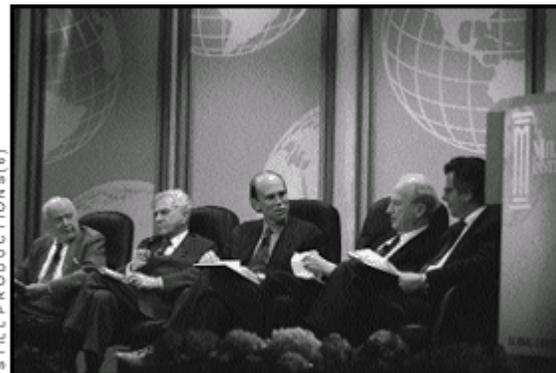


A Nobel Roundtable

As part of the Milken Institute's 1999 Global Conference, Michael Milken led a 90-minute, no subjects barred roundtable discussion with four recipients of the Nobel Memorial Prize in Economics. It has been edited for readability and, most of all, for space. A more comprehensive rendering can be found on the Milken Institute Web site (www.milken-inst.org). – Peter Passell



**Moderator Michael Milken (center)
with Nobel Laureates (left to right)
Douglass North, Merton Miller,
Gary Becker, and Myron Scholes**

MICHAEL MILKEN: Good afternoon. We're happy to be with you today. The youngest member of this group is Myron Scholes. Myron, as most of you know, developed a new method to determine the value of financial derivatives, creating order out of apparent chaos and helping us to understand capital markets. He had this young man over here – Merton Miller – as one of his professors.

Our next-most-recent Nobel Laureate is Doug North. Doug was brilliant at a very young age and demonstrated it by deciding to further his education at my alma mater, the University of California at Berkeley. He is the leading economic historian of our group. Why do some countries become rich, while others remain poor? Why do some parts of the world flourish, while others don't?

Next is Gary Becker. He was an undergrad at Princeton and then received his Ph.D. from the University of Chicago. Crime and punishment; the development and accumulation of human capital; the structure of families – his unique approach to these subjects links economic analysis to social issues.

Our senior Laureate is Merton Miller. Merton graduated from Harvard in 1944, then went on to Johns Hopkins. Financial innovations, marketplace volatility, countries' financial structure – all have been Merton's interests in an illustrious career.

Let us begin our discussion today with a simple question: Can you have complex financial technology without an underpinning of human capital or social capital or physical assets?

MERTON MILLER: Financial technology is something that's happening in the United States. I'm afraid that elsewhere – with the exception of Europe – there just are not the preconditions for developing technology.

MILKEN: What's held it back?

MILLER: We took 200 years to get where we are.

MILKEN: Aren't China and India a lot older than 200 years?

MILLER: Yes, but China hit the wall around 1640. Until then, China was the leading nation in the world.

DOUGLASS NORTH: There are competing theories for why China declined. You had a centralized bureaucracy; you didn't have competition among economic units...

MILKEN: Well, we think of the United States as a young nation. Why have financial technologies developed here, Myron?

MYRON SCHOLES: I think it has to do with human capital. When people focus on institutions, they're missing the mark. In the United States, in particular, we've been able to use human capital to innovate because we've asked the right questions. How can we make profits by having more efficient transaction systems? How can we make profits by sharing risk and providing diversification?

GARY BECKER: I'd like to come back to the more general theme of the relation between human capital, incentives, social capital and the like.

Look at the Communist regimes. The share of income they spent on education was greater than in other countries of comparable development. Nevertheless, they had dismal economic performances. We not only had the human capital, we gave people the incentives to utilize it effectively.

The Russians got low rates of return on human capital because they did not have a market – an environment that induced people to use human capital effectively.

MILKEN: To summarize: Countries' development has been a function of their human capital in conjunction with their social capital, the rule of law and other such factors.

MILLER: It's the human capital, plus the incentive to utilize it properly. The attitude of the Chinese is "we want to get rich and we are going to utilize whatever techniques we need to do it." In Russia, I don't sense that attitude at all. This is why I think China is going to make it, and I'm really very hesitant about whether Russia will.

BECKER: I'm going to take a different cut at the problem. There's always been human capital. But its significance has grown, and presumably will continue to grow. We're a knowledge-based economy. However, you cannot have effective human capital unless you have the right economic system – one that gives the entrepreneurs, technicians and investors incentives to bring together the human and physical capital.

MILKEN: Africa and Asia make up 60 percent of the world's land mass. But measuring the world's continents by G.D.P., we see how much larger North America and Europe are. Could it have been different?

NORTH: What's crucial here were the institutions that were carried over from

Spain and Portugal to Latin America on the one hand, and from Britain to North America on the other. The Spanish were interested in treasure, and so they instituted regimes that would maximize the revenue derived from gold and silver. They did not provide self-government in Latin America, nor did they create property rights.

Contrast that with North America. We had representative assemblies when we were colonies; we developed efficient property rights. The result was a foundation for thriving economies.

BECKER: Doug, I think you're giving too much support to the view that the problems in South America and Africa were created by colonialists. Colonialists left a legacy, but the problems have largely been self-generated. The Africans created governments that were basically socialistic, following the Russian model. And they failed dismally.



Merton Miller and Myron Scholes double-team Michael Milken.

MILKEN: If the Soviet Union had not existed, would post-World War II history have been different in Africa?

BECKER: When Khrushchev said, "We will bury you," he didn't mean, "We're going to bury you with missiles." He meant, "Our system is going to bury the United States system."

Impressed, the new governments in Africa placed their bets on the Soviet model. So I do believe that if we had not had the Soviet experiment in Communism, Africa might well have taken a different model.

NORTH: We can change what happens, but history does constrain choices. In the past dozen years, I've been playing God as an adviser to various countries...

MILKEN: How is that job?

NORTH: It's not all it's cracked up to be.

AUDIENCE VOICE: Does it pay?

NORTH: Not very well. But it does take a lot of the hubris out of us economists.

If you're really going to improve things, then you must learn where you can make a difference. So yes, Michael, we can change the way the game's played – but only if we understand the way change takes place.

MILKEN: Let's look at another topic. We're living in a developed world that is aging and an undeveloped world that is getting younger. In the last 30 years, the United States added just 70 million people, and partly through immigration. By contrast, Mexico went from 53 million to 102 million. Brazil went from 96 million to 174 million. What is the world going to be like as people over 65 focus on retirement and the younger look elsewhere?

MILLER: I suppose we could go to Florida and find out. One thing I do know: It's hard to get expenditures for schools.

SCHOLES: You don't know the innovations that are going to occur, or how they will change the calculus. We haven't talked about changes in education; we haven't talked about how communications and transportation costs are falling; we haven't talked about the Internet.

BECKER: The main difference between the developed and the developing worlds is fertility. Now, one thing we do know is that as countries develop, birth rates go down and families substitute the quality of children for the quantity. In 1960, for example, the average family in Taiwan was producing four or five children. Today, the number produced by a typical Taiwanese woman is about 1.5. So I think we can make the following conditional prediction: If India and other less developed parts of the world experience significant development, they will lower their birth rates. And they will invest a lot more in each of child.

MILKEN: So as per-capita income goes up, birth rates will come down?

BECKER: Per-capita income and education both matter, particularly for women. Countries that lag in their education of women generally have lagged in the rate at which fertility comes down.

MILKEN: I remember one of our programs in the inner cities of Detroit. I was interviewing one of our Milken Family Foundation education-award winners and she told me that the best form of contraception was opportunity, hope and education.

MILLER: The other side of that coin is that we are going to have an aging population.

MILKEN: Have we ever had a situation before where countries or regions have been dominated by older people?

AUDIENCE VOICE: Wartime, when the young people have been killed off.

NORTH: We're changing the way human beings are living. It's not just a problem of financing Social Security. It's also about adjusting to changes in the productivity of older people.

BECKER: As we get older, none of us thinks it's all bad that we're living longer. But I think all societies are facing two problems: financing Social Security and medical care.

No matter how you approach social security – whether you stick with the pay-as-you-go systems or go with some other system – you have to manage the financial problem. I certainly favor a privatized system. But there's an even more important problem: How are we going to finance the medical care of this aging but healthy population?

SCHOLES: Promises have been made by governments to retirees that could potentially lead to tremendous financial difficulties for Japan, some European countries and even for the United States. Either we'll have to tax the young or abrogate the implicit contracts with the elderly. If people understand this dilemma, it may affect the amount of time they choose to stay in the work force.

BECKER: Social security in Europe and the United States is inducing people healthy enough to work to leave the labor force. There's scarcely anybody over 60 in Europe who works.

MILKEN: The issue I relate to is unfunded pension liabilities in the 1980's. General Motors let us know that their balance sheet was accurate – except they had not recorded \$60 billion in unfunded liabilities. The company eventually wrote off some \$30 billion.

Private pensions here have been taken care of by the tremendous growth of equity markets. A large part of the earnings of companies with large pension funds has come from stock market performance.

Companies formed in the last 20 years generally don't have pension funds. They're not going to have their earnings positively or negatively affected by how the markets do. But we're talking here about entire economies with people retiring with pensions, some of them indexed to inflation. How could we even begin to address this problem?

MILLER: Anticipate it and don't let it happen. But that's not a very popular stance.

MILKEN: We should also point out that when social security was created, life expectancy was lower than the retirement age. It wasn't really much of a liability.

MILLER: The answer is privatization. But the transition is going to be intricate. It's always easier not to give a dog a bone than to take a bone away from a dog that already has one.

MILKEN: Well, the private problem was solved with higher rates of return on pension assets.

SCHOLES: And the way pension benefits are determined was also changed, moving from "defined benefit" programs to "defined contribution" or 401(k) programs. Responsibilities for under-performance were passed from the corporation to the individual participants.

MILLER: As Michael mentioned, so much has been dependent on the unusual

stock market performance. Can that be counted on for the future? I am skeptical.

MILKEN: If you were in financial markets from '65 to '82 or '83, you got a 1 or 2 percent rate of return and you believed in debt. Since '83 we have substantially higher rates of return – in the mid- to high-teens – and so we believe in the stock market.

When you say "identify the social security problem early," doesn't this problem already exist throughout the world? Doesn't it exist in the form of trillions of dollars of unfunded pension liabilities?

SCHOLES: It's a liability of the Government, the way it was a liability of the corporations. The question is how you value that liability. It's a promise to pay, akin to a high-yield bond. It doesn't mean that's what the expected payment is; there are going to be defaults.



Douglass North, meet Gary Becker.

BECKER: I think we should distinguish between pension funds, private companies and Government social security.

Developing countries are in a very fortunate position with regard to the latter because they have not yet gone down the pay-as-you-go road. You can look at China, which is now debating what type of social security to have, or India, which doesn't have social security at all. They can make the relatively easy choice to go to individual-account systems, where people would have freedom to accumulate assets managed by private companies.

It's harder for the United States and Europe. I still think we should go to a privatized, individual-account system, which would greatly reduce the role of politics in questions of retirement age, portfolio restrictions and the like. But there's no getting away from the fact that there will be a transition funded by some form of double taxation. The Chileans managed with big budget surpluses, which they used to finance this transition. We could do it now with our surpluses; I think it's the right time to do it.

MILKEN: I'd like to move on. The world is not homogeneous. In fact, if we look at the United States, we realize that even in the area where we've seen an unbelievable explosion of human capital – the corridor between Berkeley and Stanford – we still find Oakland. In the Oakland schools, only 23 percent of the kids can read at the national average! We have the world's highest per-capita income, yet we have undeveloped in our midst.

BECKER: Poverty is relative. There's no doubt, though, we have a significant number of children growing up in families with limited opportunities. We've had this great growth in broken families, only just now tapering off. Second, we're giving a low-quality public school education to poorer children.

I think two things can be done. One, already implemented, is to discourage women from making a career out of welfare. Since 1993, there's been a 40 percent decline in the number of families receiving welfare. So welfare reform had a very significant effect – and a beneficial one.

The public school problem is more difficult because of the public education monopoly. Competition works as well in teaching as it does in producing steel, newspapers or any other product. If we went to a competitive, voucher-based system, the main beneficiaries would not be the rich or the middle classes, but the poor.

MILKEN: Gary, you've focused on K-12 education. But in sheer numbers, our greater challenges are with people over 18. Look at the 30-year-old male with a high school diploma. He's actually getting paid less than a 30-year-old was in 1973.

The extra wage for attending college is at an all-time high. And there's a widening gap between the pay for college graduate and graduate specialists. Gary, you've done a lot of work on how high the return on investment in higher education is, in spite of the dramatic increase in cost. But some students wonder why we have this large increase in cost. They ask, "How many hours per week are teachers devoting to school?" Is the typical professor working for 8 hours a week as a teacher and 50 hours as a consultant?

MILLER: In Illinois, legislators asked one professor, "Now, how much do you teach?" He said, "9 hours." He meant 9 hours a week, but they thought he meant 9 hours a day.

BECKER: Let's back up to the issue of the earnings differential linked to education. During the 70's you had a decline in the differential, and there were books being written about the over-educated American. That turned out to be short-lived. The increases in benefits to college are so large that they overwhelm the increasing cost.

If people are rational, you should find larger fractions of young people going to college. And that's what's happened. Every single ethnic and gender group – men, women, Hispanics, blacks – has increased the fraction of its high school graduates going on to higher education.

MILKEN: Move to the question of how we allocate capital. If the Chinese have the highest savings rates in the world, but if the savings are not generating anything for the society...

NORTH: Given the fact that political systems affect allocation, we should devote more attention to them. One of the things that has made the formal rules of the game – political and economic – work well in America, has been the informal

norms of behavior that reinforce the formal rules.

This implies a big problem for countries that have changed the rules overnight. Russia is the classic case.

BECKER: I want to pick up the question from a different angle. I'm a believer in small government. But there are things government can do that the private sector can't do well: Enforce property rights, support basic research, support education. And governments are not performing these functions very well.

Take medical research, an area that you've been so important in promoting, Mike. The Federal Government spends something like \$15 billion supporting medical research. Pharmaceutical companies spend another \$15 billion, or that order of magnitude.

That's a minuscule amount. Congress is aware of the importance of medical research, but spending on other things limits its capacity to do more.

MILKEN: I don't think that if someone said we were going to go spend \$20 billion, \$30 billion or \$40 billion in Bosnia, it would be supported easily by the public. Americans have not been asked to vote on many of these issues.

BECKER: If I go into the supermarket and buy the wrong cereal, I'm the one who suffers. But if I vote the wrong way, I really have only a tiny and indirect influence on policy.

So the political problem is that people really do not have much incentive to be well informed on issues that the Government is spending on. I don't see any way to correct that, since each of our votes basically counts for nothing in the outcome.

MILLER: I wanted to talk a bit about what can be done in Russia. I actually had the solution back in 1990, and nobody paid any attention.

I said, buy their nuclear bombs. But I was told: "Ah, but they'll produce more." I have a solution for that too: Invite all the Russian scientists to emigrate. We did that with the German rocket scientists after World War II. Then Russia can sink in its own economic problems without any concern to us.

MILKEN: Merton, a high school student can make an atomic bomb. You could never stop the supply.

AUDIENCE VOICE: Don't produce the high school students.

MILKEN: Here's another question entirely. The solution to many medical problems may lie in the 60 percent of all plants growing in the tropics. Where is the compromise between an undeveloped world looking for rapid growth and the global society that needs to preserve the rain forests?

BECKER: Mike, you raise two issues. The first is health and the second is interdependence.

I think we can do a lot better with a more efficient health responsibility program, one which would require people to buy major medical insurance and would create incentives to use health care more efficiently by letting people save what they don't spend in tax-sheltered medical savings accounts.

Now, on your second question on what to do to save plant species. The answer is to buy the rights to those plants. The developed world should be ponying up resources to induce the rain-forest countries to keep these plants. We would be offsetting their incentives to ignore the effects on other countries when they make development decisions. We would bribe them to take a broader view.

MILKEN: The point we've tried to put forth in this conference is that the decisions of economists have enormous potential to help or to hurt. At the Milken Institute we challenge leading economists not to just sit and talk but to use their ideas in the real world. It's up to all of us to judge the success of their work.

Thank you all for coming.