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LDI Portfolios: Keep Them Bundled

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When it comes to LDI portfolios, there is a wide range of preferences concerning customization and the balance between credit and government exposure. Some plan sponsors embrace highly customized solutions that seek to minimize potential mismatches versus liabilities. Others value the simplicity, breadth and comparability of standard benchmarking options (such as blends of long credit and long government indexes). Similarly, some plan managers favor a higher credit content in LDI portfolios to tighten up the match to the liability discount rate, while others emphasize the diversification benefits of long government bonds. Whatever one's preference, plan sponsors must decide whether their credit and government allocations will be combined in bundled LDI portfolios or managed separately in unbundled LDI portfolios. Once we consider how an unbundled approach may create opportunity costs as well as challenges related to rebalancing and diminished excess return potential, we believe the bundled approach offers the better long-term solution.

Typically, for plans with large liability-driven investing (LDI) allocations, and consequently lower allocations to return-seeking assets, the optimal LDI portfolio carries a fairly large allocation to credit (coupled with a relatively small exposure to government bonds to align the average quality of the LDI portfolio with the average quality of the bonds used to calculate the liability discount rate). On the other hand, plans at an earlier stage on their de-risking glide path often have a significant allocation to return-seeking assets, and therefore a lower LDI allocation. Those plans are likely to run an LDI portfolio that is more balanced between credit and government sector weightings. Despite the wide range of credit versus government allocations in LDI portfolios, most plan sponsors will ultimately combine significant long credit exposures with some amount of government bonds. Thus, the question that applies to almost every plan is whether to implement:

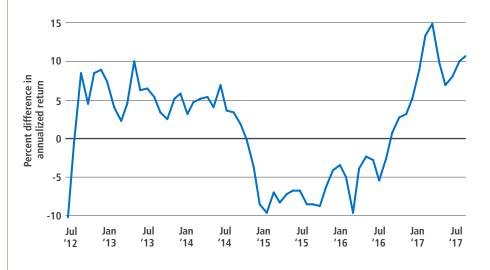
- **Bundled** LDI portfolios that combine together the credit and government sleeves in one or several LDI mandates Or
- Unbundled LDI portfolios with separate dedicated long credit and dedicated long government mandate(s)

On the surface, the unbundled approach may appear inviting. It potentially allows plan sponsors to access long government bond exposure with relatively low investment management fees and limit the higher fees of traditional actively managed LDI strategies to the portion of LDI assets invested in long credit. However, upon closer analysis of the unbundled approach's opportunity costs and challenges related to rebalancing and diminished excess return potential, we believe the bundled approach is a better option to implement LDI strategies.

UNBUNDLED APPROACH: FEE SAVINGS MAY BE INSIGNIFICANT RELATIVE TO INCREMENTAL BURDEN

The main driver behind the recent push to unbundle the implementation of LDI mandates has been the desire to reduce investment management fees. It is wellknown that dedicated passive (or low discretion) long government mandates typically carry a management fee that is significantly lower than that of actively managed LDI portfolios. Thus, the proponents of unbundling have Figure 1: Significant performance divergence between long credit bonds and long government bonds is likely to lead to considerable rebalancing requirements with an unbundled LDI approach

Long credit minus long government performance (Rolling 1-year performance over the last 5 years)



Long credit minus long government performance (Rolling 1-year performance over the last 10 years)



Source: Bloomberg and PIMCO as of 31 July 2017. **Hypothetical example for illustrative purposes only**. Long Credit is represented by the Bloomberg Barclays U.S. Long Credit Index and Long Government is represented by the Bloomberg Barclays US Long Government Index. It is not possible to invest directly in an unmanaged index. Figure provided for illustrative purposes and is not indicative of the past or future performance of any PIMCO product. suggested they could reduce the overall investment management fee on a plan sponsor's LDI allocation by carving the long government allocation out of the actively managed LDI portfolio. It's critical, however, to balance potential fee savings against the implications of unbundling.

Presumably, a plan sponsor implementing the unbundled approach will have first determined its desired or optimal allocation between long credit bonds and long government bonds. However, because the realized performance difference between these instruments can be quite large, even over short periods of time (see Figure 1), unbundled LDI portfolios will need to be rebalanced frequently to maintain the desired credit versus government mix.

This explicit rebalancing requirement introduces a number of disadvantages and challenges compared with a bundled approach. Indeed, plan sponsors or advisors will need to dedicate resources to continuously monitor the credit versus government exposure at the overall fixed income portfolio level and often execute reallocations between the different pieces. In addition, those reallocations will generate incremental transaction costs that will offset the potential savings in investment management fees resulting from carving out the management of long government bonds (see Figure 2). Finally, unbundled approaches often require monitoring of a larger number of investment managers and accounts, which could further reduce potential net fee savings.

Long credit portfolio weight 75% Assumptions Long government portfolio weight 25% Hypothetical fee savings on long 15 bps government allocations Hypothetical weighted-fee savings on overall 4 bps LDI portfolio (15 bps * 25% allocation) Estimated rebalancing transaction cost to -2 to -3 bps maintain 75/25 mix (annual average) Net fee savings 1 to 2 bps

Net fee savings may be small in light of other challenges introduced by unbundling

Source: PIMCO as of 30 September 2017. **Hypothetical example for illustrative purposes only**. Estimated transaction cost analysis assumes monthly rebalancing to match the implicit monthly rebalancing of a bundled approach. Estimated transaction costs based on 1 bp roundtrip bid-ask spread for long government bonds and 10 bps roundtrip bid-ask spread for long credit bonds. Rebalancing assumes only one-way transaction (not roundtrip). Analysis conducted on both the 5-year period ending 7/31/2017 and the 10-year period ending 7/31/2017. Both periods indicated a 2 bps to 3 bps average annual rebalancing transaction cost. Figure provided for illustrative purposes and is not indicative of the past or future performance of any PIMCO product.

THE OPPORTUNITY COST ASSOCIATED WITH UNBUNDLING IS SIGNIFICANT

One enduring myth often used to justify moving to an unbundled approach claims that the switch has no excess return (or alpha) implications. That thesis argues that because active management of long government bonds in isolation has limited potential to generate excess returns (or alpha), then carving them out of the actively managed LDI portfolio will have little to no alpha implications and therefore no overall return implications. We strongly dispute that assertion.

It may be true that the prospects for adding value when managing long government bonds **in isolation** are limited. However, when those bonds are instead part of a combined portfolio (that includes a significant share of nongovernment holdings), we can seek to achieve an alpha target commensurate with that of an actively managed LDI strategy on the entire amount invested in that portfolio, including the dollars invested in long government bonds. In other words, we can largely implement the same top-down and bottom-up active positioning, both directionally and in magnitude, whether the actively managed LDI portfolio benchmark is 50% credit/50% government, 75% credit/25% government or 100% credit. That is, if we want to be 2% overweight a certain issuer, 1% underweight another and run a longer-duration posture by 0.5 years, we can implement that positioning in any of the three portfolios above and ultimately seek the same excess return. On the other hand, when a plan sponsor

Figure 2: Unbundled approach cost savings may be limited

moves long government bonds from a bundled approach to an unbundled one – where long government bonds are managed passively or in low discretion fashion – it may forgo a large chunk of the alpha potential on the dollars moved.

For example, assume a \$100 million dollar investment in a bundled portfolio that is actively managed against a 75% long credit/25% long government benchmark. Under this setup, the plan would have an opportunity to earn active management excess return potential on the entire \$100 million investment. On the other hand, if the

Unbundled approach net impact

long government bond allocation is unbundled and shifted to a dedicated passive or low discretion mandate, the plan would have an opportunity to earn excess return potential on only the \$75 million that remains in the actively managed LDI portfolio.

When combining the marginal net fee savings achieved by the unbundling strategy with the forgone alpha potential on a meaningful portion of the portfolio, we believe it becomes clear that the bundled approach is positioned to potentially achieve superior outcomes (see Figure 3).

approach

Figure 3: In the end, the unbundled approach comes up short

Assumptions	Long credit portfolio weight	75%	
	Long government portfolio weight	25%	
	Hypothetical fee savings on long government allocations	15 bps	
	Hypothetical alpha target on actively managed LDI portfolios	100-125 bps	
	Hypothetical alpha target on long government allocations	0-25 bps	
	1		
	Hypothetical weighted-fee savings on long government allocations (15 bps x 25% allocation)	4 bps	
	Estimated rebalancing transaction cost to maintain 75/25 mix (annual average)	-2 to -3 bps	
	Forgone alpha potential on long government exposure (25% x –100 bps)	-25 bps	Plan may be
	Net impact of the unbundled approach	-24 bps	worse off p with unbun

Source: PIMCO as of 30 September 2017. **Hypothetical example for illustrative purposes only**. The return targets presented are not a prediction or a projection of return and are provided for illustrative purposes only. There can be no assurance that an active investment manager would be successful in meeting a proposed target. Management risk is the risk that the investment techniques and risk analyses applied by PIMCO will not produce the desired results, and that certain policies or developments may affect the investment techniques available to PIMCO in connection with managing the strategy. A different set of assumptions would produce different results. Figure provided for illustrative purposes and is not indicative of the past or future performance of any PIMCO product.

ADDITIONAL POTENTIAL BENEFITS OF THE BUNDLED APPROACH

In addition to the convenience of automatic rebalancing, the lesser need for monitoring and portfolio reallocations and the potential economic advantage as shown in Figure 3, the bundled approach has several other probable advantages:

- More liquid actively managed LDI portfolios (compared with the residual 100% credit portfolio in the unbundled approach) can be used as collateral for overlay solutions that may contribute to further tightening the asset-liability match or further increasing the liability hedge ratio.
- In the same vein, more liquid bundled LDI portfolios can serve as the core of a completion management assignment.
- As plan circumstances evolve, the optimal credit versus government mix may change, too. This can be accommodated with a simple benchmark change in a bundled portfolio rather than orchestrating a potentially burdensome transition of assets between different mandates to reach the new targets with the unbundled approach.
- Increased liquidity may also enable the portfolio manager to better take advantage of a short-term or temporary market dislocation to enhance portfolio returns.

CONCLUSION

Minimizing investment management fees is a legitimate objective for plan sponsors. However, with unbundled LDI approaches, the potential reduction in expenses is not only often marginal but may come with a number of less desirable implications, such as opportunity costs, diminished excess return potential and increases in operational burden or implementation complexity. As Figure 4 shows, in a comprehensive assessment, the advantages of a bundled LDI approach outnumber those of an unbundled LDI approach.

Figure 4: Bundled LDI versus unbundled LDI: final verdict

	Bundled LDI	Unbundled LDI
Potential for economic advantage	√	
Convenience of automatic rebalancing toward optimal targets	√	
Lesser need for monitoring and portfolio reallocations	√	
Straightforward to adjust sector mix as plan circumstances evolve	√	
Increased liquidity provides further opportunity to take advantage of short-term market dislocation in active LDI portfolio	\checkmark	
Increased ability to serve as collateral for overlay solutions or as core of a completion mandate	√	
Lower investment management fee on long government bonds		
Benefit of scale related to graded fee schedules on actively managed portfolios	\checkmark	

Source: PIMCO as of 30 September 2017

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