

NCCMP Annual Conference 2024

Lessons learned from Special Financial Assistance Program

March 8, 2024

Important information

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PBGC Special Financial Assistance

Final rule focused on priority of meeting liabilities through 2051

Purpose	"This program enhances retirement security for millions of Americans by providing eligible multiemployer defined benefit pension plans with special financial assistance (SFA) in the amounts required for the plans to pay all benefits due during the period beginning on the date of payment of SFA through the plan year ending in 2051."	
§ 4262.14 Permissible investments	 Investment grade fixed income (including cash) Return seeking assets (up to 33%) 	

Traditionally, multi-employer plans have approached asset allocation decisions with a total return approach, but the introduction of SFA assets brought liability-aware investing into the conversation.

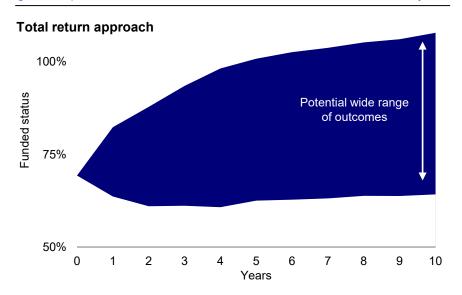
Source: Invesco.



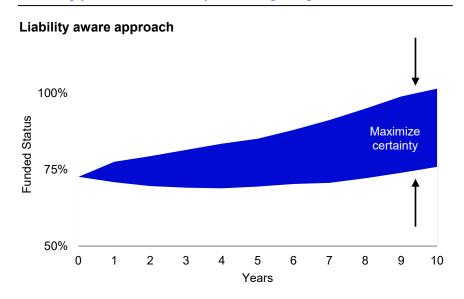
What is 'Liability Aware' investing?

Prioritizing certainty of meeting cash flow needs versus beating a market benchmark

A total return approach can give you more opportunity to grow in positive market environments, but with less certainty



A **liability aware approach** prioritizes the certainty of meeting your cash flows by reducing range of outcomes



Illustrative purposes only.



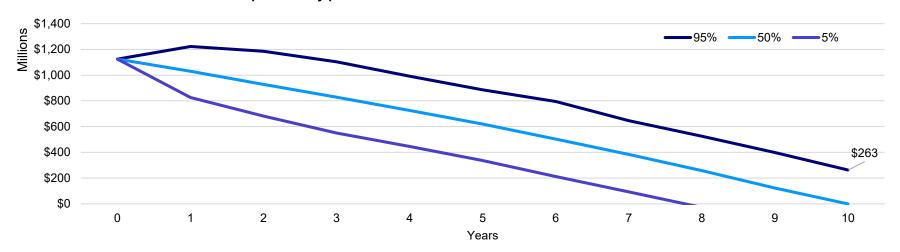
Total return investing

Prioritizing the opportunity to grow with positive market environments

Total return portfolio

Traditional total return approaches may provide higher return potential, but as market volatility and sequence risk plays a role, the dispersion of potential outcomes means a trade off in certainty and potential longevity of SFA assets

Potential outcomes for a total return portfolio by percentile



For illustrative purposes only. Source: Invesco Solutions. Portfolio = 100% BBG Long US Corporate Bond Index. Hypothetical asset projections account for cash flows. Modeling ranges are calculated using Moody's economic scenario generator which accounts for annual path dependency of the volatility of returns. 5th percentile indicates that there are only 5% of outcomes that are worse than the projection. Refer to the appendix for disclosures at the end of the presentation for additional information.

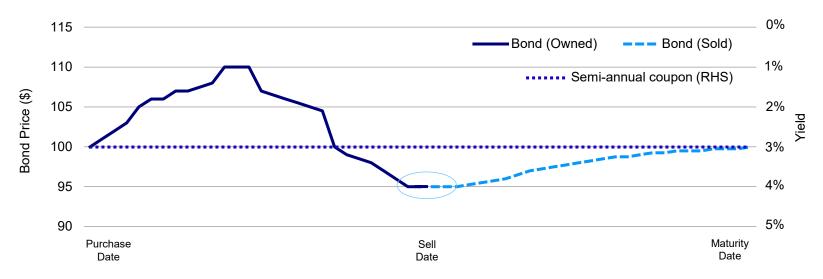
Taking advantage of fixed income

Incorporating a buy & maintain (cash-matching) strategy can increase certainty

Market volatility can impact the success of a portfolio

Forced selling at unknown prices can create uncertainty around ability to meet liabilities

Impact of market movements on the price of a bond



For illustrative purposes only. No investment decisions should be taken on the basis of these charts.



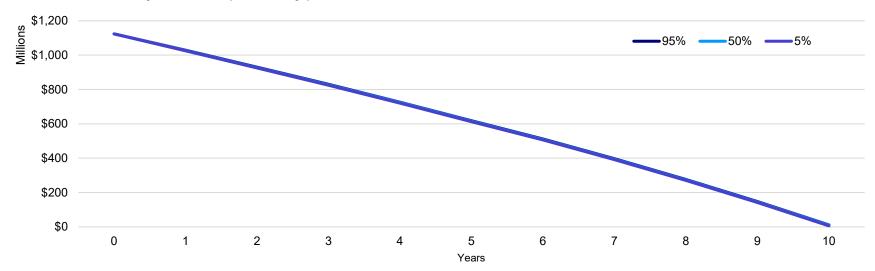
Liability aware investing

Prioritizing certainty of meeting your cash flow needs

Buy & maintain (cash-matching) portfolio

Increased certainty due to low turnover, known income and cashflow benchmarking which may provide better outcomes

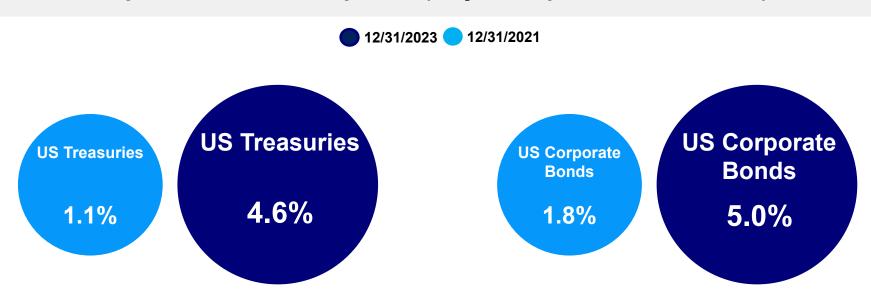
Potential outcomes for buy & maintain portfolio by percentile



For illustrative purposes only. Source: Invesco Solutions. Hypothetical asset projections account for cash flows. Modeling ranges are calculated using Moody's economic scenario generator which accounts for annual path dependency of the volatility of returns. 5th percentile indicates that there are only 5% of outcomes that are worse than the projection. Refer to the appendix for disclosures at the end of the presentation for additional information.

Tailwind for buy & maintain approaches Bond yields remain high versus SFA discount rates

Capital Market Assumptions (10 year expected, annualized)



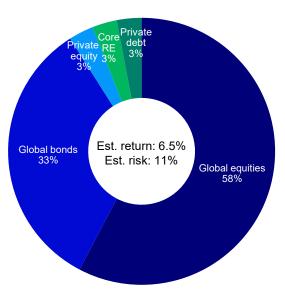
Source: Invesco Solutions. Capital market assumptions (CMAs) are forward-looking, are not guarantees, and they involve risks, uncertainties and assumptions. Refer to the CMA slide for additional information. These CMAs provide broad guidelines for asset allocation and are not used to predict market performance. US Treasuries = Bloomberg US Treasury Index. US Corporate Bonds = Bloomberg US Corporate IG Index. SFA discount rate is based on the lowest average of the last four months' first, second and third segment rates + 67bps, per the IRS website and SFA Final rule.



Considerations for legacy plan assets Increasing the allocation to private markets

Sample Plan: Asset allocation (pre-SFA)

Plan interest rate: 6.5%



Sample Plan: Asset allocation (with SFA)

SFA interest rate: 3.63%

Non-SFA interest rate: 5.76%



Source: Invesco Vision. Invesco Vision, designed by Invesco Solutions, is a decision support system that combines analytical and diagnostic capabilities to foster better portfolio management decision-making. See Invesco Vision slide in the appendix for additional information. The portfolios shown are for illustrative purposes only and do not constitute investment advice nor investment recommendations. Please note that return and risk estimates are based on our capital market assumptions (CMAs). CMAs are forward-looking, are not guarantees, and they involve risks, uncertainties and assumptions. Refer to the CMA slide for additional information. Buy & Maintain portfolio based on Bloomberg US Corporate IG Index. Portfolio characteristics are subject to change.



Final thoughts

Applicability to broader multi-employer plan sponsors

- The SFA program created a "closed" environment on which to evaluate asset allocation decisions through 2051
- Plans that are closed, or considering closing and are well-funded could consider cashmatching while prevailing bond yields are above discount rates
- For open plans, it is not a one-size-fits-all answer and must be evaluated with the plan's objectives and liability needs
- Plans may consider some implementation of cash-matching for a part of their plans to give a similar impact to the portfolio in providing certainty of liquidity needs while a portion of the portfolio is invested in less-liquid, higher potential returning investments.

For illustrative purposes only. Source: Invesco



Appendix



Proxy information

Asset class	Index
Global Equities	MSCI ACWI
Global Bonds	BBG Global Agg
Core RE	Burgiss Real Estate Core
Private Credit	Burgiss Private Credit
Private Equity	Burgiss Private Equity

Past performance is not indicative of future results. An investment cannot be made directly into an index.



Capital market assumptions (CMAs)

Invesco Solutions develops CMAs that provide long-term estimates for the behavior of major asset classes globally. The team is dedicated to designing outcome-oriented, multiasset portfolios that meet the specific goals of investors. The assumptions, which are based on 5- and 10-year investment time horizons, are intended to help guide our strategic asset class allocations and should not serve as the basis or primary source for any investment decision. For each selected asset class, we develop assumptions for estimated return, estimated standard deviation of return (volatility), and estimated correlation with other asset classes. Estimates and targets reflecting our various assumptions concerning anticipated results are inherently subject to significant economic, competitive, and other uncertainties and contingencies and have been included solely for informational and illustrative purposes. Forecasts of financial market trends that are based on current market conditions constitute our judgement and are subject to change without notice. This information is not intended as a recommendation to invest in a specific asset class or strategy, or as a promise or quarantee of future performance. These Invesco proprietary asset class assumptions are passive, and do not consider the impact of active management. As the themes discussed herein may be unsuitable for investors depending on their specific investment objectives and financial situation, and given the complex riskreward trade-offs involved, we encourage you to consider your own judgment and quantitative optimization approaches in setting strategic allocations to asset classes and strategies. Asset allocation and diversification do not guarantee a profit or eliminate the risk of loss. This material is not intended to provide, and should not be relied on, for tax advice. References to future returns are not promises or estimates of actual returns a client portfolio may achieve. Assumptions and estimates are provided for illustrative purposes only. They should not be relied upon as recommendations to buy or sell securities. Forecasts of financial market trends that are based on current market conditions constitute our judgment and are subject to change without notice. Estimated returns can be conditional on economic scenarios. If a particular scenario comes to pass, actual returns could be significantly higher or lower than these estimates. Indexes are

unmanaged and used for illustrative purposes only. They are not intended to be indicative of the performance of any strategy. Broad-based securities indices are unmanaged and are not subject to fees and expenses typically associated with managed accounts or investment funds. It is not possible to invest directly in an index. All estimates in this document are in US dollar terms unless noted otherwise. For additional details regarding the methodology used to develop these estimates, please contact Invesco.



Invesco Vision

Designed by Invesco Solutions, Invesco Vision is a decision support system that combines analytical and diagnostic capabilities to foster better portfolio management decision-making. Invesco Vision incorporates capital market assumptions (CMAs) developed by IIS, proprietary risk forecasts, and robust optimization techniques to help guide our portfolio construction and rebalancing processes. Advanced risk management approaches have been incorporated into the system such as de-smoothing of alternative risk factors, multi-asset factor decompositions, in addition to stress test analyses (both historical and hypothetical) to understand the drivers of volatility within our portfolios. By helping investors and researchers better understand portfolio risks and trade-offs, it helps to identify potential solutions best aligned with their specific preferences and objectives.

The Invesco Vision tool can be used in practice to develop solutions across a range of challenges encountered in the marketplace. The analysis output and insights shown here from Invesco Vision does not take into account any individual investor's investment objectives, financial situation or particular needs. The insights are not intended as recommendations to invest in a specific asset class or strategy, or as a promise of future performance. For additional information on our methodology, please contact Invesco.



Assumptions

Moody's Economic Scenario Generator

- All analysis as of December 31, 2023, unless otherwise stated
- Returns based on Invesco's 10-year Capital Market Assumptions
- Scenario modelling based on 1,000 simulations using economic scenario paths provided by Moody's, adjusted for December 31, 2023 market conditions
- Projections allow for plan expenses and future contributions and assume annual rebalancing to a constant asset allocation

10 Year Capital Market Assumptions for Asset Proxies as of December 31, 2023

Asset class	Index	Mean return	Volatility
US All Cap Equity	Russell 3000	6.6%	16.6%
US IG Corp	Bloomberg US Corporate Investment Grade	5.5%	10.7%
Buy & Maintain	Bloomberg US Corporate Investment Grade	5.2%	0.1%

Source: Invesco. There is no guarantee that the simulated returns will be achieved in the future. Performance shown is simulated. The simulation presented here was created to consider possible results of a strategy not previously managed by Invesco for any client. Simulated performance is hypothetical. It does not reflect trading in actual accounts and is provided for informational purposes only to illustrate these strategies during specific periods. There is no guarantee the simulated results will be realized in the future. Invesco cannot assure the simulated performance results shown for these strategies would be similar to the firm's experience had it actually been managing portfolios using these strategies. In addition, the results actual investors might have achieved would vary because of differences in the timing and amounts of their investments. Returns shown for this simulation would be lower when reduced by the advisory fees and any other expenses incurred in the management of an investment advisory account. Simulated performance results have certain limitations. Such results do not represent the impact of material economic and market factors might have on an investment advisor's decision-making process if the advisor were actually managing client money. Simulated performance also differs from actual performance because it is achieved through retroactive application of a model investment methodology and may be designed with the benefit of hindsight.



Thank you

