



Leader or Laggard?

Innovation as a Competitive Success Factor During Times of Economic Recession

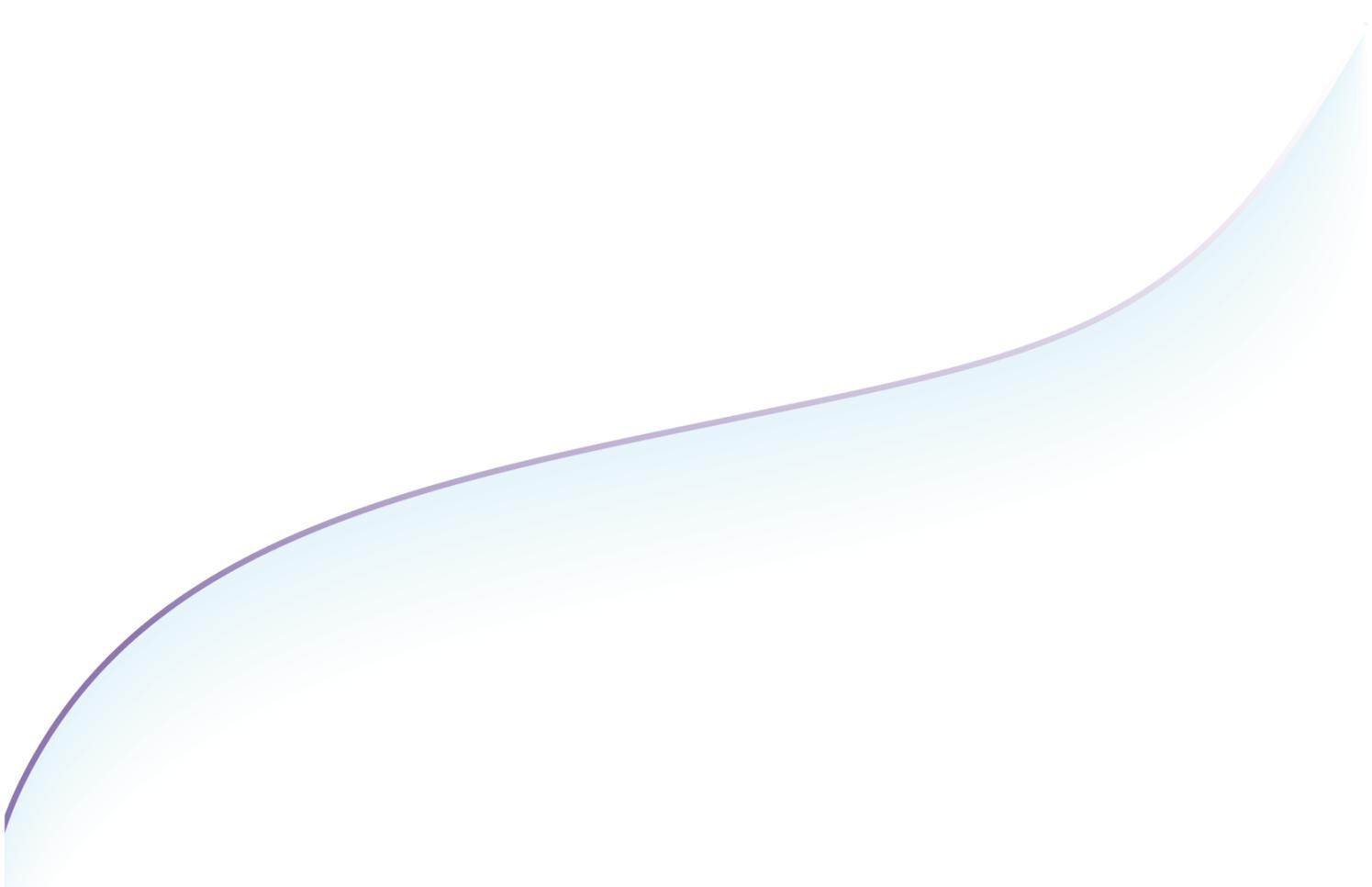


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1 Executive Summary

1.1 Innovation During Recession - Introduction

Capgemini Consulting, in conjunction with HSM, the sponsors of the World Innovation Forum, conducted a survey of over three hundred and seventy executives to explore the concept of innovation and to identify areas of commonality amongst them.

Given current global economic conditions, we were eager to find out whether innovation had lost its appeal as a concept and a business imperative. Traditionally, it seems that as companies have looked for ways to trim costs in periods of economic downturn, they have cut back on the untested, focusing instead on how to maintain the status quo, albeit at a lower cost. Would our respondents similarly cut back during the current recession, we wondered?

“How does our company describe innovation? That’s like asking someone to describe breathing...”

We were pleasantly surprised to discover that this was not the case, especially in the case of companies that considered themselves leading innovators. In fact, now more than ever, innovation is seen as a critical business priority, and a “must-have” to position for future recovery.

Those companies which were identified as leading innovators overwhelmingly agreed that they were using the current economic downturn as an opportunity to fundamentally transform their businesses.

Perhaps more important than the fact that companies were continuing to innovate was the extent to which innovation has evolved as a core principle for many businesses. Our interviews with successful innovators confirmed our hypothesis that for the most successful innovators, innovation was embedded within the corporate DNA rather than being perceived as an extraordinary element of the organization.

Innovation leaders stressed the importance of organizational factors in supporting innovation: creating a learning organization; supporting a culture that encourages risk taking; rewarding smart failures as well as successes; encouraging continuous customer conversation; establishing formal innovation processes, infusing the spirit of innovation with employees throughout the organization.

None of these ideas is new. However, the challenge is in operationalizing and executing on these concepts. Our respondents agree that while this is difficult, it is critical to long-term survival. Some have fundamentally restructured the way their organizations do business to support innovation; others propose new partnership models to support open source innovation and new approaches to the process of ideation and experimentation. Other are making creative use of the global labor force and new opportunities for connectivity to

better serve their customers.

And finally, it is all about the customer. Our respondents consistently agreed that innovative companies are always looking outward, focusing on how to better serve their customers' needs, including currently unmet and as yet unknown needs. New tools, technologies and media make it easier than ever to communicate with customers, and the most successful innovators are taking advantage of them to maintain meaningful customer conversations.

Innovators are also engaging customers earlier in the development process, shifting from a top-down research and development model to a bottom-up, decentralized model that takes advantage of customers' first-hand insights to address their unmet needs. By creating constant conversations with their customers and practicing proactive listening, companies are better able to position themselves to be truly innovative.

1.2 Survey Design

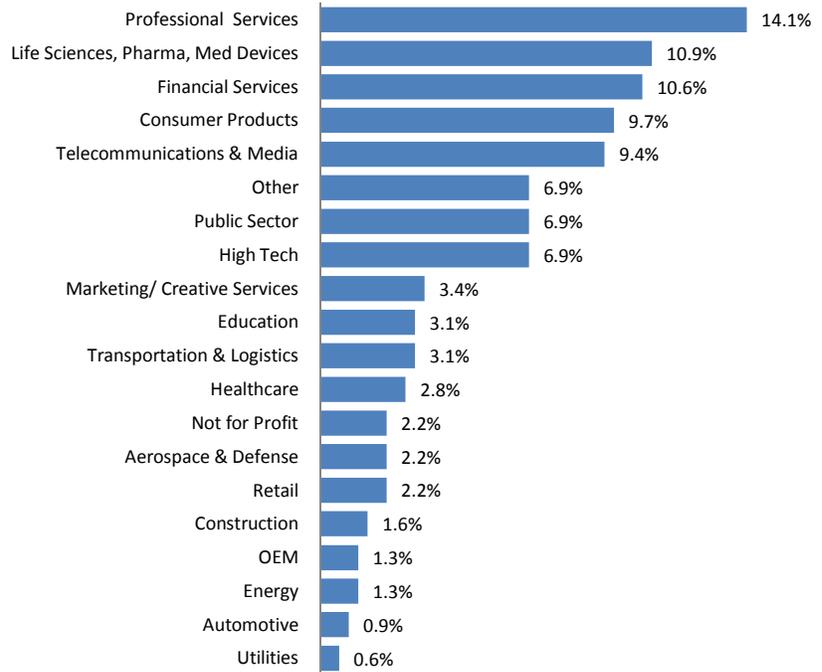
The survey was conducted by Capgemini Consulting and HSM, using HSM's network of conference contacts and attendees. Over three hundred and seventy people participated in an online survey. The written survey was followed up with a series of individual interviews with representatives of organizations which were identified as leading innovators.

Our interview team focused on multiple aspects of innovation, including product, process and business model innovation. Of special interest to our survey team were the impact of the recession on innovation, ways in which to increase the rate of success for innovation efforts and the use of new tools in supporting corporate innovation.

1.2.1 Survey Demographics

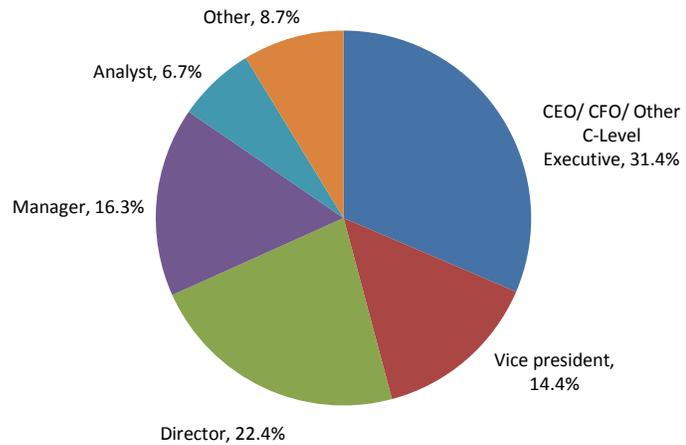
Respondents represented a range of different industries, confirming that innovation is being driven across a broad cross-section of business types. Based on the survey responses, no single industry dominated in the area of innovation leadership.

Figure 1 - Survey Participants by Industry



The majority of respondents were at the director level or higher, with close to a third being C-level executives.

Figure 2 - Survey Participants by Level

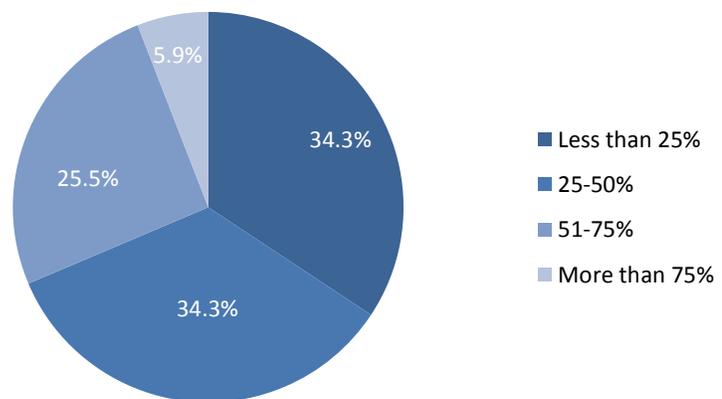


Respondents were asked to evaluate their firms' success at innovation based on the percentage of their innovation efforts that had a material impact on the firm's financial results:

Therefore, respondents self-selected into the following categories:

- Innovation leader: more than 75%
- Highly successful innovators: 51-75%
- Moderately successful innovators: 25-50%
- Innovation laggards: less than 25%

Figure 3 - Participants by Innovation Success Rate

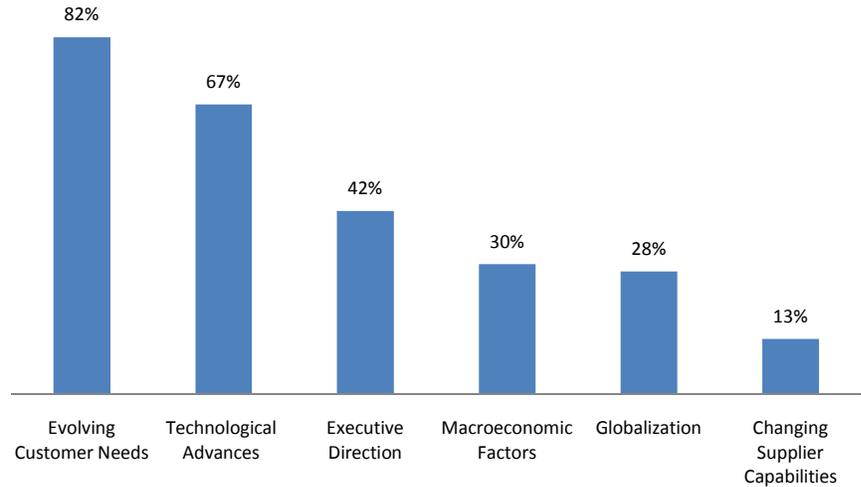


1.3 Key Findings – A Synopsis

Evolving customer needs and technological changes are the primary drivers cited for innovation. Over two-thirds of respondents indicated that these are the forces which most drive their innovation efforts. The importance of customer changes confirms that innovation is a survival imperative. One interviewee described innovation as a matter of “organizational sustainability.”

As consumers cut back on their spending in light of the economic crisis, customer-led innovation becomes even more critical for business survival. It remains to be seen whether the change in buyer behavior will last, but for the foreseeable future our respondents indicate that they are tailoring many of their efforts to support consumers’ demands for value (however their customers choose to define it).

Figure 4 - Drivers of Innovation



Even during the recession, companies are continuing to innovate, and indeed the majority have increased their innovation efforts.

- Over 6 in 10 respondents say that their management team is using the current recession as an opportunity to fundamentally transform their business
- Approximately thirty-five percent are using the current recession to **increase** their innovation efforts

The most successful innovators have well defined processes for promoting and managing their innovation efforts.

- Over sixty percent of the most successful innovators have well-defined processes for innovation, while less than one-quarter of the least successful innovators do.
- Over seventy-five percent of innovation leaders have clear ways to define and prioritize ideas
- Half of the most successful innovators have a clear approach for evaluating the success of their efforts; only seventeen percent of the least successful innovators say the same thing.

Innovation leaders engage employees throughout the organization, develop a culture of innovation, and have a clear executive commitment to innovation.

- One hundred percent of innovation leaders agree that they have a high degree of executive commitment to innovation; fewer than half of the innovation laggards do.

- Over two thirds of the most successful innovators engage their employees at all levels in their innovation efforts, while less than a quarter of the least successful innovators do so.

Being open to partnerships is another differentiator of successful innovators. Customer partnerships are perhaps the most important and powerful tools for successful innovators.

- Thirty-seven percent of all respondents say that they “maintain ongoing customer conversations to support multiple elements of our innovation processes.”
- However, among the least successful innovators, only twenty-nine percent say that they maintain ongoing customer conversation and almost one in five do not engage their customers at all.

2 Key Findings

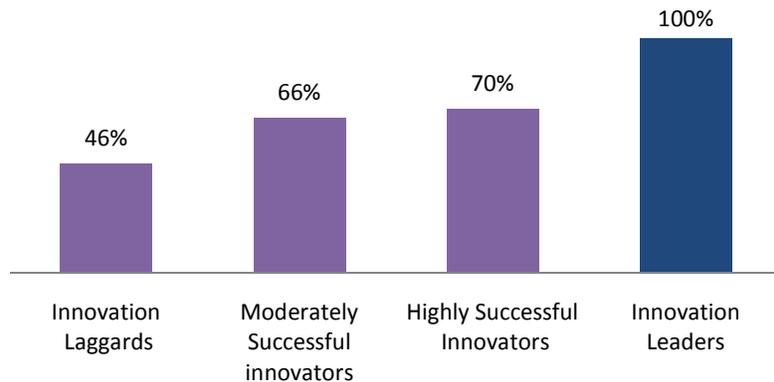
2.1 Innovation as a Survival Imperative

Evolving customer needs and technological changes are the primary drivers cited for innovation. Over two-thirds of respondents indicated that these are the forces which most drive their innovation efforts. Customer evolution is the most compelling catalyst for innovation - even successful companies realize that they must continuously look for ways to meet customer needs in a changing environment if they are to survive.

2.1.1 Recession Response

Companies with higher innovation success rates are using the recession to transform their business rather than cutting back. In fact, one-third of respondents are actually using the slowdown as a catalyst to **increase** their efforts at innovation.

Figure 5 -Our management team is using the current recession as an opportunity to fundamentally transform our business



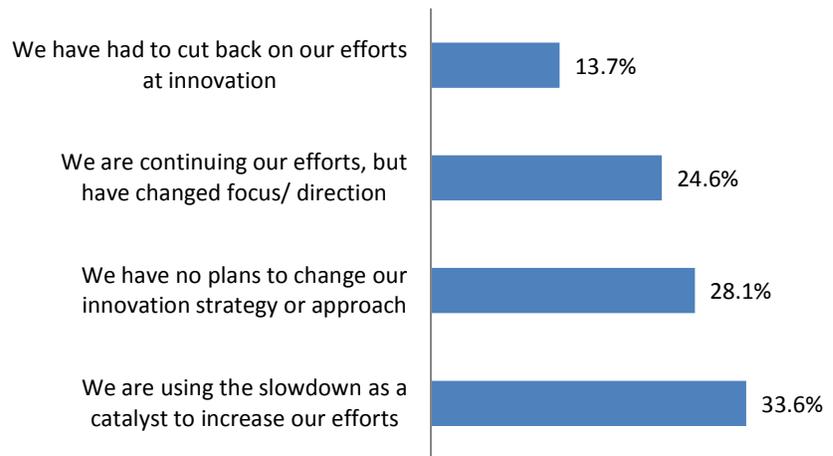
“Why are we continuing to innovate? Because we have a bunch of employees we’re responsible for. And we all have families to feed.”

There is ample research to suggest that companies which continue to invest in innovation during periods of economic downturn emerge stronger than their peers who choose to cut back. The response from our survey participants suggests that they have learned from the last recession; during this downturn fewer than fifteen percent of participants expect to cut back on innovation.

The majority of respondents are actually increasing their efforts; even

those firms which are changing their efforts are doing so as an adaptive response to the changing environment, rather than cutting back. Instead, they are adjusting to evolving customer needs, shifting the focus of their innovation in response to external factors like the federal government stimulus program or looking for new partnerships and business models that will position them for industry leadership when the economy turns around.

Figure 6 – Recession Response



2.1.2 Globalization and Innovation

Successful innovators have been more responsive to both the risks and promise of globalization. By a greater than ten point margin, innovation leaders were more likely to cite globalization as a key driver of their innovation efforts.

Firms like GE and IBM are already taking advantage of the global labor pool and global markets to spur their efforts at innovation. They have found significant opportunities in starting the innovation process at source in emerging markets, creating new products or business models specifically designed for these new markets. These are then opening additional opportunities in the developed world.

“We seek out cross border collaborations – finding people everywhere who want to learn together.”
 We search the globe for new technologies, and to evaluate demos and pilots that we can use in our home market.”

Reversing the Traditional Path of Innovation – GE’s Trickle up Innovation Model



GE’s portable MAC 800 electrocardiograph (ECG) machine was originally designed specifically for clinics in rural India and China, and then repurposed for the developed world. This reverses the historic trend of creating new products in the developed world and then rolling them out to the rest of the world. The company first addressed the needs of the emerging market - for a lightweight, durable

machine that could be easily transported to facilities in remote locations – with the creation of the machine. Then, executives discovered it created new opportunities in the home market.

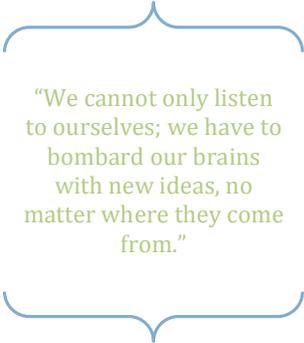
The machine weighs less than seven pounds (compared to sixty-five pounds for a traditional ECG machine), and costs approximately \$2500, or eighty percent less than a standard ECG machine. The device which was designed for third world clinics is now being made available, with some minor modifications, for use in primary care physicians’ offices throughout the US.

Not only has innovation based on global demand opened up new opportunities in the domestic market, but it has allowed GE to do so at a significant time and costs savings. Adapting the Chinese model for the US cost approximately \$225,000 and time to market was reduced to only a few months, whereas in the past, development time for new ECG machines was as much as five years, and development costs were up to eight times higher.

2.1.3 The Global Search for Talent

Globalization is not just a question of opening up to new markets and new customers. Rather, innovators are taking advantage of access to new sources of ideas and labor in international markets. This goes beyond the traditional approach of using international labor as source of transactional outsourcing labor. Rather, companies are using a global labor model as a key differentiator in better serving their customers.

For example, Peppers and Rogers Consulting is a relatively small US firm with about 230 employees. Although it is a US company, over half of the firm’s employees are located in Turkey. Most of the employees



“We cannot only listen to ourselves; we have to bombard our brains with new ideas, no matter where they come from.”

have the experience of having grown up in one country, then gone to school, lived or worked in a number of others. Analysts rotate from country to country to gain broader perspectives. The analysts’ multicultural backgrounds are a significant source of competitive advantage for the organization.

The firm selected Turkey as the source of much of its labor pool, not primarily because of labor arbitrage opportunities (the traditional reason for outsourcing labor), but because of Turkey’s unique characteristics as a crossroads between the East and West. This makes it an excellent source of analysts who understand the contextual factors of clients in the US, Europe and Asia, in a way that often employees in other low-cost labor countries do not.

Founder Martha Rogers explained:

“Our goal is to serve clients brilliantly. The only way for us to do that is to move people around. For it to be done right, we need people who have different backgrounds.”

2.2 Constraints on Innovation

2.2.1 Day to day business demands are the greatest barrier to successful innovation efforts

More than any other factor, respondents cited the pressures of day to day business as a hindrance to their innovation efforts. Over two-thirds of respondents believed that day to day pressures were negatively hampering their innovation efforts. This suggests that innovation is still seen as an activity separate from firms’ ongoing operations.

However, it also reflects the tension between having to deliver against immediate short-term business results and innovating for long-term sustainability.

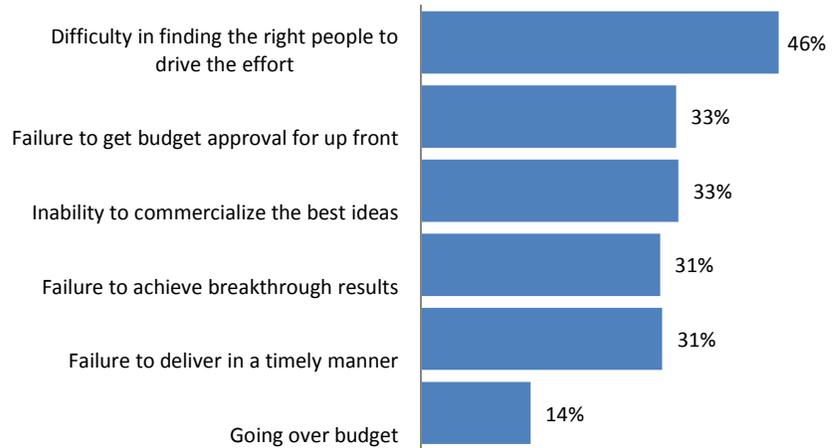
2.2.2 An inability to find the right people also limits firms’ abilities to innovate successfully.

About a quarter of all respondents indicated that they lack the necessary skills in-house to support their innovation efforts.

Further, once projects are kicked off, nearly half of all survey participants indicated that difficulty in finding the right people to drive

the effort poses the greatest challenge to delivering successful innovation.

Figure 7 - Primary Constraints on Innovation



This is no surprise, considering how much attention talent issues have drawn over the last several years. Although this issue seems to have lost in urgency in the current economic climate, it is sure to return once the economy improves. Fast changing and higher-order knowledge requirements, changing preferences of young workers, and global workforce mobility and competition have changed the game around attracting and retaining talent.

The most urgent driver of talent issues, though, is the demographic shift that companies are facing, with the graying of the workforce and an ever higher percentage of workers aged 50 and higher. This change in workforce demographics poses a particular challenge with regards to innovation. Since innovation is future focused, it stands to reason that it should be driven by younger team members who are not bound by the corporate traditions of the past, and whose future will be defined by the innovations of today.

One of our interview partners, for whom social networking tools like Facebook and Twitter are major innovation drivers, specifically emphasized the importance of the special skill set that very young professionals bring in those areas.

Thus, the challenge that companies must address is not only how to attract and retain the skill they need with regards to innovation at a certain point in time. Successful innovators will also have to find a way to imbue their existing workforce with the skills required by the

technological and social developments that become key drivers for innovation.

2.2.3 Financial limitations are the second leading constraint to innovation, a challenge that is likely to be exacerbated by the economic downturn.

Close to half of all firms (forty-six percent) cited financing as one of the leading constraints to their innovation efforts. As might be expected, smaller firms are more likely to be hindered by the lack of financial resources; but even firms with over \$10 billion in revenue bemoan the lack of adequate financing. Over one-third of the respondents from these firms expressed concern about financial constraints.

Companies, therefore, are continuing to look for creative ways to accelerate the process and speed their return on investment.

2.2.4 Delivery challenges – the pitfalls of moving from idea to execution

The challenge of innovation is to move from the idea stage to the execution stage. Fully one-third of respondents stated that they struggle to move successfully to execution and financial return on their innovation efforts. Surprisingly, the most successful innovators were slightly more likely to indicate that they faced challenges in commercialization.

Failure to deliver on time was another common challenge. Three in ten respondents noted that they face problems in delivering their innovation projects in a timely manner. Even a quarter of the most successful innovators noted that this was a challenge for their organizations.

2.2.5 Seeking speedy solutions – new approaches to prototyping reduce costs, increase speed and support more effective commercialization

Some of the ways that companies can manage the risks of innovation and address many of these constraints is to promote controlled experiments or hot-housing of innovation. While controlled

experimentation and iterative design may not work for all businesses, it can be a way for many to gain valuable feedback on their innovation efforts prior to launch or commercialization. For example, Capgemini and Intel's RAIN program takes a new approach to rapid decision making and accelerated design, using 24/7 assets to increase the speed of technology deployment by as much as forty percent.

One of the key elements of Capgemini's approach to innovation is the practice of rapid, iterative design and experimentation. Using our Rapid Design and Visualization (RDV) Labs or Accelerated Solutions Environments (ASEs), we are able to bring together designers, executives and end users to visualize the future, design, create and test multiple iterations in search of the innovation that sticks.

Other firms are taking advantage of virtualization to prototype and engage in designs discussions, without the expense of real world testing. For example, Palomar West, a new healthcare facility being built by Palomar Pomerado Health in San Diego, CA has started life as a completely virtual facility on secondlife.com. Visitors can view the new facility, explore the available technology and experience the leading edge "evidence-based design" that will be implemented in the real world facility.

Figure 8 - A Virtual Hospital Room from Palomar Pomerado Healthcare's Facility on secondlife.com



Much of the proposed technology will not be available until after the new hospital opens, so the facility is using the virtual hospital to test patients' reaction to and acceptance of some of the healthcare and other technology innovations. Palomar's Chief Technology and Innovation Officer, Orlando Portale says, "Now we can collaborate with our staff to figure out where equipment will be placed—it's a very rich environment to do simulation and modeling"¹

¹ "Palomar Pomerado Health uses Second Life to explore the hospital of the future", Healthcare Design, February 2009

Cisco Systems is also using the prototyping capability of the virtual world to drive parts of their innovation efforts.

"The real value of Second Life for Cisco is the opportunity for spontaneous customer interaction, said Christian Renaud, chief architect of networked virtual environments for Cisco. "It's like a birds-of-a-feather session that goes on 'round the clock," he said. He routinely encounters customers in Second Life who want to talk to him about their needs and what they want Cisco to do. "I bump into customers and partners multiple times a day in Second Life. In 11 years at Cisco, walking through the parking lot in San Jose, I never get people come up to me and say, 'I'm a Cisco customer, have a second?"²

Finally, other firms are testing innovations with experience labs in controlled real world environments. The Business Innovation Factory in Rhode Island offers another model for experimentation and innovation. The Factory is designed to support systems level innovation by providing a controlled environment within which partners can work across traditional organizational boundaries to find game-changing solutions:

"We believe that complex, game-changing innovation can only be tried, tested and proven in real-world environments. To find the next big idea, innovators need an environment where they can explore, experiment and implement with less risk and successfully transfer what they've learned back into their organizations"³.

Rhode Island's small size, combined with its demographic, geographic and business diversity, provides an ecosystem that serves as a microcosm of the United States. The Business Innovation Factory believes this provides a highly manageable environment within which to test and adapt big concepts before an expanded rollout.

2.3 Partnerships Across the Ecosystem

2.3.1 Although most ideation and development takes place in-house, innovation leaders are more likely to engage external partners

In recent years, the world has seen major technological and social advances which have facilitated the diffusion of information. Today information can be transferred so easily that it seems impossible to

² Using SecondLife as a Business to Business Tool, Information Weekly Blog, April 26, 2007

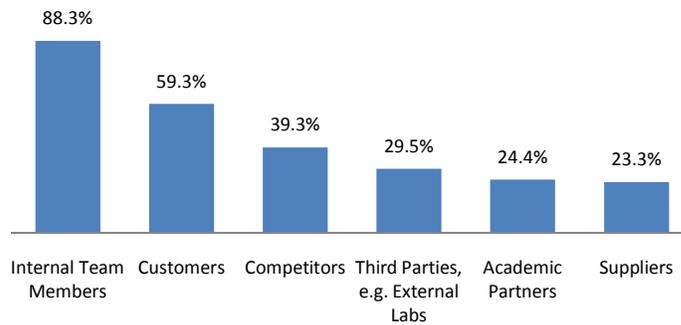
³ <http://www.businessinnovationfactory.com/projects>

prevent. The open innovation model suggests that since firms cannot stop this phenomenon, they must learn to take advantage of it.

Innovation is more likely to emerge when firms reach beyond their corporate and industry boundaries take advantage of intersections across different fields, cultures, people and industries.⁴ This is more likely to occur when companies incorporate all of their stakeholders, as well as non-traditional partners, in the process of innovation.

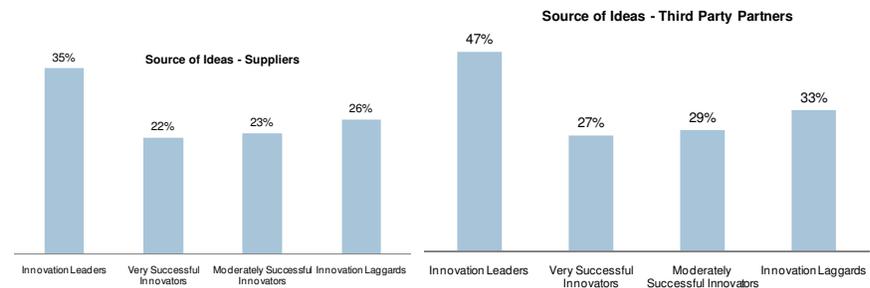
However, our survey respondents suggest that most firms are not taking full advantage of their extended ecosystems (customers, suppliers, business partners, competitors) in their innovation efforts.

Figure 9 - Respondents' primary sources of innovation / new ideas



Innovation leaders though are, by a large margin, more likely to engage external partners as a source of innovation.

Figure 10 - Innovation leaders take advantage of external sources of innovation more than other firms



Boeing is an example of successful innovation by using external sources, such as suppliers, not only for ideation, but also for the execution of a new product – in this case an airplane.

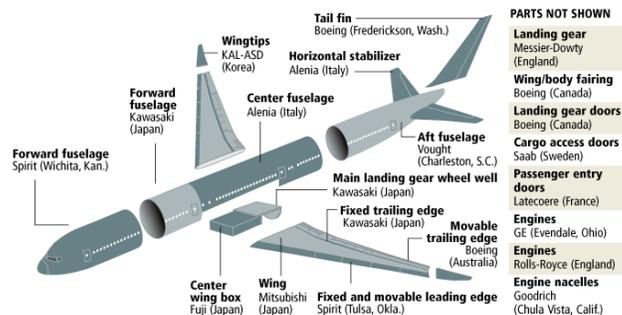
⁴ Frans Johansson, The Medici Effect

Boeing – Crowdsourcing Aircraft Design



Boeing wanted to launch the 787 Dreamliner, its first all-new commercial airliner in 12 years, starting in 2003. In the past, Boeing followed an extended development process, wherein design teams created drawings and sent them off to suppliers, who then manufactured parts and shipped them to Boeing's factory floor. But for the Dreamliner, Boeing harnessed the collective expertise of its suppliers through mass collaboration to come up with a jetliner that was cheaper and more fuel efficient.

Applying the concept of 'crowdsourcing' Boeing facilitated engineers from approximately 100 companies to come together and collaborate through face-to-face meetings and systems tests during the early stages of the design process. Sophisticated database software was used, plans were shared and designs were discussed and revised on-line in real-time. Boeing also carried out real-time simulations on developed components to test them for future problems and incompatibilities.



This "crowdsourcing" effort by Boeing, and the resulting collaborative environment, ensured that suppliers met their deadlines. The collaboration resulted in a series of impressive innovations: a new wing made from lightweight composite material, which Boeing developed with Mitsubishi; and a new maintenance system that beams data about non-critical repairs to ground crews via satellite.⁵

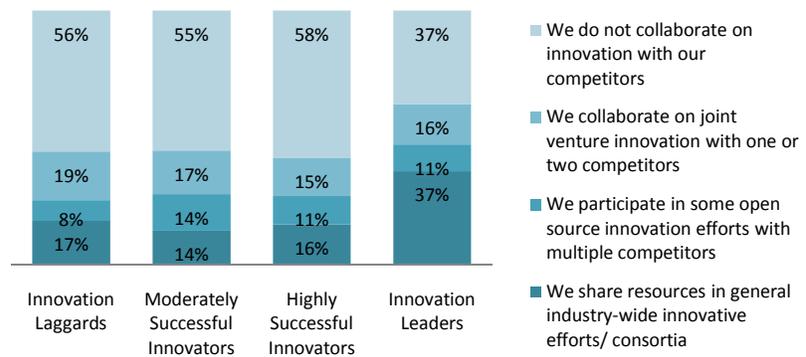
⁵ Source: MRD Lab Analysis. BNet.com, "For Boeing, It takes a village to build a new airplane

“We cannot only listen to ourselves; we have to bombard our brains with new ideas, no matter where they come from”

2.3.2 Collaboration with competitors offers both partners increased opportunity for successful innovation

Our survey shows that firms that collaborate with multiple competitors using open source innovation have higher innovation success rates.

Figure 11 - Firms that collaborate more with competitors have a higher success rate of their innovation efforts



Firms say the most significant reason for not engaging in joint innovation with competitors is the fear of losing competitive advantage. We were surprised to learn that concerns about regulatory violations (e.g. anti-trust and collusion) were relatively low when companies considered whether there might be value in collaborating on innovation with their industry peers.

The concept of competitive collaboration has long been popular in the pharmaceutical industry where the high costs of research and development have encouraged firms to form partnerships and alliances in the drug development process. Merck & Co., Pfizer Inc., and Eli Lilly & Co. have partnered with a venture capital firm to create Enlight Biosciences LLC, a for-profit company, to reduce R&D costs and increase new product pipelines.

The three competitors have pooled an initial \$39 million in hopes of new technologies to advance drug discovery and development. The concept is, if kept at the pre-competitive stage, beneficial for all companies involved since the typically long development times and high R&D costs will be shared amongst the competitors.

Similar to pharmaceutical firms, oil and gas companies have also partnered to share initial costs. As demand for oil has increased, oil companies are looking for new sources of crude outside of the troubled Middle Eastern region. Several companies are collaborating to extract and refine the recent oil sands discoveries in Canada. Oil giants such as Royal Dutch Shell, Marathon Oil and Chevron or ConocoPhillips and Total have created joint partnerships to develop

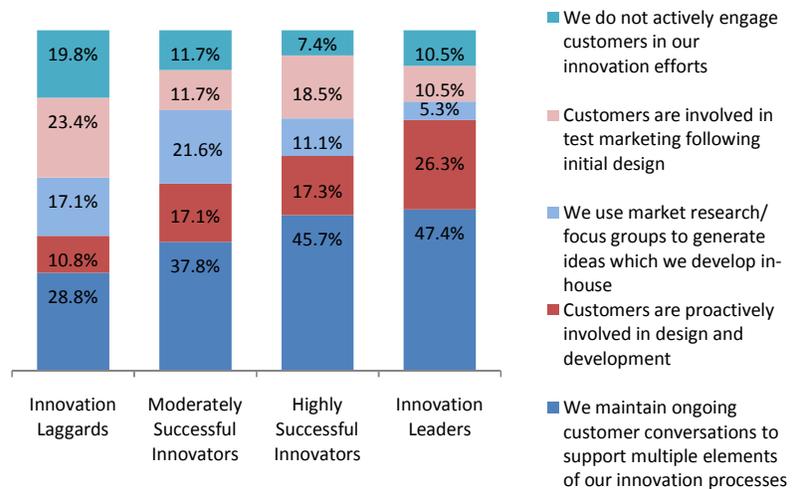
these resource-rich sites by sharing the high initial investment costs.

2.3.3 Involving customers early in the innovation process leads to higher success rates

The earlier that companies engage their customers in the innovation process, the more likely they are to achieve innovation success.

Our research found that the least successful firms did not engage with their customers at all on innovation, while the most successful innovators were most likely to say that they “maintain ongoing customer conversations to support multiple elements of (their) innovation processes.”

Figure 12 - Firms that involve end consumers in their innovation efforts and their innovation success rate



With current technology, consumers have more power and more access to information anywhere at any time about a company, its products and prices. But this technology is also an opportunity for companies to interact with their customers and understand their needs. Technology now allows companies to move their customer relationships from simple transactions to richer, more complex interactions.

“How can I identify my customer’s unmet needs? What do my customers need that they cannot get today at any price?”

The economic downturn has prompted a shift in consumer buying behavior which has a direct impact on how companies should think about their relationships. With consumer spending accounting for two-thirds of US Gross Domestic Product (GDP), American companies must innovate within a new consumer dynamic of thrift and the search for trust.

To be truly innovative, companies are moving beyond a product-focused approach to an approach of true customer focus. The relationship with customers is no longer one way, and is no longer dictated by the corporation. Web 2.0 has given consumers unprecedented opportunities to express themselves and to find a global audience in their own efforts to define a company’s image and to make their customer needs known. Companies can use then available tools, along with the natural desire for community and peer interaction, to help shape their customer conversations.

For example, Starbucks is using mystarbucksidea.com to engage in conversations with customers who will have a direct hand in helping to design products and shape the customer experience. Customers can submit their ideas, and, even more powerfully, can vote for or against other customers’ ideas, allowing Starbucks to truly tap into the collective wisdom of its most loyal and ardent fans around the world. Active solicitation of customer votes is one of the tools that firms can use to separate the true golden nugget in the melting pot of ideas.

Similarly, Dell Computers is using its Ideastorm community to foster customer engagement. Its goal is to allow computer users to share ideas and collaborate on new products or product improvements. The firm is using this as a model to determine what products and services customers want. In addition to submitting ideas, customers can review and vote on ideas so that the firm can quickly see what concepts strike a chord and are most well received by its most loyal targets.

But in order for this sort of customer conversation to truly work, companies must be seen to be visibly engaging with and responding to customers. They must do so both with demonstrable corporate actions taken as a result of customer suggestions(which may take time to implement), and with real time feedback, acknowledging what steps they are taking to respond to customer input, or in some cases, explaining why they choose not to move forward with some popular customer ideas.

Not only has technology given consumers a greater voice, it has also given companies unprecedented opportunities to engage with customers and create each customer’s individual “you experience”. For example, Tesco in the UK has taken the concept of individualized customer experience to new levels, with its approach to customer analytics and customer engagement. Tesco’s quarterly direct mailer has over six million variations, based on individual customers’ shopping history, location and demographics.

Therefore, it is possible for all the Tesco customers in one neighborhood to receive a different store flyer customized to their individual buying patterns and customer preferences. The supermarket chain reputedly has identified over 1.2 million different customer segments⁶. As a result, Tesco's direct to consumer program's response rate is twenty percent, compared to the UK average of only 1%.

Nike+ and Apple – The 'You Experience' on the run

Nike+ was born as a multi-channel, multi-sensory marriage of Nike and Apple technologies, aimed at creating an immediately resonant experience for a broad target market, from marathoners to fitness joggers. It provides a robust platform of virtual racing, progress tracking, motivational goals and stories, global community comparison tools.

The solution:

Hear you run: A sensor in the shoe helps the runner hear, through their iPod, details about their pace, time, distance and calories burned.

See you run: When the iPod is docked and synchronized, Nike+ software loads the runner's workout statistics to a website where the user is able to track his/her workout progress

Connect and Challenge: Run data can be used to track progress, set goals, motivate runners, win rewards and challenge pals or all Nike+ users

Using web 2.0, Nike+ is a unique way to engage with and promote higher levels of brand identity amongst Nike users. It delivers increased value to Nike users through a unique way of collaborating and connecting with current and prospective Nike users with targeted advertising designed to meet their individual needs.⁷

2.4 The Importance of Inspiring Leadership

2.4.1 Innovation leaders are more likely to cite committed leadership as a key driver of innovation

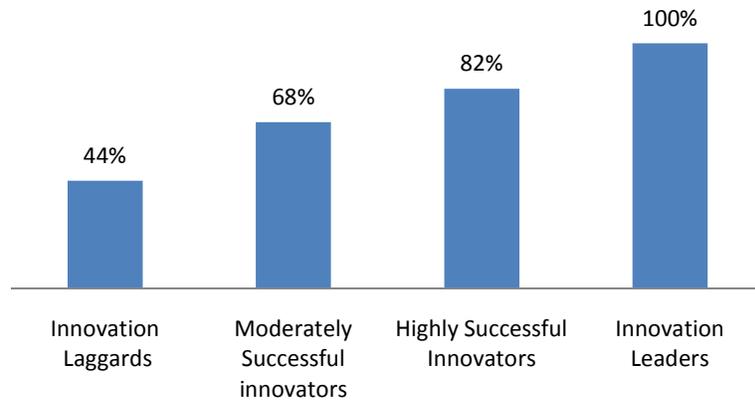
Committed leadership appears to be one of the most important factors for innovation success. Innovation leaders were unanimous in confirming that there was a high degree of executive commitment to innovation at their firms.

⁶ Marketing Direct, "Tesco's Not So Secret Weapon", June 2007

⁷ Source: MRD Lab Analysis. Nike+ website. 'Nike does business 3.0' Phill Butler, 2007.

One survey respondent described his company’s culture as one of “leadership among equals”. Employees receive direction from the highest levels of the organization that innovation is a priority. Executive commitment to innovation, and alignment with overall corporate goals, is especially important during the current difficult economic environment. Many companies may need to adjust their business tactics during periods of economic crisis, but a clearly defined corporate and innovation strategy helps support the right decision-making for long-term success.

Figure 13 - Respondents who believe there is a high degree of executive commitment to innovation at their firm



Many leaders align their innovation efforts directly with the company’s overall business strategy. A leading Canadian utility, for example ties its innovation efforts directly to its strategic commitment to conservation. The executive team has set the strategic objective of meeting over seventy-five percent of its new demand for power via conservation, rather than the build of new generating capacity.

Therefore, the entire organization is aligned around the most effective ways to serve their customers, support customers’ efforts at conservation and expand the rollout of “smart grid” innovation to support their leadership vision.

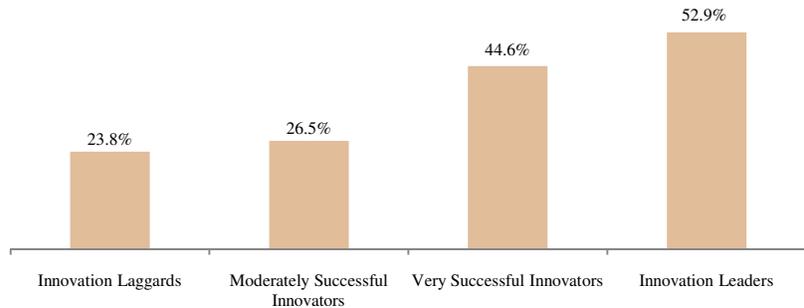
This leads the organization to continue its efforts at finding innovative ways to promote conservation, as well as to develop and implement innovative smart metering technologies, despite external factors, such as the recession, that might otherwise derail innovation efforts.

2.4.2 Even those firms without a role formally dedicated to

innovation have greater success rates if there is well-defined executive commitment.

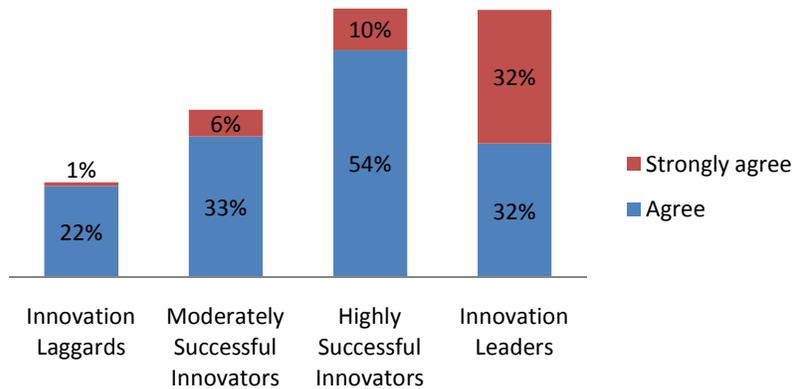
While innovation leaders are somewhat more likely to have an executive formally dedicated to innovation and a dedicated innovation division, this is generally uncommon among all businesses.

Figure 14 – Respondents whose firm has a formal role dedicated to innovation



In place of a formal innovation role or function, having strong executive commitment to innovation often increases the probability of success. This is further enhanced by having defined processes and governance to support innovation. (See Section 2.6 for more on innovation processes).

Figure 15 – “Our firm has a well defined process for promoting and harvesting innovation”



In fact, embedding innovation in the organization may be more effective than trying to create a separate division and silo'ing innovation as something for which only one group or person is responsible.

However, those firms which do have a dedicated innovation executive are more likely to have the other key capabilities and features that support successful innovation, such as defined processes, tools and methods.

One firm has a Chief Innovation Officer, who is responsible for supporting and promoting the organization's culture of innovation. This executive serves as coach to others throughout the organization – "He doesn't tell us what to do; instead he gives teams various tools and techniques to help stimulate the process of innovation in their own groups".

This seems like an effective model for engaging a dedicated innovation executive. The focus is on building individual innovation capabilities, and encouraging creative thinking among all employees, by providing them with the tools and skills to embed innovation into their daily activities.

2.5 The People Principles of Innovation

2.5.1 Creating a Culture of Innovation

A small but significant group of respondents indicated that their corporate culture was a significant hindrance for their innovation efforts. Some described it simply as "a problem of culture" but others were more specific:

- "Too much process and fear of failure"
- "Fear of failure; unwillingness to fail and recover"
- "Lack of management commitment to take the time necessary to deliver the results; if they can't see it quickly, they want to abandon"
- "Culture and leadership – risk averse and slow to change"
- "Understanding and appreciating risk"

The common theme of risk aversion stresses the importance of creating a culture that supports "failing forward" and learning from failures as well as success. Ironically, the most successful companies may fall victim to their own success; success appears to breed complacency when it comes to innovation. One biotechnology client noted, "When you are rich, you don't take risks. When you are fighting for survival is when you are willing to try new things." This is perhaps most clearly demonstrated by the American automakers whose fight

for their very survival is causing them to rethink their business models, business processes and products in ways that would have been unthinkable a few years ago.

The most innovative companies are likely to exist in a constant state of “divine discontent”, i.e. they encourage relentless curiosity and an ongoing search for the next horizon in the art of the possible. It appears that the common thread among innovation leaders is that these firms promote a culture of continuous learning and risk taking from the top down. They encourage employees to ask questions, to try new things and to look for opportunities to take intelligent risks. This means that not only do these companies reward successes, but also “smart failures”. However, for many companies, this is easier said than done.

2.5.2 Most companies struggle with engaging employees at all levels in the innovation process

There are two steps in the innovation process in which the engagement of employees is critical for innovation success. The first step is idea generation. Since each employee brings their own life experiences, creativity and knowledge, involving more employees is an obvious way to draw from a larger pool of ideas. The greater number of people involved, the more ideas for innovation can be created. Second, innovations cannot be sustainably implemented without the buy-in and support of all affected employees. This is especially true for process and business model innovation, which often bring about organizational change, but also applies to product innovations.

Over thirty percent of survey respondents felt that employees at all levels and functions throughout the organization were not actively involved in innovation efforts. In those companies, creative potential still waits to be leveraged in the search for innovative ideas. In order to engage all employees in innovation, processes for engagement must be in place – for example, employees need to know where to submit ideas, or regular department meetings dedicated to collecting innovation ideas can be held.

To fully leverage the innovative potential of every single employee, innovation has to be a part of the company’s culture - one of the values that a company treasures, rewards, and promotes. One of our innovation leader interview partners told us that they believe in building innovation into training, recruiting, and performance evaluations to help make it part of their DNA.

2.5.3 However, broader engagement with employees at all levels is positively correlated with successful innovation

Our previous research on trends in business transformation found that thirty-two percent of respondents cited buy-in from employees as key success factor to transforming a business. Lack of acceptance or adoption by employees was seen as one of the most common reasons why transformation efforts fail.⁸

The same study indicated most managers underestimate the importance of employee engagement. Often, there seems to be a divide in the perception of innovation between executives and lower-level employees of an organization. In our “Trends in Business Transformation” study, only twenty-six percent of executive felt their employees failed to accept transformational changes within their organization. Conversely, fifty-five percent of lower-level employees believed this was the case.

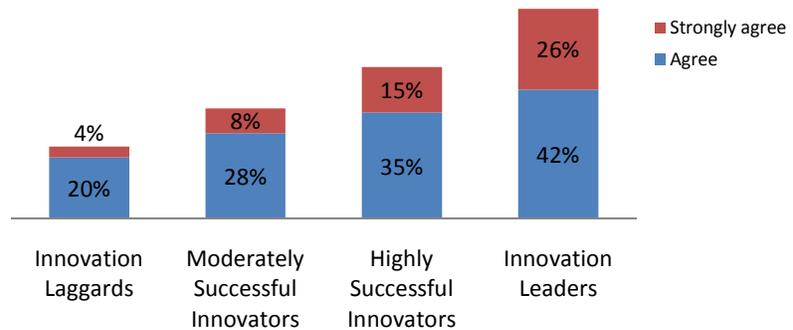
Engaging employees and gaining buy-in at all levels, especially from within lower-levels of the organization, thus is essential to successfully innovate. People and change management issues should be addressed in a dedicated way as part of ongoing innovation efforts.

Companies which engage employees at all levels tend to innovate more successfully than other firms. Over sixty-eight percent of the leading innovators in our survey agreed that “employees throughout our organization are involved in the innovation process,” compared to over half of the least successful innovators who disagree. OAC Management for example, prides itself on promoting employee engagement by having an all-employee forum every two weeks. “It’s a way to make sure are people are constantly learning, and having a regular schedule helps drive accountability,” explained CEO Eric Peterson.

“All employees need to be accountable; we build the discipline of regular meeting so that, at the very least, people will complete fifteen minutes before the meeting what they were supposed to finish a week ago.”

⁸ Capgemini Consulting: Trends in Business Transformation 2007

Figure 16 – “Employees at all levels and functions throughout the organization are actively involved in our innovation efforts”



For many organizations, the challenge is how to make such avenues of employee engagement scalable as the organization grows. One life sciences company, for example, is exploring the idea of how to institutionalize an annual global innovation forum, in order to consistently engage a wide range of employees in the innovation process.

Over eighty-eight percent of survey respondents agreed that the primary source of innovation/new ideas for their organization came from internal team members. Fostering an environment that allows for all employees to contribute to and be engaged in innovative measures increases the likelihood of such measures being developed.

We have found that Capgemini’s Accelerated Solutions Environment, a technology enriched collaborative working environment, creates a natural forum for employees to break down internal barriers. This fosters richer innovative thinking and more effective and rapid decision-making. One client saved over forty percent on costs and over sixty percent on implementation time compared to their traditional approach to innovation and project management.

The importance of these types of gatherings is that they foster the right environment for the “violent exchange of ideas” (as one interviewee explained it); they promote the airing of healthy differences in an atmosphere of mutual respect, which is critical to generate the fresh thinking needed to drive innovation.

2.5.4 Collaboration across functions remains a challenge but is closely correlated with successful innovation

Our interviewees indicated that they make a conscious effort to integrate multifunctional teams, which is a major component of an innovation culture.

At Crayola, the goal of more effectively meeting customer consumer needs has led the organization to reorganize in ways that facilitate greater collaboration across functional groups. To this end, the company has been reorganized around customer consumer platforms, which are based on specific customer consumer insights. Platform teams comprise marketers who lead cross-functional groups to conceive, develop, test and produce finished goods that deliver to the consumer insight.

One such platform was called “No Limits.” It was designed around the customer consumer insight that the potential for messiness was a barrier for mothers in allowing their children to play with finger paints. Rather than seeing this as a barrier, the company designed the “no limits” platform, led by portfolio marketers, to bring together people from different functional areas within the company to address the specific customer consumer need.

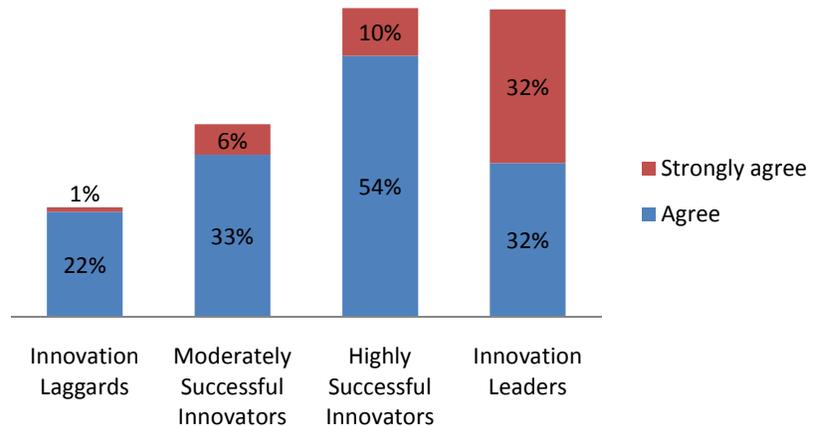
The result was the introduction of the innovative Color Wonder paper and paints, clear fast drying gels which have the tactile sensation and play experience of traditional finger paints, but which only appear in color on specially treated paper. That innovation has led to the introduction of several other Color Wonder products based on the “no limits” platform.

2.6 Tools and Techniques

2.6.1 Successful innovators rely on process to help drive results

Over sixty percent of the most successful innovators have well-defined processes for promoting and harvesting innovation in their company, compared to less than a quarter of the least successful innovators.

Figure 17 - "“Our firm has a well defined process for promoting and harvesting innovation ”



Ironically, the process of managing innovation may be better described as the process of creating a large enough pipeline and managing failures effectively. Leading innovation researcher Clayton Christensen describes the process as:

"... managing unpredictability. Fail fast. Let a thousand flowers bloom. Venture capitalists have structured their work to account for the reality that 80% of the ventures they fund will not be commercially successful."⁹

The benefit of a formalized innovation process is that it brings accountability to an otherwise random process, and creates a sense of focus. When asked about the critical success factors for taking an innovation from ideation to successful execution, one CEO described the key as process imbued with "intentionality, diligence, and delivery in style."

To be successful, the process must be:

- Intentional/ focused
- Clearly defined
- Easily understood
- Accessible

⁹ Clayton Christensen. The Conversation, www.hbs.edu, "Successful Innovation: The Intersection of Theory and Practice"

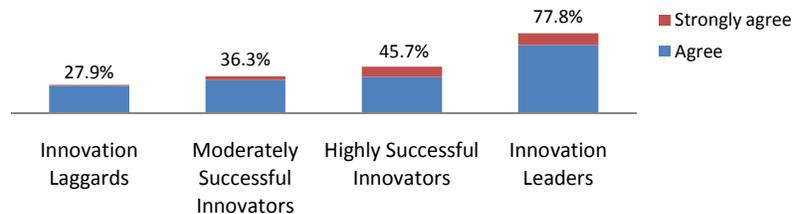
- Action-oriented
- Repeatable

However, companies must constantly reevaluate their processes to ensure that process does not become more important than results.

2.6.2 Effective portfolio management and the ability to prioritize projects is a key characteristic of successful innovation

More than three-quarters of innovation leaders have a defined approach to prioritizing and driving innovation. By contrast, just about a quarter of the least successful innovators do.

Figure 18 - "We have a clearly defined way to prioritize and drive our innovation efforts"



Portfolio management activities build further discipline into the process. They also provide a mechanism by which companies can decide whether to “fail fast” or continue with development, and provides guidelines against which to measure smart failures. It also ensures that the firm’s innovation efforts are aligned with broader corporate objectives and in line with the firm’s strategic goals.

Vijay Govindarajan, of the Tuck School of Business at Dartmouth University, has suggested that up to twenty percent of a firm’s efforts should be focused on expanding into completely new spaces, as the organization plans for the future, while up to another twenty percent should be dedicated to expanding into spaces adjacent to the organization’s core business.¹⁰

Formal management of the organization’s innovation portfolio helps to provide the right balance between the incremental improvements

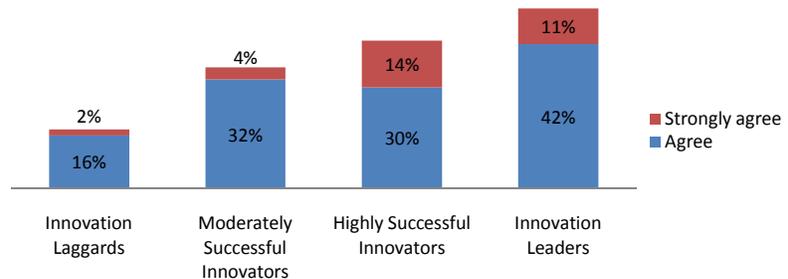
¹⁰ www.vijaygovindarajan.com

needed to sustain current business and the disruptive innovations needed to position the firm for the future.

2.6.3 Most firms still need to find more effective ways to evaluate the success of their efforts at innovation

Only a third of all respondents indicated that they have a defined approach to evaluating the success of their efforts. However leading innovators are more likely to do so.

Figure 19 - We have a well-understood methods to evaluate the success of our innovation efforts



In order to create a sustainable culture of innovation, companies must *a priori* establish the criteria against which their efforts will be judged and measured. While financial measures are obvious KPIs, organizations should also evaluate the degree to which any failures advance thinking in new areas or open new opportunities.

2.7 Business Model Innovation

2.7.1 Business Model Innovation is becoming the new strategic differentiator

In IBM's 2006 Global CEO Study, sixty-five percent of leaders anticipated fundamental change in their industries in the next two years. As a strategic response, many CEOs are innovating in operations and/or products and services. Business model innovation however, results in an entirely differently type of company that

“We think innovation is about creating the new business model. What is the new best way to relate to our customers and maximize our value to each of them?”

competes not only on the value proposition of its offerings, but aligns its profit formula, resources and processes to enhance that value proposition.

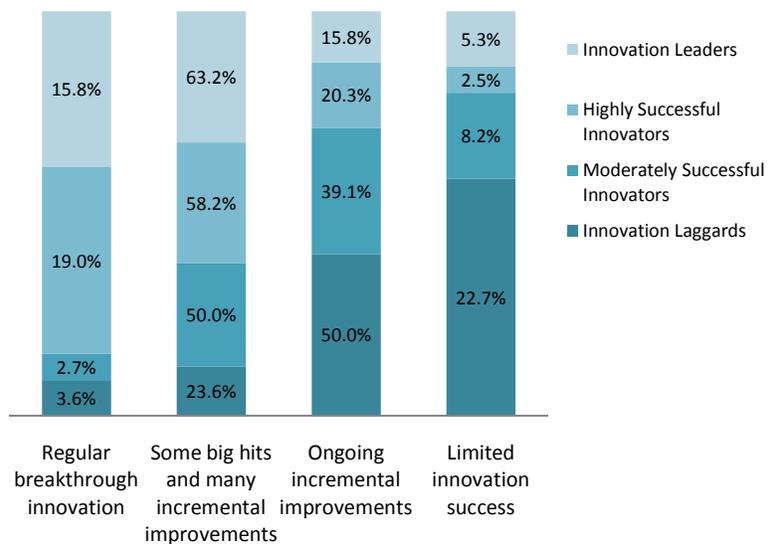
The Franchise head of a global biotechnology firm explained to us that although margins in the life sciences industry are high, leaders of companies like his should ask themselves, “How would our business be different if we had the margins of a consumer packaged goods company? Or a car company? What would we do differently?” He sees this as the next frontier for the pharmaceutical industry, given the rapid shifts in regulation and in healthcare payer relationships:

“We are at the cornerstone of history. Little by little margins are going to shrink... we can contain costs... but that’s not going to solve the problem. Can we break free of constraints that are self-generated? We must be willing to change the rules.”

This is the essence of business model innovation. The IBM study showed that business model innovation pays off: financial outperformers put twice as much emphasis on business model innovation as underperformers.

The results of our survey confirm this as well: the most successful innovators of business impact are also those most likely to have had regular breakthrough innovation.

Figure 20 - The Results of Innovation



Incremental innovation is not enough anymore. In several industries new business models are threatening or even replacing established companies and conventional ways of doing business. Established companies have to find new and innovative business models to

compete against growing competition. Business model innovation helps companies to increase their capacity to manage continuous change and constantly adapt to rapidly changing business environments by injecting new ideas into their business model.

As Martha Rogers (Pepper & Rogers) explained:

“Realize that innovation is not introducing a new product but introducing a new business model, a new way of doing business which meets the customer’s known and unknown needs. We should ask ourselves, ‘What can I provide to my customer that solves their problem, but that they cannot get today at any price?’ ”

Radiohead and the New Model of Music Distribution

For their latest album the band Radiohead, used a new business model for bringing it to market. Radiohead’s ‘In Rainbows’ album can now be obtained in two ways; by downloading the CD or via Discbox, which includes a vinyl album, bonus CD, and assortment of other trinkets. Both options are available through the In Rainbows site. Radiohead is able to do so because it is not tied to any record label at the moment. The new CD is offered on an “it’s up to you” basis, letting the fan determine what they are willing to pay.

comScore, Inc. has released a study of the online sales of In Rainbows. According to their study, in the first 29 days that the album was available, 1.2 million people visited the In Rainbows site. A significant portion of them downloaded the album. Of all people that downloaded the album, thirty-eight percent were willing to pay, with an average price of \$6.

Looking at it from a business model perspective Radiohead innovated from the client perception side (choosing a different distribution channel), as well as from the ecosystem side (not working with a record label). They changed their partner network and their core capabilities (from making only producing albums to also publishing them). This has all resulted in different cost and revenue streams while maintaining financial success.

3 Conclusion

3.1 Key Themes

Several key themes have emerged from our research and conversation with executives of leading innovators:

- The current economic crisis has not negatively affected innovation efforts at leading innovators. Rather, these firms are using the recession as a catalyst for even further innovation.
- Leading innovators distinguish themselves by having structured processes for innovation and incorporating innovation into their corporate DNA.
- The most successful innovators engage their customers throughout the innovation process and use all available avenues to keep the customer conversation going.
- While collaborating with competitors is tricky, successful innovators devise ways to collaborate with competitors without losing their competitive advantage

3.2 Some Recommendations

For those firms wishing to enhance their innovation efforts we share some of the common learnings:

Engage with your customers:

- Develop a customer-focused rather than a product focused mindset
- Take advantage of Web 2.0 to engage in customer-driven conversations
- Use analytics to identify customer patterns that can suggest new avenues of innovation
- Move beyond mass customization to create individual customer relationships and interactions
- Take advantage of opportunities for cultural anthropology with your customers; watching how consumers behave can point to unmet (and, often, as yet unknown) needs

Take advantage of the broader ecosystem to support more effective ideation and experimentation:

- Reach beyond traditional partnerships to look for new avenues of innovation - such as third party labs, members of the individual inventor community and academic institutions - to explore new

opportunities for innovation

- Explore opportunities to collaborate with smart competitive partnerships or industry-wide colloquia
- Embrace globalization as a source of intellectual capital and challenge assumptions around traditional models of technology diffusion
- Take advantage of advancements in technology (e.g. cloud computing and virtualization) to enhance collaboration across borders and corporate boundaries

Establish a formal innovation process, but do not become a slave to the process:

- Establish clear criteria to define the structure of your innovation efforts
- Define a portfolio management system that works for your organization and is aligned with the firm's strategic objectives
- Institutionalize involvement from employees at all levels
- Develop a simple model to cover each of the key elements of innovation: ideation, experimentation, commercialization
- Design schedules to maintain focus and drive accountability
- Invite members of the organization's wider ecosystem to become actively involved in the process

Build experimentation into the process:

- Use an iterative design model to see results – visualize and design, experiment, iterate
- Take advantage of custom environments designed for iterative experimentation – experience labs, innovation factories, solutioning centers
- Explore the opportunities for virtual prototyping and non-traditional experimentation offered by new technology
- Involve customers in early experiments

Remember the people principles of innovation:

- Establish the importance of innovation as a strategic imperative and set the tone at the executive level

- Encourage a bottom-up approach to innovation – support innovation from employees at all levels and in all functions
- Actively engage younger employees in the innovation process
- Align performance measures and KPIs to reflect the importance of innovation - reward smart failures as well as successes
- Hire people with the right mindset – future focused, open to the art of the possible – and teach them the skills needed to manage innovation
- Encourage curiosity and inquiry
- Build innovations skills into the organization by including them as part of employee development and training programs

Innovation leaders are successful because their approach to innovation is intentional. They define their organization by their willingness to experiment, to try and to fail, and to learn from others outside the organization. They also distinguish themselves with a relentless focus on their customers and the customers of the future. These are lessons worth remembering, especially in times of challenge, on the path to recovery and renewed prosperity.



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