

BENEFITS INFORMATION BULLETIN

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Lump-Sum Pension Payments: 2008 and Beyond

Effective for plan years beginning in 2008, ERISA-covered defined benefit retirement plans that offer participants lump-sum payments must determine the minimal payment amount under new standards created by the 2006 Pension Protection Act (PPA). Under the new requirements, which do not apply to governmental plans or other plans not covered by the Employee Retirement Income Security Act, plan sponsors will experience a change in the lump-sum determinations over the next several years. The likely impact in 2008 should be relatively modest, assuming interest rates do not change dramatically before yearend. However, in future plan years the effects are likely to be more significant as the interest-rate standard shifts from 30-year Treasury bonds to the higher rates associated with the PPA's new high quality corporate bonds standard.

The PPA's effects on lump sums will depend on a number of variables, including a participant's age, the "stability" and "lookback" periods the plan uses, and interest rates in particular. Because many plans apply the minimum statutory basis for paying lump sums, the interest rates that prevail will remain a big determinant of the evolving lump-sum values over time. The changes that will occur over the next few years may prompt plan sponsors to communicate the likely effects now to participants, who in turn might consider the expected future increase in their benefit compared with the potential erosion of its lump-sum value over time as they approach retirement. The expected decline in lump-sum values over time also has implications for frozen defined benefit plans that have patiently been waiting for interest rates to rise to a level that eliminates the current plan termination shortfall.

This *Benefits Information Bulletin* examines the PPA's new requirements, along with recently issued guidance from the IRS, for calculating lump sums, and provides an analysis of lump-sum benefits in 2008 and beyond. Most of the focus is on the effects of the interest rate component in determining the lump-sum benefit; readers are cautioned that the analysis focuses on the prevailing interest rates as of November 2007. To the extent that a plan uses a different period for selecting the interest rates and the rates deviate from the November 2007 applicable rates, the analysis described here could vary accordingly.

Background on Lump Sums

A defined benefit plan's "normal form" of benefits generally is a monthly annuity, but many plans provide an option allowing the entire "present value" of a participant's accrued benefit at normal retirement age to be paid out in a lump sum. When a lump-sum option is available, the annuity must be converted to a single payment amount, the calculation of which takes into account the expected future investment return (i.e., the interest rate) that can be earned on the money, and the participant's expected life span.

Although the plan sponsor has discretion in selecting the assumptions the plan document will state as the basis for calculating a participant's lump sum, the statutory minimum basis generates a floor amount on the assessed value of the monthly annuity payable under the plan. The statutory floor value is determined as the present value of the monthly annuity payable at the participant's normal retirement age (NRA), discounted to the current age of the participant. However, if the plan specifies that the lump sum is to be determined as the larger of: (i) the present value of the deferred annuity payable at NRA; and (ii) the immediate annuity payable under the plan at the participant's current age, then the statutory minimum value must be determined as the larger of the present value of the deferred annuity benefit payable at NRA and the present value of the immediate annuity payable at the current age.

The Law on Lump-Sum Calculations

The PPA amended the tax code and ERISA to change the interest-rate standard and to update the mortality table that pension plans use to determine the minimum value of a participant's accrued benefit if lump sums are offered. Prior to the PPA, such amounts were calculated by using an "applicable interest rate" based on 30-year Treasury bonds (referred to as the "GATT rate") and a mortality table (based on the 1994 Group Annuity Reserving Table) issued by the IRS.

Beginning with the 2008 plan year, the PPA's new interest rate takes into account the rates associated with high quality corporate bonds, which are generally higher than the contemporary 30-year Treasury rate. The applicable corporate bond interest rate actually consists of the three "segment rates" of the yield curve (the same rates that apply for single employer pension plan minimum funding purposes, except that they are not averaged over a 24-month period). The three segment rates take into account how much time elapses between the date when the lump sum is calculated and the date when benefits become payable (i.e., the first segment interest rate is applied to benefit payments within the next five years, the second for payments between five and 20 years, and the third for payments that are more than 20 years from the calculation date). Thus, benefits that will be paid sooner are discounted at a lower interest rate than later benefit payments. The lower (or higher) the applicable interest rate, the higher (or lower) the resulting lump sum. The PPA effectively places a ceiling on the interest rate that may be used in assessing a participant's lump-sum value in a period of distribution.

The transition to the new interest rate occurs over the next five years in 20% increments (with the balance of the percentages applying the GATT rate), so that in the 2012 plan year the interest rate for determining a participant's present value of a lump sum will be based exclusively on the three segment rates.

For determining minimum lump sums, the PPA also mandated use of an updated mortality table that reflects increasing longevity. This will generally increase lump-sum values if interest rates remain unchanged. The law required the IRS to take into account "the actual experience of pension plans and projected trends in such experience."

The IRS's Recent Guidance

The IRS's recent guidance (*Revenue Ruling 2007-67*, regarding the mortality table and timing rules for the interest rate snapshot, and *Notice 2007-81*, regarding the yield curve and derivation of the applicable interest rates) provides the basic rules necessary for plan sponsors to determine lump-sum distributions starting in plan years beginning in 2008. Under the guidance, the time for determining the interest rate does not change: the measurement date for the interest rate is the plan-defined "lookback period" of one to five full months prior to the plan-specified "stability period" (e.g., monthly, calendar quarter, or plan year). The stability period, which determines how often a plan will update the interest rate it will use, typically is the plan year.

The new mortality table was developed from a study of mortality experience from over 100 uninsured pension plans during 1990 through 1994. The original mortality rates from this study are scaled down or improved due to the passage of time, up to the current year and beyond. Thus, each year the underlying mortality table for determining lump sums will be updated for another year of expected mortality improvement.

204(h) Notices. A plan sponsor that merely modifies the plan document's minimum statutory lump-sum basis to conform to the new standard will not be deemed to violate any anti-cutback requirements and will not be required to issue notices (often referred to as "204(h) notices") to participants about reductions in future benefits. However, if a plan sponsor wants to eliminate a separate, nonstatutory lump-sum standard (e.g., the plan wants to remove the 5% floor, if the plan determines lump sums using a formula that pays "the greater amount calculated using the applicable GATT rate and 5%"), the amendment would require a 204(h) notice. If a plan's lookback period is modified, the plan sponsor must provide the participants the greater of the lump sum determined with the interest rate applicable for the old lookback period and the new lookback period – at least for a one-year period after the plan adopts the new lookback period.

Plan Amendments. A plan sponsor may delay adopting the new statutory minimum lump-sum provisions until the end of the plan year that begins on or after January 1, 2009. The IRS has informally communicated that plan sponsors could temporarily preserve use of the prior 30-year Treasury rate standard exclusively up until the required adoption date of the new PPA interest-rate standard. By preserving the prior GATT interest basis, participants would generally see larger lump-sum values than those previously available, as the updated mortality table assumes increased longevity, resulting in higher lump sums when the 30-year Treasury rate remains constant. Even assuming the IRS formalizes this additional transition approach and can circumvent the protected benefit issues raised by the anticutback requirements of Internal Revenue Code section 411(d)(6), plan sponsors should be careful if they preserve the prior 30-year Treasury rate standard: for plans that make available lump sums prior to retirement eligibility age, the old interest-rate standard may disproportionately improve the lump-sum benefits for younger/shorter-serviced employees.

Effects of the New Rules on Lump Sums in 2008

Many calendar-year plans will look to the interest rates for October, November, or December of 2007 to dictate how lump sums will be calculated in 2008. The table below illustrates the impact of the new rules for a plan with a November lookback month and shows that for 2008, the lump sums for participants age 60 and older experience a negligible increase (within 0.5%) when compared with the analogous minimum lump-sum value available at same age during 2007. The minimum lump-sum values for 2008, for a plan with a November lookback month, are boosted by:

- a lower 30-year Treasury rate of 4.52% for November 2007 (applicable for 2008 payouts) versus the November 2006 rate of 4.69% (applicable for 2007 payouts);
- the fact that only 20% of the higher segment rates for November 2007 (4.92%, 6.02%, and 6.47%, respectively) are reflected in the lump-sum calculations for 2008; and
- the improved expected longevity under the new mortality table for 2008 (i.e., the table increases the present value if all other factors remain the same).

Below age 59, participants would start seeing a small decline in the factors used to determine the lump-sum value. At younger ages during 2008, the decline becomes more pronounced as the third segment rate of 6.47% for 2008 becomes weighted with the GATT rate of 4.52%, resulting in a net interest discount of 4.91% versus the uniform 2007 GATT rate of 4.69% (i.e., higher interest rates result in lower lump-sum values when the mortality basis is the same).

| Table 1. Comparison of Lump-Sum Value of \$1,000 month (commencing at age 65): GATT Basis in 2007 vs. PPA Basis with Static Interest Rates through 2012* | | | | | | | | | | |
|---|--|----------------|-----------------|-----------------|------------------|------------------|--|--|--|--|
| YEAR ⇒ | 2007 | 2008 | 2009 | 2010 | 2011 | 2012 | | | | |
| AGE | All Percentage Changes Shown are Relative to the 2007 Lump-Sum Value | | | | | | | | | |
| 65 | \$145,324 | \$145,977 0.4% | \$142,614 -1.9% | \$139,408 -4.1% | \$136,351 -6.2% | \$133,434 -8.2% | | | | |
| 64 | \$137,405 | \$138,033 0.5% | \$134,437 -2.2% | \$131,017 -4.6% | \$127,761 -7.0% | \$124,659 -9.3% | | | | |
| 63 | \$130,073 | \$130,619 0.4% | \$126,792 -2.5% | \$123,160 -5.3% | \$119,710 -8.0% | \$116,429 -10.5% | | | | |
| 62 | \$123,271 | \$123,702 0.3% | \$119,647 -2.9% | \$115,806 -6.1% | \$112,164 -9.0% | \$108,708 -11.8% | | | | |
| 61 | \$116,935 | \$117,220 0.2% | \$112,937 -3.4% | \$108,889 -6.9% | \$105,060 -10.2% | \$101,434 -13.3% | | | | |
| 60 | \$111,019 | \$111,133 0.1% | \$106,625 -4.0% | \$102,373 -7.8% | \$98,360 -11.4% | \$94,568 -14.8% | | | | |
| 55 | \$86,444 | \$86,016 -0.5% | \$81,038 -6.3% | \$76,421 -11.6% | \$72,134 -16.6% | \$68,148 -21.2% | | | | |
| 45 | \$53,639 | \$52,136 -2.8% | \$46,968 -12.4% | \$42,351 -21.0% | \$38,221 -28.7% | \$34,524 -35.6% | | | | |
| 35 | \$33,622 | \$32,059 -4.6% | \$27,831 -17.2% | \$24,186 -28.1% | \$21,040 -37.4% | \$18,321 -45.5% | | | | |

* The table assumes the plan uses a November "lookback" period. The November 2006 and 2007 GATT interest rates are 4.69% and 4.52%, respectively; the PPA's three-segment interest rates for November 2007 are 4.92% (first segment), 6.02% (second segment), and 6.47% (third segment), which are assumed to remain stationary through November 2011. The phase-in of the PPA interest-rate basis is complete in 2012 (i.e., there is no GATT interest rate reflected in the table for 2012).

For calendar-year plans with a December lookback month, if the applicable December 2007 interest rate structure remains similar to that of November 2007, the impact should resemble what is shown above (i.e., the December 2006 GATT rate was 4.68% compared with the November 2006 GATT rate of 4.69%).

Beyond 2008

The effect of the new rules becomes more dramatic over time, even assuming that the November 2007 interest-rate structure continues to apply in future years. In the 2012 plan year, when the three-segment rate is fully phased in, the drop in the lump-sum amount for an age-65 immediate annuity is just over 8%. The age-60 minimum lump-sum deferred annuity factor in 2012 is almost 15% below the age-60 factor applicable in 2007 (based on a November lookback month for the plan and assuming the interest-rate structure applicable for November 2011 is similar to that for November 2007). This may be of interest to plan sponsors considering terminating a plan, as well as to plan participants (especially those with frozen plan benefits). (See also, "Frozen Plan Termination Issues," below.)

If, alternatively, interest rates uniformly shift upward 25 basis points each year over the next five years, the impact on lump-sum factors becomes even more significant: The decrease in the 2012 age-65 factor is 15% lower than the 2007 age-65 factor (i.e., the additional 6.8% drop in the age-65 factor decrease compared with the age-65 decrease in 2012 under the level future interest-rate scenario is due to a parallel shift in the yield curve of 100 basis points by 2012, or a 1% upward shift in the yield curve).

Table 2. Comparison of Lump-Sum Value of \$1,000 month (commencing at age 65):
GATT Basis in 2007 vs. PPA Basis with Interest Rates Rising 0.25 Percentage Points Annually through 2012*

| YEAR ⇒ | 2007 | 2008 | 2009 | 2010 | 2011 | 2012 |
|------------|--|----------------|-----------------|------------------|------------------|------------------|
| AGE | All Percentage Changes Shown are Relative to the 2007 Lump-Sum Value | | | | | |
| 65 | \$145,324 | \$145,977 0.4% | \$139,675 -3.9% | \$133,875 -7.9% | \$128,526 -11.6% | \$123,582 -15.0% |
| 64 | \$137,405 | \$138,033 0.5% | \$131,358 -4.4% | \$125,234 -8.9% | \$119,601 -13.0% | \$114,408 -16.7% |
| 63 | \$130,073 | \$130,619 0.4% | \$123,598 -5.0% | \$117,177 -9.9% | \$111,290 -14.4% | \$105,880 -18.6% |
| 62 | \$123,271 | \$123,702 0.3% | \$116,358 -5.6% | \$109,665 -11.0% | \$103,551 -16.0% | \$97,951 -20.5% |
| 61 | \$116,935 | \$117,220 0.2% | \$109,573 -6.3% | \$102,632 -12.2% | \$96,314 -17.6% | \$90,550 -22.6% |
| 60 | \$111,019 | \$111,133 0.1% | \$103,203 -7.0% | \$96,034 -13.5% | \$89,535 -19.4% | \$83,629 -24.7% |
| 55 | \$86,444 | \$86,016 -0.5% | \$77,521 -10.3% | \$70,038 -19.0% | \$63,427 -26.6% | \$57,569 -33.4% |
| 45 | \$53,639 | \$52,136 -2.8% | \$43,872 -18.2% | \$37,013 -31.0% | \$31,304 -41.6% | \$26,540 -50.5% |
| 35 | \$33,622 | \$32,059 -4.6% | \$25,387 -24.5% | \$20,163 -40.0% | \$16,060 -52.2% | \$12,827 -61.8% |

* The table assumes the plan uses a November "lookback" period. The November 2006 and 2007 GATT interest rates are 4.69% and 4.52%, respectively; the PPA's three-segment interest rates for November 2007 are 4.92% (first segment), 6.02% (second segment), and 6.47% (third segment), which are assumed to increase by .25 percentage points per year from November 2008 through November 2011. The phase-in of the PPA interest-rate basis is complete in 2012 (i.e., there is no GATT interest rate reflected in the table for 2012).

In reality, however, participants age with every plan year that elapses and typically accrue additional benefits with salary increases and increased benefit service. As an illustration, assume the current final average earnings for a 60-year-old participant is \$40,000 and she has 20 years of service. Furthermore, the plan benefit formula grants an annual benefit accrual percentage of 1.5% per year of service. Thus, at age 60, she has earned \$1,000/month (calculated as 1.5% of pay times 20 years of service times \$40,000 divided by 12). Assume further that past and future pay increases have been 3% per year. The evolving accrued benefit and associated lump-sum value would be as follows:

| | | STATIONARY INTEREST RATES | | | | RISING INTEREST RATES | | | |
|------|-----|--|----------------------------|-----------|----------|--|-----------|----------|--|
| | | Present Value of Accrued Monthly Benefit Payable at Age 65 (Pre-PPA basis vs. PPA basis) | | | | Present Value of Accrued Monthly Benefit Payable at Age 65 (Pre-PPA basis vs. PPA basis) | | | |
| Year | Age | Monthly Accrued Benefit Payable at Age 65 | If Pre-PPA basis continued | Under PPA | % Change | If Pre-PPA basis continued | Under PPA | % Change | |
| 2007 | 60 | \$1,000 | \$111,019 | \$111,019 | - | \$111,019 | \$111,019 | - | |
| 2008 | 61 | \$1,082 | \$129,179 | \$126,774 | -1.9% | \$129,179 | \$126,774 | -1.9% | |
| 2009 | 62 | \$1,167 | \$146,704 | \$139,627 | -4.8% | \$142,543 | \$135,789 | -4.7% | |
| 2010 | 63 | \$1,257 | \$166,420 | \$154,768 | -7.0% | \$157,920 | \$147,249 | -6.8% | |
| 2011 | 64 | \$1,351 | \$188,640 | \$172,555 | -8.5% | \$175,715 | \$161,534 | -8.1% | |
| 2012 | 65 | \$1,449 | \$213,713 | \$193,358 | -9.5% | \$196,406 | \$179,081 | -8.8% | |

* The figures reflect the November 2006 and 2007 GATT interest rates of 4.69% and 4.52%, respectively; and the PPA's November 2007 three-segmented interest rates of 4.92% (first segment), 6.02% (second segment), and 6.47% (third segment). Under the "Rising Interest Rates" column these rates are increased by .25 percentage points per year beginning November 2008 through November 2011. The phase-in of the PPA interest rate basis is complete in 2012 (i.e., there is no GATT interest rate reflected in the table for 2012).

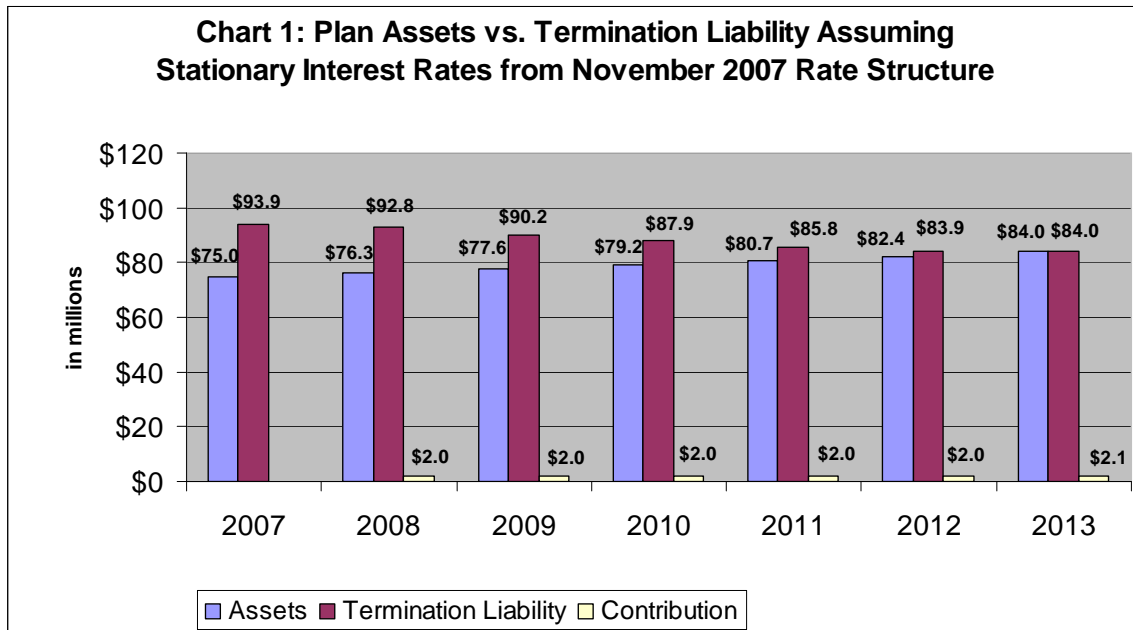
Frozen Plan Termination Issues

Plans that froze their benefit formula in recent years and hold insufficient assets to distribute their benefit obligations also may be interested in how the evolving changes to the lump-sum calculation requirements impact their projected plan termination liabilities in the coming years. Many frozen defined benefit plans have been patiently waiting for interest rates to rise, hoping that the plan termination shortfall would be eliminated. The following is a hypothetical illustration on how the migration to the new basis might impact these plans.

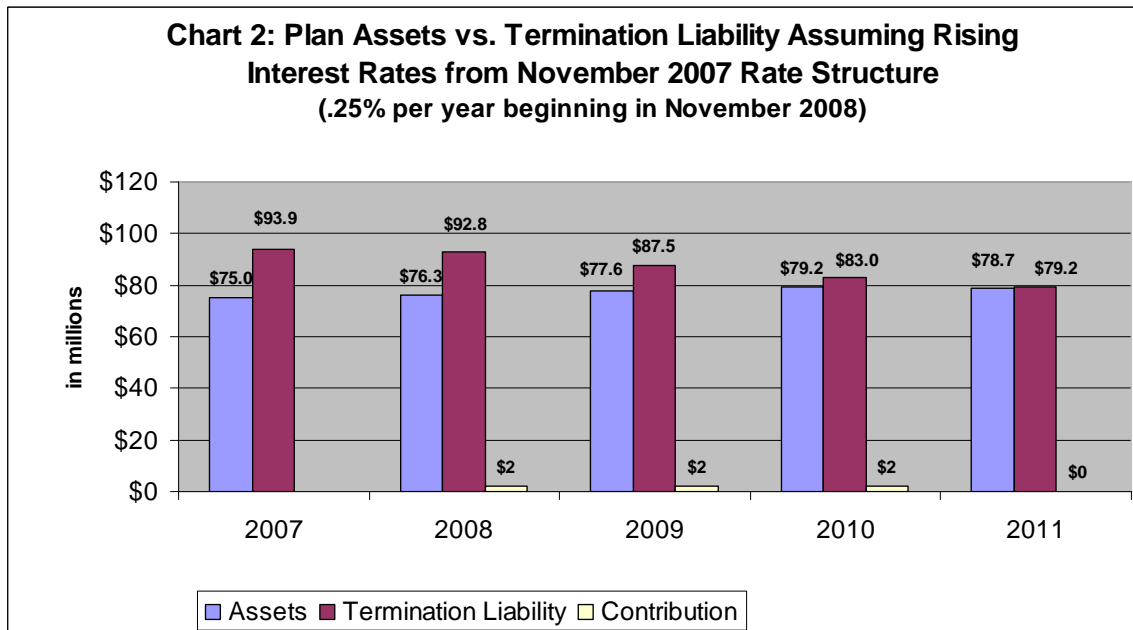
XYZ Inc. has a frozen plan and is looking to build sufficient assets to pay participants the value of their accrued benefits. This entails offering the choice of a lump sum or purchasing an annuity for current active employees and terminated vested participants. XYZ had been making contributions of \$3 million to \$5 million to the plan in recent years.

In early 2007, it received an actuarial liability report stating that the plan was 94% funded on a "current liability" basis, or about \$4.5 million underfunded. However, contributing \$4.5 million in 2007 would not allow XYZ to terminate the plan, because the amount of underfunding on a plan termination basis would be around \$19 million. This is because a corporate bond rate is used to determine the current liability in 2007, while active and terminated vested participants are assumed to elect the lump sum at the applicable 30-year Treasury rate when determining liabilities for plan termination purposes. Furthermore, the annuity purchase interest rate applicable for settling retiree obligations on plan termination is typically less than the corporate bond rate used for the current liability calculation. In this illustrative example, it is assumed that annuities are purchased for retirees using a gender-distinct contemporary mortality table and the prevailing first segment rate.

Because under the PPA, the lump-sum interest rate standard will gradually apply the three-segment yield curve standard, XYZ's liabilities will change accordingly. If current rates remain level over the next six years and XYZ can annually contribute \$2 million (\$10 million total in 2008 dollars when discounted at 5%) to the plan, the termination shortfall would be eliminated in 2013 (assuming a net investment return of 5% per year), as shown below:



If all applicable interest rates rise 25 basis points each year from the end of 2008 through the end of 2010, the plan termination shortfall is eliminated by the beginning of 2011. Under this scenario, XYZ contributes \$2 million/year over the next three years (\$5.4 million in 2008 dollars when discounted at 5% versus terminating at the beginning of 2008 at a cost of \$16.5 million):



For plan sponsors contemplating terminating a frozen defined benefit plan, the migration from 30-year Treasury rates to the PPA’s corporate bond interest-rate structure could present the setting to do so. While future interest rates cannot be predicted, modeling the evolving termination shortfall sensitivities under different interest-rate scenarios can illuminate the potential budgetary effects and help plan sponsors with planning.

Conclusion

Plan sponsors need to understand the impact of the new lump-sum standards under PPA and be poised to communicate the impact to participants. The primary determinant of the effect of PPA on lump sums will be dictated by the evolving interest-rate structure. For plans with a November lookback period, the changes for 2008 should not be significant relative to the lump-sum factors in 2007. However, the longer-term effects on lump-sum calculations will generally result in lower lump-sum values than before PPA.

One of the benefits of the new rules under PPA is the closer alliance (by 2012) of the plan termination basis with the plan's funding target developed with the annual actuarial valuation. Thus, in the future, plan sponsors are less likely to be told in their actuarial valuation funding report that the plan is "fully funded," yet learn that on a plan termination basis the plan is severely underfunded.

For plans with a different lookback period that could present more significant lump-sum changes for the 2008 plan year, sponsors might consider preserving the 30-year Treasury rate. However, without immediate further IRS guidance on any long-term consequences of preserving the 30-year Treasury standard, the logistics of adopting anything that deviates from the new PPA lump-sum basis may be too risky.

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