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Transitioning to Tax Reform for Pension Plan Sponsors

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Quick Summary: Most pension plan sponsors are still able to contribute and deduct contributions made in 2018 to their pension plan based on their 2017 corporate tax rate. Plan sponsors need to make these contributions on or before filing their corporate tax return and no later than 8½ months after the 2017 plan year end for their plan. Corporations with a marginal income tax rate of 25 percent or higher achieve a lower after-tax cost on deductible contributions for fiscal year 2017. The transition to tax reform presents a one-time opportunity to implement borrow-to-fund and de-risking strategies that produce significant after-tax savings and other benefits to the company.

Under the Tax Cuts and Jobs Act, corporate tax rates change in 2018 from a tiered rate structure to a single rate: 21 percent. Companies with net incomes that would otherwise be taxed at a rate higher than 21 percent will see the value of their ongoing deductible pension contributions drop to the new, lower rate, so companies should consider advance funding pension contributions in 2017 to take advantage of a deduction at the higher 2017 corporate rates, as illustrated by Example 1 below.

Example 1: Comparison of Net After-Tax Savings for a \$10 Million Contribution to the Pension Plan Pre- and Post-Tax Reform

2017 Corporate Tax Rate	2017 After-Tax Cost	2018 Corporate Tax Rate	2018 After-Tax Rate	After-Tax Savings with 2017 Deduction
25 percent	\$7,500,000	21 percent	\$7,900,000	\$400,000
34 percent	\$6,600,000	21 percent	\$7,900,000	\$1,300,000
35 percent	\$6,500,000	21 percent	\$7,900,000	\$1,400,000

For most companies, advance funding a pension contribution also reduces the PBGC variable premium, which is essentially a tax on the corporation sponsoring the pension plan. Thus for companies in the 35 percent corporate income tax bracket, the potential tax savings by

advance funding a contribution for 2017 is not only the 14 percent difference in corporate tax rate, it essentially includes the 3.8 percent variable premium rate on unfunded vested benefits in 2018, a 4.2 percent variable premium rate in 2019, and higher variable premium rates in future years so long as the plan stays in effect.

Company leaders typically consider reinvesting in their business first, so even though a company may have sufficient net income to advance-fund a pension contribution, it may not want to use available cash this way. Leadership may want to finance the advance funding and retain available cash for use in the business. If a loan is initiated in 2018, with the loan principal contributed to the pension plan on or before filing the company's tax return for 2017, this contribution of the loan principal qualifies as a deductible contribution for 2017. So the question becomes: does borrowing to make a lump sum contribution reduce or eliminate the tax-savings?

We'll offer three examples where borrowing to advance fund the pension plan at 2017 corporate tax rates results in significant after-tax savings, including savings on PBGC variable premiums. And, when the advance funding strategy is combined with other de-risking initiatives, the strategy can result in additional savings in PBGC per participant premiums and administrative expenses.

Our series of three real-world examples are based on the following assumptions:

- The company is a C corporation with a marginal tax rate for 2017 of 35 percent and 21 percent in 2018 and later years;
- The company sponsors a traditional pension plan that is currently frozen, meaning that there are no new participants allowed to enter the plan and current active participants do not accrue any further benefits under the plan. Also, all participants are fully vested in their accrued benefits;
- The company's estimated loan interest rate is fixed at 8 percent, their loan term is 5 years, and the loan

payments are level and fixed for the life of the loan;

- The 8 percent interest rate is also used as the company's assumed cost of capital in determining the net after-tax present value of contributions and PBGC premiums;
- For comparison, the company models level funding over a 7-year period with a 4 percent discount rate, consistent with the amortization period used for minimum funding and the approximate rate of return on fixed income investments aligned to the profile of the plan's liabilities, often called liability driven investments;
- The plan's Unfunded Vested Benefits (the same amount used to determine the PBGC variable premium) are estimated to be \$50 million;
- The annual inflation rate is 2 percent.

Example 2: Advance Funding to Eliminate PBGC Variable Premiums

Let's look at what's going on in Example 2 briefly. In this example, the plan sponsor is evaluating a level contribution strategy over seven years compared to an advance funding strategy to eliminate PBGC variable premiums within the seven-year period. The level contribution strategy reduces PBGC variable premiums through the seven-year period and ultimately eliminates PBGC variable premiums beginning in 2025. With level funding, the net after-tax present value of contributions and premiums in this seven-year level funding forecast is roughly \$38,400,000.

The lower part of the linked table considers advance funding a lump sum contribution of \$50 million implemented through a loan to the company. The 2018 loan principal of \$50 million is contributed and deducted at the 2017 corporate tax rate of 35 percent with loan payments beginning in 2018 and continuing through 2022, when the loan is paid in full. The \$50 million contribution eliminates PBGC variable premiums beginning in 2018 and throughout the seven-year period. With advance funding through borrowing, the net after-tax present value of contributions in this seven-year forecast is roughly \$15,300,000.

Comparing the two strategies, the net after-tax savings is \$23,100,000. These savings are significant, a direct result of advance funding a contribution at 2017 corporate rates and annual savings on PBGC premiums, which more than offsets the company's cost of borrowing.

Example 3: Advance Funding and Lump Sum Window to Reduce PBGC Premiums

Now that the plan sponsor has decided to advance fund with a loan, it is considering what other options it has to help reduce its future risk. Advance funding to eliminate PBGC variable premiums can also allow the company to execute a lump sum window de-risking program in 2018, as the expected participant lump sums paid should be closely equivalent to the PBGC vested benefit liability. In Example 3, we are making the reasonable assumption that the lump sums paid equal the PBGC vested benefit liability, so there continues to be no PBGC variable premium while the participant count is reduced substantially beginning in 2019. Thus in this example, the savings from advance funding increase further through the execution of a lump sum window and the resulting reduction in PBGC per participant premiums.

With this approach, we start with the net after-tax present value of contributions of \$15,300,000 from Example 2 above. In addition to this, there are annual savings on PBGC premiums starting at roughly \$40,000 in 2019, and increasing thereafter due to the lump sum window. The net after-tax present value of the PBGC premiums is \$1,100,000. Advance funding and executing a lump sum window results in a net after-tax present value of contributions and premiums of \$16,400,000.

The net after-tax savings during the seven year period rises to approximately \$23.4 million, which includes savings on both the PBGC per participant and variable premium.

Example 4: Advance Funding with a Lump Sum Window and Annuity Purchase to Reduce PBGC Premiums

Our last example illustrates how the plan sponsor can further reduce its risk with advance funding and two

de-risking programs implemented in 2018 (see our article on using a spinoff/termination approach for de-risking). The plan sponsor is considering offering a lump sum to their vested former participants and buying annuities for their retired participants. In Example 4, the advanced funding amount grows to \$60 million, the amount needed to offer the lump sum window and buy annuities. Thus in this example, we show the number of participants reducing even further than in Example 3, with greater savings in PBGC per participant premiums. The net after-tax present value of contributions and premiums increases to \$18,900,000.

The net after-tax savings in Example 4 are approximately \$20.8 million, the lowest savings in our series of examples. The savings have decreased due to the additional cost of buying annuities for retirees; the benefits to the plan sponsor are still significant since the lump sums and annuities are transferring significant risk from the plan and plan sponsor.

Summary and comparison table

The following table summarizes and compares our three examples, each improving the funding of the plan and producing net after-tax present value savings due to advance funding in 2017.

	Example 2: Borrow-to-Advance-Fund	Example 3: Borrow-to-Advance-Fund + Execute Lump Sum Window	Example 4: Borrow-to-Advance-Fund + Execute Lump Sum Window + Annuity Risk Transfer
Funding Amount	Unfunded Vested Benefits	Unfunded Vested Benefits	Unfunded Vested Benefits + Retiree Group Annuity Premium
Before-tax annual cash flow is higher in early years, but is fixed throughout the loan term if loan terms are fixed	✓	✓	✓
After-tax annual cash flow is higher in early years, but is fixed throughout the loan term if loan terms are fixed	✓	✓	✓
Additional de-risking costs	N/A	Additional cost of de-risking through lump sum window can be \$0 with the right plan provisions and should be immaterial	Cost of de-risking through annuity purchase carries a literal premium over the current PBGC liabilities
Expected Benefits through 2024 (and likely beyond)			
Balance sheet pension liability is substantially reduced or eliminated under US GAAP accounting	✓	✓	✓
Pension accounting expense improves due to greater assets	✓	✓	✓
Minimum required funding holiday	✓	✓	✓

	Example 2: Borrow-to-Advance-Fund	Example 3: Borrow-to-Advance-Fund + Execute Lump Sum Window	Example 4: Borrow-to-Advance-Fund + Execute Lump Sum Window + Annuity Risk Transfer
PBGC variable premiums eliminated	✓	✓	✓
Savings on PBGC per participant premiums based on participants whose risk is transferred from the plan		✓	✓
Administrative costs reduced		✓	✓
With implementation of LDI strategy, interest rate and investment risks better managed	✓	✓	✓
All risks (interest rate, investment, demographic, operational and regulatory risks) transferred from the plan and plan sponsor with respect to the participants whose risk is transferred		✓	✓

Other considerations

With examples showing large savings like this, the natural question is: Why not advance fund the pension plan? Companies considering borrowing to advance fund should review their existing loan covenants and evaluate how additional borrowing will affect these covenants, then have conversations with their lending partners on available loan terms and the timing needed to establish and fund the loan. Also, since the corporate alternative minimum tax continues to apply for 2017, companies should review their expected 2017 tax liability, including the corporate alternative minimum tax. Finally, since a variety of corporate tax provisions are changing under tax reform, the company would be wise to estimate its 2018 tax liability under tax reform while evaluating a borrowing and advance funding strategy.

The expected benefits of any advanced funding strategy depend on controlling the two primary risks of the pension plan: interest rate risk and investment risk, which if left unmanaged result in volatility of the plan's funded status and contributions. Controlling these risks involves implementing a liability driven investment (LDI) strategy, a strategy we've addressed in other articles and are assuming you're familiar with today. A plan sponsor

considering advanced funding should work with their actuary and investment advisor to define and implement an LDI strategy once the advance funding occurs. Once implemented, the LDI strategy should be regularly monitored to ensure that the profile of the liabilities continues to be properly aligned with the plan's portfolio.

The bottom line: company leaders should evaluate this strategy against other company objectives and conduct a comprehensive review of their 2017 and expected 2018 corporate taxes.

In perspective

Business conditions improved through 2017, and business leaders are showing confidence that 2018 will be at least as good as 2017 under tax reform. Today's strong economy presents opportunities for companies to consider advance funding their pension plans to accomplish longer-term objectives. With corporate tax rates declining to 21 percent under tax reform, companies should examine whether their specific situation makes advance funding, possibly including borrowing, worth executing in 2018.