

ACTIVE RISK MANAGER

Meeting Today's Supply Chain Risk Management Challenges

THE EVOLUTION OF A&D SUPPLY CHAINS

Supply chains in the Aerospace & Defense industry have undergone significant change over the past few years driven primarily by the impact of tier one integrators devolving more and more of their manufacturing and subsystem assembly work to sub-contractors. At the same time, these suppliers are streamlining their own supply chains in order to create greater economies of scale.

Tier one suppliers are increasingly being asked to invest in technology development in exchange for preferential partnering status. Suppliers further down the supply chain are taking on increasingly complex design and manufacturing tasks, including activities such as requirements definition, systems engineering and configuration management.

As a result of this development, tier two and tier three suppliers are becoming increasingly powerful over much larger program contracts and the prime contractors. They are often quicker to deliver, more adaptable in process and pricing and therefore are increasingly winning smaller fixed price government contracts that were previously the domain of the tier 1 suppliers. At the same time pressure to reduce costs has shifted a significant amount of commercial aerospace work to suppliers who can draw on lower labor cost sources.

NEW SUPPLY CHAIN AND PROGRAM MANAGEMENT CHALLENGES

The new supply chain realities have the obvious potential for major cost savings but at the same time introduce new complexity and risks. These in turn make new demands on executives around program and risk management. In recent years, the ineffective management of supply chain risks has caused cost overruns, production delays, quality failures, and program cancellations. In addition the increase in international partners and customers is creating ever more complicated risk scenarios.

In Deloitte's 2009 report on the US Aerospace and Defense industry entitled "Can we afford our own future? Why A&D programs are late and over-budget and what can be done to fix the problem", they note that, "Under

the traditional supply chain model, the OEM was at the center of the action and every supplier had a distinct and narrowly defined role. But in today's multi-dimensional supply chain, suppliers play a much larger role and often interact directly with each other. This new supply chain model has the potential to be more efficient; however, it is also more complex and harder to control. Increased reliance creates greater risk, which requires greater oversight and program management. Yet the necessary oversight and management does not always happen. Also, lower tier suppliers tend to have less robust capabilities for managing programs and risk."

Individual suppliers cannot respond to these risks alone, nor can the current processes and controls of the prime contractors. Working in isolation, both primes and suppliers are blind to many emerging supply chain problems. As a result, they waste far too many program management resources addressing risks after they've blossomed into realized issues and losses.

The new supply chain model has pushed current risk management processes and systems past their limits.

MEETING A&D CHALLENGES WITH ACTIVE RISK MANAGER

Active Risk's customers are using Active Risk Manager (ARM) as their risk platform and tool to enable new ways of managing risk throughout their own organizations and across their supply chains. They are able to share risk information and develop coordinated risk responses, minimizing issues, improving program performance and reducing costs. ARM makes organizations more 'risk intelligent' so they can identify business exposures and act on them ahead of time.

ARM is becoming the de-facto risk system in the A&D sector. The US Department of Defense (DoD) and the UK Ministry of Defence (MoD) both use ARM, as do eight of the ten largest global defense contractors across their businesses. Its use is increasingly proposed to contractors to ensure a common way to articulate and address risk in projects and programs.

HOW DOES ARM WORK?

ARM enables an organization to identify and record risks and opportunities into a single, secure and auditable system. It can be accessed by authorized personnel both from within the business and its trusted supplier network. Using a single risk tool and data repository means a common vocabulary and way of scoring risks can be developed so that risk information can be aggregated, assessed, escalated and actioned. ARM allows risk to be scored both on qualitative and quantitative measures so that effective decisions and investments can be made based on the true risk picture at project, program, portfolio and enterprise levels. ARM also meets increasing transparency needs, showing the data and processes which underpinned strategic decisions.

ARM enables the prime contractor to monitor and assess data security at federal and program level. Requirements such as ITAR and EAR security can be managed and tracked helping ensure the program team is in accordance with mandated processes and specifically that only authorized members of staff across the supply chain can access the risk information.

ARM provides the single database for all risks and related information such as controls, mitigation plans and fallbacks and also relevant supporting documentation. However it provides different, customizable ways to access the system and information so that everyone from senior management through occasional users, frontline workers and expert

risk professionals can have a user interface tailored to their level of skill, frequency of usage and data entry and reporting needs.

Organizations can collaborate and share information rather than having it remain in inaccessible and duplicated spreadsheets silos. ARM's real time alerting prompts users when they have tasks to perform and the management reports generated save time and cost. ARM makes it possible to see trends and emerging risks early so that there are the maximum options for action.

ARM can also be interfaced to major ERP systems which hold related supply chain relationship information. This ensures the continuity of information flow between the supplier management system and the risk management system.

ARM ADDRESSES KEY A&D SUPPLY CHAIN RISK MANAGEMENT NEEDS

ARM can unite all aspects of risk across business units to provide a true holistic overview of the future exposures of the business. However it is also important that specialist risk functions such as supply chain risk management (SCRM) have a system which can meet their specific requirements. ARM is flexible and customizable to address this range of needs.

In the "Can we afford our own future?" report Deloitte recommend practices to address supply chain risk management issues. Key actions include:

Key supply chain risk management actions	How ARM will help
Assisting tier 1 suppliers to mature their supplier oversight, monitoring and performance metrics reporting processes.	The same ARM risk management system can be used securely by all organizations in the supply chain so that a common risk vocabulary and metrics is used. ARM will generate the reports needed to monitor performance across the supply chain to ensure effective measurement and informed decision making.
Identifying key suppliers and building collaborative, risk sharing relationships (as opposed to the more traditional, arms-length transactional model).	ARM will allow the identification of key suppliers and the risks which relate to them. The best ways to share, mitigate and insure against risks can then be worked on collaboratively.
Mapping out the supply chain at multiple levels to identify key risk points and relationships that can be proactively managed to avoid failures.	The single ARM repository can be used to map out the risks at all levels in the supply chain to build up a complete picture using input from all players.
Developing leading supply chain indicators that help avoid risks, and then incorporating them into standard program management techniques.	Using a common scoring scheme allows the risks to be assessed on the same criteria so that the most important ones can be identified and prioritized for action. Quantitative and qualitative measures can be used for evaluation allowing a 'monetized picture' to be built up and appropriate investment decisions taken based on the ROI.
Building a supply chain organization that can actively monitor and manage multiple networks and linkages across the extended supply chain. Acting quickly to address problems.	Having a single system that can be accessed 24/7 by authorized parties, rather than an in-house, multiple spreadsheet or paper-based system, means controls, risk mitigation plans and fallbacks can be stored together with the supply chain risks which have been identified. All the players can access and collaborate to action these should problems arise.

ARM SUPPORTS THE FULL SCRM LIFE CYCLE

Our customers are not just talking about the issues emerging in today’s A&D supply chains, they are using ARM to collaborate with suppliers to address them. From the inclusion of suppliers in the initial bid process, through contracting to build and operations, ARM is being used as the software platform to help organizations and their suppliers work together to manage risks and highlight opportunities.

ARM facilitates both a top-down and bottom-up risk management process. The prime contractor sets the framework of the risk appetite, standards expected and the risk processes which must be adhered to. They may even provide the ARM software licenses and access to the common system to help suppliers identify and manage risks. Where multiple parties are collaborating on a project or program but could be competing elsewhere risk information can be made available only to the prime for upward management. This controlled transparency is helping to bring together cross-company project teams that have greater confidence in the ability for each player to meet their project objectives.

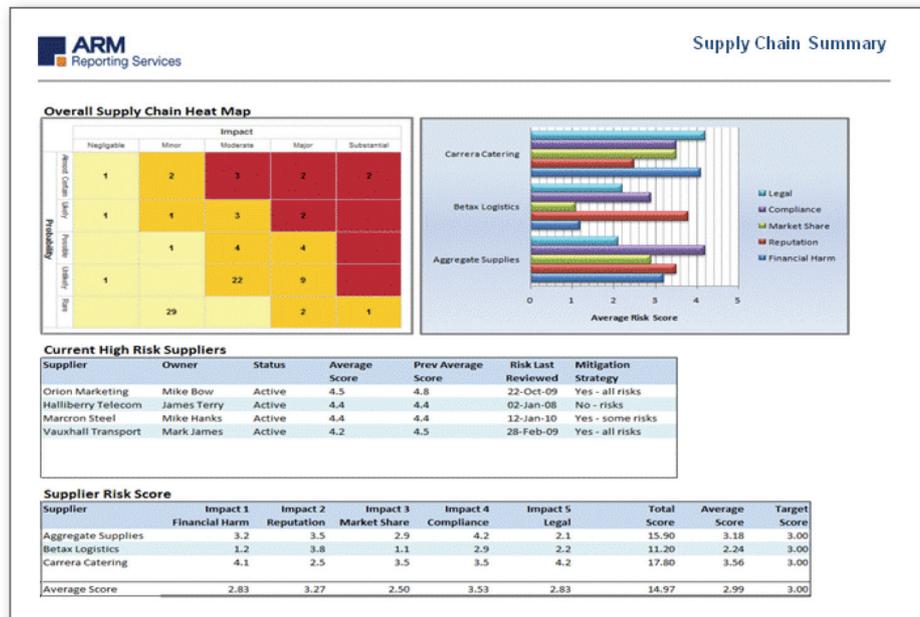
From the use of electronic surveys, to complete integration of suppliers risk registers within the prime contractor’s program risk repository, ARM can support the full SCRM life cycle. Key features of ARM that support this process include:

- Risk and opportunity information from ARM can be used in the bid management process with access to a Knowledge Base of previous successful and unsuccessful bids
- The ARM risk platform supports electronic surveys to quickly collect information from across the supplier base
- ARM holds supply chain risk knowledge and best practices including recommended controls and fallback handling strategies
- ARM provides a standard approach and scoring templates so risks can be assessed in a common way
- ARM can measure supplier performance, for example, against technical and manufacturing readiness levels

- ARM integrates the centralized supply chain risk management function with the project teams across the business
- ARM provides the ability to integrate suppliers’ own risk registers within the core program risk register to facilitate transparency and to help build a shared risk culture
- ARM enables evaluation of the effectiveness of suppliers’ key controls and business continuity frameworks
- ARM can aggregate risk across multiple parameters looking for emerging key root causes that can be targeted at an early stage while cost-effective action is still possible
- Extensive information filtering, email alerting and reporting functions are provided by ARM to enable monitoring of the status of suppliers

THE BENEFITS OF BETTER SUPPLY CHAIN RISK MANAGEMENT

Better risk identification and more efficient and complete responses to risk can deliver a range of benefits. Schedule and labor disruptions are minimized. Penalty costs can be reduced. The need for rework will diminish. Return on invested capital grows. Organizations and consortia can improve their reputation and track record for delivering on time, to budget and to specification. This will feed straight back into the bid process and increase the chances of winning more business. See Active Risk’s paper on “Winning more A&D business through effective risk management” for more information.



Active Risk Manager is used by an increasing number of customers to support the SCRM process. Using the software as a platform from which the process can be monitored, data stored, aggregation performed and, of critical importance, to enable the part of the business responsible for supply chain management to share information with the areas of the organization who look after project delivery.

This sharing of risks is critical in helping drive effective communication and the identification and management of potential issues that could create major losses to the business.

BRINGING SCRM AND PROGRAM MANAGEMENT TOGETHER

PwC in their paper, "Creating competitive advantage. How to transform program management" which looks at the Aerospace Defense sector, identifies three key initiatives that are being undertaken by companies to address this new era of risk:

- The number of program risk management participants is expanding to include more internal functions and more members of the supply chain. Programs can add lower-tier suppliers and a wider range of stakeholders into efforts to identify risk, understand it, respond to it, and then monitor the effectiveness of the response.
- Program executives are developing foresight by learning to recognize, interpret, and monitor the early warning signs of problems and changing risk profiles.
- Companies are changing their cultures. Training, new responsibilities, and new incentives for employees and suppliers weaken the "conspiracy of hope," in which people avoid reporting risks until they have solutions, or see risks as someone else's problem. Executives can take action now. Opening communication lines, monitoring and reporting leading indicators, and clarifying roles, for example, all start with incremental adjustments.

Active Risk Manager is enabling initiatives like these at our major Aerospace and Defense customers and their supply chain partners. ARM is recognized by independent analysts as having the widest range of enterprise risk management capabilities available today. ARM will allow a business to bring together risk domains which have traditionally been separate such as project and program management, supply chain risk management, bid management, reputation management etc. The same system can integrate supply chain partners of all sizes. This allows the communication of a shared risk culture and enables the early identification of risks with common root causes and emerging risks and opportunities.

SUMMARY

ARM will make sure you use the knowledge from within your organization and network to win and deliver more profitable business.

REFERENCES

"Can we afford our own future? Why A&D programs are late and over-budget and what can be done to fix the problem", Tom Captain, Deloitte.

"Creating competitive advantage. How to transform program management", PwC paper on the Aerospace and Defence industry.