

ERM – from Risk Management to Leading the Opportunities

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ERM - riskienhallinnasta mahdollisuuksien johtamiseen

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Ihmiskunnan alkutaipaleelta asti riskinotto on ollut keskeinen osa ihmisluontoa ja siten myös tärkeä osa nykyajan markkinataloutta. Meillä on sisäänrakennettu kyky tarttua hetken tarjoamiin mahdollisuuksiin ja - selviytyä hengissä. Vaikka riskikäsitteellä on hyvin vanhat juuret, tavanomaiset riskinhallintamenettelyt pohjautuvat monelta osin keskiajalta peräisin oleviin menettelytapoihin. Siksi ne kattavat vain osan nyky-yritysten tarvitsemista riskienhallintamenettelyistä.

Kokonaisvaltainen riskienhallinta (ERM, Enterprise Risk Management) on melko uusi liikkeen-johdollinen kehysrakenne. Se on luonnollinen jatkumo perinteiselle vakuutuspohjaiselle riskinhallinnalle, joka on perustunut pääosin riskien siirtoon riskinhallintastrategiana. Nykyaikainen, verkottunut ja globalisoitunut liike-elämä tarvitsee laajemman näkökulman riskinhallintaan, niinpä kattavampi riskienhallinnan lähestymistapa kehitettiin vuonna 2004 ja tunnetaan yleisesti nimellä COSO ERM.

Tämän tapaustutkimuksen tarkoituksena on laajentaa tietoa ERM:n parhaista käytännöistä Itella-konsernin riskinhallinnan järjestelmällistä kehittämistä varten erityisesti uusien liiketoimintamahdollisuuksien hyväksikäytön näkökulmasta. Erityisen kiinnostuksen kohteena ovat ne organisatoriset ja metodologiset toimenpiteet, joiden avulla uraauurtavat yhtiöt ovat onnistuneet jalkauttamaan ERM-prosessin organisaatioonsa saaden siitä strategista kilpailuetua. Tässä työssä pyritään tutkimuksellisin keinoin löytämään se polku, jota työnantajani kannattaisi kulkea kehittääkseen riskinhallintaprosessiaan paremmin strategista johtamistaan tukevaksi.

Tässä maisterityössä on kuvattu empiirinen rakenne, joka ei ole kypsyysmalli tai kattava ERM-kehysrakenne, vaan joka voidaan määritellä yksinkertaistetuksi käsitemalliksi kokonaisvaltaisen riskienhallinnan liiketoimintamahdollisuuksien ymmärtämiseksi. Perustuen tämän tutkimuksen teoria-aineiston ja empiiristen havaintojen kokonaisuuteen esitetään uusi liikkeen-johdollinen, kokonaisvaltaista riskienhallintaa koskeva suppilomalli. Mallia, joka on kypsyysmallin kaltainen yleisesitys ERM-prosessissa tarvittavista toimenpiteistä, voidaan käyttää liikkeenjohdollisena yleisesityksenä tutustuessa kokonaisvaltaiseen riskienhallintaan.

Tutkimuksessa tunnistettiin ERM-prosessin potentiaali pyrittäessä luomaan uusia liiketoimintamahdollisuuksia. Tosin vain harvat kotimaiset ja ulkomaisetkaan organisaatiot ovat toistaiseksi onnistuneet luomaan merkittäviä liiketoimintamahdollisuuksia ERM:n avulla. Pääsyy tähän vaikuttaisi olevan ERM-prosessin vaatima organisatorisen kypsyys, jonka saavuttamiseen vaaditaan aikaa suhteellisen paljon – jopa vuosia. Lisäksi jokaisella organisaatiolla on ominaispiirteensä mukaan lukien sen arvot, taloudellinen rakenne ja liikkeenjohdolliset toimintatavat, jotka voivat tuoda merkittäviä haasteita kokonaisvaltaisen riskienhallinnan jalkauttamiseen organisaatiossa.

Avainsanat: kokonaisvaltainen riskienhallinta, mahdollisuuksien johtaminen, riski, riskienhallinta, COSO (Committee of Sponsoring Organizations of the Treadway Commission), CRO (Chief Risk Officer)

Laurea University of Applied Sciences Laurea Leppävaara Social Sciences, Business and Administration Security Competence Abstract

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ERM - from Risk Management to Leading the Opportunities

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From the dawn of humankind to the present modern business life, risk taking has been a fundamental part of life and the market economy. We have a built-in feature to grasp the moment for seizing opportunities - and to survive. Even though the concept of risk has very old roots, the foundations of traditional risk management procedures are still in many ways based on the grounds of medieval practises. However, they are covering only to a certain extent the risk management needs of the modern organisations.

ERM as the more comprehensive risk management approach is rather a new managerial framework. It is a natural continuum for the traditional risk management, which is mainly based on insurance practises, i.e. using risk transfer as a risk management strategy. In the present, the highly networked and globalised business world, wider perspective for the risk management is needed and the more comprehensive risk management approach was established in 2004, known as COSO ERM (Enterprise Risk Management).

The main purpose of this case study is to expand the knowledge of the best practices of ERM for the systematic development of the risk management process at Itella Corporation, especially from the viewpoint of the utilization of the new business opportunities. As the subject of the special interest is the organisational and methodological procedures by which pioneering companies have successfully, in a concrete manner implemented ERM-process, and gained a strategic competitive advantage. The central question for this study is, by the means of the research methods, to find the path my employer could develop its risk management process to become more supportive for the strategic management of Itella.

In this master's thesis has been described an empirical framework, which is neither a maturity model nor comprehensive ERM framework, but can be defined as a simplified conceptual suggestion for the opportunity side of ERM. In addition, based on the empirical framework of this study and the respective theoretical and empirical findings behind it, the concept of ERM funnel as a new managerial concept for ERM is suggested. This concept is the maturity model-like generalisation of the needed ERM steps to be taken and it can be used as a managerial introduction to the ERM.

In this study, the potential of the ERM process was identified when an attempt of creating new business opportunities is made. However, it seems that very few organisations in Finland, or even globally, has so far managed to create substantial business upside with the help of opportunity management embedded ERM process. The main reason for this rarity seems to be that ERM is a process-like framework, where an increase in the risk management maturity takes relatively long - rather years than months. In addition, every organisation has its own characteristics including company values, economic structure and managerial systems that may give particular challenges when implementing ERM.

Key words: Enterprise Risk Management, Opportunity Management, Risk, Risk Management, COSO (Committee of Sponsoring Organizations of the Treadway Commission), CRO (Chief Risk Officer)

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Abbreviations used on this thesis

AC Audit Committee
BF Business Function
BG Business Group

CAS Casualty Actuarial Society CMM Capability Maturity Model

CMMI Capability Maturity Model Integration

COSO Committee of Sponsoring Organizations of the Treadway Commission

CRO Chief Risk Officer

ERM Enterprise Risk Management

FERMA Federation of European Risk Management Association

FinnRima The Finnish Risk Management Association

GF Group Function

IRM Institute of Risk Management

ISO International Organisation for Standardization

M&A Mergers and acquisitions MB Management Board

PDCA Plan, Do, Check, Act - model

PRMIA The Professional Risk Managers' International Association

PwC PricewaterhouseCooper

RC Risk Champion

RIMS The Risk and Insurance Management Society

RM Risk Management
ROI Return on Investment
S&P Standard & Poor's

1 Introduction

The word "risk" is often connected in the spoken language to a negative or otherwise avoided event or condition, which possibly takes place and where the target of the risk is exposed to a danger. The extreme etymological ends as interpretations are probably both the meaning of Arabic word "risq"; 'happiness and wealth' (Skeat, 1910 according to Wilkinson 2001, 91) and the Greek word "rhiza"; 'cliff' along with the Latin word "resegare"; 'cut off short', from which the seafaring related interpretation of 'risk' was created possibly signifying to sail too near of the pitfalls of familiar waters. (Ayto 2005, 438).

The etymological interpretation of this word seems to be both linguistically and culturally bound to each other and it may then be used to refer to opportunities to be pursued as well as potential catastrophe to be avoided (Wilkinson 2001, 91). However, the ultimate origins of the word have never been satisfactorily explained (Ayto 2005, 438). By connecting previous definitions to the concept of risk management and interpreting them widely, risk may be defined as a willingness and an ability to take risks: if you correct your voyage in a controlled way, you will gain precious time and then be ready to take on a new cargo faster to be transported. One can get an economic benefit from risk taking. On the other hand, one can also lose a precious shipload - and worst of all - the whole crew as a consequence of unskilled or careless sailing.

However, in the present world there are also other possibilities to define what the term 'risk' means. It can simply be defined as a situation involving exposure to danger (MOT - Oxford English 2009; MacCrimmon & Wehrung 1988, 9-10; Vaughan 1997, 7). Vaughan has also defined risk in a more objective-oriented manner where risk can be considered as a state, which could cause unfavourable deviation to the objectives or prospective goals (Vaughan 1997, 8). Depending on the context, also more layered and intricate definitions are possible: risk can also refer to the systematic way of the present society is handling hazards and insecurities caused by itself (Beck 1992, 21). Thus, in today's networked and complex world the organisations may have challenges to identify the risks and opportunities in their business environment. They need a more comprehensive and holistic view of the risks for their business milieu.

A new risk management paradigm, Enterprise Risk Management (later ERM), is a fundamental point of view in the connection with this phenomenon. According to COSO (Committee of Sponsoring Organizations of the Treadway Commission) ERM is defined as "a process, effected by an entity's board of directors, management and other personnel, applied in strategy setting and across the enterprise, designed to identify potential events that may affect the

entity, and manage risk to be within its risk appetite, to provide reasonable assurance regarding the achievement of entity objectives" (COSO 2004, 2). The uncertainty belongs as an integral part of the risk management process when avoiding unwanted events or aiming to reach upside to business processes or other new business opportunities.

The term of opportunity management is commonly used in the project management context in which most researchers agree opportunity is the positive effect of the uncertainty to provide to project objectives (Olsson 2007, 747). The opportunity management in this study means processes, procedures and concepts of risk management by which new business opportunities and strategic or operational advantages may be reached in the organisation. If the organisation is broadminded and efficient enough in its relation with the business environment, both risk and opportunities, it has - at least in a theory - a possibility to get significant competitive advantage from ERM. In this study, the potential of ERM process is analysed from the theoretical and practical points of view.

1.1 Research question, objective and the scope of the work

The main purpose of this thesis is to expand the knowledge of the best practices of ERM for the systematic and controlled developing of the risk management of Itella Corporation (later Itella) especially from the viewpoint of the utilization of new business opportunities. One subject of special interest is organisational and methodological procedures by which pioneering companies have successfully and in a concrete manner implemented ERM process and gained a strategic competitive advantage.

In Itella systematic security and risk management work has already been done for decades. The new, more holistic approach to the risk management was taken into use in the beginning of 2008 when the ERM process was started. The goals of this new comprehensive risk management approach have been set on the high level in Itella and this process is more clearly stated to be part of the strategic management process of the organisation. The main objective of the ongoing ERM-process is to obtain a strategic competitive edge to Itella's business when the maturity of the risk management process increases and the process has more tightly been bound to the managerial system of the organisation.

The high-quality risk management process gives instruments to perceive and to tackle the most significant business risks as well as to recognize businesses opportunities – and perhaps in turn - even create them. Complex and wide business processes, particularly in the big corporate companies, require the systematic and sound risk management procedure. A good ERM process supports these aims in particular, which is also Itella's objective.

Central question for this study is to find the path my employer could develop its risk management process to become more supportive for the strategic management of Itella. After a preliminary literature analysis and having discussed this subject with my colleagues, I have noticed there is lack of researched in this field based on empiric experiences of ERM best practices, the strategic benefits of it and - above all - its successful implementations. These findings were also recognised in a survey where several ERM professionals were interviewed and case study examples of successfully and practically implemented ERM best practises were needed (Fraser et al. 2008, 84-85).

ERM can be broken up into different parts. These parts are often being called risk categories and they can be divided into four sections: strategic, operational, financial and hazard risks (Shenkir & Walker 2006, 6 - 7). Also other allocations are used. One set of allocations with their subsets is described in Figure 1 representing risk categories used in Itella's risk management process. In most cases, financial and insurance related managerial issues have been managed as a natural part of the organisations daily processes. Characteristically economic indicators like cash flow and solvency, which describe the well-being and performance of the company, are regularly scrutinised by the financial experts of the organisations.

Strategic	Financial	Operational	Hazard
1.Business development risks 2.Business environment risks 3.Market risks 4.Technology risks 5.Political, economic, cultural and legislative development 6.Regulatory risks 7.Global climate, environmental and other phenomenon 8.Communication risks 9.M&A risks	1.Liquidity 2.Interest rate risks 3.Currency risks 4.Credit risks 5.Counterpart risks 6.Country risks 7.Contract risks 8.Tax risks 9.Accounting & reporting risks 10.Capital structure	1.Organization and mgmt related risks 2.Information technology and security risks 3.Production-, process- and productivity risks 4.Business interruption risks 5.Profitability risks 6.Project activity risks 7.Contract and liability risks 8.Crisis situations 9.Illegal acts	 Occupational health and safety related risks Personnel security risks Environmental risks Fire and other disasters Natural events Premises security risks

Figure 1: Risk Categories (Itella, 2010)

One reason for the early adoption of financial and hazard risks management in the organisations may be that the management procedures related to them have been developed within the long period of time. From the dawn of organized business society the development of the self-regulation of the bank and insurance industries along with the international law and regulation requirements, the respective aspects of company life have been considered the core components to run the business efficiently and according to directives.

Thereby grown risk management experience from these sectors has moved to the companies' respective units as a result of financial, legal and customer requirements. These affairs have had to be taken well care of by new experts like bookkeepers, financial managers and brokers. This has also been the case at Itella. For this reason, the handling of financial and hazard risks are paid less attention to in this study, even though severe incidents caused by these risks could endanger the existence of the organization. Furthermore, when managing both financial and insurance matters skilfully in the organisations they are also an obvious source of business opportunities as well as operational excellence. These risk categories are only examined in a context of supporting the main goals of this work.

In this work, the concentration is more on strategic and operational risks, as several studies have been shown that the most critical risks in order to achieve business goals are particularly related to strategic and operational risks (Marsh, 2009). The interest of this study is focused on them for their less explored business opportunity capabilities.

1.2 Research strategy and methods

Since the objective of this work is to expand information about the opportunity management of ERM for the systematic and controlled developing in Itella's risk management process, its research approach is exploring by its nature and case study is chosen as a research strategy. Exploring study e.g. investigates a rarely known phenomenon, surveys literature and its contents of certain subjects and looks for the new points of view or phenomena around it (Hirsijärvi 2000 127-128). Case study, in turn, is an empirical inquiry that investigates a contemporary phenomenon in depth and real-life, where the contextual conditions are very important to understand (Yin 2009, 18).

The term research strategy means the wholeness of the methodological solutions of the study from which, however, the term research method must be distinguished as a smaller concept; methodological choices depend on the research problem (Hirsijärvi et. al 2000, 120). In this qualitative study is used a constructive research method. Qualitative study can be defined as a form of systematic empirical inquiry into meaning (Shank 2002, 5), which studies

things in their natural settings, attempting to make sense of phenomena in terms of the meaning people bring to them (Denzin & Lincoln 2000, 3).

The constructive study method attempts to solve problems e.g. by creating the construction of models, procedures, plans and organisations and it is widely used, among others, in technical sciences and mathematics. It is also applied when new managerial processes and procedures are developed and practical managerial challenges are solved in the business organisations - these compositions are called managerial constructions. (Kasanen et. al1993, 243-244.)

Theme interviews are used in the case study of this thesis as a collection method of the empirical data. The information for the theoretical section has been gathered by the means of literature analysis. According to Wilkinson (2000, 26) with the help of literature analysis the knowledge of the researched field can be expanded: one cannot advance knowledge in the study field without first learning what others have achieved and what still remains to be achieved. Thus, exploring what has been argued and expressed before by the scholars and ERM pioneers, some concrete solution is aimed to develop for enhancing Itella's risk management practises. Hopefully also the organisations strategic risk management benefits from this study in terms of enhancing it to explore more easily new business opportunities more easily in the future.

In this work, the chosen research strategy and methods are materialised by using the case-study approach to investigate the present ERM practises of Itella and other chosen companies. External risk management experts and the members of Itella's risk management process have been interviewed and the respective documentation analysed. The author's own experiences and knowledge about the risk management process are used as well. With the help of results obtained by the existing literature and knowledge attained from the interviews, some ERM best practise comparisons between the theory and empiric information have been made and the new framework for the Itella's future ERM practice as managerial construction has been suggested.

1.3 Structure of the thesis

After the introduction, the rest of this thesis is organized as follows. The second Chapter gives a brief introduction of ERM. The third Chapter presents the theory overview on risk management, including reviews of the major ERM Frameworks and maturity models as part of the literature review. The fourth Chapter describes the research strategy and methods the case study companies. The fifth Chapter condenses the key empirical findings. The sixth chapter suggests an empirical framework of ERM and the seventh Chapter describes the sug-

gestion of the managerial construction for the ERM process. The discussion and conclusions of the study are addressed in the eighth and ninth Chapters.

- 2 From traditional risk management to more comprehensive approach
- 2.1 Brief history and evolution of risk management

From the dawn of humankind to the present modern business life risk taking has been a fundamental part of life and the market economy. We have had a built-in feature to grasp the moment for seizing opportunities or – to survive. Risk taking has also guided the investors to the fields where the profits are the most promising. The concept of risk – knowingly or not – has then always been present everywhere, but the profound meanings of the risk and opportunities were understood until the late 1680's.

According to Bernstein, the modern conception of risk is traced back to the Hindu-Arabic numbering system, which reached the West some eight hundred years ago. The concept of risk was then started to study seriously during the Renaissance by French mathematicians Chevalier de Méré, Blaise Pascal and Pierre de Fermat who discovered the probability theories and methods of statistical sampling with the help of observations gathered during the dice gambling. The profound understanding about risk, how to measure it and how to weigh its consequences' including the concept of risk-taking, was the ultimate catalyst when creating the Western Society. Mankind was all sudden able to see the possibilities of the future - it was turn from enemy into an opportunity. (Bernstein 1996, 1-5.)

According to de Roover the roots of the systematic risk management were developed in the Middle Ages - the fourteenth century - when marine transport related units and bilateral partnerships and agreements between the Italian ship owners and merchants developed into a insurance policies and risk was specifically one of the objects in the settlement (De Roover 1945, 172-182).

The insightful meaning of probability gave a firm ground for the decision-making in seizing business opportunities as well. However, the concept of probability and uncertainty was not widely known in that era. Its usage on the larger scale for the business purposes only began in insurances in England by Lloyd's in the late of the 16th century, where the insurers were called 'underwriters' (Bernstein 1996, 88-96). However, the earliest recorded examples of premium insurance type of contracts between the shipping merchants come from the 1350's in Palermo, Italy (Wilkinson 2001, 91-92). So transferring the burden of risk to the third party has medieval roots and was first used without knowledge of probability theories or respective

understanding the likelihood of sea damages. So, the large scale commercialisation of insurances starting for the marine industry, took place not until three hundred years later.

Different parties then shared risks related to the sea transports of products, so that they were together responsible for the economic losses of the destroyed shipload to the cargo owners against the reward. In other words, it was a question of the business operation where all sea trade parties were benefitting from this arrangement: to share and backup each other's financial solvency caused by possible losses in the future's shipwrecks. As a starting point of present insurance business by transferring the risk against the compensation of the third party, insurances have been one of the major risk treatment forms and widely used methods in the business life.

The basic strategy of the risk treatment is avoiding, reducing, transferring or managing the risks (e.g., Suominen 2000, 78-86; Sanchez et al. 2008, 18). Risk strategy specifies the fundamental approach of organisation toward perceived risks. There should also be procedures that are more specific in the organisations in relation to how risks will be treated in practise. This concept is called risk management, which according to IRM is a process that is aiming organisations to understand, evaluate and take action on all their risks with a view to increasing the probability of their success and reducing the likelihood of failure (IRM 2009).

It seems that insurances have too long been the main strategy in the risk management. Through the insurance products and risk management practises offered by the insurance industry there has been an embedded assumption that all business continuity related risks could be insured. This is quite a narrow approach in today's peril and complicated world. The transferring of risk to be carried out by the insurance company or by another actor is only one of the strategies of handling risks on the present day. When the concept of risk management was first established in the business society, an idea of transferring risk to be carried out by some third party only, was perhaps an adequate risk management strategy. This may have indeed been the situation at the time when nations and individuals were removing from the medieval base production even to the society where life and production were more mechanised.

The loss of harvest, earnings or business could then be jointly covered with some mutual arrangement. Still, even in the later post industrialised society - where the society is defined by the services supporting the quality of life, distinguishing it from the industrial society where the amount of goods was what counted on - (Bell 1974, 127), very few companies were able to rely on only risk transferring as their risk management strategy. According to Beck, in the present information society, the use of insurance may become even useless since the sizes of hazards threatening the infrastructure of the society are enormous (Beck 2009, 27-28).

Therefore, it is probably too narrow an approach to even small and medium-sized enterprises to handle risk management - not to mention the large corporate companies and their large business supporting infrastructure - by only transferring the risks. The business processes of companies are increasingly complex and networked. The earnings of the organisations may as well - depending on the business field and logic - be very much based on the intellectual capital of the employees and the representatives of the subcontractors. For example, it can be very expensive or even impossible to insure the risks of the software code. Because the hazard risks are only one part of the risk map of companies, another risk field must be covered with some other risk management procedures.

Furthermore, the majority of the business potential may be ineffectively used if the risk management measures are focused only to avoid, reduce or transfer risks. The coin has two sides: the organisation must into the certain limit to accept reasonable risks and manage them in order to succeed. The profitable and successful business is not possible otherwise. In such case, all of us would be successful business people. Therefore, the business related risks must be accepted to a certain limit and at the same time, an attempt must be made to manage them as well as possible. Organisations which have become aware supporting their strategic management and business opportunities by utilising risk management activities embedded as integral part of their strategy and business processes are most probably more competitive in the future markets.

According to an US based study, carried out among CFO's and other financial professionals in seven hundred organisations representing wide variety of industries with the total revenues ranged from \$14,950 to \$115 billion, nearly half of the companies did not have any enterprise-wide risk management process in place or had plans to implement one. Furthermore, additional 18% of the organisations indicate that they are currently investigating the ERM concept, but have made no decisions about implementing it. These seem to be surprising results because major part of the respondents believed that the volume and complexity of risks have changed much within the last five years. (Beasley et al. 2009, 3.)

According to Olson & Wu (2008, 8 and 31) the risks that are in the organisations area of expertise could then be turned to the strategic opportunities and on the contrary if risks are not among firm's essential capabilities – and have been cumulated significantly - should be defended against. However, it seems, that only in a few companies which have taken ERM process into use, the implementation is aiming to support the planning of strategic development and business processes of the organisation: the main driver has rather been to get a more uniform understanding and integrated view to risk management and the organisation in general (Fraser et al. 2008, 77). Thus, the evolution of risk management from just transferring risk or simply avoiding them is developing toward more comprehensive risk management to

see the upside of the risk as well. After all, there is a lot of work to do also in ERM organisations in order to embed the risk management practises as part of the managerial system in order to get the most of the ERM. This may tell something about the challenges of implementation of the ERM process in general, but also the organisational maturity of the respective organisations to benefit ERM.

2.2 ERM - Setting the scene

As described earlier, the concept of risk has very old roots and the foundation of modern risk management is based on the ground of insurance and financial activities. This is only covering partly the risk categories of ERM. Operational risk management has its roots on military risk analysis and Strategic risk management on the scenario thinking (Clarke & Varma 1999, 415). According to Shenkir & Walker (2006, 6-7), traditional risk management of the modern age was generally focusing on financial risk and hazard risks and the enterprise-wide perspective of it began to be considered and implemented in the 1990s, see Figure 2.

Eventually, organizations put more efforts for analysing risks regarding to the markets where they were operating. Perhaps the focus of risk management was removing a step from the supportive role to the business field to consider also what is happening in the market environment of the organization. This meant that an enterprise-wide risk perspective began to be considered and implemented in the 1990s and more holistic risk approach enabled management to identify most of the key risks that the organizations were confronting (Shenkir & Walker 2006, 7). This new paradigm of risk management - ERM - has eventually emerged for managing the portfolio of risks that have faced organisations (Beasley et al. 2005, 521).

In order to achieve their business objectives in the present fast shifting and globalised world, but also in the future, companies have had to take broader look to their demanding business environments. This means that the business opportunities as well as the respective risks – business uncertainties in general - have to be taken consideration and examined in a structured manner. Shareholders and other interest groups are expecting organizations to be effective, but at the same time, they want to have more assurance for the well being of their businesses. This new paradigm of risk management and its characteristics has been described in Figure 3.

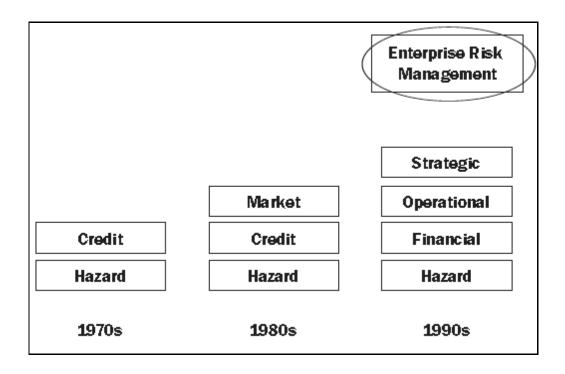


Figure 2: Evolution of risk management (Shenkir & Walker 2006, 6).

Risk management have historically been done in the 'silos' rather than enterprise-wide, which means that companies may knew how to manage certain obvious risks individually but they were hardly probing other major risks or required supervisors and other management to take part of in this process. Typically, companies have had people who have managed process and safety risks, as well as insurance, financial and other assorted risks. As a result of this fractured approach companies have often taken vast risks within some business areas while over managing substantially smaller risks in other areas. (Barton et al. 2001, 2).

Lack of the sufficient risk management process and respective communication have been meant that even the people responsible for the risk management activities in the company do not exchange the information each other corporate-wide. This kind of lack in managerial practices and transparency of financial reporting has been lead to corporate disasters like Enron, where risks have been accumulated without the adequate assurance of the state of the company. On the other hand, also the huge capacity of business opportunities has been thrown away for the same reasons.

When examined in the conceptual, but still informative level, the characteristics of risk management have developed as follows:

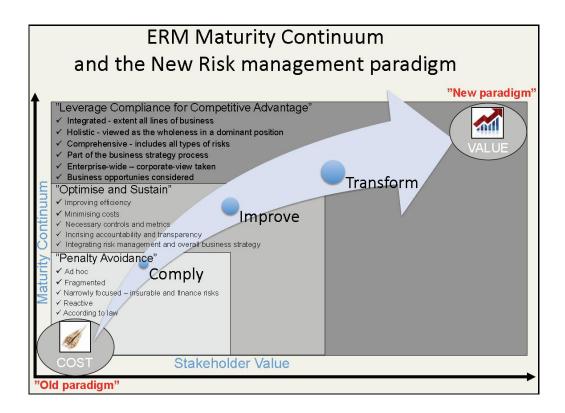


Figure 3: ERM Maturity Continuum and New Risk Management paradigm, (adapted according to Abrams et al. 2007, 222; Barton et al. 2002, 3).

According to Abrams et al. the businesses have evolved their response to risk from only being complaint with the requirements to avoid penalties, to progress by improving to optimize and sustain their RM process and to finally achieve a state of continuous risk-based structural alteration, where they are capable to benefit of compliance to gain competitive advantage. (Abrams et al. 2007, 222.)

In order to be effective and meet the strategic goals of the organisations, ERM must comprehensive and holistically cover all types of risks across the company and be embedded with all important business processes. When a more holistic view for the risk management process was a novel, but the term ERM was not in use, adjectives describing more wide-ranging risk management process - e.g. "integrated", "holistic", strategic" and "enterprise-wide" (risk management) - were often used as the synonyms of the comprehensive risk management procedure (see DeLoach 2000,5; CAS 2003, 8; Meulbroek 2002, 2; Clarke & Varma 1999, 414).

COSO's ERM framework is undoubtedly the most cited source of information among the scholars and practitioners when it comes to the definition of the ERM worldwide. In spite of this, according to extensive study made in North America among Chief Risk Officers (CRO) and other Executives, surprisingly COSO was not considered the most valuable source of information and guidance for ERM (Fraser et al. 2008, 84). The ERM in general is a standard-like

framework, but risk management standards and frameworks differ from each other. The standard contains requirements against which the risk management processes of the organisation can be certified and the framework offers general recommendations for the best practices in the field (Moeller 2007, 332). At the moment ERM processes cannot be certified. However, the Australian AS/NZS ISO 31000:2009 AS and its superseded AS/NZS 4360:2004 standard along with equivalent international ISO 31000 and 31010 standards published in late 2009 are also applicable for ERM purposes (Wikipedia 2010).

3 ERM more in detail - Literature review

In the earlier chapter has been described the basic concepts of the risk management and explained its linkage to the opportunity management in organisations. In this chapter, ERM and its opportunity side is analysed more in detail by literature review. This review consists of three different types of writings: frameworks, maturity models and sixteen articles. Especially aspects related to business potential as well as strategic and operational risks are examined. By starting this literature review with the ERM frameworks and the maturity models, it is supposed to help readers to follow the central ERM concepts and terminology used in the chosen articles, which are analysed more in detail. This literature review also forms the theoretical background of this study. When chosen the literature for this review, case studies and other texts including practical implementations of ERM were preferred.

3.1 ERM frameworks

In ERM frameworks are described the basic elements which any given ERM process should contain (NC State University, 2009) and they usually give a blueprint or approach for the necessary steps of ERM implementation in addition to providing guidance and examples (Shenkir & Walker 2006, 9). Therefore, they give a good overview to ERM. The comprehensive risk management awareness in general has grown from the beginning of the 90's. COSO e.g. launched a framework for internal controls in 1992 including the risk management layer as a result of major organisational failures and lack of respective finance reporting during the regression in the United States in the 70's and 80's (Moeller 2007, 2-3). Mainly on the basis of this framework new COSO ERM framework was launched at the end of 2004 – again hastened as a result of the financial clutters among the major US companies – aimed for developing risk management with more comprehensive and strategic manner instead of using only internal controls and applying "silo thinking" in the risk management (Moeller 2007, 49 – 52).

In addition to COSO ERM there are also other ERM frameworks, which have different approaches and background organizations involved (Shenkir & Walker 2006, 7). Into Table 1 has been gathered most of the risk management frameworks with their central characteristics

including the existence of the risk management tools and opportunity perspective as subjectively estimated. The estimations have been done in a three-level scale from high to low, where "high" means that the amount and quality of information concerning RM tools or opportunity perspective is considerable, whereas "low" means that these aspects are very lightly considered. Some of these frameworks are not purely ERM related, but have wider than just traditional perspective to risk management.

Framework	Brief description	Key content	RM Tools incl.	Oppor tunity view
AS/NZS - ISO 31000/2009	Standard-like risk management framework for every organisations	Guidance for decision making, risk identification, compliance, and corporate governance/ERM	High	High
Basel II/2004	Improvements for international banking system/ Financial	Minimum capital requirements, supervisory review and market disci- pline emphasised	Medium	Low
CAS 2003	Conceptual RM framework for strategic decision support to every industry and organisation level	ERM discipline and value creating/risk mitigating and stakeholders viewpoint comprehensively considered	High/ as attach- ment	High
COSO ERM/ 2004	Broadly defined ERM dealing with risks and opportunities and value creation perspective	Strategy setting, risk appetite and portfolio considered and assurance of reaching business objectives covered	High/ as attach-ment	High
FERMA Risk Management Standard/ 2004	Standard-like risk management framework with externally and internally driven risks and opportunities	Best practices approach to risk man- agement with the linkage to the organi- zation's strategic objectives	Medium	High
King Report II on Corporate Governance for South Africa/ 2002	Promotes corporate governance and internal controls from Board perspective	Board's responsible for the risk management process (especially from operational, financial and Hazard) and its effectiveness	N/A	Low
The Combined Code 2003/ Turnbull Guidance/2005	Board-level framework for effective control of financial and operational risks/ Board's risk-based approach to internal controls	Non-labelled ERM approach with the many similar aspects risks/ assessment for risk and control processes and their sub-elements	N/A N/A	Low/ Low
S&P ERM/2006 and 2010	ERM practices included to S&P ratings for assessing cred- itworthiness of companies	Review e.g. ERM policies, infrastructure and methodologies; from year 2010 also includingnon-financial companies for enhancingthe transparencyof investors and issuers	N/A	Me- dium

Table 1: ERM Frameworks

As described, the main goals and risk viewpoint differs between each ERM framework from the standard-like risk management view to the pure comprehensive risk management approach. In addition, the financial risk aspects are well represented. The opportunity view – when considered the amount of strategic and business upside emphasised – varies a great deal between the frameworks. When one is searching particular tools for creating risk management process or planning risk assessment, some of the frameworks are more valuable than others. However, when risk tools are included they are mostly expressed as the accessory documents of the framework.

Almost all of the frameworks seem to include a generic idea of the risk management process, where the following aspects are included:

- 1 Objective
- 2 Risk identification
- 3 Risk Assessment
- 4 Risk Treatment Plan
- 5 Risk Controlling
- 6 Communication
- 7 Monitoring.

This is a very similar approach what Deming's traditional Plan-Do-Check-Act -Cycle in the Quality Management offers.

According to AIRMIC, ERM frameworks share four key elements: the development of a risk aware culture, commitment to the mission and objectives, adequate capabilities and a culture of learning and development that underpins decision making and knowledge management in the organisations (AIRMIC 2008, 13).

3.2 ERM and maturity models

When considering certain standards and evaluation how the organisation meets their requirements, there is often quite a straightforward evaluation method: the organisation either meets the requirements or do not fulfil the qualifications of the standard. On the other hand, there seems to be challenges to provide tools of other kind for evaluating the level of certain organisational processes and determine how capable companies are to conduct them. This is also very true when speaking about ERM process.

Carnegie Mellon University Software Engineering Institute released the genuine maturity models in 1991 and 2000 where CMMI was also designed to support the future integration of other

disciplines (SEI, 2009). Also various ERM Maturity Models have been developed for measuring the progress of ERM implementations in the organisations (Shenkir & Walker 2007, 24). Present ERM risk maturity models are developed by major organisations providing risk management consulting and advisory services. The adaption models seem mostly based on the 5 step project management models of CMM and CMMI.

In page 17, Figure 3, the general ERM Maturity Continuum, which is referring to the evolution of risk management itself was described: step-by-step from penalty avoidance and silo - thinking risk management to the value creating opportunity management. At a higher level, maturity models seem to be easier and more descriptive way to demonstrate the organisational capabilities reaching certain assurance for particular internal processes than compliance-based methods like standards. However, there are also challenges in using maturity models. According to our own experiences, e.g. below mentioned RIMS maturity model and its respective maturity measuring tool was rather complicated - and partly even inconsistent - to use in terms of trying to perceive questions describing the differences between the maturity levels.

Into Table 2 have been collected three ERM maturity models and brief description of their key content.

Maturity Model	Key content	Maturity steps/levels
Deloitte Maturity Model/Deloitte & Touche Oy/2006	5-step approach with target attributes from "ad-hoc/ chaotic, individual ori- ented" to "risk intelligent, strategic planning embedded risk management"	1:Tribal/Heroic 2: Specialist Silos 3:Top Down 4: Systematic 5: Risk Intelligent
PwC. ERM meth- odology. 2001- 2004	6-step approach with target attributes from "No planned actions in the area" to "Component is accurately defined, documented, communicated and aligned with ongoing management practices."	0: No actions/not identified the need 1: Aware 2: Developing 3: Practising 4: Optimising 5: Leading
RIMS Risk Maturity Model (RMM) for Enterprise Risk Management / The Risk and Insurance Management Society, Inc. (RIMS)/2006	5-step ERM-based approach with diminishing maturity from level 5 to level 1 described with target attributes from of "Adoption of ERM-based approach" to "Business resiliency and sustainability"	5: Leadership Level 4: Managed Level 3: Repeatable Level 2: Initial Level 1: Ad hoc Nonexistent

Table 2: Three ERM Maturity Models.

Maturity is also an important matter from the risk and opportunity management perspective. In addition, to make any important decision, opportunities should also be assessed to determine if the opportunity really is favourable in a new program/project, because mature processes present fewer risks and more opportunities to a program (Jabagchourian & Cvetko 2002, 2).

3.3 ERM literature

A complete review of the literature should cover all relevant literature on the topic without being confined to one research methodology, one set of journals or one geographic region (Webster & Watson 2002 p. xv-xvi). Keeping this point of view in mind, the literature review presented in this chapter aims to cover reasonable amount of information concerning ERM literature regarding especially the upside of the risk. To achieve this aim, the following process was employed to determine the source material for the review.

First, approximately hundred business and security management journals related to ERM were reviewed through the aid of meta-searches of digital databases (e.g. EBSCO, Elsevier Science Direct, Emerald Journal, ABI/Inform). An article: "Who Reads What Most Often? A survey of "Enterprise Risk Management Literature Read by Risk Executives" (Fraser et al. 2008) helped to get more focused literature analysis allocation. This article provided, in addition to valuable general information about ERM, also the results of an academic study on the most important risk literature read by executives working in the area of ERM including surveys, academic studies, practitioner articles, books and research reports, a total of eighty-eight readings (Fraser et. al., 2008, 73 and 79-83).

In addition, the content of approx. twenty risk management studies or electronic books were reviewed including research studies wrote both by the scholars and risk management practitioners. In this process, following sixteen writings concerning the opportunity/upside – viewpoint of ERM were chosen and are introduced next in Table 3. This table summarizes in which way the opportunity side has been considered in ERM studies. The "Basis of Findings" column indicates whether the findings of the study are based on informal observations, case studies, survey or practical experiences or argumentations. In the same column "A" and "P" refer to an academic or practitioner oriented study respectively. In the column "Empirical context" has characterised the real-life connection of the study as they are explicitly or implicitly stated in the studies. Conceptual analysis as method in this context means an approach the content analysis, where implicit or explicit concepts are chosen, examined and analysed (IAR 2010) and risk management related approaches are studied.

When discovering the most valuable literature for this review, the practical implementations of successful ERM process from strategic and operational risks viewpoints and respective opportunity management perspective were emphasised. Case studies were preferred to find practical solutions for the development of the future ERM process of Itella.

Study	Key find- ings/propositions	Basis of Findings/ Academic/ Practical	Empirical context
Abrams et al. 2007. Optimized enterprise risk management. IBM Systems Journal.	- ERM should be Integrated, Comprehensive and Strategic - ERM Framework could be embedded to five layers - Optimising the business processes by collecting information from internal and external sources is an important part of ERM	Conceptual Analysis/A	IBM ERM Framework - in-house study for the risk management
AIRMEC 2008. Research into the Benefits of Enterprise Risk Management	- ERM improves decision making and reduces risk exposure - Organisation had to develop risk aware culture for maximum success of ERM - Usage of risk management as a thinking process - Risk management should be embedded within core processes and needs the coordinated efforts of several individuals - Greater emphasis on taking opportunities (upside risk) is needed - Successful ERM programme needs to be integrated and aligned with the management activities and procedures to add value and information for decision-making.	Case study/P	Five organisations and their ERM implementations: DLA Piper International; BT Group; Nestlé; Solvay and unnamed UK Government Agency
Baker, N. 2008. Real- world ERM. Internal Auditor.	- ERM may be hard to implement - be pragmatic and ad- vance step-by-step preferring existing managerial practises	Practical Experience/P	Mostly financial indus- try

T -	and processes and	1	
Barton et al. 2001. Managing Risk: An Enterprise-wide Approach. Financial Executive. nn dd fi fi a Barton et al. 2001. Managing Risk: An Enterprise-wide Approach. Financial Executive. nn dd fi	and processes and develop an approach that business people can understand communicate the value of ERM in simple and concrete manner with the common language – drop the acronyms if necessary – not all are interested in Explain to people ERM does not work in solation in the organisation and make cop 10 risk list of enablers/blockers of ctrategy Make people aware about risks whenever they make business decisions as embedded into remuneration system and get the sponsor for this from the top management – not to be cisk free environment Risk management is not just about finance, insurance or disasters. It's about tunning the business effectively and understanding, the fundamental risks fracing the business effectively and understanding, the fundamental risks fracing the business effectively and understanding, the fundamental risks fracing the business effectively and understanding, the fundamental risks fracing the business effectively and understanding, the fundamental risks fracing the business effectively and understanding, the fundamental risks fracing the business effectively and understanding, the fundamental risks fracing the business effectively and understanding, the fundamental risks fracing the business effectively and understanding, the fundamental risks fracing the business effectively and understanding, the fundamental risks fracing the business effectively and understanding, the fundamental risks fracing the business effectively and understanding, the fundamental risks fracing the business effectively and understanding, the fundamental risks fracing the business effectively and understanding, the fundamental risks fracing the business effectively and understanding, the fundamental risks fracing the business effectively and understanding the fundamental risks fracing the business effectively and understanding the fundamental risks fracing the fundamental	Case study/ A	Banking industry, Multi-industrial Com- pany, Software Indus- try, Agricultural indus- try, Oil Industry

	magnitude and likeli- hood, 3. Measure risks by their impor- tance for business		
Beasley et al. 2007. Strategic risk management: Creating and Protecting Value. Strategic Finance	decisions - Integrating risks management to strategy planning enables seize also business opportunities - Strategic risks can arise from both internal and external events and executives should consider strategic respond to events out of their direct control - Finding a systematic way of evaluating strategic risks - Return driven strategy is composed of 11 core tenets and three foundations where risk should be avoided and opportunities seized - Risk management goals could be the same as strategic goals and aligned with the shareholder value focusing to upside of the risk - Risk events and scenarios should be done top-down with holistic portfolio approach - Strategic risk management scorecard system can help in reporting of key changes - When RM is integrated to strategic planning process e.g. in M&A cases the right balance between risks and opportunities can be found	Conceptual Analysis/A	Some practical examples of organisations succeeded in a case of strategic risks occurring
Bekefi et al., 2009. Creating growth from effective opportunity risk management.	- Opportunities could be found within and beyond the organisa- tion	Conceptual Analysis and Case study/A	Some practical examples of organisations succeeded using opportunity management

CNAA Maria araa a	Faculty of the 11		In an investment
CMA Management.	- Focusing downside		in an innovative way
	risk can overlook		
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	opportunities first		
	- First determine risk		
	appetite and then		
	assess the risks and		
	opportunities that		
	have been identified		
	and decide how to		
	capitalize opportuni-		
	ties and mitigate the		
	risks.		
	- List relevant		
	sources of opportu-		
	nity		
	- Use proactively		
	strategies and tech-		
	niques for identify-		
	ing, managing and		
	evaluating opportuni- ties		
	- Monitor innovations		
	and calculate e.g.		
	their ROI with finan-		
	cial professionals		
Clarke C. et al. 1999.	- RM has become	Conceptual Analysis/A	Several practical ex-
Strategic Risk	critical and key stra-	Conceptual Analysis/ A	amples of organisa-
Management: the New	tegic issue, but is		tions succeeded and
Competitive Edge.	treated tactically		failed with their stra-
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	operations as outputs		
	- Competitive advan-		
	tage comes from		
	superior capabilities:		
	risk processes, cul-		
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	training and organi-		
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	- Risk management		
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	cial and insurable		
	risks, relying only on		
	published data,		
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zon Scanning and Fu-	futures in which the		working
ture Thinking. Futura	concepts of risk and		
4/2008.	future have many		
	similarities, like op-		
	portunities and		
	threats		
	- Likewise these risks		
	and future events		
	may happen in cer-		
	tain probability so		
	they consist also		
	characters such as		
	likelihood, uncer-		
	tainty and vulnerabil-		
	ity		
	- Global foresight		
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	pation of risks have a		
	common goals and		
	effectively used may		
	offer competitive		
	edge also to organi-		
	sations		
	- The interpretation		
	of "weak signals",		
	"wilds cards" and		
	"black swans" may		
	be useful when pre-		
	dicting future sce-		
	nario as well as pos-		
	sible threats, which		
	with some probability		
Kararadu D. 2007	can come true	Drastical	Commence of officialise
Kennedy, P. 2007.	- Initiation and sus-	Practical	Summary of effective
Strategy and Leader-	taining of ERM must	Experience/P	ERM practices experi-
ship.	be top-down, with		enced by the top
	senior leadership as		management in sev-
	risk champion and sponsors		eral companies
	- Business units must		
	own the ERM process and be responsible		
	for remediation but		
	the process must be		
	enterprise-wide		
	- There is tendency		
	to rely too much on		
	quantifiable risk and		
	some risks can only		
	be qualitatively un-		
	derstood.		
	- Scenario analysis is		
	a useful tool for		
	thinking through		
	exceptional events or		
	those that cannot be		
	predicted through		
	traditional forecast-		
	ing techniques, e.g.		
1	I mig toomingues, e.g.	İ	i e e e e e e e e e e e e e e e e e e e

	scanning unfamiliar future business environment containing both hidden opportunities as well as risks - ERM is strategic issue and should be integrated into corporate strategy since surveys have repeatedly recognized that the greatest threat to firms fall in the domain of strategy and operations. As one participant put it, "Tailoring risk to appetite/tolerance really gets at the heart of strategic thinking and strategic priorities."		
Paladino, B. 2008. Strategically managing risks in today's perilous markets. Strategic Finance	- ERM advantage from tight linkage to organisation's strat- egy-setting - ERM can be success- fully managed with process approach - Continuous im- provement perspec- tive can lead to sig- nificant adoption of ERM best practises cross the organisa- tion - Best practises for making it happen: 1. Exploit the natural links of ERM and strategy planning, 2. Unify ERM across the multiple practice areas by using a common process. 3. ERM is strategic issue - be prepared to stay the course	Conceptual Analysis and Case study/P	An accurate case study description of successfully integrated strategic planning and ERM
Sanchez et al. 2008. Risk management applied to projects, programs, and portfo- lios. International Journal of Managing Projects in Business	Opportunity management aspect applied to projects, programs and portfolio (PPP) are relatively new aspect - PPP's have dedicated risk management guides and procedures, but also generic RM frame-	Literature review	Some references how to perform risk man- agement practises effectively in pro- jects, programs and project portfolios inside an organization with the aim of find- ing areas of business opportunity

	works approaches		
	may be applied		
	- The larger scale		
	approach (P=>P=>P)		
	the more strategic		
	concerns are in-		
	cluded and strategic		
	goals implemented in		
	action		
	- "Approach by con-		
	sequences" - event's		
	impact is more im-		
	portant that prob-		
	ability - was born in		
	civil engineering		
	domain		
PRMIA, 2008. PRMIA	- The goal of ERM is	Quantitative Survey/P	International risk
Enterprise Risk Man-	mostly best practises		management profes-
agement (ERM): A	(71%)		sionals' opinions about
Status Check on	- Current ERM efforts		ERM best practises
Global Best Practices	were split nearly		condensed to struc-
(n=1776)	50:50 between op-		
(11-1770)	·		tural form - multiple
	erational and finan-		industries and public
	cial risk manage-		sector participated
	ment, yet business		
	strategy risks were		
	identified as key ERM		
	risk and 58% of re-		
	spondents think ERM		
	is a strategically		
	critical function		
	- As a ERM implemen-		
	tation tools overall,		
	blended solutions		
	from spreadsheets to		
	web-based solution		
	were preferred by		
	almost half of re-		
	spondents		
	- Training and		
	awareness, top down		
	interest and en-		
	forcement were seen		
	as the most critical		
	factors for a success-		
	ful ERM program.		
	- The importance to		
	have a close interac-		
	tion and collabora-		
	tion between Group		
	Risk Management &		
	Business Line Man-		
	agement where con-		
DIAGO COCO 5 :	sidered high (92%)		
PWC, 2008. Enter-	- ERM implementa-	Quantitative Survey/P	Finnish risk manage-
prise Risk Manage-	tion has increased		ment professional
ment (ERM) - Bench-	considerable, almost		opinions about ERM
marking Survey 2008	70 % of companies		best practises con-
(n=26)	have ERM process		densed to structural

	I		
	and function in place		form - only few par-
	- The most important		ticipated
	motivations for ERM		
	are good business		
	practise, corporate		
	governance regula-		
	tions and competitive		
	advantage; strategic		
	perspective were not		
	mentioned		
	- In scale 1-5, ERM		
	adopted companies		
	considered: ERM pro-		
	gram helped organi-		
	sation be more suc-		
	cessful (4.15); ERM		
	was fully integrated		
	with strategic busi-		
	ness planning and		
	decisions (3.80); ERM		
	responsible persons		
	were involved in		
	preparing strategic		
	decisions		
Slywotzky AJ.& Drzik,	- Even advanced ERM	Conceptual Analysis/P	Comprehensive de-
J. 2005. Countering	practitioners should	Conceptual Allarysis/1	scription of the impor-
the biggest risk of all.	concentrate on the		tance in managing
Harvard Business Re-	scenario basis more		
			strategic risks with
view.	to strategic risks as		several examples of
	they may destroy the		real-life case studies.
	company		
	- Mitigating risks in		
	early stage and limit-		
	ing the downside risk		
	put companies to		
	stronger competitive		
	position and make it		
	risk shaper to pursue		
	new growth - finding		
	opportunities		
	- Strategic risks can		
	be categorised into		
	seven classes: indus-		
	try, technology,		
	brand, competitor,		
	customer, project		
	and stagnation		
	- Limit your strategic		
	risks by: indentifying		
	and assessing, quan-		
	tifying, developing		
	mitigation action		
	plan, indentifying		
	possible upside and		
	adjust respective		
	capital decisions		
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Table 3: Summary of the literature review.

Abrams et al. (2007) present the ERM framework designed by IBM Research to manage risk and compliance issues in integrated, comprehensive and strategic manner. Integrated means that ERM should cover all lines of businesses, comprehensive that ERM should manage all types of risks and strategic in turn and that ERM must be aligned with the company's business strategy.

They describe ERM continuum as the three-stage journey, which illustrates the ERM maturity levels in general: "comply", "improve" and "transform" according to the risk appetite of the organisation. In the comply stage, businesses have evolved their response to risk merely avoiding penalties. In the later stages, the organisation improves its business by optimising and sustaining the RM process and finally achieves a state of continuous risk-based structural alteration where the organisation is able to gain competitive advantage.

They also suggest embedding ERM framework into five layers, which are interaction with each other: jurisdiction, strategy, deployment, operation and events. With the help of the different technological and administrational processes and data flows between the layers, organisations internal and external risk events may be handled in an adequate manner. They propose businesses making ERM more feasible and consistent by optimising their operations and eliminating duplicate business functions. For the success in this , they advice to proceed according to following seven tactical steps in implementing an ERM strategy and the necessary governance: gaining executive sponsorship, assessing the current state, developing an ERM vision, developing capabilities, planning implementation and monitoring and governance. For Optimising the business processes by the means of collecting information from internal and external sources is an important part of ERM - also in inter-organizational ecosystems such supply chains.

Abrams et al. describe an interesting construction of ERM maturity continuum with the layered model for handling risk events in the whole business environment by optimising business processes based on the risk strategy and appetite of the organisation. The latter concept seems to be optimised in the organisations that are concerned with the information flows and technological processes, such as IBM. However, the may be useful for other type of organisations as well. From opportunity management perspective, this article has many aspects, which could be used. The description of the layered ERM framework with the respective interconnections and "risk tasks" are at the same time theory centric but also practical enough for conceptualizing optimised ERM processes. In addition, the idea of using different sensors as specific components for noticing risk events – even though the concept has been used for a long time in information security area - could be the valuable way of collecting data from operational risks threatening the main production processes.

AIRMEC (2008), the UK based risk management organisation, produced a case study "Research into the Benefits of Enterprise Risk Management" with the help of Norwegian risk management company DNV. Five case study companies were participating in this research: DLA Piper International, BT Group, Nestlé, Solvay and one unnamed UK Government Agency. According to study the key findings from the ERM best practise and opportunity management perspectives were listed as follows:

- ERM is improving the decision making and a reduction in risk exposure
- In order to successfully launch an ERM initiative, the organisation needs to adopt a
 suitable risk management framework and the most common approach is to use an established framework by adapting it to the specific needs of the organisation.
- For maximum success, each organisation has to develop a sustainable risk aware culture which components are suitable for the organization. However, risk management policies and procedures are always required.
- To ensure the success in ERM, organisation has to develop an approach that is suitable
 for the organization, aligned, comprehensive, embedded and dynamic enough where
 often the efforts and coordination of several individuals are needed.
- Case study organisations need to identify the benefits that they are seeking to achieve and set the objectives of the ERM process, which leads to reporting responsibility to the Board and respective support from it.
- The successful ERM program also needs to be integrated into and aligned with the management activities and procedures as well as core processes, so that it adds a level of sophistication to the business processes and information for the decision making cycle. Using the risk management process more as a thinking process will benefit organisations.
- Greater emphasis on taking opportunities (upside risk) is needed in the risk management process to capitalise on opportunities. This identification of opportunities, in turn, is largely a result of creative thinking.

This study gives a good insight of the ERM initiatives and how the participated organisations have benefited during the process. In addition, all of the case study organisations have emphasised that opportunity perspective of risks and organisational efficiency in general are one of their main goals in the ERM activities.

Baker (2008) emphasis that ERM may be the challenging concept to implement due to the involvement of different kinds of people in finding common language among risk and business management. According to him, three kinds of challenges may occur regarding to communication. Talking about the value of ERM in plain and concrete terms in order to get managers to

buy the ERM process is important. In addition, creating a commonly understood risk language to harmonise a single risk management approach and understanding the need for visible top-level support for ERM is important. On the other hand, for succeeding, ERM needs people from different areas of the organisation to participate in the process.

Baker advises organisations to be pragmatic and develop an approach that business people can understand by using simple and concrete common language to risk management and drop the ERM acronyms when possible - in other words, make it real. According to him, ERM must be embedded to be part of the daily job of everybody in the company. Also risk ownership must be particularly nominated to someone's responsible in the top management level. The risk awareness training, as well as ERM to be embedded in the existing management and business decisions systems with the respective remuneration procedures will enhance the ERM process. He also emphasises to prioritising the top 10 risks, which are blocking or enabling the organisation to achieve its strategic goals, and concentrate on them. The ideas represented in Baker's editorial text collected from the interviews of numerous ERM experts - especially internal auditors - are not very new within ERM literature. However, these suggestions from real-life cases give some concrete and practical advice, which are good to keep in mind while further developing one's ERM process.

Barton et al. (2001) emphasise that companies can create, protect and enhance their value by managing enterprise-wide risks – not just to create risk free environment as business opportunities should be actively sought. In addition, they emphasise not only to concentrate finance, insurance or disasters in risk management, merely to focus running the business effectively and understanding the fundamental risks facing the business. Barton et al. also warn of taking an implied approach to risk management as it may cause some big surprises to companies unaware of the explicit risks. Portfolios thinking for risks are then needed too to uncover hidden upside from risks.

They suggest every organisation to plan their own ERM procedures since one-side-fits-all ERM does not exist and to get the senior management's sponsorship for the process. Furthermore, they advise organisations to identify risks with a variety of risk tools corporate-wide, rank risks based on their magnitude and likelihood and measure risks by their importance for the business decisions. To this belongs also the organisation definition the amount of risk they tolerate, i.e. risk appetite. Using suitable tools for different risks are recommended: sophisticated and relevant tools for measurement of financial risks and development of applicable tools for non-financial risks. The presently discussed article provides some valuable insights into the ERM process building experienced by five North American corporations. The building blocks of ERM are described in a compact manner and in spite of the variety in business environments between Europe and North America, among suggested aspects are highly applicable examples to consider regarding to opportunity management in ERM process.

Beasley et al. (2007) present that integrating risks management to strategic planning enables seize business opportunities as well. They emphasise executives to consider strategic respond to events out of their direct management control since strategic matters may arise from both internal and external sources. This is why finding a systematic way of evaluating strategic risks is important. They also propose a "return driven strategy" for the managing the strategic risks. It is divided into 11 core tenets and three foundations where risk should be avoided and opportunities seized. According to them, risk management goals could be attached with the strategic goals and aligned with the shareholder value in order to focus on the opportunity side of the risks. Furthermore Beasley et al. emphasise that risk events and scenarios should be managed with the top-down procedure in order to get holistic portfolio view for strategic planning.

They suggest that strategic risk management has to be the ongoing process and with the help of the management scorecard system e.g. reporting key changes in the business environment is more effective. Finally, they note that when RM is integrated into the strategic planning process e.g. in M&A cases, the right balance between risks and opportunities may be considered: straight linkage between risks and strategy should be an integral part of the strategy setting process of an organisation. Beasley et al. give good aspects to the strategic risk management and most of the presented aspects in their article are straightforward proposals for advancing the business opportunities in the ERM process and thus applicable to this study.

Bekefi et al. (2009) argues that focusing only on the downside of risk, companies can miss opportunities that provide significant possibilities for organizational innovation and new competitive advantage. For this reason they advice companies to identify business opportunities both within and outside of the organisation and give examples to this by changing the viewpoint and seeking economic possibilities from the whole broad business environment. They also advice organisations first to determine their risk appetite and then to assess the risks and opportunities, which have been identified. After that organisations can decide their response to capitalize found opportunities and identify countermeasures to mitigate the risks.

Bekefi et al. also stress that essential in opportunity management are financial professionals who help to create ways to measure and achieve key performance indicators for ERM process. They present exact, step-by-step description of Risk and Opportunity Management process for identifying, managing and evaluating the opportunity. For the identification of opportunities, they have found eight ways to proceed: learning from the past experiences, maintaining customer sensitivity, learning from others, scanning the whole business environment, doing the scenario planning, identifying the market gaps and change the game plan, idealising design and competing in advance in order to allow potential breakthrough ideas and by maintaining market sensitivity to change and move quickly to adapt and hold a key to innovations. For

managing opportunities they advice to improve organisational learning by sharing internal experiences and technical means, using stakeholders and management networks for increased learning of strategic knowledge and insight to risk. When evaluating the capability of upside findings they suggest using ROI measures and other economical methods.

Using their findings in terms of improving the organisations ERM process is very valuable indeed. This study contains great deals of hints of opportunity perspective to add in one's ERM program. Not only the Risk and Opportunity Management process is clearly described, but also sources of opportunities are soundly explained with the help of case company examples.

Clarke & Varma (1999) sees risk as a key strategic issue for business to be competitive while risk is typically treated tactically. The authors argue that an integrated risk management approach (the term of ERM was not yet in use) allows companies to deliver superior performance while proactively managing risks. The article outlines a structured methodology for risk management process evaluation and change. Clarke and Varma argues that the risk management is the strategic business process were the opportunities and threats come from the company environment as inputs and produce the outputs e.g. as business profits and avoided destructions, contingency plans and agile operations. They stress organisations competitive advantage coming from superior capabilities in certain areas of company like culture; incentives, training and organisation where the risks management competencies are also included. Clarke and Varma warn that failures in the risk management may happen if the process is focusing only financial and insurable risks and respectively relying only on published data, downside risks and fragmented risk management in inadequate part of the organisation.

The authors emphasise that to reach RM Excellence, a company needs to make a step-by-step journey where the maturity of its risk management may be described as follows: the entrepreneur with ad-hoc approach, the bureaucracy with the risk avoidance attitude and the process management as improved but still not value-based oriented. Finally, the strategic risk management is integrated with shareholder value management and the company exhibits a healthy risk management culture aimed at building the value of the company. The authors present significant contribution to developing organisations strategic risk management. This article is based on case study experiences of fifty international companies, both financial and industrial and shows many conceptual and practical findings for both in graphical and written form. Especially risk management knowledge visualised in compact but rich form is very useful.

FERMA's (2008) risk management benchmarking survey describes itself as a "key to understanding the diversity of risk management practices in Europe", which is the reason for this paper was picked up to this literature review. The survey consists of 30 questions based of

FERMA standard, received 555 replies from more than 16 countries, including 20 organisations from Finland. Eighty-one percent of the replies came from risk or insurance managers. This survey describes the disparity of ERM practices and maturity among the European organisations, which can be noticed by the characterization of the participants in the axes of risk management process maturity and level of compliance.

These "five families" are called: compliance oriented "Rules-driven" with the high RM maturity (39%); "Balanced and sophisticated" with less compliance attitude (26%) and balanced with their shareholders' interest in performance with compliance objectives; "Fire fighters (18%) who are mainly driven by compliance and reaction to adverse events; "Self-motivated", mostly privately owned, mid-sized companies in commerce (9%) which are responding more to shareholders than regulatory drivers and finally so called "Happy-go-lucky" (8%) organisations - smaller companies with rather unsophisticated procedures, not encountered the need for a risk management investment earlier in their development. Surprisingly 60% of them have a stock exchange listing.

The most interesting finding from opportunity management perspective is that there are early signs of bringing risk management and strategy together: around half (52%) of the organisations link risk analysis with strategic planning. Also moving towards more precise risk quantification according to risk types measured is noticeable: a half does it on a global corporate level, half for certain categories of risk and 15% for certain activities or geographical areas. Almost a one-quarter use sophisticated techniques, such as value at risk or scenario simulation models, whereas financial institutions use of the widest number and types of tools.

According to FERMA the traditional dichotomy of risk versus performance management is being overcome as risk and performance are increasingly seen as two sides of the same coin, as they should together resolve management problems and lead to continuous improvement. This survey provides great deals of general information on European risk management practises. In order to benchmark the risk management best practises in the Finnish context, it indeed is essential to get a wider perspective on international risk management practises as well. However, its applicability in this study is quite a limited since it does not give much detailed information about the subject.

Frigo (2008) describes the connection of strategic business plans and ERM. This text contain three approaches to connect a company's strategy to its risk management efforts effectively:. a strategic risk management process, a process to identify and protect assets and strategic risk monitoring and performance measurement. He presents that strategic risk management includes the estimation of how well business strategy will perform under different scenarios and risks events. Risk scenarios may lead to significant loss of shareholder value and at the

same time provide opportunities for growth. Frigo argues that high-performance companies are agile to forces of change, and they manage risks and opportunities better than other companies.

Frigo illustrates a Strategic Risk Assessment Process where "genuine asset" is the key concept, i.e. the tangible and intangible resources, capabilities, and traits that make an organization and its offerings unique and may not even exist on the balance sheet. He ex-presses them to be the "building blocks" of strategy and form the solid foundation for creating competitive advantage. He stresses that genuine assets should be treated very specifically; including how difficult it would be for another company to develop a similar asset. To help identify and manage risks of Genuine Assets, Frigo advice to ask the following questions: what are the most valuable and unique capabilities and resources of the company, what scenarios and events could put the most valuable Genuine Assets at risk and what countermeasures can be developed to protect these assets?

He suggests that effectiveness of strategic risk management should be monitored and Key Risk Indicators and the Balanced Scorecard could be used as metrics for continuous monitoring of risk. In addition, organization's key risk indicators and metrics should be linked to the potential impact of risk on shareholder value. Dedicated risk dashboards could also provide a way to monitor key metrics and trends. The author emphasises that the connection of strategy and ERM is critical for every company to create and protect shareholder value and corporate assets and the process should be continuous. He also advices to consider both the upside and the downside of the risk. In addition, ERM procedures should be embedded in strategic plans and budgets, execution plans as well as performance measures.

The author provides an interesting point of view with the concept of Genuine Asset and respective questions how to recognise them in the organisation. Also the Key Risk Indicator and use of Balance Scorecard procedure in monitoring of the effectiveness of ERM process are valuable. However, there are not much examples of practical implementations for risk monitoring.

Heinonen (2008) highlights that different foresight methods help to predict alternative futures in which the concepts of risk and future have many similarities, like opportunities and threats. Likewise these risks and future events may happen in certain probability so they as well consist of characters such as likelihood, uncertainty and vulnerability. Also magnitude is prevalent conception in the research field. Heinonen emphasises that global foresight methods and anticipation of risks have common goals and when effectively used they may offer as well competitive edge to the organisations. Risks then may also be seen, depending on their context and timing, as opportunities,

The author adds that the interpretation of "weak signals", "wild cards" and "black swans" may be useful when predicting future scenarios, which method is very useful in scenario working in the companies. Weak signals are already existing "odds" which may predict the reinforcing signals of some phenomenon in the future, whereas wild cards and black swans are rarely happening episodes - positive or negative - which may cause profound challenges to their surrounding environment and thus are methods of exploring possible irregularities. The organisation does not collapse because of the probability of some bad event, rather to its significance and impact to the organisation. According to Heinonen, the cause of the complexity of the present society is the networked action model with its operational and technological interdependencies, which may cause more vulnerabilities as a result of difficulties for managing the whole ecosystem.

The author presents risk assessment theory by which risks should be evaluated from different perspectives according to their quantitative or qualitative characteristics. The qualitative risk analysis completes by its subjective means the blind spots of quantitative analysis and thus creates "risk intelligence" with the help of its layered and multidimensional approach. Her theory emphasises the need to accomplish the risk assessment from five different dimensions: Target, Field, Dynamic, Size & Visibility and Impact Dimensions with the help of six tools: imagining, identification, assessment, interpretation, understanding as well as managing and governance of the risks.

Heinonen suggests foresight methods to be used in scenario working at the companies. This indeed is one of best practices to embed risk aspect to strategic working in the board level. To create "alternative futures" base on possible scenario pipelines may help the organisations agile to move their strategic course according to major changes in the business environment.

Kennedy (2007) presents following insights from top management's perspective based on conference report, where the focus is on "what works when implementing ERM": 1. The initiation and sustaining of ERM must be top-down, with the senior leadership as the risk champion and sponsors. 2. Business units must own the ERM process and are responsible for possible remediation actions, but the process must be enterprise-wide. 3. There is a tendency to rely too much on quantitative risk tools while some risks can only be qualitatively understood. 4. Scenario analysis is a useful tool for thinking through exceptional events or those that cannot be predicted through traditional forecasting techniques, e.g. scanning unfamiliar future business environment containing both hidden opportunities as well as risks 5. ERM is strategic issue and should be integrated into corporate strategy since surveys have frequently recognized that the greatest threat to firms fall is the domain of strategy and operations.

In Kennedy's list of ERM essentials are mostly the same matters what have already been handled in other ERM literature. However, collected as top managements' opinions in the conference board session, they add value as managerial concerns thus reinforcing the significance of the top-down procedure in the ERM process.

Paladino (2008) represents in his case study, as best practise ERM procedures, one company in the electric distribution industry, which scored the highest point on an ERM survey. This process-based company employs a continuous strategic planning process to achieve strategic objectives where "A defined, a repeatable and an integrated governing process provide a basis for continuous improvement, shared knowledge, teamwork, and efficient use of executive time." These objectives are organised into four perspectives: financial, customer, operational, and capability. Projects to achieve these objectives are also defined through the strategic planning process, which includes risk identification and analysis. Annual goals are captured with a corporate balanced scorecard and they are used at the divisional level as well, providing alignment across the organisation.

According to the article, the company also integrates ERM with the strategic planning, process improvement, and project management, which are considered as core practice areas. They leverage process improvement and project management with the risk management tools thus increasing the predictability of results. This has effects in an integrated strategic planning and risk management process. The article states that risks can be either negative or positive, threats or opportunities where an opportunity not pursued can also be a risk.

Case company's "Strategic Process-Based Management" includes also process called "Integrated Strategic Planning and Risk Management Process" where "Manage Risks" is one of the nine top-level business processes as an indicator of the value the company places on ERM. According to article, they are looking at the risks from a process perspective offers advantages over a strict functional view. Already addressed risks within a functional boundary may be transferred to another part of the organization where similar risks are not managed yet, which raises corporate-wide risk awareness. Company's end-to-end perspective of the risk process is holistic and allows more effective ERM where the respective steps are:

- 1 Establish Risk Framework
- 2 Identify Risk Events
- 3 Assess Risk
- 4 Plan Risk Response Strategy
- 5 Monitor and Control Risk.

Fundamental to this process is the concept that every manager also is a risk manager includ-

ing expertise in the risk assessment, alignment for resourcing the monitoring and protection of assets and "well-managing the risk" to provide reasonable assurance to meet one's objectives in a particular sphere of responsibility.

According to Paladano the company proceed the annual ERA survey (Enterprise Risk Assessment), used by the company's executives to reset the risk response strategies for the next year, to expose he strategic risks that the leadership has identified by asking managers to assess probability, risk, and preparedness of the enterprise risks. The participants also have an opportunity to identify risks that they believe senior leadership may have missed. From the risk awareness and communication perspective, the company has several kinds of training sessions for enhancing the risk knowledge transferring across the organization enabling to build risk literacy. The company also has an ongoing ERM measurement including monetised results of the cumulative value of threats reduced as well as overall ROI of project portfolio.

This article provides great deals of information for the best practises of ERM. The ERM process has tightly been embedded in the management systems of this case company. Even though this US based organisation is doing business within different markets and business, it still is process-oriented organisation like Itella is. This high maturity ERM process as well as respective process associated to opportunity management, including steps accurately described and well documented, contribute significantly the aim of this study a great deal as a good benchmarking case.

PRMIA (2008) presents a comprehensive survey of ERM: "A Status Check on Global Best Practices", which was conducted among over 1,000 PRMIA members. PRMIA - the Professional Risk Managers' International Association- is a worldwide organization with more than 49,000 members in over 180 countries. In total, 1776 members participated in this survey: 893 risk practitioners, 459 consultants and/or vendors working in ERM, 75 regulators responsible for ERM, and 349 members in other professional roles with an interest in and views on this topic. Nearly a half of the survey participants represented organizations which are among the largest in their country and are globally spread in 103 different countries; 47% of them are EMEA (Europe/Middle East/Africa) based organisations.

Overall, 90% of the respondents said that ERM is very much a part of their current or future business process, but only 41% of them said that their organization has a well-defined ERM program. There are also some interesting results which reinforce earlier presented findings of ERM best practises and implicitly the opportunity management side of ERM. Thus, according to PRMIA, the main goal of ERM is mostly in best practises (71%) and 58% of the respondents thought ERM is a strategically critical function, creating competitive advantage. In addition, the participant considered business strategy risks as a key ERM element thus receiving a

43 (105)

"most important" rating from 29% of the respondents.

As an ERM implementation tools overall, blended solutions from spreadsheets to web-based solution were preferred by almost half of the respondents. Training and awareness, top down interest and enforcement were seen as the most critical factors for a successful ERM program. Also the importance to have a close interaction and collaboration between Group Risk Management & Business Line Management were considered high (92%) among the respondents. The results of this survey can be weighted from the best practise viewpoint since the respondents are so many in numbers and they represent geographically and professionally quite a heterogeneous population. Many of these findings may then be considered the level where the ERM best practises in the moment of the survey existed. So, when seeking an example of the best practise perspective for the ERM, also in the Finnish business milieu, information gathered from this survey may be considered rather reliable. On the other hand, with the help of this survey was not easy to summarise what explicitly should be considered as ERM best practises to aim for.

Surprisingly, some of the questions - and respective answers - were quite obviousness and predictable. On the other hand, the results reinforce the earlier findings about ERM: the best practise is the state what many organisations are seeking and step-by-step they are considering the more strategic view for the risk management. In other words, risk management is considered more strategic matter than earlier, even though the opportunity or upside of ERM were not mentioned explicitly in this study.

PriceWatehouseCoopers Oy (2008) presents a survey of ERM practises among 26 Finnish ERM companies. Initially 43 of the 60 largest companies in Finland were invited - excluding financial institutions and insurance companies. The main goals of the survey were to identify:

- 1 Current focus areas in corporate risk management
- 2 Current and planned risk management related functions
- 3 Current and planned risk management processes at the enterprise level
- 4 The practical next steps to advance ERM within organizations.

The main findings of this survey could be condensed in four aspects: 1. ERM implementations have increased considerable in Finland, 2. The most important motivations for ERM are good business practise, corporate governance regulations and competitive advantage. However, ERM still mostly is not aligned with strategic and operational business decisions. 3. Risk aspect is integrated into strategic planning though risk information is still not commonly used in defining return on capital targets or strategy follow-up, 4. Risk identification and assessment are generally on the good level, but monitoring needs improvement.

This survey shows that the maturity of ERM in Finland is approximately 3.1 in the PwC scale and the difference between companies that have and have not adopted ERM are 0.5 units higher for the benefit of ERM adopted organizations. This indicates that companies benefit implementing ERM. However, the small sample size of this survey lowers the reliability of the findings. On the other hand, the results support the findings gathered by interviewing the three risk management professionals in the Finnish companies, see section 5.1. In addition, there were particular survey answers given by ERM adopted companies, which were at the same time expected but still surprising. Thus, in scale (1-5), companies considered that ERM program helped organisation to be more successful (4.15); ERM was fully integrated with strategic business planning and decisions (3.80) and ERM responsible people were involved in preparing strategic decisions (3,70). This is rather encouraging from the ERM's strategic alignment perspective. It seems also that companies benefit from ERM process.

Sanchez et al. (2009) explore in this literature review the opportunity possibilities in risk management applied to projects programs and portfolios (PPP). Project risk management seems to be a well-developed domain in comparison to the program and portfolio risk management activities, for which specifically written methodologies are difficult to find. The review also demonstrates the need to include better tools for performing a continuous control and monitoring process. Integrating a vulnerability approach is also necessary in order to consider the PPP characteristics, which mediates between consequences and the exposure to hazards and opportunities.

According to authors, the project risk management has long been seen as cost, time, scope or quality matters, but opportunity management aspect applied to PPP is relatively a new point of view. According to the article, a project is a temporary organization designed to achieve a set of specific change objectives whereas the program is a structure that provides a strategic direction to a project collection in order to obtain a strategic change and an organisational development. The portfolio in turn is a collection of projects or programs and other works grouped together to facilitate effective management of that work to meet.

PPP's have dedicated risk management guides and procedures, but also generic RM frameworks approaches may be applied. They also recognise that depending of the level of implementation (P=>P=>P) the more strategic concerns are included and strategic goals implemented in action. Sanchez et al. identify great deals of literature – e.g. respective standards including risk perspective and particular risk management frameworks outside of PPP- but there are still gaps between a risk management approaches applied at the project level and at the organization level. Respective risk management literature and guides specifically conceived for PPP's are difficult to find.

Authors point out an interesting approach proposed by Petit et al. (2004), which is to give priority to consequences of events rather than their probability of occurrence. This approach, based on the fact that it is very difficult, or maybe impossible, to find all causes which may induce negative consequences, is called "Approche par consésquences" (approach by consequences). It was born in the civil engineering domain in order to evaluate the vulnerability of critical infrastructures. Furthermore, PPP's in the organization or in other entities are interdependent and consequences of events do not affect them separately, but collectively. Still, a generic approach is not a solution to manage risks - each domain has different characteristics and needs specific risk management guides if opportunities are wanted to seize.

Sanchez et al. present a good review of opportunity and risk management in projects, program and portfolios. It is also essential to realise that at each level more or less strategic business decisions will be put in practice - so opportunity and risk management should be paid specific attention to.

According to Slywotzky and Drzik (2005) even the more advanced ERM practitioners seldom consider more than financial, hazard and operational risks, even though strategic risks may cause more value destruction to the enterprise than other risks. They also advice to assess and respond to strategic risks in a correct way, by mitigating them in the early stage. Thus, limiting the downside risk put companies into the stronger competitive position helping them to pursue new growth by finding opportunities. The authors called this kind of attitude as "risk shaper" which gives reader a flavour such companies acting as a doer instead of a passive bystander.

Slywotzky and Drzik categorise strategic risks into seven classes: industry (e.g. margin squeeze in terms of overcapacity), technology (e.g. IPR protection), brand (erosion), competitor (one-of-a-kind competitor), customer (priority shift), project (new project failure) and stagnation (market stagnation) and give examples to overcome these risks. They suggest limiting strategic risks by identifying and assessing, mapping, quantifying, recognising possible upside for each risk, developing mitigation and action plan and finally adjusting respective capital decisions. This article gives a good example of categorising strategic risks, managing them and seeking the business opportunities through them. It also emphasises that an organisation may proactively shape its business environment - not to be risk free, but in terms of finding opportunities - to be more agile to see the upside of the risks in the organisation.

3.4 ERM best practises with opportunity management according to literature

In the previous section various ERM frameworks, maturity models and sixteen ERM related writings were reviewed including of six case studies. The focus in this review was to find the generic and easy to adopt structure for ERM best practises including the opportunity management building blocks for the development of the sound ERM process. This goal in mind, according to previous literature review, six different aspects were found to be taken into consideration when implementing ERM in practise in terms of seeking business opportunities through the ERM process. The most of the existing ERM frameworks and maturity models, as well as other literature reviewed in this study, has wider structure for essential steps to be taken in the ERM path. The suggested procedure then is a maturity model -like generalisation of ERM steps to be taken within to get the most of the opportunity side of risk management process.

According to literature, the ERM Best Practises are condensed into the following Table 4 and are also used as a thematic structure and input information for the empirical part of this study. Within the table, in addition to key findings and information of authors, in the first column has been described both the "ERM essentials" and the "Enhanced ERM with opportunity management" aspects with their sub-areas as a suggestion of chronological and maturity-like steps to follow when trying to reach business opportunities with the help of ERM. The suggested key findings are described in the second column.

ERM Best Practises		
ERM essentials	Key findings/propositions	Authors
Foundations	- Framework and objective set	Abrams et al. 2007
of ERM	- RM policy accepted	AIRMEC. 2008
	- Strategic alignment done and integrated	Kennedy, P. 2007
	and comprehensive view set	Paladino, B. 2008
Commitment of	- Top-management	Abrams et al. 2007
the Organisation	- Business management	AIRMEC. 2008
	- Risk professionals	Baker, N. 2008
	- Organisational maturity and awareness	Barton et al. 2001
		Kennedy, P. 2007
ERM capabilities	- RM knowledge adequate	Abrams et al. 2007
	- Tools and practises suitable	AIRMEC. 2008
	- Skills of use and conduct practises	Baker, N. 2008
		Barton et al. 2001
		Paladino, B. 2008
		Sanchez et al. 2008
Ability to run,	- Covering all risks	Abrams et al. 2007
learn and	- Knowledge sharing	AIRMEC 2008
develop	- Training and risk culture	Baker, N. 2008 Barton
the process	- Measuring and enhancing the process	et al. 2001
		Paladino, B. 2008
		PRMIA, 2008.
		Shenkir & Walker.
		2006

		Slywotzky AJ.& Drzik, J. 2005.
Enhanced ERM with opportunity management	Key findings/propositions	Authors
Identification	- Strategic planning included - Learning from past and interest groups including other organisations and conetworks - Scanning of business environment - Scenario planning	Beasley et al. 2007 Bekefi et al., 2009 Clarke & Varma. 1999 Frigo, M. 2008 Heinonen, S. 2008 Kennedy, 2007 Paladino, B. 2000 Slywotzky AJ. & Drzik, J. 2005.
Management	Risk appetite and capacity set Spurring on innovations and operational excellence Organising adequate infrastructure support the process	Abrams et al. 2007 AIRMEC. 2008 Barton et al. 2001 Bekefi et al., 2009 Clarke & Varma. 1999 Frigo, M. 2008 Paladino, B. 2000 Slywotzky AJ.& Drzik, J. 2005.
Evaluation	- Functional evaluation - Economical evaluation - Internal and organizational measures, e.g. balanced scorecard	Beasley et al. 2007 Bekefi et al., 2009 Clarke & Varma. 1999 Frigo, M. 2008 Slywotzky AJ.& Drzik, J. 2005.
ERM portfolio manage- ment	 Portfolio perspective of managing opportunities and risks Taking care of top priorities - Embedded to business processes and operational excellence 	Bekefi et al., 2009 Paladino, B. 2000 Sanchez et al. 2008 Slywotzky AJ.& Drzik, J. 2005.

Table 4: ERM best practise with the opportunity management according to literature

The essentials for ERM process

When considering the essential aspects for the development of ERM process, following four aspects were discovered from the literature: foundations of ERM, commitment of the organisation, ERM capabilities and ability to run, learn and develop the process. Without these essentials the efficient ERM process would be difficult to put in place.

3.4.1 Foundations of ERM

The foundation of the ERM is seen as the profound structural framework for the ERM procedures. It consists of the strategic and managerial context and most of all, top management's expression of their intention to the ERM work in the organisation. When put in place these aspects give solid ground to proceed further the ERM process. However, the real credibility

for the process comes along with the commitment of the key member groups of the organisation.

AIRMEC suggests organisations to successfully launch an ERM initiative by the means of adopting a suitable risk management framework, where the most common approach is to use an established framework for the specific needs of the organisation (2008, 8). Abrams et al. (2007) see the ERM framework as an essential part of optimized the enterprise-wide risk-management system to give a ''big picture of the world'' to the organization to have a structured way of thinking about business risks (2007, 224). According to AIRMEC (2008) in order to successfully launch an ERM initiative, the organisation needs to adopt a suitable risk management framework, identify the ERM benefits it is seeking to achieve (2008, 9). Also the setting of targets and objectives for the ERM process are critical as well as strategy and policy setting is the way to align the risk management activities broader context in the organisation. (2008, 19.)

According to Kennedy (2007) ERM is inherently strategic and it should be appropriately integrated into the corporate strategy activities. He also quotes that tailoring risk to appetite/tolerance really to the heart of strategic thinking and strategic priorities (2007, 1). Paladino (2008) emphasises that ERM benefits from tight linkage to an organization's strategy setting process and suggest utilizing the natural links of ERM and strategy planning (2008, 33).

Kennedy (2007) emphasises that ERM is strategic a issue and should be integrated into organisation's strategy process since surveys have frequently recognized that the greatest threat to firms fall is the domain of strategy and operations. Paladino (2006) suggests to integrate ERM with the strategic planning and gives an example where the case company's first step in their end-to-end perspective to the more holistic and effective ERM risk process is to establish a Risk Framework.

3.4.2 The commitment of the organisation

The commitment of the central parties in the ERM process is the fundamental matter for the success of the risk management practices. Furthermore, the maturity including risk awareness can be considered as organisational glue which keeps ERM structure solid and alive. Only managing documents with no real commitment - words with no acts - may paralyze the future of the process as it may not be considered import enough.

According to AIRMEC strong leadership within the organisation in relation to strategy, projects and operations covering also risk management and its core processes should be put in place in an embedded manner (2008, 15, 20). Furthermore, all parts of the organisation

should be involved, so that all significant risks are identified and managed (2008, 13-15). Abrams sees that the senior management team needs to commit to ERM as part of their vision for their company's future (2007, 230).

Baker advises the organisations to make, with the help of embedded remuneration system, people aware about risks whenever they make business decisions, as well as get the sponsor for this procedure from the top management (2008, 35). Barton et al. state that implementing enterprise-wide-risk management requires the dedication of the senior management and consultants, when and if used, are only supplements to senior management (2007, 2).

Kennedy states that initiation and sustaining of ERM should be top-down, so senior leadership must champion and drive the process. He adds that the business units in companies must own the process and take responsibility for all relevant remediation activities, but risk analysis and remediation must look across silos. (2007, 1)

3.4.3 ERM capabilities

As in every managerial practise, the personal and organisational skills are fundamental to the successful proceedings. These requirements are attached both risk management practises and social abilities, but also to good business understanding. Abrams et al. suggest that integration of various risk management functions across individual business units in the same organization gives many benefits and potential synergies in terms of both risk identification and assessment and responses to specific risks and when developing ERM capabilities also methodologies, tools, techniques should be developed should be considered (2007, 221;231). They also state that developing of ERM capabilities includes the definition of roles and responsibilities for risk management, and the policies, processes, methodologies, tools, techniques, information flows, and technologies to manage risk (2007, 231).

AIRMEC stresses that people should have the necessary knowledge, skills and tools and the relevant risk information should be identified and communicated enterprise-wide (2008,13). Risk Management professionals are responsible for implementing ERM programmes and benefitting the process needs a mature understanding about the subject matter (2008, 13). Baker quotes that ERM implementation could be aligned with the existing risk management processes in the company (2008, 35). Barton suggests that risks should be ranked on a scale that captures their importance; the severity/amount of money and frequency or probability as well as financial risks should be measured with sophisticated and relevant tools (2001, 2).

Paladino describes in his case study the practise of every manager being also a risk manager including expertise in the risk assessment, alignment for resourcing the monitoring and protection of assets as well as "well-managing the risks" to provide reasonable assurance to

meet one's objectives in a particular sphere of responsibility (2006, 31). Sanchez et al. demonstrates the need to include better tools to perform a continuous control and monitoring process in project, program and portfolio management (2008, 1), which in turn are capabilities to manage ERM process in a comprehensive manner.

3.4.4 Running, learning and developing the process

The way, how efficiently the organisation in practise is running the ERM process, how much the responsible people and their business and working units are willing to learn personally and cross-organizationally and how much they want to develop the best practises, is essential to be able to progress in ERM. Also being able to include all types of major risks holistically cross the organisation to the process - including the risks coming up from core processes, supply chain practises and the usage of subcontractors - are vital to take into consideration.

Abrams et al. suggest rather comprehensive set of ERM framework as risk management continuum to progress and optimise the ERM process (2007, 219 - 233).

AIRMEC states that for maximum success, case companies had to develop a sustainable risk aware culture and the preparation of risk management policies and procedures has always required for this (2008, 1). Furthermore, training in risk management procedures and learning from events are emphasized (2008, 13). According to it, the organisations who benefit the ERM use of risk management process creatively as a thinking process which often enables them to achieve results that would otherwise have been impossible to achieve (2008, 20).

Baker suggests a pragmatic approach as well as simple and concrete language to be used when communicating ERM practises to the management: preferring existing managerial practises and processes as well as developing an approach that business people can understand (Baker 2008, 34). He also advises people in the organisations not to work with ERM in isolation but also to make the top ten risk list of the enablers and blockers of strategy (2008, 34-36).

Barton et al. suggest to 1. Identify risks in a variety of ways corporate-wide 2. Rank risks based on their magnitude and likelihood, 3. Measure risks by their importance for business decisions (2001, 3). They also points out that taking an implicit approach to risk management can be risky itself. It has caused some major surprises to companies unaware of the explicit risks, so portfolio thinking is needed (2001, 20). They see the adoption of an enterprise-wide one - not the silo view of risk management - as an essential viewpoint (2001, 2). Paladino writes that continuous improvement focus can lead to the significant adoption of ERM best practices across wider circles of organisation's personnel (2008, 28).

Shenkir & Walker describe ERM implementation as a change management project in which an organization moves to risk informed decision-making where the goal is to improve decision makers' understanding about the risks facing the unit (Shenkir & Walker 2006, 24-25). For this reason also knowledge sharing from person to person and cross the organisation is vital for improving the quality of risk information. According to PRMIA training and awareness, top down interest and enforcement were seen as the most critical factors for a successful ERM program (2008, 11). Slywotzky & Drzik suggest managers indentifying, assessing, quantifying and developing mitigation action plan as well as indentifying possible upside and adjust respective capital decisions (2005, 82). They also urge companies to mitigate risks in the early stage and limit the downside risk in order to put companies to a stronger competitive position (2005, 81).

Opportunity management in ERM process

Managing opportunities within ERM process takes time, but could be seen as enhancement in the ERM continuum, when the maturity of the organisations has grown and the benefits of the stabilised ERM process have materialised. In this work, the generic aspects to be considered from the opportunity management point of view are: indentifying, managing and evaluating the opportunities and managing the ERM as a portfolio including both risks and opportunities.

3.4.5 Identifying opportunities

Beasley et al. (2007) present that integrating risks management to strategy planning enables seize business opportunities as well. Furthermore, they emphasise that risk events and scenarios should be managed with the top-down procedure in order to get holistic portfolio view for strategic planning. According to Bekefi et al. opportunities could be found both inside the organisation and from the outside of the business environment and suggest identifying opportunities in eight ways: learning from the past experiences, maintaining customer sensitivity, learning from others, scanning the whole business environment, doing the scenario planning, identifying the market gaps and changing the game plan, idealising design and competing and by maintaining market sensitivity to change and move quickly to adapt and hold a key to innovations (2009, 24-25).

Clarke & Varma suggest to scan for opportunities and threats based on the external environment analysis (1999, 415). Frigo suggests e.g. to use brainstorming, the analysis of data on loss, self-assessments, facilitated workshops, SWOT analysis, risk questionnaires and surveys and scenario analysis for identifying opportunities and advice to ask what the most valuable and unique capabilities and resources of the company are (2007, 47-48). Heinonen suggests foresight methods to be used in scenario working in the companies as strategic tool in the

board-level to maintain strategic agility in the organisations (2008, 11). Kennedy notices that scenario analysis is a useful tool for thinking through the range of risks and it can also be a useful way of exploring unfamiliar future business environments that contain hidden opportunities (2007, 1). According to Paladano the case company proceed in its risk management process also opportunities as inputs to achieve business benefits (2008, 30 - 31).

Slywotzky & Drzik suggest considering the key strategic risks in seven categories: industry (e.g. margin squeeze in terms of overcapacity), technology (e.g. IPR protection), brand (erosion), competitor (one-of-a-kind competitor), customer (priority shift), project (new project failure) and stagnation (market stagnation). On the other hand urge to systematically seek the business opportunities concealed behind them (2005, 81-88.)

3.4.6 Managing opportunities

AIRMEC states that when ERM continues to develop, greater focus should be placed on the concepts of risk appetite and capacity (2008, 5). According to Abrams et al. not all risk is bad, and the business strategy must set a risk appetite policy to govern the ERM approach (2007, 224). Barton et al. (2007) advises companies to know their risk appetite for setting the level for respective risk management activities (2007, 2-5).

Bekefi et al. warn organisations not to overlook the upside and only focusing downside risks, as it may lose opportunities and thus significant possibilities for organizational innovations and new competitive advantage. They emphasise that even thought business world today poses risk and threats; it also provides opportunities to create new competitive advantage and ways to satisfy customer needs. Some innovating companies already have identified and seized opportunities, often in as situations where others only see risks (2009, 23-25.)

Clarke & Varma suggest management to decide what their risk tolerance levels and goals for risks and returns are (1999, 417). Frigo argues that high-performance companies are more agile to the forces of change and they manage risks and opportunities better than other companies (2008, 46). Slywotzky & Drzik give tools for categorising strategic risks, instructions and respective countermeasures for them as well as the ideas of gaining reward out of them. They also urge to take care of the strategic risks and benefit the upside of risks proactively (2005, 82-88).

3.4.7 Evaluating opportunities

Beasley et al. suggest that strategic risk management, also as source of opportunities, has to be the ongoing process and with the help of the management scorecard system e.g. reporting

key changes in the business environment is more effective (2007, 24 - 53). Bekefi et al. suggest using financial professionals who help to create ways to measure and achieve key performance indicators for ERM process and evaluate the capability of upside findings by using traditional methods, like using real options thinking and estimating the opportunity benefit, but especially ROI and other economical methods (2009, 25-26). Clarke & Varma suggest the top management team can use a risk/returns matrix to evaluate the overall risk position of projects to decide where each strategic business unit lies on the risk axis, which can then be plotted against expected returns (1999, 421-422).

Frigo suggests that effectiveness of strategic risk management should be monitored and Key Risk Indicators and the Balanced Scorecard could be used as metrics for continuous monitoring. Especially should be measure "genuine assets", the tangible and intangible resources, capabilities, and traits that make an organization and its offerings unique, which should be protected by process manner with 1. Risk Assessment of Plans including scenarios, 2. Identification of Critical Risk Scenarios, 3. Identifying Countermeasures and 4. Establishing a Process for Continuous Monitoring (2008, 47-48). According to Paladino (2008, 32) the case company have ongoing ERM measurement including monetised results of the cumulative value and the value of threats reduced as well as overall ROI of project portfolio. Slywotzky and Drzik advice to quantify organizations risks with the economic measures such cash flow at risk, earnings at risk, economic capital at risk, or market value at risk to be able to link them to decisions making including joint ventures and other source of business opportunities (2005, 82 - 88).

3.4.8 Portfolio management

According to Beasley et al. risk management goals could be attached with the strategic goals as well as risk scenarios should be managed with the top-down procedure in order to get holistic portfolio view for strategic planning in order organisations to achieve their core objectives. (2007, 25 - 31).

Paladino suggests that an organisation can integrate ERM with the strategic planning, into the process improvement and project management and leverage process improvement and management with the risk management tools. The case company aims are to broaden the risk reporting from a project-level view into a program or a portfolio view. The present way is already to manage project portfolio through the strategic planning process: "Integrated Strategic Planning and Risk Management Process", which includes a risk identification and analysis as well as opportunity aspect including the monetary evaluation, is in use (2008 28-33.)

Sanchez et al. states that project as a working method is not isolated from the rest of the organization and should then be considered inside an organization as a link which connects the project with programs, portfolios, and the strategic goals of the organization as well as functions related to strategic management (2008, 14). Slywotzky & Drzik advice organisations to assess and respond to the strategic risks in a correct way by mitigating them and proactively acting as a doer instead of a passive bystander; acting as "the Risk Shaper" to get the stronger competitive position and business opportunities (2005, 81).

4 Case study with the constructive method

Since the objective of this work is to expand information about the best practices of the ERM for the systematic and controlled developing of Itella's risk management process, case study approach with the constructive method was chosen as research methods. When one needs to know why or how some phenomenon occurs, case study approach is recommended (Yin 1994 1-10). In this case, among Itella management, is wanted to know how existing ERM process is running and how it can be developed to be more supportive for the business.

The research strategy in this study is exploring by its nature. Exploring study e.g. investigates rarely known phenomena, surveys literature and its contents of certain subject and looks for the new points of view or phenomena around it (Hirsijärvi 2000 127-128). It is a question of the qualitative study which is based on a constructive research method. A literature analysis and interviews of the Finnish ERM experts were used as data collecting methods. With the help of literature review, one expand the knowledge of the researched field and cannot advance knowledge in ones study field without first learning what has been achieved by others and what still remains to be achieved (Wilkinson 2000, 26). By the results obtained from the thematic interviews and literature analysis, Itella's risk management practises are to be compared with the ERM best practises. By exploring what have been argued and expressed by the scholars and ERM pioneers, some new ERM procedures to Itella will be suggested.

Qualitative research can be defined as a form of systematic empirical inquiry into meaning (Shank 2002, 5), which studies things in their natural settings, attempting to make sense of phenomena in terms of the meaning people bring to them (Denzin & Lincoln 2000, 3). According to Yin the case study as a research method is recommended when the researcher has minor possibilities to influence the operations of the study subject and one needs to know why or how some phenomenon occurs. The subject of the case study is often present events and the study method is rather useful in the social sciences. However, the case study method has been criticised, among others, from the inaccuracy as a study method and in difficulties to generalise the findings of the research. Furthermore, the case study has been criticised as a

research method, which is time-consuming, and produce much material, which is difficult to understand. (Yin 1994 1-10.)

In turn, the constructive study method attempts to solve problems e.g. by creating the construction of models, procedures, plans and organisations. It is also applied when the new managerial processes and procedures are developed and practical managerial challenges are solved in the business organizations. These compositions are called managerial constructions. (Kasanen et al. 1993, 243-244.)

4.1 Constructive research method

According to Kasanen et. al (993, 245-246) constructive research process may be divided into following phases, which may vary according to study:

- Find a practically relevant problem, which also has research potential.
- Obtain a general and comprehensive understanding of the topic.
- Innovate, i.e., construct a solution idea.
- Demonstrate that the solution works.
- Show the theoretical connections and the research contribution of the solution concept.
- Examine the scope of applicability of the solution.

The innovative aspect as a core element of a successful constructive study emphases the reason that if the researcher is not able to produce any new solution to the problem in question, then there is no point of continuing the study. When creating innovation for the studied company it is also important to show its practical benefits in a wider scale. (Kasanen et. al 1993, 246, 247.) The practical nature as a research method can be seen also in Figure 4, where constructive method is situated into the empirical and normative axes of the illustration.

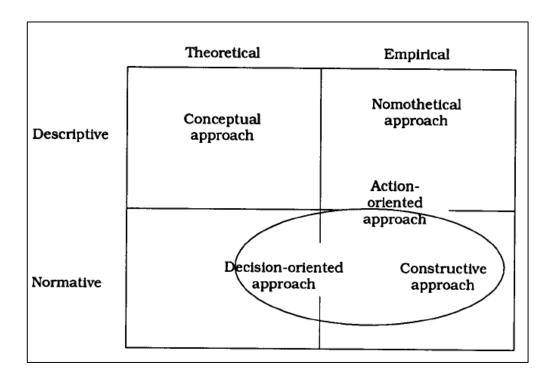


Figure 4: The Location of the Constructive approach in Accounting Research Approaches (Kasanen et. al 1993, 257)

In Figure 5 it is shown that the constructive research method is suitable for the solving of the working life-oriented research problems! In addition to the theoretical examination of the study results, practical functionality and significance are also emphasised. However, both the internal and external advantages may be challenging to show in this study. The main reason for this is that the ERM is a process-like framework, where the increase of the risk management maturity takes relatively long. It rather takes years than months (DeLoach 2000, Barton et al. 2002). In addition, every organisation has its own characteristics including company values, economic structure and managerial systems. There is no two similar organisations even though they are doing business in the same market areas. This fact in mind, it is not possible to measure the effectiveness of the proposed constructive solution in the time-scale of this study.



Figure 5: Elements of Constructive Research (Kasanen et. al 1993, 246)

4.2 Itella and its present ERM procedures

4.2.1 Background of Itella Corporation

Itella and its predecessor, nearly four hundred-years-old Finnish Post, have played a significant role in the history of Finland. After many historical phases of development, the Finnish Post and Telegraph became in the 1990 a state owned enterprise (Posti-Tele) whose finance was loosened from the budgetary funding of Finnish State. (Itella 2009a/b.). Later on, Itella has founded more than 30 subsidiaries to 15 different countries. In 2009 over eight thousand employees out of thirty thousand, were working outside of Finland. The net sales at the end of the fiscal year 2009 were MEUR 1,819.7 with the Operating profit (EBIT), MEUR 46.7. (Itella, 2010.)

Nowadays, Itella offers the versatile service portfolio for managing data flows and streams of goods and it has been organised into three different Business areas: Mail Communication, Logistics and Information Logistics. Itella manages important customers information and material flows, operates in the mail communication, information logistics and material logistics sectors providing services in Northern and Central Europe and in Russia. Itella Mail Communication offers delivery services and customer relationship marketing solutions – as well as traditional Postal Services in Finland - which enable organisations to effectively reach their customers. Itella Information offers outsourcing solutions for invoicing, financial management and digitization. Itella Logistics offers solutions for land, sea and airfreight, parcel deliveries, and warehousing and other contract logistics. In Finland, Itella serves consumer customers and SME sector under the Posti brand. (Itella 2009c/d.)

The business areas inside Itella are called as Business Groups (later BG). The decreasing margins of the traditional postal services, a new open competition as well as grown transportation and labour costs, have compelled Itella management to think about the development of the new business to the area of the Baltic Sea, Russia and Central Europe.

The progress of digitalisation and the changes in the consumers' media behaviour, as well as demands for the ecological responsibility for the companies are the key drivers, which have essentially affected the Itella's business strategy and operations. Another important external driver in the growing global competition, is the regulative development of the postal activities in the EU area.

When a domestic postal field and its margin have narrowed, the natural direction in order to achieve growth for Itella has been abroad. Expanding businesses outside of the home market

has brought both new opportunities and risks to Itella's businesses. The preparedness for the new business environment and the new strategic thinking are the best possible risk management practices: holistic risk management gives the operational flexibility to the business environment. The state owner has in a far-sighted manner understood that the margins of the traditional postal services will decrease due to electronic substitution. Therefore, the radical changes in the business environment have also served as driver for the internationalisation, where the owner has acted in a perceptive manner when supporting this business development.

The actual internationalisation of Itella began from the foundation of a new BG in 2001. The new BG called Information Logistics was supposed to develop new type of businesses into Finland Post Corporation, which was the official name of the company in that time. The objective was to create new sources of income for the enterprise by electronising some of the traditional physical postal products and services as well as to create new types of services for the future. This business strategy has partly succeeded, but there are many challenges in the future concerning the electronic substitution of traditional postal services. By an electric substitution, it is meant that the traditional letters and other paper information sent manually will be replaced with the electric alternatives (Itella 2008, 87).

Furthermore, the global regression has accelerated the electronic substitution and the companies have increasingly started to use more cost-effective electronic services as their delivery channels, which will in the long term be a greater threat to delivery operators than delivery market liberalisation (Nikali 2008, 104). To day the electronic substitution in Itella causes the declining volumes on traditional postal and other delivery services and is considered one of the major strategic risks in Itella Corporation.

4.2.2 The present ERM process in Itella

For more that two years ago Itella started to develop the more comprehensive risk management model enterprise-wide. The core objective of that process was to take a more strategic approach in risk management and to gain competitive edge to Itella's businesses along with the growing maturity of this new process. There were also organisational viewpoints to connect the risk management more tightly with the business strategy and the overall management system, e.g. the development of Corporate Governance and nomination of the CRO position. During these two years, the ERM process was widely accepted among the executives and other management. Some enhancements have also been done to the process. The latest one was done in March 2010, when some enhancements to the reporting cycle and risk assessment tools were completed. The main objectives for these changes were to adjust the

process to better correspond to the strategic planning cycle and to enhance the risk assessment tools to be more informative as well as embed the opportunity perspective to them.

In Itella, ERM is seen through three main characteristics:

- 1. Integrated: ERM must span all lines and levels of business. Risk Management should be embedded in the decision-making process to cover all important questions in the organization.
- 2. Comprehensive: ERM must cover all types of risks: strategic, operational, financial and hazard risks.
- 3. Strategic: ERM must be aligned with the overall business strategy and strategy process. Its core mission is to support assuring the achievement of entity's strategic objectives.

Described as above, Itella's ERM intention is very holistically formulated and cannot be reached in overnight and takes time to progress. This requirement has been recognised during the ERM process. Itella's risk management process is based on COSO ERM framework and correspondent ERM cycle is described in Figure 6, from which Deming's cycle approach can be recognised.

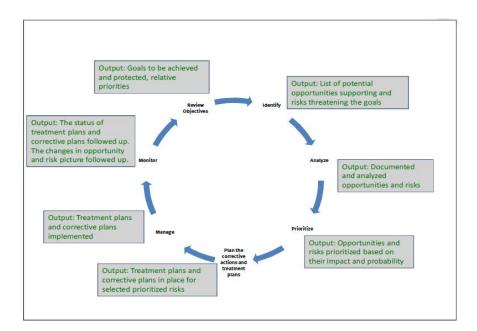


Figure 6: ERM Cycle 2010 (Itella, 2010)

4.2.3 ERM organisation

Itella ERM Policy requires that each Business Group, Business Unit (all units reporting to BG including country entities) and named Group Functions have a nominated Risk Champion. The Risk Champions are key people in Itella ERM as they run the ERM process and activities in their organization. They also act as internal consultants for risk awareness and respectively when applying Itella ERM methodology and tools.

Although RC's have got their mandate from the management of their organization, they do not own the risks in their organization. Neither are they automatically responsible for creating and implementing the management plans and controls for the identified risks. The Risk Champion is ideally a person, who understands 'the big picture' of the BG and has sufficient business understanding and orientation. The CRO, representing Corporate Security Unit, is responsible for developing the risk management process, supporting the policy implementation, facilitating the process and preparing group-wide risk reporting of ERM to the top management. Also every Itella employee is responsible for managing risks in his or her area of influence and communicating identified key risks to the line management.

4.2.4 Connection to the management system and strategy

According to the Itella's ERM policy (see Appendix 1) Enterprise Risk Management is an integral part of Itella's management system and it is directly related to and linked with Itella strategy creation process, where its main objective is to provide assurance on how enterprise business strategy will perform under different scenarios and events. The fundamental goal of Itella ERM is to provide reasonable assurance that the enterprise achieves its key objectives and strategy and is capable of optimizing its opportunities. The ERM policy also states that the line management is responsible for embedding ERM into strategic management, daily operations and business processes, including respective services operated by third parties.

The risk management organisation and its connection to the overall management systems are illustrated in Figure 7.

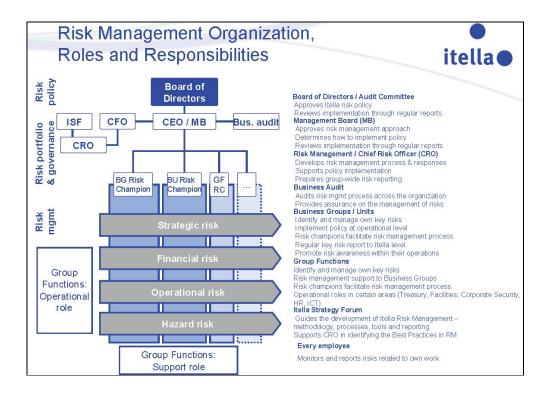


Figure 7: ERM organisation and its roles and responsibilities. 2010 (Itella, 2010)

The strategic alignment of ERM and its linkage to the different phases of the strategic planning are highlighted in Figure 8 and can be condensed as follows in numerical order regarding to the respective places in the figure:

- 1. Informal cooperation during the Business Environment Analysis
- 2. Required Opportunities / Risks -field in BEA -verbal analysis enough
- 3. BG Business Environment Analyses, in addition to other relevant information, to be sent to Group Functions as input
- 4. BG Objectives and Risks to be sent to Business Lines and Business Units as input
- 5.4Q as light update only if any major new risks / changes identified
- 6. Instant reporting on all major new risks and changes in the existing risk picture as part of normal reporting in all line of business units and functions

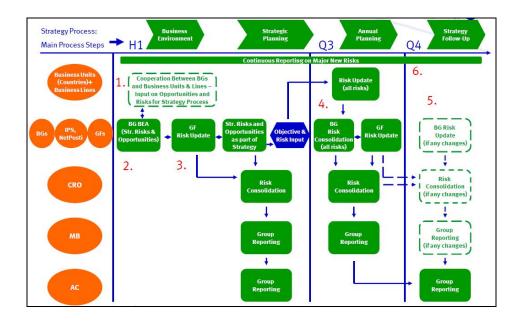


Figure 8: ERM in the strategic process 2010 Itella, 2010). Abbreviations here, not mentioned earlier: IPS, Netposti= Business Unit's in Itella;)

4.2.5 Risk management tools in use

The risk management tools have recently been updated to better correspond to the present maturity progress and needs of the risk management process in Itella. The risk management toolkit helps to identify, valuate, prioritize, manage and monitor the risks that may threaten the achievement of organizations strategic targets and goals as well as opportunities that may support their achievement. The toolkit contains valuation criteria which is scalable, so it can be used on all organisational levels. The main idea is to analyse opportunities and risks to understand their real nature and valuate them with regard to their probability of occurrence and their impact.

4.3 Short description of other case-organisations

The case companies are representing three different lines of industries: telecommunications, multi-industrial supplier of technology and services as well as stainless steel manufacturer.

TeliaSonera Group (TSG) provides network access and telecommunication services in 20 markets in the Nordic and Baltic countries. The emerging markets are Eurasia including Russia and Turkey as well as Spain. The company is listed on the NASDAQ OMX Stockholm and NASDAQ OMX Helsinki stock exchanges. The key figures of the company (SEK in millions: €1 approx. SEK 9.7) at the end of 2009 were as follows: Net sales 109.161; EBITDA, excluding non-

recurring items 36.666; Net income 21.280 and number of employees 29.734. (TeliaSonera 2010a.)

According to the website statement, TSG's risk management procedure includes all aspects of risks that could have material adverse effect on the achievement of TeliaSonera's goals including financial, operational, regulatory, country and political risks. The statement also emphasises the involvement of the business units to identify significant local risks as well their responsibility for setting up systems for reporting and developing action plans to address these risks. Risks are being reported and monitored as part of the quarterly business reviews and the in quarterly risk reports the group level risks are reported to the Board of Directors . (TeliaSonera 2010b.)

The main risk areas are summarized in the Report of Directors and in the Notes to the Financial Statements in the Annual Report. The statement also points out that during 2009 an integrated approach to risk management, with increased business unit involvement in local risk identification, reporting and handling plans have been put in place. (TeliaSonera 2010b.)

Mr. Väisänen considers that the most challenging risks are inside of the organisation. According to him too often inside the organisation has been repeated that e.g. the competition is too hard and there has not been enough self-analysis about the weaknesses from the capabilities perspective. ERM organisation consists of three people in the corporate level; some controllers in the business level functions and suitable punch of people were working with the specific matters of risk management (Väisänen 2009.)

Metso Corporation (Metso) is a global supplier of sustainable technology and services for industries like mining, construction, power generation, oil and gas, recycling, pulp and paper and has about 27.000 employees in over 50 countries. The net sales were 5.0 billion euro with EBITDA of 437 million euro and the net income 151 million euro as key figures of 2009. The company is listed on NASDAQ OMX Helsinki Ltd (Metso 2010a, 124 and 140.) According to company's Risk management statement in 2009, Metso focused on managing risks related to business fluctuations in the global economy. They also developed risk management model and tools further as well as strengthened their local perspective in the practical risk management work. Furthermore, they increased resources for IT risk management and used their intranet and IT tools for improving risk management-related communications (Metso 2010a, 29).

Metso also stated their risk management to be an integral part of company's strategy and business management. By taking a calculated strategic, operational or finance related risks they were able to strengthen company's business opportunities (Metso 2010a, 26 - 27). Examples of their strategic risk and opportunity perspective were to be affected risks related to

new markets, business acquisitions and investments, but on the contrary to benefit their expansion of operations on emerging markets (Metso 2010b).

According to Mr. Laukkala, Metso has eight full-time equivalent people working in the practical risk management process including him and seven people who approves and decides risk management related actions based on the risk management process and respective assessments and other procedures. He also stated that the economic situation and respective cyclic character of it, in connection with the two dimensions of RM - impact and probability - it is rather challenging to cope with. Because of this turbulence, company had to do risk management calculation twice in 2008 (Laukkala 2009).

As main products, Outokumpu Corporation (Outokumpu) produces stainless steel, the cold and hot rolled stainless steel coil, sheet and plate, quarto plate, thin strip and tubular and long products as its main products. The company employs some 7 600 people in more than 30 countries with 38 subsidiaries the group's head office is located in Espoo, Finland. Outokumpu is listed on the NASDAQ OMX Helsinki. (Outokumpu 2010a; Outokumpu 2010b, 64.) According to company's financial report in 2009, the net sales were 2 611 million euro, EBITDA -212 million euro and operating profit and net profit for the financial year respectively were -438 and -336 million euro (Outokumpu 2010b, 16-17).

Outokumpu states that its risk management is supporting company strategy and helps in defining a balanced risk profile from the perspective of shareholders and other stakeholders including customers, suppliers, personnel and lenders. Its management participated during in 2009 several risk workshops, where also strategy planning and performance management processes were handled. According to the company, its strategic risks were related to the company's business portfolio, the market situation and major investments and business risks that were connected with the company's operating environment, customer behaviour and the economic outlook. In 2009, the volatility in demand seemed to impact almost simultaneous on strategic and business risks. (Outokumpu 2010b, 82.)

According to Mr. Pisto, the company's Treasure and Risk Management Unit has an overall responsibility of RM process at the corporate level: i.e. ERM process, insurance, corporate security, fire protection and respective audits. They have four people in line for the risk management including one part-time person in managing the debit risks. He considers that the overcapacity and the volatility of the markets of some raw materials, company's euro centric markets as well as world-wide competitors, especially from China, are the biggest risks at the moment. (Pisto 2009.)

4.4 Theme interviews in this study

Theme interviews were used as an empirical data gathering technique. Interviews are one of the basic data collection methods (Hirsijärvi & Hurme 2001, 11), a moment of social interaction, which aims for data gathering and is therefore a goal oriented activity (Hirsijärvi & Hurme 2001, 41 - 42). Theme interviews enable the flexible conduction of the topic and - if wanted - allows its treatment by statistical means (Hirsijärvi et al. 2000, 195 - 196). In the theme interviews, it is also typical that the themes - subject matters - are known, but the form of exact question and their order is unknown (Hirsijärvi et al. 2000, 196).

The interviews in this study were proceeded as external and internal interviews, which means that three risk management executives of aforementioned case companies and three Risk Champions, the members of Itella ERM organisation (see section 4.2.3), were interviewed by the means of theme interviews. The interviews took place in the premises of each interviewee, were conducted in Finnish and lasted approx. 60 minutes each. At the beginning of each interview, the interviewees were given the rough topics of the interview, see Appendix 2. When needed the interviewer did more focused questions concerning respective topics. Furthermore some general type of additional questions, which were not tightly related to topics, were occasionally done.

The conversations took place in informal manner. Each conversation was digitally recorded in order to avoid follow-up questions and to help later memorising the details of the conversations. The anonymity of the interviewees and their organisations is ensured by using real names only if allowed and even then, if there seemed to be added value to this study. The interviews were not aimed either rank companies' ERM implementations or to explicitly estimate the maturity level of present ERM process in each Itella BG.

The main goal of the interviews was to collect empiric, external and internal, data to support in evaluation of the future needs of existing ERM process of Itella, especially from the opportunity management point of view. Furthermore, the questions for external and internal interviews were planned for different purposes. The external theme interviews were supposed to give some empirical point of comparison to the findings of the literature review as well as baseline view for the Itella's present ERM practises. Otherwise, the internal theme interviews assumed to give some information of the present ERM procedures in Itella. In other words, the external interviews would help to create "to-be ERM" and the internal interviews to find out "as-is-ERM" in Itella.

5 Empirical findings

Regarding to respective questions, in this section has been tried to condense the central findings of theme interviews by interpreting given answers according to the thematic structure developed in the theoretical part of this study.

5.1 External interviews

The companies and their risk management organisation have been introduced shortly in section 4.3. The interviews took place during May and September 2009. The interviewer was earlier introduced himself in the professional networking meetings. In FinnRima's (The Finnish Risk Management Association) chapter meeting 18th March 2009 the member organisations were invited to participate in this study. The author's intention was to interview CRO's or other risk management professional of organisations, which had already progressed and more advanced in their ERM process than Itella. The interviewed professionals have altogether more than semi centennial experience in the field of risk management, so they were expected to give great deals of insights of ERM best practises and risk management knowledge. In addition, their organisations are multinational, wide-spread Finnish-based companies, which as well would give a good change to compare Itella's ERM procedures with theirs. With the help of the theme interviews and respective questions were supposed to get the most of their knowledge and accumulated expertise during their years as the risk management professionals onto the surface.

5.1.1 ERM foundations

Directing their way to ERM, the policy setting, strategic alignment and general declaration of duty seems to be one of the foundations for the ERM process in the case organisations. According to their websites and information got by the theme interviews, the case companies have had their ERM foundations in place. This is obvious, since these organisations have started their ERM processes in 2004 or earlier. According to the interviews, two of companies had based they ERM process to COSO ERM Framework and one of them had more tailored approach.

One quotation describes well the establishment and organisational acceptance of the ERM in all of these organisations, but there was also a word of caution added:

"Risks will be discussed both in the context of normal business processes and in the different business boards", and added: "ERM is a concept and way of thinking about RM- it is definitely not a methodology. It simply is a matter for

tackling the risks aside from the business goals. RM's has to earn its place in a business process of the organisation"

According to Kennedy (2007, 1) ERM is strategic issue and should be integrated into corporate strategy since surveys have repeatedly recognized that the greatest threat to firms falls in the domain of strategy and operations. Therefore, it is essential to have the risk management goals set by the top management in order to have wide enough perspective and business alignment for the process from the beginning.

In spite of the strategy connection – or perhaps just for that reason – it is good to understand both sides of the risk:

"One task of RM is to keep the most devastating incidents in mind of the organisations"

On the other hand, another comment takes rather straightforward view to risk management and put it simply this way:

"RM should always be connected with the strategic business goals and if other risks are manageable and in control, who cares?"

Both statements emphasise rather direct manner the importance of taking into consideration all important risks whether of not they are considered explicitly as strategic ones. According to Baker, it is essential to explain to people that ERM does not work in isolation in the organisation as well as make the Top 10 risk list of enablers or blockers of the strategy (2008, 34-36).

5.1.2 Organisational commitment

Organisation shows its real commitment to ERM by the dedication of management. It means real acts, not just policy setting and acceptation of it. Good question is, how the commitment shows in practise? Promoting the risk management and embedding it as a part of the business processes is a concrete example of the management's dedication:

"Sparring of the process is ongoing. The respective director of business area will introduce risks to the top management as a part of the quarter review, so risk management is part of the business plan implementation. When the business plan is updated, so will be the risks. Risks will then be discussed both in normal business process and in the different business boards"

In the previous case, the commitment of the management is shown as ERM being part of the normal business planning.

Risk management professional's commitment must also be ongoing and consistent:

"We must be prepared to promote ERM even in a stubborn manner. This is a ERM-train where the top management travels in the first class"

Aforementioned comment reflects the determination of the risk management organisation itself as one of the key players in the risk management work in order to support the business.

However, there may as well be obstacles regarding to the commitment of the business representatives due to the time consuming ERM process, but also because of attitude problems. One of the risk management professionals described challenges as follows:

"Without the support and responsibility of the ERM process, everything is done with the "minimum attitude" and in a simulating manner - this does not develop the process. People tend to rush and their attitude and change resistance is the ultimate obstacles of ERM. There may also be some kind of confrontation or mistrust between supporting corporate unit and business functions"

The following comment confirms that business responsible people have many things to do. The lack of time is the common problem to which the same interviewee added supportive comment:

"You should then be able to show your professionalism in ERM by being positive, constructing, understanding, cooperative and patience and really work hands on together with the business"

One comment was also organisationally interesting and reflects the same challenge:

"Usually when doing risk management activities in the unit level instead of group level the concerns about strategic risks go down and the focus of operational and Hazard Risks arises."

This aspect seems to relate the fact that people working in the different management level of organisations naturally has different viewpoints to the risks according to their daily concerns.

According to AIRMEC strong leadership within the organisation in relation to strategy, projects and operations related to risk management should be put in place as well as the core processes included in an embedded manner (2008, 15, 20). Furthermore, all parts of the organisation should be involved, so that all significant risks are identified and managed (2008, 13-15). Abrams see that the senior management team needs to commit to ERM as part of their vision for their company's future (2007, 230).

The commitment of the top management is essential part of successful ERM work as illustrated later in the Figures 9 and 10. This gives support to the whole ERM process which needs attention from the management as the process extends across the organisational borders of the company. Needed strategic linkage is not able to get and the attention from the business and operational functions of the company cannot be getting without the support from the management.

5.1.3 ERM capabilities

ERM capabilities refer to managerial practises as well as personal and organisational skills to run risk management sessions and use respective RM tools. The main target group is risk management specialists, but in a long run people in all organisational level. In addition, also social skills and good understanding of the business practises and environment are needed. One comment reflects both risk management skills and their link to the quality of business decisions.

"If business risks are observed at an adequate level, the quality and predictability of business plans increases"

There was also a note regarding to narrow minded risk thinking both by risk professionals and business people which may partly be commitment related matter, but primarily it relates to ERM capabilities:

"The overall problem is that RM people are ex-insurance or security experts, that they do not understand the business and they also have the silo thinking of risks".

This comment refers to silo thinking and -attitude between both business people and risk management professionals. The reason for this attitude within business representatives may be not to understand the relation between risks and their businesses. Some risk practitioners as well have got the habitual way of being stuck in the old fashion roles of risk management procedures. Major problems may thereby take place because of inability to see risk depend-

encies in wider context and understand the root cause of the risks. Another comment was related to qualifications for modern risk management professional:

"Too often ERM people are too keen on their specialities; however risk management practitioners should be versatile people enough. CRO must be interested in every phenomenon and not be too keen on only catastrophic related issues. The opportunity side of risks also needs the understanding of economic matters".

This was a valid comment concerning the capabilities of risk management people. It means that modern risk professional is more like the business person who happened to understand risk management issues instead of the person who knows everything about risk management, but very little about business.

Barton et al. described this phenomenon how risk management has historically been done in the 'silos' rather than enterprise-wide, so typically, companies have had people to manage process risk, safety risk as well as insurance, financial and assorted other risks. (Barton et al. 2001, 2).

Two different comments were related to the capabilities of management to understand risk management tools and their overall responsibilities of the risk management process.

"The essential issues - the goals of RM and questions in risk assessments may be forgot before the whole risk session has started. This subject should be simplified enough to meet the requirements of the management, there are many things that people can do naturally in a right way"

"It is not realistic to presume that security and RM related issues could be embedded in business processes "as-is", there must be experts to facilitate and support the process. Think about this vice versa: if you should handle the area of someone's expertise as embedded in your responsibilities, how confused would you be in the situation when you do not know the substance?"

In the interviewees' organisations were mainly used spreadsheets and presentation programs as risk management tools. In addition, some of them have evaluated web-based programs or other intelligent database solutions. Traditional red-yellow-green -type risk matrix is used in every company. On the other hand, it seems that the level of automation or sophistication is not the main point when talking about risk management tools:

"RM tools and methods are not the point, results are. One of the main points is how the risk information is refined to a format people in the company can understand it. In my opinion, ERM in this sense means that all of these aspects are taken consideration. No matter what are the common tools, as far as the final documentation is to be done in a manner that it is understandable."

One of the interviewees' characterised the risk management communication challenges as follows:

"Companies should stop ERM as a manner religious talk or slogans. When applying RM in practise, there must be a more practical approach; not too much concentration of terms and definitions. ERM -type of jargon and terminology used too heavily when communicating with the management, may confuse the audience".

Also Baker suggests in his article, that there should be a pragmatic approach when communicating ERM practises to the management: prefer existing managerial practises and processes and develop an approach that business people can understand. Also when communicating the value of ERM, simple and concrete language is good to use (Baker 2008, 34.) According to Kennedy good risk communication is needed when changing roles and responsibilities in the organisation (Kennedy 2007, 2).

5.1.4 ERM process ability

The way, how efficiently the organisation in practise is running the ERM process, how much the responsible people and their business and working units are willing to learn personally and cross-organizationally and how much they want to develop the best practises, is essential to be able to progress in ERM. One of the interviewees described the risk management evolution in his organisation. It rather well explains the ERM commitment and capabilities of the company as well:

"Security and RM have been done at the very operative level so far. That is why ERM should better somehow cover all these areas and aspects. It may occur that the same risk can be noticed in business units and supporting units (e.g. internal control). Risks are always related to business goals and for this reason risk management is a critical success factory. The management was then insisting to replace the present quarterly risk mapping lists with more strategic risk goals including respective action plans. The opportunity side is slightly involved now and the focus is more in the future."

In all organisations, the interviewees had the overall responsibility of the ERM process, but there were variations in opinions about how the process should be articulated into the other company processes:

"ERM should be considered and accepted as a natural part of the business process corporate-wide. The best way to reach this state of mind is to find quick wins and new insights to the daily business - this would be the best internal advertising for the risk process".

"People can be lost in the ERM method world, it should be kept simple enough. The only way that makes the difference is, in which level the RM-process is wanted to formalise: process, documentation or the content level integration".

"ERM work success if it is supporting enough the business process. There must be a natural pull mode in this process; push mode only does not make it real enough in the long run"

5.1.5 Opportunity management in ERM

When speaking about risk management, business opportunities or upside is not in necessary the first thing that comes one's mind. The roots of risk management are in the insurance business and hazard risks where accidents happening to insurant are not the most probable source of opportunities. However, when it comes to other source of risks, like the aforementioned strategic and operational risks, there is usually a germ of the opportunity inside the phenomena. One of the interviewees expressed the attitude of his organisation toward upside of risk this way:

"Utilisation is our key word referring to opportunities. This means that the organisation, in addition to have organisational maturity to seek opportunities, also have to have capabilities to manage and evaluate the upside of the risks. In a certain business region, where had not been sold certain spare parts for the production machines, new business opportunities were found with this process. This business opportunity was found purely through the risk management process and later on respective sales organisation was put in place. At the moment, this region is generating substantial new revenue. Of course more accurate due diligence and financial calculations were needed before starting the new business".

The aforementioned case is the very encouraging example of the possibilities of ERM process. This is a textbook example of the workable ERM process: with a holistic and enterprise-wide approach, through the brainstorming method, risk assessment participants were able to find a new source of business for the company.

Not all companies were that successful to learn upside with the help of their ERM process. One of the risk professionals commented this side of the risk management as follows:

"Opportunity thinking comes along with the ERM process, but any noticeable business upside has not been discovered yet. However, the top management - lead project has been initiated where this matter is in scope. Few units in our organisation are also figuring out this aspect, but it has not particularly been added to our ERM process, even thought the idea is there in the background. In my opinion, 'Let the cobbler stick to his last': there are enough challenges to block the difficulties from the ongoing risk management process in general. Aforementioned units and bodies can do this opportunity part better - as long they are also risk aware"

The last comment reflects organisations willingness to develop opportunity management in their company, but at the same time may reveal some organisational challenges to reach all respective parties to benefit more of ERM process. On the one hand, there are intentions to get upside out of the ERM process, but the people responsible for the development of the process may confront the attitude problems of the management side if the risk management people are talking too much about business opportunities.

There may also be opportunities to reach with the help of the risk management process other way around - with the operational agility and effectiveness in the organisation:

"It is stupid and narrow-minded in general - including the management level - that we always want to get some added value of RM process in terms of pure business perspective. Instead, we should more think that we win by not losing. The concerns are quite often a matter of business continuity, e.g. lack of spare parts of some critical production machines. Return of Security investments, as well as added value, should be presented and argued more in detail than nowadays is done. The opportunity thinking through the negation is not media sexy"

This is a very good point and example of operational agility gained whith the help of risk management. The problems seem to be - as the interviewee himself points out - lack of re-

spective monetary metrics for the benefits of "not losing" or "keeping the wheels moving". However, considering this also from the strategic point of view certain, some preventive actions or quality issues may be very important for the success of the company. The management often see risks and returns as a trade-offs. However, Slywotzky & Drzik would like to see risk and reward as a emerging issues and refers to the forerunning companies where creative risk management has been combined with a good business model and high quality thinking allowing organisations to improve in both areas (2005, 88).

One comment was also rather hesitating about ability to reach business upside with the help of the risk management process:

"This is in general a little bit far-fetched thought in the risk management world. If there are possibilities to enhance the overall quality of the business process with the help of the risk management process, it is a good enough achievement. I think ERM is not "a silver bullet" in the RM world, but the benefits are rather in growing knowledge and understanding on people's mind about risk management practises in their daily work as business enabler."

In general, it seems that seeking and finding opportunities with the help of ERM process is not yet so common in the organisations.

According to Bekefi et al. opportunities could, indeed, be found inside the organisation as well as from the outside of the business environment. The overlooking of upside and only focusing of downside risk organisations may lose opportunities and thus significant possibilities for organisational innovation and new competitive advantage. They emphasise that even thought business world today poses risk and threats, it also provides opportunities to create new competitive advantage and new ways of satisfy customer needs. Some of the most innovating companies are already able identify and seize opportunities in the situation where the others only see risks (2009, 23-25.)

In addition, Clarke emphases that RM is the strategic business tool for the business process where the opportunities and threats come from the company environment as inputs and the outputs can be positive like business profits, avoided destructions, good contingency plans and agile operations in general (1999, 414-418). This relates more to the process perspective of RM and the importance of overall risk awareness from the management side. Whether the phenomenon with the business environment is strategic or operational by its nature, it should be the concern of the top management in any case.

5.2 Internal interviews

Three people, working in full-time as Business Development Directors of respective Itella BG's, were interviewed in order to achieve practical insight into the Itella ERM process. They have been members of Itella's ERM virtual team and are called Risk Champion in the internal Itella language. Two of these people have been participating in Itella's ERM process from its first stage, so they have had a good view for the evolution on the ERM process including its pros' and con's. As the interviewer has also participated in the Itella ERM virtual team, there have been possibilities to mutual communications of ERM issues in general as well. The age and organisational maturity of each BG varies according to its establishment in the Itella Corporation, see more in detail, Section 4.2. These interviews were conducted between October 2009 and January 2010.

5.2.1 Organisational commitment

The support from the management team of interviewees was expressed in the following way:

"I get management support as much as I want, however the opportunity side and corporate-wide approach needs more sparring in this sense. Maybe also more conceptual assistance for the ERM process is needed in the future – as well as coaching."

"Basic support from the management exists and our future strategic process will include also the risk management procedure, however the ambition level in our Business Functions could be higher".

"This is a matter of expenditure of time. That is why this process has not arisen to the agenda of the management. The next step is to embed risk management as a part of the existing management review procedure."

These answers tell that the basic commitment from the Business Group side exists, but the possibilities to proceed further vary.

5.2.2 The ERM process and its maturity in Itella

The present ERM process, described more detail in Section 4.2, was considered different ways in each Itella BG:

"Should ERM process be done more enterprise-wide than today? It is today BG-based and consolidated by CRO. Added value is generated, but it is not yet enough corporate based approach."

"As Itella consists of three different BG's and their management system are different, ERM could be more applied to fit-in to their respective management procedures. In this way, they could get the most of the ERM process and later when their maturity level increases to the same level, the more comprehensive approach could be applied".

"Our intention is to build and make internal ERM network more visible in our own BG as well as in the subsidiary -level where the operational risks are usually materialised. The question is, do people understand enough what ERM is about?"

These comments from the three RC's reflect different kinds of expectations and need for the ERM process in each BG. Their organisational cultures and management procedures as well as ERM maturity varies according to their business environments. That is the case also with their present capabilities to contribute and benefit from the ERM process. Building a business infrastructure in a corporation, which rapidly has become international and having operations in o fifteen different countries takes time. Things must have their priorities.

Some concerns about ERM process rose up during the interviews:

"The danger is that the ERM process will be isolated to its own management process where one of the supporting functions is forgetting its facilitating perspective. Roles and responsibilities must be clear in that sense".

"The present, enhanced ERM system is better to run in first and get more feedback from it, before doing any major changes"

The first worry is good to bear in mind. The concept owner of the ERM process and the ownership of the risks are two different things. The process owner, the Corporate Security Unit who is acting as a facilitator, has created the tools for the ERM process. However, the busi-

ness units should own the business-related substance, which is the core element in the ERM procedure.

In addition, a suggestion for the use of the risk tool and procedure was given:

"So far the risk mapping has been practised from the down top and maybe it should be done vice versa"

This comment seems to be related to the general ERM process in Itella, where the risks have been gathered and analysed mostly by the RCs. For this reason, more risk input to the process is needed from the management's side, both in the BG- and in the Corporate -level.

"Risk workshops of a reverse engineering kind, could be done in order to understand what should be done in the future to tackle certain problematic situation faced in the past. This is lessons learned -type feedback. Also I would like to see how well the risk management tools support e.g. identifying problems with the key customers in order to react in the correct way?"

The latter suggestion is a good evaluation and an awareness method of checking how certain, e.g. the business case and its respective risk management activities, had been proceed and was there anything that should done otherwise.

5.2.3 ERM capabilities

One answer, related to the maturity and deepness of the ERM process, was rather meaningful:

"If more support for the strategic risk management procedure in the Group-level is wanted, more facilitation is needed. In addition, when the risk management process is expanded toward the operational risks also much more assistance is needed. In all our business units there are RC's nominated and they are working within their area of specific risks. For example service production has risks which are very operative by their nature and strategic thinking is not very much involved".

This answer tells that strategic risks have been sparred mostly inside this BG and when the process gets more wide spread, more assistance is needed. The same requirement also exists when the risk management process will be more extended to the operational processes. One

of the RC's was considering the risk management responsibilities within business functions and ERM integration regarding to business plans.

"Maybe business lines could take more responsibility in the first place. The RM procedure could be part of the business plan template. Holistic, cross-border team could then look at risks".

In this case, even thought BG's ERM maturity is in rather initial stage, there could be some procedures which could be taken into present managerial process.

The ERM supports BG's businesses in different ways and further developments were commented as follows:

"This process supports the BG work, but not in the strategic level because of our own RM capabilities. Some of the risks which had already been identified, where not assessed clear enough as strategic or operational risks and in terms of their economic impacts"

The characterisation of former ERM tools and reporting procedures got critics for their timeconsuming features - a matter from which lessons were guickly learned.

"The ERM tools are not an end in itself, the discussion is more important.

Quarterly-based risk oversight periods are too quick, either the cycle should be dropped down or only to report about major changes in the risk map should be concentrated"

"Final results are the most important. Do not the process too well, wide and over reporting way, because it will stop the integral part of the process – thinking and discussion". The ambition and maturity of the process must realistically match together. No reporting for its own sake, if nothing has changed. Strategic risks were handled and reported too frequently. There were mismatch with the strategic process: e.g. the reporting was not synchronised with it. Perhaps the earlier way of using ERM tools was not so effective"

Since this matter came out quite a straight way in these conversations and also in the other context, the ERM tool was enhanced and the reporting cycle changed rapidly. These answers once again revealed the fact, that the tools and reporting are essential part of any process, but the most important matter is the thinking and communication process behind them. When the maturity of the process grows and natural business linking of the ERM process is discov-

ered, steps can be taken to move on to the next phase in the ERM continuum.

One encouraging comment was also given about the present ERM tools:

"Risk Management tools are in good shape now".

5.2.4 Opportunity management in Itella

According to RC's, any business opportunities have not been so far identified through the ERM process. They had different kinds of views about ERM and its present connection to the strategic planning and business opportunities, so variations between the BG's existed. One of the RC's put it this way:

"This risk management process partly supports our strategic planning and partly not. However, the risk management process is essential part of it: our BG has already identified risks by traditional methods outside of this ERM process - business as usual. The opportunity side has not been discussed much among our MB members, but probably we should start this job from the strategic planning. New business opportunities have not been identified yet either. On the other hand, opportunity -related risk management is hard to consider as a business of only one BG. Should the ERM process done more enterprisewide than today - the process today is mostly BG based and the results of it are consolidated by CRO? Added value is surely generated already to some extent along this process, but it still is not workable enough as the corporate based approach. Should risks be considered more enterprise-wide, away from Business Group silos?"

Previous comment is a good argument on behalf of holistic approach in ERM and the necessity of the risk management process to be general part of the strategic planning. In this case the risk management process seems to be a natural part of BG's strategic planning as it should be. Although the ERM process was not considered particularly important in this role at the moment, the present ERM process was considered too much done in the silo's:

"We should go toward this type of systematic thinking, as a part of the strategic planning and should have it more wide-spread in our BG. Now the risk assessment and treatment activities are done only to the certain extent, but not this systematic and analysed way. The present process supports the strategic work in the corporate level in terms of identifying and quantifying risk as well as related to Risk Capacity-thinking. However, it does not support well enough

us, because of the lack of our risk management capabilities. In our BG, some of the identified strategic and operational risks are not evaluated well enough in terms of their economic impacts. This should be taken more into consideration when doing business strategy plans at the management board level. The process is still done in our MB-level, but it should be escalated wider in the BG".

Earlier comment tells that this BG has obviously recognised the potential and importance of the ERM process, but the extension of the process as well as the present capabilities for the implementation were not experienced sufficient enough.

A comment from one of the RC's was stressing the business opportunities potential of ERM both from strategic and operational perspectives:

"The answer to business support question is yes and no. My viewpoint is that a natural approach could be taking to the opportunity aspect. In the first step managing the strategic risks should be preferred, but later the other upside could be natural continuum for the risk management. Now the ERM-process in our BG is more or less only focusing on the operative risks, which are mostly understood as downside - something to avoid and looking at what are the threat scenarios of existing business operations. Risk and opportunity management should be tied up more to the planning procedure in order to change our business strategy execution more in the direction we want to in a mid-long term. Handling of short- and long-term risks are different. When you think about short-term risks, you are naturally more risk aware than when considering them in long-term range. When looking at the horizon, more in the future, you are viewing more matters as opportunities."

The opportunity management in general is considered as strategic issue according to the previous comment. The answer also reveals the challenges of the present business environment in that particular BG and the need for concentrate more operational risks at the moment.

One of the RC's was also considering the usage of ERM process as an aid within the strategic planning of his own BG although straight business opportunity had not gained through it so far. In addition, scenario thinking was concerned a valuable tool in the strategic planning.

"We have certain challenges to execute the vision and strategy into the concrete action plans as well as monitoring their efficiency. One possibility could be using the opportunity side of the ERM process as a link to this in the following strategic planning period. Especially how it is stated and formulated in the

ERM process instructions concerning the key targets, could be useful. So far this process has not enhanced seeking any new business opportunities in our BG".

One kind of opportunity management has already been done in one of the BG's.

"Actually few of our new business concepts have been produced as a result of opportunity thinking and risk management has also played a big part in these projects. Moreover, my opinion is that a good director does risk management naturally as a part of his or her job without thinking about the particular risk management framework. Scenario thinking could be a very useful way of benefitting, as long as it does not stay only observing the surrounding world, it should also lead to reasoning what the phenomenon could mean in the Itella context. So, we are first concentrating on risks which are affecting to our economic situation and bottom line of recent quarter. Taking more strategic perspective is another step."

5.3 Summary of the empirical findings

Most of the discussion about the empirical findings of this study has been done in parallel with the respective answers given in the theme interviews in earlier sections of this Chapter. However, I would like to highlight some points of the findings emphasise their significance in this study.

It seems that many of the ERM organisations – including the case companies in this study – have most of the ERM best practices in place, but only a few of the organisations have succeeded in seizing business opportunities with the help of the ERM process. It means in this study, where the ERM best practices have been divided into maturity –like parts as described more in detail in the next Chapter (see Figure 9), the organisations are in general quite a far away from the goals of creating new upside to the businesses. That is the case also in Itella. However, not all organisations are interested in especially to stretch their ERM process toward the opportunity management.

According to external and internal interviews - there are great deals of demand and aspiration of getting the most of the ERM process. The key factors to succeed, or in opposite, to failure in implementing the ERM process are clearly the lack of "time and understanding" and the incapability to integrate the process into the managerial system as a strategic matter. This is mostly a process maturity issue, but can occur also as a result of the communicational problems and lack of the common risk language.

The maturity of Itella's ERM process, after a few years of practise, is growing, but needs more work to do in order to progress further. Most of the challenges are related to embedding the risk management process into the management system and strategic planning in order to get the comprehensive view to the risk and opportunity management enterprise-wide.

Referring to Figure 9 below, it seems that the "ERM essentials" in general are rather well implemented in the organisations, whereas there are challenges in "ability to run, learn and develop the process" – not to mention in their ability or willingness to enhance the ERM process to be handled in a portfolio manner.

6 Suggestion for empirical framework of ERM with the opportunity management

In this Chapter, an empirical framework for ERM with opportunity management, based both on earlier described literature analysis and empirical findings, is suggested.

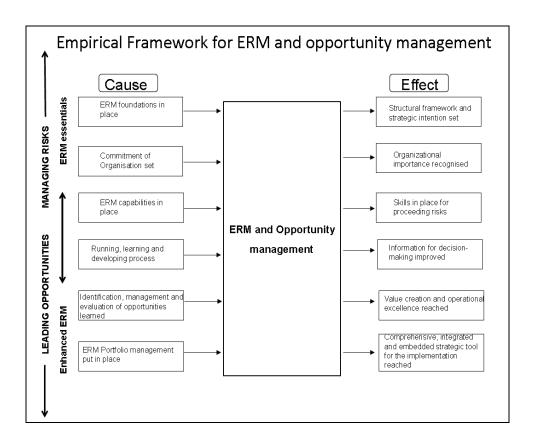


Figure 9: Empirical Framework of ERM (Laakso, P. 2010)

Six different aspects have been found which should be taken into consideration when implementing ERM in practise in terms of seeking business opportunities through the process. All of these aspects where discovered through the literature review and some evidence for their importance were reached through the theme interviews.

In Figure 9 can be recognised maturity -like ERM procedure with the respective managerial steps to develop the ERM approach of the organisation from "Managing risks" to "Leading opportunities" can be recognised. The suggested empirical framework is neither a maturity model nor comprehensive ERM framework, but a suggestion for concept with some managerial steps to be taken within the organisation being able to get the most of the opportunity side of ERM. This development can be recognised, in certain extent, when speaking about change from the traditional risk management approach to more comprehensive risk management viewpoint described earlier in Chapter 2.

Following managerial steps, with the cause and effect relationship explained, are suggested to taken into account when considering starting an ERM program:

- 1. Construct the foundations of ERM (e.g. ERM policy) so you have set a structural framework and strategic intention for the ERM work.
- 2. Get the commitment for ERM (e.g. top management) so you have got the organizational importance of ERM recognised and backbone for your further efforts in place.
- 3. Acquire ERM capabilities (e.g. skilful risk management professionals) so you have obtained maybe the most important capabilities in place for the success of ERM.
- 4. Be able to run, learn and develop the process (e.g. enhance the process when necessary and cover all risks enterprise-wide and share the risk knowledge across the organisation) so you are able to have information for decision-making improved.

In addition, when seeking the upside of ERM and to be able to utilise the enhanced ERM with opportunity management in the organisation you should as well:

- 5. Indentify, manage and evaluate the opportunities so that you are able to recognise the business opportunities and other upside already existing or to be discovered. It may be explored both inside and outside of your organisation. This is essential for the value creation and operational excellence of your organisation.
- 6. Manage the ERM as a portfolio manner so that you have comprehensive, integrated and the strategy embedded tool for the management in place for the projects, pro-

grams and portfolios by which the company strategy is implemented and put into practise.

The suggested steps are not in necessary chronological, rather parallel in their nature. However, to be able to build a sound ERM process and run it efficiently, one definitely has to first lay the foundations of the ERM, obtain the commitment of the organisation and get the adequate capabilities to be able to proceed further with the ERM. Managing opportunities within ERM process takes time, but could be seen as an enhancement in the ERM continuum at the time when the maturity of the organisation has grown and the benefits of the stabilised ERM process have been materialised.

7 Suggested managerial construction for the ERM process

Based on the empirical framework illustrated above and respective theoretical and empirical findings described in the previous Chapters, new managerial construction for ERM process is suggested in this section.

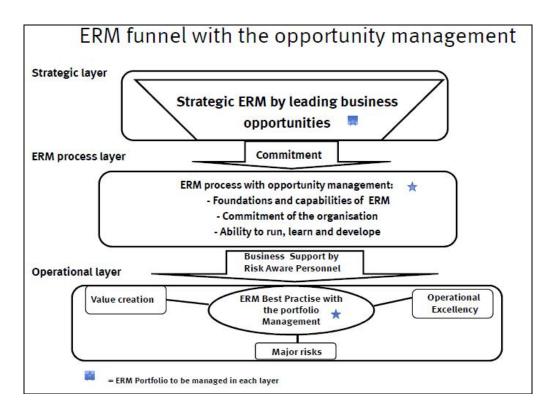


Figure 10: ERM funnel with the opportunity management (Laakso, P. 2010)

Figure 10 is a conceptual description of the suggested ERM process with the opportunity management embedded. The following steps are proposed to take in the consideration within

organisations forming a three-layer ERM funnel, which is a channel along which the observations from the business environment are carried on to the ERM process. This makes possible the utilisation of the business opportunities and of the management of the most central risks.

Strategic layer

In the strategic layer the scenario-based tools are used as a part of the strategy process in order to predict the alternative futures on phenomenal for enabling strategic flexibility when the business environment changes rapidly. The top management is leading the search of new strategic business opportunities.

ERM process layer

The ERM process layer is designed to meet the requirements for putting in place essential tools and procedures to seek the upside of the business as well as to reveal the major risks threatening the existence of the organisation.

Operational layer

The elements in the operational layer, in turn, makes possible to create value and operational excellence from the opportunities discovered within and beyond the organisation as well as protect company assets from the severe risks. On the basis of giving and getting input into the ERM process as well as creating a new business ideas and operational excellence are possible. These actions are the profound idea in enhanced ERM and could be done by the ERM portfolio management of the projects and programs. Therefore, actively seeking business opportunities and operational agility are the ultimate goals of enterprise-wide ERM.

As the future goals for developing Itella's ERM process is strongly related to embedding the ERM process more tightly into company's Strategy Process in all organisational levels, this managerial construction is based on the proposition of creating value and operational excellence. This would be done with the help of sound ERM Portfolio management including the opportunity management. Itella's ongoing ERM process, described earlier, already has many of these ERM essentials in place, but it still needs reinforcements and more maturity to reach the set goals. According to this enhanced and more detailed illustration compared with Figure 10, there are three similar layers in Figure 11 where the future ERM process could take place strongly embedded into the Itella's future ERM funnel.

In Figure 11, earlier construction could be illustrated more in detail in Itella context as follows:

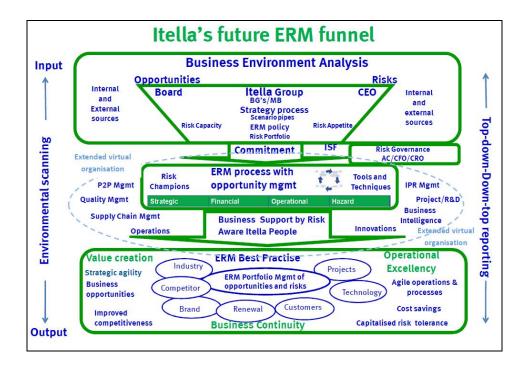


Figure 11: Itella's future ERM funnel (Laakso, P. 2010)

1. Strategic layer

The organisation is starting to scan and use scenario-based tools in strategic work to a larger extent in order to predict the alternative futures and other strategic phenomenal. This enables strategic flexibility when the risk and opportunities in the business environment changes rapidly. New strategic opportunities will be explored from internal and external sources of the business environment. This will be done within the strategy process and according to set risk appetite and capacity of Itella. The management must show its commitment to this process to be able to build enterprise-wide approach to the process. At the beginning of the ERM funnel, risks and opportunities could be recognised as a part of the strategic planning and business environmental analysis, done more systematically than today is proceeded. In the next layer, ERM process forms the middle tier where the procedural actions of ERM take place.

2. ERM process layer

Extending the present ERM process also covering units and processes is presumable and there already exists a source of knowledge and capabilities for the opportunity management in the organisation. This layer is enabling to reach the existing billets of opportunity as well as discover the hidden business possibilities in Itella. It is representing a source of new innovations or other business potential to get business benefit for the organisation. The members of aforementioned functions would be new members in the present ERM virtual team of Itella. This process could be extended to the source of new opportunities and operational excellence where the respective units and their personnel already are processing these matters in their daily work. This could be done more widely and systematic manner than it is done today in Itella. For example, people working with the innovations and other source of new businesses ideas as well as people processing the business intelligence information could participate to ERM process.

3. Operational layer

In the operational layer, the output of opportunity management materialises as managerial actions in the different areas of business enabling possibilities to implement new business opportunities and seek operational benefits in a concrete manner. The value creation for the company is managed as ERM portfolio with the help of projects and programs. In this layer, based on input and output generated earlier in the ERM process, the organisation is creating business value and actively seeking operational excellence enterprise-wide by implementing comprehensive but agile best practises of ERM.

The scanning of business opportunities and reporting of them are supposed to done top-down and down- top inside the organisation. Furthermore, in this construction the actors within the different layers can do partly the same things in the process. For example, the business environment scanning could be done in all layers, but the ERM process management would be done mostly in the middle layer. However, seeking new business ideas should be everybody's business in the organisation. The involvement for the ERM portfolio management is very essential both at the top management level and in the ERM process in general, to be able to generate the sound way of handling opportunities and risks.

8 Discussion and contribution

ERM as a new, more comprehensive risk management approach is rather a new managerial framework. It is a natural continuum for the traditional risk management, which was mainly based on insurance practises, i.e. using risk transfer as a risk management strategy. In the modern, the highly networked and globalised business world, wider perspective for the risk management was needed and the more comprehensive risk management approach was cre-

ated. In late 1990s before the actual birth of ERM, which was later materialised as COSO ERM in 2004, ideas and need for similar, more widespread risk management concept were suggested in the several risk management studies.

Itella has this far been utilising ERM two and a half years. The corporation launched ERM as a result of consulting work in 2007. The findings of that work e.g. suggested that the organisation should renew its risk management process to be more proactive. The responsibility to develop the new risk management activities was then given to the Corporate Security Unit, where the Chief Security officer was nominated to act also as the CRO. My personal interest of the ERM took place when recognising its comprehensiveness as a risk management procedure, which also could contribute the corporate security management process including information security management and could give an eminent forum to report and argue of security related matters.

Furthermore, the ultimate idea behind the ERM emphasises, that seizing business opportunities and managing risks should forge ahead side by side as supplemental and strategic managerial aspects in the organisations. So, risk and opportunity could be considered as the two different sides of the same coin. As controlled, probability and impact in focus, risk-taking belongs today's company life and is an essential part of the business. Without this aspect, the organisation is the most probably not competent at its market. The risk management pioneer, Mr. James W. DeLoach has put it this way: "Risk is a partner of opportunity" (2000, xi).

However, some allegations have been made about ERM's ability to create added value in the organisations. In addition, the hype around this framework has been very concrete, especially after the Sarbanes-Oxley Act (SOX), which is requiring companies to ensure the correctness of their financial reporting in respective organisations. This and other financial regulations have made consultants world-wide to consider new business opportunities. As a result of this fulsome whirl around of ERM procedure, introduced in the first place as an effective managerial practice, it has suffered some drawbacks in terms of its public imago. This aspect came also partly into surface in the theme interviews and texts in the literature review in this study. Furthermore, this subject is a constant talking point while meeting risk management colleagues.

On the other hand, the alleged abasement of ERM is not its own fault. In my opinion, this framework indeed has good building blocks for the success of the company. The point, however, is that the wholeness of the comprehensive approach for the risk management to be wide-spread enough does not have to be called "Enterprise Risk Management". As long as the risk management process have all needed elements inside to proceed further from the narrow-minded risk avoidance approach to contain also opportunity side of the business phe-

nomenon, that enough - no matter how this risk management framework is called. Not even it is important, which particular unit in the organisations is the leading edge is this procedure.

However, without question, the people participating this process need new skills and the organisation they are working for transparent communication company-wide to succeed in this task. Some organisational barriers and attitude hurdles must be exceeded - both in the top management and among the risk management professionals. May be business people in line should concern more about severe risks than earlier and risk professionals could respectively learn more about the opportunity side of the risks and other phenomenon in the business environment? Perhaps, this way a more balanced view of risks and opportunities in the organisations could be accomplished? I hope this study contributes related discussion.

8.1 Practical contribution

This study process itself has been very fruitful exercise for familiarising myself with the ERM. The empirical data collection phase and other discussions in and outside of the organisation have already given some practical ideas for the improvement of the Itella's ERM procedures. Some of these ideas have already ended up on the present risk management tools and the supporting documentation of ERM process.

Seeking business opportunities in a comprehensive manner has been described and proposed in this study as a favourable goal and benefit of the enhanced ERM process. However, according to several studies, it seems that not in many companies where the ERM process already have been put in place, have a clear road map or respective action plans done to get the most of the process. This probably means that many ERM organisations do not actively and explicitly look for new business opportunities with the help of ERM process. There may be various reasons for that. Organisations for example may lack some of the ERM essentials, i.e. skills or commitment as described earlier more in detail in this study.

According to literature review and especially discussions in the theme interviews gave rather controversial empirical evidence about organisations abilities - and most of all - their commitment to benefit from the upside of the risks in a more systematic way. The practical contribution of this work, I hope for, is to provide a simple empirical framework for the ERM, to help organisations considering to start ERM initiative to recognise the benefit and organisational requirements of ERM. Furthermore, one may find some practical advices for the implementation of ERM. At least this study gives maturity model -like generalisation of the needed ERM steps and could be used as a managerial introduction to the ERM. Most of these ideas have been evaluated and also put in place in Itella, so there is practical experience of

the pros and cons' of the process. However, the future ERM funnel and the application of its extended features are still waiting for the implementation in Itella as well.

The future possibilities of the opportunity management capabilities described in this work will be presented in the Itella Risk Champion Forum, that acts as Itella Enterprise Risk Management Steering Group. In the following has been enumerated some future thoughts of enhanced ERM practises to discuss within the organisation. Some of these aspects may be recognised also from the ERM funnel illustration, Figure 10:

- Repository for the opportunity management cases
- Cooperation between internal units and peer-to-peer organisation including Business
 Intelligence and Innovations
- Future research and scenario pipes more strongly involved in the strategy process
- Source of opportunities reinforcing existing capabilities to recognise new sources of operational excellence and innovations
- Risk and opportunity ownership embedded to job responsibilities and connected with the Balance Scorecard metrics or other compensation procedures
- Supply-chain, Purchasing and subcontracting related risk management considered more as a source of strategic and operational opportunities, while also severe dependence risks are to be considered

8.2 Theoretical contribution

Within most of the case companies, including Itella, have not developed any specific concepts and capabilities for the opportunity management in ERM. In this study one simplified model for the fundamental aspects needed in the development of ERM process has been described. Furthermore, the essentials for developing the continuum of the ERM process in order to reach new business opportunities were presented to be used as a framework to enhance one's risk management process. The suggested framework widens the traditional ERM proceedings into some extends and emphasises more the upside of the risks.

As a managerial construction, this introduced concept of ERM funnel seems to be novel. As far as the author knows, this concept within this context has not been mentioned earlier in the academic literature or texts written by ERM practitioners. On the other hand, one finding has been done, in which "ERM funnel" was considered from the auditing perspective and is regarding to ability to cope the risk information during the audit process. According to Sobel: "The funnel metaphor is helpful in understanding ERM; that is, ERM provides a structured and disciplined process for reducing the amount of data from each stage to a more manageable level in the following stage" (Sobel 2005, 2.03).

However, from the innovations' perspective, the concept of funnel is rather an old structure and it may be fruitful to do some comparison between these two concepts. When compared to a traditional innovation funnel there as similarities and differences between the structures, which is discussed more in detail after the first defining the innovation funnel. One definition for the innovation funnel is: "The innovation funnel provides a solution for explicitly defining the information requirements for managing the innovation process. The funnel illustrates how innovation goals, innovation actions, innovation teams and innovation results interact with each other to create change in any organization". (The Innovation Funnel, 2010.)

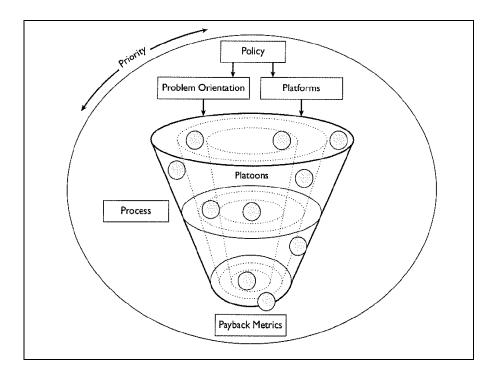


Figure 12: An example of the Innovation funnel (Kuczmarski 2001, 41: "The Guaranteed Innovation System")

In Figure 12 is described one illustration of the innovation funnel. According to Kuczmarki et al. 2000 a successful innovation funnel should be designed to meet the specific needs of the organization and the resources must be allocated in a balanced manner. In addition, he enumerates as a mnemonic manner seven components that are essential to create a sound innovation process: priority, policy, problem orientation, platform, platoons, process and payback metrics.

With the priority, he means precedence in time, order, and importance. Policy in turn expresses the goals, expectations, and success criteria for the innovation, as well as alignment

of the resources for it. The problems orientation in this context means solving effectively customer needs by generating new ideas and concepts based on customer research. Platforms represent underlying technologies and capabilities in which a company invests to generate a portfolio of different products, applications or improvements. The term platoons, in turn, refer to the amount of people organisation needs in its all level to create and manage their innovation initiatives. The process - which seems to be obvious part of the innovation funnel - is an essential set of tools that the innovators use to give form and substance to the company's innovation priority and the initiatives stated in the policy. Also metrics for estimating the return of innovation is essential, but rarely used in the organisations. (Kuczmarski 2001, 59 - 223.)

The similarities of these two funnels are obvious and related to organisations ability to benefit business opportunities in a structured manner and portfolio approach. Thus, as described earlier, ERM funnel could be seen as a collector on the potential billet of the success of the enterprise - the same way as the innovation funnel in its own field. However, the traditional risk management aspect is also inside the ERM process and described in the ERM funnel procedure. In other words, ERM process also includes the "security-side" and can be seen as a sort of barometer when it comes to organisations ability to estimate risks that could endanger the single business or the existence of the whole company. Thus, ERM and its opportunity aspect are seen as an extended part of the successful and widely understood the risk management process.

The simplified standpoint for the comparison of these funnels could be, that the ERM funnel as a managerial construction is an umbrella where both the positive and negative incidents in the business environment, observed by the people of the organisations, will be managed in the comprehensive manner. As to the innovation funnel, there is "only" handled the possible source of the new product, services or other inventions; whereas enhanced ERM has more holistic view for the innovations and other source of business possibilities.

However, in the theory part of this study described earlier, project-, program- and portfolio management already exist such practises in implementing the company strategy in organisations, which instruments also belong to the innovation management in an organic manner. Thus, the innovation funnel is well known and a organised method for contributing to search business novelties, where as the described ERM funnel is supposed to be a high-level contemplation for the managerial aid of the top management to run the business more comprehensive manner.

8.3 Short managerial implications to consider

In the following is presented in a random order some notions of the ERM to consider based on the best practises and my own experiences:

- The ERM process cannot be more mature than the business process it is supporting tosupport the business from its own starting points.
- ERM takes time to progress, especially in a big company. It may help the implementation if already existing management structures and procedures are used in the ERM process
- Proceed step-by-step When the organisation is ready, use more comprehensive risk management tools and reporting. No matter what, avoid excessive reporting.
- Ensure that the communication climate is clear and everybody is eligible to speak up also about difficult issues in a straight but respectful manner
- ERM practitioners need good understanding about the business and wide general knowledge. Prove that you are internal strategic partner for the management
- "One ERM fits for all" does not exist; ERM is a managerial matter, which should be adjusted with the company culture and its business environment
- Do not get stuck to ERM jargon; ERM is only an acronym for describing the more comprehensive approach for the risk management, it is not important as it own.
- Without a Board level sponsor, the ERM implementation is like a dragging a ball and chain

8.4 Limitations of this study

This study has typical limitations. First of all, components regarding to the ERM best practises are already available and mentioned in the ERM method literature such as ERM frameworks and maturity models. From that point of view, there are hardly any novel suggestions in this study concerning essential ERM procedures. As every organisation has its own business environment and culture, including the management system, it is rather difficult to say exactly what kind of ERM practises the organisation need. At their best, the result of this work can be generalised at a conceptual level.

Furthermore, the empirical evidence achieved from the findings of the theme interviews only partly supported the theory suggested. In addition, the requirement for the constructive research method to test the practicality of the new construction - if there is any - it is practically impossible to show within the timescale of this study. One can also challenge this study and its findings to be too optimistic in terms of extending the limits of the opportunity management in ERM, i.e. the enhanced ERM with the opportunity management pushed too far away from its own field of practises.

The question, whether there really is something new in this approach called Enterprise Risk Management remains. As earlier described, the risk management in its traditional form has rather old roots. Opportunity thinking as well has existed every since the human beings have acted as a society and later as a part of other managerial practises in the businesses. In addition, most of the actions described belonging the risk and opportunity management, have been managed somehow separately in the organisations without being aware of it. Then, what makes the difference? In this study, ERM was considered earlier to have three characteristics to be considered as "exhaustive": integrated, comprehensive and strategic. All of these aspects are also easy to consider as qualifications for the good management systems. Ultimately, in my opinion, there really is nothing novel in these facets as considered separately, but when observed them as a whole ERM procedure they may add value in the organisations.

8.5 Opportunities for further research

During this research project, three research topics raised into the surface for further studies. There seems to be the need for study more the ROI for the risk management process. The other subject is closely related to the first one: how to convince especially the middle management the necessity of the risk management process and its relationship with the organisational effectiveness. In general, the security and risk management related procedures and their real business benefits to the organisations – including the ERM process as a whole – would be rather interesting and valuable subject to study further.

Furthermore, as every managerial procedure in the organisations, also ERM is very much dependent on good social skills, which already has been considered in this study. However, the challenges to proceed further in ERM with opportunity management integrated seem to be very much related to some kind of principle question: where in the organisations the strategic matters should be managed? The answer may be obvious, but arises another question: if the strategic issues are managed in the top management - where they should be - how much of that information is shared as an input to the ERM process and what are expected to get in return as output? So, based on this question, the third area for further research regards to

action research: how should the enhanced risk management process (may be not entitled as "ERM") be integrated more in detail into the organisations in order to get acceptance as a value adding process? One overall framework is described in this study, but much more research is needed.

9 Conclusions

In this study has been described an empirical ERM framework which is neither a maturity model nor comprehensive ERM framework, but can be defined as a conceptual suggestion to get the most of the opportunity side of ERM. In addition, based on the empirical framework and the respective theoretical and empirical findings behind it, ERM funnel as a new managerial construction for ERM process was suggested. This development trend of ERM can be recognised, in certain extent, in some advanced and economically successful organisations already today.

While writing this report the world's biggest automobile manufacturer Toyota was - and still is - struggling with its worldwide quality problems. The company which has former been a synonym and case organisation for the quality and opportunity management is suffering with the brake issues of the millions of its new cars. This is considered a severe blow to the brand of Toyota, which has thought to be very reliable so far. What has happened to company's rewarded quality system and processes within it? Furthermore, the BP owned and damaged well continues to spread oil across the northern Gulf of Mexico since late April, and is now estimated to be one of the worst environmental catastrophes ever. The aforementioned devastations tell unpleasant stories about the uncertainty of the existing world, where the operations of nations and the organisations have to be adjusted to. On the other hand, these manmade disasters may have been avoided, or at least mitigated, by the means of well-managed and advanced risk management procedures.

This study has aimed its observations mostly in understanding the source of both strategic opportunities and risks that could cause large scale consequences. However, it is also good to understand that "the Black Swans" - high-impact and hard to predict events may cause long-term or irrecoverable environmental disasters or other major impacts. Thus, in the globalised and complex environment, where the organisations are large in size and their business operations are multinational and interconnection with each other, the management needs new tools and perspectives to benefit with the two very ultimate and merging dimensions belonging to the successful business manoeuvres: the risk and opportunity.

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Questions of theme interviews

External interviews:

- 1. General background and ERM-organisation?
- 2. Risk assessment, evaluation and tools in use?
- 3. Risk management strategies and principles in ERM?
- 4. Development, measurements and monitoring of ERM
- 5. Involvement, roles and responsibilities of top-management?
- 6. ERM implementation what is the difference between now and the past?
- 7. Descriptions of risk capacity and –appetite?
- 8. How is risk maturity is measured?
- 9. ERM Integration to strategic management?
- 10. Any new business opportunities found or help in fulfilling strategic business objectives?
- 11. The most challenging risks and how to tackle them?
- 12. The biggest obstacles of ERM-work?

Internal interviews:

- 1. Does the ERM process support the strategic objectives of your Business Group and Itella Corporation?
- 2. What are the most central challenges to carry out the ERM work?
- 3. How could the ERM process be developed?
- 4. How strong is the support of your Group's management team in the ERM work?
- 5. Have new business opportunities been found or reaching of strategic goals helped with the ERM process
- 6. The biggest obstacles of the ERM work?



Policy 1(3)

Appendix 2

10.2.2010 Public

Approved by Itella Board of Directors, 10th Feb 2010

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Itella Enterprise Risk Management Policy

All business is bound to risk. Risk is reckoned as a component of value creation and it needs to be proactively managed. Risk management is part of business management and as such a continuous activity.

This policy specifies the goals, responsibilities and practices of Enterprise Risk Management at Itella Group (hereafter Itella). The main objective of Enterprise Risk Management (hereafter ERM) is to safeguard achievement of Itella's strategic and key targets from unexpected risks and to enhance Itella's business opportunities and corporate image.

Itella's senior management is strongly committed to enhancement of ERM. This policy is approved and owned by the Board of Directors of Itella Group.

ERM at Itella is developed in line with the methodology and best practices of COSO (The Committee of Sponsoring Organizations of the Treadway Commission) Enterprise Risk Management – Integrated Framework. In addition to COSO ERM, A Risk Management Standard published by FERMA (Federation of European Risk Management Associations) is acknowledged in Itella's ERM development.

Objectives

ERM is an integral part of Itella's management system. It is directly related to and linked with Itella strategy creation process, where its main objective is to provide assurance on how enterprise's business strategy will perform under different scenarios and events. Thus, ERM directly supports continuity of Itella's business operations.

ERM is designed to identify events that could affect the company and its strategic performance. These events can be either positive or negative in impact. Opportunity is the possibility that an event will occur and positively affect the achievement of objectives. Risk is the possibility that an event will occur and adversely affect the achievement of objectives.

The fundamental goal of ERM is to provide reasonable assurance that the enterprise achieves its key objectives and strategy and is capable of optimizing its opportunities. Achievement of key objectives should not be done at any cost; enterprise must compare its risk portfolio with its risk appetite and risk capacity on a regular basis to ensure that the portfolio is in balance. Risk appetite is the quantum of risk that the Group is willing to accept given its capabilities and the expectations of its stakeholders. Risk capacity is the maximum risk that the Group can bear in a fiscal year.

As ERM is to support the achievement of an enterprise-wide view on opportunities and risks, it must also be comprehensive and holistically cover all types of risks across the enterprise and be embedded with all important business processes, all business areas and all levels in the organization.

ERM's ultimate goal is to optimize risk, return, growth and capital for the enterprise as a whole.

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Roles and Responsibilities

The Itella Board of Directors owns and approves Itella Enterprise Risk Management Policy. Audit Committee oversees that ERM is implemented and works efficiently. Audit Committee also reviews regularly the Group level risk portfolio. Chief Executive Officer (CEO) and Chief Financial Officer (CFO) are responsible for organizing the design and efficient implementation of ERM processes. Itella Management Board (MB) approves Itella ERM approach and reviews regularly the implementation of ERM process as well as Group level risk portfolio.

ERM is an integral part of Itella's management processes. Hence core implementation activities are taken care by the line management of Business Groups, Business Units / Lines and country organizations. The line management is responsible for embedding ERM into strategic management, daily operations and business processes, including respective services operated by third parties. For example, Business Groups are responsible for defining, what kind of risks and changes in risk valuation are to be reported within line management and / or in matrix from Business Units / Lines, country entities and third parties providing services for them.

Each Business Group, Business Unit / Line, country organization and named critical Group Function has a nominated Risk Champion, who facilitates and drives the risk management activities in the organization. Business Units in this context include also independent units, such as Itella IPS Oy and NetPosti.

Critical Group Functions in this context include Sales and Marketing, Group Treasury, Group Business Control and Finance, ICT Services, Communications, Group Legal, Facility Services, Group HR, Itella Sourcing and Corporate Security. The criticality of Group Functions from the ERM perspective is evaluated on a regular basis by MB and organizational coverage is adjusted accordingly.

Every Itella employee is responsible for managing risks related to own work and for communicating identified key risks to the line management.

With respect to development of Itella ERM methodology Itella Strategy Forum (ISF) acts as a Steering Group. Chief Risk Officer (CRO) of Itella is in charge of supporting the implementation of this policy, coordinating Group level risk consolidation and developing ERM methodologies. CRO reports to CFO. Business Audit function assesses the coverage of risk management and supports in risk identification.

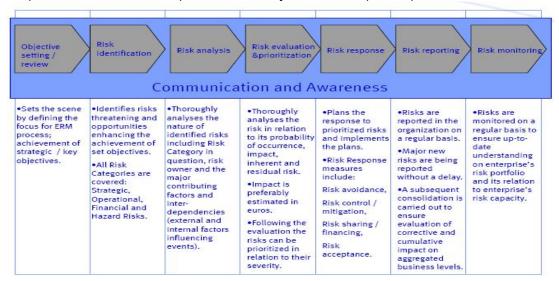
Risk Management Process

The core components of Risk Management process include: 1) Setting and/or review of (strategic) objectives, 2) Risk identification, 3) Risk analysis, 4) Risk evaluation and prioritization, 6) Risk response, 7) Risk reporting and 8) Risk monitoring.

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The picture below illustrates the process and the objectives of each process phase:



In addition to corporate strategy process, the illustrated risk management procedures must also be applied to the following business decision processes: M & A including outsourcing of activities, development of new business operations, products and services, large capital investments, major changes in operations or mode of operation and other major programs and projects.

ERM as Part of Corporate Strategy Process

The timing of key ERM activities is closely connected to other strategic and business planning actions as defined in Itella's corporate strategy process.

ERM should be present already as of the first steps of corporate strategy process, when the learning from the previous year is extracted and business environment trends and phenomena including strategic risks and opportunities are identified and analysed systematically to understand the key drivers of strategy environment.

On the Business Group level, as part of strategy formulation a more detailed risk management process is carried out as described above. A holistic risk analysis and communications especially between Business Groups and Group Functions must be carried out to ensure adequate understanding on risk and corrective response by risk owner.

ERM is also required to provide with support to efficient strategy implementation. Due to this, as instructed within the Group Strategy Process, Business Units / Lines, country organizations and Group Functions are required to formulate their own strategies and / or annual plans including identification, analysis and response to opportunities and risks. The organizations are expected to use the Corporate and Business Group Strategies as an input for their own planning. In this process the strategic Group and Business Group strategic objectives and risks are integrated in the annual action planning and target setting for the coming year.

Risks and controls are monitored and reported on a regular basis on all corporate levels.