How To Make The Case To The C-Suite

Selling Large Scale Data Management Projects to the C-Suite

By Scott Shemwell, The Rapid Response Institute

Michelle H., the Chief Data Scientist for a large independent E&P company very active in shale plays, returned from a conference focused on the Future of the Upstream Digital Enterprise. All speakers and panelists extolled the enterprise digitalization process, the new role of data management and emerging game changing impact.

With the explosion in data quantities, types and new tools, Michelle suggested to Aaron, the CIO, that the company adopt an aggressive strategy to fully implement the company's digital oilfield initiative, which incorporates the PPDM Data Model. Initially, Aaron did not share Michelle's enthusiasm.

Since 2015, the company had undergone several restructuring processes and the CFO is still very concerned about cash flow. Moreover, he, the CEO and Board share the belief that the current WTI crude oil price is not sustainable and that $50 or less is more likely than $80 per bbl.

When Aaron asked Michelle about the risk of this undertaking, her response was not reassuring. At the conference, major consulting firms and other "experts" had explicitly claimed that organizations had no choice but to digitalize. The subject of project risk was only briefly mentioned.

Aaron asked Michelle and her team to develop a project plan, capital budget, operational costs and risk mitigation model. Finally, he wanted to know if the highest value to the firm was as an industry leader, a fast follower or even a laggard. Only then would he be comfortable presenting to the CFO.

PREPARING THE BUSINESS CASE

Aaron has advised Michelle that standard IT Use Case initiatives are perceived as weak, i.e., unsupported statements regarding increased efficiency and productivity, etc.

Perhaps a daunting challenge for Michelle and her team; it need not be. Moreover, the company has developed a set of CAPEX criteria, i.e., alignment with business objectives, return on investment (often measured as Return on Investment Capital [ROIC]), validation, project management, risks, etc. Her team will need to develop a solid understanding of the Capital Review Process and make sure that key questions, concerns and issues are addressed.

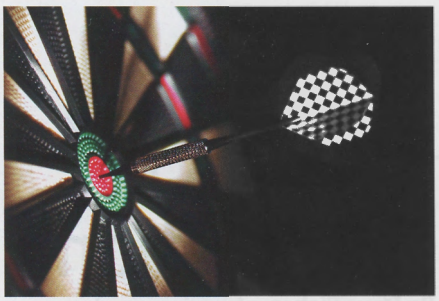
She will also need to add an executive sponsor/coach. This should be an individual with credibility with top management. Logically, she may seek the CIO, however, in some organizations this individual may not have the perceived credentials. A senior executive with profit/loss responsibility might be preferred.

Finally, she must be able to address all questions, including ones that may not be anticipated. Should a question be posed that she cannot immediately answer she should make sure she understands the query, doesn't 'wing it' and states emphatically that she will respond in writing by X date.

QUESTIONS MANAGEMENT MAY ASK

Challenges from management Michelle will need to address may include:

1. *Is the company culture ready? If not, how can we make it ready?*
   While this may appear to be beyond the scope of the Chief Data Scientist, the answer is critical to her success. She will need an in-depth understanding of the organization's culture and have a transformational plan.
2. *Other enterprise level IT initiatives have 'over-promised and underdelivered.' What makes this one different?*
   The answer to this and the first question requires an understanding of where the organization is on the maturity and technology adoption curve. Trying to force a laggard into a leading position will likely end in failure. Moreover, statements to the effect that 'everyone is doing it' will not exude confidence.
3. *How will the organizational Governance model incorporate digitalization as 'the way we run the business?'*
   The consulting firm, i-SCOOP defines Digitalization as "Digital transformation is the profound and accelerating transformation of business activities, processes, competencies and models to fully leverage the changes and opportunities of digital technologies and their impact across society in a strategic and prioritized way,



with present and future shifts in mind." Issues around this disruptive transformation must be incorporated into the initiative. Often IT initiatives have not addressed governance to their detriment.

4. *Technology is advancing rapidly, how do we know this is the right time and technology suite?*
   Without going into the technical details, Michelle will have to outline a Technical Architecture that will accommodate the existing legacy systems, current technologies and future technologies.
5. *You're asking for a substantial amount of funding with a multi-year implementation plan. How does the organization mitigate this project risk?*
   The project team will be led by experienced project managers. They will take full advantage of project management processes, i.e., Project Management Institute's PMBOK® Guide and Standards.
6. *How can you assure organizational 'buy-in'—the Change Management strategy?*
   Change Management is fundamental to the digitalization transformation. It is well understood; however, often not followed. Persistence is necessary, not just within the organization but including its ecosystem.
7. *We hear a lot about Cyber Security. How can you assure that we are not putting the organization at risk if we go forward with this project?*
   This hard question must be adequately answered. Multiple hacks on organizations have destroyed shareholder value, ruined careers and threatened critical infrastructure. Outside expertise may be appropriate in this fast-changing environment.

ALIGNMENT WITH THE BUSINESS

It is surprising how many senior executives, especially in support areas such as IT, do not understand the organization's vision, mission and objectives. This is easily remedied by reading the Annual Report, particularly the opening Letter to Shareholders where this information should be clearly stated.

Large CAPEX that are not aligned with the business objectives are non-starters and a waste of everyone's time and resources. Understanding this is fundamental.

Since an enterprise level project will impact all aspect of the business's ecosystem, Michelle will need to develop a detailed assessment of the positive and negative impacts, i.e., time commitments, resource constraints, etc.

ECONOMIC VALUE PROPOSITION

Macro statements like "digitalization could impact the bottom line by 30 percent" are great in white papers and at conferences, but management usually cannot get their minds around such aggressive claims. She should refrain from such glittering generalities.

Economic models are challenged to incorporate an understanding of which parts of an organization, including its ecosystem, that are impacted as well as why and how. As noted, statements often made, words to the effect of, "we can save xx percent or increase (blank)" are meaningless to executives.

However, if Michelle assesses the impact on major departments and/or other entities she will accomplish two major objectives. Working with department leadership her team will develop an understanding regarding their needs and value proposition. She will also generate 'buy-in' throughout the ecosystem.

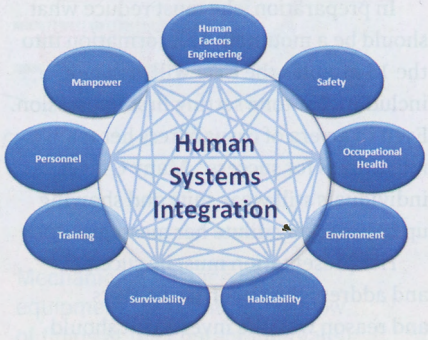
Hypothetically, one group may see a one-to-three percent impact while another none. When added together across the ecosystem the final number may in fact be 30+ percent. Once this exercise is completed, Michelle will know how the organization will receive this initiative.

The 80-20 rule applies. It is not critical to uncover every area of value, just the major impacts.

Finally, every project needs a measurable return and set of KPIs and CFSs. Without robust yet straightforward models, projects are often rejected.

HUMAN SYSTEMS INTEGRATION

Source: The Rapid Response Institute



Michelle should be prepared to address any Human Systems Integrations concerns raised by management – where the human decision makers meet the interface. For example, the current fervor for the driverless automobile is seen by some as fait accompli. However, what exposure does the firm have if the 'machines' make the wrong decision?

RISK MITIGATION

One of the most important functions of management is risk mitigation. Historically, the focus has been on financial transparency, managerial ethics, etc, now it includes more concerns like digital safety.

With potentially tens of thousands of sensor exposure access points, as well as major integrated tasks from ecosystem partners and suppliers, traditional IT governance rules no longer apply. Emerging organizational governance models incorporate IT fully with other risk management processes.

Michelle and her team will need to explain to management in business terms

(no geek speak) what the risk mitigation process is for both the project as well as ongoing operations. This is an area where her executive sponsor can assist.

THE DECISION PROCESS

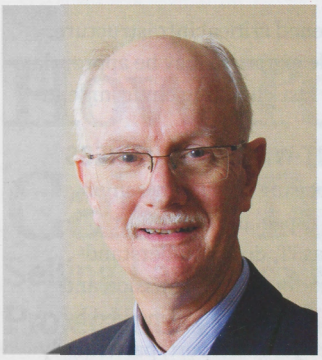
Once Michelle and Aaron have developed a detailed and supported understanding of the points herein, they are ready to face the CFO, CEO and possibly the Board. The value to the business will be well founded and 'objections' acknowledged and addressed.

In preparation, she must reduce what should be a mountain of information into the 15 minutes the CFO will give her, including her tone setting first impression. Even in an era of casual dress her team must 'dress for success.' Many C level individuals still wear suits and showing up in jeans may dilute her message.

Her presentation must be succinct and address the opportunity, risks and reason why the investment should be made. If she is prepared, her confidence and ability to present her case will likely end in approval.

About the Author

Dr. Scott M. Shemwell, sshemwell@theRRInstitute.com, Managing Director of The Rapid Response Institute is an acknowledged authority and thought leader in field operations and risk management. He has more than 30 years in the energy sector leading turnaround and transformation processes for global S&P 500 organizations as well as start-up and professional service firms.



What Is A Completion?

By Dave Fisher, Dave Fisher Consulting

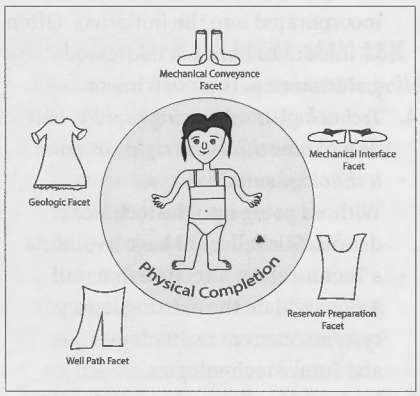
The ***What Is*** *A Completion* work group is nearing the end of its project. The full results will be published for our members in the Fall of 2018. Here are some highlights of the work.

If you ask a variety of people in the Oil and Gas industry, "What is a completion?", you are likely to get a variety of answers. Each person has their own understanding of the word, based on how they engage with the thing they call a completion. For example, a completions engineer cares about equipment and fluid flow whereas a business analyst focuses on the financial performance of the asset.

When a data analyst gets a request for "all the information on the completions in this well," what is required? When an operator delivers the completions data to the well's partners, does each partner know how to capture the data elements correctly and completely? Data exchange requires clarity of meaning.

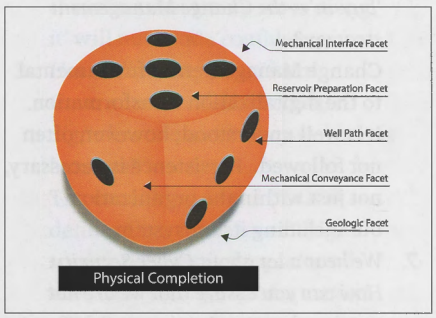
The different stakeholder perspectives are *facets* of the object. Imagine that a paper doll represents a completion object in a well; each child makes a clothing choice. One child wants all the clothes; another doesn't want the socks; another one would be upset if the socks were lost.

The word "completion" also has a very common non-technical definition: the conclusion of an activity. It might mean that the operations at a well have reached a milestone. It might also mean the end of a contract or process that has nothing to do with a well. The context controls the meaning of



the word. If you don't understand the context from the other's viewpoint ("facet"), you may lose the meaning. In the world of paper dolls, if someone starts talking about GI Joe or hunting for Dall sheep in Alaska, the conversation is suddenly on quite a different track.

Facets can also be visualized as faces on a cube. Each face is a different view of the same object.



The PPDM work group for *What Is A Completion* (WIAC) addressed the semantic challenge: how can we facilitate clarity in the industry's use of the word "completion"? It would be impossible to produce one