



ASSESSING THE STATE OF INNOVATION

The Top Four "Must-Do" Areas of Innovation Practice

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RESPONSE

The last few years have seen a major wave of management attention on innovation. For a time, regular articles appeared in *BusinessWeek* and other publications; a series of prominent books like *Blue Ocean Strategy*, *Open Innovation* and *The Innovators Dilemma* (along with a flotilla of greater and lesser books) vied our attention; new innovation buzzwords like “Design Thinking,” “Idea Management” and “Voice of the Customer” demanded action.

Swept away with enthusiasm and by the promise of easy growth, many of us tried many of these innovation approaches. We had varying degrees of success.

After the recession and with brightening prospects, it is a good time to look over this past wave of attention on innovation and assess what we have learned. In June of 2010, a group of about 30 executives active in innovation from a variety of industries came together to share experiences and develop their collective expertise by assessing the state of innovation.

Some of these approaches are truly new and great ideas that will become part of the canon of innovation. Ignore them at the risk of hampering your growth. Others of these approaches are great ideas, but you probably already know them, a sort of “old wine in new bottles.” We endorse these approaches and celebrate their renewal in the recent wave. A few of these approaches were significantly oversold or ineffective, “innovation fads” if you will, that will fade into history like dot com enthusiasm. Ignore these.

The bottom line: Our executives identified four areas of innovation practice as must-dos. If you have started down the path in these areas, kudos to you – keep up the work of continuous improvement. If you have not started these things, you risk missing out on some of the real gems of insight polished over the last ten years. Here are the top four vote-getters from a list of about twenty candidates.

ALLOW INNOVATION TO CHALLENGE YOUR STRATEGY

It is an article of faith that innovation should start with strategy: First, figure out what your corporate strategy is, then innovate around it. To everyone’s astonishment, we found out that this conventional wisdom is wrong and counterproductive, or at least very misleading.

At the beginning of the assessment, we asked executives to reflect on what they had tried in innovation in the last several years and to make a list of things they were disappointed with and things they felt had produced fantastic results. No theory, no pitches, just what worked and did not work. Then we clustered the experiences on each executive’s list into meaningful groups to map out the innovation landscape.

One of the clusters we named “fit to strategy.” The cluster contained a surprising number of disappointing experiences, with people calling out things like “innovation aligned to corporate strategy” as a major problem. During the discussion of this cluster, it became clear that innovation frequently occurs at the boundaries of the existing business, and therefore often seems not to fit. People impose constraints and assumptions on the current business and strategy too quickly, killing great ideas too early and unintentionally converting innovation into mediocrity.

History is littered with examples. It is only a bit of an exaggeration to say that many great companies were created in frustration as an effort to escape the strategic shackles

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of a now moribund predecessor. Xerox PARC famously invented the personal workstation, computer networking and laser printing, while Xerox only capitalized on laser printing. A host of other companies, such as Apple and 3Com to name only two, have built an entire industry around PARC innovations.

Our group also came across examples of ideas that at first blush challenged corporate strategy, but with the maturation of the idea helped reinvigorate it. Paraphrasing one executive, “In the end, our strategy is to serve customers with our capabilities. This imperative trumps pre-conceived ideas dreamed up in the corner office. Properly positioned, innovation creates a learning opportunity for the executives about what their strategy should be.”

To be clear, we are not saying strategy is unimportant. Usually, goofy ideas or opportunities a company has no business pursuing are properly screened out because they do not fit the basic capabilities of the company. Our executive group would be horrified if someone argued that it was OK not to fit to strategy as a cover up to fund a poorly conceived idea or to avoid the heavy lifting involved in demonstrating why the innovation is in fact a great strategy.

The take home is this: If you begin *only* with strategy, you probably will not hit your innovation growth objectives. You need to allow innovation to occur that is a bit off-strategy and create the space for hard work to demonstrate that the strategy should be refined.

How do you do this work? Where do innovations with enough potential come from? How do you demonstrate something so powerfully that it becomes compelling? The next two top-vote getters provide insight on these questions.

There are many areas that contribute to innovation, among them technology, customers and business. Insight in any area can drive an opportunity forward, or be the source of the idea. The second top-vote getter addresses the customer.

EXPERIENCE YOUR CUSTOMERS

Another major cluster around innovation was deeply understanding your customer (or customer chain). We all know innovation must meet a true customer need, but where do you obtain the insight? There are many techniques and approaches our group has had successful experiences with; to name a few: “day in the life of,” living with your customer, focused user councils, client personas, in-depth customer pilots and rapid prototyping.

The key theme recommendation is to gain deep, experiential understanding of

what your customers do and develop your innovations around the jobs they are trying to get done. You may need to watch what they do. You may need to see how they use a prototype. You may need to live with them. The richness and integrity of innovation that comes from this level of understanding often proves to be the difference between success and failure or between having a compelling proposition or not.

Other approaches to understanding customers are based on what customers say they will do or want, like customer surveys or focus groups. These are good so far as they go, but they are no substitute for direct experiential knowledge.

Experiential knowledge is easiest when your development team is *composed of* your users. Microsoft pulled together a team of dedicated video gamers to design the very successful Xbox. When the successful Xbox team was assigned to develop a music player, the Zune, the product flopped. Why? Because, for the Xbox, the team had a deep experiential understanding of the user needs; on the Zune they did not.

Certainly, the idea that you should understand your customers has been around a long, long time. So much of this is “old wine in new bottles.” However, the added emphasis on experiential understanding and associated techniques seem to be genuinely new and great as evidenced by the last wave of innovation.

Other interesting insights emerged during the discussion around understanding customers.

The web has enabled crowd sourcing, predictive markets and viral approaches to marketing, distribution and understanding customer needs. These approaches are genuinely new and worth consideration.

Many executives were disappointed with “The Voice of the Customer” (VOC). During the discussion, it became clear that VOC is sort of a category, a big tent that covers lots of approaches to understanding the customer. To some people, VOC means gaining experiential understanding. To others, it includes a number of superficial techniques. These disappointments stem from approaches that do not get to the heart of the matter. Disappointments also derive from creating an endless series of studies and bog everything down.

Even with good insight, innovation involves lots of learning. Traditional development processes, like Stage Gate, take a project management approach. This brings us to the next top-vote-getting “must-do.”

USE AN ITERATIVE LEARNING-BASED PROCESS

Whether you call it agile development, spiral processes or rapid prototyping, a fundamental insight is at the core: Innovation is all about maximizing the rate of learning. This means trying your ideas out as quickly and as tangibly as possible; refining the customer experience, refining technology and engineering, and refining the business approach. Reviews need to be structured around achieving a new level of insight about what the innovation should be and around developing significant new learning.

In contrast, a traditional Stage-Gate process is typically implemented as a “waterfall,” in which everything needs to be done to proceed to the next stage. These processes are typically dominated by project management considerations: milestones, deliverables and tasks. They make the assumption that the future can be predicted and that the project can be planned. They hold project leaders

accountable to delivering on their plans. And they give lots of people the opportunity to say “no” to an idea if something is not quite right.

This traditional framework is simply the wrong one for managing innovation: Most good innovations go off-plan. Most good innovations jump into the unpredictable. Most good innovations have loose ends. Most good innovations change direction several times along the rocky path from conception to business result. The process framework needs to fit these realities.

Our executive group isn’t saying that Stage-Gate processes are intrinsically bad but rather that they are misapplied to innovation. You could think of a Stage-Gate as a kind of deployment process, a way of making sure that something reasonably definable is done well and efficiently. At one time, AT&T had a 14-step gated development process. This makes sense for deploying something that could bring down all international communications if there is a mistake – everything has to be cross-checked and gotten exactly right.

One example of the iterative approach is extended beta periods for new ideas. You create a product and try it in the market. If people like it and use it, then you improve it. If not, you drop it. Google has built much of its success on this approach, for example. Google Maps and Gmail were both created using this framework. WL Gore & Associates, makers of the well-known Gor-Tex fabric and everything from electrical cable insulation to industrial filter bags, has a culture that allows small groups to try things out, and then build on success or walk away from failure. While fully endorsing this iterative learning-based approach, our executive group counsels some caution to make sure projects that are not forever in beta.

Other companies have had great success with a spiral framework by developing several dimensions of the project simultaneously (typically four: technical/solution, customer/market, business/financial and organizational). A new idea does a quick turn around each of these dimensions to get a rough look, often

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based on several variations of the concept. Then it is reviewed, and if approved, takes another pass around each dimension with a greater level of effort. The result is a slowly maturing idea that gets closer and closer to a winning innovation. Each review is against the lessons learned in the last iteration, and the approval is to fund the next round of learning. Plans may well change radically from iteration to iteration.

A great advantage of such approaches is that they tend to focus on the areas where greatest learning is needed. This means that assumptions and hypotheses are tested quickly, and that fatal flaws are found early and cheaply; projects either fail or morph to become even greater over time. Some people call this the “fail fast” principle, which is hard to pull off in a traditional framework but is a more natural outcome of an iterative learning-based process.

However, since plans are shifting, efforts are focused on resolving the unknown and there tend to be many possibilities in play, how do you make decisions about what to pursue? How do you manage the team? This brings us to our final must-do insight.

BRING VENTURE-CAPITAL APPROACHES TO YOUR INNOVATION PROCESS

Venture capitalists have honed techniques for turning innovative ideas into business successes. Corporations have a lot to learn from how VCs think about opportunities. People in companies need to be able to have good dialog about the risk in new businesses with colleagues who are accustomed to the sorts of risk inherent in their core business. Companies, like VCs, need measurement methods to deal with radical levels of uncertainty (both downside and perhaps more importantly upside). They need ways to evaluate new opportunities with credibility. They need ways to fund and manage opportunities when learning rates are high. Our executive group identified several approaches they had adapted with success.

One approach is the corporate innovation board, which has significant resources for innovation and is located high in the organization. Ideas get funding based on their own merit, even if they would not make the cut for a P&L-focused VP. By providing multiple paths to funding, innovation can get resources. One example is a GE program that gives visibility to about 100 innovative projects to the CEO. Other companies have had success with the board approach at other levels in the company. There are a few cautionary notes here about preventing the group from

moving to too low a level in the organization and making sure ideas eventually become relevant to the company, but on the whole, this appears to be a good approach.

Another approach is to lay out multiple options for exploiting an idea – strategies if you will. Then, pick a “plan A” to pursue, while keeping the others as backup. This provides two important benefits: First, it ensures that teams actually pick the best approach rather than just the one that first comes to mind. Second, if one learns that plan A is not going to work out, the team can move quickly to plan B. As a result, they are less likely to get stuck in a dead-end. For example, HP’s Lightscribe product (a DVD labeling system) could have been launched as a proprietary feature on HP computers, which is the obvious approach. However, the HP team pushed further and realized that a better much strategy would be to create a consortium and develop a standard. Lightscribe is now HP’s only “ingredient” brand.

Pursuing the above strategies should be judged based on the delivery of proof points (not just accomplishment of project milestones). What are the biggest uncertainties on the project? How do you learn about these? How to best organize work to deliver evidence on the things that most need proving out.

Continuing with HP’s Lightscribe example, the natural momentum of an engineering organization like HP is to build out the product, addressing crucial proof of concept issues like a rotating reference frame for printing. But HP is really good at technical work like this, so it is not what needs to be proven out. For the consortium strategy, a crucial proof point is to get partners to contribute to an IP pool. By first focusing on this deal-making aspect of the project, HP dramatically increased the rate of learning and the overall probability of success.

Finally, don’t limit financial analysis to a single set of assumptions cranked through a spreadsheet. Rather, look at what evidence you actually have about each key factor in the business (like market size and share), consider what would drive the value high or low, and put this range of estimates into your model. Use sensitivity analysis to prioritize effort on proving out the uncertainties that matter the most.

In the Lightscribe example, HP realized trends in sharing of disks were the huge uncertainty driving the business – would people continue putting their favorite songs on CDs and passing them around (which was common in the early 2000), or would the Internet (just taking off) or MP3 players (then a niche product) dominate. In response

