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## Session 42PD
## Changing Patterns of Retirement—The Deferred Retirement Option Plan (DROP)

**Track:** Pension

**Moderator:** JOHN F. KALNBERG
**Panelists:** CHARLES CHITTENDEN
ROBERT STEVEN DEZUBE
ROBERT SUGARMAN†

*Summary: Deferred Retirement Option Plans (DROPs) are one of the hot topics for the public sector's retirement. DROPs allow for the accumulation of large lump sums for participants who work beyond their normal retirement age.*

*This session presents information on:*
- *How DROPs work*
- *Actual experience with DROPs*
- *The likely future of DROPs in both the public and private sectors*

**MR. JOHN F. KALNBERG:** Our speakers include Bob Sugarman, a lawyer with Sugarman & Susskind, who will talk about some things that are going on in the legal environment; Robert Dezube, who is with Milliman USA, and Charlie Chittenden, who is with Buck Consultants in Phoenix.

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**MR. ROBERT SUGARMAN:** The purpose of this session is to help you answer your clients' questions and help them design a DROP. A DROP is not just something you take off the shelf and hand to them. It has to be custom designed with certain considerations built into it based on what's best for each client. I've been working with DROPs for about six or seven years, and we have written a dozen or so of them.

DROPs started about 10 years ago in Louisiana, and they're most popular among public-sector employees because they usually retire earlier than private-sector employees. Now I want to explain what a DROP is, why people want them, how to go about designing one, and some of the legal considerations of the different variables within a DROP.

The "O" in DROP stands for Option. Some people say they don't want it because they don't know if it will be good for them. That's why it's an option. It's for the employee to decide whether he wants it. I'm not here to sell you DROPs. Initially I didn't like them, but now I do because I've seen what they've been able to do in terms of changing people's lives. They truly can have an effect on human behavior. A DROP is when someone comes into the pension office and says he's retiring, we place him on the retirement roll, but he keeps working. He doesn't tell his employer that he's stopped working, he just tells us he wants to retire.

We place him on the retirement roll and start paying out a monthly pension, but we don't give it to the member; it's not an in-service distribution. We keep it and credit it to a DROP account with the member's name on it. Month by month, that amount grows and earns some kind of interest. Then, when the member really retires, and really stops working, the monthly payments that we were paying to the member's DROP are paid to the member as though he were a regular retiree. The member then has access to the lump sum in the DROP. The member is freezing his pension prior to actually terminating employment. That's what a DROP is—someone retires for pension purposes some period of time before he retires for working purposes, and the pension plan pays the amount to an internally credited account to the credit of the employee.

Why do people want to do this? It's a very individual decision, and it's based on a person's career plans. Once a person chooses a DROP, the person knows that he or she is leaving. Some things to take into consideration include the person's retirement plan, financial arrangement, and whether or not he or she can afford to take the reduced pension to stop accruing benefits. Another consideration is the person's health. Will the person outlive the value of the lump sum to be received? You must also consider life expectancy.

One of the main reasons people choose a DROP is to get their hands on a lump sum of money. This is their main motivation. A mid-ranking police officer or firefighter, someone who's making $50,000, $60,000, or $80,000 at the end of

his career, who has a DROP for five years with a decent amount of interest paid to the account will have somewhere between a $250,000 and $500,000 available as a lump sum. Add that amount to the person's 457 plan, add it to the present value of his pension, and add to that the payoff for accrued sick and annual leave, and what you have is a person who can retire in his or her mid-50s from public service as a millionaire. This is more money than most working people have a chance to accumulate over their lifetime and it gives them a chance to leave something for their children or kick off their retirement, buy a retirement home, or start a new business.

This is a very powerful lure. It is such a powerful lure that three or four years ago, 80 percent of the people who were offered DROPs took them. Now everyone does. It's an offer that's too good to refuse.

DROPs came about because some people who had hit their pension caps wanted to keep working and give value to their added years of work, but now that has been discounted, and people just want to get into a DROP.

A DROP is also a powerful tool for management because the plan stipulates a maximum participation period, so management knows when a person is leaving and can then recruit a replacement. This can lift morale among the troops, because they know promotions will be available as more senior-ranking officers leave. These are some of the reasons that people want a DROP, but the real reason is to get their hands on somewhere between $250,000 and $500,000. Now that I've told you what a DROP is, let's discuss some of the variables and questions clients will ask you.

The first question is: When is a member eligible to DROP? The most common answer is at normal retirement age, sometimes at an early retirement age, or if the plan has a cap when the person hits the cap. Sometimes there's a window for DROPping, which can make the plan easier to sell. We did one plan this way. Once the person hit normal retirement age, he had a year to DROP. If he didn't, he lost the chance. This is a powerful tool for management because it gets employees to do what they want, everybody chooses to DROP, and management knows these people will be leaving within five years of their normal retirement age.

The next question is: How long can a member stay in the DROP? How long can he or she work after having been retired for pension purposes? The usual answer is five years, although now I'm seeing some DROPs negotiated for three years. As long as a member is in a DROP, accumulation will continue for the agreed upon maximum period. The member can always leave earlier, but there is a maximum, usually five years, sometimes three. But what happens when the member has been in the DROP for the maximum period?

I read about a plan recently that says if a member doesn't DROP within a year of

reaching normal retirement age, he can still enter the DROP later. However, he still has to be out of the plan within five years of reaching normal retirement age. So, the amount of time a person can participate in the DROP is diminished by the amount of time he stays after normal retirement age. When management starts a new DROP there are usually grandfather provisions that stipulate whether or not the member is already past normal retirement age. The member has a certain amount of time to get into the DROP and can stay the full maximum period.

But what happens when someone hits the DROP limit? That is, when a person has been in the DROP and has had the plan for the maximum period? A few years ago, the state of Florida started a DROP that requires the employees to sign an irrevocable letter of resignation upon entering the DROP. The employee signs the letter saying that he or she will resign within five years. One possible answer is the member must actually retire. This causes some problems. First of all, it may dry up a source of employees available for promotion. To illustrate, a DROP was in effect in a Fort Lauderdale-area fire department when the chief retired. A new chief was needed, and the assistant chief in line for the job had been DROPped for two years already. The department didn't want to make him chief for just three years, so we amended the plan. If you're a department head you could stay in for seven years instead of five. What you may be doing is drying up the source of internal promotion. If you promote from outside or if you bring in any high-level people from outside, it doesn't matter, but that's one possible consequence of forcing people to retire.

Another problem is changed life circumstances. Sometimes kids are like boomerangs—you think they have left home but then they come back, perhaps with their own child. This is a true story: an employee who had DROPped had to adopt his granddaughter so he could get her on his insurance. As a result, he had to work longer because his retirement plan was thrown askew when his daughter essentially put the granddaughter on his doorstep.

There are other reasons a person must continue working as well. These include being able to keep health insurance, an unhealthy spouse, or a promotion. A common response to changed life circumstances is to tell the member, "That's too bad."

I don't like it when my clients have to make heartbreaking decisions, but sometimes they have to force somebody to stop leaving even though they need to keep working. One alternative is that the member is forced to quit; and another one is that monthly payments to the DROP account are stopped and the DROP account is frozen upon hitting the maximum. Nothing more goes in—no more interest, no more monthly pension payments—so essentially someone winds up getting about 20 percent of the package if they have to keep working.

One solution is to continue the monthly payments but stop interest from accruing.

For example, if someone has $300,000 in the account and it's paying six or seven percent a year, it costs the member $20,000 a year to keep working. Another possibility, like they do in Baltimore MD, is to start working and accruing credits again. The person DROPs and then un-DROPs. This can be a contentious practice. The most common solution is for the person to stop working and leave.

What happens to the employer and the employee contributions to the plan if a member DROPs? Under the state plan for the retirement system, which is noncontributory for the employee, the employer contribution goes down.

I do pension law and union-side labor laws, so one way we sell this to employers is to tell them their contributions on behalf of the employees will stop when they DROP. Now we know that even in a totally funded plan, that's not exactly right. What I'm saying is the employees are no longer accruing any more pension liability, and therefore the employer won't have to pay more on them compared to a newcomer. But what happens to the employer contribution? You can even write it into the plan that the employer will no longer make contributions. It's a fixed or minimum employer contribution to the plan, not just one that keeps it actuarially sound. Sometimes adjustments like these are necessary to sell the plan.

What happens to the employee contribution? One way of selling it to the employees is to give their contributions back to them. If the contributions are after-tax, that's fairly easy to do with a computer. If the contributions are picked up, that is more difficult to do. If we propose a DROP and the employer says it will have difficulty adjusting its computer system or the payroll system to no longer pick up the employee contribution, we can tell the employer to give the employee contribution to the pension plan and we'll put that in the DROP also. This actually maximizes the DROP. The best solution is for the employer to stop paying it and for the employee to divert it to a 457 plan, assuming the employee hasn't maxed out. That's the best deal for employees because they have more money available to them when they retire. By the end of a career, an employee will probably be able to roll his or her IRA 457 plan, and anything else into one plan. These are the things we have to decide about contributions.

A big liability issue is how much interest the DROP account will earn. Some plans say the actuarially assumed investment gain is how much each person's account will be credited. That's good for the employee because it's usually a good amount and it's also easy to determine and good for the trustees.

The employer doesn't run any additional liability, but of course, if the plan doesn't earn that amount, the employer is responsible for the difference. If they earn more than the amount that would benefit the employer, we're talking about defined-benefit (DB) plans.

The next question is whether or not it is going to be the same as the plan assets

earn. For most municipal plans I represent, the most common answer is to quarterly credit the actual investment return of the plan—sometimes net of investment expenses, sometimes not—to each employee's DROP account. The problem with this as lawyers for trustees is that we create tremendous trustee liability because we know the stock market is cyclical and that the DROP is three to five years. Someone could easily get in on the top, and then when they leave five years later, they could be on the bottom. They could actually have less money than was deposited into the account for them each month.

Since we know that pension participants can invest money better and earn more money than the trustees, we know that's where we're going to see possible liability. It's also my prediction that as the baby boomers like myself start retiring and reaching retirement age, they will be able to tap into the cadres of underemployed personal injury lawyers who are watching their medical malpractice and auto accident cases decrease and looking for cases that have attorney's fees hooked into them. They are now going to go after the trustees, saying the trustees should have done a better job of investing their money because pension plans are the longest of long-term investments. Instead of investing on 25- and 30-year horizons, we've got to invest money for somebody on a five-year horizon. If people money, they're going to sue you. We haven't had any real problems with this the last three years because participants' accounts have doubled, but the problem will come somewhere down the road.

One solution to this problem is a self-directed DROP, which the 457 vendors are now selling, such as International City/Country Managers Association (ICMA); Gabriel, Roeder, Smith & Company; and the Public Employee Pension Security Coalition (PEPSCO). With this plan, you are given a menu of mutual funds and you invest money in them. This supposedly lessens the trustees' liability, although they still have the liability of monitoring the performance of the mutual funds, making sure that they have been given the right menu because they have fiduciary duty for that, and possibly making sure state-mandated investment guidelines and restrictions are followed on investments inside the mutual funds since they, at all times, remain trust fund assets. If you can jump over those problems, a self-directed DROP is an easy way out. One disadvantage of a self-directed DROP however, is that the fees are about double what we pay for investing money.

**FROM THE FLOOR:** I just want to make sure I'm not losing sight of a couple of things. I assume this money that's going into a DROP is going out the side; there are no tax issues for the individual throughout this whole thing, correct?

**MR. SUGARMAN**: Right, they can't get their hands on it.

**FROM THE FLOOR:** If you give self-direction does that bring in constructive receipt issues?

**MR. SUGARMAN**: We don't believe so because it remains an asset of the fund and they still can't get their hands on it. But frankly, I asked that question to vendors and they're out selling the products. I thought they would have invested in the private letter ruling and gotten one that said that.

**MR. MICHAEL CARTER:** (Watson Wyatt) If we're going to take a question, why does that not make it become a defined contribution (DC) program inside of this defined benefit (DB) plan subject to the 415(c) limits?

**MR. SUGARMAN:** That's the problem that we face, and we're going to be talking about that. My answer to that, and you'll probably get different answers, is it's still a DB plan. It's a different way of getting to the money. It is definitely an ascertainable return. It's whatever the fund happens to be paying, but you do need to do a 415 test when the people retire to take the annuitized value of their lump sum and add it to their monthly pension and see if that gives you a 415 problem.

**MR. DON SEGAL:** (The Segal Company) Do you need spousal consent before this money goes into this account? It's acting like a DC plan you've changedfrom a DB plan, and you have an implied distribution that all of a sudden turns this into a DC account.

**MR. SUGARMAN:** We never looked at it that way. We contend it's a different way of paying out the DBs that's a possible problem. I'm talking about non-ERISA plans anyway and that's why we don't worry about the spousal consent.

**FROM THE FLOOR:** Getting back to the 415(c) limits and the split, what you do allow? I've always been surprised that this is for people to either invest themselves or have the plan asset rate. Now, you don't have a definitely determinable benefit and that's what I think Don was talking about.

**MR. SUGARMAN:** I understand that, and our answer, which might not be the right one, is "Yes," it is a definitely, determinable benefit, meaning it's not set arbitrarily by the employer or the trustees. Whatever they earn, whatever actual rate of return is written down, that's what it is.

**FROM THE FLOOR:** But you can't write a formula or put it in a methodology where it's predictable.

**MR. SUGARMAN:** That's the other side of the picture.

**FROM THE FLOOR:** Have you gotten a private letter ruling on that?

**MR. SUGARMAN:** No, we have not. We have gotten favorable determination letters for pension plans that contain these determined DROP provisions. But you're hitting on the core problems of DROPs. So far we, along with the actuaries, have

not seen that as being a problem. The answers I gave you are the best we have so far, but that is a concern. It's not stopping anybody from doing it, and Florida does have IRS approval on its plan, which pays a fixed rate of return. This is one of the things I'm about to talk about. One possibility is that the DROP earns the same as the plan's investment portfolio earns. Again, that is probably the most popular, but only because DROPs came in vogue at the same time the stock market was going up. Now people may be content with something else.

Another one is earnings from another fixed-income portfolio. This lessens trustee liability. All the DROP money is put into a fixed-income portfolio, which pays what that earns or a fixed amount. Florida pays 6.5 percent. Another plan pays a minimum of 3.5 percent of what the plan earns. We're seeing more of paying a fixed amount. Of course, if a portfolio earns more than the fixed amount, the plan benefits from the difference. If it earns less than the fixed amount, the employer has to make up the difference. A 6.5 percentage like the Florida Retirement System's is a pretty easy target for the plan to hit. You have to decide what interest is going to be paid and how you're going to determine it and then navigate through some of the problems that we've discussed. The safest harbor is a fixed rate because the employee knows what he will be getting. He can't sue you because he thinks the plan should have earned more.

It is a definitely determinable rate but it may not be as popular until some of these stories calm down about how everybody's DROP accounts doubled in the hot stock market. It's not as popular as following the investment return of the plan.

Another question to ask is if the monthly payment to the DROP still earns a cost of living adjustment (COLA) if there is one. The usual answer is yes. Are costs deducted from the DROP? It costs money to set this up, to maintain it, and to maintain a separate accounting. The answer is usually yes if you're not using an outside vendor who takes plenty of fees itself. Normally, our plans charge somewhere between 50 and 75 basis points, which includes the investment expenses for administering the DROP. The software is pretty easy to find. A technical issue might arise if accrued leave payoffs are included in annual final compensation. Are they included when a member DROPs? They probably should be, because the employee is considered to be retired. But what happens if the employer doesn't have the money to pay them out? Does the employer want to pay out these accrued leave payments in large amounts before the employee actually leaves? Does the employee want to receive them and have them taxed at the highest rate? Maybe the answer is that they will be constructively paid. In other words, we find out what the payments would have been had the member taken them and calculate that into determining the average final compensation, thus determining the employee's benefit.

Some plans actually pay them out, and then you've got superannuated employees with no leave backs. Will the member still be eligible for disability benefits while in

the DROP? I suggest the answer should be no. That is the most common feature, and anecdotally, one of these days someone will do the statistics on this. Once you put in a DROP, the disability applications among middle age and older employees go down, usually to zero, because they want to get their hands on the lump sum of money.

The only disability you're really going to see are the very young employees who can't quite see the DROP as being in their future and the catastrophic disabilities. All the cases that we've had with high blood pressure and bad backs and the blown knees went away when we had DROP accounts in every single client that we did it with.

The next question is, can a member self-contribute to the DROP? If the member has to take the payout of the accrued leave, can he shift it over into the DROP? No. Not unless you force everybody to do that, in which case you wouldn't have constructive receipt of it. But some people want to contribute to the DROP because they don't want to take that money as taxable income, or they want to use the employee contribution they're no longer making as a self-contribution to the DROP. We have one client who has DROP loans. People put the money in, and then we follow the IRS loan rules, and they can borrow the money out again.

Once somebody has hit the DROP limit and stops working, how does he get his money out of the DROP? When we first wrote DROPs, we said participants could have it however they wanted. It's kind of like a bank account; if you want a lump sum, we'll give it to you; if you want us to annuitize it, we'll do it; if you want to tell us how much you want every year, we'll give it to you. It's too much trouble, so we don't do it that way anymore. What we try to write into a DROP is that when a member hits the limit at the end of the quarter after he or she retires, after leaving the end of the quarter so we can calculate the investment return, the person takes the money out either as a taxable lump sum with 20 percent withholding or rolls it over. Why do I want to do that? I want to lessen the trustees' risk. I want them to stop having to produce this investment return that's guaranteed or stop the risk that they may be sued if the participant's not happy with the amount of the return. However, now you've got participants dealing with more money than they've ever seen before. What are they going to do? I don't believe we have any liability to provide them with investment advice, but sometimes it's a good idea to do so. In one of our plans, when we put out the request for proposal (RFP) for the annual audit of the plan to the account, we said, by the way, hint, hint, our members need financial planning when they get their DROPs. A consultation was then offered with a financial planner with no pressure to sell them anything, just to give them some advice.

What if a member dies or is disabled before a DROP is paid out? If he's disabled too badly and can't work anymore, he gets regular monthly pension payments and access to the DROP fund. If he dies, the DROP balance becomes payable to his

designated beneficiary, and whatever benefit option was chosen remains payable to the survivor. Another DROP consideration is whether workers will stay at work longer, deferring the hiring of new workers and promotions.

In a 25-and-out plan, were people ready to leave after 25 years? With a five-year DROP, we're bribing them to stay another five years. Do we want to do that? Will employer costs go up because these top-value employees are staying? Or will they go down because the employer doesn't have the recruitment costs for replacements, doesn't have the testing costs for the promotional procedures, and no longer is incurring additional pension liability? When you cost out the plan, I suggest this is something you need to look at.

What's going to happen to the member in terms of Section 415 when he withdraws and has tax bite problems? The biggest consideration, and one that could put big pressures on you as actuaries, is cost neutrality. The word is already out there that DROPs are cost-neutral. There's going to be pressure for you to say that DROPs are cost-neutral, and that's a big decision you have to make that is affected largely by employee behavior, for which we have no statistics. How many people are going to go into the DROP? I don't think a reliable database exists that can help us predict employee behavior. However, those of us who work with DROPs have seen that everybody goes into them, but we still don't know if someone who is planning to work 30 years is going to DROP at 25 and then work an additional five years under the DROP, in which case benefits are paid out sooner. Or if someone was planning to go at 25 but now is going to stay the extra five years to accrue this lump sum. The pressure will be on you to say it has either a neutral, or de minimus, effect. I don't know how you do that without predicting this kind of employee behavior.

Next we'll discuss whether a DROP is a DC plan and whether it can it work in the private sector.

**MR. CARTER**: Do you address Section 72, Basis Recovery Issues with your clients when they take part of this benefit in a lump sum? Because quite frequently the plan—even if it has had employee contributions under 414(h)(2)—would have had some post-tax contributions made prior to 1983, 1986, or whenever it went 414(h). Also, if they've done any service purchase during the time of employment prior to DROP, could there be after-tax dollars?

**MR. SUGARMAN:** Nobody has ever looked at that or called that to our attention, no.

**MR. CARTER:** I would suggest that you make your clients aware that under Section 72, part of the benefit is paid in a lump sum, part of the benefit is paid in a monthly income; therefore, under Section 72 you should apportion the after-tax investment in the contract between the two pieces.

**MR. SUGARMAN:** We leave that up to the actuaries.

**FROM THE FLOOR:** You said most of the time DROPs are set up at normal retirement age, which for private plans typically would be 65, but I take it that's not the case in most of the plans you're dealing with?

**MR. SUGARMAN:** Most of the plans I deal with are public sector plans of 20 or 25 and out, so most people are 45 to 55 years old, usually in their late 40s, when they go into the DROP. We're just now starting to see general employees take them, but they're generally at normal retirement age of 60-62.

**FROM THE FLOOR:** Is an advantage of a DROP versus a normal retirement perhaps that they could start making distributions that are tax-deferred and they won't have all these early distribution issues?

**MR. SUGARMAN:** The advantage is that participants get their hands on a lump sum of money. Variables have developed that reduce the risk for employees and the trust funds. One of them is a partial lump-sum distribution. For example, if a member wants $200,000 to buy a vacation home, he's given that amount, but his pension is reduced by that amount as well.

Another variable is called the back DROP. This happens when the person retires and then asks you to calculate what his or her benefit and return would have been would have been had the person DROPped five years ago. For these plans, the return normally matches the investment return. I think this eliminates a lot of trustee liability, but obviously, you're going to have adverse selection. Then the employer loses its incentive, which is what I call the most powerful management tool—knowing when people are going to leave. Most people who are in a five-year DROP normally don't stay the whole five years. They stay three and a half to four and a half years. However, as retirement ages push back through collective bargaining to 20 and out or 25 and out, participants will probably stay the whole five years. Say you've got someone who's going into the police or fire service in his or her early 20s. That means if the person is entering the DROP in their mid- to late-40s, he or she probably will stay the whole five years.

**MR. ROBERT DEZUBE:** I'm a consultant with Milliman USA, and I've been involved with DROPs for six or seven years. We are a consulting actuary with Florida, which not only put in a DROP for its uniform employees, but also for about 500,000 general employees, teacher employees, and legislative employees. This raises one interesting question before we get started: What if you go into DROP for five years and you are elected into an office and your term is going to last beyond the five years? According to the rules, you have to resign from your office and DROP unless you're in the legislature. Then you can pass a law to extend the DROP rule. I'm going to look at this from an actuarial point of view, and it's going to somewhat repeat the things that we went over from the legal point of view, but when you

look at a DROP from the actuarial side, you have to look at everything. I will not discuss the compliance issues, though.
I'm going to focus on two items: (1) cost determination and (2) plan design. It's really what you, as an actuary, can or should do when you're consulting with a client on a DROP.

In my mind, cost determination is a measurement of the impact of the DROP on both the liabilities and the annual cash contributions. Because DROPs started in the public sector, there isn't an expense issue. It's possible that when DROPs do move into the private sector you'll also have to worry about the expense side, but for now I'm just going to focus on cash contributions and liabilities. It's also selection and analysis of assumptions. We've heard there are a lot of assumptions involved, and one of the key assumptions is the retirement age. If you've dealt with pensions, you know that if you lower the retirement age, costs usually increase. If you raise the retirement age, costs will decrease.

When you look at cost projections and fund analysis, you also have to look at cash flow, as was stated earlier. Normally, when you invest in a pension plan, you invest for the long term, 25 or 30 years. With a pension plan that has payoff projections, you can often measure how much tax you're going to have to distribute to retirees each year, especially when your group is large enough. When you put in a DROP, you're going to be paying out lump sums after five years, so that's going to affect your cash flow and your investments. When you look at your cost projections, you have to figure out how payroll is looking at it from a pension consulting point of view. That's payroll for people who you're making cash contributions for and who are still accruing benefits while the employer may be looking at a bigger payroll that may include people who are still in a DROP but you're not making cash contributions for. When you talk about cost as a percentage of payroll, you have to be careful what type of payroll you're talking about.

The cost of the DROP is going to be affected by four items. First is the retirement pattern. It's the purpose of the DROP to make people retire earlier or retire later. For instance, in Florida uniform employees can retire at age 55, or after 25 years of service. The rest of the employees can retire at age 62, or after 30 years of service. Historically, the average retirement age has been maybe two years beyond the normal retirement age. Therefore, the plan is actually saving money before you put in a DROP because people are not retiring when they're first eligible for unreduced benefits. When you put in a DROP, it says that you have to make your election when you hit unreduced retirement age or within three months. If you're cutting off employer contributions at that point, you're actually reducing the retirement age by two years, which is going to increase your tax contribution.

Conversely, if people are retiring before a certain age (for example, you want people to stay until age 60 and they've been retiring at age 55 or age 57 if they're in a uniform type plan), by saying they have to work until they're 60 before electing

to DROP, you can keep people in your workforce longer and actually decrease the cost of the plan. The DROP could also be cost-neutral. It could cost money or it could save money, depending on what you try to do with the retirement patterns.

The second item is the benefit amount. Who will assess the benefit amount? When you calculate somebody's benefit, it's governed by three variables: (1) the final pay, (2) the average years of service, and (3) the accrual rate. Depending on the years of service and the pay raises, the annual benefit can go up or down. For example, say an employee has 28 years of service and a final average pay of about $48,000 with a 2.3 percent accrual rate. If he or she is eligible for a DROP, the employee's benefits would be $31,455. When the employee goes into a DROP, he or she is going to pay that $31,000 into the DROP account with a three percent COLA each year, so the benefit's going up by three percent per year, accumulating at eight percent investment. When the employee comes out, he or she will have $202,000 in the DROP, plus his or her pension after five years will have increased by the COLA to $36,465.

To compare apples to apples, I convert the lump sum back into annuity, again using eight percent investment, three percent COLA, and if I want to be real precise, I use GAM 83 mortality. The total benefit this employee is going to get after five years of DROP would be $50,592. If the employee had stayed in the plan five more years and had gotten pay raises of 6.5 %, the years of service would go up from 28 to 33, his or her final pay would increase from $48,000 to $66,000, and the employee would get a benefit of $50,792.

In this example, the employee is losing money by going into DROP if you convert it to an annuity. This 6.5 percent pay raise sounds high for the public sector, but in Fairfax County, Virginia, there's been a lot of debate recently about teacher raises. They're arguing whether the teachers should get a two percent COLA or a three percent COLA, and I don't want to say whether or not it's merited, but it was lost in the argument that when we throw in step raises and seniority with the three percent COLA, the average teacher's salary will go up seven percent. In Florida, even when the legislature says the average state raise is three percent, we find pay raises of eight percent and nine percent in a lot of places, so there's more than just the COLA.

If the pay raise is reduced to, say, three percent (remember this is still the same number because the pay raises post 28 years of service and the DROP account is worth $50,592.) the benefit now is only about $43,000. In this case, a DROP is much better. The point I'm trying to make with all this is that when employees are deciding whether to elect to DROP, they have the lure of the large lump sum, which is a powerful thing, but it may not always be the best financial decision because they have to factor in future pay raises, etc.

Here they still continue to accrue service. Service is capped at 30 years in a lot of

plans, so they would not necessarily accrue service

The third item is adverse selection. You may be asking how you can have adverse selection with a DROP. You might assume that either 25 or 50 percent of all people are going to elect to DROP, but it could be the 25 percent who the DROP benefits the most will elect the DROP. For instance, an employee has 10 years of service and will have 15 years of service by electing to DROP. From service alone, the person's pension is going to go up 50 percent before you add in pay raises. Those people probably should not elect to DROP. It is possible that the people who are the cheapest from the pension point of view will elect to DROP, so there is some adverse selection.

Another question is whether the employee has the right information to make the perfect election. A person may not know which is the better decision without doing some financial analysis. Investment returns can also govern that. You have to watch out for adverse selection.

The last issue is the length of DROP participation. Usually when we talk about normal costs, we're talking about those paid only for active employees. When a person DROPs, that person is considered to be a retired employee so you don't pay normal costs. From an employer's viewpoint, if an employee DROPs for one year at age 60, the employer saves one year of normal costs, but then the employee retires, a replacement is hired, and the employer has to start paying normal costs again. So the employer has saved only one year of normal costs. If the employee DROPs for five years, that's five years the employer doesn't have to pay normal costs, so the employer thinks it's saving more money because the replacement doesn't come for five more years.

But we all know that a pension plan is a single sum game with a cost equal to the value of the benefits. You don't pay it through your normal costs—you will pay it some other way. But in theory, the longer the DROP participation, the cheaper the DROP is.

Let's go back to selection and analysis of assumptions. Usually, if you do a DROP study, you have to select several assumptions. One is, what percentage of people elect DROPs? When we first started doing DROPs in Florida, we had nothing to base the percentage on, so we assumed 25 percent would elect DROPs. We found that after it was up and running, about 40 percent elected to DROP. In another study we did for a state police plan, we thought everybody was going to elect DROP or 90 percent would DROP. We just got the first statistics, and about 10 percent of the police are electing DROPs, which is contrary to what you were saying and contrary to anything we believed. I asked the retirement administrator about it and she told me the word has gone out that if you elect to DROP, your career is over. We found that very interesting.

**FROM THE FLOOR:** We actually had a collective bargaining agreement proposal, and it said that people in DROP couldn't get promoted. That was the proposal made by an employer in collective bargaining.

**MR. DEZUBE:** That's one way to hold down DROP participation. The second assumption is the DROP duration—how long people are going to be in a DROP? Initially, most people want to elect it for five years, but we're finding that people do not want to stay in it that long. For whatever reason, they go into DROP thinking they can handle five more years of work. But then it doesn't work out, and they try and leave earlier. This is a key assumption. As I said, the shorter duration you assume, the more costly the DROP is going to look.

The third assumption is change in retirement patterns. If a DROP lowers the retirement age, the normal costs are going to go up. If the retirement age is raised, costs are going to go down. From an actuarial point of view and from a consultant point of view, you should be talking with the client about what he is trying to do with the DROP. Is it a goal to pay a lump sum? Is it a goal to lower retirement costs to keep people in? Is it to force out the deadwood? You have to make these assumptions as well as talk with the client about what he's trying to do with the DROP. Hopefully he's putting it in for a reason other than it was bargained for.

Trends—the cost projections—are very unique. We used to do cost studies, and we would present them to the state like this: Your current cost is 16.91 percent of pay. If you put in a DROP with 100 percent election, your normal costs are going to go up 14 basis points. Your unfunded is going to go up 17 basis points. Your total costs are going to go up 31 basis points, or 0.31 percent. You'll have a cost of 17.22 percent, and your actuarial liability is going to go up $546 million. That's how we've traditionally presented results to most of our clients. I think a lot of people do this. This is from 1995. When we started talking about different payrolls, we analyzed it a little bit further and found out that the DROP contribution, or the cost of the DROP program, is not constant or not steady.

The DROP people are spread evenly—20 percent elect one year, 20 percent elect two years, 20 percent elect three years, and there's a 25 percent election. When the DROP program was first put in anybody who was beyond unreduced retirement age was also to elect to DROP. In the future, you have to elect DROP when you're first eligible. You had some of the older people electing to drop and you got really unusual costs. The regular class is really the non-uniform. We found that putting in the DROP program would actually save them .09 percent and the cost goes down. The long-term cost is actually an increase.

If we had presented just a static number, the question is which static number to present. By giving them a table of what the costs are, we can show them a true picture. The regular class is initially going to save money, but then it's going to cost money. For police and firefighters, it's always going to cost money. That's really a

function of the retirement ages. It’s going to vary by groups, so you can’t use static numbers for DROPs. You have to look at it long term because you have replacement employees coming in. What we’re saying here is that your traditional actuarial math may not work. Somebody once asked, "Why don’t you just continue to have the employer contribute normal cots while somebody’s in the DROP?" The answer is because when an employee is in a DROP, you’re treating him or her as a retiree and you don’t pay normal cost contributions.

**FROM THE FLOOR:** Do you ever take into account non-pension costs such as lower salaries in your studies, even if you’re going to replace the individuals?

**MR. DEZUBE:** We have. That’s a good question, and it's something we always know is out there. It’s the same thing with an early retirement window. You know that you’re going to retire people at high pension costs, but you're going to save on salary. We didn’t know how to quantify it. I like to think of salary as an escalator: people get off the top and you replace them at the bottom. If you can get a feel of what the salaries are, and if people stay in the DROP for five years, you’re staying at the higher end of the escalator, so you don't have the salary costs. Whereas people who go out of a DROP after one year have to be replaced at the bottom quicker, so you do have cost savings. Usually we discuss it, but we haven’t been able to say it will cost you X here but save you Y over here.

**FROM THE FLOOR:** I have a question about the concept of not treating these people as employees. In Florida, by law, they have to be treated as employees except for this personal pension benefit. For raises, evaluation, and every other benefit, they are treated as employees, and in every count they are treated as employees.

They are treated as employees in every way except for disbursement into a side fund. I cannot understand why a normal cost cannot be allocated to them because they are employees, except they’re getting a separate benefit that is still accrued in the pension plan.

**MR. TOM LOWMAN:** (Bolton Offutt Donovan Inc.) I can justify it either way, and I think it’s really the employer's choice. They are employees, they are on the payroll, and if you look at your ratios of the DROP versus the same deferment that they get later, sometimes it’s more than 100 percent, sometimes less than 100 percent. Let’s say it's exactly 100 percent, with basically the same benefits, the same class of value, except there’s a different form of payment because normal cost is out again. It’s just a choice of party design, and you just have to be aware of it.

**FROM THE FLOOR:** You have to be aware that if you’re not going to fund the normal costs until the person actually retires, it can be a little raise. If you’re going to stop the normal costs at the point he entered the DROP to the extent that

compresses the time for funding, the normal cost rises a little.

**MR. DEZUBE:** As I said earlier, there's a zero sum game, but there is just one cost and it's just over what period you're paying it.

**FROM THE FLOOR:** But I take exception to portraying the situation as if this person is like a retiree and therefore there is no normal cost. A normal cost exists whenever a benefit is being accrued. A benefit is still being accrued for the person who is in a DROP; it's just accruing at a different rate than it accrued when the person was not in a DROP. So there is a normal cost accruing on that employee who is in a DROP.

**MR. DEZUBE:** If he goes into DROP and his pension is essentially frozen.

**FROM THE FLOOR:** It is not frozen; he is accruing a benefit at a different benefit accrual rate. Your example of the Maryland employee showed that clearly. You had a deposit into the DROP account, you annuitized it at whatever your interest rate was and three percent COLA, and you got an additional benefit. He had accrued an additional benefit during the period of time that he's been in a DROP.

**MR. DEZUBE:** I disagree with that.

**FROM THE FLOOR**: Mathematically, he is accruing a benefit.

**MR. DEZUBE:** Essentially, he's getting the lump sum.

**FROM THE FLOOR:** I disagree that he is accruing a benefit. If I am going to defend this to the IRS as still being a DB plan and a definitely determinable benefit, excluding the issue of crediting actual earnings but a stated rate of earnings, I can demonstrate actuarially that the person has still accrued an additional benefit for each additional year worked. The additional benefit is—or the accrual of the additional benefit—is the actuarial equivalent of whatever I'm crediting to the DROP account in that year that makes it still a DB plan. I believe the DROP has a problem in the private sector because it's subject to 411(b), Benefit Accrual Rules, and if the accrual rate has changed, it may be either higher or lower than the accrual rate for the employee not in a DROP. Again, your example showed that when you switch from a 6.5 percent post-DROP salary increase rate to a three percent post-DROP salary increase rate, his total accrual rate, if you look at it over his total period of actual service, is less than at 6.5 percent salary increase rate. His DROP benefit, total benefit including the DROP, has accrued at a lower rate overall spread across his total career than if he had 3.5 percent salary increase rate. That's where you run into a problem. The benefit that he is accruing is the actuarial equivalent of the increase of the DROP account.

**MR. DEZUBE:** How about a retiree? You're saying the actuarial value of the benefit

won't be paid?

**FROM THE FLOOR:** No, the retiree is retired.
**MR. DEZUBE:** I would argue that if it's a back DROP in which you make the choice afterward, you have that issue. Otherwise, it's the same as if he were getting the benefit and putting it into his own account, except he loses the tax deferral. One thing to look at is what are you going to earn, and how you are going to credit interest. This was talked about earlier.

If you want to save money, you credit less than the actuaries assume. Let's say the actuaries assume eight percent and you credit 6.5 percent. In theory, the difference between eight percent and 6.5 will save you some money or can be used to fund expenses. If you give a market rate of return, in a way, it is a wash. What I said earlier about the asset liability analysis was that you have to make sure you look at the cash flow. You've been investing for a 25-year duration, and you've been looking at these payout projections that say I'm going to pay X dollars of pension payments each year. All of a sudden now you're going to pay a lump sum starting in a couple years, and you're going to pay out lump sums every couple of years, so your payout's going to differ. It may affect the investment, which could affect your long-term rate of return, which could have some impact on the cost of the plan.

The last thing is the plan design appraisal, really the sensitivity of the cost to the plan term and the comparisons among various design alternatives. The only thing I want to say here is that if you're helping a client design a DROP, hopefully he doesn't come to you and say, "Here's what we've decided to put in, price it out." Instead you should work with him and show him the impact of eligibility age or the number of years in DROP on costs.

We had a surprise with one DROP. We always said that when you lower retirement age, the DROP costs money. In this case, because we had assumed such a high pay raise, the DROP had the opposite effect and actually lowered costs. This happened because we actually assumed an 8 percent salary scale. This was kind of surprising and a little bit embarrassing for us.

When you look at sensitivity of cost to the plan terms, you have to consider which group is eligible. The example I gave you earlier showed the uniform employees were more expensive than the teachers and regular employees. Look at the retirement ages and the DROP duration. Look at the benefit amount and the DROP duration.

Ancillary benefits are one other thing I want to comment on. Usually death and disability benefits do not go into DROPs, and we do expect cost savings long term because from what we've seen, disability/retirements do seem to go down. People in DROPS were actually allowed to go on disability. Essentially, they could un-DROP

and get the service connected disability benefit which is two-thirds of pay. It will be interesting to see the impact of this provision. It's obviously going to work against what we've been saying about DROP Plans. That is, they reduce the disability rate.

**MR. CHARLES CHITTENDEN:** I'm going to talk about DROPs and how they relate to phased retirement. Then I'll have a few words about adapting them to the private sector and what hoops you would have to jump through to accomplish that.

Phased retirement is a hot topic, particularly among public employers and large utilities. They seem to be concerned that they're going to lose too much of their workforce too soon, particularly their experienced executive staff. Perhaps a disproportionate number of that staff will be leaving all at once, so they're concerned about trying to hold people in place a little longer. Phased retirement in general means a reduction in hours, not 100 percent, and reducing pay commensurately. It means holding on to people under some arrangement that pays them some or all of their pension and Social Security while they're in this phased-retirement program. There are some impediments in the law, particularly regarding payment of pension benefits before normal retirement age while in service. I think DROPs interrelate naturally with phased retirement. I want to show an example of how that might work.

An individual earns $40,000 in the year 2000 by working full time, and then goes into a phased-retirement program. The individual reduces his or her hours by 25 percent each year for four years until safely getting down to zero hours. The person's pay would go down commensurately. What this individual has done is get a pension that's $20,000. In other words, the individual has already earned a 50 percent pension that he or she is eligible to take beginning in 2001, but instead of taking the $20,000 annually, the person takes annually increasing chunks of the pension each year until 2003, then takes the whole thing (Table 1). If the individual were in a DROP doing this, he or she would have the total income, and at the end of the day would have a lump sum of $17,655 for the unused pensions that wasn't received while he or she was in this program. This is a mixture of a pure DROP in which he or she would forgo the payments and actually retire and go into pension all at once. It's something in the middle and that's the idea of phased retirement.

Table 1

## Example -- No Social Security

| | 2001 | 2002 | 2003 |
|---|---|---|---|
| Hours | 1,500 | 1,000 | 500 |
| Pay | $30,000 | $20,000 | $10,000 |
| Pension | $10,000 | $15,000 | $20,000 |
| Total | $40,000 | $35,000 | $30,000 |

Table 1 is an example that I did with no Social Security. Table 2 is an example with Social Security. If an individual is eligible for Social Security and is retiring or going into a DROP, he or she would, of course, be able to defer more of the pension because Social Security kicks in. In this example, the individual takes only $5,000 of the pension in his or her second year and $15,000 the year after that. The total income is holding at about $40,000 because Social Security is coming in, but at the end of the DROP period, the individual would have $46,071. in a lump-sum payment that would be available under a traditional DROP. That would be the ideal.

Table 2

## Example -- Social Security

| | 2001 | 2002 | 2003 |
|---|---|---|---|
| Hours | 1,500 | 1,000 | 500 |
| Pay | $30,000 | $20,000 | $10,000 |
| Pension | - | $5,000 | $15,000 |
| SS | $13,900 | $14,200 | $14,600 |
| Total | $43,900 | $39,200 | $39,600 |

Phased retirement faces one obstacle: people don't want to reduce their hours, and therefore their pay, if it's going to affect their pension. A DROP naturally gets around that because it forgoes future increases in a pension in return for getting credit for the payments immediately. A DROP gives a person the advantage of getting his or her pay and pension for the same period of time, and it gets around that problem of phased retirement of reducing hours, which could affect the person's pension.

The advantages and disadvantages of DROP with respect to phased retirement are as follows: An individual has a fixed, known pension payment before agreeing to enter the program, and can use portions of that to prop up his or her pay while going through the phased retirement. The individual reduces hours and pay but it doesn't affect the pension. Pension is already determined based on previous service. That's the advantage. You still have the problem of premature distribution tax if the distribution begins before the age of 59.5, because it's not on account of separation of service. That's one of the disadvantages of phased retirement that a DROP overcomes.

Another obstacle is that we can't distribute to active employees before they hit normal retirement age without disqualifying the plan. However, there's a way around the problem. Let's say a plan has actuarial decreases for early retirement; age 65 is a normal retirement age; and the person can retire as early at age 55 but gets actuarial decreases for retiring early. This is very common. You can change the pension formula and match the benefits to the penny with a formula that has a normal retirement age of 55 but it has a different multiplier. Instead of a 1.25 percent formula, it will be 1.25 times N65 over N55. I can even put in the upper 12.

What happens with this formula is that it comes out to 0.46 percent of final average earnings times service instead of 1.25 percent. I say this because I have done it that way. Then what happens to an individual who retires at age 60? What do you give him or her under this new formula? You give him this 0.46 percent times his final average earnings, counting all of his or her pay, counting all service, and then you actuarially increase the benefits from age 55. That gets you to precisely the same place that you would be at if you started with the age 65 and gave actuarial reductions.

With this new formula, 0.46 percent, which is a completely different formula, you can distribute any amount that you want after age 55 and you don't disqualify the plan. With the old formula of 1.25 percent at 65, you distributed one dollar to one person and you disqualified the plan. This shows we've got rules and we've got ways around rules. The best of all possible worlds is the pension world.

Now I will discuss DROPs in the private sector. The first obstacle that occurs to me is the rule that an individual has to select the form of his or her pension no more than 90 days before retiring in the private sector. If the individual is selecting to DROP for five years, this is too early. I think we have to separate the election. The election to DROP is one election and the election of a form of pension can result in a totally different election. It doesn't have to be, but you can make it that way. If you do it this way, I think you can comply with this rule. If you think about it, the election to DROP can be like the election to choose a cash balance plan or stay in a traditional DB plan. It's an election the employee has to make, but it is not choosing the form of pension, it's choosing whether or not to DROP. I think DROPs in the private sector should be written so that when an individual retires, he or she doesn't automatically get a lump sum and then a monthly pension. It could be all joint and survivor annuity. The individual chooses the form of pension when he or she actually retires.

The second obstacle, which we've already talked about a little bit, is the 411 accrual rules. I think you run into a problem with this primarily when the DROP is either significantly richer or significantly poorer than the regular formula plan. The way around it, I believe, it to try and design a formula that is cost-neutral, actuarially neutral, and demonstrate that the accrual patterns will be the same. Whatever election employees make, their accrual rates are not going to be identical in each situation. If they were, you wouldn't have two plans, you'd have one plan. In other words, if you make the program as actuarially equivalent as possible, I think you can get around that.

Somebody mentioned the death benefit. It would have to be available in the private sector, but it really isn't a problem if you convert everything to an annuity and say that 50 percent of it is available to the surviving spouse. I think you comply with REA death. In other words, we have all these hurdles in the private sector, but I think we can jump over them.

Discrimination testing is another issue. For example, if you have only highly paid people who elect to DROP, you might have a problem, particularly if it was designed and is not really cost-neutral. Making it richer but with the proper design for cost neutrality would go a long way toward passing the non-discrimination test. Then there are age discrimination issues anytime retirement is forced. You have to talk to an attorney about that, because getting somebody to elect something five years ahead of time when circumstances might change may be a difficult sell, but it is doable. Maybe you don't really wind up with something that is a forced retirement in the private sector.

My general conclusions are that DROPs are a very natural design for safe retirement because they get around the issue of reducing the pension benefit as a result of reducing hours. They naturally overcome this, so I think they could be appropriate for private-sector employers who are considering a phased-retirement program of some sort. There are a lot of hurdles, and you have to try to overcome them. It seems to me that they all can be overcome one way or the other.

**MR. SEGAL:** What about suspension of benefits issues for these people who are still employees? Do they fit normal retirement age? If an individual is continuing to work, are you giving him or her accruals?

**MR. CHITTENDEN:** In the example I gave earlier for the age 55 plan, I am not giving the individual a suspension of benefits; I'm giving actuarial increases in pay and service on top of that, so I don't have to give any notice.

**MR. SEGAL:** But you're giving the individual additional accruals.

**MR. CHITTENDEN:** Yes. There is a question with that because the two plans I discussed were equivalent. They're equivalent until the person reaches age 65. If the person stays after age 65, then on the one that I started at age 55, I give a suspension of benefits notice when the individual turns age 65 even though he or she hits normal retirement at age 55. I give the suspension of benefits 10 years later, and then I just give him pay andservice; I don't give actuarial increases unless I want to. This is an interesting point. I never thought about how actuarial increases from age 55 get pay, service, and the actuarial increase. It sounds like you're giving the store away, and it's absolutely equivalent to what most plans are doing already, but it does illustrate why DB plans push people out at different rates at different times.

After a person reaches 65, a DB plan pushes him or her out because it's not rich enough. It doesn't get richer from year to year because it's no longer getting the actuarial increases in general. If you give a suspension of benefits notice and look at the graphs of how DB plans accrue, you notice the curve gets very steep up to age 65 and less steep thereafter. Why is it less steep thereafter? It's because the person isn't getting actuarial increases thereafter. This really isn't so much of a cost

item because if you give actuarial increases after retirement age, for example a 72-year-old, he or she gets a big increase. However, the individual is 72 and has fewer years to collect.

With a DROP, you give a suspension of benefits notice to somebody who's hit normal retirement age. If you're paying him or her less than full value, do you still give the individual a notice? I don't know what the law is. I think you still give the person a notice because you're not paying the full accrued benefits, what's been earned. You're paying an agreed-upon fraction of that, so you're withholding something.

**MR. LOWMAN:** This is more for the public sector than the private sector, and it's one of perception more than reality. The reality is that these DROPs cost money, but there are ways of doing it, and I'm urging some tolerance and awareness of two different perspectives. One perspective is are you active, are you retired, are you paying normal costs, or are you not? This also comes across when you have something like a 20-and-out plan. Someone will call it a normal retirement age and someone else will call it unreduced early retirement age. From that perspective, somebody will say a DROP gives someone a subsidized early retirement benefit even if he doesn't retire and isn't eligible for it anymore. The person shouldn't get it, and the reaction will be to cut some DROP benefits, such as not giving COLAs, or putting a percentage of the benefit into the individual's DROP account.

Somebody else will say a DROP benefit simply gives the person what he or she is entitled to at normal retirement age after 20 years of service and it's simply an actual increase to delay retirement. It shouldn't cost the plan any more money. Those are just two perceptions of the same event, and how you approach it will determine really how you react and how you design the plan. Again, it's all perception; it's not the cost. The cost is based on how you set the funding and normal cost and how you design the benefits.

**MR. CHITTENDEN:** My comment on what Bob discussed earlier is a financial decision. I believe, anecdotally, the reason you see so many public-safety people going into the plan—even though it might not look advantageous for them to do so—is that they don't believe the mortality table. They believe that they are going to die sooner than the average person. If you hang around firefighters and police officers awhile, you don't see many of them past their early 70s. Now that may change as the fitness of these professions increases, but firefighters and police officers believe that the job takes 10 years off their lives, so that makes the DROP more attractive to them.

A general point that is well known to actuaries is that employees generally prefer lump sums to monthly payments, and part of this thinking comes from a mistake about mortality. Employees have the perception that life expectancy is age 72, so they say, well, I'm 65, so I know I have about seven years to go. They usually very

much overestimate mortality, and as a result they prefer lump sums. It's not because they're anti-selecting the plan, it's just they can't figure out how to anti-select the plan and they need more education to do more anti-selection.