**ERMA Adoption in the Insurance Sector – Is it a Regulatory Imperative or Business Value Driven?**

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ERM Adoption in the Insurance Sector – Is it a Regulatory Imperative or Business Value Driven?

ABSTRACT

Purpose - This paper aims to investigate various institutional pressures driving the adoption and implementation of a new risk management system; enterprise risk management (ERM).

Design/methodology/approach - The implementation of ERM-related practices is analysed based on an institutional framework and drawing on empirical evidence from multiple sources in 10 large/medium-sized insurance companies. This paper focuses on extra-organisational pressures exerted by political, social and economic institutions on insurance companies, which drove the adoption decision.

Findings - It was found that different change agents have taken part in the decision to introduce new risk management system as a part of ERM implementation process. Further, the institutional pressures; coercive, mimetic and normative, were found to differ in character and strength over different intervals of time in relation to the adoption of ERM. Companies that adopted ERM early were mostly driven by internal strategic drivers while the recent adoption decision was more driven by coercive and mimetic pressures. Thus, evidence of divergence between insurance companies was found.

Research limitations and implications - The findings have implications for policy makers, regulatory agencies and innovation developers, ERM was considered not only as a necessity but also as a value added to the insurance companies under study. Thus, regulators and innovation developers should survey main players in any specific organisational field to understand their views before issuing new compulsory regulations or developing innovations. They also need to consider exploring companies' experiences with ERM, which can provide a basis for the development of strengthened and more informative regulatory ERM frameworks. This will support a faster and easier understanding and implementation of ERM framework hindered by the confusions companies may face when considering the complicated/changing regulatory and risk requirements.

Originality/value - This study extends the scope of institutional analysis to the risk management field, particularly ERM and to the explanation of how different institutions affect the decision to move towards ERM and modify the risk management rules applied within the organisational environment. It looks not only at convergences but also divergences associated with the period of time when ERM adoption decision was made. Thus, it develops a processual view of change.

Keywords: Risk management change; Enterprise Risk Management (ERM); Adoption drivers; Institutional theory; Insurance.
1. Introduction

Enterprise Risk Management (ERM), from its insurance origins, has developed into a fully-fledged management function that has progressed into business areas which previously did not see the relevance of risk management. As a holistic approach, ERM recognises the interrelationship between different types of risk and thus yields benefits through evaluating and monitoring risk on a company-wide basis (De La Rosa, 2007). ERM therefore considers all types of risk that companies face and manages the overall risks in aggregate, rather than independently. This differentiates ERM from the traditional risk management. Following calls for strengthened corporate governance and risk management, ERM has become more widely practised in the insurance industry, and hence an increasing number of insurance companies have adopted ERM principles (e.g. Dickinson 2001; Acharyya, 2008).

Consequently, ERM frameworks were introduced and progressively developed over time as a way to help companies standardise ERM\(^1\). However, only a limited number of studies have explored the organisational institutions\(^2\) shaping ERM adoption and implementation. Understanding when and why various actors respond to different institutions governing companies' decisions within the institutional field can help organisational actors to accelerate the change processes within the organisational environment. Furthermore, should ERM be proven to reward companies for its adoption, it could then be used as a powerful management tool instead of enforcement. Companies will not spend heavily on ERM if they do not see any benefits that justify their investment.

This study examines aspects of institutional change within the risk management context. In particular, we are interested in exploring how organisational structures can be shaped through various changes induced by institutional pressures. Institutional theory provides an analytical lens through which to understand the effect of regulatory, social and economic pressures on organisational strategies that led to the distancing of the risk management systems from the traditional view of risk. ERM as a management control innovation has specific features that distinguish it from traditional views of risk. Furthermore, scholars recognised that external institutions could have an impact on different aspects of the risk management and management control in organisations (Walker et al., 2003; Baranoff, 2004; Acharyya and Johnson, 2006; Acharyya, 2008). However, Pagach and Warr (2011) found that ERM was adopted for direct economic benefit rather than to comply with regulatory demands. Despite the persistence of the necessity to adopt stronger risk management systems, particularly in the financial sector, few attempts have been made to investigate how this interacts with management control practices to form organisational systems. The pressure of the regulatory requirement to adopt ERM motivates us to study what the main drivers for this adoption are. In other words, is ERM adopted as a result of the regulatory pressure or for economic/strategic reasons? As regulators, rating agencies, policyholders and investors search for such answers, this paper studies changes in an actual organisational setting and hence extends the emerging literature into the formation of organisational risk management strategies informed by institutional theories.

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\(^1\) Examples of ERM frameworks released are the frameworks of COSO (the Committee of Sponsoring Organisations of the Treadway Commission) (2004) and ISO 31000 (2009).

\(^2\) An institution is defined as “a way of thought or action of some prevalence and permanence, which is embedded in the habits of a group or the customs of a people” (Hamilton, 1932, p. 84). Institutions are established ways of thinking that are common to a community such as the members of a company (Burns, 1997).
The analysis of ERM adoption in the context of new institutional sociology theory (NIS) can itself contribute to the institutional theory, and refine institutional isomorphism in the context of NIS. In particular, researchers argue that institutional studies tend to ignore the processual aspects of change (Sharma et al., 2010). As such, our study takes NIS to a different dimension through looking at the beliefs/values that people have at different points in time, and hence extending prior literature that attempts to develop a processual view of change (Hirsch and Lounsbury, 1997; Burns and Scapens, 2000; Seo and Creed, 2002; Cruz et al., 2009; Sharma et al., 2010). Further, early studies have often focused on isomorphic forces driving convergent institutional change. However, it has been argued that institutional pressures can be key drivers for management accounting practices' convergence or divergence, which emphasises the need to address both aspects (Granlund and Lukka, 1998). Our study broadens the institutional change research beyond the phenomena of convergence by considering issues of institutional divergence with regard to the time period over which the ERM adoption decision was made.

Although management accounting and control researchers have suggested the possibility of institutional change (Sharma et al., 2014; Busco and Scapens, 2011; Abrahamson and Gerdin, 2006), they have not considered how the change at organisational level might be triggered by different organisational actors in the risk management context (Jabbour and Abdel-Kader, 2015; Modell, 2012). Our study adds to the management accounting and control literature by examining agency aspects of institutional change and hence focuses on the risk management team as an internal agent of change. Furthermore, NIS has been accused of a tendency towards the positivistic approach. Bowring (2000, p. 258), for instance, "illustrate[s] how (new) institutional theory, with its interpretive beginnings, has become a structuralist positivist vehicle". NIS has been used to study the drivers of change of specific systems and techniques (e.g. Malmi, 1999; Teo et al., 2003; Ketokivi and Schroeder, 2004; Hopper and Major, 2007; Hu et al., 2007; Shi et al., 2008; Williams et al., 2009). These studies mainly employed a survey or a single case study, and targeted non-financial institutions or individuals to study the adoption of different systems such as activity-based costing, technology, international environmental management, and inter-organisational systems. They tried to address the change drivers at the time around the adoption action. In this study, we are not only extending the concept of institutional isomorphism in the context of NIS to the field of risk management in the insurance sector, but also extending it to explore how institutional drivers of change differ in character and potency over different intervals of time (a more processual view of change) in relation to the adoption of new systems or innovations. Our field study allows the identification of patterns and/or variations in empirical observations among multiple companies.

Exploring ERM as a management control innovation and a key event in the insurance sector, whose enactment seems to have brought about a significant change in insurers' risk management systems, and considering its institutional drivers, can enrich the existing body of management controls research (Mikes, 2009). The enactment of ERM rules can be a part of enacting and adding legitimacy to the changes of management control systems (e.g. Chenhall, 2003). ERM is implemented in financial institutions and located in the domain of financial decision-making and management control (The Authors, 2015). Thus, our main research question in this paper is "To what extent do institutional pressures play a role in ERM adoption?" This research question led to more specific points of enquiry, investigating the

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3 Isomorphism is the drive toward similarity of the processes or structure among organisations.
4 Rules are “the formalised statement of procedures”, while routines are “the procedures actually in use” (Burns and Scapens, 2000, p.7).
pressures - coercive, mimetic/cognitive, and normative - that led to organisational isomorphism.

The remainder of this paper is organised into six sections. The next section reviews the relevant literature on management accounting and control change. Sections 3 and 4 detail the theoretical underpinnings and the research design, respectively. The main findings are presented in Section 5. The last two sections provide a discussion and conclusion

2. Management accounting and control change

Prior research on management control change has tended to generally adopt a positivistic paradigm (e.g. Donaldson, 1987; Kanter, 1983; Burns and Stalker, 1961; Lewin, 1951), and less attention has been given to the subjective dimensions of change. Therefore, there is a need to "go beyond the analysis of change and begin to theorise about changing" (Pettigrew, 1985, p. 15). As such, change should be considered as a process not a static event. A number of studies have attempted to develop a processual view of change (Hirsch and Lounsbury, 1997; Burns and Scapens, 2000; Seo and Creed, 2002; Cruz et al., 2009; Sharma et al., 2010). However, limited research addressed the processual aspects of change in the context of ERM (Jabbour and Abdel-Kader, 2015). Further, new institutional sociology (NIS) theory has been used to explain the change in management accounting and management control that is due to external pressures such as regulatory changes (e.g. Collier, 2001; Modell, 2003; Nor-Aziah and Scapens, 2007; Tsamenyi et al., 2006, Lawrence, Sharma, & Nandan, 2009; Modell, 2012). Our study focuses on the macro-processes of change in management control, particularly risk management practices within insurance companies. Thus, NIS is deemed most suited to this study because it considers extra-organisational institutions like social, economic and political institutions that exist in the organisational field and society.

There has been an increasing interest in recent years in institutional theory across the social sciences (Scott, 1995; Burns and Scapens, 2000). An institutional perspective has been taken to study the change processes of management accounting and control systems (Sharma et al., 2014; Busco and Scapens, 2011; Abrahamson and Gerding, 2006), and to examine the adoption and implementation of different management accounting techniques (Granlund and Lukka, 1998; Kasperskaya, 2008; Ma and Tayles, 2009). Scholars have also recognised that external institutions have an impact on different aspects of risk management and management control in organisations (Acharyya, 2008). Prior literature incorporating institutional theory in the risk management field encompassed different research streams. The diversity of risk management practices has been investigated across companies within different industries (Arena et al. 2010; Woods, 2011), companies in the same industry (Mikes, 2005, 2009, 2011), or within a single company (Hall et al., 2013; Woods, 2009). As such, institutional theory offers rich theoretical bases for conducting analysis at different organisational levels. There has also been some discussion in the literature about various forces that could drive ERM growth and acceptance. Examples include drivers related to company disasters (Walker et al. 2003; Baranoff, 2004; Acharyya and Johnson, 2006; Acharyya, 2008); to new regulatory capital and examination requirements; to industry initiatives on corporate governance and risk management; and to leading companies that have experienced significant benefits from using ERM programs (Lam, 2006). However, Pagach and Warr (2011) found that ERM was adopted for direct economic benefit rather than to comply with regulatory demands. Companies that were larger, more volatile, and had greater institutional ownership, were more likely to adopt ERM.

Institutional pressures were found to play a role in the selection and use of ERM practices (Mikes, 2005). Reviewing the management accounting and control literature shows
that institutions which organisations rely on, exert coercive pressures. These are often associated with political and legitimacy concerns and take shape through imposing new regulations by the legal environment and authorities (e.g. Arena et al., 2006; Arnaboldi and Lapsley, 2003).

Insurance is a highly regulated industry and governed by various regulations of governments and industry associations. For example, risk management requirements were expanded in the Basel regulatory requirements to include oversight of operational risks alongside credit and market risks as part of the capital adequacy determinations of financial institutions (Basel, 2003). Ratings agencies have been advocating ERM practices. In the insurance industry, A.M. Best and Standard & Poor's (S&P) started evaluating ERM practices of companies on an informal basis in 2005. In 2008, S&P formally decided to start examining the way management teams implement ERM (Cole, 2008). Thus, coercive pressures can be seen as a key factor influencing insurance companies' management control and risk management systems. Prior research found that ERM might be a component of companies' rule-based compliance function as a response to the demands of external regulations (Power, 2007, 2009; Bowling & Rieger, 2005; Bruce, 2005). However, one can ask whether ERM is adopted as a result of regulatory pressure or for other reasons that are consistent with the goals of ERM. If ERM were implemented as a response to regulatory forces only, there should be no differences, other than industry affiliation, between the companies that chose to adopt ERM and those that did not (Pagach and Warr, 2011). This implies that the regulations can be one among many influences on companies' risk management strategies. It is worth noting that companies have not been obliged to implement ERM before the announcement of Solvency II requirements, which was not in force before 2014.

As companies face uncertainty, they may tend to adopt mimetic behaviours and thus follow standard responses to uncertain conditions (e.g. Lapsley and Pallot, 2000). A number of studies showed the existence of mimetic behaviour with regard to organisational structures, processes, strategies, or choices of technology (Benders et al., 2005, Burns and Wholey, 1993; Haveman, 1993; Massini et al., 2005, 2002). Thus, we can argue that such mimetic behaviour can be relevant to the adoption of innovative, more advanced risk management systems in the insurance industry. The insurance business environment is dynamic, where uncertainty prevails. Modelling business practices on those of other successful companies in the organisational field can be a reflection of the companies' pursuit of legitimacy or improved performance. Normative isomorphism within organisational fields may be related to professionalisation of the fields. Professional organisations in the insurance field seeking improvements in the situation within the insurance industry may promote the adoption of more comprehensive risk management systems. Thus, the influence of normative pressures on insurance companies could be substantial. For example, Kleffner et al., (2003) argued that ERM is adopted in response to the influence of the risk manager and encouragement from the board of directors.

Research on institutional change has been broadened beyond convergence phenomena to address issues of institutional divergence (Scott, 2010). Researchers found that institutional contexts (e.g. Fiss & Zajac, 2004; Goodrick & Salancik, 1996) and pre-existing organisational logics (rules) can change adoption of behaviours and practices (Townley, 2002). Lounsbury (2001, 2007, 2008) addressed the institutional diffusion of changes in organisational fields and explored how multiple forms of rationality – “competing logics”, can shape the emergence of novel practices. A multiplicity of broader cultural beliefs and rules (logics) can affect actors' cognition and decision-making in the organisational fields (Lounsbury, 2007). Oliver (1991) looked at how organisations strategically respond to institutional pressures as opposed to simply mimicking and adopting practice provisions diffused in the organisational field. Thus, it can be argued that companies may tend to
compromise with various constituents, apply avoidance tactics, manipulate the institutional pressures sources, or partly ignore such pressures. Thus, companies’ responses to the same organisational pressures can vary considering the interplay of contextual forces and intra-organisational dynamics (Greenwood and Hinings, 1996). The ERM implementation process across organisations has been explored using institutional approaches (Arena et al., 2010). The approach to ERM was found to be challenged by the values that are institutionalised in companies, and new risk rationalities were confronted with pre-existing practices. This resulted in the heterogeneity of ERM approaches across companies. In the same way, ERM implementation was also shown to vary in terms of actual practices, embeddedness levels or cultural significance (Mikes, 2005, 2009; Power, 2007, 2009). We are therefore looking at how companies may respond differently to similar institutional pressures, which may lead to divergence in the initial phase (ERM adoption decision).

Considering that risk is the key function of insurance companies, there is a need to understand which drivers were behind ERM adoption decisions in this industry. The literature has offered inconclusive findings regarding ERM adoption drivers, and mostly focused on political and regulation pressures. However, ERM has been promoted on the basis of providing economic benefits to companies adopting it. In this regard, it is important to find out the institutional pressures driving ERM adoption in insurance companies. Understanding which organisational institutions influence the insurance organisational field can help in answering the important question of whether ERM implementation was a necessity which has added value, or is simply a burden on insurance companies.

3. Theoretical underpinnings

Even though the literature on management and control change processes suggests the possibility of institutional change, it has not considered how different organisational actors in the risk management context might trigger change at organisational level. A risk management team can be seen as an internal agent of change. For example, Modell (2012) recognised this problem in the context of management control and strategy in the public sector with more focus on the regulatory pressure. Our research will thus focus on how change in existing risk management systems allows the risk management team to deinstitutionalise previous risk management systems and implement new ones.

The NIS core tenet is that companies are pressured to become isomorphic with, or conform to, a set of institutionalised beliefs (Scott, 1987). The concepts of NIS theory have been presented in two classic articles. Meyer and Rowan (1977) discussed institutionalisation as a process in which institutional structures are legitimised beyond the effectiveness of those structures and of the organisational members' views about their efficiency. Similarly, organisational structure and institutionalisation were discussed by DiMaggio and Powell (1983, p. 148), who stated that "in the long run, organisational actors making rational decisions construct around themselves an environment that constrains their ability to change in future years". The concept of organisational fields was introduced by DiMaggio and Powell (1983) as a type of extra-organisational institutions. The organisational field is "the organisations that constitute a recognised area of institutional life such as suppliers, customers and regulatory agencies" (Kholeif et al., 2008, p. 86). The companies within the field tend to make organisational changes and adopt similar formal structures as a way to gain legitimacy from external constituencies (e.g. Siti-Nabiba and Scapens, 2005). NIS in accounting research focused on the extra-organisational institutions effects (social, economic, and political) on the companies' accounting practices (Covaleski et al., 1993; 1996; Carruthers, 1995; Fligstein, 1998).
Scott (2008) defines institutions as "regulative, normative and cultural-cognitive elements that, together with associated activities and resources, provide stability and meaning to the social behaviour". The internal institutional environment consists of organisational factors such as decision-making structures, and the formalisation of internal structures, control and reporting systems (Oliver 1991; 1997). External institutions can be classified as regulatory structures, agencies, laws, professions, interest groups, and public opinion (Oliver 1991). NIS emphasises the legitimacy and embeddedness of organisational fields, and hence shifts the focus to external pressures (DiMaggio & Powell, 1983; Meyer & Rowan, 1977). It considers the role that macroeconomic, political and social institutions play in determining organisational structures (Scott, 2001). Thus, the main focus is on the social construction of organisations' networks rather than on individual organisations (DiMaggio and Powell, 1983), which is the key aim of our field study. We are attempting to conduct an institutional analysis in wider socio-cultural contexts (Dobbin, 1994). NIS will help us to explain how insurance companies adapt to institutional pressures, rules and belief systems emerging from their environments in pursuit of legitimacy and survival (Meyer and Rowan 1977; DiMaggio and Powell 1983; Dacin 1997).

According to NIS, change occurs through institutional isomorphism (Meyer & Rowan, 1977). Isomorphism refers to the institutional process by which companies become homogeneous and resemble each other (DiMaggio and Powell, 1983; 1991). Isomorphic forces are the key reasons for companies to exhibit a relatively high coherence within a field (Scott, 2010). DiMaggio and Power (1983) presented three types of external pressures – coercive, normative and mimetic - which lead to organisational isomorphism. Scott (1995) discussed organisational isomorphism as a way to ensure organisational survival in the face of regulative, normative and cognitive pressures. The regulatory pillar of the institutional context discusses coercive pressures. The normative pillar draws from DiMaggio and Powell's (1983) normative pressures. The cognitive pillar is an elaboration of the concept of mimetic pressures (Scott, 1995, 2008, 2014). We argue that these isomorphisms play a role in ERM adoption, considering that ERM has become more popular over time in the heavily regulated insurance industry.

The analysis in this study draws on NIS and institutional isomorphism. Coercive isomorphism stems from political effects and the legitimacy problem. It is the outcome of formal and informal pressures that are exerted on companies by other companies which they are dependent on, as well as by the society's cultural expectations within which companies function (DiMaggio and Powell, 1983). Insurance companies operate in a highly regulated environment. Thus, coercive pressures can be a substantial factor in shaping their control and risk management frameworks, which leads to producing more coherent and homogenous structures and procedures within those systems (e.g. the COSO framework). Mimetic isomorphism results from the normal responses to uncertainty. Uncertainty is a great force for encouraging imitation. When organisational technologies are not well understood, or goals are unclear, or the environment generates symbolic uncertainty, companies may copy other companies (DiMaggio and Powell, 1983). Companies have a tendency to model themselves upon similar companies. Models could be spread unintentionally; indirectly through employee transfer (for example), or explicitly e.g. by consulting (DiMaggio and Powell, 1983). The insurance business environment is a dynamic one in which uncertainty prevails. Modelling business practices on those of other successful companies in the organisational field can be a reflection of the companies' pursuit of legitimacy or improved performance. Normative isomorphism results mainly from professionalisation. Professionalisation has been defined as "the collective struggle of members of an occupation to: (1) define the conditions and methods of their work; (2) to control the production of producers" (Larson, 1977, pp. 49-52); and (3) to "establish a cognitive base and legitimisation for their occupational autonomy"
(DiMaggio and Powell, 1983, pp. 152). Professional organisations in the insurance field seeking improvements of the situation in the insurance industry may promote adoption of more comprehensive risk management systems. Thus, the influence of normative pressures on insurance companies could be substantial.

DiMaggio and Powell's (1983) work has some applications in accounting (e.g. Amat et al., 1994; Hoque and Alam, 1999; Modell, 2001; Granlund and Malmi, 2002). Thus, framing this study within an institutional perspective will shed the light on the adoption of risk management systems in the insurance sector as part of an attempt to gain social legitimisation and survival. Early studies on the effect of institutional pressures on organisational dynamics have often focused on isomorphic forces driving convergent institutional change. However, in management accounting, Granlund and Lukka (1998) argued that economic, coercive, normative and mimetic pressures are the main drivers of management accounting practices' convergence or divergence. Our study aims to look not only at convergences, but also divergences associated with the period of time when the ERM adoption decision was made.

The research on institutional change broadened beyond the phenomena of convergence, to consider issues of institutional divergence (Scott, 2010). This strand of research emphasised how different institutional contexts (e.g. Fiss & Zajac, 2004; Goodrick & Salancik, 1996) and pre-existing organisational rules (logics) can alter the adoption of specific behaviours and practices (Townley, 2002). Although institutional theory has received strong empirical support, there have been some criticisms of its use. DiMaggio (1988) argued there is a contradiction in the two senses of using the term 'institutionalisation'. As an outcome, institutionalisation puts societal expectations, as well as organisational structures and practices beyond the reach of power and self-interest, so acceptable practice expectations are taken for granted (Perrow 1985; Powell 1985). As a process, institutionalisation could be political and reflects the power of organised interests (Tolbert 1988; DiMaggio and Powell 1991).

4. Research design

4.1 Field study

The social and organisational nature of ERM adoption and implementation, in the context of non-life insurance companies, justifies the choice of a field study methodology in this study. More specifically, we adopt an explanatory field study methodology due to the lack of empirical evidence on the institutional adoption pressures driving change in risk management systems towards ERM in the insurance sector context and the need to investigate such pressures (Lillis and Mundy, 2005). Furthermore, considering different cases in the field study helps determine whether a theory can be generalised, extended or modified. Cross-sectional validation of theoretical constructs enhances credibility and generalisability of field study findings. Using multiple companies facilitates the identification of the patterns and/or variations in empirical observations. As such, purposeful sampling\(^5\) was employed to get information-rich cases (Yin, 1994) and ten listed large/medium-sized, non-life insurance companies based in the UK were selected for this study, see Table 1. The selection of these specific companies was made for two main reasons. Firstly, they are either large or medium-sized insurance companies. Prior accounting research emphasises that firm size is an explanatory factor for the emergence and use of management control systems (Haka et al.,

\(^5\) Denzin and Lincoln (1994, p. 104) state that “many qualitative researchers employ purposive and not random, sampling methods. They seek out groups, settings and individuals where the processes being studied are most likely to occur”. Therefore, sampling in this research was theoretically grounded (Mason, 1996).
1985; Myers et al., 1991; Shields, 1995) and is positively related to ERM adoption and use (Beasley et al., 2005; Hoyt and Liebenberg, 2011). Secondly, ERM in these companies are at different levels of maturity - from early stage to full implementation. The interviewees were mainly from the risk department and are senior officers who have risk responsibilities and use ERM in their day-to-day work. This helped in covering various views on ERM adoption and allowed for comparison.

4.2 Data collection

Multiple data collection methods including semi-structured interviews and documentary evidence were used in this study. The companies’ internal documents accessed included ERM polices and framework documents, business plans, and financial reports. Reference to publicly available data such as annual reports and the company's published information was made. A number of publications by external bodies, which were focused on the insurance industry, such as papers by the S&P and A. M. Best rating agencies were also analysed. Such triangulation⁶ of data sources helped improve the internal validity of the research. Access to employees and documents was mainly unrestricted, although some documents such as the corporate plan, which were considered to be highly confidential, were available to us only in redacted form. The annual reports helped us understand the history of each insurance company under study, and facilitated the plan for interviews as well as the analysis.

The companies were visited over a period of 11 months in 2011/12 and 13 semi-structured interviews were conducted with officers and directors from senior level within the company (see Table 1). The selection of interviewees was based on their relevant experience in the ERM adoption and implementation process in their companies. The initial access was the companies’ risk officials, who were interested in our research and helped put us in contact with other officers, who, in turn, put us in contact with people from other companies (a 'snowballing' approach). Each interview lasted for an hour on average and was digitally recorded, subsequently transcribed and validated by the interviewee. Notes were taken during the interviews, and more detailed notes were written up as soon as possible following each interview. The interview schedule included questions designed to elicit information about ERM key adoption drivers and pressures. The interview schedule was prepared to suit the role and background (with regard to risk) of each participant. However, in each interview some additional issues/questions evolved and, were then further investigated in the subsequent interviews.

4.3 Data analysis

We started the analysis of the interviews’ transcripts by reducing the transcripts to exclude any irrelevant data. This enabled an in-depth analysis of the first stage of forming the field. Then, we followed coding and verification procedures to help us to comprehend the data. Thus, the transcripts’ data were coded according to categories that were pre-defined in the theoretical framework of external institutional pressures including coercive, mimic and normative pressures at the field level. However, we also identified some new categories such as other external institutional pressures and internal institutional drivers, which were included in the final coding. The text was then coded using Nvivo⁷ and manual-coding to identify

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⁶ Data triangulation is the term used for the process of collecting multiple sources of evidence on an issue. The researcher assesses the validity of one source of evidence via collecting other evidence about the same source.

⁷ Even though the data analysis process was supported by using Nvivo software for textual analysis, it was a helping hand tool as the researchers preferred to go back to the actual transcripts. In this respect, Nvivo facilitated the process through applying mapping techniques when structuring the data.
external and internal institutional pressures, where they exist (field or organisational level), at what point in time the change took place and who/what led this change. The coding progressed following the procedures suggested for qualitative research (Miles and Huberman, 1994). The first analysis of data identified that the institutional change took place as a result of external institutional pressures, specifically coercive, mimetic and normative pressures, and the risk department played the main role in the related actions driving the institutional change processes. In order to verify the validity of our interpretations, debriefing was done where the transcripts were sent to the interviewees to seek their feedback and approval. We further analysed internal and public sources of information, extracting the relevant information and cross-checking them with interview data. These procedures helped confirm the results generated from the interviews.

Data analysis then moved to look at the change in risk management systems that took place at different intervals in time. Following Strauss and Corbin (1998) and Yin (1994), the data was synthesised by identifying the relevant themes and concepts including ERM being a social responsibility, and improving capital efficiency. Further, the axial and selective coding we used helped in detecting emergent themes, which were linked to specific categories, connecting the categories to each other, summarising the categories into various themes, and refining them in relation to explanatory concepts. The new themes that emerged during the analysis were mainly related to the achievement of companies' objectives. Although the analysis was initially directed towards looking for different types of drivers, the differences among those drivers in relation to the different points in time where ERM was implemented, appeared to be a key aspect in this analysis. The analysis then further linked evidence from the data to the concepts of internal institutional pressures. Such processes allowed the comparison with previous research findings and helped make connections with existing theory.

[Insert Table 1 here]

5. Findings

The ERM adoption decisions in the insurance companies under study were driven by various institutional forces. Based on NIS theory, three external pressures can drive the adoption decision; i.e. coercive, mimetic and normative. However, we found out some other pressures, which can be classified as internal institutional pressures (see Figure 1). We further found out that actions to adopt ERM were taken at different points in time in the companies under study, see Table 2. This variation in the timing of ERM adoption has been further investigated to find out whether the timing of adoption is linked to particular types of institutional pressures. Our initial analysis revealed that each type of institutional pressure was more prevalent in a particular period of time. This led us to cluster the companies into three groups based on the time interval in which the decision to adopt ERM was taken. Group 1 encompasses companies which had used ERM for the longest period of time (9-12 years) – companies H, C, F and A. Group 2 includes companies that adopted ERM for 5-8 years – companies B, D and E. The last group (Group 3) consists of companies using ERM for 4 years or fewer – companies G, K and J. This classification of companies gives insights into the divergence between insurance companies and how different types of institutional pressures drive the decision to adopt ERM during a specific period of time. Furthermore, we looked at whether the company size has an effect on the timing of adoption of ERM, but it
seems it has a limited effect on the decision taken by our companies. For example, a medium-sized insurance company, B, adopted ERM earlier than a large company, E.

[Insert Table 2 here]

[Insert Figure 1 here]

5.1 NIS External organisational institutions

Drawing on the analysis of DiMaggio and Powell (1983) as a starting point, our analysis considers coercive, normative, and mimetic institutional pressures (DiMaggio and Powell, 1983). Further, actors act according to institutional values and norms\(^8\), ideas, beliefs, and broader meanings systems (Scott, 2010), which enhance their understanding of priority goals of organisational strategies, particularly risk management strategy, and the conceptualisation of uncertainty within their organisations. Thus, this section presents the findings related to the three main NIS external institutional pressures which drove the decision to adopt ERM in our companies. In particular, we explain why and when risk officials introduced ERM.

5.1.1 Coercive pressures

Coercive pressures are related to political influence and legitimacy issues. They take the form of changing legal environment and authorities, which impose new regulations on companies (e.g. Arena et al., 2006). Discussion with interviewees provides evidence that the regulatory regime introduced in 2004 played a role in pushing insurance companies to consider the adoption of a holistic approach to risk management. Therefore, political and regulatory institutions were materialised at a specific point in time and started to trigger ERM adoption and implementation (enacting and encoding) actions. While our analysis was consistent with NIS claims, in the sense that such coercive pressures were prevalent in the recent adopters of ERM (Group 3), we found companies in Group 1 were less affected by coercive pressures. However, the increase in the regulatory requirements for insurance companies since 2003 was not ignored by interviewees from company A (Group 1), where the ERM adoption decision was largely affected by coercive pressures compared to companies C, F and H.

Interviewees’ actions reflected specific institutional values, norms, and ideas (Scott, 2010). For example, on one hand, ERD-H acknowledged the effect of such regulations and believed that insurance companies are obliged to demonstrate that they have adopted ERM since 2004.

"The regulatory regime in the UK introduced in 2004 required all companies to have a capital assessment that considered all risks defined as market, credit, liquidity, life insurance, general insurance and operational risks. So an enterprise’s view of risk in a single metric. So all the insurance companies in the UK that were authorised insurance companies in 2004 should at least say I have been doing ERM since 2004." (ERD – H)

On the other hand, CUE-C believed that although it is necessary to comply with regulations, these should be applied efficiently, and thus should drive the management of C’s business in a way that perhaps has not been understood clearly before. This creates many interesting challenges for C. He gave capital requirements as an example of a change imposed by complying with regulations. This view was not consistent with the view of CRO-

\(^8\) Norms refer to "the actualisation of rights and the enactment of obligations" (Kholeif et al., 2008, p. 66).
C. Considering that CUE-C joined the company when the decision had already been made, some confusion might have been created due to the fact of experiencing further regulatory pressure over time since the adoption action. The view of CRO-C was shared by CRO-F.

"I think we are pretty much ahead in the game in terms of these issues [Political and regulatory influence]. For smaller businesses it is pushing them to make risk more embedded. I think it is helping maybe." (CRO - F)

Our analysis provided evidence that conformance with institutional rules can be the key force driving ERM adoption. However, inconsistent with NIS, this is with consideration of the effect of newly-adopted risk management structures and practices on companies' performance. For example, although regulatory requirements were regarded as one driver for ERM adoption, it was indicated by interviewees in Group 1 that their companies were going to adopt ERM anyway as it was expected to provide economic benefits. It could be inferred that the earlier ERM was adopted, the less the coercive pressures impacted on the decision to adopt. This can be explained in the light of actors' strategy priorities emanating from their beliefs. Thus, regulatory requirement pressures were seen to have less impact on the adoption decision of insurance companies that were early to adopt ERM.

Not only were coercive pressures on ERM adoption more prevalent in Group 2 than Group 1, but also, within the same group, those pressures had a greater influence on companies D and E than on B, even though the adoption occurred at similar points in time (6/7 years ago). Within the same company, regulatory requirement pressures were seen to have little impact on the adoption decision by CRO-B. However, CFO-B stated that these pressures significantly affected the adoption decision.

At this stage of adoption (6/7 years ago), another coercive pressure that affected ERM adoption decision was identified by interviewees: rating agencies. However, it was pointed out by CRO-D that this pressure was not as key a driver as that of regulations in terms of its influence. Regulations are becoming even more intrusive to a point where companies have to demonstrate that they have got actual processes in practice.

"Undoubtedly regulation is the key driver I think. The rating agencies are less of a driver. We've got our annual rating agency review coming up. We line our ERM processes to them but it's undoubtedly the regulation." (CRO – D)

In the insurance sector, companies have adapted to rules and belief systems that emerged from their environments in pursuit of legitimacy and survival. Thus, changes in the organisational field are driven by pressures that originate from the organisational level. HORF-E explained that the regulatory decision was made by the largest companies (alongside regulators), because the government would never have imposed such regulations without being lobbied. As such, HORF-E claimed the CEOs of the largest companies in Europe have had long discussions with governments, and thus they have been heavily involved in the introduction of the regulations and hence the related coercive pressures. Officials in E believed it would be beneficial to foster the requirements of Solvency II and to put more effort into their implementation. Therefore, she argued the business and government environments should not stand on opposite sides in the debate over new regulatory framework, but should rather collaborate in the development of a common ground of shared interests. HORF-EC further added:

"You cannot apply Solvency II without a strong buy-in from the main CEOs of this planet, in this case European people; it is like as in Sarbanes and Oxley again, without any buy-in from the companies. The company will spend millions in that type of framework if they see benefit, and the benefit was we saw the credit crunch we saw so lots?? of our risks, which were not managed properly." (HORF – E)

The above analysis shows that coercive pressures had a more significant effect on the companies in Group 2 than on their counterparts in Group 1 that are far ahead in adopting
ERM. Similar evidence was found in relation to that, the longer the action to adopt ERM even within the same group, the less the coercive pressures influence that decision. This can be explained as a result of the different beliefs and norms among actors which generate differences in their understanding of priority goals of the risk management systems. However, interviewees from Groups 1 and 2 have agreed on the effect of two drivers: capital providers' demands and stock market analysts' requirements.

As regulations have become more intrusive over time, such external institutional drivers were not mentioned by interviewees from Group 3. These drivers can be seen as a way of enhancing competitive advantages and seeking legitimacy. CUO-C and ERD-H were convinced that the capital providers' main concern lies in improving return on capital. In this regard, higher return on capital was seen as an outcome of implementing ERM. CUE-C argued that ERM facilitates capital management to run all the risks that face the company and improves the efficiency of its use. ERD-H raised the issue that stock market analysts require strong ERM ratings. This imposed a further pressure on various insurance companies and led them to consider improvements in their ERM programmes in order to conform to the economic institutions related to preserve or improve their financial positions and remain competitive.

"We did it because our capital providers want it, and it's just happened that rating agencies and regulators like it as well." (CRO – B)

Discussion with interviewees showed an obvious increase in the coercive pressures exerted on insurance companies in Group 3 compared to Groups 1 and 2. These pressures came from broadening risk management requirements, which exert new regulations on companies (e.g. Solvency II). This is then an example of the way coercive pressures from regulatory changes, in turn, impact ERM adoption and implementation (enacting and encoding) actions. For instance, Solvency II requires insurance companies to adopt ERM and calls for more experienced professionals. An increasing number of insurance companies had already started to take this into consideration before Solvency II took effect (from 2014).

"... so we are impacted by Solvency II regulations. They will come into force - it will come in 2014 and in basic terms, they set out some minimum standards for risk management that they expect insurers to meet. So you know to demonstrate that we meet them or we potentially could get a fine, we could be asked to hold more capital or we could lose our licence." (ECRO – K)

Actors' beliefs and values increasingly reflected the importance of financial strength ratings as a coercive pressure. This can be explained in the light that rating agencies have recently begun to appreciate the existence of well-controlled risk management frameworks in insurance companies. Their pressure is highlighted alongside the recent regulations by ERD-J and ECRO-K. ERD-J is convinced that it is not just compliance that matters. He believes that a superior model of a risk management framework used in a superior model of a decision-making framework are a competitive advantage. Thus, there is a desire to go beyond compliance. Furthermore, ECRO-K pointed out that a strong financial rating is an important factor for their customers, and so it is very important for K to preserve the strong rating.

"For us is twofold. The external credit rating agencies, S&P, provide an ERM rating. We are rated as strong which is the second category down, which only 11% of insurers would get into. For our customers, that is an important factor for them. So that is very important for us to keep that. And then secondly, the sort of regulations driving it. So we need to demonstrate to our regulators that we meet regulations." (ECRO – K)

It could be inferred from the above results that actors' beliefs, norms and values have changed over different periods of time. Coercive pressures, unlike the case in Groups 1 and 2, largely drove the recent adopters of ERM in Group 3. This can be explained as the companies investigated have experienced obligatory pressure to adopt ERM. In this regard, insurance
companies are required to demonstrate that they have adopted ERM or considered its adoption. In short, over the three different periods of time, companies showed divergence instead of convergence. This was reflected completely in the actors’ actions and beliefs.

5.1.2 Mimetic pressures

Companies have a tendency to model themselves upon similar companies. Models could be spread unintentionally: indirectly through (for example) employees’ transfer, or explicitly by companies such as consulting companies (DiMaggio & Powell, 1983). The effect of such mimetic pressures is expected to exist because of the competitive environment within which insurance companies operate. Our study revealed two types of mimetic pressures affecting the adoption of ERM in insurance companies under study. The findings showed that the risk management structures and practices of insurance companies have been affected by the risk management approaches adopted by other companies. The other type of pressure is the adoption of best practices of large companies in the insurance sector.

That explains why the decisions of Group 2 and 3 to adopt ERM were the most affected by mimetic pressures, while Group 1 was least affected by such pressures. The organisational field started to develop experiences with ERM around the time of ERM adoption by Group 1. Thus, they provided an example for other companies to follow. For example, in Group 1, CRO-F, CRO-A and CRO-C were convinced that mimetic pressures played no role in their company interest in adopting ERM. Therefore, a different understanding of priority goals of ERM should exist, and hence other institutional pressures should be prominent and mostly expected to be related to economic benefits. Thus, interviewees provided different opinions, which show how different beliefs and values affect actors’ actions. Mimetic pressures may not have been seen to affect the adoption decision directly, but they may still have an indirect effect, particularly through employees’ transfer (DiMaggio and Powell, 1983). In this regard, CRO-H illustrated that some of the people who work for the company had worked in competitor companies. These people could suggest implementing some initiatives (such as ERM) they had observed elsewhere, which proved beneficial. Furthermore, the good practice identified by rating agencies and regulators in some insurance companies was found to affect the way other insurance companies work. Therefore, the practices could be replicated and enhanced.

Discussion with interviewees in Group 2 showed how mimetic pressures play a key role in the decision to adopt and implement ERM. They tend to match their risk management practices to other successful companies in the organisational field as a way to pursue legitimacy and improve performance.

"... competitors, capital providers, rating agencies and stock market analysts - they all wanted it to happen." (CRO – B)

However, our findings further showed that mimetic pressures could be seen as affecting the implementation process rather than the adoption decision. CUO-C (contrary to CRO-C) took the view that competitors affect ERM implementation in the sense that they provide information related to the way of doing things.

"... and they [competitors] have been kindly providing us with a lot of good feedback, how we are doing these kind of things - good thing is or difficulty is." (CUO – C)

The discussion above indicates that the effect of mimetic pressures was evident on the adoption decision itself in Group 2 rather than within the process of ERM implementation as was shown by interviewees in Group 1. It was explained that one way in which mimetic pressures directly affect the implementation of ERM is that the CROs of various insurance companies meet and exchange feedback about how they manage ERM and the difficulties they faced throughout the process. However, there should be a clear understanding of ERM prior to comparing one’s processes with that of other companies, as stated by CFO-B. This
implies that there is an ERM culture of institutional values and norms, ideas, beliefs, and broader meaning systems that should already be evolving.

Interviewees in Groups 1 and 2 shared similar views regarding the effect of two other pressures: business nature, needs and requirements; and crises and organisational disasters. Those were seen as ways to pursue more sound and robust risk management systems like other companies in the organisational field. CUE-C and ERD-H pointed out that insurance is a very volatile and highly-regulated business. Managing risks is the heart of insurance business. There is a need to know the cost of risk at a very granular level because companies need to appraise their positions in different markets.

"It is all part of how this industry has evolved. Because we are such a volatile business, the understanding of those risks, the built to model those risks and understand the impact of those risks just as the others in the market as well I think has moved everyone forward to it." (CFO – BC)

CFO-B and HOR-E saw ERM as a logical response to all the recent crises and market turmoil. The insurance industry has always suffered from the emergence of losses. The better the insurance companies understand their potential risks, the more confidence can be built in the industry (the organisational field). Therefore, ERM in the insurance industry, to some extent, has been driven by the social and economic institutions linked to the willingness of insurance companies to assure their investors of effective control over the risks faced. CFO-B further explains:

"...for many years without that knowledge the industry suffered from not being able to explain its risks to investors and the more that we can explain the potential upsides and downsides to our investors the more attractive it will be to the capital markets... it's been driven by the industry looking to get itself into the modern age and actually be able to assure its investors that it has a good control of what these risks are." (CFO – B)

The interviewees in Group 3 have not discussed any of the above institutional drivers raised by interviewees from Groups 1 and 2. This can be explained by the fact that companies from Group 3 were largely driven by Solvency II requirements that would then be put in place in 2014. Companies adopting ERM before any obligatory requirements, can be seen as mainly driven by the necessity and benefits of it. This indicates that such drivers are mainly coming from the culture and objectives of the company. We can argue that the main rationale behind responding to those specific drivers is the need to improve the business vitality and secure a competitive position in the organisational field in which insurance companies operate.

Discussion with interviewees in Group 3 showed that the effect of mimetic pressures was only prevalent in company K. ECRO-K considered that successful competitors and their feedback are strongly affecting the ERM adoption decision within K. This could be attributed to the fact that company K tends to have high ratings compared to other industry players. Thus, company K's officers look at the actions of their peer companies. If many of them are rated as strong or excellent in terms of risk management by the rating agencies, company K works toward a similar or a higher rating in this field to gain a competitive advantage. He stated:

"So, we definitely look at what others are doing. If all of our peers were rated excellent, we push for excellent... If one which is rated excellent risk management and one which is rated adequate, you probably would go for the excellent. It is the human nature." (ECRO – K)

Contrary to NIS assumptions, our findings showed that even with companies newly adopting ERM, other industry players' experiences with ERM played no role in their adoption. For example, CRO-G expressed a strong opinion that the ERM adoption decision
was an internal decision and ERD-J shared his views. He emphasised that he still wants to be convinced that other insurance companies are getting a significant benefit from ERM in order to follow their practices. Thus, actors' beliefs regarding ERM’s potential benefits directed their actions.

The different opinions provided by our interviewees indicate that mimetic pressures may not have directly affected the decision to adopt ERM within Group 3, though such pressure had an indirect effect on company K. This can be attributed to the competitive attitude driving company K’s risk team.

In summary, the effect of mimetic pressures was shown in Group 1 to be more relevant within the process of implementing ERM rather than the adoption decision itself. However, those pressures were affecting the adoption decisions themselves in Groups 2 and 3, and they shaped actors’ beliefs, norms and values and played a more significant role in the companies’ actions than those in Group 1. This may provide evidence that the companies earliest in adopting ERM have started to report best practice and experience with ERM processes and related benefits. Therefore, other companies may tend to follow best practices reported by early players. These best practices can be set as benchmarks in companies who have come late to adopt ERM in order to be well prepared by the time Solvency II is in effect.

5.1.3 Normative pressures

Normative pressures within organisational fields are related to the professionalisation of individuals. Professional bodies and individuals in the field of insurance who aim for enhancing risk management processes within the insurance industry might promote the adoption of ERM. ERM is emerging as a profession in itself, and, as an academic discipline. Thus, the impact of normative pressures on insurers’ risk management systems might be substantial. Our findings revealed two types of normative pressures: risk directors' education and professional qualifications; and consultants' suggestions. Surprisingly, interviewees have not reported any impact of the international risk management standards and frameworks such as COSO or ISO31000 on adopting or structuring the risk management systems of their companies. However, analysing the companies' documents and annual reports shows their risk management approaches incorporate general principles of such standards and frameworks. This implies that their risk management models and frameworks have been adopted and designed to fit with ERM’s particular approach in each company.

*Risk directors' education and professional qualifications*

The ERM adoption decision and its implementation have been influenced by the risk directors' education and professional qualifications in all the groups. The CROs and risk directors came from different backgrounds and have different professional qualifications (see Table 3). Discussion with interviewees from all companies’ groups showed that academic background and professional qualifications were not limited to qualifications in risk management but included accounting, auditing, and management qualifications, and exerted pressures on the adoption decision of ERM and its subsequent implementation. There was an emphasis that actuarial and risk management professions can contribute to ERM. ERD-H and CRO-D stated that those qualifications had supported them in designing and developing the ERM framework. CRO-A further added the following example:

“For example, the actuarial professions have been pushing ERM for a while, so actuaries within insurance companies have been aware of it for over a decade now, so it is not a new thing, it is something that they have studied it and as a result I think it becomes known.” (CRO - A)
"...my sort of background, which is principally coming up through the accounting and the auditing route, enables us, me, to be able to look more broadly at what the risks and the risk profile might be." (CRO – D)

Even though some CROs came from backgrounds different to risk management, they acquired professional qualifications that prepared them for the positions. This result supports the notion that adopting and implementing ERM requires creating a specific risk culture, where particular beliefs, norms and values are reflected, to support its rules, by people with specific qualifications. Thus, although these professional qualifications can contribute to ERM adoption, the adoption itself called for people with certain educational backgrounds and professional qualifications.

"When the company decided to adopt it, it was my professional qualifications made me qualified to do the job for them." (CRO – B)

Analysis of Table 3 and its linkage to the discussion above, provides evidence that professional qualifications including actuary, accounting and MBA degrees prompted the ERM adoption decision in the companies under study. This provides evidence on a relationship between risk management and actuarial, accounting and management practices. Even though the CROs came from backgrounds other than risk management - such as mathematics and law, they acquired professional qualifications that prepared them for these positions. This result shows that the holistic risk management process is not straightforward and needs specific qualifications and experiences to run it. It also emphasises the pressures put by professional qualifications on ERM adoption actions. ERD-H alluded to this, and illustrated that the professional bodies in charge of professional educational schemes have been pushing for ERM for some time.

Evidence supporting the effect of consultants' suggestions as another normative pressure was more obvious in Group 3, and less obvious in Groups 1 and 2.

[Insert Table 3 here]

The risk directors' education and professional qualifications mostly affected the ERM adoption decision in Group 1, and the implementation process in Groups 2 and 3. Thus, norms have changed to adapt to the increasing risk management requirements and to support the existence of a sound ERM. CRO-C in Group 1 stated that education and professional qualifications significantly contributed to the adoption decision, whereas interviewees in Groups 2 and 3 considered that the various backgrounds and professional qualifications exerted pressure on the ERM implementation process more than its adoption decision, and affected the design of ERM framework. It seems that qualifications increase awareness and sensibility about certain aspects of the business (norms and values), which consequently leads to better management of risks (beliefs). For instance, HORF-E indicated that the big risk when companies start implementing an ERM framework is the adoption of an extremely theoretical approach. There are many models available and there is a theory about ERM, but the question remains on what companies want to do with that type of theory. Thus, experiences in both fields (theoretical and practical) could enable risk directors to provide their companies with different ways to execute the process.

"...it's mainly affecting the implementation process itself, because you were recruited in this company because of your qualifications." (CRO – G)

Furthermore, ECRO-K explained that many of the current regulations governing the insurance industry relate to how CROs should evidence ERM processes and how to ensure that it is taking place.

"So, I am one of the people who shouts 'We need to write this down, we need to document this or we need to build true evidence', and a lot of the last two years actually
has been spent not necessarily changing things, but actually thinking about if somebody came in to look at it how we evidence that we are doing it." (ECRO – K)
"... it came to me first and then my job was to push it out across the division that I worked in. In my current role, I'm much more closely involved in the start of the process and trying to build that framework." (ERD – J)

While the discussion with interviewees revealed that professional qualifications were key normative pressures, they further considered experience as another key normative pressure driving the decision to adopt ERM. Experience could be considered as a key factor because it provides the best ways and practices of doing a specific piece of work or running a particular system.

"...what influences it [ERM implementation] is more the roles I have done in the last ten years rather than my professional background." (CRO – F)

Risk management experience is linked to actuarial experience possessed by interviewees from all three groups. This suggests that risk and actuarial functions are becoming more related. It also supports the argument that not only the risk management profession, but also other professions facilitated ERM adoption and implementation. ERD-C believed that his actuarial background had positively affected the designation of the risk management framework in his company. However, it was not only the risk experience that helped in ERM processes, but also other types of experience. People have developed greater risk experience as a result of implementing ERM for a long period of time and experiencing all the issues associated with ERM adoption and implementation.

"I've been working in... insurance business where I was very focused on the technical and market risks of our annuities business and protection businesses. So, quite experienced on quantitative risk management and the classical actuarial space." (ERD – J)

Although interviewees had a positive view about their qualifications affecting ERM adoption, this can be seen as one influence amongst many. The HORF-EC had a valid point of view. She indicated that ERM has only recently been taught in universities, so there is a shortage of older graduates with ERM qualifications. However, our analysis showed that not only risk management but also various other interrelated educational backgrounds can support ERM implementation.

Consultants' suggestions

Actors' beliefs shaped their views about the impact of consultants' suggestions on ERM adoption decisions. Our findings did not provide evidence supporting the effect of such normative pressure and, more specifically, for companies with advanced implementation of ERM, they reported that there is apparently an inverse relationship between engaging risk consultants and the longevity of ERM implementation, ERM advancement level, and the size of the company's operations.

Interviewees in Group 1 believed that consultants were not able to help insurance companies considering that those companies have already acquired significant experience with ERM by engaging in its different processes over relatively long periods of time. Consultants were often seen as far less experienced in the actual implementation of ERM. For example, CRO-A and CRO-F indicated they do not tend to engage consultants in ERM-related decisions.

"...now things are changing so quickly in the market that put them behind the curve when it comes to best practice. They try to catch up. So it is quite hard to find consultants who can genuinely give you something you don't already know." (CRO – F)

Interviewees from Group 2 supported the above argument. However, they still valued the consultants' input when setting a risk appetite statement. The company would be
advised on how to approach this task and how to express the statement in quantitative rather than qualitative terms.

"No, we are happy to make up our own minds" (CRO – B)
"...they've been quite helpful in terms of outlining things like what best practice or good practice is looking at... But the organisation was going to adopt ERM whether a consultant said to do it or not." (CRO – D)

This is, to an extent, consistent with the views of staff from Group 1. Although consultants' suggestions were not seen to affect the adoption decision itself, in some instances, consultants had been engaged mainly in the review of the old risk management framework, and in the very high-level design of the new framework. Then the risk function decided upon how it should look. This notion is exemplified by CUO – C:

"Of course they have provided us with a very good framework of the thinking methodology. But the decision itself ... most of the decisions have been made by ourselves." (CUO – C)

Unlike interviewees in Groups 1 and 2, consultants' suggestions were found to affect the ERM adoption decision in Group 3. Interviewees reported that suggestions from consultants accelerated the process of ERM adoption and implementation. However, there were indications suggesting that they did not necessarily bring anything new, or changed the direction that companies were going in. Consultants also helped in the sense that they had provided helpful information in terms of outlining best practices and thus the thinking methodology. CRO-G pointed out appointing consultants for discussions related to Solvency II. This indicates that consultants were mainly engaged in the discussions related to the upcoming regulations to support the formal process of ERM adoption and implementation. ECRO-K indicated that there has always been some extra support from consultants. He explained it by saying when K would approach the leadership team with an argument, it never harmed to have on its report consultants saying that all K's customers have already done this.

"They were involved, but it wasn't like a formal recommendation. There were discussions about the whole impact of Solvency II on the direction." (CRO – G)

Even though consultants were viewed to have imposed a pressure, the norms and values existing in organisational field have played a key role in shaping the actors' actions and beliefs regarding consultants. For example, ERD-J stated that many people would have been asking J about what has been done regarding ERM, thus encouraging senior management internally to ask the questions themselves. So they might have got the questions on the agenda and relied to an extent on discussions with consultants to get the answers.

"...discussions with consulting actuaries, with investment banks, with our own brokers and with the stock analyst community would all have had an impact." (ERD – J)

It is obvious that even though consultants had provided helpful information in relation to ERM adoption and implementation, the ERM adoption decision was most likely to be taken by the companies regardless of consultants' recommendations. Thus, consultants helped companies in getting things through faster, without necessarily changing the direction in which the companies were going. Further, seeking consultants' suggestions in the decision to adopt ERM can be linked to the insurance companies' interests, beliefs and values; i.e. whether they normally rely on consultants or not. Their size was a particular factor that affected the interest in engaging external consultants. If the necessary expertise and resources are available in-house, then companies may prefer to conduct the assessments internally rather than relying on consulting services. There is an inverse link between engaging risk consultants and the timing of ERM adoption and its advancement level. This can be explained in the sense that consultants have recently become more involved with ERM processes and are more familiar with its related practices.
5.2 Other institutional pressures: internal institutional pressures

Alongside the external institutional pressures, interviewees shared views on the effect of other internal institutional drivers that stemmed from specific norms, values and beliefs. These were considered to have a significant influence on the ERM adoption decision and its implementation in the companies under study. These pressures encompass first, the CRO's interest and enthusiasm. The importance of this driver was indicated in the interviewees' responses on the role played by the CROs in promoting ERM across their respective companies. CUO-C and CUE-C stressed that the CRO's interest in ERM facilitates promoting risk-intelligent culture and embedding ERM across different organisational levels.

"...a big driver for it is our chief risk officer who is very passionate about it and has really spent a lot of time educating us about the benefits of ERM." (CFO – B)

The second internal institutional pressure was achieving various company objectives. These objectives include increasing profits, optimising risk rewards, gaining a better understanding of risk and making risk-based decisions, improving return on capital and return on risk, improving capital efficiency, and avoiding excessive volatility by managing the risk accumulation. These pressures are imposed by the company's economic institutions. CUO-C stressed that C's target has never been the approval of the Financial Services Authority, though is an important consideration. Rather, he saw the main driver as being the achievement of the company's objectives. C's main concerns are how to use ERM, how to improve the company's performance, and how to provide greater confidence to policyholders.

Similar views were shared by CRO-C, CRO-A and CRO-F:

"We have of course various strategies and specific objectives like increasing profits of the company; to be precise we have increasing return on equity and return on risk objectives. We also manage our risk accumulation to avoid excessive volatility." (CRO– C)

"And now it is becoming much more about helping to balance risk and reward, and make sure you get good money out of our risks rather than super control." (CRO – F)

Although coercive and normative pressures played a significant role in the ERM adoption decision in Group 3, it was also driven by the objective of achieving companies' goals, more specifically gaining a better understanding of risk and making risk-based decisions and improving capital efficiency,

"Not only better risk-based decision making, but also better capital efficiency" (CRO - G)

Interviewees suggested that the reason behind adopting ERM is that it facilitates sharing risk-related information, and so making risk-intelligent decisions. Thus, the overall aim of adopting ERM in insurance companies is to achieve sustainable profit through improved risk control.

"One of the objectives of the risk framework is to demonstrate the link between the business strategy and the risk management strategy. So, how we show that these things are not kind of operating in different directions." (ECRO – K)

Finally, ERM is further perceived by CRO-C as a social responsibility issue. Such pressure is exerted by the company's social institutions, particularly in the case of the world's largest businesses that have major economic effects on their markets. A failure in risk management may lead, in an extreme case, to bankruptcy, which might provoke a major effect on the global economy. This was consistent with the views in Group 2

"You've probably heard a lot in the newspapers about corporate responsibilities about the way we deal with people, social responsibilities, and I think managing the risk due to the size of what we are managing is crucial. It is really crucial." (HORF – E)
The extent of the internal pressures' influence on the ERM adoption decision was considered to be similar to the influence of coercive pressures by interviewees from Groups 1, 2 and 3. CRO-A and CUO-C stated that internal and regulation drivers affect the ERM adoption decision in equal proportions. There has been strong advocacy of ERM from a range of authorisation entities including the Financial Services Authority, but the real reason for ERM adoption is to benefit from improved understanding of risks and enhance company performance. This implies that the desire to achieve business objectives is a more relevant driver to adopt ERM than the influence of coercive pressure and other external drivers.

"Definitely, we are not doing all these things because it's good for S&P or good for a regulator, but because it is good for our business. We don't care too much (Laugh)." (CRO – C)

Internal institutional pressures are considered to be the key drivers for ERM adoption actions by CFO-B, while both external and internal pressures are considered to be the key drivers by CRO-B. This could be explained by their different beliefs and values stemming from the different adoption motives associated with the nature of their job and their perceived ultimate objectives of ERM.

"Probably it should be decisions first, rating second, regulations third. We don't actually think because regulators tell us to." (ECRO – K)

In short, the significant effect of the internal institutional pressures could be explained in the light of variations in the longevity of implementing ERM and the objectives pursued by each insurance company. These in turn account for the divergence generated within the organisational field over time as a result of the changes in the institutions governing organisations. Political institutions exerted coercive pressures and regulations, in particular, put pressure on the companies which have adopted ERM between 5 and 8 years ago. Furthermore, a combination of internal and external institutional pressures has shaped the adoption decisions in the companies investigated, with more emphasis on the internal drivers. Table 4 presents and summarises respondents' views with regard to the adoption drivers for ERM actions and their intensity in the particular companies.

6. Discussion

Insurance companies have specific characteristics and operate in a competitive business environment, which make them significantly affected by the larger organisational field. The institutional environment of insurance companies exerts legitimacy pressures that cause the isomorphism observed within the insurance organisational field (DiMaggio and Powell, 1983). Our study provides evidence of institutional pressures that caused diversity among ERM systems adoption over time.

Coercive influence is evidenced in this study based on the observed relevance of corporate governance requirements, and corporate governance best practices. Further, there has been an increasing pressure of normative institutions on organisations across industries in order to improve risk management and reporting systems. For instance, the US Securities and Exchange Commission (SEC) or The Toronto Stock Exchange requires disclosures of risk management efforts (Miccolis et al., 2001; Spira and Page, 2003). Regulatory requirements have been introduced internationally (e.g. The UK Code on Corporate Governance), which linked the risk management function to internal control and extended its focus beyond financial risks and compelled companies to consider a broader risk spectrum (Fraser and Henry, 2007; Spira and Page, 2003). However, our study found no evidence on the effect of regulatory frameworks such as COSO on delineating and coordinating the risk management structures and processes.

Furthermore, we found that regulatory requirements have not imposed great institutional pressure on the ERM adoption decisions of the insurance companies under study,
which adopted ERM far earlier than the introduction of regulations. Rather than pushing adoption, regulations allowed faster and easier embedding of ERM in terms of both technical and financing issues, and added credibility to its usage. For example, regulations will always push the adoption decision of any new risk management innovations, but they exert extra pressures on the insurance companies adopting ERM more recently. Even though regulations are affecting the decision to adopt ERM for companies implementing ERM more recently, such as company J, they were almost simultaneously accompanied by the pressures that stemmed from realising ERM benefits such as creating a competitive advantage.

Our results are not consistent with prior studies conducted in the risk management and ERM area, which linked organisational risk management design choices to regulatory pressures. Prior studies showed that regulations and rating agencies are major factors that have driven the trend toward ERM in both insurance and other financial industries (e.g. Kleffner et al., 2003; Lam, 2006; Shenkir and Walker, 2006; Acharyya, 2008; Hoyt and Lieenberg, 2011; Pagach and Warr, 2011; Paape and Spakle, 2012). These studies showed that ERM is often adopted in response to the influence of compliance with regulatory guidelines. Woods (2011) argued that the quality of governance is considered to be a matter for individual companies. Good governance can be forced, regardless of the amount of legislation, if there is a local willingness to employ the underlying principles. Thus, even if common sets of regulations were in force, the approach to governance, and, specifically to risk management, would vary from company to company. Similarly, insurance companies under study have strengthened and implemented ERM even though they were not obliged to implement ERM before the 2014 imposition of Solvency II requirements.

Demonstrating financial strength to rating agencies was found in our study to be a relevant coercive pressure influencing ERM adoption. ERM has been a part of the rating process. The main rating agencies have focused on and advocated ERM implementation in regulated industries. They have given credit to companies implementing ERM and to strong internal capital models used in the ERM process. For example, S&P started reviewing ERM frameworks in 2005. Studies from across industries show the relevance effect of rating agencies on organisational risk management approaches (e.g. Hoyt and Lieenberg, 2011). The findings of our study show that rating agencies are only one pressure among various institutional pressures on companies' risk management strategies - as discussed by Kleffner et al. (2003).

As a way of gaining legitimacy, companies responded to the pressure of shareholders and other capital providers and stock markets, which motivated them to develop comprehensive risk management systems. These institutional pressures can be related to the discussion on credit ratings and the increasing efforts towards gaining external legitimacy. Previous studies discussed the influence of shareholders on ERM adoption (e.g. Lieenberg and Hoyt, 2003; Mikes, 2009; Nielson et al., 2005). Investors believe that ERM can benefit them because it drives risk-based decision-making, and hence increases value (Meulbroek, 2002). In contrast, Paape and Spakle (2012) indicated the possibility of investors not valuing the adoption of ERM.

Normative pressures are mainly related to professionalisation of the fields as suggested by institutional theorists (Zucker, 1987). Pressures such as university education, advisory influences, or operation of professional networks can be the most significant normative impacts (DiMaggio and Powell, 1983). The normative pressures revealed in our study are primarily linked to the CRO’s education and professional qualifications. Similarly, previous literature showed that the institutional and professional backgrounds of risk specialists shapes institutional rules and thus the risk management integration level is affected by the background and training of the risk managers (Mikes, 2009; Ceniceros, 1995; Colquitt et al., 1999). However, the analysis showed that the adoption itself called for people with
specific educational backgrounds and professional qualifications. This is consistent with Solvency II requirements and with the previous literature indicating that companies signalled their use of ERM by appointing a CRO (Liebenberg and Hoyt, 2003). However, professional experience was proven to affect, not only the adoption decision, but also the design of the ERM framework and implementation as it is a main source for providing the basis for consequent enacting, encoding and embedding processes related to the operationalisation of a particular system or business.

Although frameworks such as international risk management standards and frameworks (COSO, 2004; ISO 31000, 2009), which offer important sources of normative guidance for companies, have become increasingly popular, we could hardly find any evidence that insurance companies under study relied on them. This is not consistent with prior research that reported different industries or companies modeling their risk management approaches based on internationally recognised standards and frameworks (e.g. Beasley et al., 2005; Woods, 2009). Interestingly, we found that the recommendations of the companies that were ahead in adopting ERM have influenced the adoption of ERM systems in the whole insurance sector. Thus, they have contributed to the professionalisation of the organisational field in relation to ERM as a result of their experience. However, reviewing ERM policies and frameworks developed in the insurance companies under study shows that the normative risk management standards and frameworks affected their design.

Some informal cooperation with consultants/advisors in developing or designing ERM was reported in our study, yet the usefulness and applicability of consulting advice was questioned. This might be explained by the lack of consultants' understanding of the specificity and requirements of insurance and ERM. However, their suggestions drove the methodology of ERM process. This is not consistent with Beasley et al.'s (2005) results suggesting the effect of consultants on ERM adoption, but not on organisational designs of ERM. Our findings are consistent with Paape and Spekle (2012) who did not find supporting evidence for consulting influence on ERM development.

Conducting qualitative research allowed us to reveal the effect of another type of institutional driver; internal institutional drivers such as impulses from the management and risk management teams on ERM or on organisational cultures. These drivers were classified into (1) the CRO's interest and passion, and (2) achieving the company objectives. ERM has been considered as one of self-regulating approaches that have emerged in the 1990s (Arena et al., 2010). Even though ERM is considered as part of internal controls, it has become a managerial way of thinking which offers "reasonable assurance regarding the achievement of entity objectives" (COSO, 2004, p.2). Our findings on the effect of management on risk management institutions, rules, and routines are consistent with prior research. For example, Beasley et al. (2005) found that the stage of ERM implementation is positively associated with the management support and the presence of a CRO. Similarly, Kleffner et al. (2003), Paape and Spekle (2012), Altuntas et al. (2011), Sobel and Reding (2004), and Gordon et al. (2009) found that risk specialists and the executives' support can influence the stage of development of risk management systems. Kleffner et al. (2003) showed that the influence of the risk manager and encouragement from the board of directors are reasons for adopting ERM. Our study suggests the determining power of organisational culture on ERM systems implementation. The organisational culture influence on risk management systems can be considered in terms of pressures stemming from institutional and task environments, i.e., achieving specific objectives. For example, Lam (2006) argued that ERM is a systematic process for optimising risk-adjusted profitability. It was further argued that the goal of risk management is to increase return on equity capital (Froot et al., 1993; Strongin and Petsch, 1999).
A combination of internal and external institutional pressures has shaped the adoption decision in the insurance companies under study. The differences in objectives, views and management of the companies under study allowed for finding out such different combinations of pressures that affect ERM adoption. The rules that guide the actors' actions are affected by wider socio-cultural contexts, which suggest that cultural influences can be an institutional pressure. We found that organisational cultures and related objectives affect the values, norms, beliefs, and cultural models of institutional rules. This determines how companies perceive uncertainty and respond to manage it. Unlike Pagach and Warr (2011) who found that ERM is adopted for direct economic benefit rather than to comply with regulatory demands, this study showed that regulatory requirements imposed pressures similar to internal ones (achieving the company objectives) on the company's actions. The internal social institutions imposed another pressure to adopt ERM in the sense that larger insurance companies considered ERM as a social responsibility.

This research shows that institutional pressures play a role in the selection and use of ERM practices (Mikes, 2005). However, there are variations among the insurance companies investigated with regard to the intensity of the effect of external and internal pressures. The internal institutions exerted similar pressures, or even greater ones, on the different insurance companies operating in the organisational field. Although there were a few drivers specifically identified (regulation, business management, etc.), there were some implicit unforeseen uses/benefits of ERM, such as capital management, alongside these drivers. These uses/benefits might not have been recognised by some companies prior to ERM adoption.

7. Conclusion

Institutions in the organisational field and within insurance companies are the basis for the way in which ERM is practised. This research builds on the existing risk management literature that only suggests variations among ERM adoption institutional drivers. In this study, we further extended previous studies considering ERM adoption drivers in the insurance industry by highlighting the variations between institutional pressures that exist between different groups of insurance companies. Dividing the companies investigated into three groups extended the analysis to include different intervals in relation to ERM adoption. This classification highlighted differences among the institutional drivers themselves over specific periods of time and thus added to the literature related to ERM adoption drivers. This study also targeted both external institutional pressures at the different intervals and extended institutional isomorphism literature to another dimension: internal institutional pressures.

The findings of this research should be interpreted within three limitations. Firstly, the sample size is relatively small. However, the nature of the context in which the study was undertaken, the insurance industry, and the seniority of the people interviewed, justifies the relatively small sample size. Accordingly, additional research using larger samples would represent an important contribution to the emerging literature on ERM. Secondly, the main method used to collect data in this study was semi-structured interviews. This method has limitations related to it being costly and time consuming. Additionally, according to Silverman (2009), this method also encompasses the potential of bias on the interviewees' and interviewer's part in interpreting social reality. This problem was minimised by collecting other types of evidence (internal documentary evidence and publicly published data) to complement and cross-check the interviews. Using more than one method to collect data helped alleviate any shortcomings of using semi-structured interviews. Thirdly, although we are aware of the effect of external factors on internal practices, rules, routine etc, this paper
aimed at identifying the factors affecting the ERM adoption decision as a starting point for future research that could broaden the analysis to include the changes in internal practices.

The findings of this field study have implications for policy-makers, regulatory agencies and innovation developers. This study identified that ERM is seen as a necessity that adds value rather than as a burden on insurance companies. This supports the argument that new risk management systems can add value, but this depends on how they are practised at the organisational level. Therefore, regulators and innovation developers should consider having meetings with the CEOs of the main players in any specific organisational field to survey all the opinions and possibilities before going further in issuing new compulsory regulations or developing new innovations. They also need to consider exploring companies' experiences with ERM, particularly those implementing ERM for longer periods, which can provide a basis for the development of strengthened and more informative regulatory ERM frameworks. This will support faster and easier understanding and implementation of a revised framework considering the confusion that companies face in relation to regulatory and risk requirements; e.g., problems associated with capital requirements. Companies will not spend a large amount of money on systems/innovations unless they can see their benefits. Such discussions will support their future actions and enhance the buying of regulations/innovations.

ERM evolution in the insurance industry is still at an early stage, and its understanding is not common across the professional communities. Consequently, further research is required within the insurance industry context. Exploring how the external factors affect internal practices in detail could also contribute to the current body of literature. In-depth case studies on the changes in risk management practice driven by ERM implementation in the insurance industry could also provide a valuable addition to the current literature. Analysing rating agencies' published press releases to support the upgrading/downgrading of insurance companies' ratings could provide indications of the ERM maturity levels of the respective insurers. Research on the robustness of insurers' ERM practices is also needed.

References


Tables

Table 1. List of interviewees

<table>
<thead>
<tr>
<th>Case</th>
<th>Type</th>
<th>Size*</th>
<th>Interviewee</th>
<th>Code</th>
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</thead>
<tbody>
<tr>
<td>A</td>
<td>Ltd</td>
<td>Large</td>
<td>Chief Risk Officer</td>
<td>CRO - A</td>
</tr>
<tr>
<td>B</td>
<td>Ltd</td>
<td>Medium</td>
<td>Chief Risk Officer</td>
<td>CRO - B</td>
</tr>
<tr>
<td>C</td>
<td>Ltd</td>
<td>Large</td>
<td>Chief Risk Officer</td>
<td>CRO - C</td>
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<td></td>
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<td>Chief Underwriting Officer</td>
<td>CUO - C</td>
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<td></td>
<td>Chief Underwriting Europe</td>
<td>CUE - C</td>
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<tr>
<td>D</td>
<td>PLC</td>
<td>Medium</td>
<td>Chief Risk Officer</td>
<td>CRO - D</td>
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<tr>
<td>E</td>
<td>PLC</td>
<td>Large</td>
<td>Head of Operational Risk and Fraud</td>
<td>HORF - E</td>
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<tr>
<td>F</td>
<td>PLC</td>
<td>Large</td>
<td>Chief Risk Officer</td>
<td>CRO - F</td>
</tr>
<tr>
<td>G</td>
<td>PLC</td>
<td>Medium</td>
<td>Chief Risk Officer</td>
<td>CRO - G</td>
</tr>
<tr>
<td>H</td>
<td>PLC</td>
<td>Large</td>
<td>Enterprise Risk Director</td>
<td>ERD - H</td>
</tr>
<tr>
<td>J</td>
<td>Ltd</td>
<td>Medium</td>
<td>Enterprise Risk Director</td>
<td>ERD - J</td>
</tr>
<tr>
<td>K</td>
<td>PLC</td>
<td>Large</td>
<td>European Chief Enterprise Risk Officer</td>
<td>ECRO - K</td>
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</table>

* The companies are classified as large or medium according to Argus de l'Assurance, December 2006 and CEA estimates.

Table 2. The longevity of ERM adoption*

<table>
<thead>
<tr>
<th>Company</th>
<th>ERM adoption in years</th>
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<tbody>
<tr>
<td>H</td>
<td>12</td>
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<td>C</td>
<td>10</td>
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<td>F</td>
<td>10</td>
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<tr>
<td>A</td>
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<td>B</td>
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<td>D</td>
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<td>E</td>
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<td>K</td>
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<td>G</td>
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<td>J</td>
<td>2</td>
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</table>

* Group 1 encompasses companies experienced the adoption of ERM for a long-term period (9-12 years); companies H, C, F and A. Group 2 includes companies adopting ERM for a mid-term period (5-8 years); companies B, D and E. Group 3 encompasses companies with a short-term period adoption of ERM (1-4 years); companies G, H and J.
### Table 3. Risk officials' backgrounds and professional qualifications

<table>
<thead>
<tr>
<th>Risk officials</th>
<th>Background</th>
<th>Professional qualifications</th>
</tr>
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<tbody>
<tr>
<td>CRO - A</td>
<td>Math</td>
<td>Qualified actuary</td>
</tr>
<tr>
<td>CRO - B</td>
<td>Math</td>
<td>Qualified actuary</td>
</tr>
<tr>
<td>CRO - C</td>
<td>Law</td>
<td>MBA</td>
</tr>
<tr>
<td>CRO - D</td>
<td>Arabic and German studies</td>
<td>Chartered accountant</td>
</tr>
<tr>
<td>HORF - E</td>
<td>Economics and Finance</td>
<td>PhD in finance</td>
</tr>
<tr>
<td>CRO - F</td>
<td>Actuarial math</td>
<td>Qualified actuary</td>
</tr>
<tr>
<td>CRO - G</td>
<td>Engineering</td>
<td>MSc; Diploma in risk management</td>
</tr>
<tr>
<td>ERD - H</td>
<td>Math</td>
<td>Qualified actuary</td>
</tr>
<tr>
<td>ECRO - K</td>
<td>History</td>
<td>MBA; Charted insurer; A fellow of IRM</td>
</tr>
<tr>
<td>ERD - J</td>
<td>Math</td>
<td>Qualified actuary</td>
</tr>
</tbody>
</table>
**Table 4. Data Analysis - ERM institutional adoption drivers**

<table>
<thead>
<tr>
<th>Driver</th>
<th>Company</th>
<th>Group 1 (9-12 years)</th>
<th>Group 2 (5-8 years)</th>
<th>Group 3 (1-4 years)</th>
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<td></td>
<td></td>
<td>A</td>
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<td></td>
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<td>H</td>
<td>G</td>
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</table>

**External institutional pressures - NIS**

- Coercive pressures:
  - Recent regulations
  - Government demands
  - Rating agencies
  - Capital providers' demands
  - Stock market analysts' requirements

<table>
<thead>
<tr>
<th>The main drivers are regulatory and rating agencies</th>
<th>Not too much for the largest players because all we do we are convinced we need to do</th>
<th>I say not much. We already have best practice in place before regulations have come out</th>
<th>Regulations are subsidiary things</th>
<th>It just happened that rating agencies and regulators like it as well</th>
<th>Undoubtedly regulation is the key driver</th>
<th>There is also regulation purpose. So we have to have an ERM</th>
<th>It’s more like regulations and rating agencies affected this decision</th>
<th>The external credit rating agencies. Secondly, the sort of regulations driving it</th>
<th>Regulatory push for Solvency II purposes is a big consideration. Because the rating agencies are very interested in seeing good risk management practice embedded</th>
</tr>
</thead>
</table>

- Mimetic pressures
  - Crises and organisation disasters
  - Business nature, needs and requirements

<table>
<thead>
<tr>
<th>The main drivers are internal drivers rather than external competitors</th>
<th>No, for me it is about the market</th>
<th>Not directly, but indirectly</th>
<th>To some extent. It is more important to be doing it and understand it rather than seeing others doing it</th>
<th>So we can say they do not have any effect</th>
<th>No, I think it was an internal decision</th>
<th>Definitely we look at what our peer companies are doing</th>
<th>I personally still want to be convinced that other firms are getting the big benefit from ERM</th>
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<tr>
<td>Normative pressures</td>
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<td><strong>Education and professional qualifications</strong></td>
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<td>ERM is something that they have studied and as a result it becomes known</td>
<td>A background is a real plus in that business</td>
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<td>I don't think my background would have influenced it</td>
<td>The design is influenced</td>
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<td>It was my professional qualifications made me qualified to the job</td>
<td>I'm one influence amongst many</td>
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<td>No, I will not say on the adoption</td>
<td>They decided to recruit me because they decided to do ERM</td>
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<td>ERM as a professional discipline or an academic discipline is emerging</td>
<td>I am not high enough at the organisation from my own perspective to have an influence</td>
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<td><strong>Consultants' suggestions</strong></td>
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<td>No, it is not. Internal, regulatory and rating agencies</td>
<td>Yes, in some way</td>
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<td>Now things are changing so quickly in the market that put them behind the curve when it comes to the best practice</td>
<td>We use reasonably. And what we do then is review, change and decided on what it should look like</td>
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<td>We are happy to make up our own minds</td>
<td>They've been quite helpful. But the organisation was going to adopt ERM whether a consultant said to do it or not</td>
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<td>We are not very convinced about the appropriateness of their preposition</td>
<td>There were discussions going on with PWC, but I don't think it was the key factor</td>
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<td>I think did they tell us everything we didn't know? Probably not</td>
<td>I don't know firsthand but I would expect that discussions with consultants would have had an impact</td>
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<td>Internal institutional pressures</td>
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<td>CRO interest and passion</td>
<td>That part is</td>
<td>A big driver for</td>
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<td>heavily relied</td>
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<td>Risk Officer</td>
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<td>Achieving the company</td>
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<td>Avoid excessive volatility</td>
<td>We manage our</td>
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<td>Optimising risk reward</td>
<td>It is to opti-</td>
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Note:

- = Stressed by interviewees
- = Stated by interviewees
- = Not evident/stated by interviewees
Figure 1. Institutional pressures driving ERM adoption/Nvivo