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CROSSING THE LINE

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Panelists: PHILIP M. DIDIO

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ROBERT D. SHAPIRO

Recorder: PAUL A. CAMPBELL

The goals of the session will be to:

- Visit and learn from actuaries in nontraditional roles
- Provide insight into how to pursue nontraditional opportunities
- Offer face-to-face access to individuals with actual nontraditional experience

MR. PAUL A. CAMPBELL: We have a number of interesting speakers who have crossed the line into nontraditional areas and environments, and I know you will find their experiences and observations interesting and helpful.

A primary objective of the Actuary of the Future Section is to identify nontraditional environments and actuarial roles and to assist members of the Society in exploring and entering those new areas of professional involvement. The goals of this open forum will be to learn from nontraditional actuaries, hear ideas for pursuing nontraditional opportunities, and have face-to-face interaction with individuals who have had nontraditional experiences.

One thing the four of us have in common is that we've had fun. Bob Shapiro is president of the Shapiro Network.

MR. ROBERT D. SHAPIRO: I really believe there is an important message here. The important message is actually summarized, in a sense, by a survey published in a business journal that came up with the ranking of corporate goals for business school graduates. As you try to pick out the things that actuaries are known for, like work ethic, analytic ability, and functional knowledge, you will see that they have drifted down from what I suspect this kind of analysis might have shown 10 or 15 years ago. Now there is a premium on things like leadership, interpersonal skills, communications, and decision-making capability.

I have one more quick view of what a typical actuarial survey might look like. We've actually done a number of surveys as a part of the Actuary of the Future effort, and the Society has done many in the past 10 or 15 years to try to see how our clients and colleagues view us. People think we're bright, we're ethical, we're skilled, and we're excellent problem solvers, but often we get feedback that we're very narrow, we miss the big picture, we sometimes lack marketing and communication skills, we're rigid, we're sometimes defensive and arrogant, and we're expensive. You're only expensive if people don't appreciate the value that you're adding and charging for. I suspect we have all the value we charge for; I guess one message would be that unless we package it in that framework of business problems, good communication, and big picture, we'll have trouble getting people to appreciate just how good we are.

An impression people often have of actuaries is that we're really uncluttered by emotion when facing a business problem. However, life is emotion and behavior, and somehow we need to maybe get a little bit of a smile and a little bit of a frown when we get in these situations.

Finally, I thought it would be a good backdrop just to share the vision for actuaries that was articulated as a result of some of the Actuary of the Future work and the Society of Actuaries' other work that was actually adopted by the Board four or five years ago. I think it's worth just spending a little time on this, and then I'll let others talk a little bit about their nontraditional jobs. The vision we articulated was to be and be perceived as being the financial architects and managers of enterprises built on the application of experience analysis and risk evaluation who measure, communicate, and respond to current financial implications of future contingent events. Those are a lot of words, but what it doesn't say is that we're engineers and analysts. It doesn't say all we do is measure and analyze, and it doesn't mention insurance companies and employee benefit plans. Somewhere in there we believe lies our future in terms of nontraditional opportunities.

MR. CAMPBELL: Our second speaker will be Karen Lisi, corporate actuary and human resource analyst with Sandoz Corporation.

MS. KAREN A. LISI: I'd like to start by saying that I'm an Associate of the Society of Actuaries and an Enrolled Actuary, and my current position is corporate actuary and human resource analyst for the Sandoz Corporation. I've been in this position for just under one year. Prior to joining Sandoz I worked as an actuarial student at Metropolitan Life for three years, and after that I worked at DeLoitte & Touche in its actuarial and benefits consulting practice for five years, during which time I worked as a pension consultant and also as a health care actuary. I'd like to point out that during my two previous positions I've always worked primarily with other actuaries, and this is not the case in my current position. I'm going to talk about this a little bit more later, but first I'd like to introduce you to the Sandoz Corporation.

The Sandoz Corporation is the U.S. holding company for Sandoz International, which is a Swiss company that's based in Basel. We oversee the operations of all the Sandoz companies operating in the U.S., and right now there are about eight companies, with a total of about 12,000 employees. The Sandoz Corporation itself has about 50 employees, so you can see that each of our departments in itself is fairly small. The businesses of the different Sandoz companies vary greatly, but they're all primarily focused in the natural sciences area. Our largest company is Sandoz Pharmaceuticals and some of its more well-known products are Tavist-D and Sandimmune. Some of our other companies are Sandoz Chemicals, which primarily produces colored dyes, Sandoz Nutrition, which makes nutritional products that are sold to hospitals, and Northrup King, which primarily produces crop seeds for farmers.

I was hired at Sandoz as part of a benefits consolidation program. The objective of this program is to reduce the number of consultants and carriers the various U.S. companies use and thereby eliminate overlap in some of our consulting services. It is also an objective for Sandoz Corporation to become more familiar and involved with the benefit programs of the various Sandoz companies and also save the corporation

and the companies money. There were five primary aspects of the consolidation program: life insurance programs, disability programs, savings and investment plans, health care benefits, and actuarial services for pension and postretirement benefit plans. I would like to point out that each of the various Sandoz companies like to consider themselves as being very entrepreneurial and autonomous. This is primarily because they are in very different businesses and think that because of that their benefit programs will differ from one another and really need to be geared to their own particular business. On the other hand, the Sandoz Corporation tends to recognize some of the benefits of operating on a more uniform basis, so what we're faced with is trying to find the right balance between unifying and still preserving some independence.

Right now I'd like to focus primarily on the actuarial-services portion of the consolidation program. We call it the in-house actuary project, and the idea came from one of the corporation's consultants who actually suggested that hiring an in-house actuary to perform and help coordinate the actuarial services provided to all the Sandoz companies could really save some money and could help the companies use consultants more efficiently. At the time, all of the companies also had their own consultants. The consultant to the corporation was very key in defining what the role of the in-house actuary would be and was actually in charge of recruiting someone to fill the position.

When I was hired I was told that my primary responsibility would be to oversee and actually perform, with the assistance of this consultant's technicians, the actuarial services that had been performed for all of the different companies by eight different actuaries. I was also told that my secondary role would be to take part in other human resource issues. So I think it's in this respect that my particular role offers both traditional and nontraditional aspects.

When I first joined Sandoz, I began assessing the scope of services needed to be brought in-house. I got to know the human resource people at our various companies and learned about their expectations. I found that the scope of services varied greatly from company to company and was much more extensive than I was initially led to believe. In addition, there were many unrealistic expectations in some of our companies. I really wasn't surprised by all of this, because as an actuary I was dealing with some people who didn't really understand what was involved in actuarial services. Many executives at higher levels believed that a single person could come in and actually perform all of the actuarial services for 12,000 employees and eliminate completely all consultants for our companies. So I was not totally shocked but a little overwhelmed at trying to figure out how I was going to make everyone understand the value of having an in-house actuary. During my first year, my challenges have been and continue to be communicating a more accurate picture of the benefits of an in-house actuary, working with a consultant and a team of technicians to perform the in-house actuarial services, and finding the correct balance between traditional and nontraditional roles.

I've done a lot of thinking since I came on board at Sandoz about what the values of an in-house actuary could be. Some of the values that I've been communicating to the companies are the following. An in-house actuary can help eliminate overlapping

services from having many actuaries perform the same tasks for different companies. This helps reduce the inconsistencies and complexities that result from using different consultants. It allows Sandoz Corporation and the Sandoz companies to more easily coordinate certain key activities. It provides a way to improve on services that aren't quite up to speed, and it also allows for cost savings by developing a wiser, more informed buyer of actuarial services. Finally, as I take part in performing the actuarial services, it reduces the need for so many consultants.

I'd like to talk a little bit about the nontraditional aspect of my job. Since I've been with Sandoz, I've worked on a variety of projects outside of the standard pension and valuation actuarial areas, such as (1) administering a long-term incentive bonus program, (2) assisting with the design and communication of executive retirement plans, (3) auditing some of our annual bonus programs, and (4) gathering and coordinating data for our health care benefit strategy study. In doing these and other projects I've worked with many other departments within Sandoz Corporation. For example, I've worked with the comptroller's department to help those employees better understand the impact of Financial Accounting Standard (FAS) 87 and FAS 106 on our financial statements. I've been asked by the treasurer's department to take part in an investment policy study for Sandoz pension plans, and I've been providing cash-flow analysis for our various pension plans. I've worked with our legal department on compliance issues, document drafts, and nondiscrimination testing. I've also worked with the tax department on employee benefits and insurance and on the tax implications of our executive retirement. A future project will be the development of an on-site medical facility at one of our companies.

I'd like to summarize by saying I've learned a tremendous amount about business by having the opportunity to work with these various departments. The departments at Sandoz Corporation are very small, so I've had the opportunity to work with key executives from each area. As I teach them about what actuaries do and how I can contribute to the process of running a business, they've taught me a lot about their own particular areas. I think this interaction is a key dividend of having an in-house actuary. In many companies there are not strong linkages between human resources, the finance division, and other areas of the company. With human resources and employee benefits becoming such a large part of revenues and assuming such a big proportion of company profits, it makes a lot of sense to try to strengthen that area and I think an actuary can really help.

MR. PHILIP M. DIDIO: I'm going to first tell you about U.S. Trust. It's a trust bank, and in general, a trust bank manages money. Our main client base is wealthy individuals. That's how the company was formed. It's more than 100 years old. There's also an institutional asset-management department of which I'm a part. Asset management is mostly for individuals, but it includes some institutions. That includes pensions, foundations, and 401(k) plans. Private banking and lending to our clients are small parts of our business. Master trust in custody is recordkeeping on institutional assets for the most part, and many systems are in place to produce new recordkeeping. It's a stable, fee-based kind of business.

I've been at U.S. Trust for 15 months. When I got out of college, I worked at John Hancock for three years as an actuarial associate. I got my ASA in three years. At

John Hancock I was in two rotations. They were group insurance, financial reporting, and traditional retail product development. What I determined was that I was more interested in investments and less interested in insurance. I started reading *The Wall Street Journal* a little more carefully, making overtures to the bond group at John Hancock; a possible move would have been to try to get into the bond area there. But I decided graduate school might be interesting.

I went to the University of California at Berkeley and received a master's in statistics. I must say that being an actuary helped me graduate quickly from that master's program. Taking all those statistics classes kept me in the studying mode and gave me a head start, so I was really better prepared than most undergraduates just graduating. So I finished in December 18, 1990. Eighteen months later I started at U.S. Trust. I looked for work for a long time. I looked in the Bay area and then moved to New York. Eventually I landed at U.S. Trust and I'm very glad to be working now. So I'm a living example of some of the good sides and bad sides of taking a leap out of a career.

The good side is that I'm in a job I really enjoy. I really like my boss. My responsibilities include portfolio management, something I have always wanted to do. It's a very romantic, sexy kind of job. You do well. You do poorly. Everyone's riding on you. The portfolio that I manage isn't particularly that romantic. It's an index-linked portfolio, so we're index tracking but we're not fully index replicating. So how we do is based on the tracking. Are we beating the Standard & Poor's (S&P) 500 or losing to the S&P 500? So far we're very close. We're within 14 basis points, on the down side. If we were ahead, I would have said we are really stomping on the S&P 500. We're not, but all we have to do is stay close. That's the important part. We use software to help us construct the portfolio, and I'm involved in reinvesting. So there is some discretion available to me. Usually I can select and decide to buy two or three different stocks.

Portfolio analysis is part of the support that we give to the bank. The bank just initiated many new mutual funds, and we created benchmarks for those mutual funds to determine, if they beat the S&P 500, whether they were good or lucky or were in the right industries. These mutual funds are theme funds, so they're invested in different sectors, such as in the communications sector. Global Competitors and early life-cycle companies are other theme funds. So we've created benchmarks, and we've been plotting their performances versus the benchmarks and have seen what progress they've been making relative to those benchmarks. If they beat the benchmarks we want to know why. If they point to the fact that they're making 20% and the S&P is only 5% and the benchmark's up 30, then maybe they're just in the right area. You're forced to be in certain industries so maybe that's why you're winning, or you may be picking the wrong stocks in the industry. So it's really performance analysis.

Mutual funds are part of a more general asset-allocation model within the bank. I'm proud of the fact that we developed this two-level asset-allocation model. First, we decide between asset classes, a level-one decision. We distribute people between four asset classes: domestic equity, international equity, bonds, and cash. Once we determine that, then we try to pick mutual funds within each asset class to

recommend to the clients. Building that model and monitoring the performance of the benchmarks, the actual holdings, is the job I do quarterly. It's good because I get to work with the chief investment officer of the bank who's really interested in seeing these mutual funds do well. This internal monitoring process is a way to validate his efforts.

Finally, the most actuarial of my responsibilities is asset/liability management. We've used the Chalke system to do asset/liability matching management for small insurance carriers, particularly their interest-sensitive liabilities. We use this system to project the assets, project the liabilities, and we want to offer this asset/liability management function to support our asset-management capabilities. Most small insurance company portfolios are just managed on a total return basis. The asset managers know nothing about the inherent liabilities and about backing them, and the actuaries aren't usually successful in communicating what those liabilities are. (I go to meetings and everyone complains about how the actuaries and the portfolio managers can't communicate.) Well, if you tried to model and integrate the modeling together, then they'd be on the same page. It's been a long arduous effort. Many people in the consulting area have been trying to bring these people together. It's working slowly, but I am the in-house actuary who is taking care of this particular function. Not only do we want to keep and manage their money, but we also want to do services like Regulation 126 testing for these companies and try to tell them where the warning signs are relative to the C-3 risk.

This part is my pep talk for those of you who are interested now in the investment community. I looked for a job for a long time and there were times when it was not so good being unemployed, and I wished I had the stability of being a traditional actuary. It's just that I was interested in investments and wanted to work with them. I saw the downside, and now I'm seeing the upside. It's really important to me to do something I enjoy.

It's hard for actuaries to break in on Wall Street. I think the exam process turns out people who have an institutionalized body of learning that is more rigid and codified. The value of that is that it gives everyone a minimum standard of knowledge and that's important to validate the professional designation. The downside is that it makes everyone too similar. With the new finance track, actuaries are spreading out into a variety of assignments, and that's going to help actuaries who want to go into other careers.

I've continued to take some of those finance investment track courses. If they were there I might not have left John Hancock in the first place. That track is very interesting to me. It's not entirely what I want to be doing. If the exams are relevant to my job, I'll take them. If not, I haven't justified just getting the designation for the sake of that, because I think I'm able to be successful without being an FSA. But I think the Society is moving in the right direction in that respect.

Just one other thing about how to break in on Wall Street. They look for programmers, so that's a good skill to develop. How else would an insurance person break in? Perhaps as an insurance company analyst, being able to rate the credit worthiness of insurance companies. There are also subsidiaries of the sell-side firms that are

insurance companies, so some of those investment banks have insurance companies. There's always the bond area of insurance companies; bond salespeople try to package mortgage pools and make it a selling effort. I think an actuary could do well on the other side, presenting those investments and making them more appealing to those actuaries who are on the other end of the phone in the investment department.

If you're interested in doing something other than what you're doing right now, try to turn your job into that. Try to blend your job responsibilities with what you're interested in. I don't have to do that where I am. I have a lot of latitude. My boss gives me a lot of room to be creative. It's very hard to find a creative, entry-level job and I'm very fortunate.

MR. CAMPBELL: Now to round out our introductory comments I'll add a few thoughts. In the course of my 35-year career to date, I've been a very nontraditional actuary. That is particularly amusing when I recall that a key reason for my decision to become an actuary was my high school guidance counselor's assurance that as one I'd be able to sit in a corner doing my calculations and wouldn't have to talk with people. That was beauty to the ears of an introverted kid, but it certainly turned out to be an inaccurate prediction for me. During my 12 years at CIGNA, then called Connecticut General (CG), I was asked to become a member of a task force that developed both variable annuities and mutual funds creating entirely new pricing, administrative procedures, and actuarial standards. We and our counterparts in other companies became SEC experts and worked on regulatory models joining state and federal regulation. At a later date I was asked to work with CG's field managers and agents to develop motivational and profit-oriented compensation systems for the branch agency organization. This involved a considerable amount of interaction with personnel on site in the field offices and resulted in the creation of a new profitoriented commission and override system.

When a former senior officer called from his new home at Hartford Life Insurance Company and asked me if I'd like to become an international actuary, it wasn't hard to say yes and join him. It was a fascinating and event-filled number of years, interacting with actuaries and the management teams of ITT Hartford's subsidiaries located all over Europe as well as investigating possible expansions around the globe. There were many nontraditional roles to fill, having to do with tax and regulatory interpretations and comparisons, consideration of varied environmental forces and their impact on marketing potential, and dealing with a large number of local and multinational issues that were often only barely connected to the actuarial aspects. I did my best and thoroughly enjoyed another nontraditional chapter of my career. When ITT decided to recapture many of these international duties in New York, I tried being a traditional actuary for a while, but the bug had been planted.

I soon found myself in New York City as a senior manager at Coopers & Lybrand (C&L) and director of international benefits and compensation. This involved visiting and selecting dozens of foreign locations for expert teams, assembling benefit and compensation and tax experts from C&L's worldwide network, as well as informally affiliating with actuarial organizations in many countries. My role in the United States was to market the expertise to corporate managements of multinational companies and then coordinate the development of information and reports from those countries

where their foreign subsidiaries were located. There was a component of traditional actuarial practice, but many more nontraditional activities as we blended social insurance programs, tax and regulatory environments, competitive practices, and corporate philosophies. I might add that time differences made it necessary to work into the wee hours on many, many occasions in order to communicate by telephone with my colleagues or contacts.

Time limitations make it necessary to only mention briefly my other nontraditional roles:

- A facilitator of corporate strategic planning activities by teams of executives, marketing officers, strategic business unit (SBU) leaders, and support teams
- President of an entrepreneurial strategic consulting firm
- My current role, Director of the University of Hartford Actuarial Studies, responsible for marketing, advising students, developing mentor programs, and overseeing room facilities and the instructions of dozens of preparatory classes for the May and November actuarial examinations.

I have assembled a list of basic requirements that I believe are necessary to become a nontraditional professional: be curious and ask questions, read more and listen a lot, be interested in contributing to colleagues in other areas. I recall that one of the things that I did quite frequently in my first corporate location was contribute ideas to the suggestion plan. I believe that helped a little bit in that people had their eyes open for me to do different things.

- Respond to invitations to get involved with something new.
- Be brave and willing to take a few career-related risks.
- Be energetic and willing to work long and hard.
- Keep linkage with the profession in committees and meetings.
- Be ready to try something new and take chances.
- Be willing to learn from every experience, good and bad.
- Be creative, extrapolate from familiar to unknown worlds.
- Accept uncertainty in security, compensation, and standards.
- Be ready to have a thrilling, exciting career experience.

MR. WALTER S. RUGLAND: First of all, we have a job to do and that is to encourage Mr. DiDio to take exams beyond those that have interest to him. I hear that from many people, and it's a sincere expression and I respect it, but the profession will outlast the job you have at U.S. Trust, and I encourage you to attain the highest recognition.

I have some observations. As I've traveled around the world this year, I found that this topic is generally of concern and of interest everywhere I've gone. The English call it the wider-fields initiative. The Australians say, "What should we do?" In Japan they contemplate it. In Europe it's a constant concern. What I have tried to suggest, and this is based on some of the observations I've had as I've talked to actuarial clubs here, is that first of all we still tend to apologize for being actuaries. That's why these buttons (Ask an Actuary) have been helpful. They've helped us to get beyond that, to be able to say what we are as actuaries and what we can do.

Also, many people have told me, as they've moved out of the traditional mode of actuarial work, that they're no longer actuaries. I try to challenge them that that's not the case, that they are actuaries, but they are showing us very specifically, as the Actuary of the Future Section is meant to do, that we have to find a home for people who are no longer in the traditional actuarial modes. At some of the places where I've talked, such as at the meeting of the Actuarial Society of Greater New York, we talked about the concept of pathfinders. I talked about that in Australia. People are coming out of universities, taking actuarial exams, they want to be actuaries, but yet they do not end up in life insurance companies or in consulting firms. We need to cheer them on. We need to make them feel extra special when, like Philip, they find a niche in a place such as U.S. Trust. We're working to see if we can create the pathfinders club, so that those people become our heros instead of our outcasts. Because when you sit down and look at a program like we have here, except for a few sessions like this one, they still have to struggle to find places and things of interest.

We also have to find a home for people who cross the line later in their career. I would encourage any of you who can think of ideas with that in mind to share it with the leaders of the section or talk to me about it. We have to elevate those people so that they find value in our meetings and they find value in being an actuary, even though they're no longer working with an insurance company or in a traditional employee benefit consulting environment.

MS. ANNEMARIE T. BROWNMILLER: I have a question relating to in-house actuaries, particularly relating to companies that have never had in-house actuaries before and are not used to defining what actuaries might bring to the table. Duncanson and Holt hired in-house actuaries back in 1989 for the first time. It had used consultants. I was hired a year later. I find myself almost like a bull in a china shop. I feel that I can bring so much to the table, but I recognize that the organization has done things a certain way in the past and has used other resources to contribute information or strategies. It's difficult for me to sense where I am uninvited initially. If you're uninvited, how do you go about presenting yourself as an opportunity or as a value to be added, without making people feel as if you're stepping on others' toes?

MS. LISI: When I was brought on board at Sandoz, many of the companies that I am trying to assist were not keen on the idea because it required a shift, a change for them. So the approach that I have taken is to try to assist them with matters that they need help with, even if it may not be my primary focus. I try to help them if they have small questions about a Form 5500 or if they have a question about some other area that is not my prime focus. What I've been finding is that when I help them with the smaller things, they gain more confidence in me. When it comes time to talk about taking on larger responsibilities, they're much more open to letting things flow my way. So I think that might be an approach to take.

MS. BROWNMILLER: Building confidence in stages.

MR. ALAN LEE STURM: Being a nontraditional person to start, as well as a nontraditional actuary in a traditional position, I'd like to start with just a comment to the last question that relates to something that happened at our company. We were talking

about rotating actuarial students into the investment area. You might think the investment person would be concerned that the actuaries would be fighting to get in and say, "Well, let's protect our turf." It was the other way around. It turned out that the investment professional was great, saying "The more knowledge we get the better" and felt that actuaries were kind of dragging their feet. So I think it's better to err on the side of being risk-takers. My observation is that at times one of the failures of people in the profession is that they didn't take enough risks in terms of their careers as some of you on the panel have indicated.

I also have a question for the people on the panel. I'm an ASA. I've passed a couple of Fellowship exams. I happen to agree with what President Rugland said. I happen to be motivated toward pursuing the FSA because in addition to being motivated to finding new areas, I also enjoy the strong technical areas. I'd like to keep many doors open to myself.

My question is, it sometimes seems like there's somewhat of a dilemma. In pursuing these opportunities, if you are an FSA and want to go in at an entry level, you might be overqualified to get into some of these doors. Yet if you want to go in as an ASA or even less, that may be fine. You then take the exams on your own time. The company philosophy is, "If you want to be an FSA that's great for your career, but we want you doing this and your FSA doesn't matter to us." I want to keep all these nontraditional areas open, whether it be within my company or elsewhere, but I also feel that assistance by the Society or by nontraditional individuals like yourselves would be of great help.

MR. SHAPIRO: That's really a good question. In terms of how to get in, it really relates to the other question about how to get people, who may not be used to alternative views from actuaries, used to them. A couple of random thoughts. One is the idea of just giving some assistance and taking no credit for it by helping an individual do his or her job better, as a starting point. There's no question that the skills we have as actuaries fit very well with the opportunities and needs of bank trust departments and banks in general. How do we get that to work? It's not going to work if we start promoting ourselves in banks with "You need us because we're great." It's going to work because we get together with bank executives and genuinely appreciate the value they might bring to us or the skills and strengths they have and work together with them for a while. After that happens, you break down some of these barriers. All of us are fighting for our jobs and do what we do as well as we can do it. It takes a while to accomplish that.

MR. STURM: It seems like you have this idea, which I believe to be correct, that the actuaries, in addition to being viewed as good communicators, should be good negotiators as well, and should come across as being nice, modest, intelligent people who are willing to work as part of a team. The rewards with that approach would be very great.

MR. SHAPIRO: There's another dimension to this. Some of the work I do relates to Wall Street. You talk about actuaries on Wall Street, but Wall Street has a tolerance for risk and ambiguity that we're almost taught to avoid. Our exam emphasis is on getting the one right answer and standardizing things. Wall Street's view is that risk

is terrific, and it creates an opportunity; its ambiguity means there's something which we can create and make money from. It's a whole different mentality. So we have to be aware of the cultural differences between these different areas where we can work, too.

MR. DIDIO: Regarding how an FSA might get in a nontraditional role, I'd say the transition would be more gradual in that one might take jobs within his or her company that have fewer and fewer actuarial responsibilities, until one is in the desired area. You don't really jump companies and start at entry level. It's easier for someone at my point to make that jump, make a more abrupt jump, because I'm less entrenched, less forward, and I have made less progress.

MR. SCHENLEY HAJEK HALL: I'll just tell you how nontraditional I am. I have two employers. I'm working for a professor at Penn State on educational software and I'm teaching at Northern Arizona University. One of the things that attracted me to our profession in the first place was the guy who came recruiting to my school and said that actuaries could fill this flexible role all over the country. It seemed like once actuaries got their credentials, they could go wherever they wanted. I'm married to an astronomer and astronomers like dark places, and dark places are not usually found near big cities. It turned out that there are two or three cities in each state that have a number of actuaries, and that's become a problem for me because chances are I won't end up in, or particularly near, one of those. Not only that, but because it's a smaller city, it doesn't have the big trust banks, and so now I'm in the educational end. I'd sort of like to get back more into business, but I'm not quite sure how to go about it. I've sort of gotten off the beaten path.

MR. DIDIO: I think anyone can consult anywhere with a PC, a fax, and a modem. I think the first nontraditional role is to work for yourself or do consulting.

MR. HALL: Then it's just a question of getting established.

MR. DIDIO: Absolutely.

MR. SHAPIRO: I have a question that relates to this. We think of ourselves traditionally as working at life insurance companies or on employee benefit plans. Where is what we are good at important to others to the point that they would appreciate it if they knew what we could do for them and they'd pay for it? We think there are many other opportunities. What we're dealing with is the question, what are we special at if businesses we've always worked at were taken away from us?

MR. JOHN W. PAIGE: What I'm about to say is in no way related to my employer, but it's about a subject I've never heard mentioned. I wonder if there are any other actuaries who belong to the International Association of Financial Planners. There's a whole army of people out there who are making projections for individuals involving investments, involving their personal liabilities, involving great uncertainties in the future. I've never met an FSA who's in this. I think there are enrolled actuaries out there who are doing it. I think for the person who is looking for an alternative career, you can get a wealth of information from the College of Financial Planning in Denver or the International Association of Financial Planners in Atlanta. For the person who's

really stymied in an actuarial career, here's something that has numbers. It has probabilities. It has a chance of a good income. For those of you who are looking for alternatives, you might want to talk to some personal financial planners. If you're not a salesperson, the income might be low compared with what an actuary can get on the going market, but it also might be a career that would be very satisfying by using the skills we know: personal computer skills, people skills, math skills, investment skills, personal asset/liability matching, and management.

MR. CAMPBELL: One speaker was talking about things that very easily fit the mold of what actuaries are capable of doing, and yet have nothing to do with mortality and the risk of living too long. He spoke about benefiting from what we know to look into the future and imagine with some realistic variation in what we imagine. As Mr. DiDio has indicated, the possible entry may well be easier by going through a mode of consulting rather than going into a human resource department and saying, "I'm earning this kind of salary in my present position. Can you pay me to move into a chair in your organization?"

We've moved comfortably from the question-and-answer session into one of ideas, observations, and experiences. I do want to invite those of you who have ideas or illustrations of crossing the line to share them with us. If you would like a path along which to focus, think in terms of an industry classification, some key duties, the actuarial nature of a job, an identified need for actuarial services not being met. How would we market our skills in these nontraditional areas?

MR. MICHAEL M. BRAUNSTEIN: I am an actuarial recruiter and I've crossed the line. I spent 15 years as an actuary with one company, Hartford Life. I had a wonderful 15 years there and then decided to make a change. I decided that the logical thing to do was to extend what I knew best, to not just jump into something completely different, but to take what I knew and use it. I see the same thing in all four panelists. They all did the same thing that I did. We didn't jump from being an actuary into something completely different. I don't recruit teachers. I recruit actuaries.

Mr. DiDio spent some time in the John Hancock investment area before he got his current job. He mentioned working in a bond department there. Ms. Lisi did some pension work and some accounting work in advance of her new job at Sandoz. I think it's an evolution, not a revolution. With respect to somebody who wants to work in a small city, or in a big city, or with a little company, there is a company somewhere out there, and I suspect that sometime down the road you'll have that opportunity, but it's not going to happen right away. Actuaries suddenly are not going to be everywhere, as accountants are, for example. But I do believe that if we take a step at a time and we evolve into new areas, we will find ourselves as actuaries in all sorts of things.

In answer to Mr. Shapiro's question, "If we take away the life insurance and employee benefit consulting, who are we? What do we offer?" I think we're smart and I think smart people can do anything. When I try to talk to people at companies other than insurance companies and try to convince them that I've got a candidate who they might want to consider for a role that is nontraditional as actuaries go, and

they ask, "What does this candidate offer?" I tell them that the candidate is smart, and can do the job no matter what it is.

MS. LISI: I'd like to add something from my own experience. I was recruited by Sandoz Corporation because I was an actuary, but in addition to the actuarial role I play, I find that the nontraditional portion of my job has grown tremendously. I have analytical skills that many people within companies don't have. These skills have been developed by being an actuarial technician, but they are easily transferable to any number of other areas, such as human resource and financial areas. The more I work with different people in my company and the more they see what I can do, the more I'm asked to get involved. I have found it a very broadening experience. Getting your foot in the door might be a difficult step, but if you can find a way to get in, you'll be able to prove to many different people the value that you can add.

MR. WILLIAM C. CUTLIP: It's great, all this support group. Mr. Shapiro, you asked, "What did you learn as an actuary?" and "What skills do we have if the life insurance, the health, the benefits, are taken away?" It's problem solving. We know how to solve problems. We've had the advantage of looking at a breadth of guestions and issues. We know how to attack problems and that you can't come at it from a straightforward, simple approach. We know how to get the best kind of answer. Risk analysis, the financial issues, the mathematical components of any risk that is considered - they are pieces of the puzzle, and actuaries determine how they all fit together. I think that's something that is very unique to actuaries, that other disciplines don't offer in the same way. Actuaries look at each individual part of a question as a piece that fits together with other pieces into a whole. We learned how to study, and we know how fast the world is changing in every aspect. Isn't it wonderful to be able to take our study skills and go look at things as they evolve, know how to research them, know where to get the information, know who to contact, know how to study, how to learn, how to build that integral part of information into ourselves? To take a word from the vision that Mr. Shapiro quoted. architecture is something that we have truly learned through the set of exams, regardless of how we adapt and use that word.

I have crossed the line many times in my career. I like to think of it as crossing the line. I used to think of it as being a checkerboard career, but this phrase, "to cross the line" seems to give it more reinforcement. Right now I have responsibility for property/casualty actuarial business. I was running a life and health company. We had a property/casualty company and a life and health company. We sold off the life and health company. I have a job! I'm thrilled! It's interesting to get into the property/casualty side, because I come at it from a basis of almost total ignorance, which allows me to ask the dumb questions. Of course the typical response that you get is, "We've always done it that way" or "This is the way everybody in the industry does it." So it's an opportunity to go in there and ask questions, "Why do you want to do this? Is there a different way to do it? How could an alternate approach have an impact?" So that has been a very exciting part of moving into this job.

The question was raised earlier as to how to get into other areas where people don't recognize you. You can't just walk in the door and say, "Hi, I'm an actuary and I'm

here to help you." That's worse than being from the Internal Revenue Service. One way to do it is to volunteer. Volunteer inside the company. Work on teams. You hear of a team that's coming along and you go to your boss or you go to somebody who's running the team and say, "I would really like to be a part of that team." A couple of things can happen from that initiative. One is that you learn. You learn how other people think and feel and work. You learn some technical things that you might not otherwise know, and it also gives you an opportunity to bring to bear your experiences and your education and your knowledge.

Another place to volunteer is in community jobs. School boards need help. They always need help. Don't run for the school board, but offer to go help them in understanding contract negotiations or projections for "Schools 2000." Most school boards are probably working on that now. What's the population going to look like? How are the schools going to need to gear up for that, to be ready for what's coming down the pike? There are certain skills and techniques that we have that we can bring to bear on that. What happens in that endeavor is that you end up working with other professionals within the community who begin to know you and begin to recognize the skills you have. And if you're looking to move into their arena, then that's a good way to build some nontraditional networking. You've built a good network with actuaries; this is a good way to build a nontraditional network.

Education is also critical. If you see something out there that you think may be of interest to you, go get some education — possibly some formalized education where you can — because that will communicate your interest to other people. Several years ago I realized that I wanted to work more with the marketing aspects of the company. Of course, the response I typically got there was, "Well, that's fine, but you're an actuary and actuaries just cause us problems. They don't help us." So I went out and I got my designation as a CLU and a chartered financial consultant (CHFC). Several things came out of that. One was the education that I got, because I wanted to find out what the salespeople knew, what kinds of things they had to study, so that would help me communicate better with them. It also gave me the opportunity to show them that I was interested, and that I had some information about their field.

The second thing is something I'm very glad I did. About a year-and-a-half ago I decided I really wanted to learn more about the property/casualty business, so I started taking the chartered property and casualty underwriter (CPCU) exams. I'm one short of completing those, and considering what my current position is, I think it was good that I did that. There was a lot more education than on the CLU exams, because I was entering areas where I had no experience or formal training. So that really did synthesize and give me some more information along those lines.

One of the biggest tasks, I think, that we will face in the future is, again, trying to convince people who are not in insurance roles that there is a place for actuaries in their areas, on their turf, and that we have something to contribute. I think the work of the Actuary of the Future Section can help support that. The pathfinders that Walt Rugland mentioned would be a good way to support that. Things that we can take, tools that we can build, and information and experiences that we can exchange with one another will help and expand that effort.

MR. JEFFREY S. PACIERO: In the process of crossing the line, sort of have one foot in one area and one foot in another. I agree with Mr. Cutlip that no one's going to hand you the opportunity. You have to go out there and ask for it or volunteer for it. I have a question for Mr. DiDio. I'm wondering how important you thought your statistics degree was or how important being an actuary was in obtaining your job at U.S. Trust?

MR. DIDIO: Getting a master's degree is important, not so much for what you learn but for having gone through the process. It's sort of a stamp of approval on how you spent a few years. I enjoyed going to graduate school; I took finance classes in the statistics program. It's not a part of the statistics requirements; I just elected them. I took options theory with Mark Rubinstein, a well-known person in that field. Fortunately, I was able to take the classes I wanted, and I had a lot of flexibility there. With respect to my being an Associate, I stumbled upon this asset/liability managing responsibility because I had actuarial talents. Someone recognized it and decided to design a project for that.

Being an Associate may not be valuable to someone who doesn't know what an Associate is. So I had my little speech prepared in interviews to explain what it was, what it involved, and the topics that the examinations cover. I think it's a good validation to have spent three years productively at John Hancock and have a professional designation. But then I try to make it relevant and alive. I don't think it's necessary for everyone to go back to graduate school to undertake nontraditional activities, but it is necessary to do things outside traditional roles, to point to them when you're in an interview. It suggests that you've taken initiative and that you are genuinely interested in this field.

MR. DANIEL H. KALISH: In 1953 I was a CLU, so I came from the other side back into actuarial. I had been an actuarial clerk prior to World War II. Every once in a while somebody says to me, "What does an actuary do?" I say we're mathematical engineers. We apply mathematical principles to problems. Probability analysis is one of our techniques. During World War II we used probability analysis in intelligence. It's being used in various disciplines. The actuary is a problem solver who has a discipline of putting the facts together and coming up with solutions. I just wish I was younger, because I'd like to get into a lot of these other fields. Investments don't intrigue me, but there are so many other problems, so many other things that are happening in the world, in communications, in relationships between countries, in the European Community, with our health care problem. There are so many places where I feel actuaries can add to this. I keep trying, talking and writing to people. Eventually I'm going to find something that I like and can work on. It's wonderful to see that the mathematical engineer, the problem solver, can go anywhere and do other things.

MR. SHAPIRO: Let's not restrict our view of nontraditional to new employers. Whatever it is we do specially in life insurance, for example, has made us for a long period of time the preeminent people in the life insurance companies. That has not worked as well in the last five years. The packaging isn't good enough, largely because it is too narrow. So now we need to expand some of the context within which we put our unique skills. Repackaged, even in our current businesses, if we

develop and emphasize these communication, decision-making, and risk-taking skills, we would be preeminent as we were in the past. If we did these things within our insurance companies, for example, there are other roles, such as in the marketing, strategy, and other areas, that we would then naturally flow into. Maybe that would provide a natural exit out into some of the other arenas. So we must not forget that we can do a better job in our traditional environments and in doing so expand our opportunities there.

The other point that I want to make is that the secret for each of us isn't in our Society of Actuaries membership, or our employer, or any other window dressing. It really comes down to what we want to be, what we think we can individually do better than anybody else, and where the market will appreciate what we have to offer in that context. The Society of Actuaries is a bureaucracy just like the life insurance companies are. It's not going to move fast enough to push you. It'll do whatever it can to enable you, but in the end, it's really you who must take the initiative. Then the Society will do the best it can to support you. It's never going to move ahead of you.