De-Risking in a Low-Interest-Rate Environment

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PUBLISHED: FALL 2015

PENSION & LONGEVITY RISK TRANSFER for INSTITUTIONAL INVESTORS
The persistent low-interest-rate environment is proving detrimental to the funding levels of defined-benefit (DB) pension plans in the United States and around the world. In 2014, for example, plan sponsors experienced significant declines in pension funding status, with the overall funded ratios of the 100 largest U.S. corporate DB pension plans falling to 81.7% at year-end—down from 87.7% at the close of 2013 (Milliman [April 2015]). This was primarily due to the decline in interest rates coupled with the adoption of new mortality tables, which offset equity market gains. Pension plans for the United Kingdom’s 350 largest companies also experienced a decline in funded ratios, from 91% at the end of 2013 to 85% at year-end 2014 (Mercer [January 2015]).

More recently, funded status has improved because of a modest rise in interest rates and positive equity returns—in the United States, to 84%, and in the United Kingdom, to 89% (Milliman [June 2015] and Mercer [June 2015]).

Despite these secular headwinds, reasons to de-risk remain plentiful, and the recent increase in pension de-risking activity is reflective of plan sponsors’ response to the current pension landscape. Longevity improvements and increased awareness of longevity risk have been a driving factor of sponsors to divest pension risk. In addition, escalating Pension Benefit Guaranty Corporation (PBGC) premiums—which are set to triple by 2016—are giving plan sponsors another reason to reduce pension risk now. Well-funded plans should not defer de-risking actions, because they are poorly compensated for bearing this risk. When a plan is well funded, the excess funds cannot be directed to other business pursuits. Therefore, the plan sponsor’s upside is capped, while its downside is not.

Today’s interest-rate environment also offers a unique opportunity for sponsors of underfunded plans. These sponsors can borrow at attractive rates to reduce pension deficit, and subsequently de-risk their plans. De-risking pensions can allow a company to achieve pension contribution, and hence cash flow certainty, and enhance retirement security for its retirees and employees. Recent evidence has also shown that reducing pension risk increases financial flexibility and creates shareholder value.

PENSION DE-RISKING GAINS MOMENTUM

In the United States and United Kingdom, more than two-thirds of corporate plans have either closed or frozen their pension plans. For many plan sponsors, pension de-risking has become a question of “when and how,” rather than “if.”
A recent industry insight survey confirmed that, in spite of the ongoing low-interest-rate environment, pension risk remains a key focus for many plan sponsors. The survey results were included in the *Pension Plan De-Risking, North America 2015* Report, commissioned by Clear Path Analysis and sponsored by Prudential Retirement®. The survey closely examines the views of 65 senior finance, pension, and treasury professionals to better understand their perspectives on de-risking pension plans in the current marketplace climate. The results bear out the notion that lengthening life expectancies, continuing market volatility, funding requirement uncertainty, and asset/liability mismatch are contributing to significant pension risk and consequently causing many plan sponsors to explore de-risking solutions. Case in point: nearly a quarter of those private plan sponsors surveyed are either considering transferring, or are very likely to transfer, pension risk in 2015 (Clear Path Analysis [May 2015]). Further, 50% of private pension plan professionals either partially or fully disagree with the belief that companies are better off delaying the implementation of risk-management solutions to benefit from further improvements in the financial markets.

The United Kingdom has been the leader in pension de-risking—including pension buy-outs, buy-ins, and longevity insurance—with nearly $200 billion of transactions having been completed, including 33 transactions of $1 billion or larger. The U.S. buy-out market has seen increased activity among small- to midsized plans, with a number of “jumbo” transactions occurring as well. In fact, there have been five U.S. transactions of $1 billion or more since the close of 2012.

Counted among the more recognizable corporations to transfer pension risk in 2014 are British Telecom, Motorola Solutions, Bristol-Myers Squibb, and Visiteon. And 2015 has also witnessed significant buy-out activity, with Kimberly–Clark and Timken announcing transactions in the first quarter alone, demonstrating an ongoing commitment to de-risk balance sheets. While each company and transaction is unique in terms of its strategy, all share the common goal of achieving a lower-risk future.

**REASONS TO DE-RISK ARE PLENTIFUL**

Financial-market volatility continues to plague pension plans that have not initiated a de-risking process. As evidence, since 2000, the average U.S. pension fund has twice lost more than 30% in funded status during market downturns (see Exhibit 1). Over this period, more than $572 billion in cash contributions—as well as substantial market gains—have been required to return these pension funds to “healthy status.” Further, this extreme volatility is at its worst in times of recession, and in falling-interest-rate environments.

Some of the less evident—but equally important—reasons companies should de-risk are described below.

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**Exhibit 1**

**A Volatile Market**
New Mortality Tables Have Increased Awareness of Longevity Risk

In the United States, plan sponsors who adopted the new mortality and improvement scale assumptions (retirement plan [RP]-2014 tables with mortality projection [MP]-2014 improvements) recommended by the Society of Actuaries (SOA) during fiscal 2014 saw their pension obligation increase by an average of 4%–6%. These tables confirmed that people are living longer than suggested by the obsolete tables in use previously—tables that were relied upon to calculate pension liabilities (the RP-2000 base table plus Scale A improvement). For some pension-heavy companies, increases in pension liabilities meaningfully impacted financial leverage. Moreover, when the Internal Revenue Service adopts the new mortality tables (most likely in 2017), firms will be obligated to fund a larger deficit over the Pension Protection Act–prescribed timetable (subject to Moving Ahead for Progress in the 21st Century [MAP-21] relief), constituting a cash flow negative for countless plan sponsors.

The new tables came as no surprise to insurers, however, and did not impact how pension buy-outs were priced. In fact, the updated mortality basis enabled the accounting liability and the buy-out pricing to become better aligned. The cost of a retiree pension buy-out had previously been widely reported to represent a roughly 10% premium over the corresponding Generally Accepted Accounting Principles (GAAP) liability. As plan sponsors updated their mortality basis from the current standard to the more updated tables issued by the SOA, the premium over GAAP liability has reduced, making buy-outs appear more attractive. As investors become discerning regarding the adverse impact of unhedged pension risk on financial flexibility and leverage, more companies will be motivated to address this risk.

PBGC Premiums Increase

In the United States, PBGC premiums continue to be a significant drain on plan sponsors, as they represent the annual expenses that are related to participant servicing and plan administration. These expenses are composed of a fixed component, which is based on the number of employees, and a variable component, which is based on the size of the pension deficit. Both fixed and variable PBGC premiums are slated to rise in the coming years, making it increasingly costly for companies to sponsor DB plans and to run pension deficits. The fixed rate premium for each plan participant is scheduled to increase from $57 in 2015 to $64 in 2016. Similarly, the percentage of unfunded vested liability that must be paid in variable premiums will increase from 2.4% in 2015, to 2.9% in 2016. These premium hikes make it expensive for plan sponsors to run a pension deficit and are encouraging sponsors to pre-fund pension deficits and de-risk their DB plans.

TIME IS RIGHT FOR PENSION DE-RISKING

Plan sponsors that defer taking de-risking actions may be misjudging the risk they are taking. We believe that waiting for additional advancement in funded status is not optimal, as sponsors are inadequately rewarded for assuming this risk. Once a plan’s desired funding level is reached, the plan sponsor receives little economic benefit from continued improvement, as excess funds in the plan cannot be used for other business purposes. Therefore, as a plan approaches fully funded status, the plan sponsor’s upside is capped, while its downside is not.

Relying on improvements in market conditions to close funding gaps has proven to be precarious, given that equities and interest rates are volatile. We believe that sponsors with underfunded plans should instead consider borrowing to fund their pension plans as a part of a strategy toward a lower-risk future. The current low-interest-rate environment presents a unique opportunity to issue debt at very attractive rates to fund pension deficits.

Borrow to Fund Pension Deficits

By borrowing to fund a pension deficit, companies can replace volatile pension debt with contractual debt, substitute increasing PBGC variable rate premiums with a fixed interest expense, and accelerate tax benefits from deductible pension contributions.

We analyzed a “borrow to fund” strategy for a pension plan that is 85% funded.2 We compared two different scenarios: one whereby the plan fully funds itself over the Pension Protection Act–prescribed time period of seven years, and an alternate scenario whereby the sponsor issues debt and contributes proceeds to fund the plan immediately. Our analysis suggested that for companies that are rated BB or higher, it is economically beneficial to borrow today to immediately fund pension
The net present value benefits of such a strategy are significant, though modestly smaller in magnitude, if the plan sponsor is not a full taxpayer.

Rating agencies are likely to view substitution of pension debt with contractual debt as credit neutral, although we believe treasurers and chief financial officers will view replacing volatile pension debt with fixed obligations as a positive. We believe such a strategy is optimal for most sponsors rated BB or higher, except those for which a restrictive leverage covenant in credit facilities may become adversely impacted by the issuance of contractual debt.

Numerous companies, including Verizon Communications and Kimberly-Clark Corporation, issued debt to fund pension deficits while executing buy-out transactions, as shown in Exhibit 2.

**High Allocation to Fixed-Income Assets**

Milliman’s 2015 pension study suggests that the largest plans have increased their allocation to fixed income from 28% of assets in 2005 to 43% in 2014. Firms that have a high allocation of fixed-income assets are significantly immunized against changes in interest rates. These firms could consider transferring risk on a portion of their liabilities (“retiree obligation”) to an insurer, and can use their fixed-income assets to pay the premium (“in-kind asset transfer”).

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**EXHIBIT 2**

Debt Issuance by Companies that Recently Completed Pension Risk Transfer Transactions

<table>
<thead>
<tr>
<th>Company</th>
<th>Date of Debt Issuance</th>
<th>Debt Issuance Pre/Post Transaction</th>
<th>Contributions Related to Transaction</th>
<th>Transaction Date</th>
<th>Pension Deficit Pre-Transaction</th>
</tr>
</thead>
<tbody>
<tr>
<td>Kimberly-Clark Corporation</td>
<td>2/27/15</td>
<td>500</td>
<td>410</td>
<td>2/23/15</td>
<td>675</td>
</tr>
<tr>
<td>Bristol-Myers Squibb Company</td>
<td>-</td>
<td>-</td>
<td>-</td>
<td>10/1/14</td>
<td>(173)</td>
</tr>
<tr>
<td>Motorola Solutions, Inc.</td>
<td>08/19/14</td>
<td>1,400*</td>
<td>1,100</td>
<td>9/25/14</td>
<td>1,246</td>
</tr>
<tr>
<td>NCR Corporation</td>
<td>-</td>
<td>-</td>
<td>48</td>
<td>12/17/14</td>
<td>424</td>
</tr>
<tr>
<td>Verizon Communications Inc.</td>
<td>11/7/12</td>
<td>4,500*</td>
<td>2,600</td>
<td>10/17/12</td>
<td>6,472</td>
</tr>
<tr>
<td>General Motors Company</td>
<td>-</td>
<td>-</td>
<td>2,300</td>
<td>6/1/12</td>
<td>14,213</td>
</tr>
</tbody>
</table>

In USD millions.

Notes:

*Company filings.

*Pension data from the latest fiscal period before the transaction was announced.

*Debt issued for general corporate purposes including pensions.

*Transaction funded through cash balance, that reduced GM’s liquidity.

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**Insurance Capacity Exists Today**

Presently there exists capacity for transferring risk to insurers and reinsurers. And while capacity is expected to remain available in the future, costs may increase as pressures mount on the supply–demand imbalance for long-dated corporate bonds. Furthermore, the business mix of insurers may shift as their own exposure to longevity risk increases, causing capital to become less abundant and command a higher return.

**BENEFITS OF DE-RISKING**

Effective risk management and pension de-risking solutions can help alleviate the pressure market volatility creates. By employing appropriate de-risking strategies, plan sponsors and fiduciaries can

- achieve plan contribution certainty;
- allow greater focus on the firm’s core business;
- enhance retirement security for retirees and employees; and
- increase financial flexibility and create shareholder value.

Many chief financial officers and analysts believe that pension de-risking achieves plan contribution certainty and enhances retirement security, yet they wonder if such actions actually create shareholder value. Their
question exists, in part, because the cost of risk transfer is compared against pension liabilities reported under U.S. GAAP, which in our view does not reflect the true economic cost. GAAP liabilities exclude the ongoing expenditures plan sponsors must bear (Mathur and Kaplan [2014]), and more importantly, employ a discount rate that doesn’t accurately express the inherent safety of pension promises. To the inexperienced eye, pension risk transfer can sometimes be seen as cost prohibitive; however, as investors take a closer look, they would likely come to a different conclusion.

**Capital Structure Implications**

Underfunded pension promises have been seen as ranking pari passu to unsecured creditors. However, in recent municipal and corporate bankruptcies, pension promises have fared much better than general unsecured creditors. Several recent corporate bankruptcies involving prominent companies in the telecom, technology, and auto sectors have demonstrated that pension benefits were not impacted, while creditors had to bear significant losses (Mathur and Kaplan [2015]).

Contrary to popular belief regarding the safety of public pensions, recent municipal bankruptcies have resulted in only modest impairments to pension plans. For example, during the Detroit and Stockton, CA, bankruptcies, the plans of adjustment favored the workforce over bondholders (Fitch Ratings [2014]).

A growing body of evidence suggests that companies do not pare back pensions even under stress; pension promises are “certain” rather than conditional.

Under U.S. GAAP, pension liabilities are discounted using a high-quality corporate bond yield that is generally understood to mean an AA corporate curve. It can be argued that the GAAP-prescribed discount rate (AA) does not reflect the inherent safety of pension promises. Investors should consider comparing the “cost” of risk transfer against an economic pension liability that is computed by discounting pension payments at a lower rate. They should adjust pension liabilities to include the ongoing expenses of running a plan and discounting those payments at a lower rate that is appropriate not only for highly rated companies, but also for all firms, in particular those in heavily unionized industries such as telecommunications, transportation, auto, manufacturing, and construction.

The economic pension liability may be much higher—as much as 114% of accounting liability when discounted—at the risk-free rate. The cost of a typical risk transfer for retirees (at 104%) is less than the economic liability, thus suggesting that transferring pension risk can create significant value for shareholders.

**Shareholder Value is Created**

It is our position that pension risk reduction lowers the likelihood of very high levels of plan contributions caused by factors such as poor equity market returns, persistently low interest rates, and longer life spans. In other words, by reducing pension risk, a company can narrow the projected range of required plan contributions in the future. As a result, pension risk reduction can raise the lower end of the valuation range of a firm, assuming a valuation is derived by discounting the projected future cash flows of the company (Mathur and Kaplan [2014]). Further, based on research by Jin, Merton, and Bodie [2006], we believe that risk-reduction measures can positively impact a company’s valuation by lowering its weighted average cost of capital (WACC), because a firm’s stock beta typically reflects the riskiness of the company—including its DB plan. The riskiness of a pension plan is based on how the plan’s assets are invested and the composition of the plan’s liabilities. Both liability-driven investing and risk transfer solutions can reduce pension risk and firm beta, while favorably impacting firm valuation.

The market rewards firms that proactively manage risk, and numerous examples exist with companies such as General Motors, Honeywell, NCR, SPX, and Verizon, all of which implemented de-risking actions within the past three years, and each of which experienced stock price outperformance relative to the market on the date of the de-risking announcement.

Exhibit 3 illustrates returns relative to the S&P 500 Index on the days when de-risking activities were announced.

**Fortune Favor the Prepared**

Current market conditions have created attractive opportunities for de-risking action. These opportunities fluctuate, however, and we believe it is important for companies to begin preparing to reduce pension risk. Whether a pension risk transfer transaction is imminent, a few years away, or only a consideration, a plan sponsor can take steps today to prepare for a lower-risk future.
EXHIBIT 3
Market Reactions to De-risking Activities

<table>
<thead>
<tr>
<th>Company</th>
<th>Change</th>
<th>Announcement Date</th>
<th>Description</th>
</tr>
</thead>
<tbody>
<tr>
<td>Kimberly-Clark</td>
<td>+0.1%</td>
<td>February 23, 2015</td>
<td>Annuity contract for approximately 21,000 retirees in the U.S.</td>
</tr>
<tr>
<td>Bristol-Myers Squibb</td>
<td>-0.8%</td>
<td>September 30, 2014</td>
<td>Annuity contract for approximately 8,000 U.S. retirees</td>
</tr>
<tr>
<td>Motorola</td>
<td>+2.3%</td>
<td>September 25, 2014</td>
<td>Annuity contract for 30,000 retirees and a lump sum offering to 32,000 term vested participants</td>
</tr>
<tr>
<td>NCR</td>
<td>+0.6%</td>
<td>November 19, 2013</td>
<td>U.K. pension annuitization</td>
</tr>
<tr>
<td>Verizon</td>
<td>+2.6%</td>
<td>October 17, 2012</td>
<td>Annuities for management retirees (“lift-out”); Earning release also impacted announcement day returns</td>
</tr>
<tr>
<td>NCR</td>
<td>+6.4%</td>
<td>July 31, 2012</td>
<td>Lump sums to certain deferred vested; $100M NPV benefits disclosed</td>
</tr>
<tr>
<td>General Motors</td>
<td>+1.6%</td>
<td>June 1, 2012</td>
<td>Annuities (spin/termination) and lump sums to retirees</td>
</tr>
<tr>
<td>Ford</td>
<td>-2.50%</td>
<td>April 27, 2012</td>
<td>Lump sums to U.S. salaried and term vested participants; Earning release also impacted announcement day returns</td>
</tr>
<tr>
<td>Honeywell</td>
<td>+3.4%</td>
<td>November 15, 2010</td>
<td>Accelerated funding; asset de-risking strategy MTM pension accounting</td>
</tr>
</tbody>
</table>

Notes: Announcement day returns relative to the S&P 500 Index.

ENDNOTES


2 “Borrow to Fund as Part of Your Path to a Lower-Risk Future” is a forthcoming Prudential research article.

3 Prominent de-risking actions and risk transfer transactions greater than $1 billion.

4 See Myth 4—Transferring DB Risk to an Insurer Is Too Expensive and Will Become More Expensive with New Mortality Tables. GAAP liabilities do not include ongoing costs such as administrative and PBGC expenses, investment management fees, and credit defaults and downgrades.

5 As a result of negotiations with unions, Detroit instituted new pension plans beginning July 1, 2014, whereby active employees retain their earned benefits under the new plans until June 30, but earn benefits under the new plans going forward. The new plans lower the multiplier, increase the retirement age, and reduce cost of living (COLA) adjustments. Even more significant is the risk sharing (reduction or elimination of COLA) and increased contributions.


7 Positive market reaction is notwithstanding one-time charges and cash contributions required to restore funded status. Companies that currently do not follow mark-to-market accounting may have to recognize a one-time charge to reflect actuarial losses in proportion to pension liabilities that are settled.

8 Prominent de-risking actions and risk transfer transactions greater than $1 billion.

REFERENCES


——. “100 Pension Funding Index,” June 2015.

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