

Deriving Value from ORSA

Board Perspective

April 2015

This paper has been produced by the Joint Own Risk Solvency Assessment (ORSA) Subcommittee of the Insurance Regulation Committee and the Enterprise and Financial Risk Committee of the IAA and has been approved by both committees.



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Preface

Why is ORSA relevant today?

Insurance company management and boards of directors follow processes to assure themselves 1) that they have the financial resources available to accomplish their objectives and 2) that they can utilize these resources in an efficient manner. Since insurance companies are in the business of taking risk and have the primary objective of fulfilling obligations to policyholders, they must maintain financial resources (capital) to absorb fluctuations in financial results. To determine how much capital is required and to assess capital adequacy, some insurers have relied solely upon the requirements, standards and processes promulgated by regulators and rating agencies. Regulatory and rating agency capital requirements are determined based upon large market segments and hence they disregard the specific risks to which any individual insurance company is exposed. As a consequence, these capital requirements may be too conservative or too optimistic for any given insurer. Because of this, many insurers have spent considerable analytical resources to make their own internal assessment of risk, and of the adequacy and efficient use of their capital.

In response to the IAIS Insurance Core Principle ICP 16, many regulatory regimes around the world now require (or are in the process of developing requirements for) insurance companies to perform own risk and solvency assessments (ORSA) as part of effective risk management systems. New risk-focused regulations require the formalization of ORSA processes and the submission of reports that summarize the results of ORSA processes to regulators on a periodic basis. Regulators are expecting that reporting on ORSA will result in major changes in their own understanding of the inner working of insurers with regard to what they consider to be an issue of highest importance – the maintenance of adequate capital levels for the risks to which an insurance company is exposed, now and in the future, under both expected (baseline) and stressed conditions. Regulators are expecting that ORSA reports will reveal the degree of rigor that is applied by insurers to their ORSA processes and therefore indicate the commitment of the board and senior management to these processes.

As is often the case with the introduction of new regulatory requirements, the simple concept of reporting on an internal management process has taken on a life of its own. The minimum standards for what the regulator is expecting to see from an insurance company's ORSA may be far in excess of the ORSA and risk management processes that many insurers have historically had in place. And the documentation requirements for reporting to the regulator are a far from trivial additional work requirement.

What is ORSA?

ORSA is an ongoing process by which a company's senior management team routinely assesses its own risk and solvency position; it provides a declaration of the company's assessment of its position in terms of profit, risk and capital, both now and in the future, under different scenarios and relative to the company's appetite for risk. ORSA needs to consider and be consistent with an insurance company's business strategy and the business planning process.

ORSA should consider risk and solvency both from a purely economic view and by applying the regulatory requirements, should reflect the material differences between the two, and should

demonstrate that the company's resources are adequate considering both views looking forward over the time horizon of the business planning process under both baseline and stressed conditions.

The ORSA process consists of several major steps along a cycle of appropriate length. The major assessment process of ORSA needs to be carried out on a regular basis and whenever the company experiences a significant change in its risk profile and before major strategic decisions are made.

The main findings of the assessment should be thoroughly analyzed by management and be reported to the board. The ORSA process should be self-reflective, identifying the potential weaknesses and points of improvement of the ORSA process itself.

Introduction

An Executive Board (the Board) has a significant role to play in 1) overseeing management's assessments of risk and solvency and in 2) challenging ORSA results as they are communicated by management. The purpose of this paper is to provide members of the Board insight into the value of the ORSA process – regardless of the specific implementation and requirements for ORSA in a given regulatory environment - and to establish Board expectations for the information that senior management should routinely communicate to them.

Simply stated, ORSA provides a declaration of the company's assessment of its position in terms of profit, risk and capital, both now and in the future, under different scenarios and relative to the company's appetite for risk. ORSA (provided it is effective and clearly communicated):

- 1. Enhances the information basis for Board decisions:
- 2. Provides an understanding of the company's risk profile going forward (how the evolving risk profile relates to the risk appetite under the various alternatives, including major risk drivers, and the capital resources available to support current and emerging risks);
- 3. Increases credibility with regulators or supervisors; and
- 4. Helps build/maintain risk awareness throughout the company.

ORSA is not just a report or an outcome. It is an ongoing process that a company needs to carry out on a regular basis and whenever the company experiences a significant change in its risk profile, and before major strategic decisions are made. Management is responsible for developing and maintaining ORSA processes that respond to the strategic and risk-taking objectives of the company. The true value of ORSA can only be realized when ORSA becomes integral to management's strategic decision-making.

Effective ORSA reporting will enable the Board, in their role of protecting the viability and reputation of the company, to review and challenge management's strategic decisions and recommendations. Boards that have ORSA communicated to them clearly will be knowledgeable about the risks to which their companies are exposed, and the effectiveness of the ERM practices deployed by their companies for evaluating and treating risk. They will ultimately be in a strengthened position to challenge or approve management's risk-based decisions. The success of ORSA processes within any given company will depend upon the strength of a company's risk culture, which is supported - and strengthened - by the commitment of the Board itself.

Understanding the company's risk appetite and risk profile

A significant result of a company's ORSA process is a deepened understanding of the company's risk profile from the perspective of the company's ongoing viability, also called the "solvency risk profile". In the ORSA process, the company assesses all material risks that may have an impact on its viability, from either an economic or a regulatory perspective, and with regard to risks that are both quantifiable and those not readily quantified. This solvency risk profile is a reflection of the contribution of each of those material risks to the total solvency risk of the company.

In their oversight capacity, Board members become deeply familiar with the revenue or profit profile of a company, though the word "profile" is seldom used when looking at premiums or profits by line of business. While it is interesting for the Board to know about profit margins (or profit per unit of premiums), it may be much more important for the Board to regularly discuss with management different levels of profit per unit of risk, information that is available because of the development and communication of the risk profile through the ORSA process. This information can lead to strategic discussions with management about the reasons for participating in businesses with lower risk-adjusted profitability, company plans for growth of businesses with higher and lower risk-adjusted profitability targets as well as plans for the improvement of risk adjusted profitability over time. Similar discussions will consider non-quantifiable risks such as reputation risk.

In addition to revealing the sources for and levels of risk among the businesses of the company, the risk profile also provides a measure of total solvency risk. Attention to this quantum can lead to another vital discussion with management about acceptable levels of solvency risk. For some risks, companies may have a maximum level of acceptable risk. But because insurers are in the risk taking business, and in particular for those risks that are the primary business of the insurer, this acceptable level of risk may have both a minimum and a maximum. This band of acceptable risk is referred to as the risk appetite. A company's risk appetite, once determined by management and reviewed by the Board, can be treated as a budget. When the aggregate risk profile falls outside the risk appetite of the company, management has the responsibility of managing risk activities and only reports to the Board after risk actions have been taken. However, should management contemplate an action that would result in an aggregate risk profile that exceeds the risk appetite, then the Board would need to be consulted in advance and give consent before such actions are undertaken. A Board that is highly involved in risk related decision-making may want to set a risk appetite that is only slightly in excess of the planned risk profile. This might be the case for an insurer that faces very tight constraints from external parties such as rating agencies or regulators on the level of their risk profile.

An insurance company often describes its risk profile within broad categories of risk such as insurance, market, credit, operational, strategic, and liquidity risk. Usually, an insurer will further define insurance risk into major sources of volatility such as mortality, morbidity, catastrophe, non-catastrophe underwriting and reserve risks. A life insurer may also include a major category of asset-liability risk to reflect the fact that the risks of many long term life insurance products are intertwined between the obligations to policyholders and the investments purchased to fund those obligations.

Risk profile and risk appetite assessments and related discussions form a major part of the ORSA process and can be a very helpful way for the Board to be kept aware of major changes in the business. These discussions should be undertaken whenever management proposes

mergers & acquisitions, entering or exiting lines of business (new products), territories (business units), or distribution networks or other major changes in its business model. The degree to which proposed new activities result in diversification or concentration of risk, and whether the resultant aggregate risk profile will fall within the risk appetite become a major part of ORSA discussions between management and the Board. A major consideration in all of those discussions will, of course, be the change in profits and risk adjusted profitability that is expected to result from management's planned actions.

Assessing the adequacy of the risk evaluation and risk treatment processes

Identification

Although insurance companies are exposed to similar types of risk overall (e.g. insurance, market, credit and operational risks), there is no such thing as a benchmark risk profile. Management is responsible for making sure that the company's ORSA process is capable of identifying the unique nature of the company's risk profile, the changes in the risk profile over time, the major drivers of these changes, and reporting this information in a timely fashion.

The Board will only be able to trust ORSA information reported as reliable and useful if the Board understands the linkage between the major individual characteristics of the company's risk profile and the management of risk including capital requirements. Periodic ORSA Board reporting by management, or more specifically, by the risk management function, enables the Board members to satisfy themselves that there is sufficient compatibility between management's business judgment and the ORSA findings.

Priorities

Through ORSA reporting, management will present and seek the Board's consideration of individual risks that have the potential of materially impacting business goals (either adversely or favorably), and the correlation or diversification effect among or between all risks. However, not all elements of the company's risk profile are equally demanding of the Board's attention. It is senior management's responsibility to provide the Board with a prioritized evaluation of all major risks on a periodic basis to enable the Board to effectively challenge and advise management on its evaluation and treatment of risk, including an assessment of the limitations of the evaluation itself (such as with models used).

Quantitative vs. qualitative evaluation and treatment of risks

Strong ORSA processes consider the nature of risks and the most effective means of evaluating and treating material and relevant risks within a company's risk appetite. Not all risks are either quantifiable or worth quantifying. As Einstein put it, "Not everything that can be counted counts – and not everything that counts can be counted." Risks having a material quantifiable impact on the balance sheet should be suitably modeled; using these models, the company's viability may best be protected by holding appropriate levels of capital. However, certain risks that could equally be material and quantifiable may still be treated better by using appropriate risk treatment techniques rather than capital. For example, liquidity risk could be material and quantifiable (such as through liquidity (reverse) stress tests) but may be better treated with a robust liquidity policy overseen with a good governance structure. Certain operational risks may be modeled and hence may contribute to a company's required capital, but it is perhaps more important to protect the firm through an operational risk management policy that applies to

management and all staff which contains carefully designed controls. It is important to note that the use of various risk treatment techniques such as reinsurance or hedging may in fact expose the company to other new risks such as credit risk and these too will need to be addressed in company's ORSA process.

Management needs to make sure that the company's risk management system addresses the risks to which the company is exposed in proportion to the nature of these risks, and ORSA reporting will enable the Board to understand the evaluation and treatment of both quantifiable and non-quantifiable risks over time. In fact, an ORSA process most significant to the Board may not come from the ORSA information shared at a single point in time but through the comparison and analysis of results over time. Since the ORSA process will reflect both actual outcomes and management's future expectations regarding the company's risk profile in relation to the firm's profits, risk and capital position over time, it is the changes to management's expectations that may provide the Board with the most meaningful insight.

What-if analyses

Perhaps the best way to evaluate the impact of risks is the development of a set of carefully designed what-if analyses or stress and scenario tests. Such analyses should include both qualitative and quantitative considerations. The starting point for such analyses is a series of scenarios that express certain adverse future events that will affect solvency and management's potential responses to such events should they occur. These scenarios should be consistent with and proportionate to the nature, scale and complexity of the risks to which the company is currently or may be exposed. Dependencies / correlations should appropriately be incorporated in these evaluations.

As these analyses tend to serve as fundamental risk evaluation approaches within a company's ORSA process, Boards should be made aware of the appropriateness of the economic, strategic and operational scenarios tested. Boards will benefit by having a clear picture about how resistant and resilient the company is to such adverse scenarios. As a consequence the Board may become more informed about management's strategic decisions presented to them through understanding the company's ORSA position before and after a major change.

Capital and resource adequacy

Management routinely assesses the adequacy of available financial resources to fund strategic alternatives or unexpected outcomes, and presents these results to the Board through ORSA reporting. Often, capital adequacy will be evaluated from both an economic and a regulatory perspective, ensuring that the company is able to meet its obligations along the business planning horizon. At any point in time, the company's ORSA may reveal that an insurer has a positive or negative gap of available capital to that required by the company. This result may in turn support alternative capital management strategies proposed by the company.

ORSA should be undertaken regularly to understand how the company's capital need itself changes in relation to the company's changing risk profile. Making sure that the company has adequate financial and operational resources to pursue the intended business strategy is one of the cornerstones of ORSA. The forward looking perspective of ORSA has to be understood to encompass strategic options that may be taken in the future.

Emerging risks

The Board should be made aware of those risks that may threaten the company in the future

even though they may not be visible or material when standard evaluation techniques are used in the ORSA process. Special attention is needed to identify such risks using input from both the Board and the company. What-if analyses can be useful for assessing the potential impact of such emerging risks on the company.

Model validation and governance

ORSA processes may rely upon complex models, which in turn may introduce significant model risk. It is important to assure that models being used are subject to independent validation, and that there are appropriate controls around the inputs to the models (including assumptions and the quality of data), changes to the models, model outputs, and model execution.

Regular review of the ERM framework

It is in the Board's best interest that each and every major part of the ORSA process continues to be fit for purpose. Elements of the ORSA process may have been appropriate at a single point in the past but due to various changes they may no longer be fit for purpose. These elements include the identification and treatment of material and relevant risks, the risk evaluation processes and tools used by the company, and the alignment of ORSA processes with the company's business planning process Regular assessment of the whole ORSA process, even if the result is that no change is necessary, should be part of the ORSA process itself. Periodic independent reviews of the entire ERM framework will benefit both the company and the Board.

Understanding management's strategic risk-based decisions

As discussed earlier with regard to a company's risk profile, ORSA has the potential of shifting the Board's discussion with management away from a strict focus on growth and profits. It can lead to a more holistic understanding of how management balances and ultimately plans to optimize the risks it takes on, the return that can be expected, and the capital required to support the business plan. Management that do this effectively take their company's ERM processes to a new level – away from simply identifying key risks and assuring that adequate risk mitigation controls are in place - to a strategic risk orientation. Such an orientation requires management to assess critically which risks it is willing to take on. It only considers risks within the company's stated risk appetite. It then goes on to evaluate the potential return made possible by accepting the risk and the regulatory and rating agency capital that will be required, before accepting the risk. Strategic risk management therefore becomes an integral part of building shareholder value. To evaluate whether the company is moving in this direction, the Board should consider challenging management to demonstrate how each new major risk taken is consistent with the adopted risk strategy and the returns on capital expected from the venture.

Another aspect of strategic risk decision making involves a keen understanding of how risk can be diversified within the company. Generally speaking, taking on new risks that are loosely or even negatively correlated with a company's current risks can lead to more effective management of the overall risk profile. However such diversification is not always easy to achieve for two reasons. First it is often difficult to understand and appreciate fully the correlation among various risks, particularly under stressed conditions. A full understanding requires not only studying the conceptual underpinnings of the various risks, but often requires data that can demonstrate the level of correlation involved. Second seemingly independent risks

can become much more correlated during extreme events as illustrated during the September 11th terrorist attacks and the 2008 economic crisis.

Moreover, the objective of diversifying risk must be carefully balanced with a cautious assessment of potential new ventures whose risks are not fully understood. New markets or product lines that potentially diversify the company's risk profile may seem attractive. However the company may suffer losses due to the company's lack of experience and lack of business processes required to operate in these unknown areas.

The same type of approach and considerations apply to the overall strategic planning process itself. Before adopting a strategic plan, the Board should receive sufficient information to ensure that management has identified and quantified the risks inherent in various alternatives, and that sufficient risk mitigation plans have been developed to limit the risk associated with execution of the plan. Management should also explain to the Board the uncertainty in the quantification of risk, and the time to discovery of the actual experience, as this information itself may influence the decisions on how much risk to accept.

While the process of ORSA can be daunting and involve the assessment of many sources of risk, Board members will want to receive sufficient information from management to ensure that both management and the Board are focusing on critical decisions, such as those that address material risks in a manner that drives superior performance vis-à-vis peer competitors. For example, the Board or its risk committee may want to focus all of its attention on understanding management's approach to addressing a handful of the company's most material risks, after mapping and ranking risks in terms of severity and frequency. Also, attention should be focused on any material risks that are unique to the company. For example, a holding company with both insurance and non-insurance operations would be well advised to understand the reputational risks associated with the combined operations as well as the diversification benefits such a structure offers.

Limitations and caveats

Boards should be aware of risk associated with the ORSA process itself. The main risk related to an ORSA process emanates from **incompleteness**, or from **overly complex assessments**. Other important risks result from either **over-reliance** (trusting ORSA too much) or **under-reliance** (trusting ORSA too little).

While the first mentioned risk is permanently present, the other is often emerging over time.

- The risk of incompleteness of ORSA results from the fact that every predefined process
 can deal only with known unknowns. A complete ORSA would include the assessment of
 unknown unknowns which is by nature impossible to put in processes. Furthermore
 incompleteness often results from focusing on reporting past events instead of performing
 forward looking risk assessments.
- The risk of unnecessary complexity arises when a company devotes significant attention to too many categories of risk, thereby positioning itself to be too slow in making critical decisions.
- The **risk of over-reliance** on an ORSA process often arises in cases where the undertaking's focus is more on process than on its content or results. If ORSA process runs effectively this does not imply that the risk taken by the undertaking is low.

 The risk of under-reliance to an ORSA process arises in cases where the ORSA process is too far away from business decisions such that the results of an ORSA are not really used by the company, especially if decisions by the Board are made with no reference to the ORSA.

These major risks related to an ORSA process risks can be addressed by making sure that

- ORSA includes an idea of how the undertaking assesses the risks from unknown unknowns,
- ORSA results are routinely used for high level decisions of the undertaking; and
- The management culture of the undertaking encourages second opinions and critical views of everybody involved in the ORSA-process.

Appendix: Glossary of Terms

- 1. **Economic Capital:** The amount of capital a company requires to survive or to meet a business objective for a specified period of time and risk metric, given its risk profile.
- 2. **Risk**: The potential of future losses or shortfalls from expectations due to the deviation of actual from expected results.
- 3. **Risk Appetite:** The level of aggregate risk that a company chooses to take in pursuit of its objectives.
- 4. **Risk Profile:** The characteristics of the material and relevant risks to which a company is exposed over a specified period of time.
- 5. **Solvency:** The adequacy of available economic or regulatory capital to meet future obligations or regulatory requirements.