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Pricing Issues Related to Supplemental Health Products

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Summary: Panelists discuss pricing issues regarding supplemental products, which for this purpose, are defined as cancer, specified disease, student accident, and other special risk accident and health coverages. Presenters provide participants with sufficient opportunities to share their experiences and thoughts on these issues.
Topics for discussion include:

- *Underwriting*
- *Marketing*
- *Claims adjudication*
- *Pricing plan designs*
- *Other actuarial issues*

Mr. Darrell D. Spell: We're talking about supplemental health products. Let me introduce our speakers. First is F. Ray Martin. Ray is a consultant in the St. Louis office of Tillinghast Towers Perrin. He joined the firm back in 1983. He specializes in group and individual health insurance for commercial insurance companies, Blue Cross/Blue Shield plans, and other health organizations. After Ray is finished, Dennis Hare will be speaking. Dennis is with Mutual of Omaha where he is the actuary and the product manager for special risks. His previous experience includes direct response life and health product pricing. Then I'm going to bring up the end. In my former life, I was the A&H Product Manager for the GE Financial Group of Companies. Currently, I'm a consulting actuary with Milliman & Robertson where I manage the individual health practice in Tampa, Florida.

Mr. F. Ray Martin: We have quite a range of topics for you. I'm going to talk to you about something I like and I find very interesting. It's called voluntary dental. There has been quite a move to open up dental markets since a lot of companies have stepped down from offering medical insurance; sometimes dental could be the lead product in the group and quasi-group market. Voluntary dental has recently

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Note: The charts for this session are not available online. Please contact Linda Blatchford at lblatchford@soa.org or call 847/706-3564 for a hard copy.

become quite a popular product since companies have found out that they could actually make money with voluntary dental. A while back they thought you had to have 50% participation, but companies have been doing well with much lower participation.

First, I'm going to talk to you about some pricing considerations on putting together a voluntary dental plan. This could be also used, possibly, in the individual market. Then I'm going to talk to you about some benefit design features, and if I have time, I'd like to talk a little bit about the dental marketplace in general.

In a dental plan, the loss ratios become very critical because it's a very low premium product with a very high volume of claims. The administration can be a very large part of the premium. It's critical that you be able to meet the loss ratios that are going to be required for your statutory filing. The unique thing about voluntary dental is usually you want to keep the cost down in the early period when people are first purchasing a product because they're usually purchasing it for a reason. They're going to use the benefits. Often you design a plan that's going to have the graded benefits over time. The first year might have a 40% loss ratio range. Just because you get very good experience the first year is no reason to think that your plan is doing that great because it's going to have a low loss ratio because of the benefits. The second year is actually going to be the hardest hit. That's when a lot of benefits come into play. You may have deferred some benefits for the first 12 months. Finally, it'll grade out somewhere close to your ultimate loss ratio.

What are the risk factors in pricing a voluntary dental plan specifically? There is an age curve, but it's fairly flat. In general, the benefit design offsets the age curve, since older ages are getting major services done, which are usually paid at a lower coinsurance, and the younger ages are having more of the preventive type services. There is some offset mainly by benefit design. You could have something like this pattern where it is 10% cheaper at the youngest ages and then increases up to about 10% at the older ages. And from what I hear, after age 65, the costs are pretty flat. Not too many people have been pricing the over-65 market, and that's another potential dental market that is untapped at this point.

What about gender? Females are higher on an average, and males are lower than the average, somewhere around 7-10%. Because the charges vary so much across the nation, you get a wide range of geography adjustments. This usually ranges from something like a 25% drop up to a 45% increase in cost. An example would be the Los Angeles area. Seventy-five percent would be the rural Dakotas or something like that.

What about industry? As most of you probably have heard, there are some industries that have a much higher utilization in dental. Those are the ones where the employees have very high visibility. Education has been one of those in the past. Those in the performing arts and professionals who have a high visibility to the public want to be able to have nice teeth. Those people are, in general, high utilizers. We think that it can be up as high as 10% above the national average.

Low profile, blue-collar workers may be on the other extreme and have something like 5–7.5% lower utilization than the national average.

What happens if you put in a waiting period? People plan around that waiting period, and we usually see higher utilization as soon as that waiting period has ended. We expect something around the 20% range for a 12-month wait. If you have a nine-month wait, a small effect will trickle in the first year or the last three months. Then you'll have another trickle into the following year. The first year might have about 50% of the cost, and the second year may be about 10% higher than expected. It's very hard to measure pre-existing conditions on a dental plan as you would for a medical plan. You might exclude any teeth that were missing at the time that the policy began, but it's very hard to measure that as you would in a medical plan where people have had certain diagnoses. Dental is also moving to a diagnosis system, too. That might be helpful in defining a pre-existing diagnosis.

What might the selection be for a voluntary plan in which people are paying the whole premium? It would be 1.60 for duration 1, 1.40 for duration 2, 1.25 for duration 3, and 1.00 for duration 4+. They usually have an idea of using the benefits when they purchase them. The pattern that we would use would be something with about a 60% increase in the first year's utilization. Again, people are going to compare what they would normally pay out in dental services with what the premium is going to cost them. Then it slowly grades down to the ultimate level after about four years.

Persistency is an interesting area in that it's almost good that people lapse after the first year because the claim costs are so low. There is very high lapse after the first year. People have received the coverage and treatment that they were looking for, and then they opt out of the plan. You could have something in the 40–60% range lapse.

It then gets a little better each year, ultimately at around the 15–20%. Usually if you can keep people in for a couple years, then they're more likely to stay with the plan. The average lifetime of a policy is about two years, and the lifetime of a product is probably about five years. After five years, you might want to reevaluate your product. Probably do some fine-tuning, some redesigning, and refile a new product after five years.

Expenses, again, are pretty high on the dental side as compared to medical, at least as a percentage of premium. Policy issue cost can range somewhere between $25-50 per policy. Maintenance is around 5% of premium. Claims expenses are much higher than you would see in the medical side because you're getting, again, a large volume of small claims (about 15%) coming in to administer. That brings the claim expense part up in the neighborhood of 20% of premium. That's why trying to meet the loss ratios that I discussed at the beginning can become difficult. If the product is sold as more of a voluntary plan or an individual type of policy, commissions are going to be much higher the first year and even still remain at a pretty high level, 15–25%, from there on. You usually had very high first-year commissions to encourage extra selling, either in the employer's location or on the individual site, one-on-one.

What are the profit targets? I would think that something around 5% of premium is kind of the norm for this type of product. There may be some first-year strain, mainly because of the higher acquisition costs and the higher commissions. You should be able to break even, though, on the expense side in about two years.

Here's some miscellaneous information. When making a block fully credible, dental is a lot quicker than medical. It would be about 300 life years. If you were designing the voluntary plan, you might want to vary it by age bands. You could have three large age bands with about 10–15% differential in rates between those. You may have trouble selling the gender-distinct rates. Then I would recommend that you would go down to a three-digit zip code area designation for assigning rates. You'd probably have a set of area factors down to three digits.

You could do some pre-screening. You may have to do some underwriting and add a few questions to the application. One question might be, do you have any missing teeth other than the wisdom teeth? Do you have any orthodontic treatment going on at this time? When was your last dental visit? Was there any report from the dentist? Was there any diagnosis made at that point in time? If you get any of these, you would either do some excluding or you would consider not accepting the application. You might want to be concerned when somebody hasn't had a dental visit, say, in the last two years. If you're doing a voluntary plan in a group setting, you may want to have a minimum participation of 20% of the employees or 30% of the families. Another alternative is to have a minimum number of covered lives. I'm thinking that when you count those lives make it a double count for families because you're going to find that many more families are going to be buying your dental than individuals. Oftentimes parents are buying the dental coverage as a concern for their children. If you had a group with just five families, I would count them as double, and I think that would be sufficient to maintain a program in that group.

Some of the preventive services you want to make sure you're covering are exams, cleanings, x-rays, and tests. You may not want to cover sealants or fluoride treatments, but you certainly would want to cover these procedures here. What about coinsurance grading? It's very common in the voluntary plans to have a coinsurance that grades over time. This does give some incentive and gives people something to gain for staying in the program. If they stay in the program, their coinsurance is going to go up. Their benefit level is going to increase. You probably don't want to start below 50%. If people receive less than that in the first year, they are not going to see that as a valuable benefit and it might turn a lot of people away from your plan. Then maybe increase it to something around 10%, for the next few years. This'll push some of the more expensive procedures back into following years, but remember you're going to be making low loss ratios in the early years. You want to make sure that you take that into account in your pricing. If you want to be paying for some major services out of the early duration dollars, you want to make sure that you accounted for that in some form of moving premiums to later years. You probably don't want to do any grading on the preventive services. You probably want to keep those pretty much the same every

year. You might want to use a graded deductible approach if you want to do something on the preventive side.

What are the common exclusions? We talked about missing teeth. Dentures and bridgework probably need to be in place for at least five years before you would do any replacement on them. You would probably exclude temporal mandibular joint procedures and limit x-rays to once every three years, and exclude cosmetic type procedures other than child orthodontics. Many plans still would include orthodontics on the children, even in a voluntary dental market after, say, two years.

One possibility to save cost is a schedule benefit approach where you come in with a schedule that's quite a bit below the 80th percentile of the usual, customary, and reasonable (UCR) charge. This has some good things about it. It eliminates the inflation part, gives you more control, and allows you to encourage certain procedures. You can move your schedule to be a fuller payment on certain procedures. That way you might be able to encourage people to use those procedures. The problem is that it's hard for the policyholder to understand. It's hard to give them a whole list of every single procedure and what the fee is going to be for each. Then there are the geographic differences. You probably need several fee schedules to cover the entire nation. The employee is never quite sure what his or her share is going to be until he or she gets a final bill. It does make it a little difficult for the purchaser to understand.

The waiting period works in a similar way as the coinsurance step approach. It does give rewards for people staying in the program. You might have major services covered after one year and orthodontics covered after two years. You get that extra premium in the early durations that hopefully will offset some of that additional utilization later on. Obviously, the employees are going to see it as a poor benefit. They want to have coverage right away. They don't want to have to wait to get coverage. Major services and orthodontics are usually the most costly procedures. Pre-existing conditions, if you put them in, are kind of hard to enforce. Maybe have a pre-existing exclusion for the 12-months prior and running 12 months into the plan. Then you need some kind of measure of prior neglect if you're going to determine pre-existing exclusions.

Claims Issues

This is just some information on what the claims handling would be. About 95% should be able to go through a good claim system without any intervention. You probably will need a consultant at a certain level. You'll need somebody to review claims after a certain level to make sure that you're not getting abuse. About 2% of the claims or less would probably fall into that category. You would need copies of the x-rays sent for those reviews.

Claims Issues And Claim Frequency

We usually expect about three procedures per member during a year and about 75% of the people filing a claim within a particular year. You want to make sure there's no unbundling on the x-rays. If you have a complete set of x-rays, they're not unbundling that into each of the bitewings. Crown and bridge series work

should be treated as one procedure as opposed to separating the initial exam, the temporary, and the final procedure. Some areas that could be overutilized are x-rays, periodontal, scaling, fillings, and fluoride treatments. On the UCR level, the norm in the industry is still about the 90th percentile. You may be able to save a little going down the 80th percentile. You only save a couple of percentages because it's only affecting 10% more of the physicians.

Table 1 was done for 1995. It's a little dated, but it might give you a feel for what the dental industry looks like. At that time, it was about 110 million covered lives. Many of those were covered by insurance companies, but Blue Cross/Blue Shield and Delta still had a very large piece of that. The other would be the stand-alone plans that are like dental HMOs and some of the dental groups that have developed their own plans. This gives you a feel for what the market split was between indemnity, PPO, dental HMO, and what I call referral plans, where there's really no insured benefit. These allow people to have access to a discounted network.

TABLE 1
1995 DENTAL COVERAGE
(IN MILLIONS)

Employees	Indemnity	PPO	DHMO	Referral	Total
Insurers	15.8	2.9	3.4	0	22.1
BCBS	8.0	0.4	0.6	0	9.0
Delta	12.5	0.9	0.7	0	14.1
Other	0.5	1.1	4.8	1.1	7.5
Total	36.8	5.3	9.5	1.1	52.7
Members					
Insurers	32.9	6.0	7.1	0	46.0
BCBS	16.6	0.8	1.2	0	18.7
Delta	26.0	1.9	1.5	0	29.3
Other	1.0	2.3	10.0	2.3	15.6
Total	76.5	11.0	19.8	2.3	109.6

One thing we've done is a study of dental experience for basically the 1990s, and what we found is that there was a period of time, 1994–95, when there were very high loss ratios (Chart 1). It has kind of moderated now, but there were some very competitive years in the dental market. With those types of loss ratios, it would be hard for companies to make very much of a margin. The community-rated portion (Chart 2), where everybody gets the same rate, has kind of been an up and down. It probably was influenced by the 1994-95 competition and has slowly been coming back down to more manageable levels. I think the partially credible loss ratios are interesting (Chart 3). During the 1990s, companies were giving too much credibility on their renewals. The loss ratios climbed steadily through 1996, and it was only in 1997 that they began to moderate. At this time I don't have 1998 information to add to this chart, so it'll be interesting to see where it's going to go from there.

Let's look at the voluntary portion of the dental market (Chart 4). In 1995, approximately 5% of the market was what would be classified as voluntary, where

the employee is paying all the premium. That has almost doubled through 1997, up to about 10% of the market. That shows a very dramatic growth, and a big part of that reflects new coverages. It's new groups getting coverage. I think there is a big pent-up demand out there. On the true group side, it has been pretty much saturated on lives covered. Usually people may be changing from one carrier to another. I don't see that there's that much new opportunity out there. In most of those groups, the employer is willing to have coverage. I do see that there's a big area out there where the employer may sponsor a plan and let the employees pay for it. I think there is a big demand for dental coverage by the employees in those markets.

Let's briefly go through company dental versus medical. There are no catastrophic claims, so you don't have to worry about a $100,000 claim coming through. Dental is more centralized; usually one dentist is managing the whole health of an individual. You have very centralized control there. You normally are covering things up front at 100%, and then you start the coinsurance later, while in medical it's the other way around. You try to stop people by having the cost sharing at the beginning. The dentists are more independent and don't have to be linked with a hospital. The dentist is not going to be working in a big group of doctors at a hospital, like doctors would.

What are the marketing opportunities? I mentioned that I think there's some niche markets out there for voluntary for certain group sizes where an employer's not willing to pay part of the premium but where the employees would have a demand. It would be a good product to add onto those medical plans that the third-party administrators (TPAs) might be administering. It's a good shoe-in to help bring other nonmedical plans into a group setting. Then we have brokers, of course, and associations, and a mail-order-type approach. These are some of the competitors that I've seen in the voluntary dental market specifically. Some of these market down to very small group sizes, and I'm not sure that there has really been much done on an individual basis. It's very hard to spread the risk on an individual basis. You'd have to find some commonality or some way to at least group people together into blocks.

Plan designs for dental deductibles are usually in the $50 range, and usually not applying to preventive services. Maximums are $500 to $1,500. There is usually a separate lifetime maximum on orthodontic, somewhere in the $1,000 range. That amount has been creeping up. Some plans offer a $2,000 max. Again, pre-existing has very limited features. Waiting periods can range anywhere from 3 to 24 months. The most common is a 12-month wait for major services. Coinsurance is usually graded over three years, and the third year is going to be your ultimate coinsurance level.

Rates are probably filed initially and then file a monthly trend adjustment, so that you can just update those rates until you feel that they need to be redone or the trend is falling out of line. Usually book rates are moved on a quarterly or a monthly basis again with the trend adjustment. The benefits in dental have helped keep the rate increases down below trend because it's usually a fixed percentage, and you have deductibles and a lifetime maximum. The benefits do not creep as

fast as actual trend does. It would fall below that. You probably want to then refile about every two years. You refile your book rates and a new monthly trend assumption.

What's the current outlook for voluntary dental? Right now, it's probably 10-12% of the market. I think there is a large, untapped small group market out there, that is supplemental to your nonmedical coverages. The only problem is commissions can be less attractive to agents because you have a very small premium. Even if they have a large percentage of commissions, it can be very small on the dollar side. The best way would be to link this with other products where they'll have a lot higher dollar commission and some incentives for sales, volume sales, and multiline coverages. There are higher commissions on additions at renewal. If you have a group, you might want to give first-year commissions when they bring in new people on the renewal of that group. You may want to look at it that way as opposed to just one time bringing the group on and having first-year commissions. It has to be something that would be sold to the employee individually as opposed to just giving it to the employer to present. It's going to take time on site.

To have a good quality product, obviously, the best thing is to get the penetration up high, get high family participation, and watch those durational loss ratios, because they can creep on you very quickly in a voluntary plan. If you see low loss ratios in the early years, you still have to remember that the benefits are also low. You have to keep track of how the benefit curve is going to flow into the future years so that you stay on top of it, and don't let the loss ratio get on top of you. I think we already talked about how it can be leveraged.

Filing Compliance

There are not as many mandated benefits for dental. The mandated part is going to be on what is defined as a dependent. You might want to think about conversion privileges on a dental plan like you would have in a medical plan. Much of it is subject to similar filing restrictions as you would see on a medical plan.

Claim History

There are certain states where you have to track the claim history and report that on a yearly basis. A renewal filing may be more difficult when you have to support your expectation that you'll have a low loss ratio because the lifetime loss ratio is going to be higher because of the benefit pattern. I haven't seen much in the way of managed dental in the voluntary market, but it certainly has the potential. Anywhere you can save or get discounts to the charges is going to help your premium.

Mr. Dennis K. Hare: I work at Mutual of Omaha. I've been working in the special risk line of business for the past eight years. For those of you focusing in this market, I can help shed some light on what we do in special risk, at least at Mutual of Omaha.

I'll be talking about the pricing issues related to student accident and other special risk A&H coverages, as was listed in the syllabus. At Mutual of Omaha, the

majority of our special risk sales and premium volume is in the student accident, or the K-12 market, and the college market.

In the K-12 market, there are two product types. First, there are mandatory programs that dominate the market. Second, are voluntary programs. Voluntary programs require more marketing expense and marketing effort to sell. Within those markets we can sell to all students covering all activities or plans that focus only on sports accidents. Most of the claims in this market come from sports. School districts are looking to cover the liability associated with sports and many times the sports accident benefit ties into the deductible of their liability coverage.

Our other large market is the coverage for college students. Coverage can be student accident and sickness or accident only. Accident and sickness is the primary product. Typically coverage is on a voluntary basis, usually hard waiver where a card must be signed by the student certifying he or she has other coverage in order to opt out of student coverage. If they don't have primary coverage and the school requires insurance coverage, they buy this particular program. Also within this market are intercollegiate sports plans. Most colleges, at least the larger schools, buy this program. It usually has a $25,000 or $50,000 maximum benefit, and it covers all athletes. We found intercollegiate sports to be a difficult market in which to make money. It's very price competitive. School budgets are fixed, and it's difficult for schools to come up with the additional money to afford rate increases needed to make the market profitable. On the student accident and sickness side, premiums are passed through to the student via tuition. While price sensitivity is still present, it isn't quite as intense.

A market that we've gotten into in the last four or five years is the catastrophic accident market. We've written a program where we cover all National Collegiate Athletic Association (NCAA) athletes in the nation. The NCAA purchases that on behalf of all athletes in divisions 1, 2, and 3. This plan provides coverage for a serious accident during practice, a game, or travel. We also provide the same type of benefits, although there are lower benefit levels to the high school market.

The youth and activity market is the final market that we really focus on. These are lower risk, smaller premium products. The youth market includes sports, day cares, camps, and scouting programs. As far as activities go, there are a wide variety of programs. Included are coverages varying from church outings to stock racing. There are many different opportunities in the market to provide coverage.

From an underwriting perspective this is mostly accident-only group business. We really don't have a lot of individually underwritten business. The underwriting is not medical underwriting. What we're trying to do is assess the risk that we're assuming with the coverage. With the different benefit levels we have and the different exposures that I just mentioned, there are many different risks to understand. I'll discuss this a little later. For setting premium rates there are really two methods that we use: we use either manual or book premium rates, where we've gone in, priced the product, and come up with specific rates that we consistently charge for a specific risk, or we experience rating.

The manual or book premium rating is traditional pricing where we choose assumptions we feel are appropriate for the risk that we're analyzing. We look at claim frequency, claim severity, loss ratio, expense loads, and the typical actuarial assumptions used in pricing. We typically price these for an annual period. There's not a guaranteed rate promised for a long period of time. We try to make these programs work year to year and have the ability, if need be, to change the premium rate every year. We don't have a long pricing horizon to worry about. Once we've determined assumptions, then we use a simple formula, where gross premium equals claim costs divided by one minus (expenses plus loss ratio plus risk factor load).

No matter how products are priced, I suggest results be periodically monitored versus expectations to make sure the premium is adequate. I would say that a 5% of premium pre-tax return is typical. Some lines of business, such as the youth and activities, may return a slightly greater profit. On other lines that are very price sensitive, we might not be able to load as much for profit. Profit does vary by the product and the market that we're working in.

We use experience rating quite a bit in our college business for both college sports and accident and sickness. We use it on the large K-12 cases. Any time there's a sizable premium volume we try to look at the past history of the account because that's going to give a better indication of what the right premium rate is than by pricing from scratch using the traditional approach.

To do experience rating, we need to gather the case-specific, historical data. What we typically try to gather is three years of past history plus the current year. The current year is not very valuable, since we're usually providing a price quote before the year is complete. It's used more as a benchmark to make sure there are no problems currently developing on the case. We start out with past history and try to standardize the benefits between the years. Oftentimes the plan benefits may change. They might have a different deductible or different coverage limits. We need to put all those past years on a standardized basis so that we're comparing apples to apples. From there we go one of two different ways. We either try to develop a claim cost per person and multiply by the number of persons we are going to insure, or many times we just develop an aggregate premium to charge for that particular risk without knowing the exact number of exposures. In the latter case, we try to be very careful about the insured population. If the insured population is changing up or down over the course of the experience period, we take that into account because the varying exposure will impact total claims.

We then take past claim data and complete it with lag or completion factors. These are developed based on past history. If historical completion factors are not available because it is a new market for the company, reinsurers or consulting actuaries can possibly help us develop them.

Completion factors do vary substantially in the special risk market by the type of product. In some lines of business, claims are submitted and paid rather quickly and the tail on the claims is short. On other lines, such as the college sports business, completion can drag out quite a while. Colleges are more interested in

playing sports than getting all the claims data submitted and completion takes much longer.

We try to use credibility theory in experience rating. However, this is difficult in practice. Typically, the market, no matter what it gives us to work with, expects us to consider its data 100% credible. It becomes difficult not to consider it 100% credible because other carriers, and we do it at times, assign more credibility than theoretically sound. On small cases, there may not be a significant level of past claims history to project future claims on an annual basis. However, there's always potential for a large claim to hit in a given year. It is sound practice to use a large claim load to account for this potential. If we don't load the rate for an occasional large claim, the loss ratio for the product line will spike up when a large claim is incurred.

Unfortunately, the market drives the premiums down by assigning high credibility to smaller cases. We then must decide whether we are willing to play in that market or not.

If data aren't fully credible and the market allows this, we weight the experience-generated rate partially and use our book rates for the remainder. Combining the two weighted pieces gives the rate to be charged.

Again, reviewing experience by year is quite important, probably even more so on experience-rated business because these types of lines do have volatility. Loss ratios can deviate quite a bit by year. Review experience often to keep on top of trends and understand the claim run out pattern.

From a marketing and distribution perspective there's different ways to get the special risk product out to the ultimate consumer. The brokerage area is where we focus most of our efforts. Our sales representatives make calls on brokers, and then we have the brokers distribute our product. Usually the brokers work in niche markets that they know quite well. They can get us to the buyer pretty quickly. We use our own field force for some of our product lines. We sometimes go direct to the buyer if we can establish that relationship.

Certificates of insurance are sometimes given to the ultimate insured. Sometimes an association wants their members to have certificates and be very much informed with regard to the coverage. Other times they're not interested in certificates given the administrative hassle that they might have to go through getting the certificates passed out to their members. State regulations vary in this regard. Some states require certificates, but oftentimes the state doesn't require them. Brochures many times are used in place of certificates, especially in the college market. A brochure explains the benefits for the student and contains an enrollment form.

Now I'll turn to claims adjudication. Most of the special risk business that we sell is on an excess basis. Our product is generally meant to be supplemental coverage. If an insured has other group coverage, say through their parents' employer, that policy pays benefits first. Our product pays any time when the primary coverage does not, such as policy deductibles or copayments. If the insured has no other

coverage in force, our policy would act as primary coverage. It's very important when adjudicating claims that we make sure that we get the explanation of benefits from the insured and verify other insurance to make sure that we don't overpay the claim.

In administering the claims, a decision must be made whether to pay the claims in-house or through a third-party administrator (TPA). We use both. Some markets require a TPA because they are part of the services provided by the distribution. To place the business we must use their third-party administration facilities. Using a TPA, as you may know, involves control issues. It involves delegating duties to an outside vendor, which must be closely monitored for quality. It is sometimes difficult to get timely policy data from TPAs. It may also cost more to administer premium and claims because TPAs are trying to make a profit on these services.

Most of the claims that we pay in special risks are of relatively small average size. Except for our catastrophic line of business, these aren't large claims. They're things such as x-rays and emergency room visits.

To keep track of the covered insured on this blanket and group business, we sometimes use rosters. Many times we don't. It depends upon the type of business and the sophistication of the client. Sometimes the rosters are electronic and sometimes they're on paper. A roster can be reviewed to determine if a claim should be paid. When rosters aren't available, we rely on the policyholder to validate whether a person was a member of the association or a group at the time of injury. We must also determine that the person was injured during a sponsored activity.

Case management is something not used on most of the claims. However, we do use case management on our catastrophic business where there is potential for long- term, high-cost claims. We try to reduce our costs by managing utilization and directing the insured to the proper level of care and the most appropriate facilities.

With regard to pricing and plan design, primary versus excess coverage is a major distinction that has to be taken into account. Excess coverage can save anywhere from 15% to40% of claim cost because we are the secondary payor. That savings varies by market. Another consideration is specified activities versus 24-hour coverage. Obviously, the exposure period is different between the two and will impact rates. Most special risk business is accident only. In the college and camping markets, there is some accident and sickness exposure. Including sickness coverage will increase claim costs.

Depending upon customer desires, products range from very limited coverage plans, with caps on virtually all services, to reasonable and customary coverage. Major price differentials result from significantly limiting benefits. Deductibles and coinsurance can be used to bring the prices down. We also use some provider networks to help limit our costs. We use both steering and passive networks. On college business steering toward a specific network is common practice. On some of our other products we reprice claims for discounts on the back end. Finally,

voluntary versus compulsory coverage impacts rates. Any time an insured elects coverage voluntarily, there is going to be some degree of antiselection that wouldn't be present on a compulsory basis.

Here are some other issues to keep in mind for these products. We use group filings almost exclusively. There are different amounts of work involved for group versus individual filings. Product flexibility is important. The special risk market requires a great deal of flexibility. Customers are always asking for different bells and whistles. It is also important to be able to match other carriers' plans. Most of the groups we cover don't like change. The fewer changes, the fewer the surprises they have to expect. They want exactly the same language they have had in the past. It is difficult to have enough language filed to be able to match every competitor's policy language. The goal is to try to have a product available that allows enough flexibility to come close to matching the competition in most instances.

Finally, as I've mentioned a coupled of times, never forget experience analysis. When reviewing experience, don't lump all the business into one big pool and call it special risks. Keep track of the experience of each of the separate products and markets in the portfolio. They do have very different experience patterns. By combining all products in one pool some problems may be left undetected until they become quite difficult to correct.

Mr. Spell: . I'm going to talk to you about critical illness products. First, I'm going to ask you a quick survey question. How many in the audience have some experience or have worked with a critical illness product before in some way, shape, form, or fashion? [Approximately one-half of audience raised their hand] It didn't work. All right. How many of you have not worked with a critical illness product?

I have very few numbers in my presentation. I want to back up for those of you who don't have familiarity with critical illness. I want to talk a little bit about what a critical illness product design might look like. It's actually very straightforward. There's a lump sum of cash out there, and you get that cash on the first occurrence of some specified list of diseases. The four that I think I see the most often would be heart attack, stroke, cancer, or kidney failure. That's almost too simple, right? You feel as if you have to do something to jazz it up.

Many people struggle with the idea of getting this money. They say, "What's the money for?" I call it free cash. It's for whatever you want to use it for. You can use it for medical expenses, such as deductibles, or for your coinsurance. Some people plan to use it for experimental treatments. If a person is diagnosed with a terminal illness, and it's going to be a few months before he or she really starts seeing the effects, maybe that person just wants to go travel and try to make the last few months as pleasant as possible. I've seen it used for debt restructuring purposes. It's free cash. Use it any way you want to.

I'd like to give a few more specifics on a product design. Suppose a customer comes in. You sell him or her a $100,000 policy that will be payable on the first

occurrence of one of these four diseases. There are a couple of things to consider. The policy's full benefits actually will not become effective until the end of the waiting period. This waiting period is the time that must elapse from the time the policy is sold until the full benefits, typically 30 days, sometimes longer. That's to avoid someone who has a little lump in their neck or something and says, "Before I get that checked let me run by my insurance agent's office and pick up a policy."

This is the one that I think most people struggle with a little bit. This one's a little bit harder to imagine. Suppose you have a heart attack. There's a survival period. Critical illness is not life insurance. If you have a heart attack and die, the policy doesn't pay. It's not intended to pay. Therefore, what if the death takes place before making payment? For example, if you have a heart attack, and you die three days later, you won't pay. Typically a policy will include some type of survival period, like 30 days. If you, on the 31st day, are still alive after having the heart attack or stroke or whatever, then benefits would be paid. If you die during the survival period (I actually prefer to call it an elimination period), companies provide a refund of premium benefit.

To jazz things up a little bit you have to have options. I've seen such things as companies paying double benefits if the incident occurs before some age such as 65. I've seen people extend the list of illnesses to include such things as disability, Alzheimer's, Parkinson's, and dismemberment. You name it. You can pretty much cover just about anything. I have seen companies that will pay small dollar amounts for less traumatic events: 10% of the face amount of coverage for an event such as having angioplasty or 20–25% if you have bypass surgery.

This session was supposed to cover issues affecting pricing of supplemental products. I was trying to decide if I should I talk to you about what assumptions should be used. I don't really think that's appropriate. I wanted to talk in a more general way about the assumptions. There are three key types of assumptions that drive this product. The first key assumption relates to policyholder behavior. The policyholder behavior is going to affect what your morbidity costs are. It's going to affect what kind of persistency you experience on the product. Your policyholder behavior obviously is going to drive antiselection, and it's also going to drive the assumptions you need to make regarding your acquisition and your maintenance expenses.

The second type of assumption relates to distribution issues. What drives your agents? What motivates them? How well are they trained? That is going to obviously impact what your commissions are, and it's also going to impact your acquisition expenses. It can have significant impact on your claims expenses especially if your agents are not very careful and very thorough in explaining to the customer exactly what it is that they have purchased.

Finally, I think one of the key types of assumptions we're going to talk about will be some of the corporate expectations. What does your management team expect from this product that you price for them?

First, let's talk about the critical illness customer. You need to know who they are. This may not be all that profound to you, but I will suggest to you that they are a subset of your current customers.

In my pre-consulting days, when I was in the corporate environment, I worked for a company for ten years pricing products for them. I knew that market. I knew those people. I knew those customers. I talked with agents. I had ridden with the agents and met customers. I had watched the sale being made. I felt pretty comfortable developing assumptions for that product. With critical illness, however, your perceptions may not apply because the people who are going to buy it are going to be a subset of those customers with potentially very different characteristics than what you would typically think of for your clients. You need to be very careful to make sure that you know who your customers are.

You should consider the five w's: who, what, where, when and why.. Who is going to buy the product? Who of your clients will want this particular product? Why will they buy? Do you remember our "free cash" discussion? Are they buying because they think they can select against you? Do they think they can gamble and win? Are they buying because you have a really good sales track, which helps the customer see the need?

What is it that is causing them to buy? Similar to that, what makes the product have value to the customer? Is it price-driven? What are they going to compare it against? Are they going to be comparing against other critical illness products? Are they going to be comparing it against specified disease policies? Make sure you understand what's driving the determination of value.

Where will your customers hear about the product? My guess is that is going to be from the agent because you don't hear about critical illness from very many other sources.

Finally, when will they purchase? Is this something that can be sold on the first visit or does the agent have to spend two or three visits selling the product? Make sure that you know, because that's going to drive how the agent's motivated.

Know your agents. Just as the critical illness customer is a subset of your customers, your critical illness agents are a subset of your existing agents. When the marketing department came to me and said they wanted a critical illness product, I knew that only some of our agents were going to sell it. However, I was surprised at who those agents were. My expectation was that any agent who was successful in selling supplemental health, specifically any agent who was successful in selling a specified disease type coverage, would be successful selling critical illness. I knew some agents focused on life insurance. I knew some agents might focus on a senior market. But I thought that if you could sell specific disease products, you could sell this. I was very wrong. After developing a product, we went back a year later and surveyed the agents that were selling it. We found that the successful critical illness agents were typically successful selling specified disease, but they were clearly only a subset of those. In almost every case the agent did not go into the home with the expectation of selling a critical illness

policy. The agent went in for some other reason and during the course of the conversation identified a need, heard something that the customer said, and responded to that need. In the cases we surveyed, critical illness was not a lead product. Only a few people had the skill to really hear what the client was saying their needs were and were able to meet those needs.

Agent training and support is going to develop this skill. Can you train the agents to listen to the client in order to know when to offer the critical illness product? Will they have tools that help the customer identify what their needs are? How are you going to motivate them? Are you just going to try to pay the highest commission? I'm pretty sure that's not the way to go. You need to be very careful that you understand where there can be a misunderstanding. There are lots of places when you're selling critical illness where a customer can misunderstand when they've purchased. You need to make sure the agent covers that and that your marketing materials eliminate those confusions as much as possible or you're going to pay for it on the claims end.

Finally, you need to know your corporate goals. It is very important for the management team to understand how a product works. You may tell them what the profit is going to be, and you may tell them all the wonderful things about how they are going to make money on it. However, as soon as those claims hit, if they came in earlier than your model has said they are going to come in, it may cause people to get stressed out. You can go out and sell all these policies. As the premium comes in, it looks great. But you have 10 or 12 people that hit you with a $100,000 claim; you've paid $1 million. That catches people's eye. With this product, you will see very few claims in the early duration, and then you're going to see some higher claims later. You need to make sure that you are preparing your management team for what the cash flow is going to look like on this product.

I said that there were three key types of assumption that we need to talk about. Now I want to talk a little bit about some of the risk characteristics of this product. This product has what I like to call "disease diversification." Some of you probably sell specific disease products, like cancer policies. I have also seen first occurrence heart attack policies. I get a little nervous about that because that seems like something that a customer can select against you. At least with critical illness, you are spreading your risk over some diseases that are not related to one another. Let's take average morbidity from ages 40 to 60, divided among the four primary diseases. Heart attacks account for about 45% of total morbidity. Cancer also makes up about 45% of total morbidity. Stroke is about 7–8%, and kidney failure is about 1–2% of total morbidity.

There are also some antiselection protection features. I won't go into this very much because I mentioned it before. You have the waiting period that kind of helps you on the front end to make sure that somebody's not just buying the policy on the way to the doctor. There is also the survival period on the back end to ensure that this policy is not being confused with life insurance. I think one of the other features here that can be very helpful for you is a very well-written pre-existing conditions clause. Many companies take that for granted, but I wouldn't with this product.. It can be your friend.

Underwriting tools are very important on this product. It's very similar to life insurance. You are going to be looking at such things as personal history, and an individual's physical condition. You're going to be looking at family history. It is not uncommon to see policies or underwriting provisions that say that if you've had one family member experience one of those four primary conditions prior to age 55, then you're rated. If you've had two family members with these diseases, then you're declined. All these things need to be considered. You have a lot of tools available to you, such as the application or the attending physician statement. You also have lab testing, which is very important. You can do blood work, especially if you're going to be marketing large policies.

Now, that's all fine and good, but typically when I think of supplemental health products, my first thought is about the product where you go out, you ask three questions, you get the right answers, and the policy's issued in 72 hours. If that's what has made you successful, and that's what your agents expect to do, and if that's what your customers expect to happen, then you might have a problem when you come in and tell the customer that you are going to be taking blood. Customers and agents may not accept that. You need to anticipate what your market expects from this type of product, and you need to adjust. If you're selling life insurance, this probably won't be a problem. Your customers would expect it. If you're selling accident policies, you may very well need to offer only very small policies so that you can stick with that very simplified underwriting approach.

We started out considering those three categories of assumptions, and then we talked about the risk management features. If you have decided to market critical illness, and you've done your homework (had the focus group, talked to customers, talked to agents, and narrowed down who the people are that are going to buy your product), then I think you're ready to begin developing the assumptions for your particular product. I'm not going to tell you what I think those assumptions should be, but the hardest one that you will face is coming up with a morbidity assumption. There are a lot of sources out there. There are specialty studies available. There are government publications. Hopefully, you will have some data that you can access from your customers. There are consulting organizations, and reinsurers. There are a lot of people who can help you. I suggest that you get that help because there are a lot of adjustments that you will need to make to that data. You will need to make adjustments based on the selection.

Persistency

This is going to be driven by a lot of things. I think your first-year persistency is going to be high. How high that will be is definitely related to how well your agents are trained and how well your agents are making that presentation. In the second year, I think you're going to see persistency level off somewhere around 15–20%. I think ultimate lapse rates in the 12–15% range are something that you can reasonably expect. I also think you're going to see it get much better than that unless you have a very unique relationship with your customers. I also think you can expect variations by age. This is my personal opinion. I don't have any data to support it, but my expectation is that you will have higher-than-average lapse at younger ages and at older ages. In that age 45–55 area, I think you will see

lower-than-average lapse. The reason is because, as people see their friends begin to have strokes and heart attacks, I think there is fear of your own morbidity, and so you would hang onto coverage like this.

Expenses

You'll need to really consider your "not-taken" rates because they can really drive your acquisition expense. For this presentation, I'm talking about a policy, by the way, but if you are selling this as a rider to a life contract, you can really leverage the underwriting, which helps your expense.

I don't believe there's anything unique to critical illness coverage that drives maintenance costs. They are going to be a function of how efficient you are as a company.

Claims expenses are very important. They relate to how well your agent has explained the coverage to the policyholder so that you can avoid questions on the back end.

Finally, let's discuss commission expenses. Typically we see commissions paid in the 50–70% first-year range and renewals in the 5–15% range. That's all I have to say about critical illness coverage.

Mr. Ronald James Williams: Darrell, I guess I have one question. One of the things that's always concerned me about the critical illness/dread disease policies is a concern over fear tactic or scare tactic sales. I guess I would have said that had I been giving the reasons why somebody would buy it. I would suspect that's also one of the reasons why year-one lapse rates are probably so high. I guess a question for you is, how prevalent do you think this really is? Do you think this is a concern? And what protection do you see out there for consumers for this?

Mr. Spell: I think it is a concern. We've heard it talked about a lot on specified disease products. We've heard a lot of criticism of it. I was pleased when we did the follow-up survey with the agents that we looked at. I was pleased to see that the agents that were successfully selling it were ones who were identifying a need and convincing customers that they—in this particular case it was in a farm market—may have a $40,000 loan on a tractor. The agent would say, "If you have a heart attack, how are your going to pay off that tractor? Is your son going to have to pick up your debt?" They would often sell this coverage and tie it to some type of specific debt like that. The best thing that a company can do to avoid problems is to make sure that the agent materials focus on needs-based selling rather than fear tactics, but fear is going to play in.

Mr. Jim O'Connor: I have one comment on the critical illness, and that is, in addition to the assumptions which Darrell had mentioned, is to know your demographics and to know to whom you are going to sell it. In particular, know socioeconomic and racial characteristics because the incidence rates can vary dramatically based on demographics. I have one question on the student accident insurance. Dennis, what have your observations been in terms of the competition in the student accident market relative to the basically niche brokers and putting

pressure on carriers to represent them at very, very high commission rates?. What impact does that have on the profitability?

Mr. Hare: There are those brokers out there that are mainly interested in how much commission they can generate. What we found to work is developing relationships with brokers whose expectation is that they're going to get fair commissions. We try to develop a relationship where they sell our other special risk products as well. A broader relationship discourages high short-term commission expectations. I don't necessarily think that there are a lot of brokers out there at this time trying to find the highest commission to sell. Brokers like to have a working relationship with the carrier as well. By treating them fairly, we found that we've been able to establish longer-term relationships and haven't had that particular pressure. Another pressure that we do run into is when our rates are higher than a competing broker's rates. Some negotiation may be required between us and our broker on premium rates and their commission rate. We've had situations where brokers have come down on their commission, and we've given a little on our rate to make a sale. We try to have give-and-take on both sides where the product is really price driven.

Mr. Kenny W. Kan: For critical illness, do you see any future trend of this critical illness becoming like a standard feature for HMO medical products?

Mr. Spell: Wow! I hadn't thought about that. I'll pass that question back to the audience. How many of you think critical illness has a future as part of an HMO package? How many of you think it doesn't? I don't know.

Mr. Frederick S. Busch: This is a question for both Darrell and Dennis. I was wondering on the trend assumptions for each of the types of policies, how do you come up with those types of assumptions, and how do they compare to your usual major medical or HMO type coverages?

Mr. Hare: I can go first on our special risk products. Ours would vary depending upon the benefits. If we're selling limited benefits, we try to figure out what portion of the ultimate benefits are open to inflation, and apply that factor to the chosen inflation rate. We're not using a real high inflation rate for special risks right now, although inflation in medical costs is increasing, and we need to take another look at our assumption. Much of the current inflation, as I understand it, is being driven by drug costs. Our products, because they're mainly accident only, don't incur a lot of prescription drug costs. Our inflation rates are relatively low. We do build inflation into our rates, but it is probably in the 5–7% range at the current time.

Mr. Spell: On the critical illness side, the benefits are fixed so you don't see trend in that respect. Where you do see some trend is trying to predict what medical improvements there are going to be to allow recovery. The survival period is typically worded so that you have to actually have some loss of function at the end of that survival period. If you had a mild stroke, and the symptoms lasted for a week or two, and it was mild enough that at the end of that 30 days you have no symptoms, then you wouldn't receive benefits. To the extent that you can predict

how medical advances are going to shorten recovery time, then it might have an effect. It certainly would have no relationship to major medical trend or anything like that.

Ms. Lori A. Nelson: I have a question about critical illness underwriting. Could you comment on state regulation restricting questions like, "Have you ever had cancer? Have you ever had heart disease?" Please also comment on restrictions on family history questions.

Mr. Spell: I have not actually filed this product in all of the 50 states. I've worked with about 32 of the states to file the product, and we have not had difficulty getting any state to agree. We've had to modify wording in some cases, but in all of the 32 states that I've dealt with, which were, by design, the less difficult states to deal with, we were able to get our underwriting, or something very close to it, approved in those states. We didn't do New York or Florida. I don't know what it would be like in those states.