

Is LDI Legal?

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ABSTRACT

The DOL Advisory Opinion 2006-08A deals with the utilization of present values of pension commitments (a.k.a. liabilities/obligations) in the development of optimal policy portfolios for defined benefit (DB) plans. The paper reviews the Advisory Opinion, its language and conclusions. In the opinion of this author, the

Advisory Opinion does not provide the level of clarity that is necessary to make asset allocation decisions with confidence.

Is LDI legal? What a ridiculous question! Is it possible that all these knowledgeable and well-meaning investment professionals who have written numerous LDI papers and made countless LDI marketing presentations are engaged in illegal activities? Of course, not. There is nothing wrong with marketing sophisticated investment products to potential clients and suggesting that those products may be beneficial to the clients' objectives. The problem is most of these potential clients are institutional investors that have limitations on the ways they invest their assets. There are certain fiduciary standards that apply to the selection of these investments. A DB plan, for instance, must act in compliance with the "prudent man" rule and "for the exclusive purpose of providing plan benefits." It would be very helpful to the providers of LDI products if the fiduciaries of DB plans could be assured that these products were in full compliance with relevant fiduciary standards.

And that is where it gets a bit tricky. The vast majority of the providers of LDI products had not touched the issues of compliance with ERISA prior to October, 2006. However, there was at least one investment bank that apparently had been unable to obtain the confidence it needed to proceed with its offerings and, as a result, requested an advisory opinion from the Department of Labor (DOL). The DOL advisory opinion 2006-08A ("Advisory Opinion") came out on October 3, 2006 and was immediately hailed as the definite resolution of the problem. The providers of LDI have concluded that investors in LDI products would have no compliance problems with ERISA.

There are good reasons to believe that LDI products should be in compliance with relevant regulations, but the Advisory Opinion should not be one of these reasons. In this author's view, the manner in which the Advisory Opinion is written does not give much confidence that the people who resolve the issues of compliance of asset allocation decisions (judges, jurors, etc.) would find the Advisory Opinion particularly useful.

The Advisory Opinion may create an impression that it provides protection in some areas in which it is unlikely to withstand a rigorous scrutiny. The language employed in the Advisory Opinion is sometimes ambiguous and inconsistent. Overall, the Advisory Opinion does not provide the level of clarity that is necessary to make asset allocation decisions with confidence.

Ultimately, this author hopes that LDI products will be recognized as fully compliant with relevant fiduciary standards, as long as their risks are properly disclosed. However, the Advisory Opinion does not appear to be very helpful in that respect.

Paradigm Changes

The DB system is going through a period of major changes. The key components of the system are under intense scrutiny, and the very survival of the system is at stake. There is no shortage of disapproving views directed at various segments of the system, as some stakeholders criticize others for the unfortunate state of affairs in the system.

The asset allocation decisions DB plans make have become one of the biggest concerns for many stakeholders of these plans. Some of these concerns allow virtually unanimous agreements; some others ignite raging debates. It is increasingly clear that the decision-making framework the DB system has utilized for decades is no longer capable of dealing with the new challenges the system faces. The question is how the new asset allocation paradigm should evolve.

Historically, DB plans have utilized the following approach to the problem of optimal policy portfolio selection: optimize in the "asset-only" space and illustrate the "asset-only" optimal policies via stochastic (Monte-Carlo) simulation. The turbulence many plans have experienced for the last decade and beyond has demonstrated that this framework may lead to sub-optimal benefit design, contribution, and asset allocation policies. A consensus is rapidly emerging that this approach is inadequate for the comprehensive risk management of DB plans. It is also broadly accepted that the plans' financial commitments should become an indispensable part of the process of efficient portfolio selection. The problem lies in determining the best way to incorporate pension commitments into the process.

The Emergence of LDI

The rapid deterioration of accounting measurements for many plans early this century triggered numerous calls for a change in the way DB plans make their benefit structure, asset allocation, and contribution decisions. As a result, a seemingly straightforward solution to this problem started emerging several years ago. In a nutshell, the proposed approach was based on a simple idea that "pension investments should be driven by pension liabilities." Naturally, the approach was called Liability Driven Investment (LDI).

As an economic theory, LDI is still in its infancy. Currently, there are no textbooks that present scientific foundations for this approach; there are few academic papers that attempt to do so. The LDI theory is essentially driven by the marketing materials of the providers of LDI products.

The presenters usually make vague allusions to a handful of papers written in the 70s and 80s as the foundation of LDI. Most DB plans, however, have been understandably skeptical about the LDI concept. This skepticism hasn't been particularly helpful to the broad acceptance of LDI products.

Another pervasive argument most proponents of LDI present is that current and anticipated future reporting requirements and regulations encourage and/or support and/or compel the utilization of LDI products. It appears that the proponents of LDI believe that accounting conventions are capable of changing the economic reality and uncovering certain attractive features of investment products that are invisible without these accounting conventions. As far as the compliance with relevant fiduciary standards is concerned, the belief that new regulations support the use of LDI products is apparently based on the assumption that investing pension assets in a way that mimics the behavior of accounting measurements would be "for the exclusive purpose of providing plan benefits." The justification for this logic is very hard to find in the marketing presentations of the proponents of LDI.

Yet another factor that slows down the adoption of LDI products is the manner the term "liability" is utilized in more than a few publications - the proponents of LDI usually use this term rather loosely. The term means different things to different people. Accountants, actuaries, regulators, economists, shareholders, taxpayers, plan participants — all these stakeholders of pension plans may assign different meanings to the term "liability." An investment strategy "driven" by this multi-faced "liability" may "drive" a particular plan in multiple directions and produce adverse results.

The main practical consequence of these problems is the abundant confusion about the term "LDI" and what it means.

Compliance Concerns and the Advisory Opinion

The questionable attributes of LDI as an economic theory – shaky foundation, questionable logic, and ambiguous terminology – hardly represent the ingredients of potentially successful investment products. Is there any assurance that an institutional investor in an LDI product would be able to demonstrate that the investor has acted as a "prudent man" who has properly done his due diligence work? While the answer is unclear, the providers of LDI products have not identified this question as one of their concerns. This paper does not attempt to find a definite answer but makes a note of this question.

The providers of LDI products have been mostly concerned about the appropriateness of incorporating "liabilities" and "obligations" into the process of designing an investment policy for a DB plan and potential incidental benefits to plan sponsors. Many proponents of LDI believe the Advisory Opinion has clarified and settled the legal issues surrounding LDI. Let us look at what it actually says.

A good starting point is to understand the nature of this document. The Advisory Opinion is a letter that "constitutes an advisory opinion under ERISA Procedure 76-1. Accordingly, it is issued subject to the provisions of that procedure, including section 10 thereof relating to the effect of advisory opinions." ERISA Procedure 76-1, section 10 states that "the opinion assumes that all material facts and representations set forth in the request are accurate, and applies only to the situation described therein. Only the parties described in the request for opinion may rely on the opinion, and they may rely on the opinion only to the extent that the request fully and accurately contains all the material facts and representations necessary to issuance of the opinion and the situation conforms to the situation described in the request for opinion." In other words, the Advisory Opinion is as good as the request for the Advisory Opinion. The request is discussed in the next section.

A close reading of the Advisory Opinion reveals that the Advisory Opinion is silent about some of the most far-reaching parts of the request, even though the Advisory Opinion generally follows the contents of the request closely. The Advisory Opinion simply repeats selected arguments presented in the request and then adds a couple of paragraphs that essentially state that the legal professionals currently employed by the DOL believe that whatever is presented in the request *is not necessarily illegal*.

In particular, the Advisory Opinion maintains that "the Department does not believe that there is anything in the statute or the regulations that would limit a plan fiduciary's ability to take into account the risks associated with **benefit liabilities** or how those risks relate to the portfolio management in designing an investment strategy." The Advisory Opinion also asserts that "a fiduciary would not, in the view of the Department, violate their duties under sections 403 and 404 solely because the fiduciary implements an investment strategy for a plan that takes into account the **liability obligations** of the plan and the risks associated with such liabilities and results in reduced volatility in the plan's funding requirements."

The declaration that it is permissible for plan fiduciaries to consider "benefit liabilities" and "liability obligations" as well as the risks associated with "such liabilities" appears to be the main point of the Advisory Opinion. At the same time, these considerations are not guaranteed to be

fully compliant with relevant fiduciary standards, as the Advisory Opinion declares that "whether any particular investment strategy is prudent with respect to a particular plan will depend on all the facts and circumstances involved." In other words, the consideration of "benefit liabilities" or "liability obligations" is not necessarily imprudent, but it is not inconceivable that "all the facts and circumstances involved" may lead to a conclusion that a particular investment strategy that concentrates on "benefit liabilities" or "liability obligations" is in fact imprudent.

It is important to note that the existing regulations specify that the facts and circumstances that must be given "appropriate consideration" include "the projected return of the portfolio relative to the funding objectives of the plan." Clearly, the "funding objectives of the plan" are to ensure that the money is readily available every time a payment is due to a member of the plan. Therefore, it is not only permissible, but mandatory to consider the stream of benefit payments promised to plan members and beneficiaries. Commitment Driven Investing (CDI), a cost-risk management framework that puts the stream of benefit payments (the commitment) at the heart of optimal portfolio selection, appears to be in full compliance with these regulations.

No advisory opinion is required to conclude that "benefit payments" should be given "appropriate consideration." On the other hand, "benefit liabilities" and "liability obligations" are entirely different concepts – according to the Advisory Opinion, plan fiduciaries are permitted to consider them, but there is no guarantee that a court would rule that these considerations were "appropriate." Therefore, it is imperative to understand the essential differences between "benefit payments", "benefit liabilities", and "liability obligations." However, a reader who wished to find a clear explanation of these differences in the Advisory Opinion would surely be disappointed – the Advisory Opinion contains no explanations. In fact, the Advisory Opinion is not supposed to present explanations – as was mentioned before, "the opinion assumes that all material facts and representations set forth in the request are accurate." This observation brings up the most interesting document in this story – the request for the Advisory Opinion.

The Request for the Advisory Opinion

The request was written by Donald Myers of ReedSmith on behalf of JPMorgan Chase Bank ("JPMorgan") in May, 2006. For the most part, the request is well-written and clearly identifies the two issues to be resolved.

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¹ Code of Federal Regulations, Title 29, Chapter XXV, Part 2550. 404a-1.

The first issue is related to the conceptual difference between benefit payments and their present values. According to the request, "While the regulation calls for consideration of the plan's anticipated cash flow requirements and funding objectives, which relate to the liability side of the balance sheet, there is no mention of considering the risks associated with the **liability** or how they relate to the risks of the plan's investment allocation." In other words, while the regulation instructs fiduciaries consider the benefit payments expected to be made at different points of time in the future, the regulation is silent about present values of these payments.

The second issue is related to incidental benefits to the plan sponsor. An investment approach that strives to match the behavior of assets and a particular present value of the plan's payments may have incidental benefits to the plan sponsor. As a result, there is at least a theoretical possibility that these benefits may be in violation of the principle of "exclusive purpose of providing benefits to participants and beneficiaries." Obviously, it would be highly desirable to clarify this issue.

While the request does a good job identifying potentially controversial issues, the deficiencies in the articulation of these issues are serious enough not to be overlooked. Let's deal with these deficiencies for each issue separately.

As far as the issue "benefit payments vs. benefit liabilities", JPMorgan requested "an advisory opinion that it is consistent with the prudence requirements of section 401(a)(1)(B) of the Employee Retirement Income Security Act of 1974, as amended (ERISA), for a fiduciary of a defined benefit plan to give appropriate consideration, under appropriate facts and circumstances, to the **liability obligations** of the plan and the risks associated with such **liability obligations** in determining a prudent investment strategy for the plan."

As we see, the concept of "liability obligations" is at the heart of the request. One would expect a clear definition of this concept, but the request does nothing of the sort. In fact, the request utilizes several terms that may or may not be synonymous to "liability obligations." The request uses not only the laconic terms "liabilities" and "obligations", but also more elaborate "benefit liabilities", "benefit obligations", "benefit payment obligations", "funding obligations", "contribution obligations", and even "present value of the plan's obligations for funding and accounting purposes."

Let us put this terminology in a proper context. Economic, accounting, and actuarial measurements of a pension plan start with the benefit payments promised to plan participants and beneficiaries (the pension commitment). The pension commitment is a series of contingent

future cash flows of uncertain timing and magnitude determined by the plan's benefit package and population. For a number of reasons (not only "for funding and accounting purposes"), it is desirable to calculate present values of the pension commitment.² For funding purposes, these present values are traditionally called "liabilities" (e.g. accrued liability, current liability, "target" liability). For accounting purposes, these present values are traditionally called "obligations" (e.g. Accumulated Benefit Obligation, Projected Benefit Obligation). These terms have precise meanings defined in the rules issued by the governing bodies that regulate "funding and accounting purposes." These bodies include, but are not limited to, the Department of Labor, Department of Treasury, and Financial Accounting Standards Board. Educational, examination, and standards of practice materials in this area are issued by several organizations that include, but not limited to, the Department of Treasury and Department of Labor (that jointly conduct examinations and grant licenses to actuaries to perform certain tasks required for pension plans), as well as the Society of Actuaries, American Academy of Actuaries, CFA Institute, and American Institute of Certified Public Accountants.

But the term "liability obligations" is not one of these precisely defined terms. This author is not aware of any regulations or educational materials that define this term. This is just a reflection of the request's unfortunate tendency to use the terms "liabilities", "obligations", "benefits", and their various combinations in an undisciplined manner. This tendency results in internally contradicting and confusing statements, as demonstrated in the following example. The request states that "defined benefit plan liabilities ... most closely correlate with fixed-income assets." In the next sentence, the request states that "there may be aspects of a plan's obligations that correlate more closely with other types of investments." A textbook sponsored by the CFA Institute defines a "liability" as a "financial obligation." So, according to the textbook studied by tens of thousands of aspiring investment professionals every year, liabilities and obligations are synonymous. To recap, liabilities (obligations) correlate most closely with fixed-income assets and even more closely with something else. Go figure.

As far as the issue of incidental benefits to the plan sponsor is concerned, the request notes that "these benefits should not prevent s fiduciary from adopting such an approach, so long as they are incidental to **proper fiduciary considerations.**" Obviously, it would be highly desirable to clarify what these "proper fiduciary considerations" may be.

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² Various measurements of a pension plan may be based on different series of benefit payments (commitments), but these technicalities are outside of the scope of this paper.

³ Managing Investment Portfolios, CFA Institute Investment Series, Wiley, 2007, Ch. 5, page 9

Attempting to provide some guidance in that respect, the request gives an example of "the proper fiduciary consideration" as "protecting the plan participants and beneficiaries from the risk of undue volatility of the plan's funded status." There are a couple of problems with this statement. First, the definition of the "funded status" requires a "liability" concept, which the request does not provide. Depending on the selection of the "liability", controlling the volatility of the funded status may or may not be in the best interests of the plan participants and beneficiaries. Second, if the plan's funded status fluctuates wildly between 120% and 200%, it is not necessarily a sign of poor financial health. A "better" match between the plan's assets and "liabilities" provided by an LDI strategy may result in much more stable but much lower funded ratio fluctuating steadily between 90% and 95%. This "stability" is not necessarily good for the plan participants.

The request also declares that an appropriate objective would be "to maximize the probability that plans assets can meet all benefit payment obligations." This is arguably the best suggestion presented in the request and a great candidate for "proper fiduciary consideration." It implies appropriately that it may be exceedingly difficult or even impossible to guarantee that "plan assets can meet all benefit payment obligations", so the best we can do is "to maximize the probability" that the funding objective will be achieved. It would be great if the Advisory Opinion had determined whether this objective constitutes "proper fiduciary consideration." Unfortunately, the Advisory Opinion is silent about this matter.

It should be noted that the goals of maximizing "the probability that plans assets can meet all benefit payment obligations" and controlling the "undue volatility of the plan's funded status" may be at odds with each other. It is entirely possible that the optimal policy portfolios that maximize (at various cost levels) the probability that the funding objective will be achieved are not the ones that may provide the lowest volatility of the plan's funded status. The plan's fiduciaries may have to decide which "fiduciary consideration" is more "proper." Unfortunately, neither the request nor the Advisory Opinion provides any guidance in that respect.

Finally, it should be mentioned that certain views presented in the request are based on debatable economic theories. The request states that "defined benefit plan liabilities are determined by a number of factors" including "the interest rates used to calculate the present value of the plan's obligations." In general, present values are calculated using rates of return. In case of fixed income assets, these rates of return are called interest rates, but there is life outside of fixed income assets. Some "liabilities" and/or "obligations" do depend primarily on current interest rates, but some others do not. "Liabilities" that are "driven" by current interest rates may not capture all the complexities of a pension plan, and other present values of the pension

commitment may be required in order to manage the plan prudently. While some economists argue that properly defined "liabilities" *must* depend on interest rates, some others call for the recognition of the multitude of challenges the plan stakeholders face and the multitude of present values related to those challenges. Debatable economic theories may produce debatable legal arguments. Taking sides in an on-going economic debate may not be the best way to clarify the issues of compliance with regulations.

An Example

This section contains a situation in which a questionable choice of the "liability" leads to a questionable choice of the investment strategy, which leads to unanticipated adverse results.

Think of a conventional on-going pension plan that is currently underfunded in a sense that the plan assets are insufficient to terminate the plan. The plan fiduciaries have identified their goals as to have low short-term balance sheet volatility and predictable required contributions. In order to achieve these goals, the fiduciaries have

- 1. listened to numerous marketers of LDI products and read their presentation materials;
- 2. concluded that it is proper to focus on the termination liability, which plays a key role in the determination of minimum required contributions and the balance sheet liability;
- 3. also concluded that the benefits of stable balance sheet and predictable required contributions would be perceived as "incidental" (and the Advisory Opinion played a certain role in both conclusions 2 and 3);
- 4. conducted a comprehensive search of providers of LDI products;
- 5. invested all their assets according to the main premise of LDI assets should behave like (termination) "liabilities."

Imagine that we have entered a period of rising inflation expectations with no end in sight. The termination liability behaves like a portfolio of nominal bonds, and nominal bonds do not thrive in a rising inflation environment. Consequently, the plan assets, which behave like a portfolio of nominal bonds, are doing poorly. The plan's benefits are related to inflation, so the plan's payouts are getting higher than expected. Certainly, the termination liability has also gone down, but the required contributions are higher than expected. The plan sponsor may not be interested in terminating the plan, and the plan may still have insufficient assets to be terminated. So, assets are down, payouts and contributions are up — it does not look like the asset-"liability" matching has worked out as the providers of LDI products claimed it would.

Let us take the perspective of a plan participant, who may start questioning the wisdom of investing in the LDI strategy. The plan is exposed to inflation risk, but the selected liability concept — the termination liability — ignores it. The adopted investment strategy is negatively correlated with the volatility of benefit payments — when the inflation goes up unexpectedly, the assets go down. Is it inconceivable that the participant may conclude that "a prudent man acting in a like capacity and familiar with such matters" should have known about the inflation risk and the negative correlation between nominal bonds and unexpected inflation? Is it inconceivable that the desire to achieve low short-term balance sheet volatility and predictable required contributions via asset-"liability" matching may lead to higher cost and lower safety of the promised benefits?

Let us also take the perspective of the plan sponsor that relied on the marketing materials of the providers of LDI products. These materials assured the sponsor that the LDI strategy would significantly reduce the riskiness of the plan. Is it inconceivable that the sponsor may want to reexamine the marketing materials to verify whether all the risks of the strategy were properly disclosed?

It is not difficult to imagine that a couple lawsuits are about to be filed. Nor there is any confidence that the Advisory Opinion would provide essential support for the defense.

Conclusion

The DB system needs clarity to move forward with innovative investment products and ideas. It would be very helpful if the government confirmed the following guiding principles.

- The statute and the regulations allow plan fiduciaries to consider present values of pension commitments in determining a prudent investment strategy for the plan. In particular, fiduciaries would not violate their duties solely because they implemented an investment strategy that took into account the liabilities calculated for funding purposes and/or obligations calculated for accounting purposes.
- 2. Plan fiduciaries should give proper fiduciary considerations to the selection of appropriate present values of pension commitments utilized for the purposes of determining a prudent investment strategy. Proper fiduciary considerations may include maximizing the probability that plan assets can meet all benefit payment obligations and controlling the volatility of the plan's funded status.

In the opinion of this author, the Advisory Opinion does not deliver the required clarity. Meanwhile, the proponents of LDI products should not be surprised if, after another marketing presentation, the plan's decision makers respond in the following manner: "It was great, but we need more time to think about this strategy and, possibly, talk to our legal counsel, thank you very much."

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