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Session 9L

Communication and Other Skills Critical for the Success of the Profession in the Future

Track: Education & Research

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Summary: Skills such as business acumen, communication skills, asset knowledge, knowledge of broader financial markets and knowledge of corporate operations are needed yet perceived as lacking among actuaries.

MR. KRZYSZTOF M. OSTASZEWSKI: This is a session about various alternative skills that actuaries might need. We will have two presentations. Valentina Isakina from the Society of Actuaries will speak about broader skills and opportunities for actuaries which is a result of a study done by the Society. Cathy Konsky, professor emeritus of communication at Illinois State University, and I, actuarial program director at Illinois State University, will talk about the research that we are doing about communication skills for actuaries.

MS. VALENTINA A. ISAKINA: I have a number of things on the agenda. We're going to talk a little bit of the study that has been done, and you probably participated in the study. It was a membership research project and also employer research project that the Society of Actuaries conducted. I'm going to talk a little bit about the strategy of the Society of Actuaries for the long term of the profession and then how this research feeds into the long-term plans. I'm also going to talk a little bit about the Board of Governors' decisions that will influence the professional future of actuaries and how that is going to be developing. We will talk about expanded opportunities for actuaries.

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We will talk about what is happening in the profession. You have all heard the presidential address at this meeting. I will touch a little bit on that in more detail. I will give you a few examples. So hopefully this will enlighten you in a sense of giving you an opportunity to see what the profession can be doing, what it is already doing in other countries, and just see ourselves from an outside viewpoint to understand how not only we view each other as actuaries but also how the others, employers in particular, both traditional and nontraditional, view actuaries and how they compare them to nonactuaries in terms of skills and other things that we bring to the table.

Let's start with the Society of Actuaries' vision, and this is actually available on the Society of Actuaries' Web site. I'm not sure how many of you know this, but the vision of the Society of Actuaries is for actuaries to be recognized as the leading professionals in the modeling and management of financial risk and contingent events. This is a very ambitious statement, as you can imagine. There is nothing here that says anything about health insurance or life insurance or pensions, retirement systems. It states management of financial risk and contingent events. Supposedly our vision is to become those things to more than just our traditional employers. This is what this presentation is going to be about.

The Society of Actuaries' strategic plan helps direct the Society of Actuaries' work toward the vision. A Strategic Planning Committee was formed in 2001, and it drafted a Society of Actuaries' strategic plan that governs the board activities, sets strategic direction and allows for consistency between different presidents. The plan is reviewed and updated at least every three to four years. It is currently being revised as a result of the surveys and other research activities that I have just mentioned and that I will talk about just a bit more.

This has happened very, very recently. Just in the course of the last several years all of this came together. Now, in 2004 we are updating the strategic plan. We're educating the members on what we have found and hopefully giving you some energy and enthusiasm to go back and think about what you do a little bit differently. The high-level questions that were addressed by the Board of Governors and the Strategic Planning Committee in 2003 and 2004 were as follows: How do we expand in the traditional markets? What roles are appropriate for the actuaries in the future? Do we strive for broader financial services as a test of our abilities and expertise and potentially go beyond financial services to other areas? How should the current value of the actuarial skill set and the actuary be enhanced? Do we need enhancement to begin with in terms of image, in terms of skills? And what, if any other credential and/or education, should the Society of Actuaries seek to offer? What skills are needed for enhancement for future success?

The Society of Actuaries took it upon itself to find the answers to these questions. We did an extensive membership survey asking all of you to contribute, and we also went to the market. We talked to employers, to the current employers of actuaries, insurance companies, consultant companies, health organizations, and

we also went to nontraditional employers, employers who currently don't hire actuaries or some employers that may hire an actuary, but it's more an exceptional basis. We wanted to see what they all think about actuaries and how we can provide more value to those employers.

So the first question was do actuaries face more or less competition? Everybody agreed overwhelmingly that actuaries do face competition, and more competition than before. Members tend to be a little bit more optimistic in the traditional areas than employers actually. The employers think that there's more competition in the traditional areas for actuaries than actuaries themselves do. The financial services area has more competition for actuaries than traditional areas.

Another point that was very interesting that came across in this survey was the acquisition of nonactuarial credential. This does not include members of the American Academy of Actuaries or other actuarial credentials such as EA, et cetera. This really has to do with other nonactuarial credentials such as MBA, chartered financial analyst (CFA), and others. Our members are increasingly seeking other designations, other credentials, more education and more skill enhancements. The credentials that members are pursuing today while putting the FSA aside have CFA as number one on the list. The chartered financial analyst designation is offered by the CFA Institute, formerly known as Association of Investment Management and Research (AIMR). Members can earn MBA, certified financial planner (CFP), financial engineering degrees, and financial risk manager designation from the Global Association of Risk Professionals (GARP).

The survey asked to rank skill performances of actuaries versus employers. As far as ethical, solves complex problems, quantitative modeling skills and industry knowledge, actuaries get very good marks. On the other hand, proactive, knowledge of financial institutions and markets, business acumen, business communication skills, bold and takes informed risks, needed significant improvement. What's also very interesting is that on a consistent basis, employers marked actuaries better than actuaries marked themselves. What does it say about us? We don't take enough credit for how much we can do.

Now let's consider the traditional employer rating and the nontraditional employer rating. We received a very similar message. Again, actuaries versus competing professionals are lacking in being proactive, bold, business communicational skills, focusing on big picture, being a team player, and outperforming on the ethical side risk management skills, industry knowledge and quantitative modeling skills.

Business financial services employer rating performance is slightly different. There is a bigger gap between actuaries and competing credentials. We need to improve on those skills. In summary, the highest performance rating of actuarial skills was on the ethical front, quantitative, solving complex problems, financial assessment and reporting. The lowest performance rating was on being bold, having adequate

business communication skills, being proactive, being able to focus on the big picture and having business acumen.

It was also interesting to compare how actuaries view themselves and how employers view actuaries. Actuaries view themselves pretty much on three different points: business skills, financial skills and getting the right answer. The first two are the ones that needed significant improvement. When employers were asked about what an actuary presents as a value to the company, they actually spread it out considerably bigger. It was quantitative skills versus being a team player, financial skills, leadership skills and business leadership. What's interesting about that is that there is a greater continuum of skills that we need to think about versus how actuaries view themselves.

When we talked to employers about the value of the credentials, about the role that an employee can play in the company, the following emerged: insurance, reinsurance and consulting companies were the traditional employers of actuaries for their financial services as a nontraditional. They showed that when they look for a typical employee in this area of expertise, they look for somebody who can do product development and pricing, financial valuation and risk management. On the broader financial services, there were a couple of additional ones that they are looking for that actuaries supposedly cannot provide. They are financial advising, asset and fund management and investment.

Broader financial services employers are currently looking primarily at chartered financial analysts, MBAs, financial engineering, master's in finance, Ph.Ds and to a much greater degree, actuaries.

When asked how many employers consider actuarial designation when hiring for these positions what was interesting to me was that even in our traditional areas of employment such as insurance, reinsurance, consulting, not all employers hire only actuaries to fill these roles.

One of the questions that was also asked in the survey from the employers was about the top skills that were required for middle- and top-level risk management positions. It was interesting to see some of the dynamics that were very similar across traditional and nontraditional areas of employment and some that were different. One of the questions that the profession is struggling with is that actuaries are playing increasingly diminishing roles even in the traditional areas of expertise, for example, insurance companies. For example, when someone talks about the role of a chief risk officer, you see a trend of chief risk officers for insurance companies being hired from outside the insurance industry, coming from banks, mutual funds, et cetera. They do not usually come from an actuary within the ranks. So what is happening? Why can't an actuary rise to that level? Why can't an actuary be recognized as somebody who is able to deliver those values and those opportunities, those skills?

There were certain skill sets that are missing currently or that are not looked at when an actuary is developing his or her skill sets, whether it's actuarial exams, professional development or employer training. There are certain skills that are missing. For example, asset/liability management and operation risk management are new areas for the actuaries. Those are the things that we still need to work on. Those are the things that we need to build on. Those are the things that we need to learn.

Let's review the questions that I posed to you earlier and see what we found as a result of these findings. My presentation is a very small glimpse of the very extensive research that was done. So I advise you, if you're interested in the results, to go to the SOA Web site and look at the entire surveys, both the membership survey and the employer survey. Read them in more detail. First of all, to the question of whether members and employers share the same perception of actuarial skill sets, the answer was yes. Is the employer's perception of actuarial profession driven by the set of current skills being credentialed or by the employer's level of knowledge about those skill sets? It is both. There are certain skill sets that we have. There are certain skill sets that we need to build. The image issue is there, too. Employers know something about actuaries, but they don't know enough. So we need to do both. We need to enhance the skills of the actuarial profession and also tell the outside world what an actuary can accomplish and what an actuary can bring to the table.

Do we need a clearly defined identity for the profession? How should the actuarial image be changed or enhanced? There is a clearly defined existing identity, and that is valued for technical skills. We are valued for how much we can bring in terms of our technical knowledge and expertise. The image, however, does need to be enhanced along the dimension of business leadership and business acumen, knowledge of financial institutions and market. Again, I'm talking only about broader financial services as an extension of the area where actuaries can be employed. This is not the end. This is just the first step toward expanding the opportunities for the profession. This is just the first step that the board has decided on.

Do we expand in traditional markets? We need to enhance certain skills and advance business leadership opportunities in the traditional markets. Yes, we can do that. What roles are appropriate for actuaries in the future? Risk management and business leadership roles are appropriate. What skills need enhancement for future success? Again, risk management, business savvy, financial markets and leadership skills. Do those skills include financial services? Yes. What, if any, other credentials and/or education should the Society of Actuaries offer? Risk management, business savvy and financial markets.

The board has looked at all of this extensive information: Do we enter broader financial services? Should we put on a consistent effort that has not ever been done before to help our members take this next step and advance into those previously

nontraditional roles? Yes, we should do that. Should we expand in the traditional markets? Should we help our members to rise to a higher level in the organization? Yes, we should. How should the current value of the actuarial skill set and the actuary be enhanced along the dimensions of image and skills? Both need to be enhanced, both the image and the skills. What, if any, other credential and/or education should the Society of Actuaries seek to offer? There will be additional information. There will be additional education. This is something that is being explored right now. Sessions like this are a first step toward this.

The board made a number of very key decisions with regard to these targets. I will talk a little bit about them in more detail. First, we need to develop an image-enhancing program to re-brand and strengthen the recognition of the actuarial profession, to improve the recognition of actuaries as company leaders that can provide more than just technical expertise. An actuary is not somebody that comes in once a year and gives you a report and goes away. An actuary is an active advisor. He or she is the manager who can provide value, and alter, sometimes the strategic direction of the company. We all need to be able to do that.

We need to expand the awareness and the relevance of actuaries in nontraditional markets. We need to be able to work with other organizations worldwide to accomplish this goal. The first step toward this is a chief risk officer publicity campaign. This campaign was started as a grassroots effort. It started from the members who were the members of the Health Risk Management Section of the Risk Management Task Force, who were interested in helping actuaries advance to these new opportunities. They were very excited about this. They kept pounding on doors, and now this is happening. This project took on a life of its own. It was launched at the 2004 Enterprise Risk Management Symposium in Chicago, which took place at the end of April. As a result of that, we issued number of press releases. We had an interview on CNN Financial News with our spokesperson who was an actuary. He talked about the actuarial profession. We are planning on posting it on the Society of Actuaries' Web site. There will be publication in the nationally recognized business journals. The wheels are rolling.

The second decision was to strengthen the position of actuaries in the traditional markets by enhancing the value actuaries provide in terms of skill development, leadership skills, business skills and communication. Right now we are working on the education redesign. There will be a number of enhancements to this redesign that will help us achieve those goals and examining additional means of acquiring the skills. This goes to the point of additional certification and education. This can be done through the continuing education framework, additional certificates potentially and partnerships with both actuarial and nonactuarial organizations, which is probably even a more important point. Intelligence exists on certain skills that we don't currently possess and we want to deliver that to our members.

The third decision was to create a position for actuaries in the broader financial services market by enhancing current credentials to help actuaries expand into new

roles and markets. Potentially, credentials or certificates will be offered and as I mentioned before, we are exploring partnerships with other organizations for the development of skills and expansion of actuarial roles. There are core skills that all of us possess, but sometimes we forget that we have them. We are not using the risk management tools that are currently in the actuarial possession enough. Actuaries must be able to apply the skills holistically, not only to the liability side of the balance sheet but also to the asset side of the balance sheet, and to the company as a whole and to a broader spectrum of financial and risk management problems. So, tools that we currently possess are tools that are universal. They can be applied in any environment, and it's just a matter of being able to take those tools and take a step out of our current area of comfort and apply the tools to broader opportunities and broader problems.

Let's talk a little bit about the broader opportunities. Let's talk about industries where risk management is spreading and the factors affecting the spread. The factors that affect the spread of risk management are as follows: extent of regulation. How complex is the regulation in the particular industry? Company size. How complex is the company structure? Complexity of business. Spectrum of risks undertaken. Whether risk is a core competency of a company or a business. Whether you have to explain your risk profile to be understood. All of these factors contribute to a company being very, very complex on one hand and needing an expansive amount and level and detail of risk management. That can be done very well with simple accounting.

The industries that do feed into this profile are banking, insurance, asset management, energy-related sectors, telecommunications, government entities, transportation and health care, in no particular order. Those are the industries that have the greatest opportunities for actuaries. What are those opportunities, and what could they be? They could be chief risk officers or hold a similar leadership role in such organizations. Risk management on the market side, market risk management. They can be operational risk management positions. Insurance underwriting risk management. Of course we know that already. Asset/liability management. Investment. Long-range forecasting and strategic business decisions can be made by actuaries. Pricing real options, for example. Special event advisory.

Opportunities in the energy industry are already becoming available. This is something that is not very well known in the United States, and that is the opportunity that the energy industry provides for actuaries. Let's talk a little bit about this industry. They do exploring for oil and gas reserves. They do a lot of work, trading of oil on the international markets, marketing and retailing of petroleum products to consumers, supplying natural gas and power to wholesalers and consumers and providing energy.

All of these products and services have very complex embedded options and other derivatives present into this product. This is a very good opportunity for somebody like an actuary to come in and start offering services to this industry, but currently

it's happening very little, if not at all. I don't think anybody is doing this in the United States currently. Potential actuarial involvement in these areas are assessment and modeling of demographic changes and energy demands internationally, modeling and financial projections, supply status, setting and pricing financial arrangements, valuation of contingencies in various real options, and, of course, risk management.

My last example is also from an actuarial Web site from Australia. This was an advertisement for an actuary to work in energy consulting. An actuarial consulting service company is looking for an actuarial consultant for the energy industry, and they're saying our client is a leading actuarial consultancy practice specializing in advice on financial risk and management solutions across a range of industries. As a consultant in the energy and utilities practice, your role will include risk consulting, modeling, pricing analysis, valuation, including for complex derivative products, et cetera. The successful candidate may be a qualified actuary, but could also be a graduate in statistics, mathematics and economics. The opportunities are there, and it's up to us to take them, but they may not exist too much longer. This is the time to step up and to explore options and to see how you can provide the actuarial expertise and the actuarial knowledge to other areas.

MS. CATHERINE KONSKY: I'm going to do Phase I on the presentation of our research project. In the presidential speech at the 2002 Annual Meeting of the Society of Actuaries, W. James MacGinnitie, stated that the market research performed by the Society during the previous year (2001) indicated a perceived shortfall in two critical areas, communication skills and business acumen. The SOA surveys that Valentina just talked about underscored these issues. But the concern about communication for the Society is not new. It has been a thread in the Society for some years. In fact, in doing some research on this I found in a June 3, 1991 issue of *National Underwriter*, then-SOA chair Robert Shapiro wrote that actuaries were lacking in the ability to communicate clearly what they find and to present their findings in a way that business can use. That's a pretty heavy statement.

We know that anecdotal evidence is often used to support the claim that actuaries lack communication skills and business acumen. Stories are told by actuaries and by those who work with them, and you might have even told some of these stories yourselves, or you might have experienced some of the stories in the form of humor. You all know about those actuarial jokes, right? Well, there are jokes about the accountants and about the lawyers and about the doctors as well. What we wanted to do is to test this anecdotal evidence because if anecdotal evidence is a reflection of reality, that's all well and good, but we recognize that there's an inherent danger in accepting conventional wisdom as a valid research conclusion. In doing so, the actuarial profession could well direct its energies of the future to addressing problems that aren't really problems or even to addressing the wrong aspect of a problem.

In 1990 I had the honor of speaking at the SOA meeting in Orlando on just this topic, defining the problem. Our research is designed to test the anecdotal evidence, to investigate the perceived communication shortfall among actuaries. We're doing this in a systematic, scientific fashion through a series of focus groups and later through surveys addressed to actuaries and to their clients. The basic question is how do actuaries really perform when it comes to communication?

Our review of existing research on communication skills of actuaries yielded little systematic study of the topic. We found mainly bits of information that couldn't be pieced together into a coherent whole. One exception is a paper by Australian professionals—practicing actuary Karolina Duklan and senior lecturer in statistics, Michael Martin. I'm seeing this Australian thread running through Valentina's presentation as well. Duklan's and Martin's focus is primarily on technical writing and the use of graphics in communicating technical information. They contend that communication skills are very important for the work of actuaries and for the successful use of that work by clients. They call for attention to communication in the education of future actuaries.

This lack of extensive research on actuarial communication is not surprising given that the emphasis in the profession has been on mathematical modeling and the technical skills that are so fundamental to your success, but this is, indeed, changing. There is slowly mounting evidence that the future of actuaries will involve more attention to communication than it ever has before. This is stressed in the recent SOA report called "A Seat at the Table." It's also highlighted in the April 2004 newsletter of the Actuary of the Future Section.

The Society of Actuaries has already demonstrated concern for development of communication skills by mandating in SOA Course 7 both oral communication performance and the development of a written report. Increasingly, communication is being perceived as a key complement to technical skills. This led to our research question presented to Actuarial Education and Research Fund (AERF), and that is: What communication skills do actuaries need to develop and use in order to be more competent practicing professionals? We set out to gather data both from practicing actuaries and from their clients on the issues of how actuaries communicate in their jobs. Our research has three phases. The first phase is the focus group interviews. The second phase is a national online survey of actuaries and their clients. We hope you will be participating in this survey. The third phase is the recommendations for the education of actuarial students and recommendations for the ongoing development of practicing actuaries like yourselves.

We are reporting on Phase I of the research, that is, the focus groups, and I should highlight that we want to focus on the specific communication skills that actuaries need. You will find in a lot of the literature and research that has been done to date a statement like "Actuaries need to improve their communication skills." We want to get at: What are these skills specifically? If we don't, it's analogous to saying to

someone "You need to improve your driving by becoming a better driver." Well, we need to explain to that person what constitutes becoming a better driver, and we need to be able to explain to actuaries and the profession what are those component or composite skills that really make one a better communicator on a day-to-day basis?

Now let me share with you a little bit about why we started out with focus groups. How many of you have ever participated in a focus group? The overall purpose is to obtain information from an individual or set of individuals who have direct experience with the phenomenon. In this case, you go to people who actually communicate as actuaries or who communicate with actuaries. Who better to ask than the actuaries themselves and their clients? Communication research shows us that how we perceive our own communication is not necessarily how others perceive our communication. I should probably repeat that because that's a key point. How we perceive our own communication is not necessarily the way that others perceive our communication.

In the research on communication this was documented early on in research on subordinates and their supervisors in organizations. The researchers went out and asked the supervisors: How well do you think you communicate? The supervisors rated themselves. Then the researchers went to the subordinates, and they said: "How well do you think your supervisor communicates?" Guess what? There was a considerable gap in those perceptions, and that's something that is often difficult for us to internalize organizationally because we know what we mean to communicate. We go out with the purity of intentions and with the highest ethics, but we don't always accomplish our communication, and it's not always perceived the way that we intend it to be perceived.

We wanted to hear from actuaries and their clients firsthand and in-depth, and that's why focus group interviews are ideal as a precursor to the survey. I would like to say just a few words about the use of focus groups. This is a method that is enjoying and has enjoyed considerable popularity in the social sciences for quite some time because researchers have learned that focus groups help us to understand key ideas and issues. They enable us to get what is called rich data. Focus groups help us see how people interpret what they experience, and focus groups lead us to become better listeners as researchers. When we go into the focus group our goal is to listen.

Researchers who have written on focus groups tell us some of the key advantages. They say that participants are studied in a natural setting. We went to their business to talk to them about their experience. Unlike an experimental setting where there would be manipulation, focus groups have none of that. Focus groups allow the facilitator to go in the direction of the discussion. When a focus group interview begins, we start with some basic questions. The discussion can go in the direction of the participants. There is no set rigid framework. Also there is high face validity in the use of focus groups because the method is clear, and that helps

make the results more believable. People understand clearly that there's no deception in focus groups. We go in to listen and seek to understand. Also, focus groups allow us to talk to a fairly large number of people at one time at low cost, and we can get the results rather quickly.

To set up our focus groups, we identified insurance companies that were designed to represent the range of actuarial services provided in the industry. Most of the companies were in the Midwest. One was in the East. To our set of insurance companies, we added one actuarial consulting firm because we judged that their perspective might well be different. It was quite markedly different at times. To date, we have conducted focus groups in six organizations, but we've actually conducted seven focus group interviews because in one company we conducted separate focus groups with life/health, and property/casualty areas. For each focus group of actuaries, we also conducted a focus group of their internal clients. For the actuarial consulting firm we didn't interview any clients as their clients were external, and we made the decision in the focus groups to interview only internal clients.

Prior to the focus group interviews we surveyed the communication literature and constructed a set of questions to guide us in the interview. We wanted to stimulate discussion among the participants, but we wanted them to say anything that they wanted to say about the topic of communication. There were simply no delimiters for them. Our typical group size was about 12 people. We had to depend on the companies or the firm to select or invite the participants because we didn't have direct access to their employees. We did not have control over group size from company to company.

Typically we had from about eight to 15 people, but our judgment was that these people were willing to come to us to talk and share their perspective. We never wanted to turn anyone away. In one or the other instance the group might have gotten a little large for discussion, but we wanted to hear everyone's opinion. Also, because of schedules, those present in our groups were those available at the scheduled time. This is one way of saying that we didn't really have a random sample, nor did we expect to have a random sample of individuals. Yet, overall when we reflect on the groups we had a really good mix of experience. The companies helped us get brand new people, people with a lot of experience, and people in between. We had a good mix of age, from some of the very youngest people to some of the most senior people. We had a good mix of gender as is proportionate in the profession. We had a good mix of specialty in the companies as well.

The focus groups are designed to protect the anonymity of the individual. We really did not gather, nor did we want to gather any demographic data. In fact, a lot of times when focus groups are used they assign people a false name. We chose not to do that. We just pointed to people because giving someone a fictitious name seemed just a little bit more artificial than we wanted to be.

We wanted the people to know that we wanted to listen, and we asked them to envision that conversation as if we were sitting in someone's living room or someone's family room talking about their experience. We told them the purpose of the research. We told them that we were a part of a grant. We explained the method. We assured them that nothing they said in the room would go outside the room directly linked to them.

FROM THE FLOOR: I just want to clarify. Was each focus group from one company?

MS. KONSKY: Yes. Each focus group was from one company. We started out with the actuaries and basically said we want to know how much and what form of communication their job requires. We threw out face-to-face communication, e-mail, the telephone, and so on, and they simply shared with us what their experience was. Then we asked them what form of communication they prefer and why. What gets in the way of their communication? We asked them to explain to us how communication figured in their education, either in their actuarial education, per se, or in their more general education component or other business coursework in the university. We asked them about the role of informing others and persuading others. We wanted to get at how much of the job is really telling people things and sharing information and how much is trying to get people to see your perspective and to influence them and to persuade. Finally we asked them about the role of nonverbal communication. How did they see themselves as receivers of nonverbal communication? How well did they interpret nonverbal communication? What kind of nonverbal communication did they think they sent to other people? From this point we went into more general discussions and asked them to share some stories with us and so on.

After we finished with the actuaries and asking them what it means to communicate in their work life, we asked some questions of their clients. Their clients could be from all over the company, various roles. How much and what form of communication with actuaries does your job require? In other words, we wanted to know how much time these clients spend in communicating with you as actuaries. What form of communication with actuaries do clients prefer? Why do they prefer that particular form? We asked them, interestingly, how comfortable they are in communicating with actuaries. Krzysztof will tell you some of the things they said about that. We asked if their own education had a communication component. We also asked them how important persuasion is in dealing with actuaries and how effective these clients think they are in dealing with nonverbal cues.

The discussions of both the clients and the actuaries were marked by incredible candor. We were gratified by that. As might be expected, some actuaries and some clients were more talkative than others, although Krzysztof assures me from his vast experience with actuaries that our people really talked a lot in those focus groups. We tried to draw the participants into the discussion, but at the same time we never wanted anybody to feel that he or she was on the spot. We didn't want

people to feel uncomfortable. When we finished the discussions with a company's actuaries and their clients, we summarized our notes, and we analyzed them. We came up with seven focus group interviews of actuaries and six focus group interviews of their clients. Each of these interviews lasted a minimum of an hour, although we asked the companies to set aside an hour and a half to two hours for each interview. We wanted to be sure that we listened thoroughly and that no one ever felt rushed in the process.

We clearly made the decision upfront to keep all the actuaries together from company to company and all the clients together, separate, so that we would get a unity of perspectives and would have clients at one point and actuaries at a different point. Now what was interesting, at one of the companies this didn't quite work out perfectly, and Krzysztof remembers this clearly, I'm sure, because it was what we'll call a mixed group. At one point there developed what I will call a spirited repartee between an actuary and an internal client. We took a deep breath and figured this too shall pass. We'll get through this rather smoothly.

The point is it's not desirable to get into this kind of exchange in a focus group— it's not the purpose—because the emphasis shifted from the communication of that group to the actuary and the client sparring a little bit and each trying to defend his or her position. We clearly would not have wanted 13 groups of that kind of data. It would not have been very useful for us.

As a whole, the discussions produced a lot of useful information and perceptions, not only for the completion of the focus group phase but also as a springboard for the development of the online survey which, as I said earlier, will be sent to you as actuaries. You will also be receiving a client survey and be asked to forward that to one of your clients to encourage them to help us understand their perspective.

FROM THE FLOOR: Inaudible question.

MS. KONSKY: We didn't have any from the consulting firm. We did not include external clients. So in the groups we would have maybe someone from legal. We might have someone from HR.

MR. OSTASZEWSKI: Underwriting, marketing. It's not easy to get all clients of a consulting company together and get them into one focus group if they are all over the country. When we spoke about internal clients, we meant people who work with actuaries in such a way that they often communicate with the actuaries.

FROM THE FLOOR: You said that the companies chose the actuaries who were in the focus groups?

MR. OSTASZEWSKI: These were people who volunteered. We never really had too many people. We never went over, I think, a total of 15. So effectively these were people who volunteered to be in those groups. Our hypothesis is that there was a

bit more pressure on nonactuaries to be there. Actuaries are mostly volunteers. Actuaries who are there were people who were probably more interested in this than a typical actuary.

FROM THE FLOOR: There's probably a severe problem with self-selection. The actuaries who communicate well go to focus groups, and the actuaries who don't communicate well don't.

MR. OSTASZEWSKI: Actually there was one more self-selection because some of these companies had my former students. They tended to be volunteered for those, and to my astonishment they tended also to speak more than I have ever heard them before in my classes. That was very interesting. I enjoyed it because they showed their human side instead of their teenage side in a sense. When they dealt with me before they would just have simple sentence like these people I'm advising are giving me a hard time. Now they were saying, well, I'm dealing with this problem, and this happens, and suddenly it was very different. So, I enjoyed it very much.

Let's talk about some things that we saw in the patterns of answers. Now we are not done with everything, but what we have seen in those patterns of answers are things that we will further address in the survey and things that we are thinking about. The first one deals with e-mail. If you can do something by an e-mail, then why bother doing anything else? I find it very funny when people think that when they give me a call and leave me a message that will be the fastest way to get my attention. I don't have a wireless network that gives me my phone messages when I'm in the bathroom, but you can take your laptop anywhere, right?

FROM THE FLOOR: The focus of the focus groups was actuaries communicating with nonactuaries.

MR. OSTASZEWSKI: Yes, that was the key issue. How is the communication process between actuaries and clients of actuaries? That was probably the most important thing, although we asked some questions in general. So, for example, what forms of communication do you prefer? We got many, many more actuaries saying that they like communicating by e-mail or by exchanging files. It's probably not a surprise for you that they said when they talk to other actuaries the simplest thing is to just send them the worksheet and have them look at something, and they will understand what's going on. That wasn't necessarily what they said about communicating with others. That's true.

If I were to give percentages to these two modes of communication that they gave, then they would probably say 50/50 between electronic and face-to-face. My impression is that telephone conversations were very often treated as substitutes for face-to-face conversation where face-to-face communication was a better way of doing the same thing as a telephone if you have to do a telephone. Clients almost universally chose face-to-face conversation as the way to get things

communicated. We don't know exactly the preferences for e-mails among actuaries or how heavy this feels for the clients, but I know that there was one sentence that I've heard at several companies that I want to quote for you, and it is, "I asked him a question, and he sent me a spreadsheet."

FROM THE FLOOR: Was there any age bias? Were the actuaries younger than the clients? That could explain some of those differences.

MR. OSTASZEWSKI: We specifically asked the companies as much as possible to give us a variety of ages and variety of experience. We specifically asked to exclude actuaries who had less than one year of experience and to avoid people who were there for less than one year. There was a little bit of that bias. We also found from conversations with everybody that most people think that the more senior you get, the better you are at communicating as both actuaries and nonactuaries. I actually find fascinating the pattern of answers that actuaries and others very often name. They said the same things about themselves, and actuaries sometimes had a slightly lower perception of their skills than the people outside.

This is very unusual. Supposedly people think that they are better communicators than they really are. Actuaries are not like that. They're not unrealistically happy-go-lucky about their communication. They know that they're not perfect. They understand that they like e-mails and others don't. They know that they like spreadsheets and others don't. They just don't necessarily know exactly what to do about it, but it's not that they are blind to this problem. From what I've seen, they are not just going on without paying attention to anything.

I already mentioned this spreadsheet thing. It's not really appreciated by clients when you try to explain the whole model for them. Now, that is a bit of a problem because sometimes it's only through the whole model that you can explain why things are complicated. One thing that is valued almost infinitely, it seems, is that if you can express a mathematical model in commonsense language, even if grossly oversimplified, but it catches what is going on there, they will love it. They will remember it. They will use it in their future decisions. They will think that you're the greatest actuary because you could do this. So, the clients value explanations that they can understand and don't value the models because they don't understand them. They are not actuaries. They are in the jobs they have for a reason. Not everybody has the mathematical skills we have, and, therefore, translating to nonmathematical language is valued very, very highly.

Clients know that actuaries' work is complicated. They almost want actuaries to deal with the complications alone and then just bring something that they can live with. All the complications, that's the actuary's job. But then when it comes to the business aspects and explaining this role, then you're supposed to not just have a model but also something that let's them see the whole picture. That's not easy. It's probably a very hard thing to present some mathematical models in nonmathematical terms. They don't want to deal with the complications, although

they appreciate them. It's not this way, that they don't know this is complicated. Maybe if we dealt with clients who were very far removed from the work of actuaries, maybe this could change. I'm not certain of this because the people who hire actuaries generally hire us for a reason. They know that this is complicated.

Physical environment and location of actuaries may affect communication preferences. If people can talk face-to-face, then communication tends to be better. I remember when I worked at an insurance company our person in charge of asset/liability management said that ever since they moved the investment division and the actuaries to the same floor, suddenly the asset/liability management got better because they talked to each other. There is something to be said for that, that if the setup of your physical surroundings makes it easier to communicate, people respond. It's also the case for communication with clients' coworkers but also with other actuaries.

Actuaries also liked it when they could talk to other actuaries in the same company when they were on the same floor. One of the companies we talked to actually made that change while we were discussing things with them. They moved all of their actuaries, life and nonlife and everybody else, to the same building. They seem to be happy about it. Some actuaries emphasize the importance of adapting their mode of communication to a situation, and it tends to be that those are people who have more experience. This different way of expressing yourself, different mode of communication even is something that people seem to acquire with experience and appreciate more.

When actuaries prepare and deliver their modeling solutions they have very different audiences, and over time this becomes an important thing on their minds, that the solution will be presented to specific public which could be clients, businesses, regulators or managers. That matters quite a lot in what their final product is, although it seems that that's something that is a pretty big challenge for people who just start out. They don't always understand those different contexts in which they will be making presentations, and maybe we should be more aware of that.

Everybody agrees that they do a lot of communication on their jobs. This is not a small part of work. This is a major part of work. More experienced actuaries are universally perceived as better at communication. Both clients and actuaries tend to agree that actuaries are not that great at communication and especially at nonverbal communication. Actuaries are pretty good at understanding words and terms and understanding things, but it's the nonverbal parts that everybody says they're weak at, and, again, this is something very typical in what we've seen in the other survey as well. Actuaries do not have this grand picture of themselves as being perfect. They agree with others about their shortcomings, which reminds me of my favorite comment about actuaries and MBAs because MBA is one of the titles that actuaries should be getting to improve their skills. There is an actual conflict in the process for actuaries getting an MBA, and that's that they are somewhat

opposites of each other. The saying is that an MBA is often wrong, but seldom in doubt. MBAs are said to be bold when making the decisions. Actuaries are exactly the opposite most of the time. They're really often in doubt, but are very seldom wrong. There's something to be said for being careful with just about everything, not just the models but also in how we are perceived by other people.

One theme that we also found as very universal is that both actuaries and clients say that things get really much better once they develop a relationship with the person they work with, such as the regulator, once they learn about each other's ways of doing things. Therefore, that seems to be something to remember, that if in some way your client or the regulator knows who you are and how you work, and if you make it easier for them to learn, maybe the communication process will improve.

If you make an effort to understand who they are, what their constraints are, that will improve the effort. When we had those two slight conflicts within the focus group, one of them was a former actuary who gave up on taking exams and was now on the other side. That person in the discussion of the clients of actuaries suddenly became somewhat angry saying, well, you just don't understand what constraints these actuaries have. They have to do this. They have to do that. They have to calculate this. If both sides know each other's culture very well and understand what constraints they work under, then it will get better. Interestingly, we also had a statistician who sat with the actuaries, and we had the actuaries telling the statisticians what the constraints are. So, the actuaries probably feel more often that the others don't understand how complicated things can get or what the constraints are, what the problems are. By the way, one of the common complaints of actuaries about others was that one of the difficulties they encounter at work is that others try to be amateur actuaries. That's not easy to deal with.

Let's remember this is really universal, it seems, in most of the focus group, that clients and coworkers value this relationship with actuaries even more than actuaries. It is quite a discovery for them when they find out that actuaries are human, and it stays with them. They remember this, that these are actually human beings. The organizational culture affects communication if it is really perceived by everybody, and that the organization, the company, values communication. It tends to stick with people. If it's just lip service, but everybody does their own thing, people seem to feel it. If the message is very clear that communication matters, people will pay attention.

In one of the focus groups in a consulting setting one of the consultants made this very interesting point, and it really shows up in the answers elsewhere but not as clearly, that we have three parts to success when we do our work and present it. They are the technical part or the modeling part, communication and speed of getting the work done. Maybe that's a very 'consulting' perspective, but still it's worth noting. Nobody effectively complains about actuaries doing bad technical work. I guess ethical standards would also be there, but there's no worry about

actuaries. We all watched this movie about the only actuary who went to jail, when we get our fellowship.

Nobody complains about ethical standards of actuaries effectively. Nobody complains about actuaries doing bad technical work, and to a degree we are victims of our own success. We're almost like the parents, and our clients are like teenagers. There are a lot of things that we do that they take for granted.

We do good models, and they think that's just natural. That's what we're supposed to do. Actuaries are valued for our skills, knowledge and modeling ability. When we deal with clients we distinguish ourselves not by that but by speed and communication, and probably communication more, unless there are severe time constraints. There's probably less dispersion among us in speed than in communication. If you really, really distinguish yourself, it's almost always through communication, that is, if you distinguish yourself among other people, those other people outside.

When we discussed education in the history of how people got educated, almost universally actuaries had no communication component, or very little of it, in their formal education. Most of the people said the only communication component they had since college was one basic communication class. If they had their fellowship under the year 2000 system, Course 7, sometimes at several colleges there are classes that do some business communication. However, communication in actuarial setting, that's a very rare thing. At Illinois State University, we have two classes where students learn actuarial technical things, and then they have to make presentations of that data.

While those educational experiences in communication are not common, they are perceived by most people as very valuable. For example, almost everybody said that if you were once a teacher, that makes you a better actuary. Very interesting. We do have a lot of former teachers who become actuaries. This is not an unusual experience. Almost universally clients of actuaries had a significantly larger communication component in their education. This was in their minds important when they were in college. Almost universally clients of actuaries perceive those actuaries who communicate best to be the best actuaries. They think that these are the smartest actuaries in the whole company, obviously. That's something that we may need to remember when we talk with other people.

We have an unusual profession in which passing the exams is very important, and that's how you enter the career. This is the core education. This is what candidates for the profession think about. They have to pass the exams. You have no other way to enter the profession. In the context of this we should think about the proper place in actuarial development for communication, business acumen and management. We also should ask ourselves what is the proper place of an actuary in a firm? Is it a technical person or as a key member of the management team? I am strongly in the camp of believing that we are naturally destined to be managers

in whatever enterprises that we work with. We are just managers who have two additional skills that other people don't have.

We are typically the best educated mathematically of all the people that deal with the risks that we model. If you have any doubts about it, I want you to look at the business schools' curriculum around the country, and you will be reassured about your education. Please do it at the best business schools. Please compare what you've learned and what they learn, and, rest assured, that's one of the sources of differences between you and the MBAs.

We do have this second of skills that is very unique for managers, and that's the fact that we typically are perceived, and we perceive ourselves, and we probably are, people with higher ethical standards, not because we are just such great people, but we are set up institutionally to really be careful about things that we do, and that we do know much more about mathematical models that we use. In this context, I think that we are better managers for a lot of situations where the fiduciary duty to the clients, to the world, is very, very high. We are very good for that kind of setting, and we should probably stress it more. I believe that we are naturally managers in certain situations, not just technical people. So that's a comment about our general education system that we probably should think more about educating ourselves as managers, not just technical people.

There are some limitations about what we did on data from focus groups, although probably I have to explain this very little to you because you already know that because you're actuaries. You know selection bias and data has some effect. We didn't do this all over the country. We had only companies that wanted to participate, and the number wasn't very large. We cannot go forever with the focus groups. They have a time limit. The people who were there were volunteers. There was a selection bias, and probably they were more interested in this or they had better skills than what we wanted to talk about.

Now, in the next stage of this project we will have an online survey. There will be an Illinois State University server that must first be approved by Actuarial Education and Research Fund, and then we'll post it. It will be addressed to both actuaries and clients of actuaries. We'll analyze the data. I'm probably most interested in this analysis in correlations. If you have younger people, are they better communicators? Older people? We'll try to collect the data where we can catch some correlations like this and then combine the results. We hope to present at the SOA and Casualty Actuarial Society (CAS) meetings and in a paper that we will try to submit to *North American Actuarial Journal*.

FROM THE FLOOR: You looked at a variety of companies. I assume there was a range of how they perceived the actuaries. Did you do anything as far as going back to the ones where they perceived the communication much better or compared that and see if there were any institutional differences or perhaps just

particular actuaries? Was there not much variance in the different companies that you looked at?

MR. OSTASZEWSKI: There was a bit of a variance because in some companies everybody was telling us that this is now their emphasis. That's why we think that it makes a difference, because that's why they were happier about communication. If a company didn't think that this was a big deal, then we generally received answers that indicated that people are somewhat less happy about communication.

FROM THE FLOOR: At the companies that had that as their emphasis, did you look at the specific organization structures?

MR. OSTASZEWSKI: No, we didn't study the structure in the companies of what they did exactly. That's probably something that we may put in the survey, but that's probably yet another study. No, we don't know all the organizational structures. We noticed some. People are closer to each other, and they have classes on communication. They have internal training on communication. Those things do show up.

FROM THE FLOOR: What was the gender distribution of the actuary and the client focus groups?

MR. OSTASZEWSKI: It was probably more women in the clients of actuaries, but I don't remember the exact number. The difference was not that significant. I think we had only one company where it was significantly more men among actuaries. Otherwise, it was not that significant.

FROM THE FLOOR: One thing that struck me is that, as actuaries, we're scientists, as applied to business. I mean most of us have had more scientific background. I think one of the things that makes a lot of our peers uncomfortable is it's a more business-oriented group of people. We just don't naturally kind of fit there. My nonverbal skills are great.

FROM THE FLOOR: One of the things that we've done in our company to get the actuaries to work on their communication skills is that our chief actuary made an agreement with the president of the company that when he did his quarterly meetings some of the actuaries could go along and talk about what they do in terms of pricing, reserving, and, like you said, have a more simplified discussion of it. We have some people that are very good at speaking and all. Get the actuaries out. Let people see them and get to know them. It really works well.

MR. OSTASZEWSKI: It does tend to be this way. If an actuary does a good job presenting something, then in minds of a lot of people that's a good actuary. What else do they attribute to actuaries in the company? Not the profits. The company didn't go bankrupt. When the actuaries explain their work, they're good actuaries.