Informal Discussion Transcript
General Session II - Innovative Business Solutions to Respond to the Aging Society

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General Session II - Innovative Business Solutions to Respond to the Aging Society

ANNA RAPPAPORT: I hope you all have had a very exciting and encouraging day. My goal is that everybody here leaves with at least one thing that you want to do as a result of this session.

This morning, we heard about how life spans are changing, so that people are living longer, but there is controversy about how much. These discussions are thought provoking. For this session, I don’t think knowing how much longer we are living matters. Things are changing. In this session, we are talking about innovative business solutions to respond to the aging society. Population aging affects many, many areas of business activity. So even though most of us work in one type of business, at least at any given time, many industries that are affected, we hope you will gain from [this] session a broad perspective on some of the areas affecting by population aging, and that you will focus on financial services and health care, but also on other areas of business.

We’re going to be talking to you about three different areas of how the aging society affects businesses and creates opportunities. These three examples are certainly not the only three. We encourage you to think big and use your imagination. I am hoping that our discussion about these three areas might spur you to think about how you could utilize your talents to offer other creative solutions in response to the maturing population. We will start with the three presentations, and then hear discussion and questions from the audience. Our three presenters represent very different areas of activity. First, Tim Driver represents employment. We talked this morning about people working longer, which is part of why this business exists. We're talking about the business of employing people and employment as an issue for the business community. Tim Driver is the founder and CEO of a company called RetirementJobs.com. This is a career website, for people older than age 50, with more than 1 million job-seeking members. Its brand and advocacy help older Americans beat age bias, and more easily engage with their communities. It's been recognized in the public and private sectors, including by the U.S. Senate Special Committee on Aging and AARP. They also have a certified age-friendly employer program, and that program is widely recognized. It's been adopted by nearly 100 leading U.S. companies. This company has been in existence since 2005. Our second presenter is going to be Nigel Nunoo, and his perspective on this panel is from the financial services industry. His knowledge is rooted more in insurance, and he's from Prudential, where he is vice president and actuary within Prudential's Pension and Structured Solutions Group, a position he's held since 2010. That's a group that's been very leading edge and involved in some of the newer types of financial transactions. He will help us think about different opportunities related to population aging that arise in the financial services business. Last, we have Cindy Hounsell, the president of WISER, the Women's Institute for a Secure Retirement. WISER is a not-for-profit heavily involved in providing information and education for lower and middle income women. It's been widely recognized. They're also an advocacy organization. Cindy is an well-known attorney and retirement expert, well known in many places. Cindy is currently serving on the Employee Retirement Income Security Act (ERISA) Advisory Council. Tim.

TIM DRIVER: Thank you, Anna. So as Anna said, my name is Tim Driver. I'm with RetirementJobs.com. I'm going to talk to you about innovative business solutions. That's the panel title, of course, and in this particular example, once I get to the slide that represents the benefits to employers in hiring and maintaining older workers, that's where I'm going to sort of steer to what the real sort of business opportunity is for the aging society.

First, a little bit of background. So, as Anna said, at RetirementJobs.com, we have job listings for people over age 50. You can think of it as Monster.com for people over 50. The way I got into this, I'm 48 years old. I was working at AOL in the '90s, and running a group of channels there, one of which was the careers channel, and doing a lot of work with Monster.com and thought, you know, someday, someone ought to build a Monster for people over 50, given the population trends being what they are. And I purchased a domain name from a professor who was doing some research at the time on the aging society, aging workforce, and, and thought I'd go invest in a team some day in the future. Fast forward some number of years to 2005 and my dad got laid off from a corporate job, a bank job, where he had a successful career and, you know, there was something about age bias that sort of smelled like that was in the air and all of a sudden, this became personal. So rather than go invest in another team to go do this, I thought, you know, I'm going to actually do this myself. And I recruited a group of people from Monster and AOL and a company called Salary.com and a group of investors, and got to work on building Monster for people over age 50.

So we created, on day one, the first employee was someone who was chartered to go and create this certified age-friendly employer program. The goal was not just to be the largest career site in America for people over 50, which we are today, but also to be a brand that was doing research on this topic to make it a more interesting company to run, but also a product that was more useful to the job-seekers, because ask any job-seeker that comes to our website and the biggest issue on their mind is: How am I going to get around this problem of age bias?

So we are advocates for people over age 50, for job-seekers over the age of 50. I’m not going to spend a lot of time on this, but there is a division of our company that’s involved in elder care, so we actually hire elder caregivers out of the RetirementJobs.com population and we assign them to families that want to hire quality elder care and companionship.

So just to dive in then. Let’s see. OK. Some very tough questions for job-seekers over the age of 50. And you have either heard of these, you’ve either experienced it yourself, you know someone who’s experienced this themselves and if you haven’t, then, you know, there is a possibility that you will see this in your own future.

Whether or not it’s legal to ask your age, age is very frequently asked or at least eluded to in an interview. In fact, the truth is, it is actually legal to ask someone their age. You just can’t use that information against them in the hiring process. So, aren’t you overqualified? Well, very often job-seekers over the age of 50 are overqualified and they have to give a plausible reason as to why they want to take this job and overcome that issue, which is on the minds of that hiring manager who might himself or herself be under the age of 50. Well under. How long do you plan to work? Are you just doing this until you get to retirement, is one of the things you have to overcome. But why would you accept the pay cut? Well, of course there's an inherent question here which is—inherent answer—which is you're going to get a pay cut, and, and that's sort of part of the deal here for a lot of people as they go about this job search after the age of 50. Can you work for a younger boss? You know, got to deal with that when it's a hard one to—it's a hard one to deal with. And then how is your health?

Now I want to just back up for a second and say, most of this is targeted. We, as a website, as a company, are focused on the mass markets. You can think of our audience being the same audience that's using AARP. We're neither at the high income levels or the low income levels. We are mass market, high-volume jobs for the most part. The older job-seeker that is leveraging his or her own personal network is, by far, the best off. Most of what I'm going to talk about this afternoon is about people who are shifting into something different, either because they want to or because they need to.

So the big challenge out there is age bias. That's why we created that certified age-friendly employer program. The idea behind that program is to identify what I call the vocal minority of employers that proactively go out of their way to hire and maintain people over 50.

It’s, it’s a very complex puzzle. There’s HR policy that’s been in place for years with established retirement ages. You know, there’s cultural issues. It’s not fully culturally accepted for people in their 70s or late 60s or 80s, in some cases, to be in the workforce. You know, we actually look to, sort of, across the board, try to change these patterns. I mean they’re going to happen on their own, but, you know, just as an example, if someone has ever seen the television show “The Office,” you know everybody is a younger person. There aren’t older people in there. We actually are in the process of talking to people who are doing the script writing for television shows, to do what I might call “product placement for older workers.” To make it more culturally accepted, for there to be an older worker in the office in the cubicle next to you.

It’s going out on a limb for the younger worker to hire an older worker still, and of course, the younger worker in an age where, you know, job security is on everyone’s mind. It’s a lot safer to hire someone who is 35.

There are legal issues. There’s, you know, we talked about this a little bit in the last session. There are barriers, legal barriers to older workers being hired. You know, some will argue and we've actually done quite a bit of research on this, that some of the laws in place to help age discrimination go away are actually having the reverse effect. Of course, you know, financial implications, lots of stereotypes and myths about older workers and their, you know, their attitudes or their productivity or lack thereof. Illegal forms of bias and it's an emotional issue. I think that, you know, it's a very difficult challenge for people at a stage in life to decide or accept whether they are on the trajectory that looks like that, or the trajectory that looks like that, or the one that looks like that. And there's a lot that goes along with that, of course, and accepting what age you're at and what age you appear to be at and so on and so forth. So these are big issues.

How can you respond? Well, first and foremost, you have to banish the concerns that they even exist, you have to go into the interview and say I'm going to have a positive mindset. I'm going to act confident. I'm going to set my expectations the right way. The data shows that from the GAO [U.S. Government Accountability Office] recently, in the last year or two, that it takes twice as long for an older worker, older worker, by the way, defined usually as over 50, takes twice as long for them to get rehired once they're out of work. So that's an expectation that has to be set. There are other expectations that have to be set as well, where it sometimes needs to be set based on your own circumstances such as, what level am I going in at? And what do I want? That has to be, of course, considered. Do I want at this point in my life to take on an individual contributor role whereas I've been a supervisor or executive in the past?

Having a targeted search strategy makes sense at any age. It's particularly appropriate here including going after employers that are more likely to hire you, meaning age-friendly employers. We did an analysis of the Fortune 500 to look at where are the percentages of older workers clustering both by company and by industry, and also by volume—where are they? If you want to go find the company on the Fortune 500 with the lowest percentage of older workers, you're going to go after a tech company, a Google or a Goldman Sachs, which tends to be, you know, much younger skewed. The companies at the high end actually, it's the airline industry where there's the most prevalence. I'm going to show you a table and a couple of slides on that.

And then finally, I'll show you just a couple of quick slides on "don't be a slungo, but be hirable." So, before I flip to what does a slungo mean, just understand that this is a little bit tongue in cheek, but it’s also a serious issue. And, you know, the slungo concept, I think you’ll, you’ll, you’ll be able to relate to or know people who have, who look and act like that and it’s just one of those things where in our business, you know, we created the acronym in order for it to get some attention.

That’s what a slungo means. You’re stubborn and set in your ways; you’re living in the ‘70s; you can’t take direction from somebody younger; technology, you’re not up on newer technology; you’re grumpy and coming to work every day, acting like you’re entitled and maybe you’re overpaid. Does anybody know somebody like that? I think, you know, it’s one of those things where sometimes you have to understand that that could be either how you’re acting or how you’re coming across, depending on how you define those things. One of those items, the not-up-on-newer-technologies point, is a very real issue. You know, I think that over time, we’re getting asked this question or we’re facing this issue less and less. As a business for us, we sort of fundamentally screen out some people who can’t use technology because we’re a website. So, in order to file an application with any employer that’s using us, the person has to be reasonably adept. But, that is an issue that has, you know, been a real problem for many older workers.

The flip side of that is to be hirable. So helpful and optimistic, interested in learning new skills, ready for a new experience, want to be socially engaged, accepting of a younger manager, ready to do that. You’re not talking about the fact that I have shoes that are older than you. You’re part of the team. You’re ready to join. You’re living in the new millennium. Now don’t go overboard and try to make the case too hard, but make sure that you’re coming across as someone who’s excited and embracing the future.

So I eluded to this a couple of minutes ago, and these are the top 10 industries for people aged 50, and this is only looking at the Fortune 500. So on the left is the top 10 by the number of people age 50+ in the organizations, and then on the right side is the, sort of, by percent. So clearly, retail is the big player in terms of volume across America and then interestingly, the airline industry is where the highest clustering is by percent of people over age 50.

On our website and as I mentioned, it’s a mass market product, so these are some of the frequently posted jobs. This particular list is sorted alphabetically. One of the challenges that we have had as a business and I think this speaks not just to us as a business, but to society’s acceptance of older workers in general, is that we tend to get some complaints that the level of jobs on our website is too low. So it’s a constant effort on our end and I think this will only get better over time, that the richness of the jobs becomes better or more attractive over time. We’re doing a couple of things in the way of innovating here. We’ve actually found some sponsors to come in and actually make available two new categories, nonprofits and volunteer positions, for free so that employers don’t have to pay for them. And the way we make money is an employer pays us to post a listing or an advertising marketer that wants to reach people over age 50 puts their messages on our website or through our e-mails. So in this particular case, we’re adding the categories of nonprofit jobs which are seen often to be richer, more meaningful to some people over age 50, as well as volunteer positions.

I mentioned at the beginning a couple of the business opportunities where the innovation is taking place. I want to highlight here some of the top bullet points and this is sort of a fuller list on why employers tend to hire people over 50. Well, first and foremost, finding it hard to fill jobs. If they can’t find enough people to find the oil in North Dakota or find the oil in Canada, they’re going to expand not only their geographic radius, but their age radius in their job search. So clearly there’s a big opportunity there with a pool of people who are looking for work, need to work, and would be very open to this kind of a career shift. One of the biggest points that's come out of our business in the last few years, and this is the benefit of having a research department attached to a career site, is that we've had a number of our retailing-oriented customers come to us and share that some of the recent findings is based on the fact that they've got access to so much more data these days. Their recent findings are that there's a high correlation between older workforce and customer satisfaction. Which is maybe the biggest thing that happened in our business in the last eight years. Because this is a point that resonates at any level of a company. If they're getting higher customer satisfaction, by having an older worker, interact with a customer, frankly at any age, they're going to hire more older workers. So it's driving recruiting strategy and workforce planning for a lot of companies, particularly in the retail industry and, by extension, I'm talking about a lot of banks are using this strategy, a lot of financial services companies are using this strategy. For quite some time, one of the bigger drivers has been lower turnover, so the average tenure of an older worker is three times that of a younger worker. So that's sent a lot of companies that want to lower their turnover rates to RetirementJobs.com to source, to source candidates. The fourth point, building affinity with 50+ customers, is really the same point that's been used for decades now in diversity hiring. So diversity hiring started in earnest in the '70s, and, and this is really just a new or added definition to diversity hiring. If you want to be more successful, it just makes sense to have your workforce mirror your customer base.

You know, some companies will get certified or advertise their listings with us, or because they want to be seen publicly as, as good members of their communities. So you know, if you're Starbucks, you want to be seen as a good citizen. So you want to be seen as a company that's hiring workers of any type because you're a good citizen and playing a role in your community. I mentioned meeting diversity goals. Having a quick-response staffing solution is another relatively new type of opportunity that we're seeing. So in this particular case study, we have an insurance company that wants to have a quick-response workforce so that when there's a storm, they can dispatch this group of retirees down to do an assessment of the damage and be insurance adjusting. So this is a way that they can be better at their business by leveraging a pool of talent that hasn't been taken advantage of in the past.

And then, at the bottom and I will say this is unfortunate, it's on the list, but it is at the bottom of the list, is experience and life skills. And this doesn't apply to some of the employers that we were talking about earlier today, where it’s all about retention of knowledge. That’s not relevant here.

But in terms of the mass market employers out there, it’s much more about the top bullet points and a lot less about experience, although life skills and life experiences is certainly valued.

A couple of points about why we as a society want Americans over 50 working: It’s good for 50+ Americans. It gives them economic security in a way that we haven’t been able to provide. It gives them a longer life; it makes them happier; gives them a chance to give back. It’s good for our economy, reducing employer longevity risk and theoretically, giving more money to people to spend will spur the economy.

I mentioned our affiliation with groups in not just the private and public sector, but also in government. So Senator [Herb] Kohl [retired chair, Senate Special Committee on Aging] made this point about RetirementJobs.com, again, sort of saying the same thing, that hiring more older workers is a good thing for the American economy.

So if that was retirement income in the past, retirement income today and going forward includes working longer and having a retirement job or whatever phrase you want to use to describe this. We talk about encore jobs and working longer, or retirement jobs. That's sort of the new leg of the stool.

So to boil it down for the age 50+ demographic, this is a group of individuals that need work and frankly nest eggs and pensions and Social Security are not enough to get the job done, especially given all the unknowns around how long we're going to live. As I've mentioned, being a slungo is not the right way to get things done, so getting in their way is a problem. It's the vocal minority of employers. Our goal is to make that a bigger and bigger group of employers that sees these tangible and measurable benefits. And then I think it's government's role in some manner to make it easier for mature workers to get and stay employed.

So I'll say thank you and leave it there. (APPLAUSE)

ANNA RAPPAPORT: We'll hear from Nigel now. There are additional resources in the appendix to the presentation and those presentations will all be available on the SOA website.

NIGEL NUNOO: Hi, everyone. As Anna said, I'm Nigel Nunoo from Prudential. And I'm going to be trying to represent the financial services view for this discussion. Mostly through the insurance company lens and a slight bend towards the actuarial perspectives, since that's my background. My understanding is that this is a fairly general audience, fairly international audience, so I want to be really careful in the lingo I use. But just a quick survey: Is there anyone here who does not understand the difference between defined benefit and defined contribution retirement products? OK, so this is good. All right.

So just a quick overview of my discussion. I think we, in addition to these three industries, we're going to be talking about the aging population or the fact that people are living longer is widely viewed to be a tremendous, to present tremendous business opportunities.

From the financial services perspective, most of the opportunities are in the retirement products space, and again, this is why I asked the question. So there, you divide retirement products into two main categories: Defined benefit or DB plans, and the fact that DB plan risks are better managed by insurance companies presents a big opportunity for insurance companies, because people are aging longer, living longer; and similarly, defined contribution or DC plans, generally lack guarantees, income guarantees in particular, and that's exactly what insurance companies provide. So these are the two main triggers or the reasons why insurance companies are realizing the tremendous business opportunity with the aging population. Now with opportunity comes risk. And the fact that all these risks are being shifted from plan sponsors to insurance companies balance sheets calls for a really high barrier for risk management, and my view and everyone generally agrees that actuaries are the best equipped to sort of drive that sort of comprehensive risk management. And I'm going to single out longevity of risk in particular as an area that actuaries have a moral and professional obligation to make sure we're assessing correctly and making sure companies that are taking advantage of these opportunities are going to be solvent in the long run.

OK, so these are indeed the solutions around, presented in the defined benefit plan spaces, is the story of what we call the pension risk transfer business and I'm going to delve a little bit more into that. So I'm going to just talk about the state of the pension market, and then, for the pension risk transfer as a whole, the degrees of risk reduction that pension plans can take and how the different products that Prudential and most insurance companies have for each of those stages. And I'm going to talk a little bit about the market size and the fact that it's growing exponentially.

This is a very simple statement, but I think it captures the core of why the pension risk transfer business is such a hot opportunity for insurance companies. Simply when the pension plan gets in the way of the business plan, leading companies around the world turn to pension risk transfer. Simple statement, but as I go through the presentation, it’s going to become more evident why I started with this particular statement. But I think it comes down to the fact that companies like General Motors are in business to make widgets, in General Motors’ case, cars. And when they have pension obligations that are so big relative to the balance sheet, sometimes these pension plans are bigger than their sort of core balance sheet. They effectively function like insurance companies, except they don’t have the expertise to do so. And it can create a lot of problems for them in the long run. So, you know, more and more companies are recognizing that and de-risk in order to sort of turn into pension risk transfer.

This graph is a little simplistic, but we have the pension plan sponsor in the middle and it’s surrounded by risk. And pension plans generally face a lot of different kinds of risks, but I’m going to categorize those into just asset risk and liability risk. So, core asset risk, the duration of mismatch, all the risk around equities, credit risk of a fixed income, all of this stuff is called asset risk. If you think about it, insurance companies are much better equipped to manage those kinds of risks than any company that makes widgets. Certainly better than General Motors or Verizon or some of these other companies. And then, when you talk about liability risk—so all the contingencies around benefit, participant behavior, salary increases, inflation—longevity of risk is the core one and just optional forms of annuities. All that stuff that drives the shape of liabilities are things that insurance companies and actuaries do, that's what we do and we have the best expertise in that. And that's why it makes sense for insurance companies to manage the liability of risk. So if you think about pension plans and the fact that their risk are divided between asset risk and liability risk, it makes sense that insurance companies would be the ones managing those risks.

I love this graph because it doesn't have any numbers, so no one can fact check me on it. I think everyone believes the pattern, and we have the dates at the bottom. But I think this just highlights what it must feel like to be a CFO of a company with a really big pension plan that has to fund, try to get to a 100 percent funded ratio and things like 2000, the 2002–2003 crisis after 9/11, and then 2008 happens, and just overnight the funded ratio just dips, more than 30 percent. So think about it if you have a $10 billion plan, you face a $3 billion shortfall, just like that. And that doesn't help you in your focus in making widgets. So, this is one of the key drivers for the pension risk transfer opportunities, where companies more and more [are] realizing that they can’t live with this kind of volatility and therefore, they should de-risk and have insurance companies who do this for a living focus on it.

Longevity risk is another critical driver. I think in this discussion, I’m not going to try to say anything that would lead me to be fact checked, but bottom line is, everyone pretty much across the board—and this, I think, I think this is fairly global—knows that people are living longer and longer. And I’m going to talk about some of the reasons why. But you know, all the promises that were made for plans that were designed, you know, in the ‘60s and ‘70s, assumed people were going to live for a certain amount of time. Mortality has improved significantly and actually this graph talks about, it represents the general population and I think it’s Social Security data if I’m not mistaken. If you look at corporate pension data, the improvement is even more significant, because people with pension plans generally live longer. The bottom line is, life expectancy has increased significantly, somewhere between 20 and 30 percent for both males and females over the past 30 years. And that’s significant if you think about what it does to the pension obligation of a company.

Now I talked about the degrees of risk transfer, and I think this graph is a little bit busy. I’m not going to focus on all the details, but you know, the very top part of the graph just shows you, from a pension plan's perspective, the degrees of risk reduction. So, one extreme is to just choose to do nothing. Keep the status quo, if they're invested in, 60 percent equity, 40 percent fixed income, just keep that status quo, take advantage of some of the regulation and just do nothing. Take the risk and remember the graph for the stock market? Just take that kind of risk.

The other extreme, the blue section, is when they choose to transfer the risk. One way they can do it is to just offer lump sums to participants. That's generally one way pension plans operate. That doesn't have anything to do with insurance companies, per se. But from an insurance company perspective, we have three—actually I don't have, the product longevity reinsurance which I don't have here. But that's where they can choose to retain all of the asset risk but then transfer the longevity risk to insurance companies. So that would be similar to how a longevity swap would work. We don't call this a swap; it's an insurance product, just to be clear. But you know they would just lock into a fixed mortality table that has clearly defined benefit patterns and then the insurance company would take the noise around what actually happens, depending on how people live.

And then we have two other products, the buy-in and the buy-out, and, generally speaking, these are called funded transactions. Because there's going to be a single premium paid for an insurance company annuity, the annuity basically is what's going to pay all the benefits, depending on what happens in the market, depending on how people live. So actually, I'm going to move to the next slide, to just describe the difference.

So I have the longevity risk on this slide. This slide just shows and, again, I don't have numbers, because I don't want to be fact checked, but this is the global view. This shows that since 2007, the pension risk transfer market is exploding. And, by the three types of products we have. So, since 2007, the bottom is the buy-out; the blue, the middle, is the buy-ins; and then the longevity started, you know, a little later, but it's really catching up. Since 2007 and 2012, this graph looks like it's increased by a factor of almost 10.

I didn't really discuss too much about the difference between the buy-in and the buy-out, but think of a buy-in as a replacement of a pension plan's assets. So if you take all the fixed income or equity they had or cash, and give it to an insurance company, they get an insurance company buy-in, which is a group annuity contract that's going to pay benefits depending, regardless of what happens to the participants. That is not a permanent transaction. So their structure is that, that it can be revoked, but I’m not going to get into that detail. But generally speaking, if they never terminated the contract, it’s going to look very much like a buy-out. Buy-out is permanent, so that is the permanent plan settlement where the insurance company becomes responsible for all the benefits and takes a huge premium—takes a single premium upfront, and is responsible for the benefits, regardless of what happens. And I already talked about the longevity transfer. So I think that’s pretty straightforward.

On the bottom are some notable transactions that have happened in each of these spaces. So I don’t know if there is anyone here who didn’t have the General Motors transaction, that Prudential did in 2012? That, I believe, is the largest insurance contract ever written in the world. It’s something, something around $25 billion that Prudential did with General Motors and then the same year, we did another transaction with Verizon, slightly smaller, just about $8 billion, but you know.

And then Prudential also did the first buy-in transaction in the U.S. It’s much, much smaller compared to some of the other transactions I’m talking about, but Hickory Springs, it was a furniture company. We did that transaction and I think most of the buy-ins have been happening in the U.K. so far. But we're still hopeful that the U.S. is going to catch on. And then obviously, their longevity transactions, where Prudential's longevity transactions have been mostly offering longevity insurance to U.K. pension plans. So those have not been in the U.S. as well.

The size of the pension risk transfer opportunity is massive. No matter how you look at it and there's so many ways you can, I bet people [have] seen different figures and I want to make sure I'm being clear. This 6.5 trillion number is, I think, in the U.S., it's defined benefit obligations, but it includes public pensions. Just corporate pensions is more like 2 trillion, so you know, the opportunity is there for all defined benefit plans. If a company chooses to only focus on corporate pensions, that number would look like 2 trillion, but it's still a big number. I mean anybody would take 10 percent of that. And then, globally, you have another 1.3 trillion in Canada and 1.5 trillion in the United Kingdom and then another trillion in the Netherlands. This is just showing the four largest in sort of [the] Western world.

OK, so defined contribution solutions, I'm not really an expert in this area, so I'm going to keep the discussion more general. But I think it generally has to do with income guarantees and the fact that insurance companies are the ones who can provide these kinds of guarantees. So I'm going to talk about the retirement landscape, you know, how these guarantees can improve the effectiveness of defined contribution plans and then illustrate the point with what we call the GMWB, our guaranteed minimum withdrawal benefit product.

In the U.S., and I believe it's becoming more global at this point, that most corporate retirement plans have shifted from defined benefit to defined contribution, where companies are basically having participants take the risk. The companies will make the contributions, but to the extent the market tanks, or people live longer, the risk is all on the participants. So that's generally a change in the landscape and this has been happening for a while. Most people in my generation don't have defined benefit retirement plans.

How many people would love to drive on this bridge? How would you feel if you had to drive on a bridge like this every day? Pretty fun, huh? Yeah, I really love this graph because I think it brings the point home better than anything else. Nobody would like to drive on this, you know? It doesn't matter, I'll avoid this bridge by any means, and this is how it feels to have a defined contribution plan with no guarantees. Right? You can save all you want. The market can do all, great things. The moment you have your nest egg and you need a stream of income for the rest of your life, this is how it feels like, because you don’t know what’s going to happen. Right? One wrong turn and I’m not going to paint that picture, but I think everyone gets the point. And guarantees do this. Now how many people would like to drive on this bridge? Feels a lot better, doesn’t it? I think that’s the general concept of the guarantees that insurance companies provide for defined contribution plans.

So just a few things about the effectiveness of DC plans. Generally, they don’t provide protection against market risk in the near term, close to retirement. Longevity of risk after retirement, you know, it’s all passed back to the participants. And then there are other benefits like the comingling of assets within the portfolio that you get when you have a defined benefit plan that’s matched by the company and, generally, defined contribution plans don’t have, or the participants don’t get that.

I’m going to start with the text at the bottom and talk about that. So nine out of 10 participants in defined contribution plans seek guaranteed income that they cannot outlive. Right? Everybody wants to make sure they’re going to have enough money for the rest of their life. That’s why you save and that’s why you enter defined contribution plans. But plans don’t give you that kind of guarantee. So, people want guaranteed lifetime income and still they want to retain the opportunity for growth. When the market does well, you want to be able to participate in that. You want downtime, downside protection in case things don't go well and then you want complete access to market value. And generally speaking, the kinds of products that insurance companies offer try to get participants these kinds of features, which make defined contribution plans much more like defined benefit plans, because you have more certainty for your income.

I'm using this, this product in particular to illustrate the point. So don't really worry about the fine print, but the point is, it looks like over time, you try to accumulate income—funds by saving and, you know, market does well, and then when it gets to a certain point, these products lock in the amount, such that you're guaranteed a certain amount of income for the rest of your life, which is exactly how a defined benefit plan looks like, but defined contribution plans don't have those features. So those are the kinds of guarantees that the insurance companies provide to help people have a steady stream of income for the rest of their life.

Now as I said before, there's no opportunity without risk, particularly in this area, so we, meaning the actuaries in the room, we're helping insurance companies

take full advantage of these opportunities, but it's critically important that we help them understand the risk they're taking on and being able to manage those appropriately. So, the actuary's role has to evolve. And I'm going to talk about that in a second. And as I singled out longevity before, all of what you've heard here about longevity improvement has to be well understood and reflected in pricing, to the extent that we can. You know, we can't just learn about these things and move on and go do things the same way we used to. It's critically important. And then talk about longevity underwriting, and I'm here with one of my colleagues, Tom Jones, over there, who is the expert in this area, so if there are any really hard questions, I'm going to send them over to him.
(LAUGHTER)

OK, I really like this graph because I think it tries to illustrate the point. The, within the space, the actuary's role certainly at Prudential, for us to be able to have the kind of success that we've had, has evolved quite a bit. So, the traditional role for actuaries has always been pricing, product development, valuation, financial reporting, setting assumptions, doing experience studies and that kind of stuff. And now to evolve into more, much more comprehensive risk assessment or risk management of all of the risks that the companies are taking, making sure we're appropriately capitalized, making sure the leaders know exactly what they're getting into and whether they have the appetite for the kinds of risks that we're taking on. Not just taking the income, but they're recognizing the risk we're taking.

There's a strong need for thought leadership and innovation, so all of these guarantees and all the stuff we talked about is done through extremely complex modeling and analysis and actuaries are the forefront of that, and try to lead the thought in that area. Because we're solving problems for companies, there's a lot of need for strategic thinking and all of these transactions are customized, none of these pension risk transfer transactions look the same. Every company has their own unique needs. There's a lot of need for creative problem solving and the actuaries always are the forefront of that effort.

And then last, but very, very important, is communication and influence. So, we actuaries can do a lot of fantastic work, but if we can't communicate it well, or no one understands what we're doing, we're not going to influence decision-making. It's going to be like, all this stuff is nice, but thank you.

This slide is not a Prudential slide. I borrowed from a company called Risk Management Solutions, so giving them the credit. But, it talks about how longevity modeling now or it’s going to increasingly consider drivers of longevity improvement explicitly. So, the models that are being built now to protect longevity improvement, or mortality improvement, explicitly reflect drivers like lifestyle changes, smoking or the cessation of smoking, obesity, all that stuff is explicitly modeled out. The health environments, the things in our country like adopting a new health care law, whether it’s effective or not, all of that is modeled out with appropriate contingencies and then medical intervention obviously is a big piece of that. And all of that is happening now. So the most sophisticated models out there are reflecting these three items. In a couple of years, say about 10 years from now, regenerative medicine is going to be a big driver and even though that’s not well defined, models out there are reflecting the probability that that’s going to happen and the impact that it’s going to have on mortality improvement. And then lastly, retardation of aging, which is much later, but is still, you know, coming up.

And all of this together makes mortality improvement modeling look like this. So, each one of these things, some of these things taper off, but as they taper off, the impact of other things would emerge, so this is just an illustration but this stays, the bottom is the health environment. The impact of that on mortality improvement is gradually going to taper off because you know, everyone is going to have health care. By the same time it tapers off, regenerative medicine is going to kick in and you know, retardation of aging could kick in towards the end.

The most important thing to know about mortality improvement is no one really knows what's going to happen and we've tried to estimate this, all these estimates are constantly changed, but everyone generally understands that mortality has improved for a long time and the drivers have been changing and you know if you're listening to the most sophisticated thinkers of the world, this is what it looks like in the next couple of years.

This graph has more to do with the assumptions we use in the U.S. I think it's fairly important. I think the way to describe this graph, this page, is start with the graph. So, just to orient everyone what's on this graph, at the bottom right, the horizontal axis is the age, attained age. So, you know, someone, given that they turn 65 or 67 and so forth, and then the vertical axis is the mortality improvement year over year. Now, the green line at the top is actually the realized mortality improvement for these ages in the U.S. in the 2000s. So this is the current mortality improvement that we've realized. And the two lines at the bottom are the assumptions we're using. And you see there's a clear gap between what we realize and what we're assuming.

Now, the blue line, that's called Scale AA in actuarial circles, that is a mortality improvement scale that we've been using for a long time. And recently the Society of Actuaries published a new scale called Scale BB, very creative sort of names, which if you look at it compared to the actual experience, it's an improvement, meaning it's more reflective of actual experience. We're not quite there yet. And the line assumption is that the experience, the current experience is going to taper off, meaning we're not going to sustain these levels of improvements forever; however, it doesn't reflect what the other graphs say, which is other things are going to kick in, like regenerative medicine and retardation of aging. So this graph is really important because what I'm trying to convey is that actuaries have a professional obligation to make sure we are using the best assumptions for our product, or making it clear to leaders that we're not and the risk around not doing that. The Scale BB does not match current assumptions, but clearly if you look at the recent history, it's a better depiction of mortality improvements than Scale AA. And it's fairly clear. So, the challenge is that most pension plans report their, they report the value of their liabilities, what we call the GAAP PBO, the GAAP projected of benefit obligation, using Scale AA. So it makes it much harder for them to understand the value of the liability when it’s looked through the Scale BB lens and that’s a challenge. But you know, the graph tells a pretty good story about the fact that mortality improvement is lagging and assumptions are not meeting current expectations or current experience and something has to be done about it.

This graph shows the impact of each of those assumptions I just talked about. So, the uncertainty around longevity risk is as much or even more, it could be greater than the financial risk associated with interest rates and equity market. So that graph with the stock market is one that everyone understands that shows the risk of a pension plan, but longevity of risk is much harder to assess and it’s much more open to debate.

I circled the numbers at the bottom to just bring everyone to the table, this is just showing the value, the relative value of life expectancy and the value of a pension plan or annuity, using different assumptions. So the first line, GAM-94 and everything says none. That phase, you know, your base mortality is a table called the GAM [Group Annuity Mortality] Table, but you reflect no improvements. So in that scenario, I’m using that as the base case. In that scenario, the life expectancy for someone aged 65 would be 17.3. Once you layer on mortality improvement assumptions, you see the life expectancy increases, so you know, if you go from that scenario to just using Scale AA, it increases to 19.7 and if you all go to the bottom where you're shown the recent experience, which is the green line I was showing before, that jumps to 22.7. Similarly, the value of the liability, relative to the base case, if you look at, you're assuming current experience continues forever, it's something like 23 percent higher in liabilities.

Now you know, there's a lot of debate as to what's really going to happen. However, the one thing that's not really subject to debate is that Scale BB is better than Scale AA and you can see that there's about 3 percent difference between value and liabilities with Scale BB versus Scale AA. So that would be clearly, I would say, miss underpricing liabilities by at least 3 percent, if you choose not to use Scale BB as an assumption.

So I think, that was it for my stuff.

ANNA RAPPAPORT: Thank you, Nigel. We've heard about employment and about some of the opportunities for the financial services industry. Now, Cindy Hounsell will tell us about housing trends, issues, challenges and opportunities arising from the economic situation and the aging population. Cindy?

CINDY HOUNSELL: OK, well, I'll speed through my slides. The first thing I wanted to say since I see there's so many men in the audience, I have to tell my late afternoon joke, which is, that if we had named the Women's Institute for a Secure Retirement, the Men's Institute, the acronym would have been MISR. (LAUGHTER) I have to tell that in memory of my dad, who was always telling me bad jokes.

Anyway, it's my great pleasure to be here and thanks to Anna and the Society for inviting us. And I thought I'd tell a little bit about what we normally do. Since the largest focus of our organization is financial and retirement education, and the piece of it that I think is more interesting to this audience is learning a little bit about, there's a whole aging network out there that I think many people are probably not even aware of, and our National Resource Center on Women and Retirement Planning educates a lot of those organizations. So we're part of the Leadership Council on Aging, which has 53 organizations running from large organizations to small, that include every issue imaginable. And what we do is provide basic materials and things that most of these organizations would never pay any attention to, so with that, I'll sort of focus a little bit on the housing issues.

So I'm sure you've heard this statistic over and over again, but that there's a big increase in the age 65+ population over the next several years. One of the things that I realized when I was preparing this slide deck was that, when I first started doing this work, there was so much more availability of public housing for older women, and that was the way that many older women eked through, when they became widowed or divorced, they would have really low cost housing. And I was at a meeting with the group that I just mentioned, the Leadership Council on Aging, and the people from the Obama Administration came in and I thought, I don't even know why they came to tell us this statistic, but in the first four years of the administration, they've been able to add a little over 2,000 units nationwide. So with 10,000 people retiring every day, you can imagine the need that's out there. So I think you know it's enormous and the lack of affordable housing, the people in the housing community say is as big as any other piece of the retirement crisis.

So, one of the other interesting sort of things is that a lot of older adults are likely to have physical limitations that require home modification, entry to their home, bathroom, grab bars, hand rails, $2,000 for a roll-in and, of course, stair lifts and I'll talk a little bit later about how many of the houses, maybe many of the homes, are not really safe or suitable for a lot of older adults. Only 6 percent of age 65+ households live in physically inadequate housing, but it's the safety that is the big issue. And one of the other big issues in the aging community is falls. And falls in the next 10 years, I think, it’s 2020, are going to cost us $55 billion a year for the falls, the hospitalizations, the health care, so many more individuals, which is an enormous amount of money.

The reason for that is because so many people need more accessible bathrooms. Their homes are just not appropriate. And the other piece is that nobody wants to leave their home. It’s like taking the keys away from the seniors. They don’t want to leave their homes.

One of the other things that will change because so many of these nonprofits that have been providing services for the last say, you know, 30 or 40 years for the elderly, they’re having all their funding cut, so there’s going to be a huge need for the private sector to step in, and many of these services are going to be taken over by the private sector and some of that Tim was talking about, with the caregivers and there’s going to be so many more jobs in that area. I just saw an AARP study that came out last week that said, I think, the numbers of family caregivers that surrounds an elderly family member now are 14. You have access to children, grandchildren, cousins, all of that. But that by the time the rest of us are out there (LAUGHING), the beginning of the baby boomer, that there’ll be maybe three of those people available.

So anyway, the Office on Aging, the job of the Office on Aging in most communities is to develop a network and I sort of think of it more like the Angie's List for the elderly and within the community to assure that seniors are able to access qualified services. And I had my own experience when my parents both died and neither one of them had been ill. They died within three months of each other, early. And they had lived in Boston. In Boston, I had the great network. I grew up there. I had a lot of college friends. I had people that could step in at a minute, family, and then they moved to a part of Florida where we knew no one. There was no network. There was no anything. But the people in their retirement community were actually very helpful once they did get sick. And what was interesting was, because I knew this network, I knew how to find the area agency on aging and I knew how to find the caregiver. I was able to do all those things. So I didn't even know that it was a category until I started doing some of this work. Having that knowledge is what sort of saves people. And my experience was 20 years ago. So, there was far less information around. It was not as easy as finding more of those services today.

But also many of these communities, you know, service providers, sort of band together and they form organizations. And I’m going to talk about one of the largest ones and I’m going to use some of the examples I know from living in the Virginia, Maryland and D.C. area, which is where I live.

So there’s something called a Coalition for Geriatric Services, and you have handouts that show some of these needs for several of the categories and the 200 member organizations provide A to Z view of services and you have all that in front of you, so I’m not going to go through any of those pieces.

Then Anna asked me, because there’s so many actuaries, that we had to have charts. So I, I have charts. Anyway, I think, an interesting contrast [is] who’s renting, who’s owning, how many people have mortgages. I know at a lot of the Employee Benefit Research Institute meetings, people will sort of wring their hands over the fact that so many of the baby boomers still have mortgages and people coming along will even be worse off. So, this is to show the breakdown of that, how many people are renting, the contrast between those who are under age 65 or have no one in the household whose 65 or older and then the oldest. And I thought it was pretty interesting that the oldest member in the household being 85+, such a large number, have no mortgage. Actually 61 percent, although you could look at the 39 percent [and] say it’s not good at all.

And then, these are the sort of the snapshot of older Americans and I have, if anybody sees the statistic and they want to know where it comes from, I have sort of an annotated version with me of where all the statistics are from so I can e-mail that to anyone, since I didn't want to load up my slides anymore with footnotes. Anyway, 26 million households or 23 percent of the nation's households included someone age 65. More households will have older women living alone. That's another one of these really sort of dire statistics and that is, that right now in the baby boomer, the youngest cohort of baby boomers, we have the largest group of never-married women ever. Nearly 25 percent. So those are people that are going to be living alone and looking for ways to help each other, I think, as they get older. But they're probably going to be worse off than the current group of women that are there, who at least have these large numbers of people who are available to help them.

So there are going to be more households with older women and you look at the numbers, you see 71 percent of men live with a spouse compared to 42 percent of women and when you get up past age 85, those numbers are, I think it's something like 85 percent of men live with someone and for women its 16 percent at that age live with someone.

So those are the reasons why women end up having to go to institutional care, because they don’t have anyone to help them. So I think the more of these communities that develop where people can actually get some sort of help will make a big difference and all the services that the businesses can provide. This was also sort of surprising to me. Nearly all adults age 65+ living in their community and only 4 percent of Medicare population living in nursing homes. Of course, most of that population, as I just said, are likely to be women and then only 2 percent live in community housing.

So, I’m going to flip over this one as well. Because I’ve already said this. The research confirms nine out of 10 want to live in their homes as long as possible and 80 percent would like services right in their home. They don’t want to be going out and having their blood pressure taken by somebody else. They’re looking to have, you know, innovative technology, get your blood, you know, take it yourself. They have those little machines now. They use them a lot in rural communities and you can have the answer back from your doctor within an hour about whether your medication needs to be changed, as opposed to driving for medical appointments. So there are studies that have been showing that that’s what people want. They want more, better technology so they can stay where they are.

I thought I’d talk a little bit about aging in place and what some of the criteria are and because the Administration on Aging did a study of over 200 households in the area that I talked about in Maryland, and a livable community is usually defined as a community with affordable and appropriate housing, supportive services and adequate mobility options, which is transportation obviously. And, the research that the Administration on Aging did, it was—it's got two broad frames. They consider Stairmasters and Stair Lifts and the Stairmasters, the way they break down all the criteria, these are the positive aspects of aging, and the Stair Lifts are those that require health and mobility assistance as it declines. And these are considered the four pillars after researching with all of these households, and it may sound pretty obvious, but it's financial stability, health stability and then the informal support networks that I mentioned in relation to even my parents, it's sort of knowing that these things exist and getting a hold of it. And that's something that groups like the National Council on Aging are really wonderful at doing. It's just that they're sort of a drop in the bucket for what's needed. So I think there are a lot of great models out there, that businesses could even sort of copy and maybe formalize in a way that more people would know about it.

And then knowledge and use of the public/private aging services. So, people, obviously, don’t have as many choices if they don’t have the money to cover their expenses and that’s going to be a huge problem and especially it’s women. They’re the ones that are least likely to have the income that’s needed to help them throughout their lifetime. So I don’t want to depress you as the last speaker before the cocktail party, but it’s going to take a lot of alcohol to sort of get beyond those statistics. So I didn’t include them. But you know, obviously, the ability to stay in your current home, being able to pay for home modification and all those other things that are needed, and that increases and one of the things that we try to tell people when we’re counseling them is that making those changes early on are what help people. The happiest seniors that I’ve seen are people who’ve maybe had to give up their homes. They didn’t want to do it, but they make those changes earlier in life, rather than waiting to be pulled out of your home like when you’re 78 and in a way that’s really so degrading, because you can’t pay your taxes and you didn’t tell anybody and you didn’t get the help you needed. So, I think there’s going to be a really big need for counseling services and a lot of the things that the financial companies do and that they don’t do for these populations. So, people are willing to pay for financial services, but a lot of them don’t, there’s just no accessibility. So it’s one of those things I’ve been working on for 25 years and every so often, I think there’s going to be a breakthrough, and then the whole world changes.

Anyway, so the lack of financial resources also can mean that people have to move or they’re either stuck in a place that they don’t want to be and they can’t afford any of the things that need to be done to make their home more safe. So, the second bullet here shows that, a health shock, stroke, hip fracture, all those things are a strong predictor of a forced residential move, and also there’s new research that’s being done now on, but it’s not available quite yet, what are the factors that keep people in their homes and what are the final things that make them actually have to move other than the obvious finances, which I mentioned.

And then there’s also disability issues and you know, you look at that bullet, the second one. Almost two-thirds of households with the oldest member age 85+ have a disability and that means big need for caregivers, and help to get people to survive on their own, and the things that people want most of all, as I’ve said, which are harder to come by. I was at a conference and I was talking about people needing help and women always being the ones that are the caregivers and this man came up to me afterwards and he was the CEO of a large company and he said, “My wife is a teacher. The whole neighborhood has adopted this 96-year-old woman whose son died; her husband died,” and he said, “I want you to know I take her to the doctor,” he said, “because I’ve got more flexibility than anybody in the neighborhood.” So I like to share that story. You never know where people are going to find help but somehow we need to get people doing more of that informal support work.

And then as I said, there were so many resources available that people don’t know about and I’ll tell you, in case any of you have elders in your own family, that BenefitsCheckup.org tells you everything. You could have an aunt in Minnesota and it would tell you how to find her a caregiver like that, how to get somebody into her home. So, I thought I’d throw that in.

So the essential aging-in-place supports are these three and this is what that Administration on Aging research came up with as well: transportation, accessibility, trustworthy services. And then here’s some of the policies to support aging in place: expanding programs that support home modification. One of the things that I’ve been hearing a lot about are how there’s so much technology innovation that now people that own buildings that are not senior accessible are able to have support without lots of construction. In the old days, you'd have to rewire the whole building to put in lifesaving supports and all that. And now there's so much innovation that that looks like a good thing in the next 10-20 years, that you'll be able to retrofit a lot of old buildings just by having all this wireless technology that we'll be able to keep people safe. Those alert things that are on the TV now is a possibility; it seems like every other minute, every station that I turn to has it. Or Life Alert is another example. If you are alone and don't have it, terrible, terrible things can happen. But we'll be able to all have them pretty soon because they'll be able to retrofit any kind of a building.

And then we're going to need to have incentives for universal design communities. There's a group in Columbia, Maryland, that was one of those communities that was built probably 30-40 years ago, where there are townhomes with community centers, with all the things that Americans say they want, grocery stores, and all of that and what they're doing is bringing in architects to design buildings, products and environments that are accessible for the residents. This is how to do it, and how to do it cheaply. So the communities kind of pitched together to bring in people to do those things.

And, I know, there have been other people I think that talked about the village concept. So I'm not going to talk about that very much, other than to say, it exists. But connecting older adults and in many different ways, so that they are able to stay in their own homes, that's the big thing with the Administration on Aging and their focus for the coming year.

Co-housing, Anna wanted me to talk about that a little bit. There used to be a lot of talk about this, less so now. But co-housing communities kind of grow up on their own, because people see the need. It ends up where there are people moving into areas and then they sort of realize that everybody there is actually over 50 or older and so they start to work around that. And you know, then they become more formalized; they have bylaws. They then provide more services. I know of a community actually, just outside Boston, where they've sort of taken over two streets, where there are two family homes and people have been, they bought them up, groups of people and then are trying to pool and provide all of these caregiving services and so I think there will be more of that because we can't rely on those 2,000 new apartments or that the Administration has found the funding for. I doubt that there will be a lot more funding in the future for any of that.

I thought I'd mention the village concept because I live on Capitol Hill and that's where one of the original villages started. But the first one was Beacon Hill. Beacon Hill, and then Capitol Hill and the idea there is that you'll pay monthly fees and you'll develop all these services. I find it very strange in my neighborhood because these are all people that actually don't need the services. So it's really much more of a social network. It's not, what, you know, we live in a city. It's easier to get a lot of those medical services and things. They're all provided. It reminds me more of like high school with who's in and who's out and everybody is just supposed to pay money to go to meetings and not talk about (LAUGHING) how to fix some of the problems that are going to happen when all of these people become much older.

But what they do is, they have an executive director. Many of them are turned into, well, the ones that exist, the 85 or plus that are in the United States. And they provide activities as well. So it's more like the country club atmosphere, I think. You join and then you have opportunities and I know that it doesn't work in our neighborhood because the few older people that have joined and have tried to get people to take them to the doctor, nobody wants to do that. Then the other type of community and I'm just breezing through this, because this is very much what I think has happened in a number of these communities that were never thought about being like places for the elderly, are these naturally occurring retirement communities where it just turns out that people end up being of that age and have similar needs and try to do something about it. And these are just the names of them. In the Midwest, they're known more as the naturally occurring retirement region.

Anyway, and a lot of these are partnered with the Office on Aging and service providers so they tend to work better for those who are actually getting up past age 75 to 85.

Finally, I will talk about the money. Those 50+ spending $3.5 trillion a year, and that's going to continue to grow and you heard from Tim about where a lot of the job growth is, so I won't talk about that either. But what's going to be needed are direct care jobs for the health issues that people are going to have and on those fact sheets that we passed out, there's a lot of different websites and I sort of narrowed it down by some of these slides, so you can see what's needed. So, I will end there and anybody wants to know those terrible statistics for women, I'm going to be talking about them. So thank you.

(APPLAUSE)

ANNA RAPPAPORT: We are ready for your questions and comments. I will comment on one of Cindy's handouts. If I look at the fact sheet from the Coalition of Geriatric

Services, I see a really long list of services that will be needed [and] I think two questions: Where are the implications of the aging society? What areas of our lives do they affect? I realize that the implications are all around us and they affect all of us personally and potentially many of us professionally. So do we have some questions or comments from the audience?

JAY SIEGEL: I'm a private demographic consultant. I want to say a couple of things. These are specific points. It's not that 10,000 people retire each day; it's 10,000 people reaching age 65. Most people have been retiring well below 65. Another point is that you have to draw a distinction, I think, between the intentions of male widowers and single women. Many widowers choose to go into retirement centers for different reasons than the women. The major problem with old age, of course, is health, but what's really the major problem is the premature death of men, leaving lots of single women, so that what we need is an affirmative action program to reduce the premature death of men. (LAUGHING)(APPLAUSE) Another detail. You used the expression "surviving successfully." I'm opposed to that term. The word "successfully" I know is widely used, even, in book titles, but it's highly subjective. It reflects adversely on people who don't retire successfully, even though they're doing all they can do. So, I suggest some other term. Now I can think of two possibilities. One is a relatively measurable, operational term, like "healthy aging," but that doesn't apply well here. I would just say "aging optimally," even though this term would be difficult to operationalize and measure.

I had one other thing unless somebody else wants to take the floor.

ANNA RAPPAPORT: And I think we, we want to focus on things that are creating opportunities and business implications.

JAY SIEGEL: Well, let me raise one other demographic item. Often you actuaries use period life tables. Now there's something called a longevity dividend, and that has two parts. One part is incorporated in a period life table, namely, the additional years that you get by living to an older age. If you live to age 60, you have a remaining life expectancy that indicates a total life expectancy well beyond what you may have had at birth. So you've gained a number of years by living to older age. And there's also the dividend that you'll get for living into the future because, presumably, there will be some prospective improvements in death rates. Perhaps they won't be as great as Jim Vaupel said this morning, but some. So, I just wonder why you don't make more use—maybe you do in your own records without using them for general purposes—of the cohort life tables that Social Security has put out along with the period tables, where there is an allowance for predicted mortality. Admittedly such tables have their problems because, for example, you can't get a very highly dependable cohort table for 2010 since you've got to project mortality 90 or more years in advance for the youngest ages.

ANNA RAPPAPORT: OK. We're going to take a question and then we'll comment, but let's keep it brief and then anybody else who wants to speak, please come up to the microphones.

LES LOHMANN: Tim Driver showed us some interesting slides about companies that hire 50+ and one showed a percentage of 50+ and I was wondering if he's been able to develop that same information weighted by pay? Because I notice that there are firms that seem to exploit 50+. I wouldn't point any fingers in this particular neighborhood, but perhaps in this particular neighborhood you will find a lot of older people working and frankly, I think they're being exploited. And of course, down the road, we have Wal-Mart. Not to point any fingers. Have you developed those tables at all?

ANNA RAPPAPORT: I'm going to jump in and just make a comment and then we'll hear from Tim. Tim's experience doesn't include groups of older people that stay on in their professions like symphony conductors, Supreme Court justices, members of Congress, sometimes CEOs and corporate directors. There is a cluster of professionals that tend to stay on in a very high end space and then Tim is really working in the middle space. So then maybe, Tim, you want to add some comment to Les's question?

TIM DRIVER: The short answer to your question is, no, we don't have. We haven't done that yet. You know, I'd love to take that particular analysis to the next level and look at it by pay and look at it by job level as well. That particular analysis was simply a sorting of the Fortune 500 by company in total. But thanks for your point and I would love to continue the analysis.

ANNA RAPPAPORT: Sandy?

SANDRA TIMMERMANN: I want to build on some of the things that Cindy said towards the conclusion of her presentation. We are nearing the end of our day and we can use an upbeat thought or two. There are a number of people in the field of gerontology who look at the aging of the population as a valuable resource of human capital, rather than looking at the burden that they're going to create for society. I also believe that we should look at the aging of the population as a big opportunity for both younger and older entrepreneurs to start businesses home remodeling, home care and independent geriatric care management, filling a need in the community to support the growing aging-in-place movement. And I believe that we should shift our mindset not only about the businesses that can be created but also about people in the "encore years," the healthy young-olds who have a lot to contribute and could hold some of the jobs that would support the aging population. So, let's take away the burden if we can and look at the opportunity.

TOM LEVY: This will be quick. The ultimate retirement community, if I understand it right, is Laguna Woods, which is a village of a little over 16,000 people in Orange County, California, which has no schools, forbids residents under age 50, has community centers all over the town that have seniors programs of every imaginable sort. And, certainly the people I know who live there are thrilled with it.

ANNA RAPPAPORT: We're going to give each member of the panel a chance to have a sum-up comment and I'm going to make a sum-up comment. So we'll just go around the panel and what other observations would you like to share with us? Cindy?

CINDY HOUNSELL: I don't know. Let Tim go first. He has a better observation.

TIM DRIVER: I would echo Sandy's point. I think that it's absolutely the case that this is an opportunity. There's clearly a lot of challenges to us as a society and us as employers, but the nature of the panel is innovative opportunities around us, and I think Sandy's point is exactly right. There's a huge amount of untapped talent that is available out there and yes, the pay question is a critical question and I think that one of the reasons why people have been involuntarily retired at such high rates has fundamentally come down to pay rates, and so that requires a lot of examination and people have to get accustomed to the idea. There might be a pay cut that goes along with that newly found flexibility, but circling back to this, this incredible pool of talent with these newly found 10 or more years of opportunity to contribute to society, is a huge opportunity for us as a society and as an economy.

NIGEL NUNOO: I would say, listening to my fellow panelists and thinking more about this topic, and realizing the interrelationships between all the opportunities we're discussing. If you remember my famous bridge? You know, an analogy where there's a need for a steady stream of income for the rest of your life. Things like what Tim's business brings with respect to, figuring out how much of your steady stream of income can actually come from a post-retirement work is a big component of it, and then some of the ideas that Cindy talked about. So, for me it's been much more of a learning opportunity and I'm hoping that, as we craft our products in the future, we're thinking about things outside of just the insurance space.

CINDY HOUNSELL: I guess the one other thing I would say is just that there's so many people out there that need help with decision-making and they're sort of on the cusp of either making good or bad decisions that they're going to have to live with for the rest of their lives and we need to figure out a way to help people to get that help.

ANNA RAPPAPORT: So as I think about the day and that this is the fifth Living to 100, I am focused on what does it mean to us knowing that we are living longer. We might disagree on how much longer, but we're certainly going to have more older people and many more people at older ages as the boomers age. Several of us have identified the problem that people need jobs at higher ages and many of them want to work to higher ages. We have also identified ways that we can do a better job of creating jobs and of making jobs more age-friendly. But we're only at the very beginning of meeting that challenge. There are opportunities for big and small business. But the people and organizations that simply do just the same thing they did five years ago aren't capitalizing on those opportunities, and they may lose out if what they are doing now is in decline. Listening to Cindy, there are nationwide opportunities for many, many small businesses, some of them in helping people adapt their housing. That's just one example of many in society. For those of us who are in the quantitative analysis business, there are also opportunities to do business analysis, to understand these issues better. For those of you that were in the prior session, where we discussed human resources and employment, Haig Nalbantian talked about the kind of business analysis that lets companies do a much better job of understanding their labor force and of adapting to the current and upcoming situations. I have two messages for all of you: I believe there are opportunities for many of us to do different kinds of analysis in new settings. We need to focus on how to make that happen. What has also has been mentioned intermittently throughout the day, starting out with Mark Freedman this morning, is reminding us that there are policy issues to address. In some cases, policies create barriers to desirable actions. I hope that all of you will become aware of the policy issues that are standing in the way of making the right things happen, become more active and advocate for policies that will do a better job. My personal plea is that everyone can go home Friday with a list of ideas that they can do something about.