

REDESIGNING THE BASIC EDUCATION SYSTEM

Leaders: ROBERT L. BROWN
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As the actuarial profession heads into the future, it faces new challenges and opportunities—within traditional areas of employment and in new and emerging areas as well. Anticipating such developments, the SOA's Board of Governors named a task force to determine how, within the context of basic education, the SOA should respond to the challenges of the changing professional environment. The recommendations of the Board Task Force on Education focus on the underlying principles that should govern the SOA's basic education program. The recommendations of the Task Force were approved by the SOA Board in January 1995—with communication and design efforts now underway.

This session is intended to provide you with information on the redesign effort, and particularly the governing principles that will guide the design process. Equally important, the session also offers an opportunity to provide your input and ideas to the Task Force and the design team. It is critical that the SOA's basic education system be the best possible, and we want your help in attaining the goal.

MR. CECIL D. BYKERK: I'm currently Vice President of the Board of Governors with responsibility for the Education and Examination (E&E) part of governance. With me is Rob Brown who is a Board of Governors member. Rob has been very active in the Board Task Force on Education that I chaired.

We'll try to get through our material as quickly as we can so that we leave the program open for questions because that's really what we're interested in doing here. We're interested in a two-way dialogue. We have spent a great deal of time working on this, but we want our membership to hear, understand, and give us their thoughts and input as we try to go forward.

As I said, I'm Chairperson of the Board Task Force on Education. I just want to mention who else has been involved in this effort on the Task Force. Besides Rob Brown, who represents academia, as well as the Board and Canadian interests, we had Neville Henderson who was a long time E&E person and, also, Canadian on the original task force. Bob Shapiro has been very involved with the future of the actuary, but not per se too involved with the E&E process. He has been a Board member a couple of times over the last few years. Godfrey Perrott, who is from Boston and is also an ex-E&E Steering Committee person, was very involved. Roy Goldman was the current E&E Steering Committee Chairperson at the time that we started into this effort; he was also on the Task Force. And, of course, Marta Holmberg is the Society staff person for E&E. She's not here, but I will tell you that without her, much of this wouldn't have been done. More recently, Linda Delgadillo has been very helpful in helping us communicate this to all of you, and communication, I think, makes up probably more than 50% of all of the things we're trying to do here. So that was the original Board Task Force on Education.

More recently we've changed somewhat. We've reconstituted that committee, and we've created a Design Team that Jeff Beckley is heading up. Jeff then has now come on as a Board Task Force member. Jeff, I might add, was going to be the incoming E&E Steering

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Committee Chairperson. He has given up that opportunity to move over and head up this Design Team looking at the syllabus and trying to design a new syllabus. While Jeff has been added, Roy Goldman is moving over to be a significant contributor on the Review Team, which will be the group of individuals whom we will be asking to step back and look at what we've designed and give us their critical input. We just about have the Design Team ready to go. Their first meeting is scheduled July 5 or 6, 1995. So we're moving ahead, but we are still actively seeking your comments, questions, and so on. I'll talk about the charge that was given to the Task Force by the Board of Governors in January 1995.

We were asked to define and articulate distinctive competencies actuaries must have for the future; determine how to educate, examine, and provide programs for members and prospective members to develop and demonstrate these competencies; and the implications essential in determining changes needed in the basic and continuing education. I might add that as we've gone through this and spent probably about 16 months working on the report, everybody pretty much agrees with the ultimate conclusions that we have reached. They don't always agree with the paths that we've taken to get there. They've not always agreed with why are we doing this. But when we get done and we say these are the things we think we need to do, almost everyone agrees. So I guess what I'm saying is some of these things really trigger certain people; other things trigger other people.

One of them is that the business and professional environment is changing. Risk and uncertainty are increasingly important factors and managing financial uncertainty is critical. So how can the actuarial profession maintain and enhance (and I emphasize maintain and enhance)? We're not saying that we have a bunch of deficient actuaries out there. We're trying to say what do we need to be in the future; what do we need to add to our education process; what do we need to add to our own set of credentials in the future, so as to maintain and enhance the profession's role in the future and pave the way for actuaries to take on new opportunities? So an essential element is to provide actuaries with the necessary tools to be effective in that changing environment. That's what this is all about.

Now how do we do that? Focus the basic education system on developing the distinctive competencies. In other words, that would be the essential knowledge and capabilities that actuaries can bring to the table. Then, enhance the perception of actuaries as adding value.

Now for a moment I'll go over what the Task Force has come up with as a list of required knowledge and capabilities. Required knowledge we feel is math and logic, economic security programs, business content of economic security programs, investment finance vehicles, asset and liability management, and standards of practice. Now each of you might add a few things to that list that are particularly focused to you, but this is a fairly lengthy list already.

Now as far as capabilities go, I won't read all of these. We think that these capabilities are some of the things that set actuaries apart from economists, MBAs, and accountants. This is besides the fact that accountants have personalities, you know, and we don't, (at least they claim that). But, at any rate, these are more substantive things that we do have in total, not in each individual one, but in total that help make us what we are. Now I'm going to turn it over to Rob, and we're just going to slide back and forth here with our

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presentation. Rob's going to talk about what has happened in the recent past and how things are consistent with that past.

MR. ROBERT L. BROWN: It was kind of interesting within the Task Force. We argued back and forth about whether this document would be received and viewed as revolutionary or evolutionary. So we decided to check the history. If you read the April 1995 copy of *The Actuary*, Roy Goldman pulled together a really extensive and interesting history of the development of the system. Let me just quote a report from 1905 by Arthur Hunter. The 1905 report called for broad training of actuaries so that they could be useful in non-actuarial jobs and noninsurance industries. So we're following right along from the 1905 report. More fundamental and consequential is that we are, in fact, consistent with very recent work of the Task Force of the Actuary of the Future.

If we look at future examination methods (FEM), and the future education initiatives (FEI), we can see that what we're looking for is both an enhanced core, so that we can be better at doing work for our present employers, but also skill sets that will allow us broader capabilities. Third, we want to build a better, attractive process so that people know earlier and faster exactly what it is that actuaries do and exactly what they need in terms of their own personal attributes to choose the actuarial profession and to invest the time necessary to train to be fully qualified.

The Actuary of the Future Report in 1991 said that we needed to work to get more actuaries in nontraditional roles, a revolutionary idea that had first been stated in 1905. To do this, of course, it was a two-sided coin. Not only did we have to assist actuaries in getting the skill set necessary to go into nontraditional roles, but we also had to go out and educate (in some sense) the nontraditional employers to let them know that we could add value to their processes. The recommendations of that report were that we expand the actuarial skill set so that we would have enhanced capabilities for traditional employers. We would look for new roles with nontraditional employers, and we would work closely with universities and other centers to educate the actuary in the most efficient way possible.

We then did some work in terms of what we would want to be seen and what we were seeing. We want to be perceived as being the professionals who assess and manage strategic and financial implications of risk. We spent some time working on this definition and goal. In our mind, we are not today seen as a unique profession that satisfies those needs in the marketplace. Not every person who wants financial and strategic planning and analysis and implications of risk automatically thinks "actuary." So that was our first thing: that it did not coincide with reality. But then we immediately could see that this definition was not limited to life contingencies and it was not limited to our traditional employment base in insurance and employee benefit programs.

So what would we like then? What is our expected role for actuaries in the future, and what sort of person are we trying to mold and educate? We believe that the majority of actuaries in the next generation will not be in roles that we would consider traditional today. We believe that conceptual issues and conceptualization will be of growing importance. And we believe that our ability to be value added to the process goes hand-in-hand with our ability to do financial modeling, that is what we do and that is where we are unique, and this can be applied in all businesses, not just the traditional businesses.

Now we're not talking about a future that's 50 years away. We believe that the future that has just been defined is probably tomorrow and might even be here already. So we don't think we can wait around and change gears slowly. We believe we have to act now and we have to act decisively so that the very next generation of actuaries is prepared for these realities.

MR. BYKERK: So at this point we would like to say: what have we done so far in this process (other than the fact that I've told you we've had meetings over the last 16 months), what has happened, and where are we going? The Board of Governors has directed a change in the goals of the basic education or the E&E system and this direction, this motion to do this was adopted back in January 1995 by the Board of Governors. Now you'll see that we have adopted some very high-level principles, and now we're trying to fill in underneath that. I want to go off on the side just a bit. All of you probably (or many of you) remember that we've gone through this as Rob has mentioned a few times in the past history, going way back to the turn of the century. The last time we had some major changes there was some controversy that was created, and I think that controversy was in part created because we didn't communicate very well. We didn't explain to people. We didn't get as much input and so forth. We're taking a very different approach this time. We're asking what are the real top level principles that we want to have? What are we trying to achieve? Then from that, we build downward and part of that building process is communicating with all of you, getting your input, your feedback, and your thoughts. And although not every single person in this room can participate in the committee work and so forth, we're also looking for the input and the work effort of those who are interested in being involved.

The Board decided three things. The first one was to focus the syllabus to encompass the following four principles. One, let's examine only those subjects that cover essential elements of an actuary's education. There's always competing interest in adding things to the syllabus and we add, we add, we add. Once in a while we take something off and we add and add and those of you who are currently taking exams probably feel like we keep adding. So there is competing interest. Is it necessary to have all of the subjects on there? Is it critical to being an actuary or to hang that title at the end of your name? Do you need it? Those things are the things that we need to cover.

And I might also deviate for a second and talk about E&E. Education is the key here. Examination is the part that helps us make sure that people have obtained that education, but education is really the key here. This one says examine only those subjects that are essential. So we might say we provide, or we encourage, or we recommend various subjects. We don't necessarily examine them even though they may be important, but we do say we're going to examine those subjects that are essential elements of the actuary's education.

Now back to the syllabus principles. Second, we're going to provide a business context. Now this one has created quite a bit of discussion. People said, well, gee, you're just making us glorified MBAs. What we're saying here is we've always had math rigor. We've always required enough exams, enough material to provide rigor with the mathematical education, and we think that we need to add a business context with consistent rigor with the math education. The third thing is to include all kinds of

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contingencies, not just life contingencies. And fourth is to include models which are outside the pension and the insurance field, which is what we tend to get mired into.

Second of the three main points the Board decided to do was to restructure the actuarial education into four categories: preliminary, basic, advanced, and professional development. Now we're going to spend more time. In fact, Rob's going to do that, talking about and defining what these things are. So let me go onto the third element, which is to obtain each category of education from the best available source, and some things might come to mind. More things might come to mind as we get into Rob's presentation here on our prototype.

I hope all of you received a little handout and had some time to look at it. In that was a placeholder design and that's what Rob's going to go through. Now before we go through that, I want to talk about what this is and what it isn't. One of the problems that we had as a committee internally and, also, with communicating this to other people was in explaining what we were talking about, and what it means. Tell us what subjects you're going to take off and what subjects you're going to put on the syllabus. We have really tried very hard and once in a while we have to reach over and pull each other's ear and rap somebody in the face to not do that. We're really trying to start out with a zero-based kind of budget concept. We're really trying not to just tweak the old system, although I think all of us know that when we get done, we'll end up comparing it to the old system for no other reason but that we have to transition from the old system to the new system. There will always be a comparison, but we want to stay away from that as long as we can and build what's correct, not just what we've done in the past. But in order to communicate, to get this out on a plane so people can begin to understand what we're talking about, we finally (somewhat reluctantly) developed what we called the placeholder design. This is not a proposed syllabus. It's short of that. It is an example of what the new design might look like. So remember that as Rob goes through this. This is not written in stone and it's not etched in granite. It is just a placeholder design, and we chose the word *placeholder* very carefully. I'll let Rob go through that.

MR. BROWN: What we're going to do here is give you an indication that, if you take the general principles brought forth by the Task Force, and now agreed to by the Board, how would those principles constrain you in developing the design of the new syllabus. This indication then will tell you about who will supply the particular category, who will do the testing if there is going to be any testing, the approximate percentage contained in that category, and once in a while we'll try to give you some examples of topics that might be in the category. Remember then four categories: preliminary, basic, advanced, and professional development.

Let's start with preliminary material which is absolutely needed to build the skill set of the actuary, but it is not an explicit actuarial science requirement. So if we start at the bottom, calculus and statistics would be considered preliminary. You have to know calculus and statistics to do contingencies, and risk theory, and loss distributions, but it's not the calculus and statistics that the SOA needs to go out and provide you with the syllabus on or do the testing around. So we believe that some of the subjects that are now early in the syllabus will be deemed to be preliminary. The suppliers in the future of the preliminary education will be colleges and universities. You'll get your basic education the way the vast majority of you here did. If it's deemed to be preliminary, we do not see the need for

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the Society to test that material. We will have lots of tests of mathematics later on. We believe about 15% of the effort will end up being deemed to be preliminary.

I'd like to take one second and talk about the Actuarial Aptitude exam. We want to have a new Actuarial Aptitude exam that will tell the students immediately what it is that an actuary does and what skill sets in mathematics are needed, but with applications in a business context, that you have to want to pursue the actuarial career. So there will be this new Actuarial Aptitude exam different from anything we have today, which, we hope will define for that entry level student what it is an actuary does. And it would be clearly an undergraduate level exam, so you would be trying it while you're in college.

We then move to basic. Basic material is critical. It's core and it's essential. Included in basic material would clearly be modeling and probably more modeling than what you're seeing today, because we believe this is where we bring our unique value added to the process. There would be contingencies, but notice—contingencies, not just life contingencies. There would be risk theory, investment mathematics. The supplier here would be pretty much the way it is today. We would have the correspondence material and seminars that the SOA and the CAS would provide. We would clearly test this material probably in pretty much the same way we do today. We believe that this material will constitute about 50% of the effort that it takes to become a Fellow.

Then we move to advanced material. We haven't decided or laid any ground rules down for the design team about whether there will be specialties or not. We've discussed advancing within a specialty. This does not mean to imply that, if you choose a pension track, that you have to stay in that track. We're not sure how this is going to work yet. It may be more of a college catalog approach where you have to amass so many advanced credits, but not necessarily be stuck in a track. This has not been designed. This is still to come and it's part of the feedback that we would like from you. Examples of the advanced level would be costing and pricing valuation of assets and liabilities. This material would not be nation specific and would not be time specific. We are hoping to carve out the Omnibus Tax Bill of whatever year it was or details about what orphans of widows of Old-Age, Survivors, and Disability Insurance (OASDI) get if they're under age 19 and attending school full-time. We hope that will no longer exist in the advanced material. This material is meant to be universal in time and geography. The supplier of this, again, would be pretty much the way it is today. It would be a correspondence and seminar type of process sponsored by the SOA and the CAS. It would be tested again initially pretty much the way it is today by the SOA and the CAS. We believe this would constitute about 25% of the effort that it takes to become a fully qualified actuary.

The fourth level has been called professional development. Again, we're looking at what is required in the education of the next generation of actuaries. There's a related issue in terms of, will there be continuing professional development for fully qualified FSAs? That's not our bailiwick. It's interesting to talk about, but it's not our bailiwick. We want to move material that is nation specific, regulatory driven, and time specific into this fourth category called professional development. We believe that at this stage we would now see different cosponsors: the AAA, the Joint Board, CIA, and the actuaries of Taiwan would now come into the process and say, here's how we want to finish off the education of our actuary. You will notice here that we believe that there will be a requirement for some minimum level of professional development content before you achieve your Fellowship

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designation. The supplier then could be very wide. Again, the CIA might supply Canadians with this part of their education. It could be going to meetings. It could be going to seminars. It could be attending programs at business schools. We do not believe that we will just test the way we test the basic and advanced. Many of these things would be obtained through attendance and self-certification. We may also find that there will be an experience requirement. There already is within the CIA and the AAA. We look at this as approximately 10% of the total effort toward Fellowship.

Finally, of course, we will have a continuation of the Fellowship Admissions Course (FAC), ethics, and professionalism. It would be nice to see ethics appear in that very first Actuarial Aptitude exam and follow us all the way through the syllabus.

MR. BYKERK: So now you have a taste of the principles and a placeholder design of what *something like this might look like*. I was going to talk about where the process is going, and how it's structured from here.

We have oversight and management of the process. There's the Board of Governors, of course, as your representatives, and I think it's important to recognize that we do operate as a representative organization. We elect the Board members, and they have the time and take the time to delve into these matters. On most of the decisions that have been made with respect to this effort, we have had either unanimous or nearly unanimous agreement by the Board of Governors. For those of you who have been around the Board of Governors, you know how unusual that is. It doesn't say that we haven't discussed it at great length, we have, but it's been nearly unanimous. So they will continue to review and approve the major policy issues. A special Board Task Force, which is the sort of reconstituted Board Task Force on Education, will oversee the design directly and its implementation. As Chairperson of that Task Force, (my term as Vice President ends in October 1995), I will continue on as the Chairperson of this Board level Task Force and report directly to the Board those issues that we feel are key policy issues. We'll get them to the Board (and the executive committee) as quickly as we can.

The design team, which I mentioned before, is being headed up by Jeff Beckley, who has had a lot of background in the E&E system, and the team is just getting fired up and ready to go. The team members are actually the group of individuals who will design the new education system following the principles that we've articulated. Again, that effort will still be looking at and wanting feedback from all of you. We've made an effort to get a broad-based representation on that design team. We have people from all segments: U.S., Canadian, pension, health, and life.

We'll also have this review committee that we hope can grab some senior actuaries perhaps who don't have quite the time to spend to actually be on the design team, but certainly are in a good position or have the time to review and react to what's going on. One of the things we're trying to do with the review committee is to utilize some nontraditional actuaries, some people who are already out there doing some of the things that we say we want to encourage our members to do and educate so that they can do some of these new kinds of jobs.

From a timetable point of view, there will be a communication that we're putting together. It will say some of the same things that you have had the opportunity to hear here, as well

as some other thoughts and discussion about why we feel we need to do this. That should be mailed sometime mid to late July 1995.

In October 1995 we have to give to the Board of Governors at the Board meeting in Boston a first draft of the syllabus, and an Associate of the Society of Actuaries (ASA) definition. All of you know that the ASA definition was recently changed, and the Board has asked us to give some consideration as to how the ASA should be defined in this new structure. The first draft is: who might be the educational providers besides ourselves, and, of course, what are the financial considerations. You know there's a lot of concern that, if we categorize some of these previous exams or the material that is on these early exams as preliminary, that means we won't be testing it and how does that impact the finances of the Society. Then we need a transition plan, and obviously, it's very difficult to design a transition plan if you don't know where you're going. So that one may trail behind, but that is something that we continue to work on.

The new FSA designation is at least on a par with the value of the current FSA. I might add here some people have expressed a concern saying, "You developed this whole new system. Are we going to start to see asterisks in the Yearbook that say 'took premodern exams' or something?" No, we're not going to do that because we think that today's FSAs are in a constant learning and relearning process. They're building their skills now. What we're trying to do is to better build some of those skills so it isn't quite so difficult to do it all yourself. And, finally, we want to maintain a long-term perspective. We do not want to get caught up in too short-term a perspective. Those are the equity principles and we may add some more, but that sort of wraps up our formal presentation.

MR. ETHAN E. KRA: I'd like to commend you for some excellent work in developing an educational outline that will deal with the 21st century. However, I do have some significant concerns on how we're going to test the examination part of the E&E. I fully support the education. The examination's my concern. Right now parts one and two whether they should be one part, two parts, or however many there are, do serve a very important purpose, of what I would call the weeding out function. We weed out people who really don't have what it takes to continue on in the exams at a very early stage with very little pain to the employers of actuaries, because we use them almost as hiring tools. If you can't get through part one or parts one and two, don't send in the application. By not having those earlier exams we may have a much lower caliber exam taker, and that may either have the result of more people getting through the system who shouldn't, or much lower pass ratios, which can be disheartening to people. Let's be up-front and say here's what it takes to get through. Perhaps it might take an exam that says, well, here's an exam, whether you want to take it or not that's your business, but if you don't pass it, don't think you're going to have a good shot at getting through the rest. However you structure it, I think you do have some need for an early exam that's going to do that weeding-out process. That's at the front end.

At the back end, I have another concern on the fourth tier of the educational process which could be seminars, and I saw one version that said it might be 21-day seminars, whatever the structure is. The education is fine, it's the lack of examination that gives me cause for concern. I think that anybody who has run programs, whether they're programs such as this multiday meeting or a one-day seminar, knows that, when you get the evaluations back or when you attend the sessions yourselves, some of those sessions are excellent and some,

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frankly, weren't even worth sleeping through. Yet any of those sessions will have full credit because you've vegetated through a day's seminar. There's no way of testing whether there was actually good information imparted and whether that information was actually assimilated. The examination, I think, is critical. You may use the seminar as the means of educating, but I believe you still need some type of examination. I would go one step further to say that perhaps that fourth tier should be examination—examinations that credential an individual for a particular aspect of being an actuary, while the continuing education might be for people who want to move through different parts of the actuarial profession. Perhaps there is a need to recertify in another aspect of actuarial science. That's very different from what we have today. Today once an individual becomes a Fellow, he or she can do anything. FSAs can just go attend a few seminars so that they can put the continuing education on their resumé, but there's no certification. We see the very poor quality work being done by some of our colleagues. Perhaps there is a need for continuing recertification, not in one's own field that one continues to practice in, but in those fields that one wants to branch out to in their career. It may be radical and it may be controversial, but let me throw it out on the table.

MR. BYKERK: I'd like to address that issue and then I'll turn it over to Rob for his thoughts as well. With respect to the early exams I understand what you're saying. I understand your concern. It's been expressed by a number of people. We talked about an Actuarial Aptitude exam, that, in fact, does those things: it challenges the student and puts that threshold up there that says, if you can't do this, you shouldn't go any further. But one of the ways I think parts one and two or Course 100 and 110 are deficient is that, we use it as a hurdle, we use it as a clearing device, and we use it as a hiring device, but what does it tell you? It tells you whether you can do calculus, and probability, and statistics. It doesn't tell you anything about being an actuary. It leads people into the profession thinking that it is a calculus, and probability and statistics profession, and yet it is so much broader than that. I understand the concerns. We all understand those concerns, and we have to develop something in response to that and so we will try to do that.

With respect to the later exams we, as a Task Force, discussed whether it should be required to have exams, or not exams, or is there something in between. Could there be proof of attendance, or however that's done? I think it remains to be seen exactly how we will roll that all out. Perhaps category four is temporal information (for example, we test you on the 1959 Federal Income Tax law of the U.S. today and five years from now it may not be relevant). I would say that depending on what gets put on the professional development category, it already, to some extent, is a self-policing system. For those of you who are members of the Academy, in order to sign a statement or do some other things, you have to say I'm up to speed in certain areas but no police come in to make sure you have that document written out. Rob, do you want to add something to this?

MR. BROWN: I just wonder if there's a new Fellow or a nearly new Fellow in the room. Let's just take a couple of hands. How many separate exams did you write or will have written to get Fellowship?

FROM THE FLOOR: Oh, 25–30.

MR. BROWN: Anyone else?

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FROM THE FLOOR: I wrote 23.

MR. BROWN: Another example?.

FROM THE FLOOR: Twenty-five.

MR. BROWN: Twenty-five. I think 17 might be enough, you know. What does it prove to write 25 exams that we can't find out in 17?

If I were an employer, I would rather have an entry-level student come to me having passed a recruiting Actuarial Aptitude exam that has mathematical rigor and has taken the math that's required to become an actuary. I would rather see someone show him or her some real actuarial type problems upon the entry level compared with knowledge of calculus, probability, and statistics.

MS. REJEAN BOIVIN: I must agree with you on the type of people that we're currently attracting in this field. I agree with you that with the first two exams I'm not sure we're attracting necessarily the people we want in this profession. The point I'm trying to make is that I think that when I look around right now, of people who become Fellows, most of them become managers and they're not good managers. They're good mathematicians; they're very technical. You mentioned that there could be some business school issues or management skills. I think that's something that I want to make sure that you don't forget to put in because I think now we're weeding out people, but I don't think we're weeding out the people we most want to weed out. By having so many exams, many good business people are taking exams. I totally agree with the new way we're going, and I hope that you'll be able to do what you're trying to do and attract good business people so that we can teach and communicate well.

MR. FRANK G. REYNOLDS: As you know, Cecil and I have been involved with this for, what, 20 years?

MR. BYKERK: Yes, at least that.

MR. REYNOLDS: I was involved 15 years before that. I've been involved with the E&E going back into the 1950s. I wrote one of the Actuarial Aptitude exams when it existed. It was an English aptitude examination. I can remember a person who wrote eight exams, passed them all, but was not sure whether he ever passed the Actuarial Aptitude exam. Because of the fact that he passed all the other exams, he was given credit for the Actuarial Aptitude exam. Now as we've said many times, Cecil, I'm not in the opposition to many of the broad brush reforms, but I am extremely critical of the fact that we're now being brought in at the point or the public's being brought in and asked to comment after the Board has approved the basic principles, virtually at the point where the syllabus is being developed. It's late in the development process. You've indicated October 1995 is the date that you'll have a first draft. To be bringing the general group of the actuaries in at this point, I think, is a year or a year-and-a-half late. The initial report should have been something that was the subject of this type of meeting.

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Second, I think that we have some major problems here, and a major segment of the education is being totally ignored. The latter part of the education, the country specific education that you are going to make 10%, is very necessary. If you go out as a pension actuary to a client and people start talking about ERISA and you say, "Oh, gee, I have to go home and read that Act because I'm not involved with it, I don't know the details of it," you're going to look like a fool. I would say 25% of the total education, which is country legislation, is something that we have to examine because that is what we are certifying as Societies, whether it be the CIA or the AAA, when we let somebody practice. To simply say, well, a person should get some knowledge of this, I think, is going to represent a major downgrade.

Now how this can be done, I don't know. How can you get a tremendous amount of the country-specific garbage out? I am delighted to finally see it occurring. But I think we have to realize that once we get that out, there is still, nonetheless, a point where that is necessary when we are dealing with the public. I am very critical of the attempt or what's being seen as the attempt to completely eliminate that aspect of our education and examination, in other words, certification to the public.

MR. BYKERK: I will comment as far as the timing. As I mentioned, this effort originated with the formation of a Task Force in January 1994. The principles were adopted by the Board in January 1995 (which is I guess by my own number of years in the Society is moving somewhat more rapidly than we have historically with some of these kinds of things). I was involved with flexible education system/future education methods (FES/FEM), and I don't know how many years that took, but there was a sense of urgency by this Task Force. The Board adopted a set of principles. There may be some of you who could go through principles and point out to us something that you don't agree with or maybe more than one thing that you don't agree with. But I would say that the vast majority of you would embrace almost every one of those principles and that goes back to my comments about how not everyone has agreed to the point we have reached. Don't forget about the placeholder design. We said it was a placeholder design and that it isn't written in stone. We put it out there because people are having a hard time understanding what this whole thing might look like. So, Frank, in response to your second question, maybe the last category is 25, and maybe there is some shifting around of material between advanced and professional development. Maybe it's more a matter of semantics because of the way we've worded it.

But going back to the principles and the timing, we've laid some principles out that I believe most all of us can embrace. While we didn't all agree on how we got there, just about everybody said: "I like those principles; those are good principles to begin to work from the top down and build a structure, a syllabus, and a process to educate and examine our students."

Now we're trying to get a design team going. We did come up with a placeholder design, we did throw it out there, and we have had comments. We've been trying to communicate this to anyone who would listen from the point in time that we had Board approval. We made presentations in New Orleans and in New York. I made a presentation at Nebraska's Actuary's Club. Sam Gutterman has presented to the San Francisco Club. I went and talked at the chief actuaries seminar. We're going to be trying to get to the CEOs and other prominent actuaries of companies who we don't really expect to come to meetings

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like this to attend. We're willing to call them up one-on-one and ask, what do you think actuaries need to be like in the future? So I guess from this planning point of view I really feel like we've made an honest attempt, and I think we've been reasonably successful at getting people brought in as early as we could. When we get all this communication out and we hear that a whole bunch of people are bothered by principle 1B or something, then maybe we'll readdress it, but that's the process we're trying to go through.

MR. DONALD J. JONES: Just a little feedback. When I started in the profession, I think economists were said to project 6 months ahead and long-range projection was 18 months for them. We usually do a long range of 75 years or so in social security. I think long range planning is missing in those skills or the things that are uniquely actuarial, and I think that's a good selling point for our skills to other people.

If I were a casualty actuary, I think I'd feel like this is trying to shove me out of the picture or incorporate me underneath as a second class actuary, and I'm a little concerned about our relationship with the CAS in this move. It looks great. I think it's a very good way to go, and elimination of the early exams or replacement is a good idea.

I find that, as a teacher, when we put down the syllabus say for an exam like 110, and then we pass students with a six, they don't bring many of the skills of the syllabus into a life contingency's class. That problem may be worse if we don't formally test them on those early skills. I think the part of it that needs to be carefully designed is how we assure the candidates have the skills from those courses when they come in.

MR. BYKERK: I appreciate the other comments. Just a comment on the CAS situation. Frankly, that has been a concern of mine right along as how we continue to work with the CAS and what its members' reaction to this will be. The CAS representatives were brought in the process very early on. They received reports because their education management people sit as liaisons to the Society's Education management committee through which all of this was reported. They received the first reports right out of the box on this and kept in touch on this. Interestingly enough, their reaction has been, "Well, we're faced with the same problems, and we have the same concerns." They've set up a Task Force to look at the same issues. Maybe someday we'll all come together; maybe we won't. Maybe there'll still be a CAS out there, and they will be the experts providing the material for the SOA people to take on that side and some of their people are taking material that we've developed on the SOA side, or maybe someday it's all one and the same. Rob, did you have a comment on it?

MR. BROWN: No, just to agree that we've made it clear all the way through that our supplier of property and casualty (P&C) material will be the CAS. So while it does create some obvious difficulty, the response has been: "We really do agree with this philosophy, and we see there are some things we have to work out." That's about where we are right now.

MR. BYKERK: Yes, the CAS Board has not formally adopted this, but its Board has established a task force to look at it.

MR. KRA: What will the process be for actual implementation? Will it need Board

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approval, or will it actually go to the members? I think you may get a very different reading from the membership on some of the issues, and something as radical as this type of change I honestly believe should be subjected to ratification of the membership of the Society, not merely at the Board level.

MR. BYKERK: Well, I don't know how it will eventually come out. I do know that, if you read the bylaws and the constitution, the Board is charged with responsibility for setting the requirements for becoming a member of the organization.

MR. KRA: I'm not challenging it on a legal basis. Legally the Board may have the right to, but I think that it really should go to the membership.

MR. BYKERK: I'm not just saying it from a legal point of view. I'm saying the Board is elected and part of its charge by the constitution, which the membership has voted on, is to be responsible for setting entrance requirements and the requirements for becoming a member or becoming a Fellow, so I'm not trying to take a legal approach.

MR. KRA: With all due respect, however, if it's minor tinkering with the system, I think everybody is comfortable to leave that to a small, duly constituted, elected Board. However, where it's radical surgery, a major change in scope and focus of what it takes to become a Fellow of the SOA, I honestly believe that, even though it may not be required to go to the membership, it should go to the membership and I would strongly urge that this be put in a full, open discussion to the membership and then subject to membership ratification.

MR. BYKERK: Well, the first step in that is this communication device that we'll be putting out next month and that communication device will have a mechanism for people to use to get response back to us. That may end up suggesting that, in fact, we do more. But, frankly, if we received a response from 75% of the people on that communication that, hey, it's great and go right on, I think then a vote would be a waste of time. I'm talking to you as a member of the Society now. I'm not talking as the Board Task Force Chair because when this actually comes up, I'll just be an individual reporting to the Board. I won't have any voting power on the Board and the Board will make the decision. But, on the other hand, if we send out this communication, and we get two-thirds of them back saying, hey, I've got a problem with this, this is too severe, that suggests something else to us. If you go back to when the vote was taken on alternate credit (or whatever you called it back a few years ago), actually the vote came in that the Board could have gone ahead with what it was doing, but because the vote was so close the Board chose not to. It chose that the sense of the membership was against this or at least it was close enough that the Board members weren't willing to venture out. So I think the Board is very cognizant and aware and so forth. On the other hand, unless each and every member is willing to spend 40 to 50 hours sitting listening to us talk, I'm not sure they're going to have all of the knowledge and all facts.

MR. JOHN PATRICK KINNEY III: I have a number of concerns, which in the interest of time I promise to submit in writing later on, but for now I'd just like you to address one question and that is, what measures are currently in place or envisioned to quantify the value of an FSA and make sure that it's maintained in the future methods?

MR. BROWN: Well, it's not a mathematical formula. We have the principle of equity in the document, and it's one that we feel very strongly about. There is absolutely no intention on anyone's part to devalue the Fellowship. I think if we've had a concern in the second half of our existence as a task force, it was that we were coming close to just adding more, and that was the one thing we promised ourselves that in the end we would not have a mass that was bigger than what we started with. We felt we couldn't do that in all fairness. I believe we're going to enhance the core competency as we now know it and see it and we're going to add capabilities to allow actuaries to bring value added to nontraditional roles. In my mind then that end result cannot possibly have lower value than what we have today.

MR. KINNEY: If I could just follow up, some things that might come to my mind would be: would there be any focus groups of nontraditional employers to say that if we could offer individuals who were trained in the following, how much would the employers pay those individuals? That would be something that could be done and compared to current salaries of FSAs in traditional roles. So I'm just trying to narrow things down from the kind of nebulous motherhood-and-apple-pie thing of maintaining the value of the FSA to say what does that really mean.

MR. BYKERK: Well, I think you have a good idea there and one of the things we've been trying to do is dialogue with some of the key sort of "actuarial leaders" of those people who are already nontraditional kinds of people. We're looking at it for input to design what we're moving toward. By the same token, we have recognized that we somehow do have to put a measurement system in for this process as part of the change process management. What do you need to achieve in order to say, yes, you've achieved your goal? I think your points are well taken and I would encourage you and others to put suggestions down on how we can go about doing that.

MR. CARL A. WESTMAN: As actuaries move into nontraditional roles, as you mentioned at the beginning, it would seem important that we would be able to easily explain to prospective employers the education process that we've gone through to attain the FSA designation. It used to be the case that actuaries had to complete a series of ten exams and this is very easy to explain. You could say there are ten exams, and they cover such and such topics. With the advent of the Flexible Education System (FES) it became much more difficult to explain how many exams there are, the fact that it was credit based, the fact that there is a Fellowship Admissions Course at the end and that sort of stuff. Do you feel that it is important for actuaries to be able to easily explain their qualifications at least through the E&E system to prospective nontraditional employers, and if so, what effect do you think your proposal will have?

MR. BROWN: That's a very interesting question and we probably could spend the rest of the day on it. As you were talking, I was trying to build analogies. I don't know what my family doctor did to qualify. I haven't got a clue, but I've a pretty good feel of what he's capable of doing. I think under the new system, you will be able to describe your capabilities more clearly, more succinctly, and more accurately than you can today. You may not have any easier way of describing how it was you achieved those capabilities or knowledge base, but it certainly wouldn't be any worse. But I do honestly believe you will be able to define why we can bring unique value added more easily under the new system than under the present system.

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MR. CRAIG W. LEWIS: Perhaps I'll just continue on that thought. I guess my question is why not include presentation skills in the syllabus, especially as we get into the nontraditional roles. I think we're marvelous at creating models or solving complex problems, but then when we go out and try to explain it to nontechnical people, we seem to fall flat on our faces. You've heard comments today on whether we communicated well or whether people understood what was going on. If we're truly going to enhance our role in the business community, I think communication is almost as important, if not more, than our mathematical skills.

MR. BYKERK: Well, first of all, in answer to that, Rob and I won't take that personally (even if you meant it that way). But seriously, that's something we've tossed around, and it gets into this issue, and I couldn't agree with you more, that we need to be able to manage, we need to be able to present, we need to be able to communicate to nontechnical people, and so on. Where do the Society and other individuals' responsibilities begin? I think the Society can help enable some of those things. But to be the provider of education on those other things, I think has to come through meetings like this where we can get together. You've noticed that over the last two to five years, the whole tone of the meetings has changed. Rather than there being 20 concurrent sessions with three guys standing up in front who spent 20 hours preparing slides and then couldn't interpret them, there are now sessions on management skills, supervising people, making presentations, and so forth. It's a balance of how much is put into the syllabus and how much is obtained from other kinds of mechanisms.

MR. BROWN: I'm going to give you a stronger answer than that. Historically, today when someone like you made a great suggestion like that, we had a string that was tied to the word test, or exam. How were you going to test and examine people across North America on their communication and oral communication skills. We worked very hard on better types of response modes in the exams to test your ability to communicate in writing. What we now have is this new idea, this fourth layer, where we might be able to write in, as a requirement: one of the things you have to attend requires oral presentation on your part. We're not going to have to get all fussed about whether the pass mark is 43.2 or not. That's really going to give us this flexibility to allow us to do these things that we can't do today. We have ourselves tied too tightly by this system that we have today, so I think the new system will allow that.

