Interview

Frank Sloan

Editor's Note: *This is an abbreviated version of RF's conversation with Frank Sloan. For the full interview, go to our Web site: www.rich.frb.org/pubs/regionfocus.*

Type "health care" into a Google search and you'll get more than 24 million web pages devoted to the subject. That's not surprising given the personal stake that Americans have in how the economy supplies this vital service.

For most of his career, Frank Sloan has studied the health care industry using the analytical tools of a public policy economist. His goal has been to describe how government policies, along with economic factors, shape the decisions of people who provide and purchase health care. After 30 years of teaching and conducting research at universities around the country, Sloan returned to near his hometown of Greensboro, N.C., in 1993 to continue his work at Duke University.

Sloan has served on several advisory boards and committees, including the editorial board of the *Journal of American Health Policy* and the Physician Payment Review Commission, which was formed by Congress to evaluate Medicare's physician reimbursement system. He also has spent 22 years as a member of the Institute of Medicine at the National Academy of Sciences, where he has co-chaired committees studying nurse staffing and vaccine development. His current research interests include alcohol abuse, long-term care, analyses of the cost-effectiveness of medical technologies, and medical malpractice. Charles Gerena spoke with Sloan on Nov. 8, 2004.

RF: Much of your research has focused on factors that influence the cost, quality, and utilization of health care. Do you think this market is fundamentally different from other markets?

Sloan: There are things that set it apart, but some people go off the deep end and say there's nothing we can learn from other markets. One thing that health care and other markets have in common is that people respond to incentives. Another thing is that competition may produce some desirable outcomes. Markets won't take care of poor people, but they are a way to achieve efficiencies.

What is different about health care is the uncertainty of consumption. You don't know today that you might have surgery in two months, so that leads to demand for insurance.

Insurance stands between the people who provide health care services and those who use them, but it's possible to oversimplify that relationship. Compulsory auto insurance is a way that we are able to tax those people who drink a lot and drive under the influence. The difference is that we find it socially OK — in fact, preferable — to experience-rate auto drivers in some states. We wouldn't do that in health care.

Another difference in the health care market is the externalities. People are afraid that if somebody coughs they will get the flu. Those are public health externalities. Another kind is financial externalities. If somebody gets lung cancer and needs a lung transplant, that is typically done at public expense. If people are disabled because of their smoking, they get Social Security disability insurance and that is shared by everyone. Then we have the "bleeding heart" externality. The fact that I care that a poor person has adequate consumption is something that will not be solved by markets.

Also on the list of differences is the "public good" aspect of biomedical research. Much of the improvement in health is due to this research, yet a private market will never provide all of it. We have relied on patents to provide an incentive, but they are imperfect solutions. They grant monopoly power to a seller, so the quantity supplied is lower and the price is higher than it would otherwise be.

RF: It seems as if there is a similar problem with providing incentives for vaccine production.

Sloan: Vaccines are a case in point. The general impression that many experts have, which I think is correct, is that vaccines are undervalued. Some of the greatest health benefits have come from vaccines. During my lifetime, we no longer talk about getting polio, so we don't have to

develop interventions or improvements to the iron lung because we can actually prevent the disease.

RF: Some people have suggested that the government get more involved in the vaccine market as a purchaser.

Sloan: The government already is very involved in being a buyer of childhood vaccines. The problem is that it has such market power that the vaccine price is too low and not enough of an incentive to entice new suppliers. As government agencies get lower and lower prices for vaccines, manufacturers want to leave the business.

The question is how to structure incentives for entry. One suggestion is to pay vaccine manufacturers the social value of their products. That sounds like a good idea, but you are essentially giving economic rents to the manufacturers. This would be socially objectionable on distributional grounds. Another way to do it is for the government to have in its head what the value of a vaccine is, then negotiate with the manufacturers to get the best price that it can, recognizing that the price will need to increase in order to get sufficient supply.

RF: Another hotly debated topic in health care lately is whether to allow the reimportation of prescription drugs. What are your views on that issue?

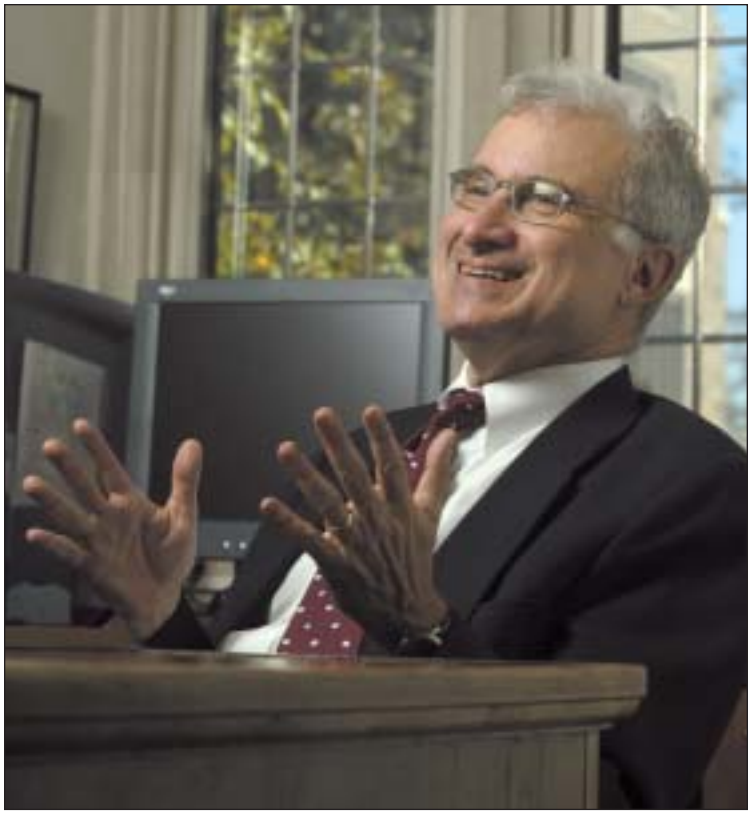
Sloan: The United States is a major importer of many goods. In fact, in trying to resolve the recent flu vaccine shortage, the federal government was willing to work with other countries to import vaccine. The policy concern about importing drugs is mainly motivated by attempts to satisfy the interests of pharmaceutical manufacturers.

Having said this, drug importation is not a solution to the rising cost of prescription drugs. Lower prices abroad reflect the regulatory policies in other countries. If we want to import drugs subject to price caps in other countries, it would be more efficient to impose caps in this country.

According to the concept of comparative advantage, the United States should produce goods and services for which it has an advantage and import goods and services for which it is at a disadvantage. Importing drugs manufactured in our country does not represent comparative advantage.

RF: There has been a lot of discussion about the price of medical care in general. Costs have outpaced overall inflation by a large margin for some time. Why do you think they are so high?

Sloan: First of all, I'm not sure that's the right measure. Yes, costs have been increasing. But can we say that the benefits of improved health are worth it? The health of the population is clearly improving. Mortality is substantially



reduced. There is some evidence that, at least, the elderly are less disabled than they used to be. They are living longer but not living worse. It's clear that if you did a report card on the benefits of improved health for the elderly — we've done it for four diseases — the benefits have grown more than the costs.That is, Medicare spending has grown less than the value of the benefits.

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RF: For a while, we tried to reduce medical costs using managed care and health maintenance organizations (HMOs). Now there is a backlash against that approach and people want more choices. What is your opinion?

Sloan: The concept is a good one: to provide incentives to keep people healthy. If we can take care of people while they are healthy, then maybe we will spend less when they are sick. Also, given that we have so much insurance, individuals and their doctors have an incentive to use service down to the point where the marginal benefit is zero, and that is way too much care. So theoretically, managed care is a great idea. In practice, it is not such a good idea.

First of all, what incentive does my health plan provider have to prevent illness in the future, when in fact I may not even be around? Some people change jobs, some people get married and drop coverage because their spouse has better coverage, etc. When the health benefit is way downstream, the impetus to control diabetes, to control weight, or to

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encourage people to stop smoking is greatly attenuated.

A second problem is that we were never able to get clinical findings in line with health plans. If we know that doing certain things for people with diabetes improves their health, we never implemented real incentives on a widespread basis to give patients and their doctors a reason to do those things. And protocols weren't refined enough. They were just blunt policies like, "You've got to see a general practitioner before you can go to a specialist." But the cardiologist may know more about preventing heart disease. The endocrinologist may know more about diabetes. So now, gatekeeping has been gutted.

A third problem is that managed care never got the doctors on their side. Some nurse at the other end was telling them how to practice medicine. So the doctors were able to say the quality of care was going down the tubes and they brought the issue into the legislative arena. Nearly every state in the country enacted some patient protection law. This had a chilling effect on the managed care industry. The industry preemptively loosened up.

RF: Is there a good way to refine the managed care approach, or should we go back to the drawing board?

Sloan: I think we need to reinvent it. We need to use evidence-based protocols. Often, these protocols are based on doctors getting together and saying, "I think having an annual physical is a good thing." We need evidence.

Evidence does not always lead you to spend less, however. That's what we had thought before with HMOs. But the big dilemma for the future is that the evidence may sometimes tell you to do the opposite. As our colonoscopies get better, we may do more of them. As we refine diagnostic imaging, we may do more.

RF: Many lawmakers have blamed rising health care costs on "frivolous lawsuits" for medical malpractice and "defensive medicine" to stave off those lawsuits. Based on your work and other economists' research, how much has this really contributed to cost increases?

Sloan: It has to be very small. First of all, premiums are 1 to 3 percent of health care expenditures. If you took all the costs of inputs to hospitals and physicians' practices, much more is spent on other parts. Labor is much more, yet we don't say we have a crisis in physician labor.

On the defensive medicine front, we have never developed an operational definition of what we mean by that. Presumably, defensive medicine would be care that yields a marginal benefit substantially lower than the cost.

If we look at Prostate-Specific Antigen testing for prostate cancer, for example, you could say every time we get a negative finding that test was a waste, but, obviously, it was not. Then the question is which follow-up biopsy does the benefit exceed cost and which does not. Well, this would require an in-depth study. It also depends on the risk preferences of the person who is being tested. Some people may have a need to know whether there is something growing inside them and would be willing, even in the absence of insurance, to pay.

We need to determine whether, in the absence of the distortions in the market, this person would have been willing to pay for this added diagnostic testing. It's clear that some people would, so we can't say that all biopsies are a waste. And if we said they were all a waste, we would eliminate them and throw the doctors out of business.

RF: You also have researched how the tort system, as well as government regulation and market forces, influences alcohol use. What have you found to be the best deterrents for driving under the influence?

Sloan: Incentives matter and disincentives matter. One of our interests has been how the insurance system affects accident rates. If you have a DUI offense on your record in this state, your premium goes up remarkably and that is quite a deterrent.

With "dram shop liability," the server is held liable if a patron leaves the bar under the influence of alcohol and the server did not take precautions to prevent that person from leaving, and that was the cause of an accident that led to a fatality or life-disabling injury. We found some evidence to suggest that dram shop liability is a deterrent. People at home just conk out and go to sleep. But with people that have to go from point A to point B, the bartender is relatively efficient at preventing that accident. He might take the keys away. He might refuse service. After some point, he may water down the drinks.

RF: There are some people who continue to drink too much or smoke cigarettes despite the deterrents and health risks. Do they understand the risks? Is there any difference in how smokers and drinkers process information?

Sloan: We should separate drinking and smoking. Some moderate drinking is presumably good for your health. It's drinking to excess that is a problem. We have these various externalities with somebody going out on the highway drunk and driving off the road. A lot of accidents involve a single car, but some of them don't. Smoking is different because it is clearly bad for your health and most of the damage is to the self and the immediate family. The external effects are very small.

Our most recent research has found that smokers seem to process information differently, in that certain health events were less important in their own predictions of how long they would live. But we are now looking at this in much greater detail. Are smokers more likely to be risk-takers? Are they less future oriented? Do they place less value on good health? We are finding that they are less future oriented and less risk averse than nonsmokers.

Another way that smokers differ is they seem to be more pessimistic about the future. If you ask them, "What is the probability that we will have double-digit inflation?" or "What is the probability that we will have another depression like in the 1930s?" they are more likely to fear these adverse consequences. These events don't relate to the individual's smoking behavior, but may indicate that they feel more at the mercy of external events, that they have less control over their lives.

RF: The United States is one of the few industrialized countries without a comprehensive national health care system. Without considering the merits of such a system, why do you think we remain unique in this respect?

Sloan: To understand why we do not have national health insurance as others do, one needs to investigate the historical context under which this system was adopted in other countries. For example, Germany adopted national health insurance over a century ago as part of Bismarck's industrialization policy. At the time, health care costs were much lower than they are presently and political opposition was weak. In England, national health insurance was adopted at an opportune time in the immediate post-World War II period.

Once implemented, it is politically impossible to take national health insurance away, like Social Security in the United States. To implement the program, one must overcome substantial political opposition from well-organized stakeholders. This has been difficult to do in this country. Perhaps it could have been done during the Johnson Administration when Medicare and Medicaid were implemented and the Democrats had won the White House by a wide margin and controlled both houses of Congress.

RF: Are there particular economists who have influenced your own work?

Sloan: I would say that it is a type of economist. When I was in graduate school, the best economists were incredibly broad. They would know foreign languages. They would know history. Milton Friedman, Kenneth Arrow, Paul Samuelson are a few economists that exemplify this ideal, as well as Wassily Leontief, who did input-output analysis.

Then I was influenced by younger economists. My main graduate school advisor was Martin Feldstein. He was only three years older than me but very engaged in policy. I would go in with my dissertation and, in 15 minutes, he would run through it all so thoroughly that I would spend the rest of the day digesting what I had learned.

Some people have criticized Marty on grounds that his models are not sufficiently deep or complicated. But he is very practical, and he relies on empirical evidence, not just on abstract theorizing. Also, Marty has devoted part of his career to public service. He has that broad kind of knowledge and understands political constraints. He isn't going to say that government is stupid and should stay out of the way. He has a lot of common sense.

I remember a professor who studied real-business cycles and gave a seminar, one of the last macro seminars I had attended. Somebody asked, "How does your model fit the recession of 1974?" He said, "I don't really study those things." That to me is unacceptable as an economist. I just don't know what he's accomplishing if he can't understand real-life phenomena and how to bring his tools to bear on what's going on. **RF**

Frank Sloan

➤ Recent Positions

J. Alexander McMahon Professor of Health Policy and Management and Professor of Economics, Duke University (1993-present); Director, Center for Health Policy, Law, and Management, Duke University (1998-2004)

➤ Previous Appointments

Vanderbilt University (1976-1993); University of Florida (1972-1976); University of California, Los Angeles (1970-1971); RAND Corporation (1968-1971)

➤ Education

B.A., Oberlin College (1964); Ph.D., Harvard University (1969)

➤ Selected Publications

Author or editor of numerous books on medical malpractice, the cost and quality of health care, and other public policy issues. Author or co-author of scholarly articles in such publications as the *Journal of Health Economics*; *New England Journal of Medicine*; *Journal of the American Medical Association*; *American Economic Review*; *RAND Journal of Economics*; and *American Journal of Public Health*.