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By John Hagel and John Seely Brown

Silicon Valley's Risky Complacency

Innovation is not a birthright -- it requires continuous effort to renew and reinvigorate, something startups in China and India understand

Last year, we were sitting across from a prominent Indian business executive in one of Bangalore's leading software companies. In the middle of the conversation, his body tensed and, looking intently at us, he said forcefully: "You know, we were blocked from participating in the global economy for almost 50 years. We need to catch up."

We have been struck by the fact that within about 30 minutes of any conversation with a Chinese or Indian executive, we inevitably hear a similar statement -- the urgency is palpable. There's a sense of energy that has been dammed up for decades suddenly being released and pouring forth, trying to make up for lost time.

Contrast that with a similar conversation we had with the executive of a large tech concern in Silicon Valley a few months ago. As we were discussing the rapid growth of offshoring businesses in China and India, the executive sat back in his chair, relaxed and smiling, as he said confidently: "You know, innovation is our birthright here in the U.S. We will always stay ahead of companies in China and India."

SENSE OF URGENCY. Is this attitude healthy? Few would dispute that the U.S. has the most innovative culture today. And Silicon Valley has been the center of high-tech innovation in the U.S. for many decades. Yet this kind of complacency is dangerous. The U.S. and Silicon Valley didn't become innovation centers through complacency -- just the opposite. Innovation is certainly not a birthright -- it requires continuous effort to renew and reinvigorate.

The Chinese and Indian entrepreneurs emerging over the horizon take nothing for granted. Their sense of urgency is shaped in part by history, but also by the future. If they rely on wage-rate differentials as a source of competitive advantage, that will be a shaky foundation to build on. Already, software-development work is being sent offshore from centers like Bangalore to countries such as Cambodia and Vietnam, where wages are even lower than in India.

Intensifying competition for skilled labor within more advanced centers like Bangalore is also deepening a sense of urgency. Wages for skilled programmers and project managers are rising by as much as 25% per year in Bangalore, and employee-turnover rates are increasing as well.

INCREMENTAL GAINS ADD UP. As a result, entrepreneurial outfits in China and India are relying on innovation as a way to get better faster. But it's a different form of innovation. In the U.S., when executives talk about innovation, they tend to focus on breakthrough products or technology. The invention of the microprocessor, the packet-switched network, fuel-cell automobiles -- this is what gets the attention of American executives. Dell (DELL), one notable exception, does focus on business-process innovation.

But in China and India, the majority of businesses focus on rapid incremental process and product innovation. It's much less visible. It doesn't grab the headlines. But over time it can lead to impressive advances.

Take the example of Bangalore. Five years ago, Bangalore's primary trade was the body-shop business. Its bread and butter was low-level software bug fixing and Y2K programming -- taking massive enterprise applications and rewriting them to be able to accommodate the change in date to a new millennium. Hardly the most challenging software-development assignments.

PROCESS INVESTMENT. Low wage and relatively low skill software programmers were all that were required. But the software-development houses in Bangalore like Infosys and Wipro took these assignments and used them as an opportunity to hone their skills on large-scale projects. They systematically reviewed their performance on each assignment and worked to identify ways to improve productivity and reduce error rates.

Today, the largest Bangalore software-development businesses are passing the $1 billion revenue mark and continuing to grow at double-digit rates. They're taking on some of the most challenging application-development assignments within Western enterprises.

These outfits continue to invest heavily in process innovations, striving to enhance productivity and tailor processes to particular application environments. In many cases, they are actually providing consulting services to help Western

companies improve their own programming activities so they can come up to the performance levels achieved by Bangalore companies.

Bangalore is also becoming a center for the offshore operations of U.S.-based software startups. These "micro-multinationals" begin operations from day one with a software-development unit based offshore. In some cases, successful Indian entrepreneurs from Silicon Valley are already starting to move to Bangalore to establish their next startup -- spearheading the new B2B movement: Back to Bangalore.

A LOOK AHEAD. Fast forward another five years. Bangalore software-development companies (as well as U.S. outposts of such major programming outsourcers as Accenture and IBM Global Services) are likely to be developing leading-edge applications. At least two of these Indian Bangalore concerns are likely to be in the top 20 global high-tech firms.

The back-office and call-center operations of major U.S. companies such as financial-services and health-care institutions are now being outsourced to Bangalore. Anyone wanting to develop breakthrough applications for these kinds of operations will have a strong advantage if they're in the Indian city.

Five years from now, a significant portion of the Silicon Valley infrastructure -- venture capitalists, lawyers, advertising and marketing agencies, etc. - will have operations in Bangalore, helping local entrepreneurs move into global markets quickly. Many talented software engineers, trained in the leading-edge technologies by larger corporations, will be drawn by this infrastructure to leave their safe havens and build their own business. A vibrant community of software startups will drive the next wave of innovation in the city.

Western executives who come over to offshore locations like Bangalore and take snapshots of existing capabilities are missing the real story. They need to understand how rapidly major entrepreneurial centers such as Bangalore and China's Shenzhen are building capability through bootstrapping and rapid incremental innovation.

FIXING THE PROBLEMS. Let's also not be complacent about breakthrough innovations. Asian companies are already leading in developing mobile-phone technology, aided in part by their domestic markets, which have become early adopters of this new technology. Just as the personal computer was the platform for tech innovation in the last three decades, mobile-access devices will be the platform for innovation in the 21st century. Asian businesses are well-positioned to develop the next wave of breakthroughs on this key platform.

Some American corporate leaders are beginning to see the challenge the U.S. faces. Bill Gates has drawn attention to our broken educational system. Lou Gerstner has set up a nonprofit seeking to raise teacher pay. And Carly Fiorina

told the Detroit Economic Club that no American had an inalienable right to a job, that we all need to compete and be the best.

But our response needs to begin in the boardroom itself. Senior executives must make some difficult choices about where their companies can really be distinctive, rather than edging their way into offshore outsourcing and eventually discovering that their core capabilities are now performed better by others. They must then harness offshoring in ways that help their companies get better faster by working with others.

INNOVATION INVESTMENT. These execs cannot just view outsourcing as a way to access distinctive capability or, worse yet, generate near-term operating savings. Instead, they must master the new management techniques required to generate even more value from the capabilities available offshore.

Above all, they cannot afford complacency. Innovation is not our birthright as Americans. It is an accomplishment that we have invested heavily in and taken great risks to achieve.

Hagel and Brown cowrote *The Only Sustainable Edge*, which addresses the challenges and opportunities created by offshoring.
Hagel (www.johnhagel.com) is an independent management consultant who spent 16 years with McKinsey & Co.
Brown (www.johnseelybrown.com), Xerox's former chief scientist, is now a visiting scholar at the University of Southern California