Special Report

FESTIVAL OF THINKERS: LOOKING TO THE FUTURE
Festival of Thinkers: Looking to the Future

The third Festival of Thinkers brings together an array of Nobel laureates, well-known intellectuals and students from the UAE and neighboring countries to celebrate what Sheikh Nahayan Mabarak Al Nahayan calls “the power and importance of thinking.” Sheikh Nahayan is Minister of Higher Education and Scientific Research, and Chancellor of the Higher Colleges of Technology. The event, to take place November 1-4, 2009, in Abu Dhabi, focuses on nine themes that are key to shaping the future of the Middle East and the rest of the global community. The themes touch on such challenges as “Moving beyond the Global Crisis,” “Envisioning Sustainable Development” and “Promoting Science and Technology.” Additional topics to be discussed include world health, the globalization of culture and language, development economics and poverty alleviation, and military spending, research and innovation, among others.

In this special report, Knowledge@Wharton offers insights into several of the themes included in the Festival of Thinkers conference. Three articles look at the challenges of improving global health care, the ecological issues raised by the goal of creating Sustainable Development” and “Promoting Science and Technology.” Additional topics to be discussed include world health, the globalization of culture and language, development economics and poverty alleviation, and military spending, research and innovation, among others.

Why Improving Global Health Care Is Everyone’s Responsibility

Throughout the developing world, infectious disease and chronic illnesses confront more than one billion people living in poverty. To make significant strides in global health, governments and for-profit and non-profit businesses must find a way to foster innovative, breakthrough solutions not only to treat illnesses, but also to improve the delivery of health care itself. Nobel Prize winners and global health care experts will be exploring these issues during a Festival of Thinkers panel titled, “Future Well-Being: Towards a Healthier World.”

In a world where advances in technology and ease of travel are continually eroding national boundaries, global health problems can rise up swiftly, threatening the lives and prosperity of vast populations.

Throughout the developing world, infectious disease and chronic illnesses confront more than one billion living in poverty. Rich countries face their own difficulties in finding ways to pay for sophisticated medical care. To make new strides in global health, governments and businesses must find a way to foster innovative, breakthrough solutions not only to cure or treat illnesses, but also to improve the delivery of health care itself.

Nobel Prize winners and experts in global health care will be exploring these issues during a Festival of Thinkers panel titled, “Future Well-Being: Towards a Healthier World.” “All of us are participants [in and profit from] globalization and enjoy global travel. We all must become more actively involved in global health issues by donating, advising and sharing responsibility,” says Richard Ernst, the 1991 Nobel Laureate in chemistry. Ernst is among the Nobel winners scheduled to participate in the panel.

The magnitude of the problem is enormous and marked with glaring disparities. Sub-Saharan Africa alone accounts for 24% of the global disease burden even though only 11% of the world’s population lives there. More striking, according to World Bank figures, Sub-Saharan Africa receives only 1% of global health expenditures. The World Health Organization estimates that basic health care would cost $35 to $40 per person in Sub-Saharan Africa, yet half of all health care in the region is paid for out-of-pocket by desperately poor patients. To begin to meet the growing health care demands in just this one region, an estimated $25 billion to $30 billion in new investment for hospitals, clinics and warehouses is necessary.

J. Robin Warren, who shared the 2005 Nobel Prize for Medicine and will participate in the panel, cautions that global health problems are not limited by geography. He points out that infectious diseases — including those that are now resistant to standard antibiotics — can spread across all nations in today’s era of global travel and migration. If affluent countries, like the United States, fail to manage global health problems better, in another 50 years the world could have more levels of infection than 100 years ago, he suggests. “I think the American government should be prepared to buy drugs and give them to poor countries because the

Why Improving Global Health Care Is Everyone’s Responsibility

The Post-recessionary Global Economy: In Search of the New Normal

Our Endangered Planet: How to Protect and Promote Sustainable Development

How Bottom of the Pyramid Strategies Are Paying Off in the Battle to End Poverty
poor countries cannot afford to pay for [them]. The American government — for the good of America — could get diseases treated more efficiently. If the rich countries help the poorer countries, they are helping themselves."

Better Use of Resources

Neal Nathanson, associate dean for global health at the University of Pennsylvania’s medical school, says the challenges to global health fall into three main categories. First are broad-based problems — such as pollution, overpopulation and strained resources — that affect the entire planet. When people lack basics, including food and water, they are likely to suffer health problems, he points out.

The second problem is economics. With 1.4 billion people living on $1.25 a day, according to The World Bank, poverty is a major factor in global health. "If that many people are living below the poverty level, the health budget is going to be miniscule and everything else that affects health will be less than optimal," says Nathanson.

The final impediment to improving global health is "social development." Non-economic concerns, such as literacy and women’s rights, can help create a foundation for community-based health care systems even with limited financial resources. "You’re not going to lift the poorest billion out of poverty overnight, but you can do a lot with social development. My sense is that social development is an area where one can intervene and do something that is practical rather than just hypothetic!"

Nathanson says that while multilateral institutions, such as the World Health Organization and the United Nations, along with charities and foundations are attempting to alleviate global health problems, they often lack the wherewithal to efficiently allocate the resources they already have. In some countries, well-meaning organizations are working without licenses and coordination. "It’s sort of a trendy thing to raise money, but making better use of the resources that are being poured in.

In many instances, the will and resources are in place to treat illnesses in the developing world, but countries lack basic infrastructure. Without roads, power, clean water and basic health care providers — including nurses — medicines and life-saving treatments simply can’t reach the patients who need them, Nathanson notes.

Marjorie Muecke, assistant dean for global health affairs at the University of Pennsylvania’s School of Nursing, says global health initiatives in the developing world are always looking for new ways to make the best use of limited technology and health care providers. In some cases, she says, countries are developing community health networks made up of volunteers, most of them women. Indeed, many of the volunteers are the wives of influential leaders in the community with the standing to make the idea of priority. In India, nurse practitioners are being used in rural areas to help triage populations and identify patients who may need to travel for more advanced treatment in a doctor’s office or hospital.

One challenge in global health care delivery actually has been created by wealthier health organizations, Muecke notes. In many poor rural areas, non-governmental organizations have come in and identified bright, promising local people, then hired them to run specific programs. While that is good for the individual endeavor, Muecke points out that over time this practice leads to a brain drain in local public health systems and government health ministries. "It’s the long run because the government’s ability to carry out its responsibility in promoting health is undermined."

At the same time, however, health care personnel working in developing countries are finding innovative ways to use technology and increase the efficiency of available personnel, Muecke notes. For example, in some areas field workers are using cell phone cameras to photograph patients with certain diseases and then sending the photos to better-trained doctors for advice on additional care. "Poor people may not have a television or a computer, but they do have cell phones. We need to use technology in new ways so that we can spread the expertise of those who are expensive trained to far-flung populations."

Meanwhile, according to Festival of Thinkers panelist Myrna Weissman, professor of epidemiology and psychiatry at Columbia University, illness can have a strong impact on economic development in countries where there is little or no ability to provide health care. Depression is a major factor holding down progress in the developing world, she notes. While it might be somewhat more difficult to sift out the costs of depression and mental illness compared to other health problems such as infectious disease or malnutrition, the effect can be just as debilitating.

Weissman has done field work in Africa exploring treatments for depression among people caught up in civil war. She has found that effective mental health programs take into account cultural sensitivities, but Africans respond to group therapy and other approaches used to combat depression in developed countries. "We have to be flexible in what similar people are. There are cultural differences in style, but not so much cultural differences in emotions," Weissman is currently preparing for a project in the Congo that will test the idea of providing small grants for mental health along with other forms of economic development aid.

As emerging economies such as India and China continue to build a functioning middle class, demand for health care is expected to rise rapidly, Whitman professor of health care management Mark Pauly says that with so many people in developing nations already paying a sizeable portion of their small income for health care, it might be possible to develop private insurance plans to reduce the risk of financial ruin if a family member becomes seriously ill.

Some countries, including China, have limited forms of government-run insurance, but Pauly says it is possible that a private market could evolve in poor countries where families now save up huge cushions to protect against illness or an accident that would require expensive treatment. Many economists argue that if China were able to develop a social safety net that would protect its citizens against the risk of illness or outliving retirement savings, the country could begin to support a more vibrant consumer market. Growing consumer spending, in turn, could energize the Chinese economy and make it less dependent on exports. At the same time, it would also provide new outlets for Western products and trigger overall economic growth. According to Pauly, the effort to cure tuberculosis, malaria and other infectious diseases that kill millions across the developing world require both a push and a pull mechanism to engage the private sector in sustainable solutions.

Governments or foundations can provide some money to "push" discovery and development of drugs or vaccines to treat diseases in the developing world that pharmaceutical firms or academics would otherwise tend to ignore. However, companies need to know they will be rewarded if a cure or effective treatment is identified. "The amounts of money for the push are nowhere near what they would have to be to fully finance the development of the drug or vaccine," says Sammut. "There has to be some incentive beyond that.

The "pull," he adds, can be generated through a number of public-private partnerships that seek new ways to create viable markets for innovative health care products and services. One example is Product Development Partnerships (PDPs) — not-for-profit, virtual research and development organizations designed to accelerate the introduction of new products through a portfolio of partnerships engaging industry and academia. The Bill and Melinda Gates Foundation is involved in partnerships focused on HIV/AIDS, malaria and other infectious diseases and the discovery of new diagnostic tools. Another idea revolves around Advanced Market Commitments (AMCs), which create a guaranteed market for private sector companies that come up with a new drug or treatment for an unmet need. Donors, such as UNICEF or governments, contract to pay for a vaccine or treatment up front.

The general concept is to address the so-called  

Public-Private Partnerships  

Despite the magnitude of the problems involved in improving health globally, some promising solutions are emerging, according to Stephen Sammut, a senior fellow and lecturer in Wharton’s health care management department. Multinational pharmaceutical firms and emerging biotech companies, he says, have been on the leading edge of private sector responses to global health problems in the developing world, while a number of new models are surfacing that may help provide solutions to the problems confronting the global health system.

Many of the ideas for addressing problems in global health care, he points out, rely on public-private partnerships. The effort to cure tuberculosis, malaria and other infectious diseases that kill millions across the developing world require both a push and a pull mechanism to engage the private sector in sustainable solutions.
Priority Review Vouchers (PRVs) are one more emerging solution, this one coming out of amendments in 2007 to legislation governing the U.S. Food & Drug Administration (FDA), which grants approval for new drugs and treatments. The FDA can now offer a company speedy approval of one drug in return for the company’s pledge to underwrite development of a less-profitable product that might be used primarily in the developing world. Under this system, a company could earn a voucher by investing in treatments for a neglected disease, then use that voucher to jump ahead in the approval process with a drug that would be highly successful in the developed world. Sammut estimates the voucher can trim four to 12 months off FDA approval time and generate value ranging from $50 million to $600 million. The FDA issued its first PRV to Novartis Pharmaceuticals for an antimalarial drug.

Intellectual Property Pools (IPPs) are an additional way to engage the private sector in developing products for poor countries. The pools are an agreement between at least two companies to cross-license patents in order to find new treatments more quickly. In 2005, a patent pool was formed by companies active in Radio Frequency Identification (RFID). The hardest part of managing a patent pool is sifting through the portfolio of technologies available, Sammut says. Another obstacle, he points out, is the potential for antitrust problems.

In March, GlaxoSmithKline (GSK) announced it would create a patent pool that would provide other companies access to GSK intellectual property to treat 16 neglected diseases identified by the FDA.

Finally, licensing of patented products for production by low-cost generic manufacturers is another way in which companies can help solve global health problems, while also remaining profitable. Governments in some countries have initiated compulsory licensing of products for dire problems, such as HIV/AIDS, that override international trade rules protecting intellectual property. Sammut points to the idea of voluntary licensing, which would permit a company that takes on development risk to partner with a generic firm and retain some piece of the business. Even if the generic is sold at a lower price than the branded pharma company would charge in mature markets, voluntary licensing might generate more sales than would occur if the product were not sold in the developing countries at all. The U.S. biotech company Gilead Sciences has licensing agreements with 10 Indian manufacturers and one in South Africa for distribution of HIV/AIDS treatments in 96 low-income countries. Gilead receives royalty payments of 5% on the finished products.

Sammut says these new partnership models do not necessarily build on one another in an evolutionary fashion, but represent alternatives that can be tailored to suit specific conditions in countries or within companies. Different aspects of the overall global health care challenge, he notes, stand to benefit from “the creativity of every one of these ideas.”

The financial crisis of 2008-09 has created unprecedented opportunities for companies that have tightened their operations, reaffirmed their resolve and readied themselves for an anticipated global rebound.

—Michael Useem, director, Center for Leadership and Change Management, The Wharton School
What about the inherent risks of political instability and currency fluctuations abroad? Should one pick and choose and say you can't hold just one country and try to pick the winners," Siegel advises. "You have to go all across: Europe, South America, Asia. And then you don't have to worry so much about political instability, because in one country there may be instability, but if you're diversified, it won't affect your portfolio significantly.

"The way we diversify today is where the corporation is headquartered: Obviously that's only one criterion, and you could take [as another criterion] where they're actually selling or producing.... When you buy an India fund, for instance, you are investing in companies that are headquartered in India, although they may be producing in China. Choueifaty notes that, in his experience in the United States, Siegel adds. He recommends building a global portfolio, not so much in bonds, but with a large fraction — say 40% to 50% — of foreign-headquartered companies.

Regardless of where economies are stronger, what assurance do investors have that markets operate with any rationality? Some have blamed the recession on the efficient market hypothesis (EMH), which theorizes that all available information is automatically priced into the market. "I would say there are market failures, and that's the problem," argues Franklin Allen, a finance professor at Wharton and co-director of the Wharton Financial Institutions Center, who has pointed out the EMH's inadequacy. "The structure of the markets is such that [they] aren't efficient. It's not that people are behaving irrationally, although that may happen. Allen has attributed some of the market failures to mismanagement of exotic bundled loan products — collateralized debt obligations, for example — whose true nature was often misunderstood even by those selling them. "It would be better if we could somehow make these markets more liquid. More transparency [in the marketplace], things like that, would be helpful," Allen suggests. In this way, more buyers would be willing to enter the market. Along with transparency, Allen says, we need "some standardization of the securitization process, making it easier to check what you're trading."

In answer to the question of what more should be done to fix the broken financial system, Allen responds, "We need to change banking regulations and the way that banks are treated if they go bankrupt and have to turn to the government.... I think we need to have a financial stability mandate for the Federal Reserve, to reform the International Monetary System." Allen adds that the new world financial order will not affect the position of the Middle Eastern countries very much. "There is a possibility that Saudi Arabia could lose its Board Seat at the IMF but I think that will probably not happen," he notes.

Mauro Guillén, Wharton professor of international management and sociology and director of the Lauder Institute at Penn, points out that other countries have withstood the financial crisis better than the U.S. "There are different ways of organizing a financial system and how it relates to the real economy," he says, citing particularly Canada, "which has a very strong system, less complex than the American system, and Canada's banks have withstood the crisis really well."

The reason is, "They have one single regulator for the whole banking system, which is absent in the U.S." Guillén thinks this is a very important lesson — "that it does pay to simplify the system in such a way that we have one agency which is responsible for the banks." He also cites the Spanish system, which in 2001 started to "force banks to make more provisions toward bad loans when the business cycle is booming" rather than waiting until the loans become non-performing. This smooths out the provisioning over the entire business cycle. Guillén thinks one of the most provocative suggestions that came from a course he and Allen taught in the spring of 2009 was "the idea that maybe the U.S. should have a state-owned bank, which would be able to make loans going well, but could take on bad assets from the private sector when times are bad. That way, you are prepared to do something about it."

Guillén adds that the new financial order that may emerge from the crisis will probably eliminate the huge imbalances in the global economy in terms of current account deficits. "The Middle East is a region that 'exports' capital because it earns a lot from exporting energy," he says. "This is unsustain- able. Over time, Middle Eastern economies need to develop their internal markets so that more people import goods and services from other regions and there is more of a balance."

Corporate Decisions
As financial institutions inevitably reached crisis mode, the management ranks were in upheaval. Many CEOs resigned or retired early, exhausted by the struggle to shore up their firms or pushed out by angry shareholders and disenchanted boards.

In such a volatile economy, deft management decisions, as well as steady hands on deck, are vital to corporate survival, let alone recovery. If management’s failure to read the signs of impending catastrophe is a contributing factor, what can management do to avoid the future?

Useem believes the crisis offers several object lessons. "First, by surviving a crisis, you’re better prepared to face the next one; second, failure is a bigger tax than success; and third, over- confidence can blind you to potential pitfalls, like assuming too much risk."

Although some people seem to be born leaders, Useem asserts that good leadership skills can be learned. "We want people to think strategically," he says, "like the chess player who can see 20 moves ahead. We want people, even in mid-level positions, to think more broadly, [asking themselves], ‘If we do what we're doing now, could this put the company at risk?’"

This requires developing extra sight, what Useem calls "peripheral vision," after a book of that title by Wharton marketing professor George S. Day. It’s "an ability to look sideways and see weak signals that are coming in that are important, as opposed to just noise, the kinds of things we see and quite properly ignore."

Training is crucial. Too often, Useem notes, "We simply say, if you’re good as an engineer, you can run an engineering team; if you’re good at banking, you can run a banking division. And, for me anyway, it’s very important that those in financial services redouble their efforts to build training on how to lead, how to make good decisions, and how to manage risk."

As financial systems and corporations become increasingly complex, one CEO cannot be expected to know it all. Building a team with specialists who can share their knowledge will be important as well. "Having a lot of smart people with a good ability to make judgments to add to your own skill set — if you don’t understand how to do an acquisition and somebody else does, for example — that actually makes you look smarter. You have the resources," Useem says. "And just like leadership, teamwork is not all that natural either. That’s a trainable, teachable skill and teams don’t won’t be scrambling over one another. There’s a Shakespeare phrase, ‘All be ready if our mind be so,' [meaning] we’re ready to face a battle, a crisis, a tough quarter, if we’ve already demonstrated we can place our leadership created in the kind of teamwork we’re going to need. You have to do that before you need it; it’s almost a dictum out there."

Cultivating Resilience
This management division of labor may be the bedrock of a strong corporation. But how does it play out in the wider economy, across companies, institutions and governments, all of which had a role in helping to pull us out of the most recent crises? To manage such large, complex challenges, you need resilience, according to Frederick Presley, president and co-founder of a nonprofit organization dedicated to providing educational tools and processes to teach people about the importance of whole-systems living.

Presley defines resilience as the ability "to anticipate change, to respond to change, in a very positive and proactive way, as opposed to what we tend to do now, which is a more linear approach. Instead of proactively transforming with change, we tend to react after it already occurred.... Resilience is about being more open and receptive to what’s going on, because you have a whole-systems view."

Attacking economic crises piecemeal after they have flared up is a mistake, he says. For example, as Allen notes, "The government’s plan [to absorb the banks’ mispriced assets and sour loans], was to step in and buy them, but they never got managed to get that off the ground. It’s very difficult to know how they should deal with that problem."

The approach Presley promotes is to see problems as part of a natural cycle. Natural systems “have what’s called ‘natural adapted to clime,’ that whole idea of conception, birth, the idea of change, of development. This is the natural state. In all natural systems there’s that flow where you have this kind of growth, this time of conserva- tion, and then release and rethink that happens.... And it’s not just natural systems; all systems go through that.”

Where the present institutions and governments err is in trying to hold conditions in stasis. “We... try to manage that point of growth and conservation and hold it for as long as we can. And I think that’s what
we saw with the economy. During that whole period we were dropping interest rates and trying to hold onto that gold ring, not allowing that natural release and rethink to occur.”

Overall, Presley sees the economic crisis as just one global shock, interconnected among many others, including environmental degradation, climate change and population shifts. “We have to embrace the complexity and not try to downplay it or try to manage away from it,” he says. Solutions must to be found urgently, but he is hopeful they can be if organizations on the level of the G-20 or the United Nations can cooperate and embrace whole-systems thinking.

Presley is participating in The Festival of Thinkers, sponsored by the Higher Colleges of Technology, United Arab Emirates, November 1-4, which draws together people from many fields of expertise to discuss complex issues: “That’s really the core of what we promote at a very base level. Getting different views from a different topic or a different perspective is needed for the continuation of humanity exist? For how long will the fundamentals needed for the continuation of humanity exist?”

In the words of economist Jeffrey Sachs, “Our generation’s unique challenge is learning to live peacefully and sustainably in an extraordinarily crowded world.” The concerns raised by Sachs and many others will be addressed during a Festival of Thinkers panel looking at ways to achieve sustain-ability in the face of dwindling resources, continued poverty, civil wars and climate change.

The title of an upcoming Festival of Thinkers panel, “Future Resources: Envisioning Sustainable Development,” only begins to hint at the broad range of interconnected subjects that go into any discussion of sustainability — ranging from ecological concerns and population control to economic disparity and social disruption.

Panelists include Rajendra Pachauri — chairman of the Intergovernmental Panel on Climate Change (IPCC) and co-winner of the 2007 Nobel Peace Prize, shared with former U.S. Vice President Al Gore — and Mike Moore, whose tenure of almost 25 years in the parliament of New Zealand included two months as prime minister. He also served as director-general of the World Trade Organization (WTO) from 1999 to 2002, and has authored several books. His most recent one is titled, Saving Globalization: Why Globalization and Democracy Offer the Best Hope for Progress, Peace, and Development.

“Humans have now organized a highly complex system, increasingly globalized in nature,” the Festival of Thinkers panel description reads in part. “Components of this system range from economic (to) ecological to social — each component being interdependent on the other. But how sustainable is this system? For how long will the fundamentals needed for the continuation of humanity exist? Threats to the planet and the current systemization are many and [include] the high rate of use of non-renewable energy sources, the number and size of violent conflicts, poverty traps, the changing climate of our planet, population growth and the degradation of our land and sea resources.”

Pachauri discussed a similar nexus of issues on October 3 when he joined a panel at Columbia University titled, “Copenhagen, India and the U.S.: From Conflict To Cooperation.” The event focused on “issues arising from conflicting positions of India and the U.S. on the approaches to the proposed Copenhagen Treaty” and was the first organized under the auspices of the newly constituted Independent India-U.S. Task Force on Design of the Climate Change Treaty (Kyoto II or Copenhagen I). The task force was founded by Jagdish Bhagwati, a professor of economics and law at Columbia, who served as both participant and panel moderator at the Columbia event.

The panel title refers to the United Nations Framework Convention on Climate Change (COP15 — the 15th Conference of the Parties under the United Nations’ Climate Change Convention) which will be held in Copenhagen, Denmark, from December 7 to 18, 2009. Delegations from some 192 countries will be in attendance, along with a variety of non-governmental organizations (NGOs), inter-governmental organizations (IGOs), observer organi-zations and United Nations agencies.

The goal of COP15 is “...to stabilize the amount of greenhouse gases in the atmosphere at a level that
clear that the countries responsible for the current “stock” of greenhouse gases were taking serious and sustained action to mitigate their own emissions. He was optimistic, however, that COP15 would be a positive step toward putting both the developed and developing countries on track to make the necessary reductions in greenhouse gas production. He also expressed confidence that India’s apparent recalcitrance on the issue of accounting binding emission targets would soon soften. The evidence supporting this contention — both in the preceding months and in the weeks that followed — is mixed. This July, during a visit to India by U.S. Secretary of State Hillary Clinton, Environment Minister Jairam Ramesh reiterated what has been Indian policy for almost two decades — that India would not accept legally binding limits on greenhouse gas emissions. “Even with 8% to 9% GDP growth every year and 20 to 25% growth in the next two, our per capita emissions will be well below developed country averages,” Ramesh said. “There is simply no case for the pressure that we, who have among the lowest emissions per capita, face to actually reduce emissions. And if as this pressure was not enough, we also face the threat of carbon tariffs on our exports to countries such as yours.” More recently, the government has argued that it could only limit emissions with financial and technological support from the developed nations. A few weeks after the Columbia panel, the Indian government reversed course. In a letter to Prime Minister Manmohan Singh, the Times of India, Ramesh wrote: “The position we take on international mitigation commitments only if supported by finance and technology needs to be nuanced simply because we need to mitigate [emissions] in self-interest.” Scant days after the public leaking of Ramesh’s letter, there was a backlash in India. Senior members of the country’s climate negotiating team threatened to resign and the Prime Minister rejected the concessions Ramesh appeared prepared to make. The Economic Times quoted ChandrashekharDasgupta, one of the key negotiators, as saying that “It is now clear that the document in question is simply no case for the pressure that we, who among the lowest emissions per capita, face to actually reduce emissions. And if as this pressure was not enough, we also face the threat of carbon tariffs on our exports to countries such as yours.”}

Globalization: Both the Problem and the Solution

Moore has long been an advocate for the argument that globalization and free trade are the most efficient mechanisms for lifting the greatest number of people out of poverty at the greatest speed. Two months before he became WTO director-general — during a fierce battle for the post, against Supachai Panitchpakdi of Thailand, who ended up succeeding him — Moore made a speech in Wellington, which amounted to a statement of principles. “If people, especially young people, say unemployment is too high, they are right. If environmentalists say that growth must be sustainable and not destroy the planet’s essential equilibrium, they are right. When developing countries say they are not getting fair access and justice, they are right.”

For a number of years now, Moore has been speaking and writing about the link between poverty, food and energy production. He has referred to biofuels programs in the developed countries — which reduce the supply and increase the cost of corn used for food or animal feed — as “a populist green response to global warming that does the opposite of what was intended.” He also considers the actions of richer countries that buy up farmland in poorer countries to be a form of neocolonialism. Moore has sought to make sure that free markets don’t overwhelm sovereign governments. Pachauri has sought to find a sustainable middle ground between the urgent need of almost a third of the world’s inhabitants to escape grinding poverty and the imperative that we first stop and then reverse the grave damage that unbridled industrial development has wrought. “Our planet ... is bursting at the seams in human terms, in economic terms, and in ecological terms,” notes the introduction to the Festival of Thinkers panel, quoting economist Jeffrey Sachs. “Our generation’s unique challenge is learning to live peacefully and sustainably in an extraordinarily crowded world.”
Poverty alleviation and development economics are crucial themes at the 2009 Festival of Thinkers. A background document for the session defines poverty as the "condition of lacking basic human needs such as nutrition, clean water, healthcare, clothing and shelter because of the inability to afford them." The United Nations, as part of its Millennium Development Goals, has set a target to halve, by 2015, the number of people living on less than $1 a day. The global financial crisis, however, has had a dramatic impact on this process and the number of impoverished people is likely to be higher by at least $5 million than was previously expected.

The strategy of encouraging companies to generate profits by producing goods and services for consumers at the Bottom of the Pyramid (BOP) has emerged as an important weapon in the battle to end poverty. C. K. Prahalad explained this strategy in a book published five years ago titled, The Fortune at the Bottom of the Pyramid, in which he argued that multinational companies can make money selling to the world's poorest. Key to his argument for targeting the world's poorest is the sheer size of that market—an estimated four billion people. How has Prahalad's book—a revised, fifth-anniversary edition of which has just been published—affected the behavior of companies and the well-being of consumers in the years since its publication? Knowledge@Wharton checked in with the author for an update, including examples of specific companies that are implementing Bottom of the Pyramid strategies.

Below is an edited transcript of the conversation.

Knowledge@Wharton: In the five years since The Fortune at the Bottom of the Pyramid was published, what impact have your ideas had on companies and on poor consumers?

C.K. Prahalad: The impact has been interesting and profound in many ways—much more than one could have expected. For example, several of the multi-lateral institutions—The World Bank, UNDF [United Nations Development Fund], IFC [International Finance Corporation] and USAID—have fundamentally accepted the idea that involvement of the private sector is critical for development.... I asked 10 CEOs of companies as diverse as Microsoft, ING, DSM, GSK and Thomson Reuters to essentially reflect on whether the book had had some impact on the way they think about the opportunities. Uniformly, everybody—whether it is Microsoft or GSK—essentially says not only that it has had some impact, but that it has changed the way they approach innovation and... new markets.

I also asked people to update the case studies that were in the original book. It was a pleasant surprise for me that almost all of them had grown, improved their offering and were doing quite well in this marketplace. I wrote a new introduction on what the lessons are that we have learned. So while the issue of poverty still remains—and is not going to be solved in the next 10 years—the active involvement of the private sector and its role in poverty alleviation... have been quite surprising. And we shouldn't forget it is just five years old as an idea.

Knowledge@Wharton: We will come back to the major lessons in a minute. But could you share some of the most significant examples of companies that have employed your principles during the past five years?

Prahalad: Take, for example, the whole idea of Netbooks—a $200 computer that is selling like hotcakes in the United States—more than two million sold last year. The original idea was to have a suitable, reasonably sophisticated laptop for poor people in countries like India. So that idea not only is going to work in countries like India, it is also traveling back to countries like the United States and having a success. There are many stories like this of innovations coming from BOP ("Bottom of the Pyramid") influencing what is happening here and suddenly influencing BOP market opportunities.

Knowledge@Wharton: Could you now talk about the major lessons companies have learned through serving poor consumers?

Prahalad: I think when the book came out five years ago, there was a fair amount of skepticism—and rightly so. People could not just dismiss the idea; they knew that this was an interesting and different one, and they could not walk away from the compelling videos and the stories in the book. Still, there was some skepticism about whether this was going to work in the very short period of five years. Many of the concerns have been put to rest. I can illustrate it with a simple example of one industry, which has broken many of the myths and cleared the way for profound rethinking about the opportunities at the bottom of the pyramid. What I have in mind is the wireless cellular phone industry. For the first time in human history, four billion people are connected. Now, of course, when you talk about four billion of the total six billion people, it is a large number. Maybe two and a half billion people are BOP consumers as described in the book. So the first thing that has happened is this dramatic shift in the use of cellular phones and the dramatic increase in mobile subscribers. It is taking place across the world—sub-Saharan Africa, South Africa, Latin America, India, Southeast Asia, and China. All the companies in every one of these areas—Celtel, Safaricom, MTN, Airtel, Reliance, Globe—all of them are making money. So the first lesson here is if you can find the right sweet spot in terms of business models, there is a really huge and very profitable opportunity.

For example, India alone is creating more than 12 million subscribers per month—not per year but per month.... The second [concern] that people had was, can poor people and possibly illiterate people adopt new technologies? Do they need new technologies? Cell phones have again shown that the rate of adoption of this technology has been spectacular. People just understand how to use it and they are using it to good advantage.

Third, in order to participate effectively, fundamentally new ecosystems are being created, including business models based on partnerships, pay-by-use prepaid cards has become the norm in most parts of the world. We are moving away from average revenue per user, which has been the core metric of this industry for more than 50 years, to profitability per minute of cell phone time.

We are also moving away from very intensive business call carriers to very low capital intensity to building alliances and partnerships. For example, Airtel in India has outsourced its IT networks to IBM and its capacity to Ericsson and Nokia, which it has built a large number of application developers. So, essentially, if you look at what has happened, Airtel has found a way of converting its fixed costs into variable costs and creating an ecosystem that dramatically reduces capital intensity. The most important of all these is the creation of very large pools of micro-entrepreneurs—small shops which download minutes to your phone and which allow you to charge your phone. Lots of entrepreneurs are being created.

And, finally, we find that BOP markets can be an extraordinary source of innovation. If I look at Safaricom—with the M-Pesa, which stands for Mobile Cash—is allowing poor Kenyans, who do not have access to banks, to transfer money from A to B by text messaging. So you go to an agent. You pay them money and receive e-mobile money or e-money, which you can text to your friend. And he can go with an encrypted message and pass that text and collect real cash. This is not a small business. Seven million consumers are involved. On average, every day, there are a million transactions of $20-$25 per transaction—a total of $20 million to $25 million every day. This is bypassing banks. In the same way, if I am a Filipino maid working in...
Festival of Thinkers: Looking to the Future

Knowledge@Wharton: Where do you see this trend of using mobile technology creatively going in which mobile services can be harnessed to serve poor consumers in various ways?

Prahalad: I think mobile is going to be in public health and education — in managing pandemics like SARS and swine flu. It is going to be in entertainment — in video games and a wide variety of other things that use the mobile platform. Video gamers are now [asking], “Why can’t I download, not just a public game, but in China, to the most of them, why can’t I create a seamless integration of my play at home in front of a PC and also on the go, where I can play with the mobile platform?” This is becoming a major opportunity for video gamers.

And so it is for education. There is absolutely no reason why we cannot mobilize everything from simple additions to multiplications and so on. [We could] teach children how to learn by themselves on their mobile phone and take tests remotely which are measured. Feedback is given to them, and if they don’t pass the test, you start all over again.

I see infinite possibilities, and I believe a lot of these innovations are going to come from BOP markets because there is a necessity there.

Knowledge@Wharton: What major obstacles do companies face when they try to implement BOP strategies?

Prahalad: I think there are three types of problems. There is the market problem. If you start by saying, “Poor people don’t have money; therefore, they cannot be our consumers,” you already have a big impediment. Sometimes it is useful for us to go back to our own household. Feedback is given to them, and if they don’t pass the test, you start all over again.

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version of the book, the rate at which these models are evolving — whether it is shipping flowers from Kenya or harvesting soy beans in India — how you can build virtual scale has been quite interesting.

**Knowledge@Wharton:** One last question. What are the emerging rules of engagement for serving consumers at the Bottom of the Pyramid?

**Prahalad:** The rules are fairly straightforward.... The consumer environment is critical. We need to continuously balance global standards of safety, quality and such without any compromise for the Bottom of the Pyramid with a capacity to be locally responsive and, more importantly, to work within the ecosystem and provide affordability. And what you learn must be rapid. You first learn, then invest and scale — not just invest and hope to learn. So the cycle is experiment at low cost, learn fast and scale rapidly so that you don’t make investments hoping to learn. And, finally, don’t push business model management practices and, most importantly, products and services that you are used to and accustomed to in the West onto these markets. In fact, the latest Harvard Business Review has a piece where GE is now recognizing that they have to create disruptive management models disrupting itself and its own management models if they want to succeed in countries like India. So the whole idea of building from within, learning rapidly and [having a] willingness to disrupt your own dominant logic is fundamental to succeed here.

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