. While some scholars seem to support the argument with varying levels of CRD (Elamer et al., 2019; Mokhtar and Mellett, 2013; Ntim et al., 2013), others fail to support (Barakat and Hussainey, 2013). Thus, the ability of the theory alone to explain CRD using ownership structure in different contexts is therefore not conclusive.

Despite the usefulness of resource dependency theory, its ability to explain and predict CRD behaviour is weakened by implying that corporates are self-interest driven entities which engage in corporate risk disclosures for strategic motives instead of focusing on accountability and responsibility to a wide range of stakeholders (Lopes and Rodrigues, 2007; Ntim et al., 2013). Just like agency theory, the focus on critical resource providers by resource dependency theory is a narrow view and limits its ability to explain the CRD behaviour in totality.

5 Signalling theory

The signalling theory was suggested by Akerlof (1970) and developed initially by Spence (1973) to clarify the information asymmetry in the labour markets. Several studies have embraced the signalling theory in CRD literature (Mokhtar and Mellett, 2013; Elshandidy et al., 2018a). Signalling theory is useful for describing the behaviour when two parties (organisations or individuals) have access to different information. Usually, the sender of the information and the receiver of the signalled information. The sender must always choose how to convey the information, and the receiver must always choose how to interpret the signal conveyed.

As a result of information asymmetry, organisations are likely to signal or convey certain information to the outsiders to show they are better than their competitors in the market to attract resources and enhance their reputation (Verrecchia, 1983; Oliveira et al., 2010). The theory argues that high quality firms wish to distinguish themselves from low quality firms by providing more disclosures voluntarily (Merkel-Davies and Brennan, 2007). Equally, Elamer et al. (2019) argued that comprehensive CRD acts as a signal of improved risk management, compliance to standards (IFRS), and regulation (Basel
Accords) to enhance banks reputation. It implies that firms with efficient risk management capacity may disclose more risk information voluntarily to differentiate themselves from other organisations with inefficient risk management. However, according to Elshandidy and Neri (2015), firms with ineffective risk management may also disclose more information to avoid misunderstanding among investors. From the signalling theory perspective, firms wish to manage capital market participants through increasing CRD quality for them to achieve the best prices in shares reflected in the stock prices and cost of capital.

The suitability of signalling theory in explaining CRD practice has been tested in empirical literature using firm characteristics such as (Elshandidy and Shrives, 2016; Saggar and Singh, 2017; Elshandidy and Neri, 2015; Elshandidy et al., 2018a; Domínguez and Gámez, 2014; Miihkinen, 2012). For instance, Elshandidy and Shrives (2016), using a sample of 143 non-financial firms listed in German, examined the impact of environmental incentives on textual risk reporting from the lens of signalling theory. Their findings suggest a positive association between the environmental factor (e.g., firm risk level) and risk reporting. This finding supports the expectation of signalling theory.

Similarly, using a sample of 300 Australian Securities Exchange (ASX) non-financial listed companies, Buckby et al. (2015) employed signalling theory to assess the determinants of quality of risk management disclosures (proxied by quantity and richness) and found a positive relationship between risk management disclosures and firms risk. Their findings also support signalling theory and consistent with (Miihkinen, 2012) who found a positive association between firms risk level and risk management disclosures in the UK, Canadian and Finnish firms, respectively. In another study, Elshandidy et al. (2018a), using a sample of 102 financial firms in the Chinese market, reported that risky firms tend to communicate more risk related information in line with signalling theory.

On the other hand, Saggar and Singh (2017) employed signalling theory and found a negative association between firm profitability and CRD practices in the Indian context. Using a sample of listed non-financial firms in the Madrid Stock Exchange, Domínguez and Gámez (2014) did not find a relationship between corporate characteristics and CRD (e.g., profitability). Equally, Elshandidy and Neri (2015) reported an insignificant relationship between firm profitability and risk disclosures, using a sample of the UK and Italian firms. The finding of Saggar and Singh (2017); Domínguez and Gámez (2014) and Elshandidy and Neri (2015) failed to support expectations of the signalling theory. Given the mixed results reported, the ability of signalling theory alone to explain CRD in different contents is not conclusive; further research is needed to provide more insights.

Notwithstanding the applicability of the theory, Helbok and Wagner (2003) provided a contradicting view that managers in low quality organisations also have incentives to use more risk disclosures to signal or convey their risk management abilities. Also, the theory has been accused of focusing more on the benefits that accrue to the firms rather than the purpose of stakeholder informativeness. Thus, the theory concentrates more on what the firms stand to benefit from disclosure rather than communicating information to outsiders for them to make risk-informed decisions. Just like agency theory and resource dependency theory, it assumes that, the firm is a self-interest driven entity that pays more attention to financial stakeholders for the firm to benefit from the capital markets.
6 Stakeholders theory

The theory emphasises the relations between the firm and its stakeholders, and Ansoff (1965) is considered the pioneer of the term ‘stakeholder theory’, which was later embraced in the mid-80s. According to Freeman (1984), organisations are made up of powerful stakeholder groups crucial for their survival. To gain their approval, organisations use CRD as a tool to manage their informational needs. This implies that the more powerful stakeholders are, the more the organisation must adapt, but who are these influential stakeholders in a firm and who determines their powers? Stakeholder groups have evolved over the years, at one point, the shareholders or owners were considered to be the primary stakeholders, and the primary goal of a firm was to maximise their wealth. However, this definition was considered narrow, and Freeman (1984) expanded it to include other groups such as regulators and other interest groups.

The stakeholder definition was further expanded to include different categories, for instance, external and internal stakeholders (Carroll, 1989), voluntary and involuntary stakeholders (Clarkson, 1995), primary and secondary stakeholders (Clarkson, 1995). The central aspect of different categories of the stakeholders is to show the different informational needs. Deegan (2000) stated that the stakeholder power is determined by the level of control they have over the resources. Thus, according to the theory, stakeholders interest motivates firms to meet the informational needs of various stakeholder groups by communicating more risk related information (Al-Hadi et al., 2016). From the stakeholder perspective, organisations use CRD to manage multiple stakeholder expectations such as investors, regulators, government agencies, employees, and society among others (Freeman, 1984; Ntim et al., 2013).

Stakeholder theory has been employed in the empirical literature to examine corporate characteristics variables in different contexts such as, (Madrigal et al., 2015; Ntim et al., 2013; Amran et al., 2009; Saggar and Singh, 2017). For instance, Ntim et al. (2013) in the South African context confirmed support for the stakeholder theory by investigating the effect of corporate governance mechanisms (e.g., board diversity, the board size, board independence). Their findings suggest a positive association between board diversity, the board size, and board independence and CRD in line with stakeholder theory. In another study, Saggar and Singh (2017) examined the applicability of stakeholder theory using several corporate governance variables (e.g., the board size, gender diversity, board independence) and other firm attributes in the Indian context. Their finding reported only two governance variables (board size and gender diversity) have a positive influence on CRD consistent with Ntim et al. (2013) while no significant relationship was reported on the impact of board independence on CRD.

Equally, Amran et al. (2009), using a sample of 100 non-financial listed firms in Malaysia, used several firm characteristics from the lens of stakeholder theory (e.g., firm size, leverage), to examine the applicability of stakeholder theory in CRD. Their findings suggest that leverage and firm size do not matter in explaining CRD. On the other hand, Madrigal et al. (2015) provided a contradicting view that firm size positively influences CRD, using a sample of 35 non-financial listed firms in Spanish. From the mixed results, the stakeholder theory alone is not sufficient in explaining CRD.

Also, the theory was challenged on the following basis; it directs corporate risk disclosures to the most influential stakeholders, but who are these powerful stakeholders? The theory has also been criticised in situations where it is not easy to identify all the
potential stakeholders in a firm (O’Dwyer, 2002). Similarly, the statement that the role of management is to balance the conflicting interest of various stakeholders is not attainable given the countless business stakeholders and their conflicting interests (Sternberg, 1997). According to Donaldson and Davis (1991), stakeholder theory is inconsistent with other theories such as agency theory. Whereas the stakeholder theory advocates for shared incumbency in roles of CEO and board of director’s chair, agency theory asserts that stakeholder interests require protection by ensuring independence in the board.

7 Legitimacy theory

The theory emphasises that organisations are expected to act in a socially responsible manner to gain the approval of goals, access resources, place in the society and guarantee continued existence (Guthrie and Parker, 1989). The theory relies on the notion that there is a social contract between the organisation and the society which represents many expectations from the firm (Deegan, 2000). The terms of the agreement may either be partly explicit (consist of legal requirements) or partially implicit (consist of community expectations) (Deegan, 2000). Organisations legitimacy is ensured if the terms of the contract are not breached. Thus, organisations are guaranteed continued existence if its value system (norms and bounds) is consistent with the larger system which it operates in. However, such a right is endangered when there is an actual or potential conflict between the two value systems (Ashforth and Gibbs, 2008). From the legitimacy theory perspective, firms gain, regain, and sustain social acceptance and legitimise their operations by engaging in CRD.

Several empirical studies have tested legitimacy theory to investigate the effect of public visibility on CRD mainly in financial and non-financial institutions, such as Oliveira et al. (2011b, 2018), Hassan, (2009), Al-Hadi et al. (2016) and Mokhtar and Mellett (2013). For instance, Oliveira et al. (2011b) in the Portuguese context assessed the risk disclosure practices and their characteristics, their finding confirmed the support for legitimacy theory that public visible companies proxied by firm size significantly positively influence CRD, i.e., firms tend to manage their reputation through CRD. A similar kind of finding was reported by Oliveira et al. (2018) in the Spanish and Portuguese context. Oliveira et al. (2018) tested the relationship between public visibility proxied by firm size on CRD from the lens of legitimacy theory and found a positive relationship.

In another study, using a sample of 677 financial firms from the Gulf Cooperation Council, Al-Hadi et al. (2016) reported a positive association in support of legitimacy theory. Whilst, Mokhtar and Mellett (2013) failed to support legitimacy theory in the Egyptian context consistent with Hassan (2009) who investigated relationship between specific characteristics (proxied by firm size) and level of risk disclosure, using a sample of 41 corporations listed in either Dubai Financial Market. Although several studies provide support for legitimacy theory, the level of support is varied among researchers while others fail to support the theory (Oliveira et al., 2011b; Al-Hadi et al., 2016; Mokhtar and Mellett, 2013). Empirically defining CRD using the lens of legitimacy theory from different contexts is not feasible.

Further, despite its applicability in different contexts, legitimacy theory is vague in identifying the corporate stakeholders and prioritising financial stakeholders (Deegan, 2000). Another limitation of legitimacy theory in corporate disclosure literature was
heightened by Gray et al. (2009), who argued that the theory is vague in the area of corporate disclosure as it does not inform why disclosure may be selective.

8 Institutional theory

The institutional theory asserts that organisations continuously seek to gain legitimacy through conforming to pressures arising from the external business environment (DiMaggio and Powell, 1983; Scott, 1995). The theory suggests that organisations are part of the social system that interacts with society, and they tend to integrate (Aguilera and Jackson, 2003). Organisations integrate external value systems (norms, bounds and rules) into their structures and operations to gain legitimacy.

Isomorphism explains the reasons underlying the affinity of firms to become homogeneous in structures despite operating different technologies (Meyer and Rowan, 1977; DiMaggio and Powell, 1983). Three pillars force organisations towards isomorphism; coercive, mimetic, and normative (DiMaggio and Powell, 1983). These three pillars exert pressure to which organisations respond. The response to such factors shape manager’s decisions on whether to hold back or disclose mandatory and voluntary risk-related information.

The coercive pressure stems from legal and political power generated by the government (DiMaggio and Powell, 1983); coercive pressure encourages organisations to observe the statutory or mandatory risk disclosures. Thus, coercive pressure influences the firm decision to disclose mandatory risk information. These imply that a firm will respond to changes in regulation and legal environment to gain legitimacy. For instance, listed companies may adopt risk reporting in the annual report to comply with new risk disclosure regulations.

Mimetic pressure takes place when organisations imitate other successful firms by coping with uncertainties from the business environment (DiMaggio and Powell, 1983). Normative pressure arises from professional bodies’ initiatives (universities and professional training institutions) and is likely to affect organisations voluntary risk disclosure decisions (DiMaggio and Powell, 1983). Under normative pressure, the organisation responds to change occasioned by development and communication by peers through common socialisation (DiMaggio and Powell, 1983). Both mimetic and normative pressure affect voluntary risk disclosure decisions, while coercive affect mandatory risk disclosure decisions. Both legitimacy theory and institutional theory focus on the ability of the firm to gain social acceptance.

Studies from the literature have empirically tested the institutional theory through corporate variables in different contexts and provided inconclusive results such as (Ntim et al., 2013; Oliveira et al., 2018; Hassan, 2009). For instance, Hassan (2009) in the UAE context found a positive association in line with institutional theory. Hassan (2009) argued that firms use CRD practices to imitate other firms in the industry and not for communicating relevant information to the stakeholders. Spanish and Portuguese context, Oliveira et al. (2018) employed institutional theory and found negative relationship between the CRD and corporate governance variables (e.g., board diversity, board size) which is not consistent with Ntim et al. (2013) in the South Africa context who found larger boards and diverse provide better connection with a wide variety of stakeholders which enhances corporate legitimacy and reputation.
Given the reported finding, further research is needed to investigate more on the suitability of institutional theory to explain CRD in different contexts. Also, the institutional framework may prompt organisations to take strategic responses to institutional risk pressures that may lead to purely symbolic rather than substantive CRD in the annual report. For instance, mimicking CRD from the best practice in the industry may lead to standardised disclosures overtime thus resulting to generic/boilerplate risk disclosures which are less relevant and less useful to the users (regulators, investors and financial analysts) (DiMaggio and Powell, 1983; Sarens and D’Onza, 2017; Abraham and Shrives, 2014).

9 Multi-theoretical perspective

The review of CRD literature identified six commonly used theoretical perspectives (agency theory, resource dependency theory, signalling theory, stakeholder theory, legitimacy theory, and institutional theory) used to explain CRD behaviour. All six perspectives presented a certain aspect of CRD and limited inability to understand and explain the phenomenon in totality. This confirms that CRD is a complex phenomenon to define using a single theory. The difference in how different theories motivate CRD is explained by the source or level of external pressure or power which differs from theory to theory. The six theories reviewed present four levels of external pressure. The first level of external pressure identifies financial stakeholders under the economic theories (agency theory, resource dependency theory, signalling theory) as the essential stakeholders in firms when communicating risk-related information. This level/source focuses on financial shareholders as the relevant or key stakeholder and places less relevance to other stakeholders in corporate risk communication. The second level of influence identifies public (legitimacy theory) as the relevant stakeholder in a firm when disclosing risk-related information. The third level of control considers all the stakeholders (financial stakeholders, employees, government, and the general public, etc.) (stakeholder theory), i.e., it takes care of all the information needs of all the stakeholders.

The fourth level of influence is the organisational context which firms consider in communicating risk-related information. Organisational context sources include influence by industry leaders (mimetic), influence by the professional firms or big auditing firms (normative) and influence by regulations and legislation (coercive). The four sources of external influence sometimes converge and diverge in explaining CRD. For instance, the focus on financial stakeholder under the economic theories (agency, resource dependency, signalling theory) differs from the focus on the public as the relevant stakeholder (legitimacy theory).

Further, focusing on the financial stakeholder and public as a relevant stakeholder view overlaps with the broader stakeholder theory. This is because both financial stakeholders and the public are part of the many stakeholders in a firm. The difference in how the external pressure exerts influence on the management may explain how prior studies have adopted different theoretical lenses to test the same variable in different contexts with mixed results, e.g., the use of agency theory, resource dependency theory and stakeholder theory to explain the relationship between corporate characteristics and corporate risk disclosures (Ntim et al., 2013; Oliveira et al., 2018). From the above, the limitations of using a single theory to explain CRD justifies a case for use of wide theoretical lens to study the CRD behaviour in totality (Abraham and Shrives, 2014;
Elshandidy et al., 2018b; Mehadi et al., 2018; Ntim et al., 2013). Similarly, the theories reviewed present context-specific finding (Abraham and Shrives, 2014; Elshandidy et al., 2018; Mehadi et al., 2018; Ntim et al., 2013) leading to varied results and different levels of CRD usefulness among researchers, which impairs comparability and adds little to the improvement of CRD practice among practitioners. Therefore, adopting an integrated perspective consisting of agency theory, resource dependence theory, stakeholder theory, legitimacy theory, and institutional theory will minimise the weakness of adopting a single theory and provide uniform and wide theoretical lens to study CRD subject which will help to reconcile the inconsistent finding.

10 Conclusions

The paper proposes a multi-theoretical perspective to be used for CRD research studies, especially in explaining the organisation’s CRD behaviour. These theories are drawn from both economic and social-political perspectives to construct integrated CRD framework which considers convergent features of each theory. The review of theories presents four levels of external pressure. The first level of external pressure identifies financial stakeholders under the economic theories (agency theory, resource dependency theory, signalling theory) as the essential stakeholders in firms targeted with risk-related information disclosure. Managers respond to this level of external pressure from financial stakeholders through risk disclosures to reduce information asymmetry and maximise their wealth for strategic purposes. This perspective implies that corporates are self-interest driven entities that engage in risk disclosures for strategic motives instead of focusing on accountability and responsibility to a wide range of stakeholders. The second level identifies the public under legitimacy theory as the crucial stakeholders targeted with risk disclosures. Managers respond to this level of external pressure from the public through closing the legitimacy gap between the firm and the society. This perspective implies that there is a perceived contract between the society and the firm with terms and organisation survival is guaranteed if its value systems are in line with the society and endangered when there is an actual or potential conflict between the two value systems. Thus, organisations gain social acceptance and legitimise their operations by engaging in risk disclosures. The third level of influence identifies all the stakeholders (debtholders, suppliers, employees, government, the general public) as relevant when communicating risk-related information. Managers respond to this group through balancing risk informational needs of all the stakeholders. However, responding to this group may be challenging in situations where it is not easy to identify all the potential stakeholders in a firm.

The fourth level of influence identified is the institutional environment, this environment includes influence by industry leaders (mimetic), influence by listing laws, regulations and legislation on risk disclosure (coercive) and influence by professional firms or the big auditing firms (normative). Managers respond to this level through complying with new risk disclosure guidelines or regulations, imitating other successful firms in the industry and changing disclosures as a result of communication by peers through socialisation.

The paper argues that all perspectives are interrelated and complementary rather than competing in explaining CRD behaviour. Although the previous CRD literature supports
a case for the comprehensive framework and widely used, no study has incorporated the six perspectives in one research. The use of single theory presents a particular aspect of CRD practice and limited in ability to explain in totality. Hence, the comprehensive framework will provide a broader perspective in understanding and explaining motivations and variation of risk disclosure within the firm and across industries. The theoretical framework will also give a guideline to novice CRD researchers as a theoretical foundation for empirical studies in various contexts. However, the framework did not capture all the corporate risk disclosure theories, some theories that are not frequently used, such as proprietary, political, and prospect theory as shown in Appendices 1 and 2 were excluded.

References
Abdelrehim, N., Linsley, P. and Verma, S. (2016) ‘Understanding risk disclosures as a function of social organization: a neo-Durkheimian institutional theory-based study of Burmah oil company 1971–1976’, The British Accounting Review [online] https://doi.org/10.1016/j.bar.2016.10.007.
Abraham, S. and Cox, P. (2007) ‘Analyzing the determinants of narrative risk information in UK FTSE 100 annual reports’, British Accounting Review [online] https://doi.org/10.1016/j.bar.2007.06.002.
Abraham, S. and Shrives, P.J. (2014) ‘Improving the relevance of risk factor disclosure in corporate annual reports’, British Accounting Review, Vol. 46, No. 1, pp.91–107 [online] https://doi.org/10.1016/j.bar.2013.10.002.
ACCA (2011) Predicting an Uncertain Future: Narrative Reporting and Risk Information, The Association of Chartered Certified Accountants.
ACCA (2014) Reporting Risk. The Association of Chartered Certified Accountants [online] http://www.accaglobal.com/content/dam/acca/global/PDF-technical/financial-reporting/pol-afb-rr.pdf (accessed 2 February 2019).
Aguilera, R.V. and Jackson, G. (2003) ‘The cross-national diversity of corporate governance: dimensions and determinants’, The Academy of Management Review Academy of Management Review, Vol. 28, No. 3, pp.447–465 [online] http://www.jstor.org/stable/30040732%0Ahttp://about.jstor.org/terms (accessed 3 February 2019).
Akerlof, G.A. (1970) ‘The market for ‘lemons’: quality uncertainty and the market mechanism’, The Quarterly Journal of Economics, Vol. 84, No. 3, pp.488–500 [online] http://www.albayan.ae (accessed 1 February 2019).
Al-Hadi, A., Hasan, M.M. and Habib, A. (2016) ‘Risk committee, firm life cycle, and market risk disclosures’, Corporate Governance: An International Review, Vol. 24, No. 2, pp.145–170 [online] https://doi.org/10.1111/corg.12115.
Alzead, R.S. (2017) The Determinants and Economic Consequences of Risk Disclosure: Evidence from Saudi Arabia, PhD Thesis, University of Portsmouth, UK.
Amran, A., Bin, A.M.R. and Hassan, B.C.H.M. (2009) ‘Risk reporting: an exploratory study on risk management disclosure in Malaysian annual reports’, Managerial Auditing Journal, Vol. 24, No. 1, pp.39–57 [online] https://doi.org/10.1108/02686900910919893.
Ansoff, H.L. (1965) Corporate Strategy, McGraw-Hill, New York.
Ashforth, B.E. and Gibbs, B.W. (2008) ‘The double-edge of organizational legitimation’, Organization Science, Vol. 1, No. 2, pp.177–194 [online] https://doi.org/10.1287/orsc.1.2.177.
Avelé, D. (2014) ‘Positive accounting theory: theoretical and critical perspectives’, International Journal of Critical Accounting, Vol. 6, No. 4, p.396 [online] https://doi.org/10.1504/ijca.2014.067244.
Ball, R.J. and Brown, P. (1968) ‘An empirical evaluation of accounting income numbers’, *Accounting Research*, Vol. 6, No. 2, pp.159–178.

Barakat, A. and Hussainey, K. (2013) ‘Bank governance, regulation, supervision, and risk reporting: evidence from operational risk disclosures in European banks’, *International Review of Financial Analysis*, Vol. 30, pp.254–273 [online] https://doi.org/10.1016/j.iri.2013.07.002.

Beretta, S. and Bozzolan, S. (2004) ‘A framework for the analysis of firm risk communication’, *International Journal of Accounting*, Vol. 39, No. 3, pp.265–288 [online] https://doi.org/10.1057/palgrave.ijac.3550135.

Bonner, S., Hesford, A., van der Stede, W.A. and Young, M.S. (2006) ‘The most influential journals in academic accounting’, *Accounting, Organizations, and Society*, Vol. 31, pp.663–685.

Buckby, S., Gallery, G. and Ma, J. (2015) ‘An analysis of risk management disclosures: Australian evidence’, *Managerial Auditing Journal*, Vol. 30, Nos. 8–9, pp.812–869 [online] https://doi.org/10.1108/MAJ-09-2013-0934.

Carroll, A.B. (1989) *Business and Society Ethics and Stakeholder Management*, SouthWestern Publishing, Cincinnati, OH.

Clarkson, M.E. (1995) ‘A stakeholder framework for analyzing and evaluating corporate social performance’, *Academy of Management Review*, Vol. 20, No. 1, pp.92–117 [online] https://doi.org/10.2307/2566249.

Corley, K.G. and Dennis, G.A. (1990) ‘Building theory about theory building: what constitutes a theoretical contribution?’, *Academy of Management Review*, January, Vol. 36, pp.12–32 [online] https://doi.org/10.5465/AMR.2011.55662499.

Deegan, C. (2000) *Financial Accounting Theory*, McGraw Hill Book Company, Sydney.

DiMaggio, P.J. and Powell, W. (1983) ‘The iron cage revisited: institutional isomorphism and collective rationality in organizational fields’, *American Sociological Review*, Vol. 48, No. 2, pp.147–160.

Dominguez, L.R. and Gámez, L.C.N. (2014) ‘Corporate reporting on risks: evidence from Spanish companies’, *Revista de Contabilidad*, Vol. 17, No. 2, pp.116–129 [online] https://doi.org/10.1016/j.rcsar.2013.10.002.

Donaldson, L. and Davis, J.H. (1991) ‘Stewardship theory or agency theory: CEO governance and shareholder returns’, *Australian Journal of Management*, Vol. 16, No. 3, pp.49–65, doi: 10.1080/03128629108530031.

Elshandidy, T. and Neri, L. (2015) ‘Corporate governance, risk disclosure practices, and market liquidity: comparative evidence from the UK and Italy’, *Corporate Governance: An International Review*, Vol. 23, No. 4, pp.331–356 [online] https://doi.org/10.1111/corg.12095.

Elshandidy, T. and Shrives, P.J. (2016) ‘Environmental incentives for and usefulness of textual risk reporting: evidence from Germany’, *International Journal of Accounting*, Vol. 51, No. 4, pp.464–486 [online] https://doi.org/10.1016/j.jacc.2016.10.001.

Elshandidy, T., Neri, L. and Guo, Y. (2018a) ‘Determinants and impacts of risk disclosure quality: evidence from China’, *Journal of Applied Accounting Research*, accepted to publish [online] http://Eprints.Bbk.Ac.Uk/21889/; https://doi.org/10.2139/ssrn.3206228.

Elshandidy, T., Shrives, P.J., Bamber, M. and Abraham, S. (2018b) ‘Risk reporting: a review of the literature and implications for future research’, *Journal of Accounting Literature*, Vol. 40, pp.54–82 [online] https://doi.org/10.1016/j.jacclit.2017.12.001.

Folami, L.B. and Jacobs, F. (2016) ‘a multidisciplinary approach to risk management for accounting firms’, *Journal of Applied Business Research (JABR)*, Vol. 18, No. 4 [online] https://doi.org/10.19030/jabr.v18i4.2130.
Freeman, R.E. (1984) ‘The stakeholder approach’, Strategic Management, Vol. 1, pp.1–2 [online] https://doi.org/10.1017/cbo9781139192675.003.

Gray, R., Kouhy, R. and Lavers, S. (1995) ‘A corporate social and longitudinal study of UK disclosure’, Accounting, Auditing & Accountability Journal, Vol. 8, No. 2, pp.47–77 [online] https://doi.org/10.1108/09513579510146996.

Gray, R., Owen, D. and Adams, C. (2009) Sustainability, Environmental Performance, and Disclosures [online] https://doi.org/10.1108/s1479-3598.2010.0000004014.

Guthrie, J. and Parker, L. (1989) ‘Corporate social reporting: a rebuttal of legitimacy theory’, Accounting and Business Research, Vol. 19, No. 19, pp.343–352.

Guthrie, J., Parker, L. and Gray, R.H. (2000) ‘Exploring the changing nature of HES in Australia and the UK’, Commodification of Quality in Accounting and Management Journal, Working Paper, University of Macquarie.

Hassan, M.K. (2009) ‘UAE corporations-specific characteristics and level of risk disclosure’, Managerial Auditing Journal, Vol. 24, No. 7, pp.668–687 [online] https://doi.org/10.1108/02686900910975378.

Helbok, G. and Wagner, C. (2003) ‘Determinants of operational risk reporting in the banking industry’, SSRN [online] https://doi.org/10.2139/ssrn.425720.

Ibrahim, A., Habbash, M. and Hussainey, K. (2019) ‘Corporate governance and risk disclosure: evidence from Saudi Arabia Murya Habbash Khaled Hussainey’, Int. J. Accounting, Auditing, and Performance Evaluation, Vol. 15, No. 1, pp.89–111.

Jensen, M.C. and Meckling, W.H. (1976) ‘Theory of the firm: managerial behavior, agency costs, and ownership structure’, Journal of Financial Economics, Vol. 3, No. 4, pp.305–360 [online] https://doi.org/10.1016/0304-405X(76)90026-X.

Lajili, K. and Zéghal, D. (2005) ‘A content analysis of risk management disclosures in Canadian annual reports’, Canadian Journal of Administrative Sciences/Revue Canadienne Des Sciences de L’Administration, Vol. 22, pp.125–142 [online] https://doi.org/10.1111/j.1936-4490.2005.tb00714.x.

Linsley, P.M. and Shrives, P.J. (2006) ‘Risk reporting: a study of risk disclosures in the annual reports of UK companies’, British Accounting Review [online] https://doi.org/10.1016/j.bar.2006.05.002.

Lopes, P.T. and Rodrigues, L.L. (2007) ‘Accounting for financial instruments: an analysis of the determinants of disclosure in the Portuguese stock exchange’, International Journal of Accounting, Vol. 42, No. 1, pp.25–56 [online] https://doi.org/10.1016/j.intacc.2006.12.002.

Mehadi, M., Mazumder, M. and Hossain, D.M. (2018) ‘Research on corporate risk reporting: current trends and future avenues’, Dewan Mahboob Hossain Journal of Asian Finance, Vol. 5, pp.29–41 [online] https://doi.org/10.13106/jafeb.2018.vol5.no1.29.

Meyer, J.W. and Rowan, B. (1977) ‘Institutionalized organizations: formal structure as myth and ceremony’, American Journal of Sociology, Vol. 83, No. 2, pp.340–363, The University of Chicago Press [online] http://www.jstor.org/stable/2778293?seq=1
d to PDF to PDF plus 2778293.pdf?acceptTC=true.

Miihkinen, A. (2012) ‘What drives quality of firm risk disclosure? The impact of a national disclosure standard and reporting incentives under IFRS’, International Journal of Accounting, Vol. 47, No. 4, pp.437–468 [online] https://doi.org/10.1016/j.intacc.2012.10.005.
Mokhtar, E.S. and Mellett, H. (2013) ‘Competition, corporate governance, ownership structure, and risk reporting’, Managerial Auditing Journal, Vol. 28, No. 9, pp.838–865 [online] https://doi.org/10.1108/MAJ-11-2012-0776.

Ntim, C.G., Lindop, S. and Thomas, D.A. (2013) ‘Corporate governance and risk reporting in South Africa: A study of corporate risk disclosures in the pre- and post-2007/2008 global financial crisis periods’, International Review of Financial Analysis, Vol. 30, pp.363–383 [online] https://doi.org/10.1016/j.irfa.2013.07.001.

O’Dwyer, B. (2002) ‘Managerial perceptions of corporate social disclosure: an Irish story’, Accounting, Auditing & Accountability Journal, Vol. 15 [online] https://doi.org/10.1108/09513570210435898.

Oliveira, J., Rodrigues, L.L. and Craig, R. (2010) Risk Reporting: A Literature Review, pp.1–62 [online] http://www.aston.ac.uk/EaysiteWeb/getresource.axd?AssetID=134566&t (accessed 2 February 2019).

Oliveira, J., Rodrigues, L.L. and Craig, R. (2011a) ‘Risk-related disclosure practices in the annual reports of Portuguese credit institutions: an exploratory study’, Journal of Banking Regulation, Vol. 12, No. 2, pp.100–118 [online] https://doi.org/10.1057/jbr.2010.20.

Oliveira, J., Rodrigues, L.L. and Craig, R. (2011b) ‘Risk-related disclosures by non-finance companies: Portuguese practices and disclosure characteristics’, Managerial Auditing Journal, Vol. 26 [online] https://doi.org/10.1108/02686901111171466.

Oliveira, J., Rodrigues, L.L., Craig, R., Linsley, P.M., Shrives, P.J., Elzahar, H. and Hussainey, K. (2012) ‘Determinants of narrative risk disclosures in UK interim reports’, The Journal of Risk Finance, Vol. 13, No. 4, pp.39–57 [online] http://www.emeraldinsight.com (accessed 2 February 2019).

Oliveira, J., Serrasqueiro, R. and Mota, S.N. (2018) ‘Determinants of risk reporting by Portuguese and Spanish non-finance companies’, European Business Review, Vol. 30, No. 3, pp.311–339 [online] https://doi.org/10.1108/EBR-04-2017-0076.

Pfeffer, J. and Salancik, G.R. (1978) The External Control of Organizations, Harper and Row, New York, NY.

Saggar, R. and Singh, B. (2017) ‘Corporate governance and risk reporting: Indian evidence’, Managerial Auditing Journal, Vol. 32, Nos. 4–5, pp.378–405 [online] https://doi.org/10.1108/MAJ-03-2016-1341.

Sarens, G. and D’Onza, G. (2017) ‘The perception of financial analysts on risk, risk management, and internal control disclosure: evidence from Belgium and Italy’, International Journal of Disclosure and Governance, Vol. 14, No. 2, pp.118–138.

Scott, W.R. (1995) Institutions and Organizations, SAGE Publications, Thousand, Oaks.

Sekome, N.B. and Lemma, T.T. (2014) ‘Determinants of voluntary formation of risk management committees: Evidence from an emerging economy’, Managerial Auditing Journal [online] https://doi.org/10.1108/MAJ-02-2014-0998.

Spence, M. (1973) ‘Job market signaling’, The Quarterly Journal of Economics, August, Vol. 87, No. 3, pp.355–374, published by the MIT Press [online] http://www.jstor.org/stable/1882010 (accessed 10 February 2019).

Sternberg, E. (1997) ‘The defects of stakeholder theory’, Corporate Governance: An International Review, Vol. 5, No. 1, pp.3–10 [online] https://doi.org/10.1111/1467-8683.00034.

Tan, Y., Zeng, C.C. and Elshabady, T. (2017) ‘Risk disclosures, international orientation, and share price informativeness: evidence from China’, Journal of International Accounting, Auditing, and Taxation, September, Vol. 29, pp.81–102 [online] https://doi.org/10.1016/j.intaccaudtax.2017.08.002.

Thomson, I. (2007) ‘Mapping the terrain of sustainability accounting’, Sustainability Accounting and Accountability, Vol. 2, No. 2, pp.655–671.

UNCTAD (2017) The Role of Disclosure in Risk Assessment & Enhancing the Usefulness of Corporate Reporting in Decision-making, August [online] http://unctad.org/meetings/en/SessionalDocuments/ciiissard82_en.pdf (accessed 1 February 2019).
Verrecchia, R.E. (1983) ‘Discretionary disclosure’, *Journal of Accounting and Economics*, Vol. 5, No. 5, pp.179–194.

Wangombe, D.K. (2013) ‘Multi-theoretical perspective of corporate environmental reporting: a literature review’, *Review of Integrative Business & Economics Research*, Vol. 2, No. 2, pp.655–671 [online] http://www.sibresearch.org/uploads/2/7/9/9/2799227/riber_b13-256_655-671.pdf (accessed 1 February 2019).

Watts, R.L. and Zimmerman, J.L. (1990) ‘Positive accounting theory: a ten year perspective’, *The Accounting Review*, September, Vol. 65, pp.131–156 [online] https://doi.org/10.2307/247880.

### Appendix 1

*Articles featuring the phrase ‘quality and risk disclosure’ and theories used in top accounting journals 1990–2019*

| Accounting journals                                      | Agency     | Resource   | Signalling | Stakeholder | Legitimacy | Institutional | Proprietary cost | Political cost | Prospect | Total |
|---------------------------------------------------------|------------|------------|------------|-------------|------------|---------------|-------------------|----------------|----------|-------|
| International Journal of Accounting                   | 3          | 1          | 0          | 0           | 0          | 0             | 0                 | 0              | 0        | 16    |
| Accounting & Finance                                  | 1          | 0          | 0          | 0           | 0          | 0             | 0                 | 0              | 0        | 3     |
| Accounting and Business Research                      | 2          | 0          | 0          | 0           | 0          | 0             | 0                 | 0              | 0        | 9     |
| Advances in Accounting                                 | 1          | 0          | 0          | 0           | 0          | 0             | 0                 | 0              | 0        | 4     |
| International Journal of Disclosure and Governance    | 2          | 0          | 0          | 0           | 1          | 0             | 0                 | 0              | 0        | 7     |
| Journal of Accounting in Emerging Economies            | 1          | 1          | 0          | 1           | 1          | 0             | 0                 | 1              | 0        | 9     |
| Journal of Applied Accounting Research                 | 3          | 3          | 0          | 2           | 0          | 0             | 0                 | 0              | 0        | 16    |
| Journal of International Accounting Research           | 1          | 0          | 0          | 0           | 0          | 0             | 0                 | 0              | 0        | 5     |
| Managerial Auditing Journal                            | 9          | 7          | 2          | 5           | 5          | 6             | 4                 | 2              | 1        | 33    |
| Review of Accounting Studies                           | 3          | 0          | 0          | 0           | 0          | 0             | 0                 | 0              | 0        | 3     |
| Spanish Accounting Review                              | 1          | 1          | 0          | 1           | 0          | 0             | 0                 | 0              | 1        | 7     |
| British Accounting review                              | 2          | 1          | 0          | 0           | 0          | 1             | 1                 | 1              | 0        | 9     |
| Journal of Accounting Literature                       | 1          | 0          | 0          | 0           | 0          | 0             | 0                 | 0              | 0        | 5     |
| Accounting Forum                                       | 1          | 0          | 1          | 0           | 0          | 0             | 0                 | 0              | 0        | 3     |
| Journal of International Accounting, Auditing, and Taxation | 1          | 1          | 0          | 0           | 0          | 0             | 0                 | 0              | 0        | 3     |
| International Journal of Accounting, Auditing and Performance Evaluation | 1          | 1          | 0          | 0           | 1          | 0             | 0                 | 0              | 0        | 1     |
| **Total**                                               | **33**     | **16**     | **3**      | **9**       | **7**      | **9**         | **5**             | **4**          | **3**    | **1** |
Appendix 2

Articles featuring the phrase ‘quality and risk disclosure’ and theories used in top non-accounting journals 1990–2019

| Journals                                                                 | 'Quality' and 'risk disclosure' | Corporate risk reporting theories |
|-------------------------------------------------------------------------|--------------------------------|---------------------------------|
|                                                                        | Agency | Resource | Signalling | Stakesholder | Legitimacy | Institutional | Proprietary cost | Political cost | Prospect |
| British Actuarial Journal                                               | 1      | 0        | 0          | 0            | 0          | 0             | 0               | 0            | 0        |
| Corporate Governance: An International Review                          | 1      | 2        | 1          | 1            | 1          | 0             | 0               | 0            | 0        |
| European Business Review                                               | 1      | 1        | 1          | 0            | 0          | 1             | 0               | 0            | 0        |
| International Review of Financial Analysis                             | 3      | 3        | 2          | 1            | 2          | 2             | 1               | 0            | 0        |
| Journal of Banking Regulation                                          | 1      | 0        | 0          | 1            | 0          | 0             | 0               | 0            | 0        |
| Journal of Financial Management, Markets, and Institutions             | 1      | 1        | 0          | 1            | 0          | 1             | 0               | 1            | 0        |
| Journal of Governance and Regulation                                   | 1      | 0        | 0          | 0            | 0          | 0             | 0               | 0            | 0        |
| Public Money & Management                                              | 1      | 1        | 0          | 1            | 0          | 0             | 0               | 0            | 0        |
| The Quarterly Review of Economics and Finance                          | 1      | 1        | 0          | 0            | 0          | 1             | 0               | 0            | 0        |
| Journal of International Financial Markets, Institutions, and Money    | 1      | 0        | 0          | 0            | 0          | 0             | 0               | 0            | 0        |
| Journal of Multinational Financial Management                          | 1      | 0        | 0          | 0            | 0          | 1             | 0               | 0            | 0        |
| Journal of Banking and Finance                                         | 1      | 0        | 0          | 0            | 0          | 0             | 0               | 0            | 0        |
| Financial analyst Journal                                              | 1      | 0        | 0          | 0            | 0          | 0             | 0               | 0            | 0        |
| Journal of Operational Risk                                            | 1      | 0        | 1          | 0            | 0          | 0             | 0               | 0            | 1        |
| SSR Electronic Journal                                                 | 1      | 0        | 0          | 0            | 0          | 0             | 0               | 0            | 0        |
| World Review of Entrepreneurship Management and Sustainable Development | 1      | 0        | 1          | 0            | 0          | 0             | 0               | 0            | 1        |
| International Review of Economics and Finance                           | 1      | 0        | 0          | 0            | 0          | 0             | 0               | 0            | 0        |
| **Total**                                                              | **19** | **9**    | **6**      | **5**        | **3**      | **7**         | **3**           | **1**        | **2**    | **0**    |