



Whitepaper

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Defined Benefit Retirement Fund Consolidation: Approaches and Risk Impacts

Introduction

The heyday of Defined Benefit retirement funds has ended.

Over the last fifteen years, the costs of running defined benefit (“DB”) funds have grown, through a range of factors including increasing life expectancy, persistent global low interest rates, and increased career mobility.

These factors have contributed to the global trend for companies to close DB funds, replacing them with other benefits, primarily defined contribution (DC) retirement funds. A recent international survey found that over 70% of sponsors intended to freeze current DB accruals for all employees, with over 90% of sponsors intending to use DC as their main form of retirement provision in the future.

This global move away from DB allows sponsors to limit their exposure to open-ended liabilities, but it creates a range of issues for trustees to manage. For example, as DB funds wind down they become increasingly reliant on investment cash flows to pay their obligations as they fall due, rather than the fund being able to meet its obligations from contributions – which impacts on investment strategy.

Another key consequence is an increase in costs as a proportion of funds under management. The costs of maintaining and administering a pension fund are, broadly speaking, fixed in nature. As closure to future accrual means that funds under management reduce, these costs represent an increasing proportion of the fund's costs over time. This situation is exacerbated by buying out sections of the fund's liabilities with insurers, reducing the risk in the fund but also reducing the size, meaning the cost base becomes even more of an issue.

All of these issues help drive a movement toward fund consolidation, as combining funds allows for economies of scale. In the United Kingdom, one recent report estimated that it would lead to an 80% reduction in the number of DB funds over the next 25 years.

Clearly a key aim for trustees in consolidating DB funds is to ensure that funds are sustainable and members' benefits are secure. By considering risk issues at the planning stage, merged funds can avoid pitfalls in the future, and can ensure that the security of members' benefits is not worsened because of the merger.

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The merger process

When considering the risk issues arising in merging pension funds, it is helpful to consider the different approaches available. The selection of an approach is not always driven by risk considerations, but there are always risk impacts.

Types of merger

Most mergers between two (or more) pension funds occur where there is an identifiable duplication of cost, for example where an employer has multiple pension funds through acquisition. In this situation, the employer's workforces are combined, but employees might have different benefits depending on the history of their employment. There are three key options available to restructure.

Alignment

The pension funds remain as separate legal entities, with their own assets and obligations. While there is a common sponsor, there are potential differences between the trustees and advisers. Alignment can simplify some of the structures. For example, the funds might have the same actuarial and investment advisers, meaning that while trustee decisions remain independent, they are based on consistent advice leading to cost savings in terms of fees and simplified implementation where the strategies of different pension funds align.

Sponsor	The same sponsor for both funds
Trustees	Independent, although possibly with some overlap (For example, sponsor-nominated trustees)
Sponsor advisers	The same sponsor advisers for both funds
Trustee advisers	The same process for selecting advisers, but as advisers are selected by trustees, there might be differences
Administration	Common administration function
Benefit structures	Unaltered
Contribution Rates	Agreed between individual funds and sponsors

Sectionalized Merger

The pension funds are merged into a single entity but remain as separate sections within that consolidated fund. This allows significant simplification of administration, without the complexity of a full benefit integration. Members in different sections retain their existing terms and conditions, but benefit from streamlined administration. The control structures can be dramatically simplified with a single body being responsible for administration, for investment and risk, and a single chair overseeing all sections.

Sponsor	The same sponsor for both sections
Trustees	Common set of trustees
Sponsor advisers	The same sponsor advisers for both sections
Trustee advisers	Common trustee advisers
Administration	Common administration function
Benefit structures	Unaltered for members in each section
Contribution Rates	Agreed in aggregate, allowing for the funding position of each section

Full Merger

The pension funds are fully combined into a single fund. The process of merging funds is complex, as terms and conditions for the funds are unlikely to align meaning that some harmonization is required. The process is not straightforward, and involves legal, actuarial, and communication costs. Also, benefit obligations can increase where aligned at a higher level than before the merger. A full merger creates the most simplicity after the merger, but is the most complex option to implement.

Sponsor	A single sponsor
Trustees	A single set of trustees
Sponsor advisers	A single set of sponsor advisers
Trustee advisers	A single set of trustee advisers
Administration	A single administration function
Benefit structures	Revision and restructuring is almost certainly essential
Contribution Rates	A single contribution schedule.

Issues affecting choice of approach

The choice of approach depends primarily on the nature of the sponsor and trustees, the features of the funds, and the cost.

A full merger is the costliest approach, and the most complex, however the outcome is simplest for sponsor and members and has the lowest cost to maintain. It is typically the desired approach where one company has acquired another and wants to integrate their businesses. While this can be the cleanest outcome, issues can arise if there is a further acquisition, and the process must be repeated.

At the other end of the range of options, adviser alignment is relatively straightforward and avoids many of the issues of a merger, but does not deliver the cost or member benefits to the same extent as a formal merger.

Sectionalized mergers are therefore a common compromise, there is cost reduction, and allows a common strategy to be put in place.

The issues that drive a merger are important, and the decisions on whether to merge funds and how to do it are largely driven by cost and practical considerations. Often, decision making about investment strategy and deficit funding is deferred until the new structures are established, and the legal and operational issues are resolved.

This is not always the best course of action.

Before trustees agree to the terms of any merger, they must understand how the investment and funding strategy will operate afterwards, and understand the implications for security of their obligations to their members. Without planning before the merger, the security of member benefits can be put at risk and the operational benefits undermined.

Risk considerations

The key consideration for trustees when consolidation occurs must be to ensure that there is no negative impact on the security of the obligations to members. This is not simple to assess, but there are various measures that trustees can use to help assess how the security of benefits is affected.

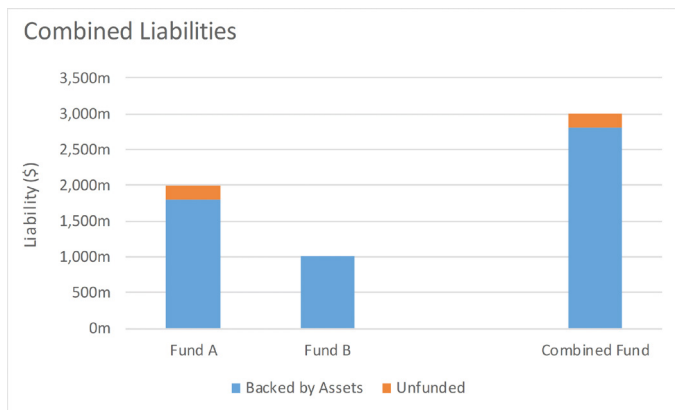
Unless the two pension funds being combined are identical, a full or sectional merger will inevitably result in a change in the risk characteristics of the fund:

Funds with different funding levels

When the funds are combined, the funding level of the overall fund is a weighted average of the original funding levels.

Figure 1: Combined Liabilities for funds with different funding levels

	Fund A Underfunded	Fund B Fully Funded	Combined Fund Underfunded
Assets	\$1,800m	\$1,000m	\$2,800m
Liabilities	\$2,000m	\$1,000m	\$3,000m
Surplus/(Deficit)	-\$200m	\$0m	-\$200m
Funding Level	90.0%	100.0%	93.3%

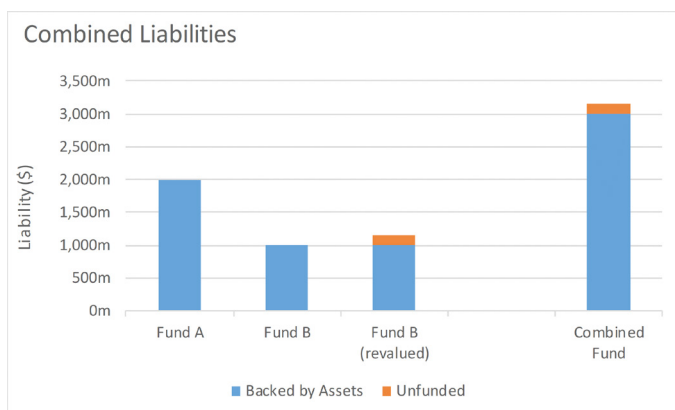


Funds with different valuation bases

This is a similar issue, two pension funds that seem to be fully funded on their ongoing bases are not when they are combined.

Figure 2: Combined Liabilities for funds with different valuation bases

	Fund A Valued based on nominal yield curve	Fund B Valued based on credit curve	Fund B (revalued) Value based on nominal yield curve	Combined Fund Under-funded
Assets	\$2,000m	\$1,000m	\$1,000m	\$3,000m
Liabilities	\$2,000m	\$1,000m	\$1,150m	\$3,150m
Surplus/(Deficit)	\$0m	\$0m	-\$150m	-\$150m
Funding Level	100.0%	100.0%	87.0%	95.2%

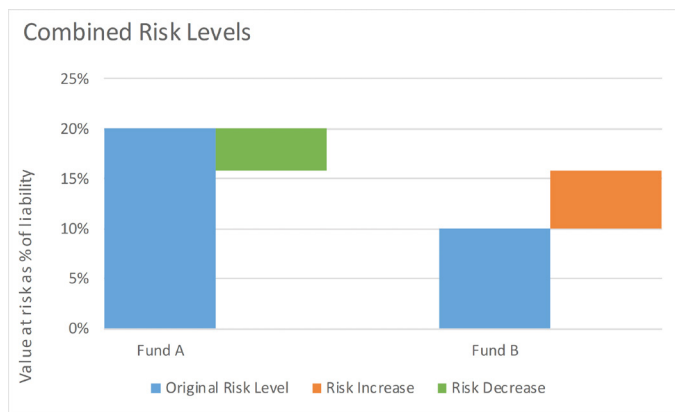


Funds with different risk appetites

Under a full merger, a single investment, and contribution strategy applies across the merged fund. Inevitably this results in a change to the risk appetite of one (or both) funds, leading to changes in the level of risk. Where glide paths or other de-risking strategies are in play, a full merger could require this to be abandoned or restructured.

Figure 3: Combined risk levels for funds with different risk appetites

	Fund A Risky investment strategy	Fund B Cautious investment strategy	Combined Fund Blended investment strategy
Assets	\$2,000m	\$1,000m	\$3,000m
Liabilities	\$2,000m	\$1,000m	\$3,000m
1 year Value at Risk	\$400m	\$100m	\$475m
VaR as % of liabilities	20.0%	10.0%	15.8%

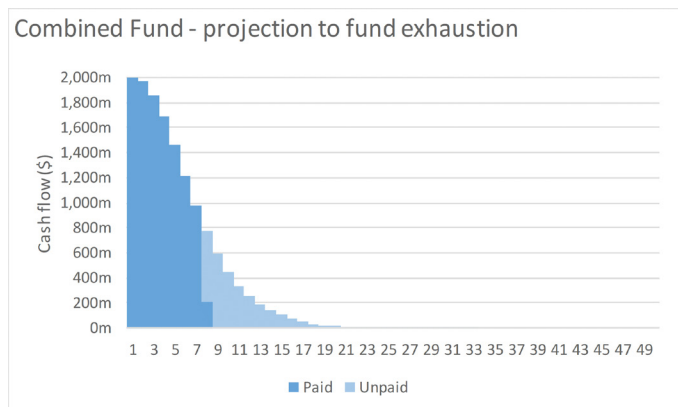
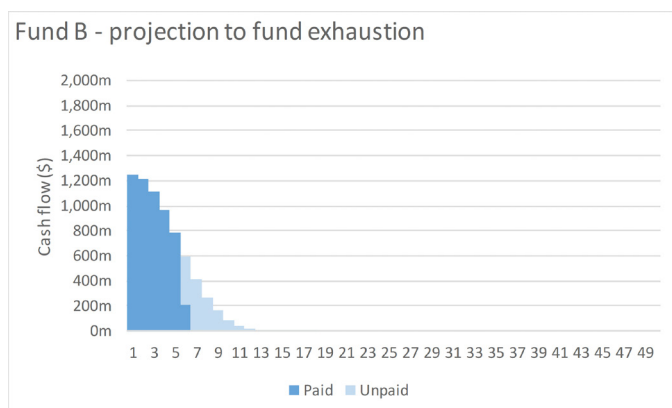
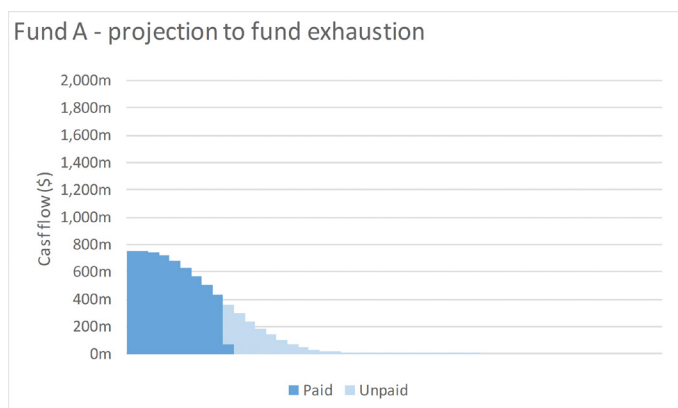


Funds with different cash flow durations

Even if funds have identical funding levels and similar investment and funding strategies, merging funds with different cash flow characteristics impacts the security of member's benefits. The fund with the shorter duration becomes more secure, as the assets backing both funds are available to meet its cash flow requirements, potentially increasing the risk in the long term for the benefits in the fund with the longer duration.

Figure 4: Funds with different cash flow durations

	Fund A Long duration	Fund B Short duration	Combined Fund Combined duration
Funding level	80%	80%	80%
Est. time to fund exhaustion	10 years	6 years	8 years
Proportion of liabilities paid out	80%	80%	80%



Combined fund pays out

80% of all benefits - made up of:

68% of benefits due to members of fund A

93% of benefits due to members of fund B

These can be mitigated to some extent, but at a cost. For example, a cash injection from the sponsor can take the merged funding level to the higher of the pre-merger levels.

To consider the impact of changes in risk appetite or the impact of merging funds with different durations, an asset-liability modeling exercise is essential as the impact is critically dependent on the investment strategies before and after the merger, and the cash flows of both pension funds. The security impact might be significant, and trustees should understand the implications on the security of their members' benefits before agreeing to any proposed merger.

Some of the risk issues are reduced under a sectionalized merger, but not all.

Unintended Consequences

Consider a sectionalized merger, where the contribution schedule is fixed from the sponsor's point of view, with the allocation of contributions to funds dependent on the funding level.

This creates a situation where the contribution to each section depends on the relative funding levels of each section. Unless there are constraints around the investment strategy this can lead to a situation where the two sections are incentivized to take a lower level of investment risk to maximize their contribution income, potentially requiring a greater level of sponsor contributions.

Preparing for fund consolidation

These are just some of the impacts that a fund consolidation can have on the security of pensions.

Clearly, trustees need to be confident that the security of their members is not worsened by the merger.

A full merger almost certainly has some impact on the security of benefits, and trustees need to ensure that this is understood and acceptable.

A sectional merger avoids many of the security issues of a full merger, but the terms of the proposal need to be understood and their impact on security assessed. The only way to guarantee that there is no risk impact is to manage the sections entirely separately, and this might not deliver the cost savings and efficiencies that are desired.

Critically, leaving analysis of the investment and funding strategy until after the merger is complete can leave members benefits in a less secure position without any option for remedying the situation, and can leave sponsors with greater risk in the long term.

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