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1

$$C_{13}XE = \frac{3 \times 1124}{2}$$



4

9

123

$$x_{14} = x_6$$

$$\frac{6}{2} = 3$$

$$A_2(A+C_2)$$

$$A_2(12E)$$



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$$\frac{4}{9} + \frac{3}{9}$$

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$$S = mr$$

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$$(-20)(\cos 9) = 6(2^b)$$

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## A NEW PARADIGM FOR **STRATEGIC RISK MANAGEMENT**

**IF YOU ARE LOOKING FOR A ROBUST YET PRACTICAL APPROACH TO THE RISK MANAGEMENT OF STRATEGIC OBJECTIVES, YOU'LL WANT TO CONSIDER THE FRAMEWORK PRESENTED IN THIS ARTICLE. BY DAMON LEVINE**

If enterprise risk management (ERM) was truly ever a hot topic, it seems there is an emerging focus on one of its potential applications or subtopics, namely strategic risk management (SRM). It is perhaps reasonable to conclude that risk management of strategic objectives should be susceptible to the current tools, techniques, and risk knowledge embedded in an existing, strong ERM framework. One might assume the risks that affect a company's pursuit of its business goals are merely a subset of the universe of risks that are identified and managed in a well-functioning ERM framework. This assumption is almost universally false.

This article will 1) discuss the above assumption and reality, 2) demonstrate the design of a customized SRM program, and 3) illustrate how concepts from the *Logical Framework*<sup>1</sup> can greatly improve the execution of SRM around any strategic objective.

### **ERM AND SRM**

ERM takes a high-level view which seeks to avoid downside scenarios while exploiting potentially profitable risks. Metaphorically, ERM is running a military campaign to protect against and benefit from risk and focuses on large scale considerations. By design, ERM is not always "aware" of the

finer details of particular battles as they unfold. This is not an oversight, but an intentional line in the sand. The granular risk considerations that a particular line of business faces are often regarded as the domain of the frontline product experts, risk managers, and decision makers at the business segments.

Clearly, effective risk management of the portfolio of a company's strategic goals is crucial to preserve and increase company value. However, this class of key

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risks goes largely under the radar of the seemingly thorough risk identification function of a strong ERM program. Even if these risks are identified as part of existing ERM processes, there are several specialized and necessary tools that may be absent.

Nevertheless, ERM is the right foundation for SRM and gets you "most of the way there" provided that some specific methods and metrics are overlaid on its traditional components. In order to focus on SRM, a limited amount of time will be devoted to ERM. However, thoughts on key ERM attributes and a proven, powerful approach will be mentioned.

The design of our SRM program begins with a vision of an ideal future state. We will successively move "back in time" toward the present as we formulate pre-requisite, actionable steps to reach our goals. We repeat that back-step in the

"causality chain" to conceive and define other necessary subgoals.

### SRM PROGRAM DESIGN

#### What Do We Want to Accomplish and Why?

Framework conception should begin with the above question. It's tempting to give a quick, vague response to this and "get to the real work." This is a mistake.

At the dawn of the 20<sup>th</sup> century, Henry Ford set out to build the lowest cost car. This led

to the development of assembly lines and the Model T. Around the same time, William Durant at General Motors sought to create the most affordable car. As a result, GMAC and the concept of automotive financing were born. These seemingly similar objectives led to very different paths and products, and each changed the world.

We must therefore be careful in formulating our objectives. After they are stated, we ask why we seek them. In doing so we may discover if the motivation behind a particular objective is misplaced.

Our example will design an SRM framework for an insurance company. Our objective (to be stated in three digestible pieces) is design of an SRM framework that will:

1. Increase the likelihood of attaining strategic goals.
2. Leverage existing ERM tools and

techniques for SRM, while improving and expanding ERM.

3. Improve perception of our ERM program among shareholders, rating agencies, and regulators.

These are our three most important priorities in our eventual SRM framework. Why?

If we attain 1 then we are helping to ensure execution of strategic goals and this will help preserve or increase our company's value.

If improved ERM is not a universal selling point of 2, then at least the promise of minimizing new and additional processes must be.

A benefit of 3 is that it allows us to address the Own Risk and Solvency Assessment (ORSA) expectation of a clear link between strategy and ERM in the manner best suited to our company. The SRM framework will improve rating agency/regulator assessments of our ERM program and increase shareholder confidence that a risk-intelligent view is embedded in the execution of our strategic objectives. For a public company, the optimistic, but possibly reasonable, expectation is an increase in stock price.

These objectives serve as strong selling points that may create the upfront C-suite endorsement and support that underpins any successful SRM framework.

#### What Goals Allow Us to Reach Our Objective?

As mentioned earlier, an important foundation for our SRM implementation



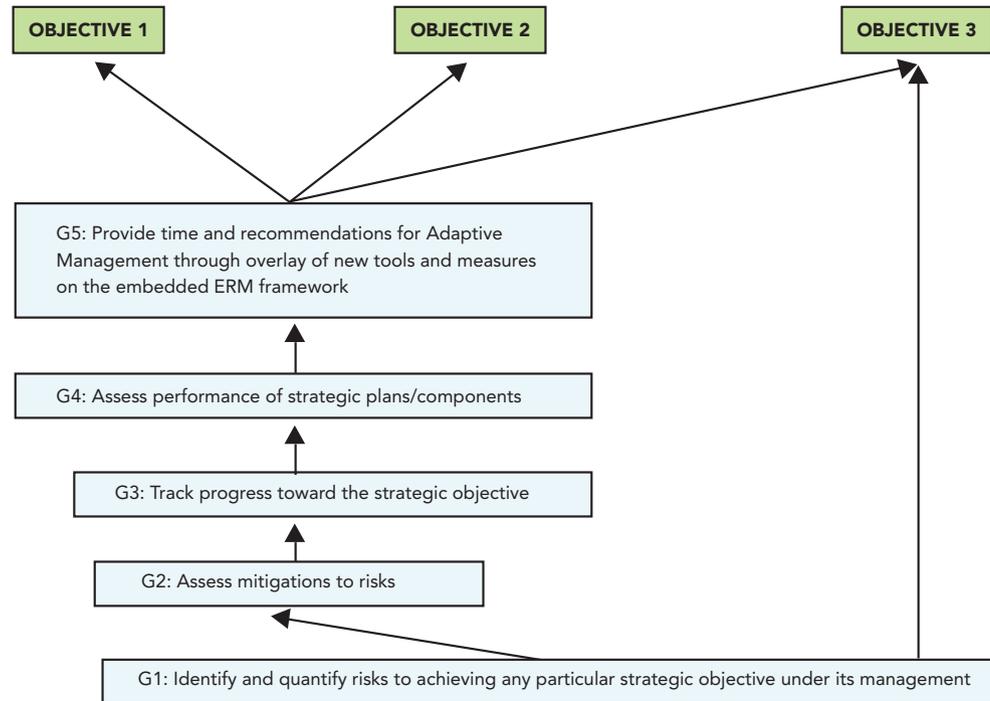
is a “strong” ERM framework. For each enterprise risk, the ERM function queries the risk experts to form a consensus on several hypothetical scenarios that capture ways a risk may manifest. These “risk interviews” are the primary vehicle for risk identification and quantification.

Each scenario includes probability estimates and impact approximations for income statement or balance sheet components (e.g., sales, expenses, loss ratio, reserve changes, etc.) leading to quantification in terms of key risk metrics (e.g., effects on earnings, ROE, capital, etc.) The selected metrics are precisely those of interest to internal and external stakeholders. The risk interview concept and the scenario approach represent some of the fundamentals suggested by ERM consultant Sim Segal.<sup>2</sup>

One path toward *all three objectives* is ensuring an SRM framework that enables *adaptive management* for any strategic objective under its consideration, i.e., timely and informed management action to alter business tactics, risk mitigations, or overall strategic course.

The following framework schematic (exhibit 1) is created by considering its top elements and using several back-steps to fill in successive elements as we move down in the diagram. Foundational tasks and projects are therefore at the bottom. The analysis leads to goals which enable Adaptive Management and allow us to achieve 1–3 (listed on pg. 18). To be precise, each of the below goals (G1–G5) should be

## Exhibit 1: Framework Attributes Leading to Objectives



preceded by “ensure the framework has the ability to ...”

### What Framework Components Enable Goals G1–G5?

We now describe the detailed framework components (primary processes) that will lead to each of the goals. Component 1 addresses goal G1, and similarly for components 2–5.

- **Component 1:** a) Identification and quantification of both the “peripheral” risks as well as the more readily apparent business risks that may hinder success in reaching the objective, b) assignment of a *risk velocity* rating to each risk. Risk velocity<sup>3</sup> is a best guess for the speed

of onset (impact to the company) assuming a risk has just begun to manifest. It sheds light on when and to what extent we can adapt to changing risk or business environments.

- **Component 2:** a) Assessment of mitigations to the risks in C1, b) rating of Potential for Action (PFA)<sup>4</sup> for each risk in C1. PFA is a measure of the expected benefit to the company’s risk-reward profile from additional focus or effort on risk mitigation (i.e., PFA assesses the anticipated “bang for the buck” of *incremental* mitigation activity).
- **Component 3:** Selection and use of metrics or indicators that track progress

toward the strategic objective, perhaps gauging sales levels, training success, or various marketing campaigns.

- **Component 4:** Analysis of the results seen in C3 to determine which aspects of the strategic plan are merely experiencing insignificant variation from the plan versus those truly in need of modification.
- **Component 5:** Implementation of early warning indicators (EWI). EWI can be either a “canary in a coal mine” signaling future risk manifestation or simply a preview of what the current period tracking indicators will soon reveal. EWI provide crucial time for Adaptive Management before the crisis is upon us. EWI, conclusions from C4, and PFA ratings all inform recommendations for altering, expanding or supplementing strategic elements or altering risk mitigation techniques.

#### EXAMPLE: LAUNCH OF A RETAIL WARRANTY PRODUCT

We now apply the framework to the launch of a warranty product at an insurance company. The warranties will be sold by the insurer’s business partner, a moderately sized retailer in Italy, to local customers. The company has sold a similar product in France for the past five years.

Based on initial research and analysis, the strategic team provides several forecasts, including potential P&L outcomes, and highlights opportunities for future partnerships with top-tier retailers.

A scenario approach is employed to express the uncertainty inherent in such projections and helped get the initial “green light” from management.

The strategic objective is: 1) Launch the product by June 1, and 2) produce at least \$300M in premium cash flows over the first 36 months and net GAAP earnings exceeding \$10M in each of years 2 and 3.

The project plan suggests that three main goals must be achieved in order for the strategic objective to be attained. These *critical to success* goals (CtS) are: G1) train the retail salespeople by March 1, G2) increase year over year sales by at least 15 percent in each of years 2 and 3, and G3) decrease year over year claims administration costs by at least 15 percent in each of years 2 and 3.

Back-steps suggest that:

- To meet G1 we must set up three on-site visits at retail locations where two of our employees each lead a full day session
- To reach G2 our Internet marketing plan must increase the number of hits on the website by 30 percent in the next 12 months, and our retail partners must have a success rate of at least 20 percent when offering the warranty
- To achieve G3, a new protocol for handling claims must be implemented and call center employees must show a performance improvement in each of the next three years.

Relevant *progress metrics* might include total number of staff trained, number

of hits on the marketing website, per employee sales, and average time spent and dollar payout per claim for each claims processing employee. Of course, premium revenue, claims, expenses, and profits are carefully tracked.

Risk experts analyze various assumptions regarding claim frequency and severity, marketing effectiveness, training programs, and macro factors, including Italy’s disposable income trends and foreign exchange volatility. In addition, where the project plan makes assertions such as “if we complete tasks A and B, then we achieve goal X,” they identify the necessary conditions for the “then” to be valid in reality. A focus on assumptions underlying if-then thinking is a key component of the Logical Framework<sup>1</sup> (also called the Logical Framework Approach or LFA).

Several critical assumptions are identified including:

1. The forecast profit levels assume claims experience will be within 10 percent of that seen in the experience with the company’s similar product in France.
2. Sales levels must quickly ramp up after the low levels projected in year 1.
3. Call center training is assumed to lead to reduced claims payout and improved efficiency.

These suggest risks to achieving the strategic objective include: claims behavior differences across countries, stagnant sales growth, and unsuccessful efforts to improve call center profitability or resource usage.



EXHIBIT 2				
SCENARIO SUMMARY FOR FOREIGN EXCHANGE RATE RISK (DOLLAR VS. EURO)				
Scenario Description	Probability	Impacts to Business Drivers	Year 1 Earnings Impact	Company Value Impact
Exchange rate stays within 10% of March 1 levels for next 12 months	35%	Assume baseline forecast interval estimate applies	Assume baseline forecast interval estimate applies	Assume baseline forecast interval estimate applies
Dollar appreciates vs. Euro by 10-20%	25%	\$US Sales Down 20% (vs. baseline, post currency translation)	-\$20M	-\$54M
Dollar appreciates vs. Euro by > 20%	20%	\$US Sales Down 35%	-\$35M	-\$95M
Dollar depreciates vs. Euro by 10-20%	15%	\$US Sales Up 15%	\$15M	\$41M
Dollar depreciates vs. Euro by > 20%	5%	\$US Sales Down 30%	\$30M	\$81M
		<b>Statistical Expectation</b>	-8M	-22M
		<b>Downside Conditional Expectation</b>	-27M	-72M
<b>Challenges</b>	<i>[List perceived difficulties in risk prevention or impact reduction]</i>			
<b>Mitigations</b>	<i>[Identify existing risk controls that reduce likelihood and/or expected business effects]</i>			
<b>Potential for Action</b>	<i>[Assess the expected benefit to the company's risk-reward profile from additional focus or effort on risk mitigation]</i>			

In addition, there are risks that an economic downturn (in Italy or globally) would drive down demand for the product or that currency fluctuations make the warranty's price prohibitive or drive down U.S. dollar profits. Analysis shows that the ISAE consumer confidence index is a leading indicator for demand for the retail warranty product among Italian consumers. A three-month moving average of the ISAE is defined as an EWI.

The above illustrates steps including: stating the objective and CtS goals, selecting progress metrics, EWI, and performing risk identification. Risk quantification employs the risk interview approach and describes hypothetical scenarios that capture a range of outcomes for the key risks. In the case of risks that are strictly of a project planning nature,

this scenario approach is not needed. One might simply identify a project challenge and address it by suggesting an additional subgoal, process change or an increase in resources. For each risk source, a risk interview provides scenario-based analysis similar to Exhibit 2.

The example up to this point is a "sketch" of the type of analysis, processes and tools that enable a risk-intelligent pursuit of the strategic objective. Based on this work, we embed the selected EWI, metrics and indicators into a realistic and detailed project plan. The project plan includes reporting deadlines and progress-based decision triggers.

Now we are ready to apply the framework to manage the objective. On a monthly or quarterly basis we:

1. Track metrics/EWI, identify and quantify risk exposures, rate risk velocities, and assess mitigation effectiveness through PFA.
2. Observe and report progress metrics and other indicators from (1) and provide a status update including an estimate of the likelihood of attaining critical subgoals and CtS goals, as well as the strategic objective.
3. Based on (1) and (2), alter or refine strategic elements such as business tactics, risk mitigations, or overall strategic course. Document and retain any lessons learned. If overall strategy is to be altered, then return to the initial setting of the strategic objective; otherwise repeat these three steps.



Illustrative changes in tactics might include increased training at underperforming retail stores, the creation and implementation of a new procedure for small claims administration, a bigger push on a specific marketing campaign, or the purchase of a currency hedge such as futures.

### THE LOGICAL FRAMEWORK AND EFFECTIVE SRM EXECUTION

Consider the concept of early warning indicators. The framework planning assumes on some level that if EWIs are created *then*

Question 2: *How will we measure success?*

Question 3: *What other conditions must exist?*

Question 4: *How do we get there?*

Question 1 suggests we need a clearly defined strategic objective, possibly using the SMART criteria, and we must ensure that our objectives are aligned with the company's capabilities, mission statement, culture, or risk appetite.

Question 2 refers to proper choice of the progress metrics for CtS goals, while Question

or execution. It will be apparent to most that the framework is based on a scientific and risk-intelligent approach, and its execution reflects the best risk information available.

Perhaps you will need to try again. This time you'll be armed with the lessons from past attempts, and an improved understanding of effective business tactics, choice of metrics and indicators, risk mitigations and overarching strategy. **A**

**Disclaimer:** *The views expressed in this article are my own and not necessarily those of my employer, Assurant Inc.*

## Design of an SRM system is ideally customized to fit your company.

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we enable adaptive management. Conditions necessary for this "then" to be legitimate include:

1. The assessment of the EWIs as leading indicators is correct.
2. The EWIs are calculated correctly and promptly so any opportunity or troublesome trend is seen quickly.
3. Management is promptly made aware of EWI trends and is willing to take action based on them.

As mentioned, this drill-down into assumptions underlying occurrences of "then" is a primary tool of LFA. Another key theme of LFA, the Four Critical Strategic Questions,<sup>5</sup> ensures the quality of the SRM *input*, i.e., the strategic objective. A clearly articulated objective with a project plan defining appropriate progress metrics is the ideal input for our SRM framework.

LFA's Four Critical Strategic Questions are:  
Question 1: *What are we trying to accomplish and why?*

3 refers to typical business challenges as well as outside factors that might be obstacles to attaining the CtS goals or the overall objective.

Question 4 may be addressed through multiple applications of the "back-step" to define all key project tasks and deliverables, delineate task responsibilities and develop a granular project timeline/workflow. We also must manage typical challenges to timeliness and quality of deliverables. In other words, we must carry out project risk management.

### FINAL THOUGHTS

Design of an SRM system is ideally customized to fit your company. Risk quantification, metric selection and decision analysis can be executed in many possible ways; making everything fit together entails a blend of the quantitative and qualitative. You may be inspired (or worried) by Einstein's quote, "Not everything that can be counted counts, and not everything that counts can be counted."

The manifestation of a "killer risk" (one that precludes our reaching the objective) is not necessarily due to a flaw in SRM approach

### ENDNOTES

- <sup>1</sup> The Logical Framework Approach was developed in 1969 by Leon Rosenberg for the United States Agency for International Development (USAID). It is a management tool often used in the design, monitoring, and evaluation of international development projects. More generally, LFA provides a framework that helps organizations of nearly any type achieve strategic goals. Practical Concepts Incorporated extended the use of LFA to 35 countries. LFA is often used by bilateral and multilateral organizations and was employed by NORAD.
- <sup>2</sup> For practical and powerful implementation of strong ERM see Sim Segal's book *Corporate Value of Enterprise Risk Management: The Next Step in Business Management*.
- <sup>3</sup> The Corporate Executive Board provided my first exposure to risk velocity. It is possible that my definition differs from their formulation.
- <sup>4</sup> My conception of Potential for Action (PFA) was an attempt to align "raw" ERM data with risk expert priorities at the business units. Some potentially very detrimental risks are not, and should not be, top management priorities. My experience is that these risks have low PFA.
- <sup>5</sup> Terry Schmidt applies LFA to the private sector in *Strategic Project Management Made Simple: Practical Tools for Leaders and Teams*.