

A Beginner's Guide to Investing in Debt Mutual Funds

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Freefincal.Com

A Beginner's To Investing in Debt Mutual Funds

Dear Reader,

This is a collection of 26 posts on debt mutual funds written over the past 4 years. I enjoyed learning and writing about every bit of this fascinating space in finance – *tradable fixed income*.

Debt mutual funds are hard to understand, but I believe it is not hard to understand the basics and use them intelligently to reduced tax burden, especially after retirement. So even if you do not need a debt fund one, it is highly likely that you would need one after retirement. So now would be a good time to start understanding them.

This is an as-is reproduction and each chapter would feel like a blog post, because it is one. I have made no attempt to edit them. I have done my best to keep the sequencing logical. I sincerely hope it is of some use to you. Check out the four previously published e-books at freefincal.com

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What is a Debt Mutual Fund?

In this post, I discuss the basic ideas necessary for a beginner interested in debt mutual funds to get started. I shall keep it short, sticking to the essentials.

Many of you may know that I have a separate category for [debt mutual funds](#). My Book, *You Can Be Rich Too For Goal-Based Investing* has a more detailed introduction to debt funds, what to look for, how to select them and the different categories of funds available. The hardcover version is currently 23% off, priced ₹307 at [Amazon](#) or [Infibeam](#)

What is a bond?

A fixed deposit is the simplest example of a bond. The bank needs money to grow its business (this includes lending to others). So it announces a scheme in which you can deposit a sum for a fixed period of time and it offers interest on it. So the bank is in your *debt*.

As long as you hold the FD to maturity, it does not matter if new interest rates are higher or lower. Even if there is some bad news associated with the bank, as long as it pays your money back + interest, you are fine.

What if you could trade your FD?

Now suppose you can trade your FD to another person before it matures. All kinds of complications ensue. What should be the value at which the FD should be traded? Suppose your FD has an interest rate of 8% and new FDs have interest rates of only 7%, your FD is more valuable and you can demand a higher price for it. If rates keep going down, your FD will fetch you more profit *if you choose to sell it*.

On the other hand, if rates increase and if new FDs are available at 9%, yours (still at 8%) will become less valuable. So if you sell now, you can only do so at a loss.

*If you buy your FD and hold until maturity, there is no problem. However, if you intend to sell it mid-way then depending on current interest rate, you can either profit or loss. This is known as **interest rate risk**.*

Now suppose there is some bad news about the bank. Say it lent money to the wrong people and they refused to pay up. Profits are down and the share price is falling. The word on the street is that your bank is facing trouble and could fold.

Now if you wanted to sell you FD, would anyone buy? Even if they did, would they buy it at the same price that you did? They will demand to pay less. So if you sell when creditworthiness of the borrower is shaky, you will lose money.

On the other hand, if bank's profits are soaring, its bad loans are consistently decreasing, then people would feel more comfortable buying your FD. At this time, you can demand a higher price and sell at a profit.

If you buy your FD and hold until maturity, there is no problem. However, if you intend to sell it mid-

way then depending on current credit worthiness of the bank, you can either profit or loss. This is known as **credit risk**.

There are agencies which offer a letter grade to the credit worthiness of any borrower. This is known as credit rating. For example, your credit rating is given by CRISIL. This is requested by the banks if you ask them for a home loan.

What is a debt mutual fund?

A debt mutual fund invests in a basket of such tradable deposits or bonds. Some bonds can mature in days and some in decades! Some issued by the government, banks, PSU and corporates.

The current worth of a debt mutual fund, represented by its NAV will represent the current market value of the bonds that it holds. So if their market value rises or falls, so will the NAV. Therefore, so will the value of your investment.

As a thumb rule, longer the tenure of the bond, the more sensitive it will be to both interest rate changes and credit. Therefore I have always advocated the use of mutual funds that invest in very short-term bonds.

An absolute beginner interested in debt mutual funds should first try their hand with *liquid mutual funds*. These invest in bonds that mature on or before 91 days. So the ups and downs in the NAV will be minimal.

In following posts, I shall cover other bond basics like yield, duration and different types of bond investments. Do share this post with anyone who might find this information useful.

As mentioned above, you can consider buying my book for more details about debt (and equity) funds and how to select them.

What To Look For When Buying A Debt Mutual Fund

 freefinancial.com/look-buying-debt-mutual-fund/

1/8/2017

In the second part of the introductory series on debt mutual funds, a non-technical discussion of the aspects to consider *before* buying units of a debt mutual fund. You will be surprised as to how many people buy and then worry about these aspects.

The first part is here: [What is a Debt Mutual Fund?](#) -meant for absolute beginners. If you have not read that, I strongly recommend that you do and then head back here.

Update: You Can be Rich Too With Goal-Based Investing is now 23% Off at Rs 307 (Hard Cover). Get it now from [Amazon Opens in a new window](#) It has a detailed section on how to select equity and debt mutual funds with nine online calculator modules.

If you have already purchased the book, do check out the: Resources for You Can be Rich Too with Goal-based investing

In the first part, I had mentioned that debt mutual funds buy bonds, just like an equity mutual fund buys stocks.

A bond is a contract between two parties. The person or agency which borrows money, issues a bond certificate agreeing to pay interest at some defined interval - each month, quarter or year. In the case of a debt mutual fund, the lender is the fund manager on our behalf.

We now know that changes in the credit rating of the borrower and changes in interest rates of new bonds in the market affect the *current market value of the bond and therefore the NAV of the mutual fund which holds such a bond*.

Assuming that the credit rating and interest rates are constant for a period of time, how does the NAV of a debt mutual fund increase?

To understand, we need to become familiar with a bond concept known the as yield or yield to maturity to be specific. I shall discuss this in detail in the next part of this series. For now, we shall refer to this as the return obtained if the interest payments are reinvested and if the bond is held until maturity.

Here "return" = internal rate of return = IRR =XIRR. If you are curious to know more, you can check out: [How to buy tax-free bonds in the secondary market](#).

If the yield to maturity (YTM) of a bond is *currently* 10%, then the NAV of a mutual fund will increase by $10\%/365 = 0.03\%$ each day. That is the interest payments are factored into the daily NAV. This type of NAV gains is known *accrual income* and is present in all mutual funds for each business day.

On top of this is the change in NAV due to capital gains

capital gains (when interest rates fall and/or credit rating improves)

capital losses (when interest rates increase and/or credit rating declines).

Here credit rating refers to that of any bond issues by a non-government agency. The credit rating of govt bonds cannot be rated as this is the reference. Of course one can compare credit worthiness of Indian Govt bonds with that of US govt bonds.

Trivia: In the early nineties, the Indian Govt was close to bankruptcy. This is the reason why EPF and PPF rates were 12% then - nothing to rejoice! Read more: [The evolution of Public Provident Fund \(PPF\) Interest Rates](#)

Consider two borrowers A and B. A has a gambling problem and B is clean. If you wish to lend money, who will you lend with peace of mind?

Obviously to B. But B is a clean-cut individual with a high probability of repayment. So he can demand a lower interest rate. If you wish to give money to A, you will demand a higher rate.

Thumb rule 1: Higher the credit rating, lower the returns, but better the peace of mind and vice versa. If PPF rates fall below 8%, we should rejoice at the health of the economy - if

Thumb rule 2: five star rated debt mutual fund could well be taking more risk by buying bonds of lower credit quality. So it is important to ignore these ratings and look carefully.

A debt mutual fund investor should be aware of where a fund is likely to invest before buying fund units. This can be understood with two quantities associated with the debt fund portfolio:

The average maturity

If there are three bonds A, B, and C with tenures of 2,3,4 years and the fund holds 20%, 50% and 30% of each respectively,

The avg. maturity = $(2 \times 20\%) + (3 \times 50\%) + (4 \times 30\%)$.

The average credit rating. A similar definition but in terms of individual credit ratings of the bonds. A bond AAA rating is more trustworthy (theoretically, did you see/read "the big short"?!) than a bond with AA or A rating.

Key information

Higher the average maturity, more sensitive the debt fund is to interest rate changes and longer it would take for it to recover.

Why? Suppose you buy in Jan 2017, two bonds 1Y and 10Y.

1Y matures in one Y and 10Y in 10 years.

After 6 months, fresh 1Y and 10Y bonds are available at a higher interest rate. Which are you likely to sell first, 1Y or 10Y?

Obviously 10Y, because you do not wish to earn lower interest income for next 9.5 years. But by the same token, which price will fall more, 1Y or 10Y?

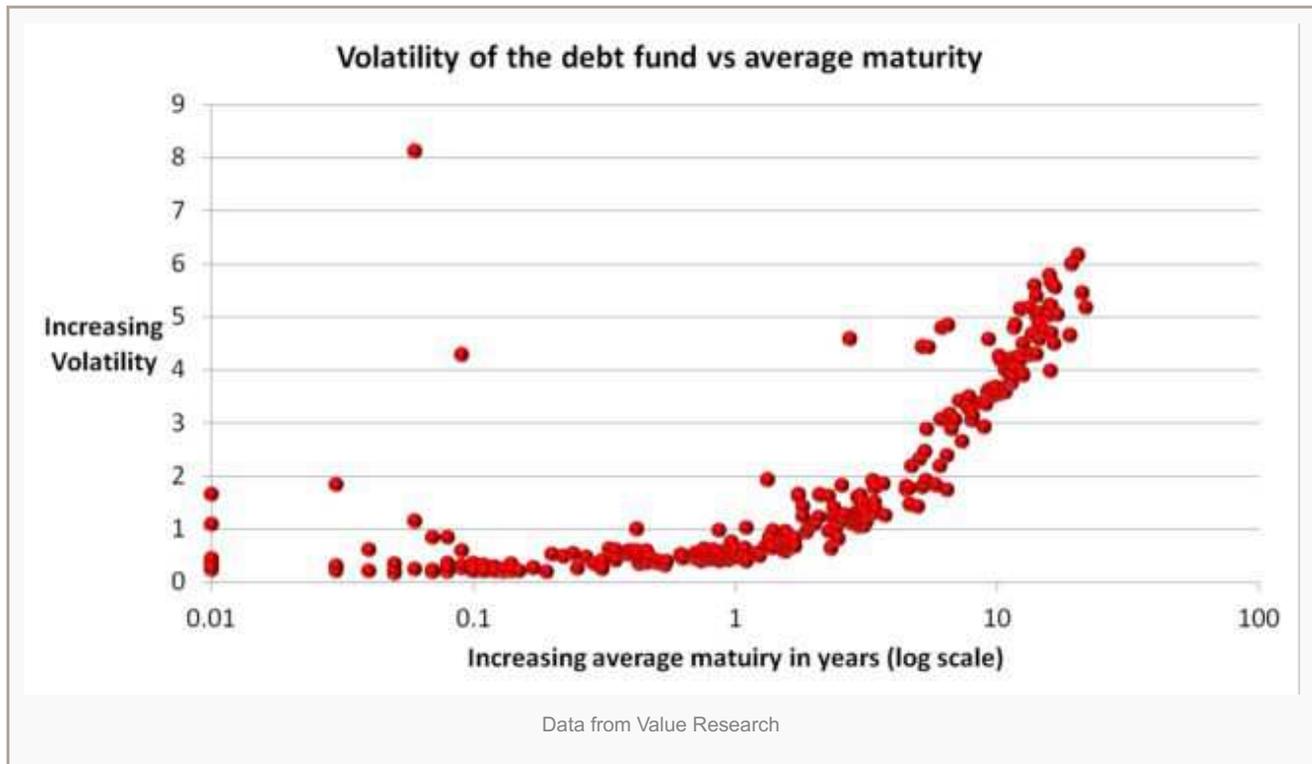
Again it is 10Y. There are other aspects to bond-selling that I will discuss later. For now, all we need to know is,

higher the average maturity (in years) of a debt fund, the more volatile it will be to both interest rate and credit rating changes.

If a 5-year "AA" rated bond is degraded to "BB", one year after the issue the fall in market value would be higher than for a 1-year bond from the same downgraded issuer.

Both types of risk, interest risk and credit risk co-exists at all times. The primary cause for volatility is demand and supply. Often, more than average buying or selling in anticipation of an event (eg. rate cut) can also change the NAV at a rapid click.

The key takeaway from this post: watch out for the average maturity and average credit rating. This is already at a 1000 words so I will use these two ideas to classify debt funds in the next part, but will conclude with this graph.



Notice that with an increase in average maturity of the debt fund portfolio, the volatility increases. Therefore, I always recommend sticking to funds with less than 1Y average maturity *and good credit quality*. One can buy risky corporate bonds via the debt fund route and minimise the associated risk. More on this later.

For the same avg. maturity, there are both low volatile funds and high volatile funds. This is because of the credit quality of the bonds that they hold. If interest rates fluctuated a lot, then so will the NAV. If any of the bonds were upgraded or downgraded, it will show in the NAV.

Even if a fund holds 100% of low-quality bonds and their ratings did not change, and the issuer honoured the interest rate payments, the NAV is unlikely to fluctuate a lot (assuming no abnormal buying and selling).

Volatility here is measured by calculating how much each monthly return deviated from the average return taken over a 3Y period. This is known as the standard deviation.

Trivia: Value Research included the above information after Anish Mohan complained to them citing this post: [Dear Value Research, duration matters!](#)

If you do not wish to wait for the next part and learn more right away, do consult these posts:

[Debt Mutual Funds: Risk vs. Reward](#)

[Debt Mutual Fund Investments: Minimizing Risk](#)

How to choose debt mutual funds with no credit risk and low volatility

Before you judge me too harshly, please note that I have already covered the ideas mentioned in the post before. This is a re-telling for beginners.

Understanding Debt Mutual Fund Categories and why it is so hard to choose a debt fund!

 freefinancial.com/understanding-debt-mutual-fund-categories-hard-choose-debt-fund/

2/21/2017

Investors who wish to give debt mutual funds a try often find that they are more difficult to understand than equity mutual funds 😊 Who would have thought a fixed income product (a bond that offers regular payments like a fixed deposits) would be so hard to understand the moment it can be traded to another party in the middle of its tenure! But that is how it is. In this post, I discuss the types of debt mutual funds available and why it is so hard to choose a category, let alone a debt fund from a category!

When it comes to equity funds, the classification is not perfect, but it works to a good degree for large-cap, mid-cap, multi-cap and small-cap funds. You can expect a large-cap fund to hold about 70-80% large cap stocks at any given months. Whether this is right or wrong is another matter, but at least it is easy to understand.

For equity funds, the reward is in terms of the capital gains. That is the value of the underlying stocks grown over time. The market capitalization of the stock is a reasonable measure of volatility. Large cap stocks are typically less volatile than mid-cap stocks, which in turn are less volatile than small-cap stocks.

The problem with a debt mutual fund is the presence of two parameters for both reward and risk.

Two factors determine reward:

A debt mutual fund NAV can increase because of the fixed income received from bonds and/or the capital gains(losses) due to change interest rates or change in credit rating of a bond.

Two factors also determine risk:

Higher the average maturity of the bonds in the portfolio, higher the volatility. The average maturity is the weighted average of bond tenures. If a fund holds more of long-term bonds that will increase the average maturity proportionally.

For a given average maturity (even low) lower the credit quality of the bonds, higher the *potential* volatility (may not be actual volatility).

For a more detailed introduction to these parameters, please consult: [What is a Debt Mutual Fund?](#) and links therein.

Only in the case of Liquid funds, thanks to a SEBI mandate, we have a clear demarcation in terms of bond maturity. These funds can only invest in bonds that mature on or before 91 days. This narrows down the field considerably.

However, they can invest in any kind of bonds - high quality to junk. So one needs to worry about that before selecting one: [How to Choose a Liquid Mutual Fund](#).

Typically most liquid funds are okay, but it is still a good habit to check what it holds: a key [Do's and Don'ts of Debt Mutual Fund Investing](#).

Now take the next category in terms of risk. The ultra-short term funds. The lowest average maturity as listed at VR is 0.06 years (basically a liquid fund) and the higher maturity is 3 years!

The 3Y fund is 5 times more volatile than the 0.06Y fund! And to make things worse, the most volatile fund in the

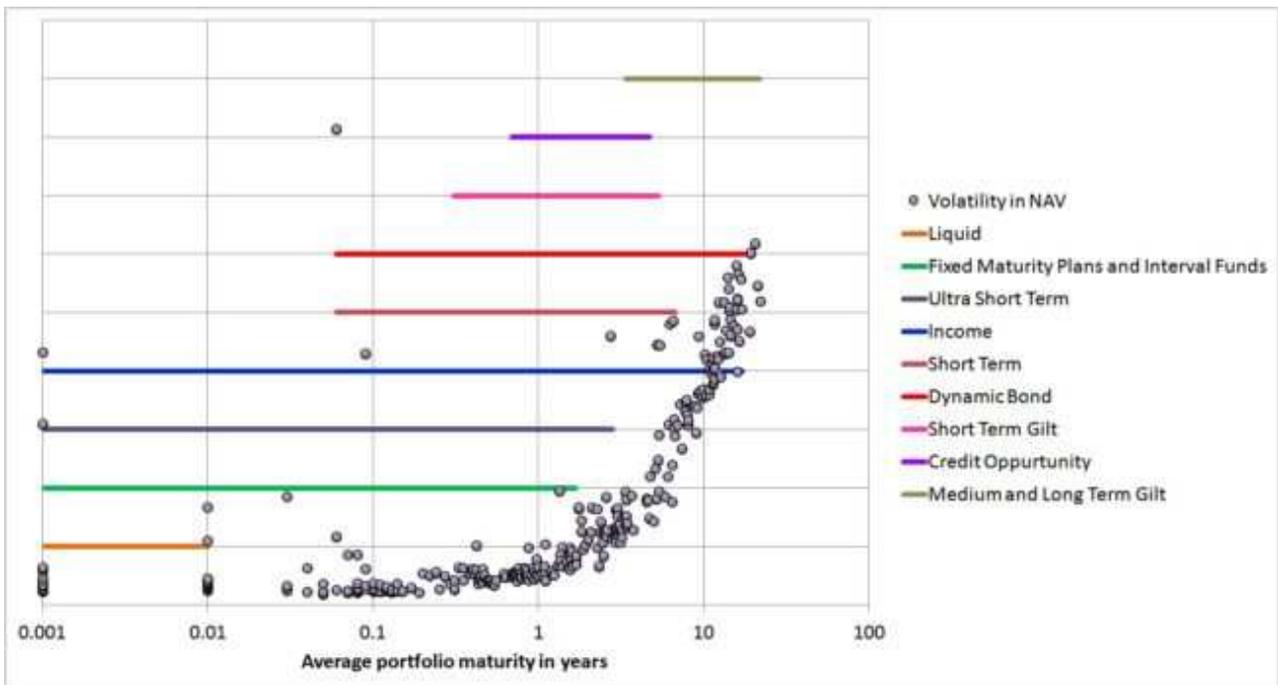
UST category is a fund that holds short-term gilts with an average maturity of 0.42Y.

The point is, the term "category" should not be taken too seriously when it comes to debt mutual funds.

This is the reason I have avoided referring to these and keep saying,

choose a fund with an average maturity much less than 1Y and one that invests in high credit quality (this includes short-term gilt or GOI fund).

Now have a look at the range of bonds that each debt fund category holds. This data is from a month or so ago. So the current data would be a bit different, but the essence is the same.



The horizontal axis is the average portfolio maturity. Each line represents one type of debt fund. The length of the line tells you the minimum and maximum maturities in that category. Notice how wide the line is and how one category overlaps with another.

The beads represent volatility in NAV. Notice how it gradually increases and beyond 1Y avg maturity, shoots up. Now focus on an average maturity of 0.001Y or 0.01Y. Notice that some funds for the same maturity have a higher risk. This is most likely due to credit rating variations. I need to dig deeper to confirm this though.

If you can understand the above plot, you will immediately understand why I said the term category is pretty fluid and why it is difficult to narrow onto a category, *even if we want an avg. maturity less than one year.*

This is the reason I keep insisting that one should look at the scheme information document to understand where the scheme can invest. It is always better to choose a fund that will only invest in certain types of bond.

Take for example, the case of DSP BR Treasury fund. Its investment objective is:

The primary objective of the Scheme is to generate income through investment in a portfolio comprising of Treasury Bills and other Central Government Securities with a residual maturity less

| *than or equal to 1 year.*

Therefore the fund manager did not invest in longer duration gilt and neither profited from the recent gains, not suffered losses.

As part of my forthcoming robo-advisory toolkit, I intend to shortlist a few funds with a narrow mandate such as the above. Will post it separately. In the meanwhile, I recommend studying the scheme documents of "banking and psu" based debt funds in the ultra-short term category.

The debt mutual fund classification followed by Value Research (VR) is listed below. This classification is approximate and broad. While indicative of investment strategy and portfolio, always check with the *latest* scheme invest document to understand where and how the fund invests.

Short Term Gilt: Funds that exclusive invest in gilt (govt.) securities with average portfolio maturity up to 4.5-5.5 years (in the last year). This is a wide duration and volatility of a fund with 4-5 years average maturity would be much higher than funds holding much shorter bonds. Funds in this category can invest in long-term bonds if they expect rates to go down. The DSPBR Treasury Bill Fund is the only fund I would recommend here.

Ultra Short Term Funds: VR classifies funds with average portfolio maturity greater than 91 days to about 1 year. This classification applies only for the portfolio in the last one year. Such funds typically invest in bank, PSU and corporate deposits. *However, you can see Kotak Banking and PSU Fund here with a current avg maturity of 3 years! And 13% of its portfolio has gilts.* See what I mean?

Liquid Funds: Funds that invest in fixed income securities with a tenure equal to, or less than 91 days (this is a SEBI mandate).

Credit Opportunity funds hold bonds with medium to low credit quality with average portfolio maturity ranging from less than a year to a few years. Funds in this category typically hold the bond until maturity. That is they allow interest income to accrue without selling the bonds. However, the credit rating of the bonds can either go up or down resulting in sharp NAV upward or downward movement respectively. **Debt Mutual Funds: Credit Risk and Interest Rate Risk Can Co-exist!**

Debt Income: Funds this is category can be thought of as the equivalent of diversified equity funds. They can hold anything from cash, gilts, corporate bonds, bank or PSU deposits. They could further be classified into long-term and short-term income funds. The 'income' refers to a combination of interest income and capital gains due to interest rate or credit rating changes. There is no specific maturity band. It can be anything.

Debt Short Term: This is a broad category where the average portfolio maturity can be anything from under a year to about 4.5 years. The average credit quality also varies widely from AAA to A. Some of the funds in this category exclusive hold banking and PSU bonds. Investors who would like to avoid credit risk, but would like a small risk premium compared to gilt bonds can consider such funds. The current list has 2 funds well above this 4.5Y mark.

Dynamic Bond Funds: The funds have a mandate to shift to longer duration bonds (both gilt and corporate) when interest rates are expected to fall and to short duration bonds when rate are expected to increase. However, not many funds are truly dynamic and they tend to behave more like diversified debt funds. Although expected to have much lower volatility than long-term gilt funds, it is not the case. **Do not invest in dynamic bond funds!**

Fixed maturity plans (FMPs) are closed-ended debt funds. That is the fund opens for subscription during the new fund offer period and is closed to both new investments and redemptions until the maturity date. The NAV however, would be listed on each business day. The portfolio can be a mixture of corporate, bank and PSU bonds of varying maturity. The FMPs in principle can be sold and bought in the secondary market with a demat account. **How to Select Mutual Fund Fixed Maturity Plans (FMP)**

Open-ended FMPs are known as interval funds: [Introduction to Interval Income Mutual Fund Schemes](#)

They can be used intelligently: [Smart Ways to Invest in Corporate Fixed Deposits](#)

Gilt Medium & Long Term: Funds that invest exclusively in gilt bonds with average portfolio maturity above 4.5 years. The NAV of these funds will react sharply to interest rate movements – gain when interest rates fall. However, since interest rates are cyclic, these funds tend to lose what they gain when the interest starts increasing again. Therefore they are used for opportunistic buying and selling.

Never buy long-term gilts. See why [here](#). They are meant for trading, not investing.

Are Debt Mutual Funds an Alternative to Fixed Deposits?

 freefincal.com/are-debt-mutual-funds-an-alternative-to-fixed-deposits/

7/10/2016

Debt mutual funds are advertised as tax-efficient alternatives to fixed deposits. There is more to investing than tax-efficiency. Investors must be aware of the associated volatility and how it can impact returns depending on the duration.

Post-tax debt fund returns may or may not be higher than post-tax fixed deposit returns.

The answer to the titular question depends on **when you need** the money and **how you need** the money.

If you need the money less than 3 years from when you invest,

(a) do you need the money in one-shot? That is, will you redeem the amount all at once? If so stick to a plain fixed deposit.

[Liquid funds](#) can also be used if comfortable, but the tax rate is the same. [Arbitrage funds](#) are better from the point of view of tax, but returns need not be higher than a fixed deposit.

One could argue that the TDS and tax payment each FY will reduce the gains of an FD when compared with a debt fund.

This will have an impact only for long durations. See [Debt Fund vs FD calculators](#)

All debt funds are volatile. That is, their returns are linked to the bond market and will vary. So before 'expecting' a return, from a debt fund (or for that matter any fund), one must be clear about how much the returns can vary and for how long (duration) would the variation be significant (see point (b)).

(b) will you redeem in parts? That is, take out money from time to time, depending on when you need it?

In this case, debt funds are suitable, provided you have chosen the right category of funds.

I would like to define the 'right' category in the following way:

the average maturity period of the bonds in the folio should be much smaller than the investment duration.

You will find 'experts' who would tell you to 'match' your investment duration with the average maturity of the fund portfolio. If you did this, you better not expect anything. Because your returns could swing by a large extent. You may or may not be able to beat post-tax FD returns.

To illustrate this point, let us consider a few debt funds. This article was first written in Nov. 2014. I have now updated this post with a few recent links and an illustration for a short-term gilt fund.

I like the way Franklin Templeton describes its products. You can get a clear snapshot of what the fund is all about. The bulleted fund features below are taken from the FT website.

Franklin India Ultra-Short Bond Fund

- An open ended income fund with an objective to provide a combination of regular income and high liquidity by investing primarily in a mix of short term debt and money market instruments
- The fund manager strives to strike an optimum balance between regular income and high liquidity through a judicious mix of short term debt and money market instruments
- The fund is suitable for investors with an investment horizon of up to 3 months who prefer accrual based debt products

" investment horizon of up to 3 months" - that sounds like I can use it for any period up to 3 month.

Observed how the rolling returns evolve for different time periods. A 30-day rolling return means every point in the graph is calculated for a 30-day period.

Notice that as the time period increases the sharp fluctuations in return reduces and the curve becomes smoother. How much would you expect from the fund if you invest for 3 months?

I would prefer to hold it for at least 1Y and expect about 7-8% return

Franklin Indian Short-term Income Plan

- Open-ended short term income fund whose investment objective is to provide stable returns by investing in fixed income instruments
- Invests primarily in corporate bonds with a focus on higher accrual income
- The fund focuses on investment opportunities at the short end of the yield curve by maintaining a low average maturity profile
- The fund is positioned between a liquid fund and an income fund in terms of risk reward
- This fund is suitable for investors with a time horizon of 9-15 months with moderate risk profile who prefer higher accrual and credit quality focused debt fund

In this case, I would prefer to hold it for at least 2-3Y and expect about 8% return.

For less than 3 year durations, debt funds are taxed the same way as fixed deposits. So why should I take on more volatility? I might beat FDs, I might not. I would choose debt funds only if I don't exactly know when I will need the money or if I need to redeem in parts.

For more than 3 years, the indexation benefit will make debt funds more attractive for those in 30% slab. For much longer durations, even those in 20% slab *might* benefit.

However, choice of fund matters.

Consider:

Franklin India Income Builder Account

- Open-ended income fund that strives to deliver superior risk-adjusted returns by actively managing a portfolio of high quality fixed income securities
- The fund is positioned in the long term bond fund category that focuses investment in high quality fixed income instruments across segments ie G-Secs, Corporate Bonds and Money Market instruments
- The fund focuses on corporate bonds/ PSUs segment and has a high a moderate to high-interest rate sensitivity
- The fund is suitable for investors with a time horizon of 1-2 years with a moderate risk profile

Would you trust what the AMC says and buy income builder and hold for 3Y? *Depending on when you purchased, the return can be higher or lower than FD return.*

DSP BlackRock Treasury Bill Fund

This fund has a mandate to invest only in government bonds of maturity not less than 365 days. It has a concentrated portfolio of 1/2 bonds and cash. The AMC does not recommend any particular duration except that it is suitable for "Income over a short-term investment horizon".

Notice how this short-term gilt fund can be quite volatile for short durations. Only when we look at rolling returns over a few years, do returns settle down. Better to use it for above 3-year periods

When it comes to short-term goals (anything less than 5Y), the very last thing that I want to do is monitor my portfolio and make course corrections. I would prefer to choose something that has low volatility so that I can be a buy and hold investor. I would prefer to focus on my long term goals.

Always account for the stress associated with holding a debt fund.

Choose short-duration funds. It is a low-stress option (relatively). Just don't expect too much more than FDs.

Never speak ill of a fixed deposit. It is a wonderful product. Just don't use it for long-term goals.

If the AMC recommends an investment duration, be sure to triple the estimate. This applies to equity funds as well (PPFAS says min 5 years, meaning you should hold it for 15 years or more !!).

You can start with these links on how to choose debt mutual funds:

[How to select mutual fund categories suitable for your financial goals](#)

[How to choose debt mutual funds with no credit risk and low volatility](#)

Conclusions

1. Do not use debt funds if you do not have an idea of how volatile they can be.
 - You can use the [Multi-index Mutual Fund Rolling Returns Calculator](#) to get the above graphs for the fund that hold or aim to invest in.
2. The average maturity of the portfolio should be much lower than the investment duration of the fund.
 - If your investment duration is 3 years, then an average maturity of a few months is good (liquid funds)
 - If your investment duration is 10 years, then an average maturity of 1-2 years is good.
 - Ultra-short-term funds ~ 1Y.
 - Short-term gilts ~1-3Y if you want to avoid credit risk.
 - Income funds from solid bonds from banks and PSUs or a bit of corporate debt ~ 1-3Y is also okay.
3. A fixed deposit is a wonderful product for investment durations less than 3 years. After all, [there is more to investing than obtaining real returns](#)

How to Select Debt Mutual Funds Suitable For Your Financial Goals?

 freefincal.com/how-to-select-debt-mutual-funds-suitable-for-your-financial-goals/

4/17/2014

Since the time my [step-by-step guide to selecting \(Equity\) mutual funds](#) become popular, I have been receiving requests to publish a similar guide for debt mutual funds.

Well begun is half-done. If an investor can confidently select categories suitable for their financial goals, short-listing a set of funds from that category is that much easier. This is especially true for debt funds, since choosing one is typically tougher than equity funds.

Although I intended this post to be a companion piece to the more general, [How to select mutual fund categories suitable for your financial goals](#), as I wrote it, enough aspects have been included to consider this as a step-by-step selection guide for debt funds.

Interest rates and bond prices have a fascinating relationship. Therefore, besides the usual risk-return parameters of alpha, beta, standard deviation, Sharpe ratio, Sortino ratio etc used for equity mutual funds, quantities like yield, yield to maturity, average portfolio duration, modified duration etc. are involved in debt fund selection/evaluation.

This makes the selection process *appear* complicated. However, this can be simplified by focussing on 1/2 parameters to first narrow down the debt fund category and then short-list funds from that category.

Thanks to the recent crash in bond prices, a visual analysis is possible.

On July 16th 2013, the 10-year G-sec rate increased by 6.69% while the 1-year G-sec rate increased by a whopping 14.8%. Source: www.investing.com

While the steps taken by RBI to curb rupee-depreciation was the main reason for this, other events played a part too. See [here](#) for a decent report.

The value of a bond has an inverse relationship with interest rate. If interest rates increase, the value of a bond *has to fall* in order to match current yields. Therefore, the NAV of a bond fund holding such bonds will decrease.

Since both the 1Y and 10Y rate jumped up sharply, pretty much bonds of all durations were affected, resulting in a fall in NAV of almost all types of funds.

Even liquid and ultra –short term funds, with maturity durations much less than a year, were affected, because banks pulled out huge amounts of money stashed in such funds.

Since this event occurred less than a year ago, the default option (1Y) in the *performance* tab of each debt fund page at Value Research Online shows how funds behaved during this period.

This offers a simple way to understand how different types of debt funds react to interest rate movements, aka *interest rate risk* – one type of risk that debt funds are subject to.

First, let me quote two definitions:

Modified Duration : *Measured in years, modified duration is a measurement of a bond's sensitivity to movements in interest rates. For example, a bond with a modified duration of 5.2 years can be expected to undergo a 5.2% movement in price for each 1% movement in interest rates. The longer the modified duration (in years), the more*

sensitive a bond's price to changes in interest rates. **Source:** [Invesco Perpetual](#) Opens in a new window

Average Maturity: The average maturity of the portfolio determines the time involved in maturing of all the debt assets in the portfolio of the debt mutual fund. Higher the average maturity of the portfolio greater would be the interest rate risk on the portfolio of the debt mutual fund. **Source:** [MoneyControl](#) Opens in a new window

Both the modified duration and the average maturity represent the sensitivity of the debt fund portfolio to interest rate movements.

While average maturity is a crude measure of interest rate sensitivity, the modified duration is a more sensitive measure.

Just by noting the values of these two parameters, one can understand how interest rate risk affects different debt fund categories.

Here is a compilation of average maturity and modified duration for different fund classes. I have deliberately avoided defining each fund category in the post. Those who are familiar with them should not worry too much. If you are new to debt funds, then I suggest you come up with your own definition of fund categories by observing the maximum values of the average maturity and modified duration.

Fund Category	Average Maturity (Years)		Modified Duration (Years)	
	Min	Max	Min	Max
Debt: Liquid	0.003	0.2	<0.01	0.18
Debt: Ultra Short term	0.03	0.98	~ 0.04	~ 0.83
Debt: Short term	0.65	3.25	0.58	2.47
Debt: Income	0.44	13.62	0.37	6.95
Debt: Gilt Short term	0.01	0.01	5.5	3.78
Debt: Gilt Medium & Long Term	~0.01	20.44	>8	>8

Source: Value Research Online. In some cases, the average maturity and modified duration are not for the same fund. The typical order of the values is however correct.

Performance in the past year

Debt: Liquid. Let us look at the fund with highest average maturity (AM) (0.2 years) and highest modified duration (MD) (0.18 years).

Reliance Liquidity Fund | ★★★★★

Regular | Direct Plan

Status: Open for subscription

0.03%

Change from previous NAV as on Apr 15, 2014

Growth: ₹ 1939.4504

Category: Debt Liquid

Dividend Weekly: ₹ 1001.3652

Assets: ₹ 6,439 crore (As on Mar 31, 2014)

NAV of Other Plans :

Expense: 0.12% (As on Sep 30, 2013)

Snapshot

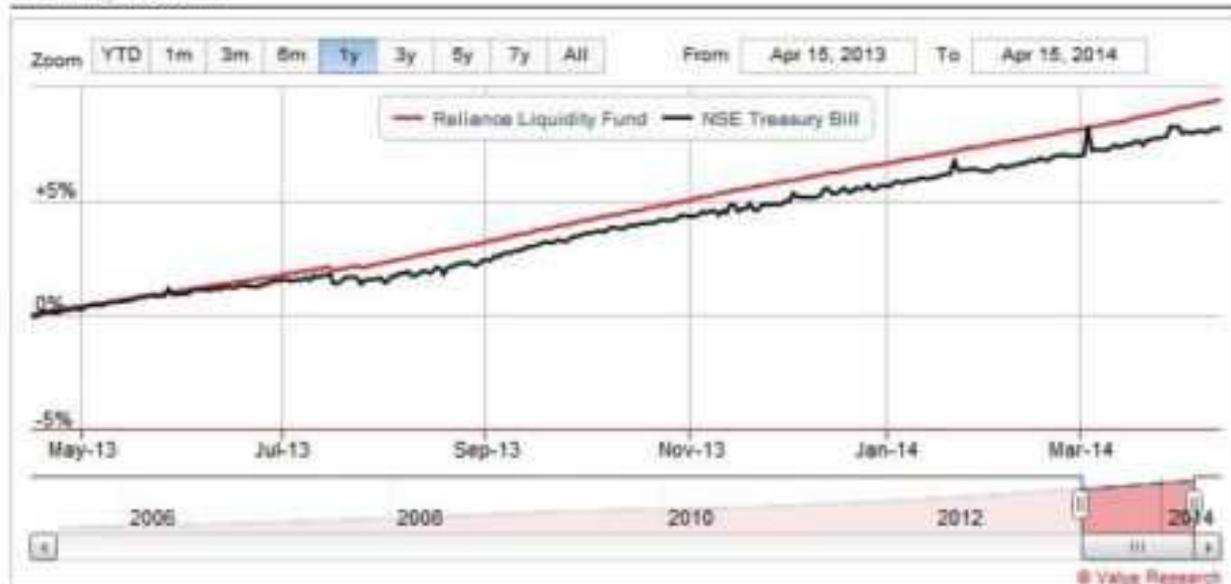
Performance

Portfolio

Analysis

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Trailing Return



Notice the little bump in the NSE Treasury Bill a little after the bond crash. The fund however was practically unharmed. If you peer a little you will notice a small dip on July 16th. Notice how fast the fund bounced back – in a few days.

Debt: Income Let us look at two funds.

The fund with lowest category AM = 0.44 years , MD = 0.37 years

ICICI Prudential Banking & PSU Debt Fund - Regular Plan

★★★★★

Regular | Direct Plan

Status: Open for subscription | [Invest Online](#)

0.10%

Change from previous, NAV as on Apr 13, 2014

Growth: ₹ 14.0956

Dividend Weekly: ₹ 10.1855

NAV of Other Plans

Category: Debt Income

Assets: ₹ 420 crore (As on Mar 31, 2014)

Expense: -

Snapshot

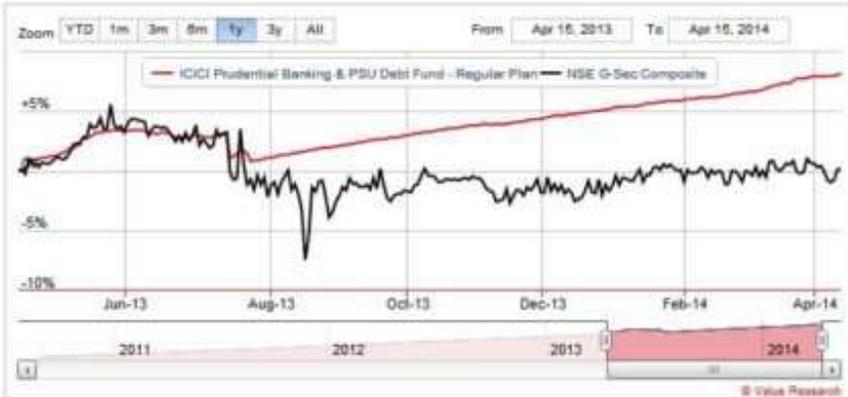
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Notice how the fund suffered a dip on July 16th but recovered in a couple of months.

Now let us look at the fund with the highest category AM = 13.62 years; MD = 6.95 years.

ICICI Prudential Income Plan - Direct Plan | ★

Regular | **Direct Plan**

Status: Open for subscription | [Invest Online](#)

0.19%

Change from previous NAV as on Apr 15, 2014

Growth: ₹ 37.5482

Dividend Quarterly: ₹ 12.0262

NAV of Other Plans:

Category: Debt Income

Assets: ₹ 4,098 crore (As on Mar 31, 2014)

Expense: -

Snapshot

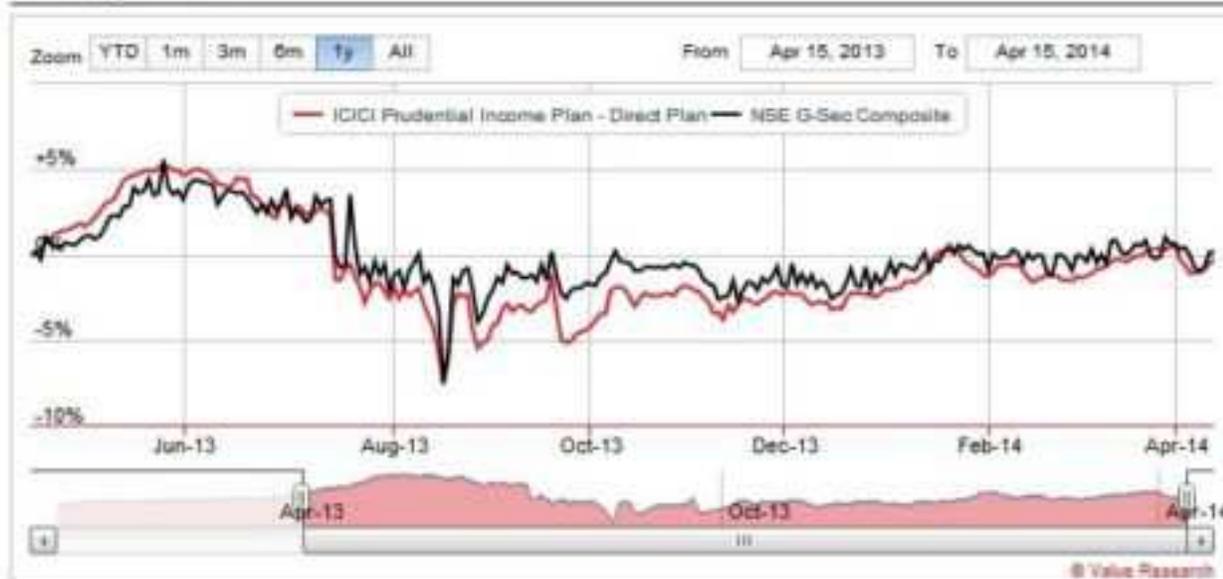
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The fund is yet to reach its July 16th NAV.

Similar plots can be made for the short term gilt funds. Imagine the fate of the Debt: long term funds!

Therefore, in general, higher the average maturity of the portfolio, higher the interest rate risk.

Higher the average maturity, higher the modified duration.

Higher the modified duration, higher the *interest rate risk*. The value of the modified duration gives you a more exact estimate of how much the NAV will be affected for 1% change in interest rates.

Typically funds with low AM and MD will follow an accrual strategy. That is they will buy and hold debt paper until maturity. So interest rate risk is lowered. However, *credit risk* comes into play. Lower the **quality of the debt paper**, higher the credit risk and higher the interest rate!

SEBI allows fund houses to **buy credit protection** (sort of an insurance) to hedge credit risk on corporate bonds. So that offers some comfort to the investors.

How do we use this information to select mutual funds?

When it comes to debt fund investors, I can think of three types

1) Those who are always chasing interest rates, double indexation etc.

- 2) Those who are looking to invest for short term goals, less than 5 years away
- 3) Those who are looking to invest for long term goals, as part of diversified folio.

We will leave type (1) alone. Obviously they know what they are doing. We will leave the high AM, high MD funds to these guys.

Where kind of funds should type (2) investors choose?

They should choose a fund with average maturity well below the tenure of the financial goal.

For a 5 year goal, I would choose a modified duration and average maturity of no more than 1 year.

Which kind of fund to invest in? Now we will need to look into the *nature* of the debt holdings. Is it corporate debt? Is it Bank paper? Is it govt debt (gilt)? What is the rating of the debt paper?

For important goals, best to stick to high quality debt issued by banks and PSU

Short term gilt funds with lower MD can also be used, but the returns would be on the lower side.

For less-important goals, you can be a little more adventurous and include some corporate debt. Here again stick to funds that have predominantly 'AAA' securities in their folio.

So investors should first look at low *interest rate*. *The risk* (AM & MD) , shortlist couple of fund *categories* and then choose funds with low *credit risk* (quality of debt).

Here is a screenshot from the ValueResearch *portfolio* page showing the AM, MD and the *fund style box*. We should funds with *high* credit quality and *low* interest rate sensitivity for short term goals. Most investors with a goal in mind, should stay within the red circle.

Templeton India Short Term Income Plan - Retail Plan



Regular | Direct Plan

Status: Open for subscription

0.06%

Change from previous, NAV as on Apr 17, 2014

Growth: ₹ 2578.1027

Dividend Weekly: ₹ 1091.8389

NAV of Other Plans

Category: Debt Short Term

Assets: ₹ 7,940 crore (As on Mar 31, 2014)

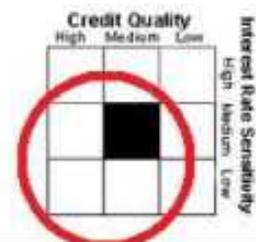
Expense: 1.52% (As on Sep 30, 2013)

Snapshot	Performance	Portfolio	Analysis	Download Reports
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Portfolio Aggregates

	Fund	1Y High	1Y Low	Category
Number of Securities	103	115	89	33
Modified Duration (yrs)	1.68	2.43	1.68	1.32
Average Maturity (yrs)	1.86	2.69	1.75	1.64
Yield to Maturity (%)	10.73	10.73	10.09	9.82

Value Research Fund Style



Once the fund category is chosen, you can short list funds using the risk-return parameters (alpha, beta, standard deviation, R-squared, Sharpe ratio) using the same strategy as outlined in the [step-by-step mutual fund selection guide](#). If you would like to understand risk-return parameters in a simple non-mathematical way, click [here](#)

This would enable you to short-list low-risk, reasonable-return funds from the category of your choice.

The next step would be to look at the fund objective and investment strategy. Some fund houses like Franklin Templeton mention this clearly on each fund page. If the information is not clear, read the scheme document. Do not ask anyone else!

The objective and investment strategy *must* give you the impression that the current AM and MD will more or less be the same for the investment tenure you have in mind.

If yes, go ahead and invest!

NEVER invest in a debt fund without reading the investment objective and investment strategy.

Where kind of funds should type (3) investors choose?

First let us understand what we need debt funds for long term goals which would typically have significant equity.

- Why not PPF? PPF is not suitable for goals less than 15 financial years away
- PPF is good but it does not allow rebalancing. You can book profits into PPF but not vice versa when you want to.
- With a debt fund there is a chance for high returns which could be transferred to equity when the markets fall. So debt funds allow for rebalancing which if done cleverly can contain portfolio volatility significantly.

Just like a diversified equity fund, a well diversified debt fund like a dynamic bond fund with modified duration and average maturity of no more than 2-3 years will do the work. The NAV will fluctuate and that is fine, since we need fluctuations for rebalancing! You can learn more about rebalancing here. Be sure to play with the simulator tool.

Just as the concept of [standard deviation can help a newbie mf investor understand different fund categories](#), the concepts of average maturity, and modified duration can help the newbie debt fund investor to pick a category suitable for their needs.

Debt funds selection can typically be more complicated than equity fund selection. It is up to the investor to simplify this process by being clear on [what they want](#). They should learn not to chase after returns and keep expectations low.

Understanding Interest Rate Risk in Debt Mutual Funds

 freefinancial.com/understanding-interest-rate-risk-in-debt-mutual-funds/

4/21/2015

There are two ways in which an investment in a debt mutual fund grows: (1) by buying bonds with high coupon rates and holding them until maturity. The growth in this case is by accrual of interest. (2) by choosing long-term bonds issued by the government and aim for capital gains when the bond price increases due to decrease in interest rates.

Higher the coupon rate, lower the credit rating. Therefore the accrual strategy is subject to risk of default. Most investors do not recognize that the accrual strategy is also subject to interest rate risk. That is, the value of the high coupon rate bonds can also change value depending on interest rate movements.

If the fund manager buys only government bonds (long or short-term), there is no risk of default and only risk of capital loss due to increase in interest rates.

When interest rates increase, new bonds will have a higher coupon rate than existing ones. Since the demand for existing bonds decreases, they will have to be priced lower in order to be sold in the bond market. In fact the price has to drop to ensure the yields matches that of the new bonds.

Similarly if interest rates decrease, new bonds will have a lower coupon rate than existing ones. The demand for the old bonds increases and so does the price until the yields match.

Yield

Yield is a measure of the interest income generated by a bond.

Yield = coupon amount / bond price.

If a bond is priced at 100 with a coupon rate of 10%, the coupon amount is 10% of 100 = 10

The *initial yield* = $10/100 = 10\%$

For debt funds, the weighted average of portfolio bond yields is calculated. This is known as **running yield** or **yield to maturity**.

It is the expected yield *if the bonds in the folio are held to maturity*.

Modified Duration

There is a simple metric which the investor can use to understand how sensitive a debt mutual fund is to interest rate changes: **the modified duration**.

The modified duration is measured in years and gives us two pieces of information:

1. For 1% change in interest rates, what would be the expected increase or decrease in fund NAV. A modified duration of 2 years implies, a possible NAV change of 2% for 1% change in interest rate. So longer the modified duration, higher the interest rate sensitivity.
2. For a given yield to maturity, how long would the fund take to recover, if there is a loss due to increase in interest rates.

Change in bond price = $-1 \times \text{Modified Duration} \times (\text{change in interest rate})$

For debt funds, the formula is

Change in NAV = $-1 \times \text{Modified Duration} \times (\text{change in interest rate})$

If the modified duration is 4 years and if the interest rates have increased by 1%,

change in interest is +1% (it would be -1% if the rates had dropped by 1%)

So the change in bond price or NAV = $(-1) \times 4 \times (+1\%) = -4\%$

The -1 is included in the formula to show that interest rate movement and bond price or NAV movement are opposite to each other.

Higher the modified duration, higher would the gain or loss due to rate movements.

Suppose the *current* annual yield to maturity of the debt fund (net of expenses) is 10% per year. This means that each day the NAV will increase by

$10\%/365 = 0.03\%$ each day.

If the interest rate has increased by 1% in a day, a debt fund with a modified duration of 4 years would suffer a NAV loss of 4%.

The fund NAV will continue to increase 0.03% a day. To recover from the change in interest rate, the fund will take

$4\%/0.03\% = 133$ days or about 4.5 months.

Thus modified duration gives you an idea of how much you stand to lose or gain when the rates change and along with the current yield to maturity of the fund, it gives you an idea of how long the fund would take to recover from a rate hike.

Here are some numbers for a few funds in each debt fund category listed by VR online.

The time to recover here is in response to a 1% increase in interest rates.

Fund Category	Fund Name	Yield to maturity	Modified Duration in years	Change in rate	Time to recover from loss in months
Liquid	Tata Money Market Fund	9.18	0.19	+1%	0.25
Short term	Franklin low duration fund	10.44	1.07	+1%	1.25
Ultra Short term	HDFC Short term opp fund	8.58	1.42	+1%	2.01
Gilt Short term	HDFC Short term Gilt	8.29	1.69	+1%	2.48
Income	Franklin Corporate Bond Opp	10.59	2.37	+1%	2.72
Income	IDFC Dynamic Bond Funds	7.82	8.55	+1%	13.30
Medium and long-term gilts	ICICI Gilt fund	7.9	9.69	+1%	14.92
FMP		Not available	Not available		

Note that that values can vary widely within a category. Would be a good idea to *always* choose a fund with low modified duration and reasonable yield to maturity. High yield to maturity implies the fund is invested low rated bonds. So tread with caution.

When it comes to debt fund selection, the modified duration is the most important metric that I would look at.

Here is a something I wrote about an year ago:

[How to Select Debt Mutual Funds Suitable For Your Financial Goals? Opens in a new window](#)

References:

1. [Duration - Debt Concepts Opens in a new window](#)

The Rate Cut in Perspective

RBI surprised everyone by announcing a 0.25% reduction in repo rate (from 8%) yesterday. The market welcomed this news with a sharp rise. Several self-proclaimed long-term investors welcomed their prospective notional gains as enthusiastically as they despaired at their notional losses when the markets 'crashed' a few days ago

Here is a perspective of 'where we stand' by a student of the bond market.

Let us start with the definition of bond yield. We will limit ourselves with the simplest definition that the yield represents the IRR of the bond investment, taking into account all the interest payments along with the investment and receipt of the investment upon maturity. Things become complicated if the bond is purchased mid-way but the notion that the yield represents IRR is always true.

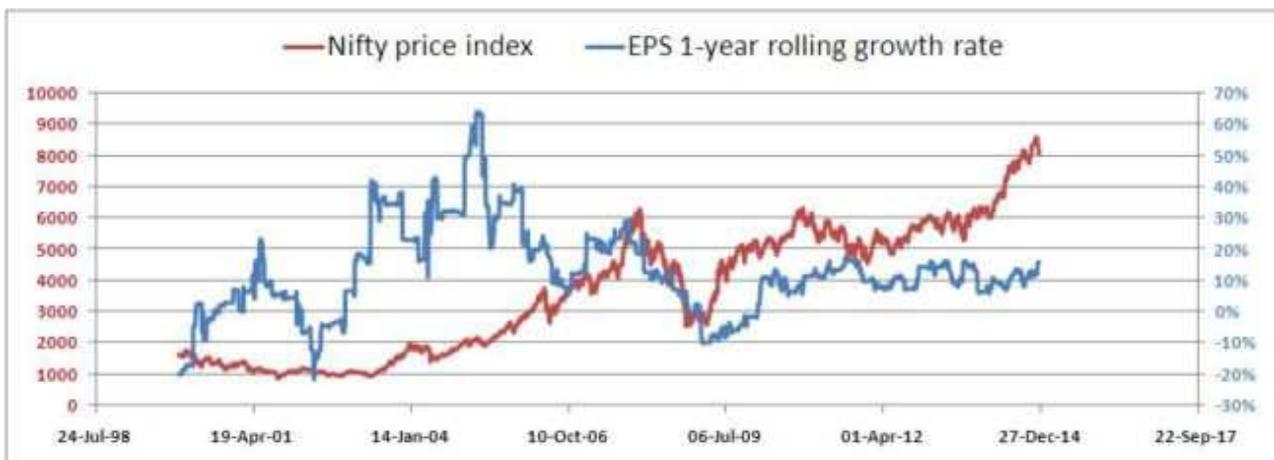
When rates fall, new bonds have lower coupon rates (interest rates), resulting in lower IRR and lower yields. To ensure existing bonds can be sold, their yields must be matched (lowered in this case) to the new bonds. This is done by increasing the price of existing bonds. Thus, higher the price of an existing bond, lower its yield.

The difference between the long-term and short-term bond yields can be thought of as an indicator of the state of the economy and therefore of the equity markets. This idea can be graphically represented by the so-called **yield curve**, where the current yields of short and long-term bonds are plotted. I will soon write a detailed post on the yield curve along with a yield curve generator. For now, I will focus on the difference between the 10Y bond yield and the 1Y bond yield.

When the economy is flourishing or if the outlook for the future is positive, money is borrowed for the long-term. Demand of long-term bonds is high enough, supply is high enough and therefore the price is low (enough!) and hence during such times, long-term bond yields are higher than short-term yields by about 1-2% or even more.

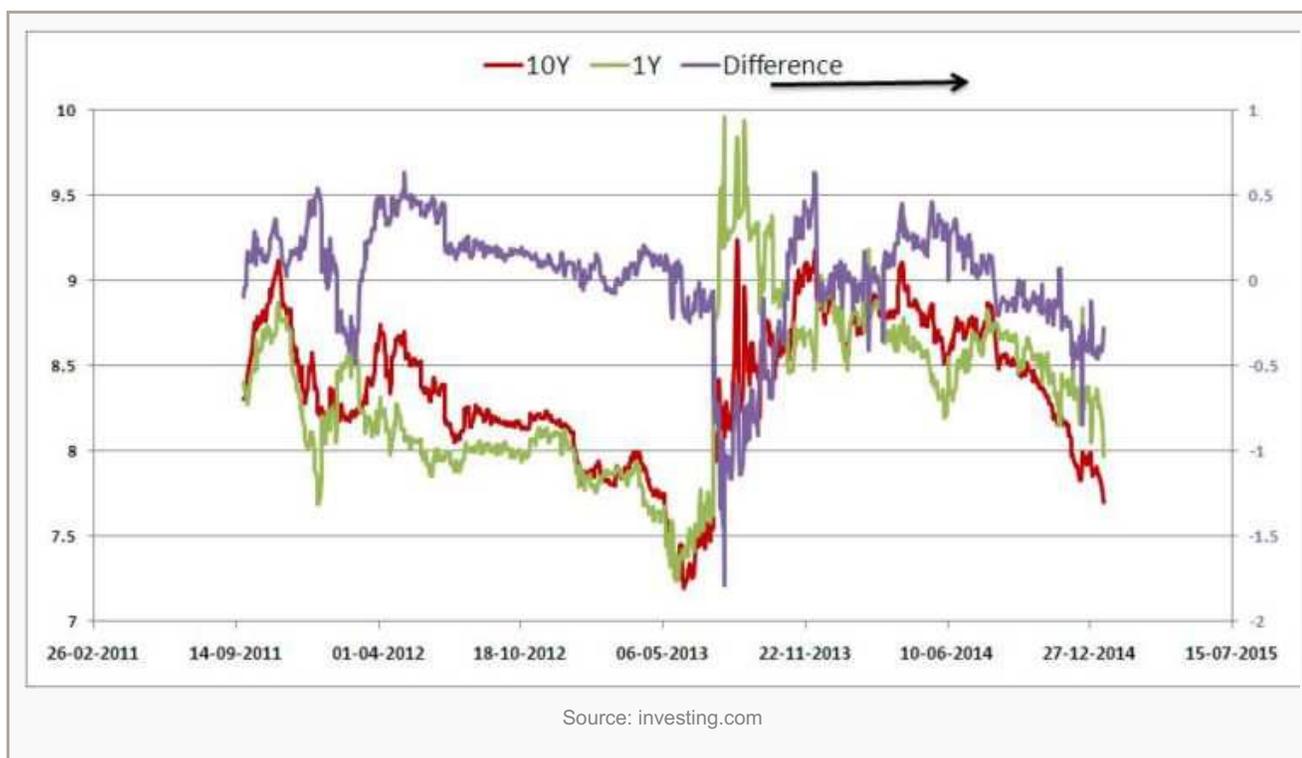
When no one borrows money for the long-term fearing a bearish market, the difference between the long-term and short-term yield diminishes (the yield curve is flat).

This phase, where the yields are typically the same irrespective of duration indicates economic slowdown. I don't have access to bond data beyond Sep. 2011, but I am willing to wager that ever since the 2008 crash, or thereabouts we have been plagued with economic slowdown resulting in a flat yield curve. This can also be seen by the sideways movement in the Nifty EPS growth rate.



Use the [Nifty valuation analyzer](#) for more such insights.

Let us now look at the 10Y and 1Y bond yields and the difference between them from Sep. 2011. Both the right and left axis represent percentages.



I am unable to find out the origin behind the sharp dip in late 2011. Notice the difference plotted in purple (right axis). The difference is barely positive and does not move much before the July 2013 crash.

In the months leading up to the crash the yields nose-dived. Which I think is because of heightened activity mainly in short-term bonds triggered by the depreciating rupee. Do correct me if I am wrong.

In July 2013, RBI hiked the short-term interest rate to stem the purchase of short-term bonds, reduce liquidity in the market and support the falling rupee. The above graph indicates this move with a sharp increase in 1Y yield.

When the short-term rates increased, the FIIs suffered notional losses and made them real by exiting in panic. Banks redeemed from liquid funds to bolster liquidity pulling down their NAVs

Suddenly the 1Y yield was higher than the 10Y yield. RBI had 'inverted' the yield curve. Typically, short-term yields higher than long-term yields would imply a recession, but this was an artificial inversion created to save the rupee.

In the next few months, the difference between the yields got erased and as elections loomed, the equity markets picked up in the hope of a 'strong' government. Soon after the BJP government took over, inflation stabilized and began to drop.

There was an indication that rates will not be increased anymore and then there was the hope that it would be cut. With this hope, investors (of whom the FIIs are significant) started to buy both long-term bonds (to gain from the rate cut) and short-term bonds (to lock-in to the high rates. As a result, the yields plunged downward.

Yesterday, both the yields went down sharply in reaction to the rate cut.

As mentioned above, this is because, when rates fall, new bonds will be issued with lower coupon rates (interest rates), that is with lower yields. The existing bonds yields will be lowered to match the yield of the new bonds. To do

this, existing bond prices increase.

As of yesterday, the 1Y bond yield (tracked at investing.com) is still higher than the 10Y yield. This means that we are not out of the woods. That is, this rate is not a sign that the economy has picked up.

The [online yield curve](#) maintained at Clearing Corporation of India is shown below for yesterday (red) and the day before (14th; blue) is shown below. Thanks to Rajendra Dixit for pointing me towards this resource.



Notice the sharp lowering of the short-term yields in reaction to the rate cut. Other short-term bonds, not part of this curve plunged even lower (automated yield curve generator is coming soon). This is only to illustrate the effect of a rate cut. This represents data for two days. Don't read too much into it.

It is important to recognise that this rate cut (hopefully the first in a series of such cuts) means little because of the following reasons:

1. Inflation in India depends on international oil prices and monsoons among other things. These are beyond our control.
2. Stability of the rupee is important. This is a complex problem. Some factors depend on how easy it is for the government to pass laws. Some factors originate outside the country. The rupee has been 'stable' for just over an year now. So let us not get too comfortable.
3. Both the above factors, if favourable, will sooner or later reflect in the rate at which earnings per share increases (hopefully!). When that happens, I can afford a smile and pray for the bull run to continue.
4. Sooner or later, the 1Y yield will first drop lower than the 10Y yield and the drop even lower. At which time repo rate will be increased soon and yet another cycle of jubilation and despair would begin.
5. This rate cut is certainly a step in the right direction. Although a journey starts with a step, it is only a step. There is nothing special about it.

It will take more cuts to ensure the long-term yield edges higher than the short-term yield. Hopefully, those cuts will come down the line gradually. Any sharp rate cut comes with the danger of a retraction, which will seriously hurt

investor sentiment.

Why bother? Why can't we ignore this noise and focus on our financial requirements and then move onto other things? Why must we jump up or down in reaction to a non-event which is part of a cycle anyway? Beats me.

If you can provide additional insights or would like to correct any of the above interpretations, please do so.

Understanding Credit Rating Risk in Debt Mutual Funds

 freefincal.com/understanding-credit-rating-risk-in-debt-mutual-funds/

2/17/2016

Many debt mutual funds invest in corporate bonds which carry credit risk. It is important for investors to understand how this can affect debt mutual fund returns.

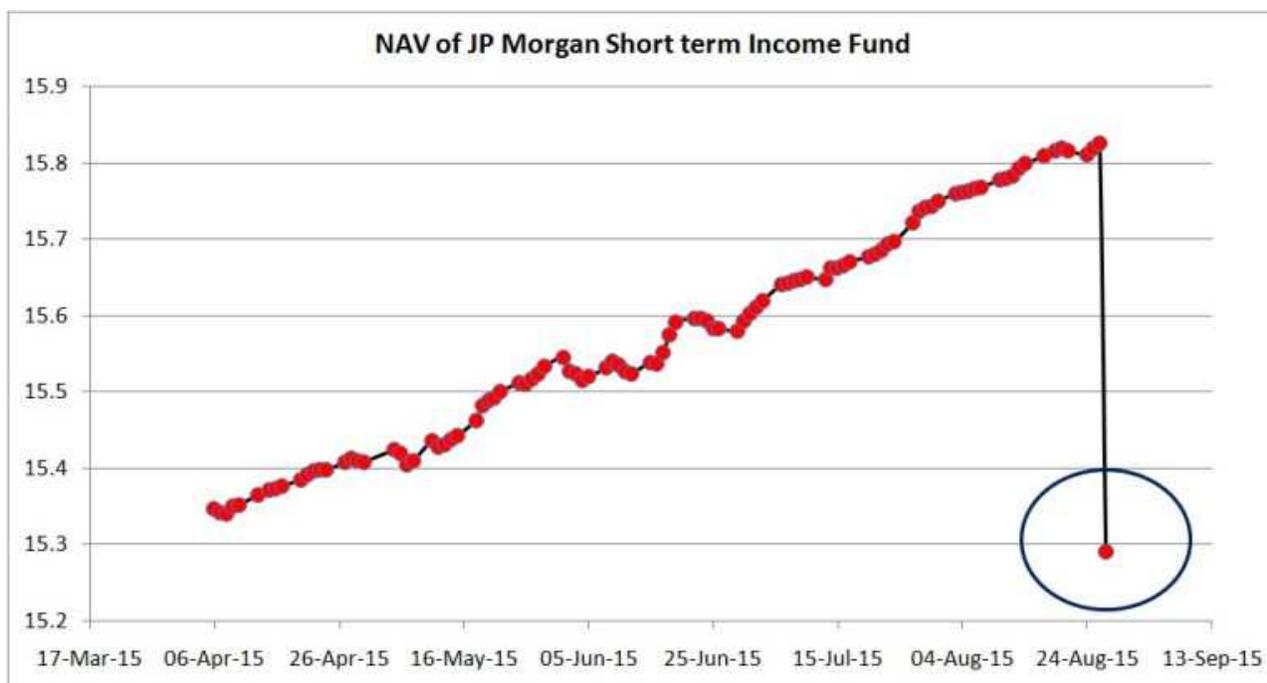
Yesterday, rating agencies, CRISIL, ICRA and CARE [downgraded short-term and long-term ratings on Jindal Power and Steel bonds](#)[Opens in a new window](#).

As a result, the NAV of debt funds which held Jindal bonds fell. Have a look at this summary by Manoj Nagpal.

This fall is not of the same magnitude as the fall in JP Morgan funds (see below). This rating downgrade is also different in nature. I think investors can continue to hold Franklin Templeton funds. Unlike Amtek Auto, I think Jindal Steel should be able to pay back the principal to FT when the bond matures. The NAV fall was only a market-linked fall. FMP returns will be lower.

This is the second time in six months we see such a fall in debt funds. In Aug 2015, JP Morgan AMC was in the news for the wrong reasons. The NAV of two of its debt mutual funds, JP Morgan Short Term Income Fund and JP Morgan India Treasury Fund fell by -3.38% and - 1.73% on Aug. 27. The reason: both funds held debentures (bond) of Amtek Auto which was downgraded from AA- to C.

A look at how credit rating changes affect debt mutual funds.



Categories of debt mutual funds can appear difficult to understand than that of equity mutual funds. There is a simple way for investors to understand the risks associated with different debt mutual fund categories - *the modified duration*.

As pointed out in previous posts, the modified duration is measured in years and gives us two pieces of information:

1. For 1% change in interest rates, what would be the expected increase or decrease in fund NAV. A modified duration of 2 years implies, a possible NAV change of 2% for 1% change in interest rate. So longer the modified duration, higher the interest rate sensitivity.
2. For a given yield to maturity, how long would the fund take to recover, if there is a loss due to increase in interest rates.

The key to understanding credit rating risk is to recognise that credit risk does not refer to risk of default alone (bond issuer does not pay interest). Since debt mutual funds are marked to market, any change in credit rating will affect the price of the bond and therefore, the NAV of the fund.

There are two types of interest rate changes that affect the NAV:

1) RBI action on short-term interest rates which will impact long-term rate of GOI bonds and corporate bonds as well.

2) Change in credit rating of a corporate bond.

Many investors are under the misconception that corporate bond opportunity funds are immune to RBI action. This is incorrect. Corporate bonds carry a risk premium (higher interest rate) with respect to GOI bonds which will change when the GOI bond rates change.

Due to this risk premium, Corporate bonds must be graded as per their *perceived* ability to repay the principal. This is referred to as a credit rating.

Higher the credit rating, higher the faith in the company and lower the risk of default.

Now if the credit ratings go up for a bond, the interest rate of the bond in the market will *decrease*. Therefore, the value of the bonds the fund currently held by the fund will be worth more than those in the market. Thus, the NAV of the fund will sharply increase.

Conversely, if the credit ratings go down for a bond (like it did for Amtek Auto), the interest rate of the bond in the market will *increase*. Therefore the value of the bonds held by the fund will be worth less, and the NAV will drop sharply.

In either case, as long the firm repays the principal to the fund, the NAV over time will gradually get back to the normal linear movement.

If you wish to calculate how long it would take for the recovery (in case of a credit rating downgrade), you can consult this post: [Understanding Interest Rate Risk in Debt Mutual Funds](#)

However, if the firm defaults then the loss is permanent (thanks to Mahesh Mirpuri for clarifying this).

Therefore, due to fear of default a debt fund, in this case the above-mentioned funds, may face redemption pressure.

If you wish to choose debt funds that invest in corporate bonds, I suggest you choose funds with low modified duration (much less than one year). So even if there is a downgrade in credit rating, the loss (assuming no default) can be recouped in a couple of months.

You can minimise such risks by using the so-called Banking and PSU debt mutual funds. They invest in bond issued by PSUs and banks only.

To lower credit risk and interest risk, I would shun every other debt fund category except ultra short-term funds and liquid funds. See why here: [Investing in debt mutual funds: slow and steady wins the race!](#)

Another read on the subject: [How to Select Debt Mutual Funds Suitable For Your Financial Goals? Opens in a new window](#)

Debt Mutual Funds: NAV Recovery after Credit Rating Downgrade

freefincal.com/debt-mutual-funds-nav-recovery-credit-rating-downgrade/

4/20/2016

In the last ten months, we have had three instances of credit rating downgrades in mutual fund portfolios. We had discussed these in some detail and also suggested ways to choose debt mutual funds with no credit risk and low volatility. In this post, let us look at how these funds have recovered and what we can learn about credit risk in debt mutual funds.

First some basics. A credit rating represents the perceived ability of a borrower to repay the principal and interest thereon. When the credit rating of a bond falls, its market value drops and it could become difficult to sell. Therefore the NAV of the fund that holds such bonds will fall. However, if the borrower is able to honor all payments, the NAV will recover. **Read more:** [Understanding Credit Rating Risk in Debt Mutual Funds](#).

Amtek Auto JP Morgan made two mistakes. It combined concentration risk with credit risk and had a huge (~15%) exposure to Amtek Auto which was an AA- bond to begin with. When the bond was downgraded to C, the NAV of JP Morgan Short Term Income Fund and JP Morgan India Treasury Fund fell by -3.38% and - 1.73% on Aug. 27.

Unable to find a seller for the downgraded bonds, the AMC decided to gate redemptions. Soon it came up with an innovative idea of dividing the NAV into a *good NAV* (all securities except Amtek) and a *bad NAV* (Amtek bonds) and was able to honor redemption requests and eventually sell most of Amtek bonds. Have a look at the NAV evolution of JP Morgan Short Term Income Fund.



Since then, SEBI has rejected the MF industries proposal to segregate band bonds like JP Morgan did as it would encourage excessive risk taking. A good move, in my opinion.

Also, JP Morgan is to sell its AMC business to Edelweiss. It is not clear what role the Amtek debacle played a role in this move, but it should have had an impact.

Jindal Steel and Power Ltd Franklin Templeton has been walking the wire for quite a while by taking on large amounts of low rates corporate bonds in several schemes. While the going was good, it was hailed for its 'research' and the 'competence' of its fund manager. There was only one way the party could end -badly.

On 16th Feb., JSPL bonds were downgraded. Open-ended funds of 7 Franklin funds and 10 FMPs of ICICI held these bonds and their NAV fell. See tweets by Manoj Nagpal [here](#).

Franklin Templeton probably fearing redemption pressure and not wanting to go through what JP Morgan swiftly found an unknown buyer a booked a capital loss by selling all JSPL securities ([announced on Mar 10th](#)).

On the other hand, ICICI did not have any redemption pressure since the funds were FMPs, held on to the JSPL bonds, in the hope that firm will honor payments and not default.

[Mint reported Opens in a new window](#) that Franklin has lost 512 Crore due to JSPL off-loading and said, "JSPL is going through some tough times because of external factors like Chinese slowdown and the failed auction of coal blocks. It did not default on any payments to Templeton. The sell-off, therefore, seems to be a panic reaction by Templeton,"

While, I am no fan of Franklins risk debt fund strategy, especially their Corporate Opportunities bond fund, I think Franklin was correct to swiftly get rid of the downgraded bonds.

They were able to quickly prevent mass redemption because of this. Take the case of Franklin Corporate Opportunities Bond Fund. It has an AUM of 7851.28 Crores on Jan 29 2016. As on Mar 31st, the AUM is 7050.53 Cr, which is remarkable! I think this is only because they could get rid of the JSPL.

Would they have sold it had only affected FMPs? Has their reputation taken a hit? We can only speculate.

Trailing Return



Monthly Return (%)



Franklin Corporate Bond Opportunity Fund NAV on the top and monthly returns at the bottom. Source: Value Research.

Notice how the NAV fell twice, once when the rating was downgraded and another when the bonds were sold. The monthly returns are plotted below and the negative returns stick out prominently. Notice that the return for March is reasonably good. So despite having booked the loss, the fund seems to have quickly bounced back. However, the damage done will not go away easily and further inflows will not be as robust as in the past. The fund has always had a stormy past and if that is not something you are comfortable with, stay away from it.

While Franklin was trying to find a buyer, ICICI held onto to those bonds. [JSPL has now paid 200 Crore of 500 Crores it owes ICICI](#)[Opens in a new window](#). That is, bonds which matured this month have been honored by JSPL. As a result, notice that how the NAV has bounced back for series 77 FMP.

Trailing Return



In spite of the rating downgrade (JPSP's was *D* for default because of delay in interest payment, which is when Franklin sold them), if a borrower is able to honor the bond, the NAV bounces back as shown above. However due to the time value of money, it will affect returns.

Did ICICI take a big risk in holding onto these bonds? Did it get lucky? Did Franklin sell in a panic? It is easy to ask these questions now. As mentioned above, what Franklin did is justified.

Sunil Jhaveri [advised Opens in a new window](#) mutual fund distributors to not panic and not create panic (that is how I came to know about the JSPL payment to ICICI). While I do not disagree with that, we will have to recognise that debt mutual funds are sold as alternatives to fixed deposits by highlighting tax benefits. Is the emphasis on associated risk as strong? Can debt funds or any product get sold if risks are highlighted?

While I agree that debt funds are more tax efficient, choice of fund category is crucial. One cannot get return without risk in a market linked product. For investors like me who like to isolate risk to equities and prefer stable fixed income, I would recommend liquid funds, ultra short-term funds, and short-term gilt funds. Or one can use arbitrage funds or equity-savings funds with short-term bonds.

Those who wish to chase after the risk premium available in corporate bonds must not complain when there are credit downgrades and associated unpleasantness.

Debt Mutual Funds: Credit Risk and Interest Rate Risk Can Co-exist!

 freefinancial.com/debt-mutual-funds-credit-risk-interest-rate-risk-can-co-exist/

12/21/2016

I would like to discuss the dangers of investing in debt mutual funds without understanding risks in the next few posts. There are two problems associated with putting all eggs in one basket and we only talk about one - the basket coming apart. The second and equally important problem is the search for the new basket when we realise the old one is going to (or has) given away.

If that search is done in haste (often is) by looking only at reward, it is like taking a leap from the frying pan into the fire. So many people want to invest in debt mutual funds *now*. Some because they want better returns than fixed deposits due to the policy rate slide and some want to bolt the barn door after the horse has bolted - profit from falling gov bond yield.

In this post, I will focus on the former group looking for an alternative to FDs and discuss other risks in a later post.

I love debt mutual funds and have written so many posts on them that I have a [separate category](#). Our new book, [You Can Be Rich Too With Goal-Based Investing](#) has a detailed section on understanding debt mutual funds for beginners - how to understand risks and how to choose them - *fast*.

It is a however, a huge subject and I have not even covered the tip of the iceberg. Hope to do that here.

There two types of risk associated with a debt fund. I have covered them in detail before:

[Understanding Interest Rate Risk in Debt Mutual Funds](#)

[Understanding Credit Rating Risk in Debt Mutual Funds](#)

With a follow-up: How to choose debt mutual funds with no credit risk and low volatility

Interest rate risk refers to how the NAV depends on actual RBI policy rate changes and the *expectation* of a change. When rates fall, the NAV increases because existing bonds in the market become valuable and vice-versa.

Credit risk refers to the perceived credit worthiness of a bond, both by the market and rating agencies. If bonds become more worthy, they become more valuable and vice-versa.

I would like to tackle a common misconception in this post: Some funds have credit risk and some funds have interest risk. That is, they do not co-exist.

Wrong!

If a debt fund holds only gilt (GOI) funds (regardless of duration), it will only be subject to interest risk ***All other debt funds will be subject to both credit risk and interest rate risk.***

Even corporate bonds funds, and especially corporate bond funds which holds bonds that mature in a few years will be subject to interest rate risk.

As an example, consider the NAV movement of Birla Sun Life Corporate Bond Fund.

This does not hold any govt bonds. The (weighted) average maturity is currently 4.77 years (VR).



As you know, govt bond yields started to drop post Nov 8th due to increased liquidity in the system and hopes of a rate cut. Read more: [Should I buy Long Term Gilt Mutual Funds?](#)

Notice how the Birle Corp. bond fund reacted to this change. When the RBI kept the policy rate unchanged, the yields increased again. To understand why, see: [The Rate Cut in Perspective](#).

In response to this, the fund's NAV dropped (faster than it rose). To reiterate, this is a corporate bond fund responding to interest expectations (and disappointments).

Many ultra-short term fund unit holders also felt these changes. However, since the average maturity of a ultra-short term fund is much lower than that of a corporate bond fund, the change would be much smaller.

Thumb rule: Higher the average maturity, higher the interest rate sensitivity (and higher the credit rating sensitivity).

Why do corporate bond react to govt bond yield changes?

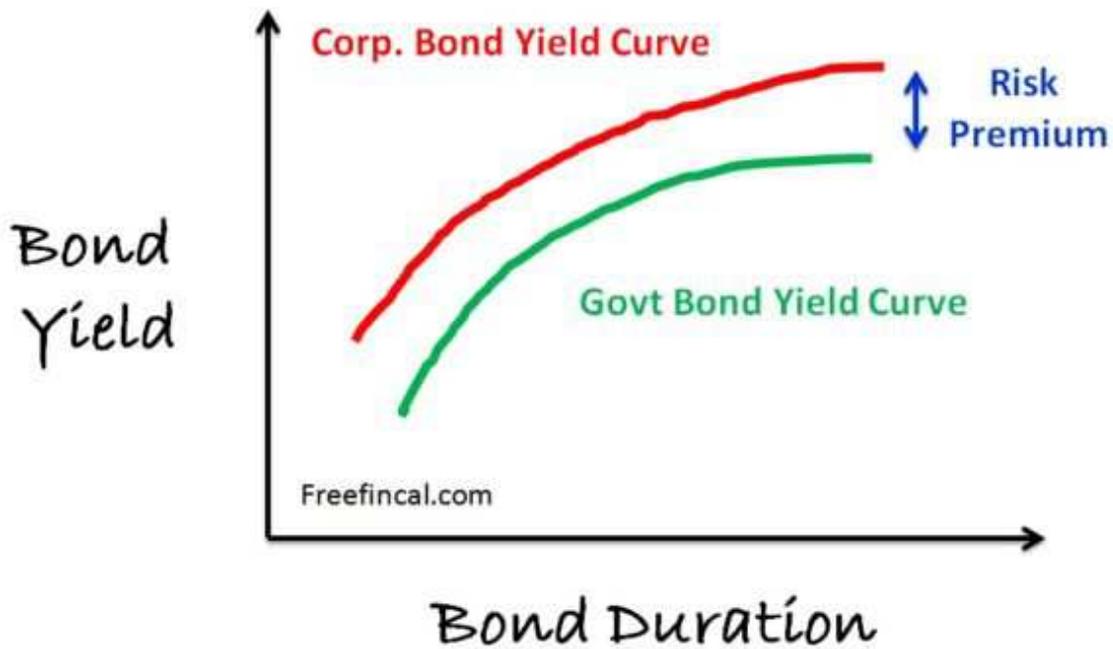
Short answer: Risk premium

Read more: [What is risk premium and why it is important](#)

Not so long answer: The yield of a bond (in simple terms) is the IRR or the equivalent of annualized return (taking into account interest payments). This yield changes with the duration of the bond.

Usually long-term bonds have a higher yield than short-term bonds, but situations like volatile exchange rates or a recession can reverse this.

When the yields are plotted against duration it is known as a **Yield Curve**. The picture below shows the yield curve of govt bonds and corporate bonds (of a particular rating, say AAA).



Corporate bond yields are higher because, they are not as credit worthy as the government. *Therefore*, they will have to offer a higher interest payout.

This is the premium that a corporate bond holder gets for the risk that she takes. The govt. bond yield curve responds to market forces and specific events. So imagine the green line moving up and down and changing shape.

When this happens, the red line closely follows this movement. As a result, the risk premium - the gap between the two curves changes with time.

Therefore, corporate bond mutual funds react to interest rate movements, simply because the risk premium itself is volatile. The risk premium is also known as credit spread.

Therefore: **Credit Risk and Interest Rate Risk Can Co-exist!**

Poor Debt Fund Advice: Match Investment Horizon With Fund Maturity Profile

 freefincal.com/poor-debt-fund-advice-match-investment-horizon-fund-maturity-profile/

12/23/2016

One advice about investing in debt mutual funds that never made any kind of sense to me is: "pick a debt mutual fund whose maturity profile matches your investment horizon". You will find this in many articles online and here is why I think it is plain wrong.

Say you wanted to invest in a fixed deposit or a recurring deposit. What investment duration would you choose? Obviously, you would want the FD or RD to mature just before you need the money. The same is true of individual bonds or even closed-ended debt funds like fixed maturity plans (more on FMPs later).

A debt mutual fund invests in bonds of different types and duration. Some trade the bonds before they mature and some hold them until maturity and some do both.

Higher the duration of the bond, the more volatile it is. The more susceptible it is to interest rate movements and credit downgrades or defaults.

Let us for simplicity consider an open-ended fund that holds bonds until maturity. Debt income funds and corporate bonds funds are examples of these.

The maturity profile of a debt fund is a list of all the bonds it holds and their maturity dates. This information is neither easy to access (not all fund factsheets include this, but morningstar has this), nor easy to process (50- 100 bonds or so).

So instead of a list, the **average portfolio maturity** is listed. This is a weighted average of bond maturities. A bond with more exposure will influence the average more. However, this hardly illuminating.

Take the case of Franklin India Corporate Bond Fund. It typically has an average maturity of about 3-Y years. However, *at any given point in time*, it can have bonds maturing a few months from now, to a few years from now (more of these).

So if I buy this fund today, because my investment tenure is say 4 years, the portfolio will have a basket of bonds maturing at different points in time - some next week (because they were purchased a long time back), some next month, next year etc.

So as they mature, the fund manager will add fresh bonds of different tenure.

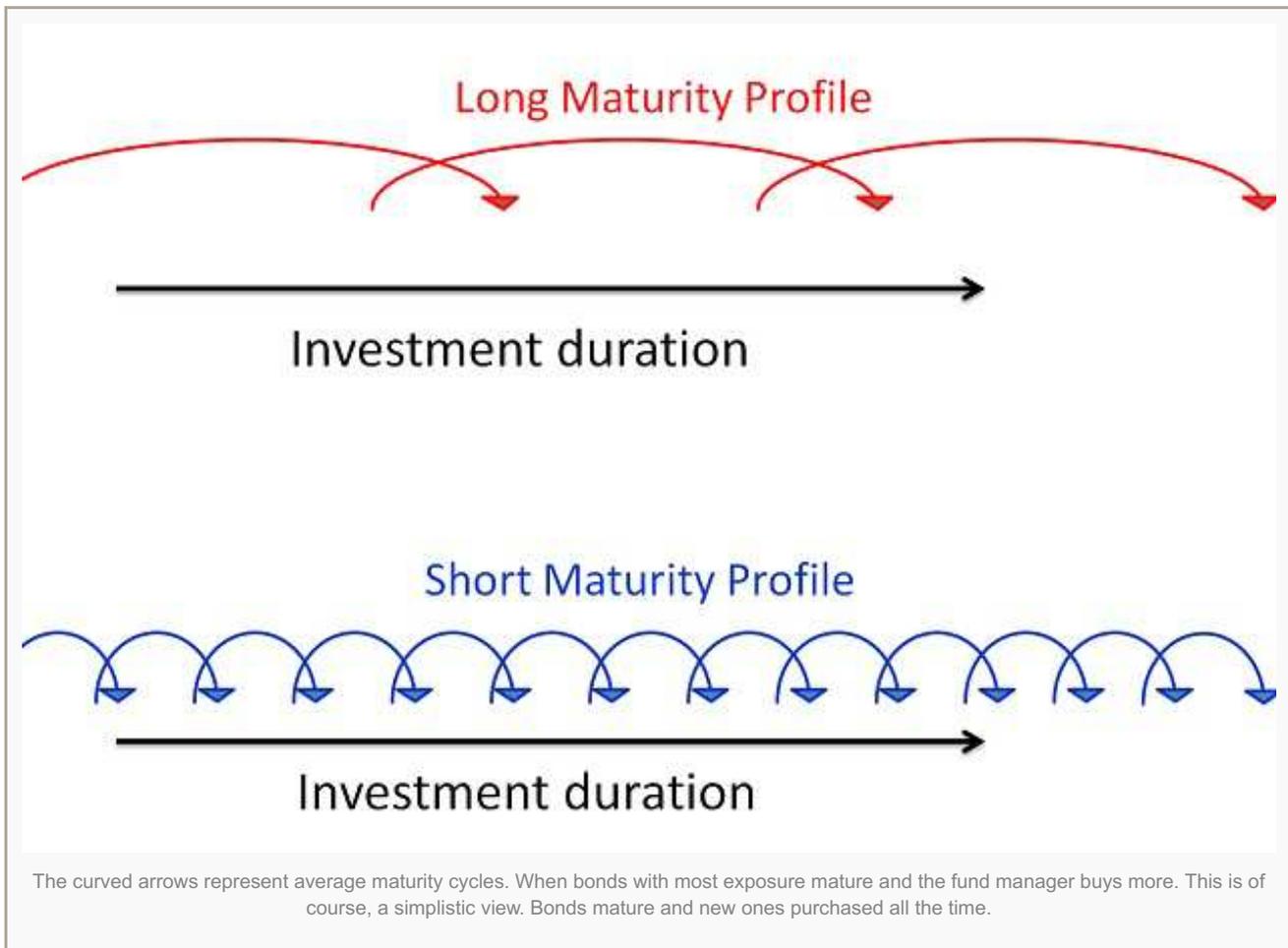
The key point to recognise is: at any point in time during the next four years, the average portfolio maturity is typically 3-4Y. So it always holds bonds of that ~ duration.

What has changed is my risk tolerance. When I started out, I could handle the volatility associated with 3-4Y Avg. maturity. However, as time progresses and my intended redemption date nears, I cannot and should not be exposed to bonds of that duration.

This is the simple reason why it is poor advice to match investment tenure with maturity profile of the bond.

Suppose I had chosen an ultra short-term fund with a maturity profile of 3-6 months for my goal of 4 years. At any point in time, the bonds in the fund will mature in a few months. The associated volatility is way lower. In this case, I can afford to hold the fund for 4 years - until I need money.

This crude depiction sums this up.



How about the reward? By choosing a fund with shorter maturity profile, will the reward be lower?

Well, the answer depends on your definition of reward. No great wealth is going to be built with debt funds (alone), certainly not much over four years. So I would consider peaceful sleep as my primary rewards. As for returns,

As for returns, it does not depend on duration alone. The quality of bonds held matter. A BB bond will offer higher returns than an AAA bond. Would you then choose a BB bond in the hope that the issuer will not default?

It is silly to assume one type of fund will always return more than the other. These are market linked products and can go either way.

If my goal is 20 years away, and I don't mind some volatility, Franklin Corporate Bond can be chosen. Is it a better choice than an ultra short term fund - I don't know.

To sum it up: Matching investment duration with maturity profile of a fund is simply flawed. It ignores risk and has a simplistic notion of reward.

What should investors new to debt funds do?

Stay away from any debt fund with an average maturity profile greater than one year.

Read more:

[Debt Mutual Funds: Risk vs. Reward](#)

How to choose debt mutual funds with no credit risk and low volatility

Debt Mutual Fund Returns: How to expect when you are expecting!

 freefincal.com/debt-mutual-fund-returns-how-to-expect-when-you-are-expecting/

8/29/2014

We choose a type of instrument almost solely based on the kind of returns that it can yield. Thus, our expectation is governed by past history. While there is nothing wrong with this, past returns can vary quite a bit, and depends on the period chosen for evaluation.

While it is a good idea to base expectations on past history, only must also understand and appreciate the **uncertainty** associated with the expectation. The uncertainty will depend on the type of instrument and the duration of intended investment.

Regular readers know that I am a fan of the standard deviation and would recall that it can be used to select [mutual fund categories suitable for financial goals](#).

The standard deviation listed by mutual fund portals like Value Research, Money Control, Morning Star etc. are typically based on monthly/weekly returns. While they can be used to represent the expected volatility associated with an instrument, they are not an accurate representation of the volatility or the uncertainty associated with past returns and *therefore* with future returns.

Why not,

- 1) consider past annual returns of an instrument,
- 2) calculate the arithmetic average (not CAGR which is the geometric average),
- 3) calculate the *associated* standard deviation of the annual return,
- 4) **Assume** the arithmetic average ~ the expected future return from the instrument, plus or minus the standard deviation.

An example might help:

Let us consider the annual returns of Kotak Liquid Fund (source Value Research online)

2004	2005	2006	2007	2008	2009	2010	2011	2012	2013
4.77%	5.53%	6.84%	8.00%	9.24%	5.45%	5.51%	8.98%	9.69%	9.25%

The arithmetic mean or average = 7.33%

The standard deviation is 1.91%

So if I wanted to invest in Kotak Liquid, I will expect a return of about 7% give or take 2% (1.91 is approximated to 2%)

That is I will expect a return from $7\% - 2\% = 5\%$ to $7\% + 2\% = 9\%$

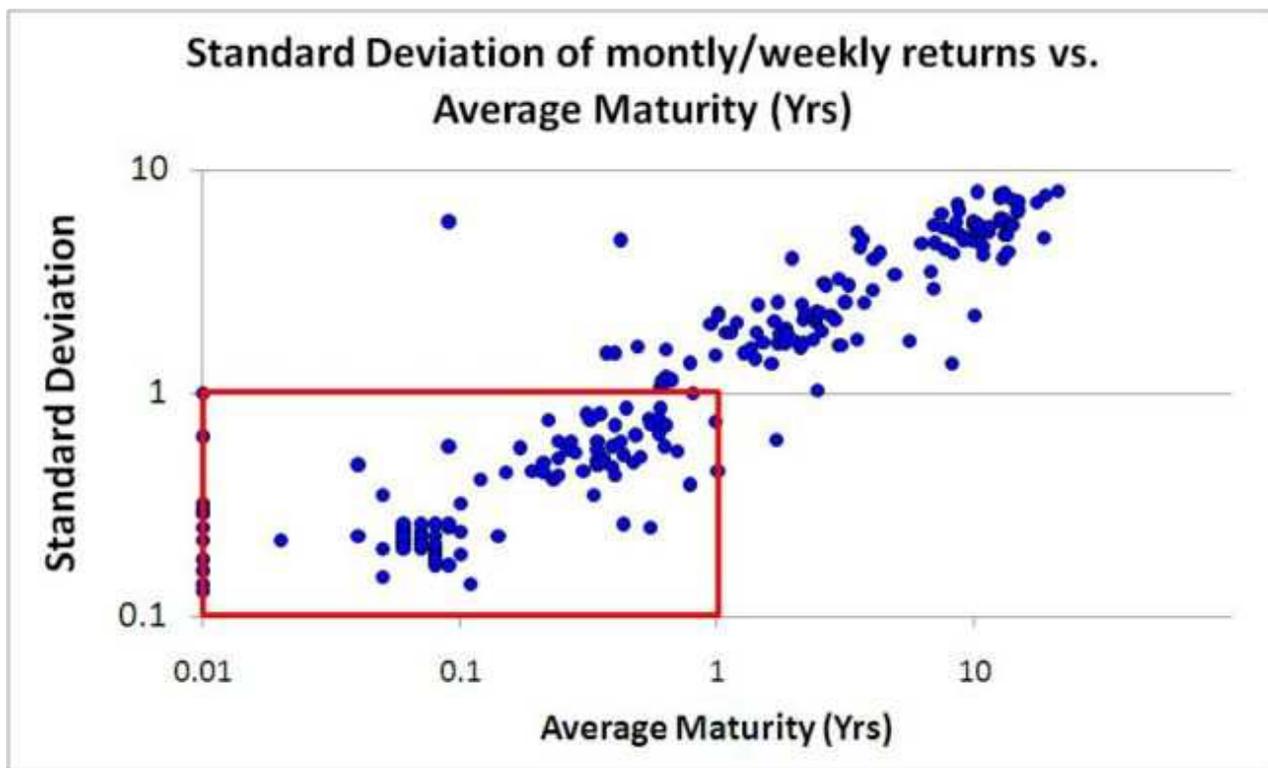
Calculating standard deviation this way, gives me a better idea of the range over which returns have fluctuated in the past. Although past performance may not repeat in the future, I have a foot hold with respect to expectations.

According to VR online, the fund has a standard deviation of 0.26%. Since this is calculated with monthly/weekly returns, it does not help me much since I am interested in annual returns.

The value of 0.26% when compared with corresponding data of other debt fund categories gives me an idea of *relative volatility*.

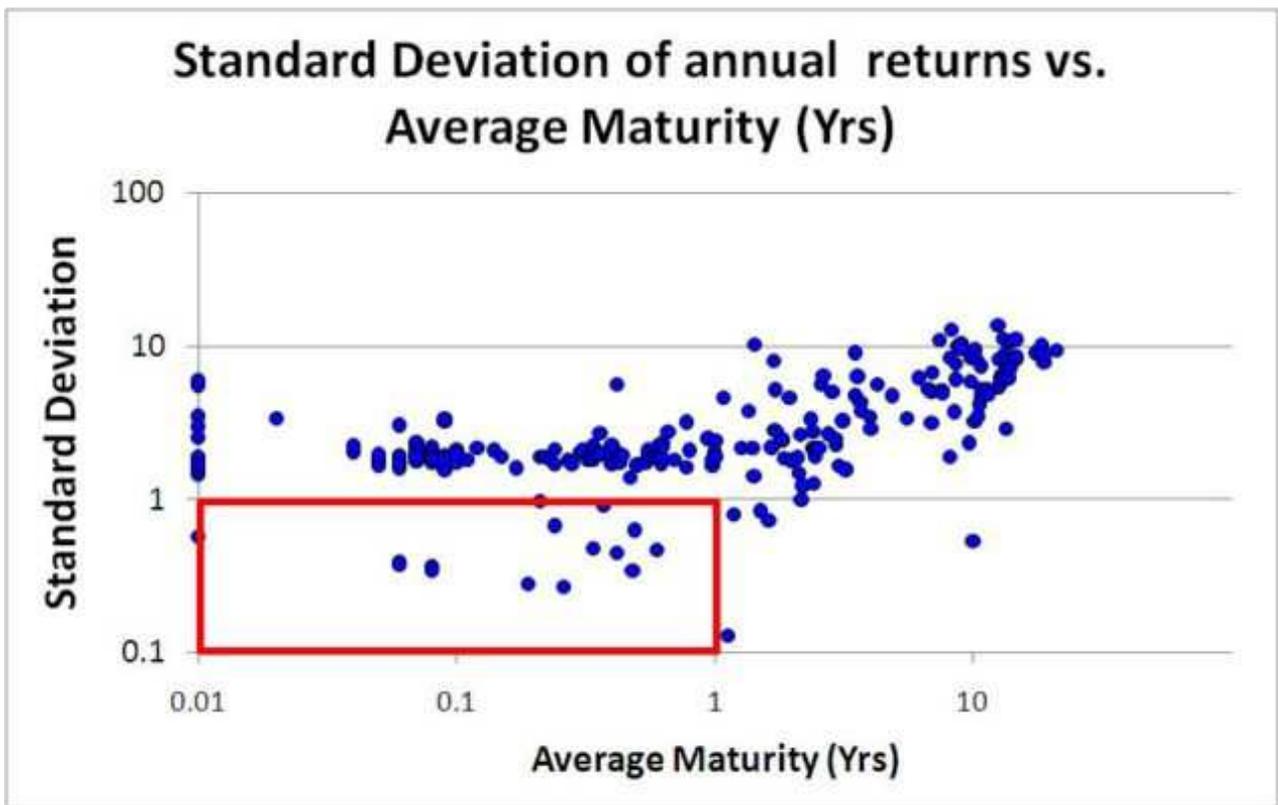
The value of 1.91% calculated with annual returns gives me an idea of *absolute volatility*.

This is how the standard deviation calculated with monthly/weekly returns evolves with respect to the average maturity of all debt fund portfolios.



Notice that region inside the red rectangle (< 1% standard deviation and < 1 year maturity) is heavily populated. These are liquid funds, ultra-short term funds, short-term income and gilt funds.

If the standard deviation of annual returns is used instead (below), notice that most of the points are outside the red rectangle.



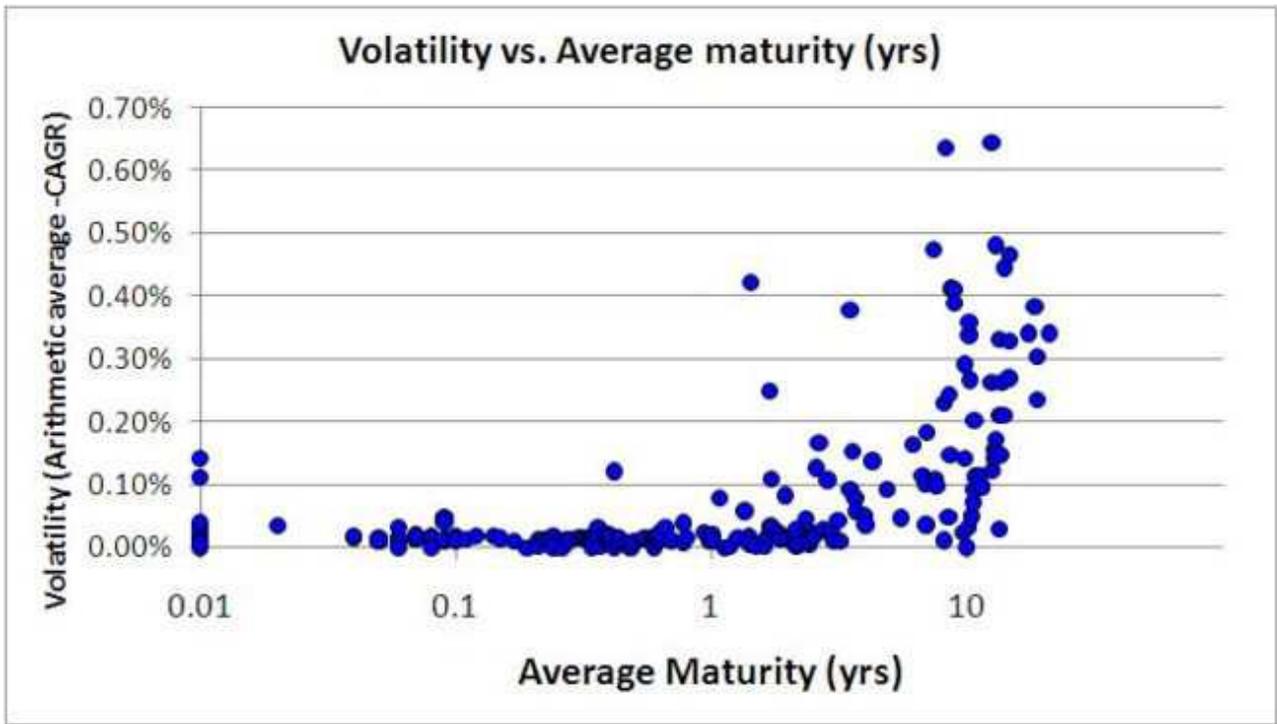
Thus, if we use the standard deviation of annual returns, we find that even liquid funds are quite volatile. That is their annual returns can vary by a significant amount.

Higher the average maturity, higher the standard deviation in both cases.

Amusingly the 10 year CAGR (geometric average) is **7.31%**. Not very different from the arithmetic average.

The difference between the two averages is another measure of *relative volatility*. The difference will be zero for a fixed deposit. Higher the difference, higher the volatility.

When the difference between the arithmetic average and the CAGR is plotted versus the average maturity in years of **all** debt fund portfolios, this is how it looks like.

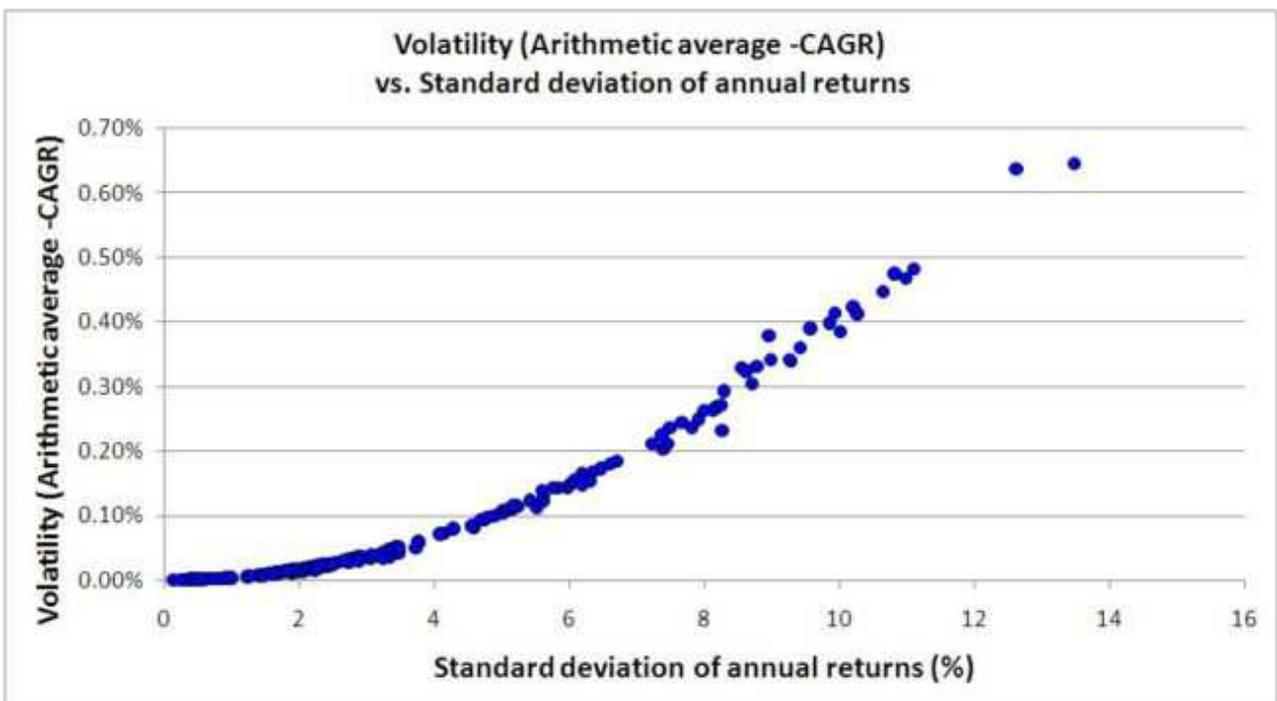


Notice that the difference between the arithmetic average and CAGR is negligibly small for average maturity periods less than 1 year. Beyond that duration, the difference rapidly increases. However, even for the longest maturity periods (long term gilt funds), the difference is less than 1%.

Therefore, the simpler arithmetic average of annual returns is a pretty good alternative for the CAGR and could be set as the average return one can expect from a debt mutual fund.

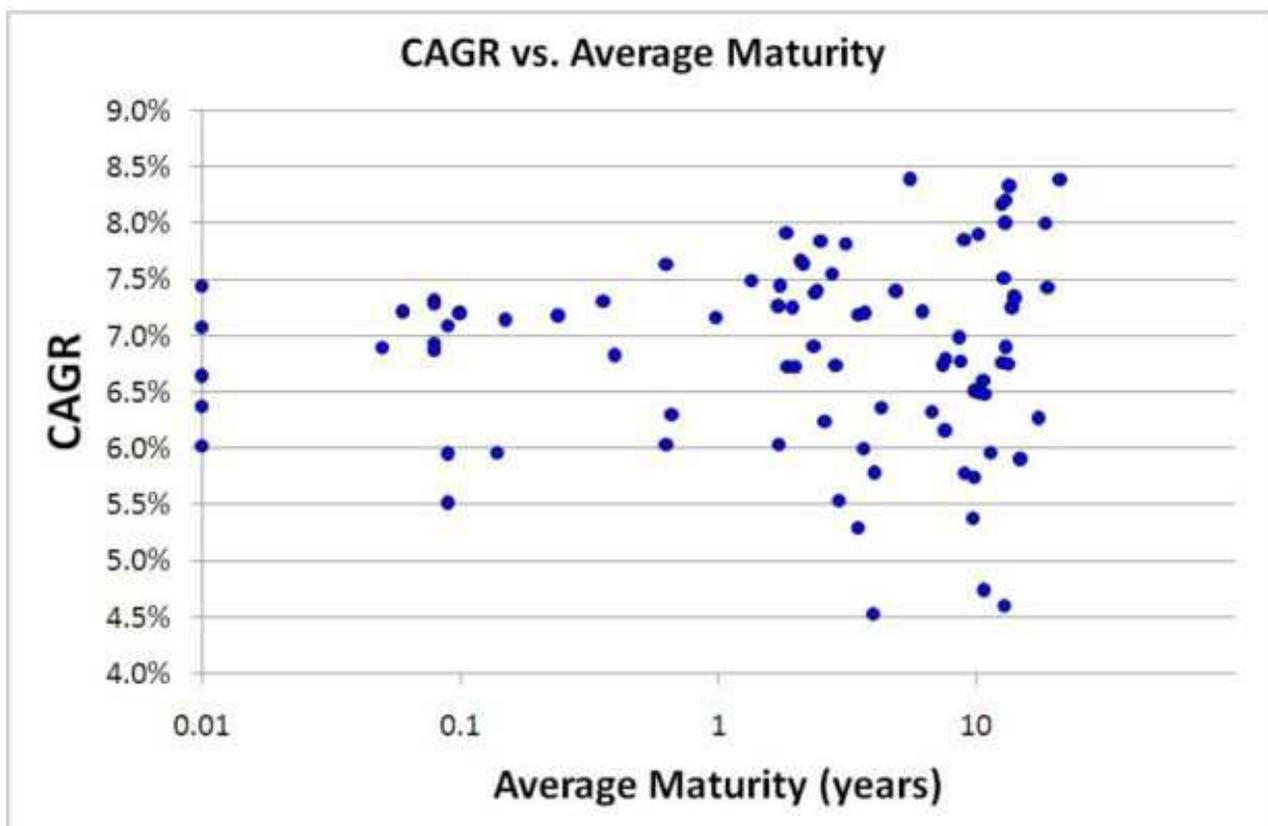
The same will not be true for equity funds due to their much high volatility. We will consider these in another post.

The relative volatility (difference between arithmetic mean and CAGR) shares an interesting relationship with the absolute volatility (standard deviation of the annual return).



Notice how smoothly the curve evolves for all debt mutual funds. The evolution is faster than a straight line. Thus, the difference between the arithmetic average of returns and CAGR becomes more prominent at higher standard deviations.

Finally, a look at the CAGR of all debt mutual funds 10 years or older. This would give us an idea while planning for goals.



That does not paint a pretty picture at all!. The *long-term* return of funds with high average maturity (eg. long-term gilt funds) is comparable to funds with low average maturity (eg. ultra-short funds, short-term funds or even liquid funds)!!

Thus, if one wishes to invest in funds with high average maturity, they should actively manage the fund. That is, they should shift gains (to equity, for example) when interest rates drop, or invest more when the interest rates rise. A 'buy and hold' strategy with such funds may not be beneficial.

Investing in debt mutual funds: slow and steady wins the race!

 freefincal.com/debt-mutual-funds-slow-and-steady-wins-the-race/

5/23/2015

"What debt mutual should I choose as part of a long-term portfolio?", is a question that I am often asked. EPF, PPF and NPS (with no equity or only 15% equity as for government employees) are the first choices when it comes to debt or fixed income products. This is good enough for many salaried folks far from retirement.

For people who are not part of EPF/NPS and do not like the lock-in period of PPF, debt mutual funds are a good choice. Even the salaried folk are likely to require a debt fund as they edge closer to retirement if they wish to change the equity:debt allocation.

How about those who are retired? What kind of debt mutual fund should they choose?

Although, there are several categories of debt mutual funds, the choice is simple for those who have a well defined goal and who understand the balance between risk and reward.

Fixed maturity plans can be used, but the lock-in (min 3 years these days) implies that it should be used with care.

People like me, who prefer open-ended mutual funds, can simply use ultra short-term funds or short-term income funds which buy and hold short-term corporate bonds until maturity (known as accrual-type funds).

The modified duration - a measure of how long the fund will take to recover from interest rate movements - will be low for these funds.

So would the average maturity period of the portfolio. These are low-risk, relatively high/reasonably high reward options with full liquidity and min exit load.

There is also a misconception that dynamic bond funds can play the interest game well, resulting in higher returns. There is no evidence of that in this, and in previous studies (more on this later).

Much of what is mentioned above is based on the previously published posts:

[Choosing Debt Mutual Funds For the Long Term Opens in a new window](#)

[Debt Mutual Fund Returns: How to expect when you are expecting! Opens in a new window](#)

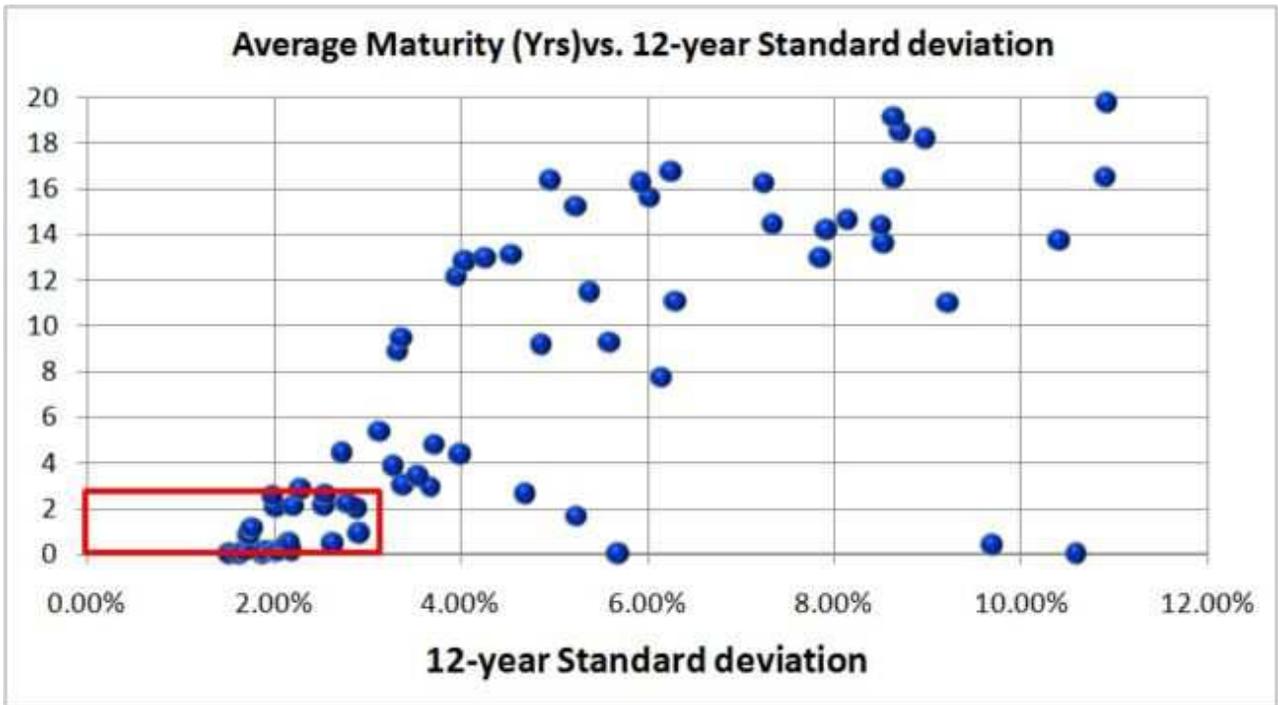
In this post, I would like to *reiterate* the above with an updated set of graphs based on 12-year annual returns data from value research.

Average portfolio maturity vs. standard deviation

The average maturity period of the portfolio tells us what kind of fund it is. Liquid funds mature in about 90 days or less. Long-term gilt funds in about 15-20 years!!

In terms of increasing maturity period (apr:

liquid funds < ultra-short term < short-term; income; short-term gilts < medium term and long-term gilts

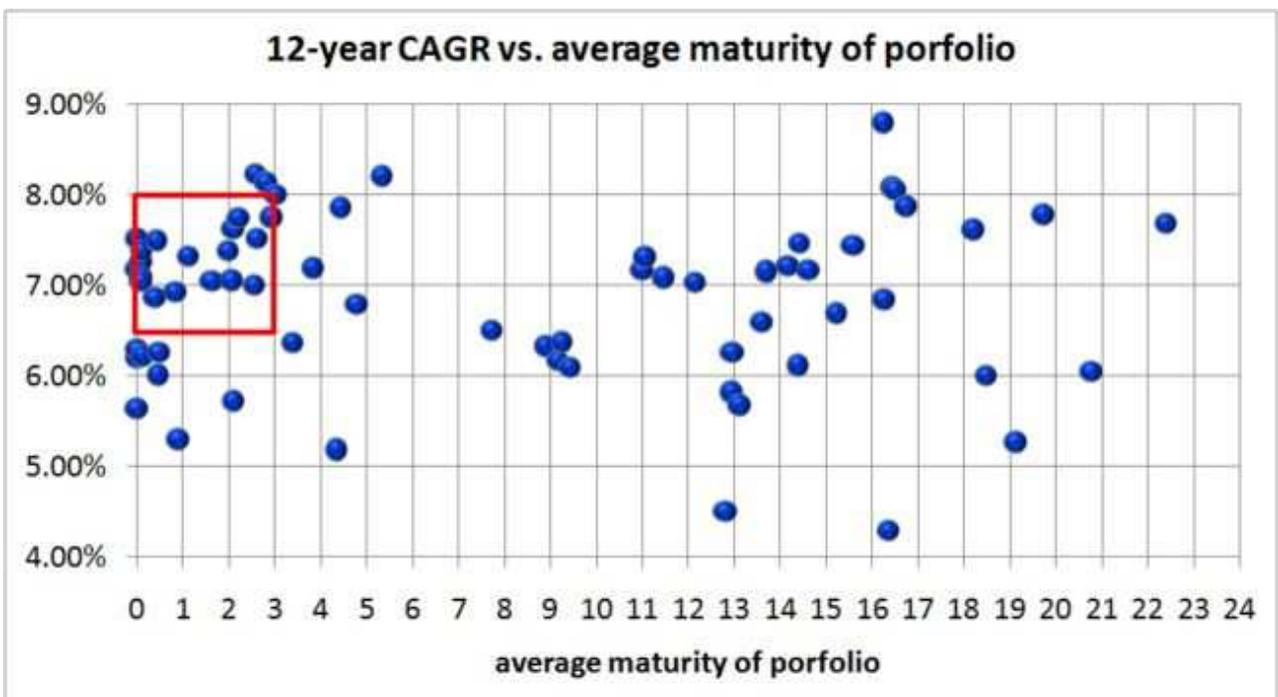


Notice that funds with low standard deviation (a measure of variation of the annual return from the average return) have low maturity periods.

Let us block funds with less than 3% standard deviation. This corresponds to a maturity period of 3Y or less.

The average maturity plotted above is the current number. We are assuming that it would not have deviated significantly in the past.

12-year CAGR vs. average portfolio maturity

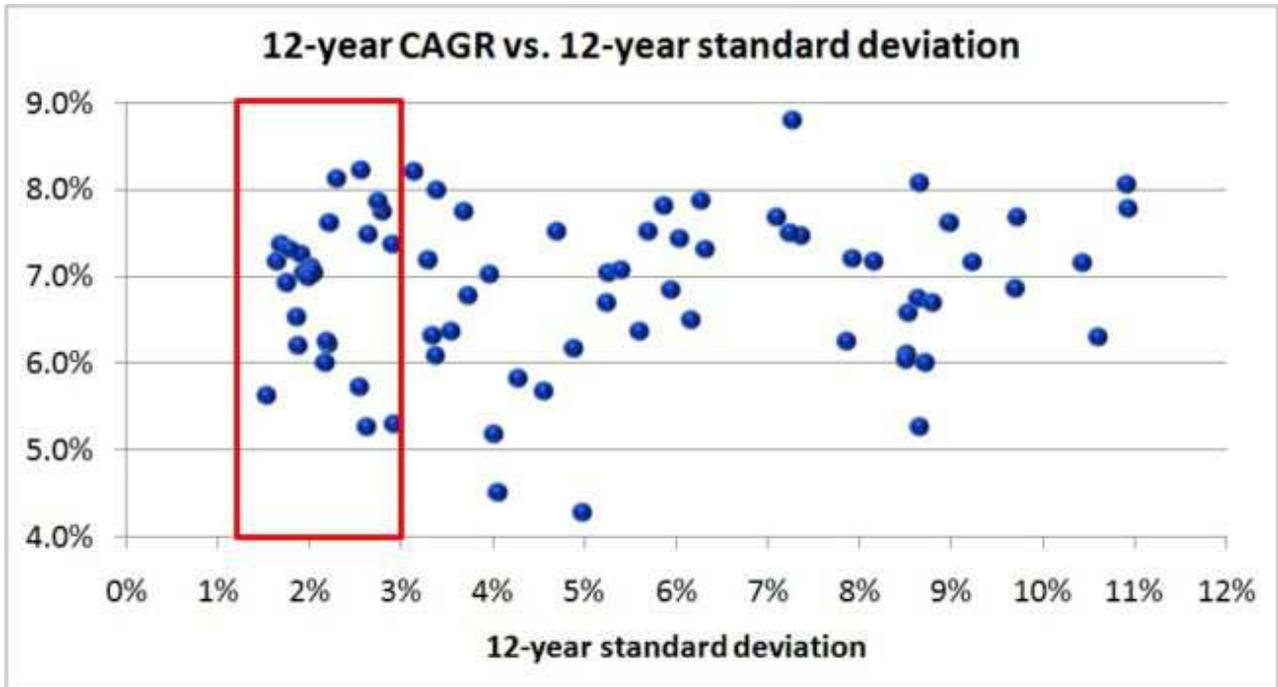


This graph never ceases to astonish me. If I had chosen a fund with low average folio maturity, I would have witnessed low fluctuations in my annual returns (1st plot), *but would have got a return comparable to other fund categories which are way more volatile*. So why bother. Why invest in 'flavour of the season' long-term gilts funds? They are going to pare the gains made last year and perhaps this year when the interest rate cycle turns.

Why not keep it simple with ultra short-term or short-term funds?

The red box in this graph corresponds to 3Y or lower maturity - same as the first graph

Risk vs. reward



The low-risk option would have got you as much as return as the high-risk option. It can be argued that the high-risk option is not suitable for buying and holding and only for tactical calls. Which makes them more riskier and stressful!

Those who recognise the importance of a minimalist portfolio - minimal in form, minimal in maintenance, will recognise the merits of investing in funds with low average portfolio maturity.

Ultra short-term funds or short-term income funds which buy and hold short-term corporate bonds until maturity (known as accrual-type funds) will get the job done slowly and steadily, will full liquidity.

Do's and Don'ts of Debt Mutual Fund Investing

freefinancial.com/dos-donts-debt-mutual-fund-investing/

2/19/2017

Here are some simple steps to avoid mess-ups when it comes to investing in debt mutual funds. Freefincal has 30+ posts on debt mutual funds. It is high-time that I compiled them into an e-book. I need to finish a couple of posts before I can do that. This is one of them.

If you are an absolute beginner, you can start here: [What is a Debt Mutual Fund?](#). The second part is here: [What To Look For When Buying A Debt Mutual Fund](#). All debt fund posts are listed [here](#).

This post is a summary of the basic precautions to take while investing in debt funds. Each of these points has been covered in detail before.

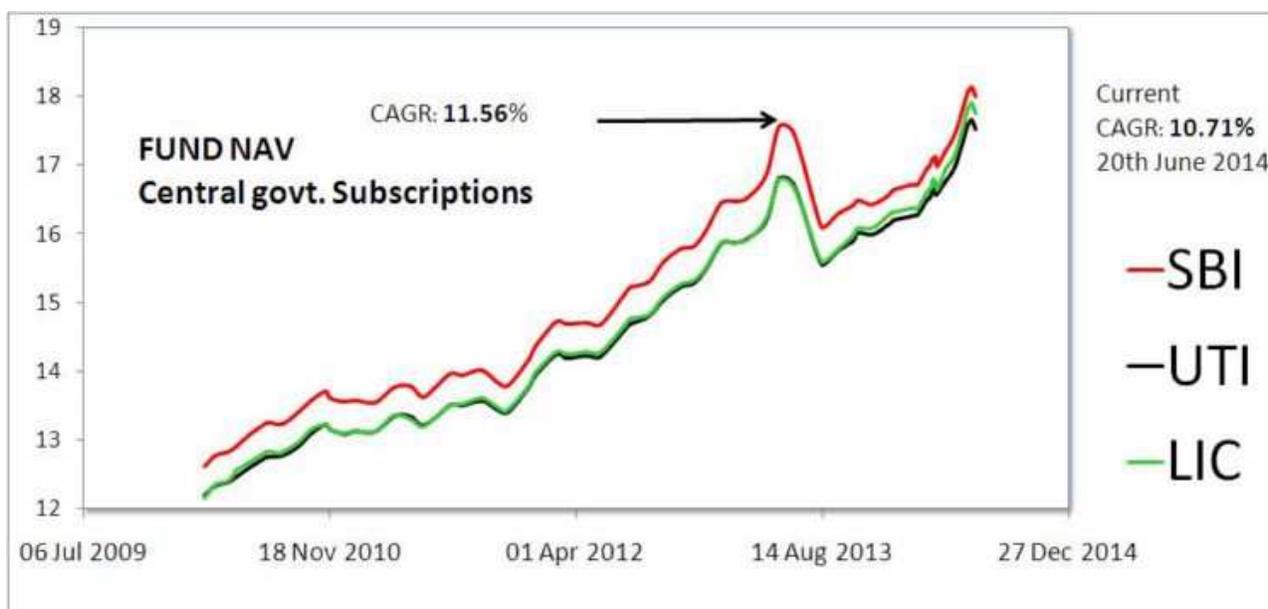
1 Do not assume debt funds will beat fixed deposits

This is how debt funds are sold. That does not make it true. A debt fund is a market-linked product and unless you know how to categorise them in terms of risk, you should not be investing in them or in any product for that matter.

There are times when debt fund returns will be more than a fixed deposits and times when it will be less. See the [rolling returns study](#) to see this for yourself.

2 Do not take past performance seriously

This is more true for debt funds than for equity funds! Just a few months ago, so many people thought they could invest in liquid funds and get 9% return! How many of them knew this was because of the propelled because of bonds crash in July 2013? (Yes, bonds can crash like stocks!) Check out how long it took for my NPS to recover.



In a healthy economy (something absent from close to 10Y now), the short-term rates would be lower than long-term rates. So if your liquid funds give you good returns, you should pray that the party ends soon!

3 Do not choose funds by returns or ratings!

A consistent outperformer in the debt fund space does not make it a good buy! It is crucial to understand what [risk premium](#) stands for. A debt fund giving more returns than other in a category could only mean one thing: *it is taking on more risk*. This risk could be associated with interest rate movements or it could be buying bonds of lower credit quality.

There is nothing wrong with the fund manager taking on more risk. Question is, were you aware of what this means *before you purchased the fund*.

[Debt Mutual Funds: Credit Risk and Interest Rate Risk Can Co-exist!](#)

4 Not for Lazy People

Debt mutual funds are suitable only for those who can spend 15 minutes of their busy lifestyle to read the scheme information document.

5a (Try to!) Buy Style-pure funds

Style purity refers to a fund which sticks to clear investment style. I like funds that will only invest in X,Y,Z type of bonds or will not invest in X,Y,Z bonds. Of course one will know this only if one bothers to read the scheme information document. This is not easy, hence the "try to".

5b Debt fund "categories" is a joke!

As I will show in the next post, debt fund categories is a joke. Each can be very different within the same category. So once you decide the category to invest in, make a short list, study each scheme document and pick a style pure fund.

6 Most advice in the debt fund space is plain crappy.

Here are some don'ts:

[Poor Debt Fund Advice: Match Investment Horizon With Fund Maturity Profile](#)

[Do not invest in dynamic bond funds!](#)

My posts belong in this space too. So do your diligence.

7 Buy debt funds only if you need them

Ignore all calls from the mutual fund industry to make your money work harder (for them!). Use debt funds only if you need them. That extra 1% return over a few months or even a few years will not make you a rich person. Use FDs, RDs and focus your energy on long-term goals, other hobbies and some peaceful sleep. Even for a long-term goal like retirement, there are other alternatives like PPF or EPF/VPF.

What should a new debt fund investor do

a: stick to liquid funds for requirements ranging up to a year or so.

b: above that, stick to ultra short-term funds that invest in banks and PSU bonds.

Debt Mutual Fund Selection Guides

[How and When To Select Ultra Short Term Debt Mutual Funds](#)

[Smart Ways to Invest in Corporate Fixed Deposits](#)

[How to Select Mutual Fund Fixed Maturity Plans \(FMP\)](#)

[Should I buy Long Term Gilt Mutual Funds?](#)

[How to choose debt mutual funds with no credit risk and low volatility](#)

Ask Questions with this form

And I will respond to them next week. I welcome tough questions. Please do not ask for investment advice. Before asking, please search the site if the issue has already been discussed. Thank you.

How to choose debt mutual funds with no credit risk and low volatility

freefincal.com/choose-debt-mutual-funds-no-credit-risk-low-volatility/

3/13/2016

A method to choose debt mutual funds with no credit rating risk and low volatility or interest rate risk from a category known as **short-term gilt funds** - is discussed. This is post is a follow up to [Debt Mutual Fund Investments: Minimizing Risk](#) which referenced the fall in NAV of several Franklin Funds due to the downgrade and subsequent default and off-loading of JSPL bonds. Even before the dust settled on that, another bond held by many Franklin fund was downgraded by [brickworthratingsOpens in a new window](#)



Manoj Nagpal @NagpalManoj · 13h

NAV impact on Franklin Debt Funds today
OPJ Trading downgrade has marginal impact on NAV



NAV Impact on Franklin Templeton Debt Funds 11th March 2016

OUTLOOK ASIA CAPITAL

Fund	% Fall in NAV	
	1 Day Fall	2 Day Fall
Franklin India ST Income	-0.06%	-0.52%
Franklin India Income Opportunities	-0.10%	-0.58%
Franklin India Corporate Bond Opps	-0.07%	-0.39%
Franklin India Inc Builder	-0.04%	-0.37%
Franklin India Dynamic Accrual	-0.07%	-0.31%
Franklin India Low Duration	0.02%	-0.08%



Manoj Nagpal @NagpalManoj · 16h

Holdings in Franklin Templeton MF of OPJ Trading
OPJ Trading downgraded to BB+ by Brickworks
NAV impact low



OPJ Trading as % of NAV as on 29th Feb 2016

Source: OUTLOOK ASIA CAPITAL

Fund	% Holding in OPJ	Expsoure to OPJ (Rs.cr)
Total OPJ Trading in Franklin Templeton MF		552
Franklin India ST Income	2.22%	198
Franklin India Income Opportunities	3.20%	111
Franklin India Corporate Bond Opps	2.46%	182
Franklin India Inc Builder	1.67%	23
Franklin India Dynamic Accrual	2.53%	39

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Thanks again to Manoj Nagpal prompt and succinct tweets. [Mint reports](#) that Franklin has lost 512 Crore due to JSPL off-loading. From the report

“JSPL is going through some tough times because of external factors like Chinese slowdown and the failed auction of coal blocks. It did not default on any payments to Templeton. The sell-off, therefore, seems to be a panic reaction by Templeton,”

Note that FMPs are not free from credit risk too. A few ICICI FMPs have JSPL bonds.

If such falls in NAV (which will impact returns) are not acceptable to you, then what is the alternative?

I usually recommend liquid funds and ultra short-term funds. However ultra short-term funds are not free from credit risk.

Short-term gilts could well be an alternative. I learnt to take this category seriously thanks to one my earliest and oldest (~87) readers, Mr. Raghu Ramamurthy. He is the inspiration behind this post [Comparison: Short-term gilt vs. long-term gilt vs. Ultra short-term mutual funds](#)

Before we explore this category, let us establish some ground rules

1. **Zero credit rating risk.** That is, no risk of default. The only way to do this is to invest in government bonds.
2. **Minimal interest rate risk.** Government bonds when purchased individually are free from both credit and interest rate risks. However, in debt mutual funds, all the bonds will be marked to market. That is, each day, the NAV will reflect their current value. This value will change with interest rate changes. When the interest rate fall, current bonds will become more valuable and the NAV will increase and viceversa when the rates fall.
 - Longer the duration of the bond, the more volatile the price movement.
 - Therefore to minimise interest fluctuations, the bond duration should be short. Hence short-term gilt funds. However, choosing one requires some care. Hence this post.
3. The investment strategy of the chosen short-term gilt fund should be clear. In particular, the maximum duration of bonds allowed in the portfolio should be spelt out clearly in the scheme information document.
 - Lower the maximum duration allowed, lower the average maturity of bonds in the portfolio and lower the modified duration (measure of sensitivity to interest changes measured in years!)
 - When interest rates rise, the NAV of such fund will fall. However, the quantum of such a fall will typically be lower than long-term gilt funds and the time needed to recover will also be significantly shorter (days to weeks rather than months for long-term bonds). This too is measured by modified duration.

With these ground rules, let us head over to Value Research.

Debt: Gilt Short Term		Compare funds in My Portfolio		Fine tune the fund selection			
Categories: Debt: Gilt Short Term							
Exclusions: Plans Suspended for Sales Direct Plans Closed-end							
Snapshot	Returns	Portfolio	Risk Stats	NAV Details	Fees & Details		
Download Data							
Fund Rating	Equity Fund Style	Market Cap (Cr)	Turnover (%)	Bond Fund Style	Average Credit Quality	Average Maturity (Yrs)	Net Assets (Cr)
UTI G-Sec Fund - Short Term Plan ★★★	-	-	-	GOI/Cash	GOI/Cash	0.241	23
DSP BlackRock Treasury Bill Fund ★★	-	-	-	GOI/Cash	GOI/Cash	0.33	20
ICICI Prudential Gilt Fund - Treasury Plan - PF Option ★	-	-	-	GOI/Cash	GOI/Cash	0.417	44
SBI Magnum Gilt Fund - Short Term Plan ★★★★★	-	-	-	GOI/Cash	GOI/Cash	2.94	135
IDFC Government Securities Fund - Short Term Plan - Regular Plan ★★★★★	-	-	-	GOI/Cash	GOI/Cash	2.97	51
Tata Gilt Short Maturity Fund - Regular Plan ★★	-	-	-	GOI/Cash	GOI/Cash	4.19	33
HDFC Gilt Fund - Short Term Plan ★★★	-	-	-	GOI/Cash	GOI/Cash	4.67	331
ICICI Prudential Short Term Fund - Gilt Plan ★★	-	-	-	GOI/Cash	GOI/Cash	6.721	209

First, please allow me to sing my usual tune: [why you should ignore mutual fund star ratings](#)

This category has only 8 distinct funds, 16 if you count the direct plan options. Too small to justify the use of a bell curve to assign star ratings.

Now look at the average maturity of bonds in the folio. They range from 0.24 years to 6.7 years. The biggest flaw in star ratings is to relatively grade dissimilar objects like here.

Incidentally, the direct plan option of many funds now have a higher star rating than regular plan options due to higher returns. This is a significant publically visible manifestation of outperformance. If want help choosing mutual funds, [Pay for Financial Advice, But Insist on Direct Mutual Fund Plans](#) .

Only the fund marked in green will satisfy the low interest rate risk we desire. The ones marked in orange will have intermediate interest rate risk and the other high risk. In fact, in the medium and long -term category, one can find funds with less than 6 years average maturity.

If you like those three funds, the next step is to understand the investment strategy.

UTI G-sec Fund

Extract from the [AMC site](#) [Opens in a new window](#)

1. The UTI G-Sec Fund endeavors to offer stable and regular returns along with a decent capital appreciation over a period of time for those investors who invest with a long term horizon.
2. The fund does not invest in state government securities and generally has a low portfolio churn.
3. The UTI G-Sec STP aims at low volatility of returns by investing in short term gilts.
4. The maximum average maturity of the portfolio is capped at 3 years.

That is a clear, easy to understand mandate. However, if some bonds have an average maturity of 3 years, then the interest rate sensitivity will be a bit high. This fund is in general suitable for long-term (well above 3) goals. Its *current* average maturity and modified duration are however quite small.

ICICI Prudential Gilt Fund - Treasury Plan

"The scheme aims to generate income through investments in central and state government securities of various maturities. Provident Funds, Pension Funds, Superannuation Funds, Gratuity Funds and such other entities are eligible to make investments in the fund. The scheme seeks to generate steady and consistent return from a basket of government securities across various maturities through proactive fund management aimed at controlling Interest rate risk. The investment plan will invest in gilt including T-Bills with medium to long maturity, with average maturity of the portfolio normally not exceeding 8 years".

This is an extract from VR as the [ICICI fund page](#) opens in a new window and the SID is not as clear.

As far as ICICI MF is concerned, short-term is less than 8 years. This again is technically unsuitable for our needs, but perhaps can be used very long-term goals. However as above, its *current* average maturity and modified duration are however quite small.

DSP BlackRock Treasury Bill Fund

This is the only fund left in the green rectangle.

"An Open ended Money Market Mutual Fund Scheme in Income Category seeking to generate income through investment in a portfolio comprising of Treasury Bills and other Central Government Securities with a residual maturity less than or equal to 1 year."

Says the [DSP BR fund page](#) opens in a new window. Now, this I like. Such a fund can be used for any duration from say, 2-3 years and above.

While any of the three funds mentioned satisfy our requirements of low-interest rate risk, the spread in such risk is still high. It is important to recognise this before choose one such fund.

Other funds in this category can also be considered for long-term goals but will react more to interest rate movements.

Funds in this category do not have large AUMs perhaps because not many people are aware of this.

Note: No credit risk and low rate risk does not mean steady returns. The bonds yields will fluctuate according to market demands, in addition to rate changes. Returns are likely to be steady rather than spectacular.

How to Choose a Liquid Mutual Fund

 freefincal.com/how-to-choose-a-liquid-mutual-fund/

4/19/2015

Here are step-by-step instructions for choosing a liquid mutual fund. This post is inspired from a comment by Firoz Hajjani. I think the following steps might help the reader become familiar with some of the aspects that govern debt fund selection.

The first question to answer is,

Why choose a liquid fund?

Many 'experts' suggest that liquid funds as an alternative to a savings bank account for 'idle money'. In my opinion, this is half-baked advice that can be misconstrued.

If someone has money idling then they must be urged to holistically look at the way they manage money and not offer liquid funds as a piece-meal solution.

There are others who suggest that liquid funds be used for emergencies. Sure, a part of the emergency corpus can be stashed in a liquid fund, but not all of it. Liquid funds are not as liquid as they are made out to be. Redemptions can take up to 2 days. Those with ATM cards tagged to them have withdrawal limits.

Then there are others who use liquid funds for tactical asset allocation. When the market is overvalued (how that is measured in the first place, is another matter), they keep cash in a liquid fund and switch to equity funds when the time is 'right'.

Very few use it for short-term goals. Which is a good idea even if there is no tax benefit compared to FD or RDs for less than 3 year periods.

Many from the above groups worry about liquid fund returns. Some say, one can expect 9% from liquid funds, basing their opinions purely on recent returns.

Whatever be the reason for choosing a liquid fund, high returns should not be one of them. Over the past 12 years, annual returns of HDFC liquid has an average of about 7% and individual returns have varied by as much as 2% from the average. That is from about 5% to 9%. Therefore, it is tough to expect any fixed return, high or low, from liquid funds. All you can say is that they are likely to do better than the 4% bank accounts.

You choose a liquid fund for peace of mind. The capital protection is the highest among all volatile asset classes. The NAV can decrease like it did on July 13th 2013, when short-term rates were hiked by 2% overnight. However, since the bonds have short maturity periods (4-91 days), the interest rate sensitivity (as measured by modified duration) is small and the recovery (from fallen NAV) will only take a few days.

Typically, credit quality (as measured by CRISIL bond ratings) is not a problem as most of the bonds are rated AA or above.

So one can, in general, state that most liquid funds are 'safe' to choose. However, it pays to pay a little more attention to detail.

So here are the steps that I would follow while choosing a liquid fund.

Note: This process should take about 15 minutes, once you are familiar with VR fund selector format.

How to choose a liquid fund

- Go to Value Research online. Scroll down to the bottom of the page. You will see **Fund Selector** under research tools right in the middle of the page.

The screenshot shows the Value Research online website interface. At the top, there is a search bar with the text "Search for funds, stocks or anything else" and a "SEARCH" button. Below the search bar, there are three main sections: "Fund Compare", "Fund Selector", and "Point-to-Point Returns".

Fund Compare: This section is titled "Trying to choose the best among a set of funds? Make a detailed comparison here." It lists several funds: Axis Banking Debt Fund, Axis Constant Maturity 10 Year Fund, Axis Dynamic Bond Fund, Axis Enhanced Arbitrage Fund - Regular Plan, Axis Equity Fund, and Axis Fixed Income Opportunities Fund - Regular Plan. There are "Add" and "Remove" buttons for each fund, and a "Get Data" button at the bottom.

Fund Selector: This section is titled "Select funds based on fund house and category." It has three dropdown menus: "Fund House" (Search by Fund House), "Fund Category" (Search by Fund Category), and "Exclude" (Exclude). There is a "Get Data" button below these menus. Below the dropdowns, there is a "Popular Searches:" section with a list of search criteria: Top Rated Diversified Equity Funds, Top Rated Aggressive Growth Funds, Top Rated Tax Saving Funds, and Top Rated Monthly Income Plans.

Point-to-Point Returns: This section is titled "Rank funds by their returns over any period." It has two date input fields: "Start Date" (Apr 19, 2014) and "End Date" (Apr 18, 2015). It also has three dropdown menus: "Fund House" (Search by Fund House), "Fund Category" (Search by Fund Category), and "Exclude" (Exclude). There is a "Get Data" button below these menus. Below the dropdowns, there is a list of search criteria: Equity funds excluding sector Funds and Fixed income funds excluding FMPs.

- If you scroll down the exclude list, you will notice that direct plans are automatically checked! Along with it, so are funds which are *unrated*, *suspended plans*, *closed-ended*, *1 star*, *2 star* *3 star funds* (VR takes its star ratings too seriously!). Uncheck 1,2,3 star and unrated funds. We will exclude direct plans as they will mess up the table.

This is a close-up screenshot of the "Fund Selector" tool. The title "Fund Selector" is at the top, followed by the instruction "Select funds based on fund house and category." Below this, there are three dropdown menus: "Fund House" (Search by Fund House), "Fund Category" (Search by Fund Category), and "Exclude" (Exclude). The "Exclude" dropdown is open, showing a list of search criteria with checkboxes:

- 4-Star Funds
- 3-Star Funds
- 2-Star Funds
- 1-Star Funds
- Not Rated

Below the dropdown, there is a "Popular Search" section with a list of search criteria: Top Rated D, Top Rated A, Top Rated T, and Top Rated Monthly Income Plans.

Uncheck these arrows

- Under fund category, uncheck *all equity funds*, and select *Debt:liquid* and click *Get Data*.

Fund Selector

Select funds based on fund house and category.

Fund House: Search by Fund House

Fund Category: Search by Fund Category

Exclude:

- Debt: Income
- Debt: Liquid
- Debt: Others
- Debt: Short Term
- Debt: Ultra Short Term

Popular Search

- Top Rated D
- Top Rated Aggressive Growth Funds
- Top Rated Tax Saving Funds
- Top Rated Monthly Income Plans

- The selection should look like this

Debt: Liquid Fine tune your fund selection

Categories: Debt: Liquid

Exclusions: Plans Suspended for Sales, Direct Plans, Closed-end

Download Data

Fund	Rating	Category	Launch	Expense Ratio (%)	1-Year Return (%)	1-Year Rank	Net Assets (Cr)
PDF Axis Liquid Fund - Institutional Plan Invest Online	★★★★	DT-LIQ	Mar-2010	0.14	8.96	62/156	4,459
PDF Baroda Pioneer Liquid Fund	★★★	DT-LIQ	Feb-2009	0.34	8.93	79/156	1,814
PDF Birla Sun Life Cash Plus	★★★★	DT-LIQ	Mar-2004	0.30	8.98	50/156	14,289

- Click on portfolio to get this screen.

Debt: Liquid		Fine tune your fund selection					
Categories: Debt: Liquid							
Exclusions: Plans Suspended for Sales Direct Plans Closed-end							
Snapshot	Returns	Portfolio	Risk Stats	NAV Details	Fees & Details		
Download Data							
Fund Rating	Equity Fund Style	Market Cap (Cr)	Turnover (%)	Bond Fund Style	Average Credit Quality	Average Maturity (Yrs)	Net Assets (Cr)
Reliance Liquid Fund - Treasury Plan - Institutional Plan ★★★	-	-	-	■	AA	0.205	10,674
Reliance Liquidity Fund ★★★	-	-	-	■	AA	0.205	3,327
Kotak Floater Short Term Regular Plan ★★★	-	-	-	■	AA	0.2	2,415

- Click on Average maturity years once to arrange in ascending order and again to arrange in descending order. Note that the shortest period is 0.003 years (which is about 1 day!). Such funds simply hold cash. The longest period is 0.205 years or about 74 days. So the average maturity is not a factor while selecting *from this list*.
- Similarly the average credit quality ranges from AA to cash. You obviously don't want funds that simply hold cash as that will impact returns. You don't want your liquid fund to be *that liquid!*
- If you click on bond fund style, you will notice that all of the funds, save two, have a style which looks like this.

High credit quality (irrespective of what the average credit quality is) and low interest rate sensitivity. There are two funds with medium credit quality. You don't want those.

The first step in any selection process is to make a short-list.

When it comes to liquid funds, I will create a list of funds with

- average credit quality: AAA (interest rate sensitivity is by default low here)
- Risk grade according to VR: low, below average or average.

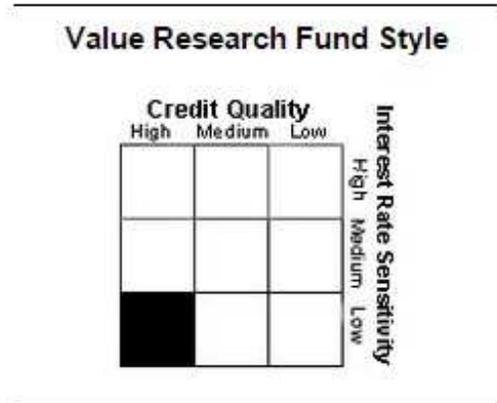
This wont exactly be a short list but I can filter it out with my AMC biases.

I like Quantum, ICICI, HDFC, Franklin, Axis etc. That is anywhere, I can invest in with ease.

Note that some AMCs which have a strong equity team may not have a debt or in this case liquid fund management team. Vice-versa is also true. Eg. Escorts AMC.

Speaking of which, Escorts liquid fund is a consistent performer but it buys short-term corporate paper and it is (at least was) a pain to invest in it.

The AMC bias will make any list short! Then one will have to look at the portfolio. I prefer a fund which invests in PSU+ bank bonds instead of corporate bonds. This is my own bias. For extremely short duration as in this case,



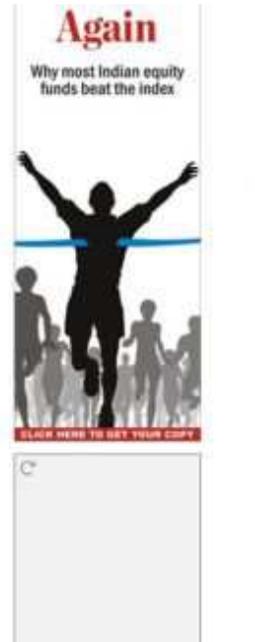
corporate paper or an average rating of AA should be quite fine. It *might* boost returns.

That is it. I am done. I won't worry about returns history.

If you wish to make a short-list based on returns, as done in the [equity mutual fund selection guide](#) [Opens in a new window](#), then,

- Click on returns tab and then click on 5 year rank to arrange in ascending order as show here. You can then short-list consistent performers. Although it is a liquid fund, I have still used the 3 year and 5 year periods. Force of habit I guess. Using shorter durations does not appeal to me.

Fund Rating	1-Month		3-Month		1-Year		3-Year		5-Year		10-Year	
	Return	Rank	Return	Rank	Return	Rank	Return	Rank	Return	Rank	Return	Rank
Escorts Liquid Fund ★★★★★	0.75	103/156	2.18	31/156	9.40	2/156	9.72	1/100	9.52	1/92	-	-
Peerless Liquid Fund - Super Institutional Plan ★★★	0.77	73/156	2.16	54/156	8.69	42/156	9.37	2/100	9.00	2/92	-	-
BNP Paribas Overnight Fund ★★★	0.76	75/156	2.15	66/156	8.00	80/156	9.18	28/100	8.86	4/92	7.66	15/55
Franklin India Treasury Management Account Fund - Super Institutional Plan ★★★	0.81	5/156	2.22	3/156	9.04	21/156	9.31	4/100	8.86	3/92	-	-
Birla Sun Life Floating Rate Fund - Short Term Plan ★★★	0.80	7/156	2.20	10/156	9.01	34/156	9.29	5/100	8.84	5/92	-	-
Birla Sun Life Cash Plus ★★★★★	0.80	9/156	2.19	14/156	8.98	50/156	9.27	6/100	8.82	8/92	7.90	1/55
JF Morgan India Liquid Fund - Super Institutional Plan ★★★	0.76	94/156	2.14	78/156	8.90	84/156	9.18	23/100	8.80	9/92	-	-
Religare Invesco Liquid Fund ★★★	0.77	68/156	2.17	51/156	8.67	56/156	9.21	15/100	8.78	10/92	-	-
Sundaram Money Fund - Regular Plan ★★★★★	0.76	77/156	2.14	83/156	8.95	69/156	9.20	18/100	8.78	11/92	-	-
Baroda Pioneer Liquid Fund ★★★	0.77	62/156	2.10	58/156	8.93	79/156	9.21	16/100	8.77	13/92	-	-
ICICI Prudential Liquid Plan - Regular Plan ★★★	0.77	60/156	2.16	53/156	8.96	61/156	9.22	12/100	8.77	14/92	-	-
JM High Liquidity Fund ★★★★★	0.78	26/156	2.16	62/156	9.00	36/156	9.22	11/100	8.77	12/92	7.62	18/55
Kotak Floater Short Term Regular Plan ★★★	0.79	16/156	2.19	19/156	8.89	47/156	9.25	9/100	8.77	17/92	7.74	11/55



Once you have this short-list, you can look at the risk grade, and portfolio contents and then choose one, perhaps with an AMC bias!

Why not simply use star ratings? VR assumes that is okay to club a fund which holds short-term bond with a fund that holds only cash. It clubs together funds with different average credit quality and durations. I am not comfortable about that.

What about metrics like standard deviation, alpha etc.? I don't think it is worth the effort for liquid funds.

Is my liquid mutual fund safe?!

 freefinancial.com/liquid-mutual-fund-safe/

2/24/2017

The incredulous 7% fall in the NAV of Taurus Liquid Fund due to a credit rating downgrade has many worried. *Can investors avoid such funds? Is this a "small amc" problem? Is this a small aum problem? I thought liquid funds were safe!* Just a sample of how many investors feel. In this post, I discuss these issues and how to minimise risk associated with liquid funds.

First, let us get the obvious out of the way. No mutual fund is safe. Risk cannot be avoided (without enhancing other types of risk) and can only be minimised.

Second, why should one use liquid mutual funds? Because the AMC or the fund sales guys tell you that money sitting idle in your SB account or fixed deposit is a crime? Because they say that you can get better returns in a liquid fund? Hogwash! If you fell for it, you've been had!

Third, what is the big idea of wanting to earn 1-2% more return from an emergency fund?!

What is the use of a liquid fund?

Well, it *is* meant to earn "a bit more" than a savings bank account. At what cost? (1) the redemption is not instant and (2) the risks are much higher.

The typical liquid fund monthly return can vary by +/- 0.25%. You may think that this is "nothing". However, it is the unknown risks that matter.

That +/- 0.25% is the market demand and supply variation. This is what we usually perceive on a day to day basis and this is what star rating agencies use as part of their star ratings.

The unknown risk exists everywhere. We do not expect our bank to collapse. Even if we think about it, it is reasonable to expect that a "well-established" bank is unlikely to collapse overnight. Of course, it can and has happened but we have to consider probability at some stage or forget about returns.

In the case of a debt fund, the unknown risk is the change in credit worthiness. Unknown in the sense, not well understood by many.

Let us imagine ourselves to be a money lender. We lend money to only known people. Their credit-worthiness demands a low-interest rate. Suppose we get greedy and lend to one untrustworthy person at a high rate.

We may think we have "diversified risk" by keeping untrustworthy borrowers low. But imagine the hurt to our cash flow if that person defaults on payments.

That is life. We have to take risks to make more. If we repeat the mistake, then we alone are to blame for the loss. As argued [yesterday](#), I think Taurus made a similar mistake when they rolling over the tainted bond.

This is not a "small amc, trying to compete" problem. It has happened to ICICI and Franklin [before](#). AUM size has little to do with this, except perhaps, the concentration of holdings. A fund with large aum tends to hold many securities with smaller portfolio weights. This could reduce the fall in case of a credit rating downgrade. But then again, what is big or small is quite subjective.

What can we do as investors?

We cannot control the behaviour of fund managers. So let us focus on what we can do.

Option 1: avoid debt mutual funds I am not a mutual fund salesman. So I present this option without batting an eyelid. Who says you need debt mutual funds? You don't.

If you are unwilling, uninclined, unable, to appreciate risks or unlikely to understand them, stay away from debt mutual funds or any product for that matter.

As mentioned many times here, never invest by looking at star ratings or past performance. Invest **only** in what you **can/wish to** understand.

Read more: [Do's and Don'ts of Debt Mutual Fund Investing](#)

Option 2: minimise risk. This means minimising returns too. Within the liquid fund category, you will find funds that dabble in lower than AAA bonds to varying degrees and funds that handle only cash (overnight or short-term collateralised borrowing or CBLOs). Choose the cash management funds. They will have 1/2 stars only, though! More on this later. This will not eliminate risks, but minimise them to a reasonable extent.

The other option is to eliminate credit risk, but embrace minimal interest rate risk by stick to *very short term gilt (GOI) bonds*. Read more [here](#) and [here](#)

Option 3: Take some risk but keep an eye. Risk = effort. So if you want to or if you are already using a liquid fund that invests in any kind of non-sovereign debt, then there is no option but to keep any eye on the portfolio once a month. If you are uncomfortable about the holdings, pull out.

I know that this is not a great option, but if a liquid fund can fall 7%, anything can happen. We cannot predict these, but at least can be mentally prepared better. I know, easier said!

The scheme information document is quite vague. Study the fund factsheets for random months in the last few years to check how the portfolio has changed. I prefer a fund that does not change investment style (even if that is risky)

Do not be scared: I know many investors who intelligently use debt mutual funds after retirement. It is not impossible. In fact, even if you do not have any need for debt funds now, it makes sense to learn more about them so that you can use them later.

What about my current liquid fund?

Please study the key information document (KIM) or Scheme information document (SID) to understand risk. Check past factsheets as mentioned above. Do this as a simple learning exercise without pressure.

Debt Mutual Fund Selection Guides

[How and When To Select Ultra Short Term Debt Mutual Funds](#)

[Smart Ways to Invest in Corporate Fixed Deposits](#)

[How to Select Mutual Fund Fixed Maturity Plans \(FMP\)](#)

[Should I buy Long Term Gilt Mutual Funds?](#)

Do not invest in dynamic bond funds!

Dynamic bonds are debt mutual funds with a flexible investment strategy. There is a perception that they funds can be used to take advantage of interest rate movements to maximise gains. Unfortunately, these funds do not reward investors enough for the effort and risk involved in its investment strategy. Which is why I believe that one should not invest in dynamic bond funds.

Such a strategy combines the two ways in which debt funds produce returns: capital gains (due to rate movements) and interest income from bonds.

A couple of days ago, I had mentioned that debt funds which invest in short-term bonds out-perform other categories including dynamic bond funds. Read that post [here](#) Opens in a new window.

In this post, I would like to highlight the performance of dynamic bond funds with the same data set.

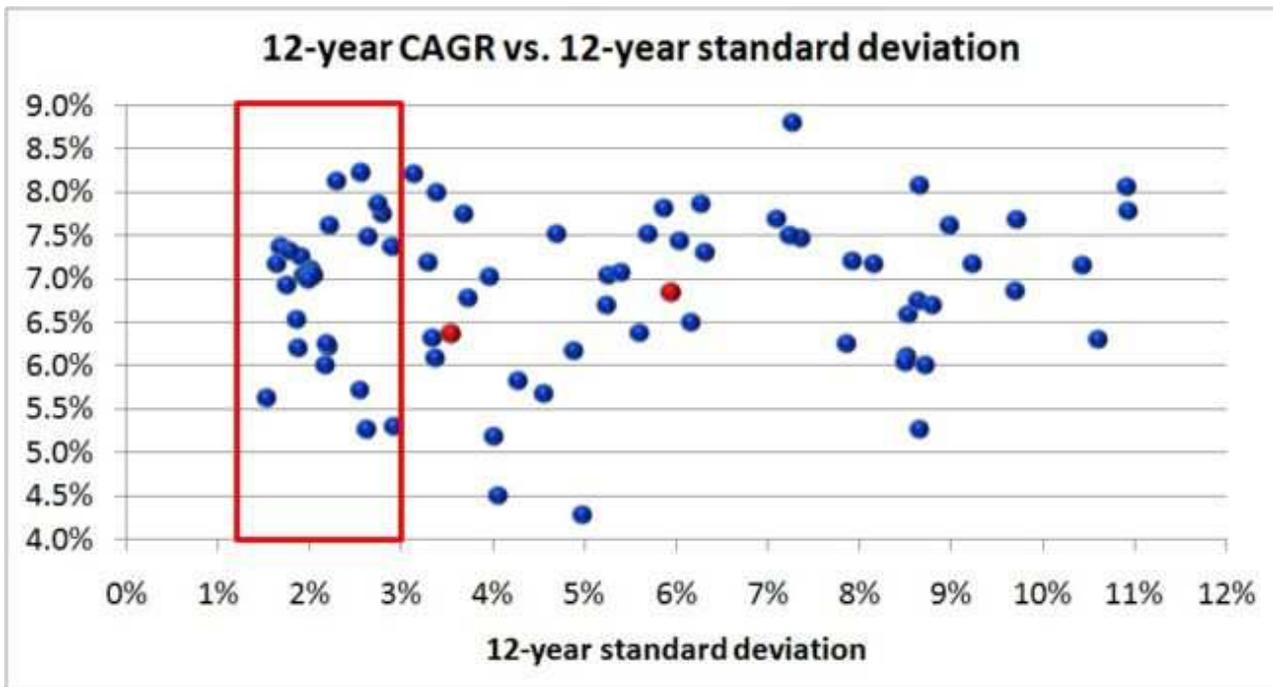
Plotted below is the CAGR calculated from annual returns from Value Research versus the standard deviation of the annual returns for different durations.

CAGR is the average rate at which an investment has compounded annually - a measure of reward.

Standard deviation is the extent of deviation of each annual return from the arithmetic average - a measure of risk.

The data points represent all debt mutual funds. Dynamic bond funds are shown in red.

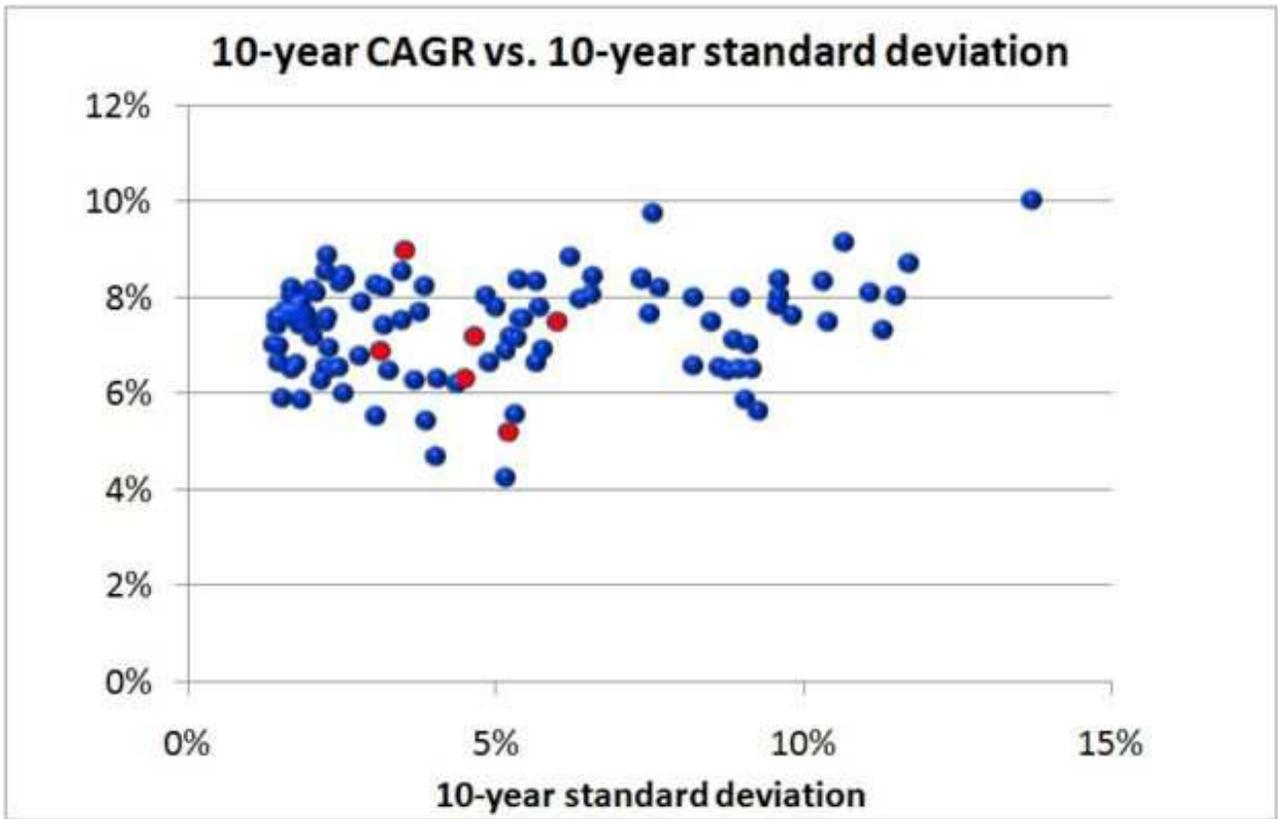
12-year CAGR vs. 12-year standard deviation



Only two 12-year old dynamic bond funds. They have done better than long-term funds: typically same reward at much lower risk. However, the short-term fund have done better.

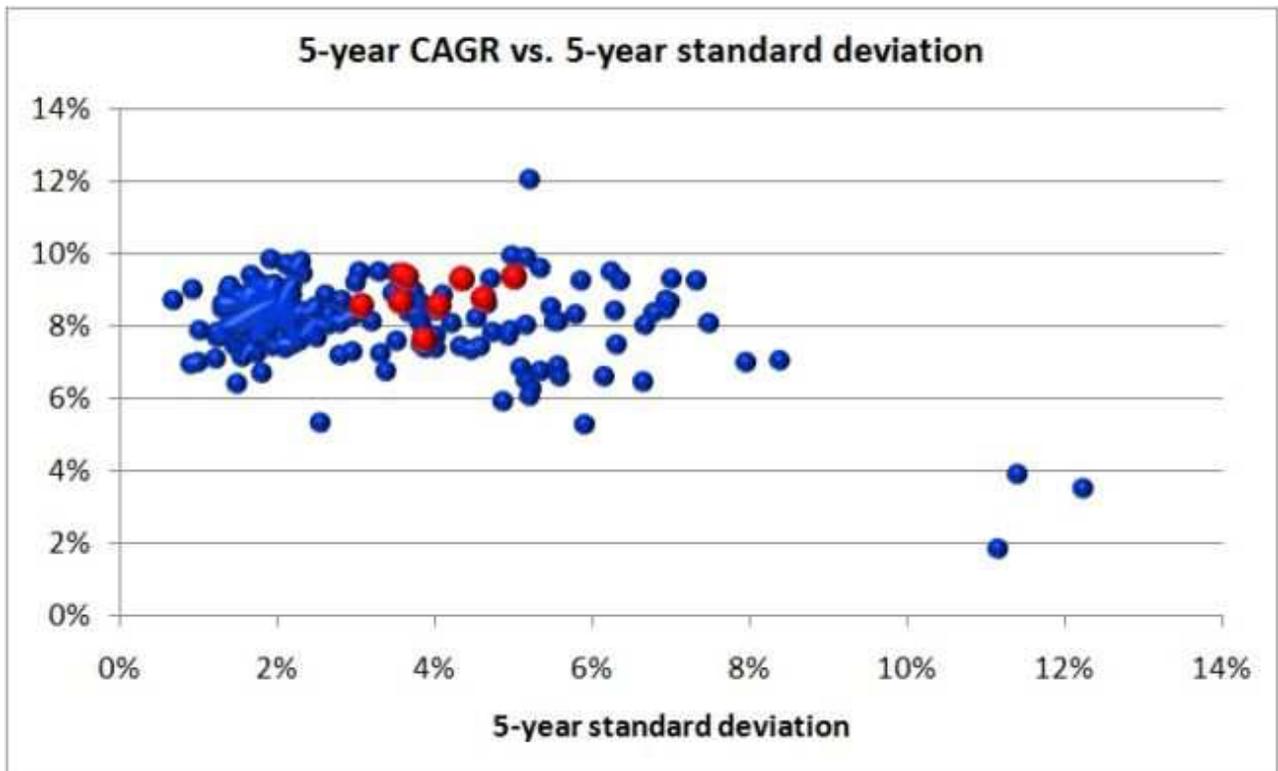
If dynamic funds had indeed played the interest rate cycle well, they should have beat the short-term fund as well.

10-year CAGR vs. 10-year standard deviation



Again the same conclusions as above.

5-year CAGR vs. 5-year standard deviation



Short-term funds have done well in the last five years when rates were high. So should have dynamic bond funds if they had had enough exposure to short-term funds. No evidence of that.

Conclusion: Stay away from dynamic bond funds. They are better than long-term funds. That is all that can be said. However, that is like saying a rock is better than a hard place!

Long-term funds are not of much use. They lose during rate hikes what they gain during rate cuts. Dynamic funds fare better because of their 'dynamism' but have not managed to outperform short-term funds.

As mentioned at least thrice earlier(!), investors who stick to short-term funds are more than likely to do much better.

How and When To Select Ultra Short Term Debt Mutual Funds

 freefincal.com/select-ultra-short-term-debt-mutual-funds/

1/1/2017

An ultra short term mutual fund is a type of fixed income or debt mutual fund that invests in short-term bonds issued by banks, PSUs, corporate, cash and govt bonds. In this post, I discuss how and when to select ultra short term (UST) funds.

First, wish you all a happy new. Second, Amazon has dropped the hardcover price on **You Can Be Rich Too With Goal-Based Investing** from Rs. 375 to [Rs. 266 \(prime\)](#) and [Rs. 306 \(normal\)](#)[Opens in a new window](#). This is most likely a weekend discount, so if you have put off getting a copy, now would be a good time to do so 😊

Infibeam also is at an [attractive Rs. 278](#) The Kindle edition is also available at a discount of 30% at [Rs. 244.30](#) The [Google Play Book edition](#) also has the same price. Do consider picking one for yourself or gift it someone who may need it. If you have read it/used the online calculator modules, we would be delighted if you can spare a few minutes to write a short review at Amazon or Infibeam

The book contains detailed selection guides on both equity and debt funds with nine online calculator modules to assesses and track your financial goals.

What are short-term debt funds?

The definition of how short is short is arbitrary. A fund with most bonds maturing after 4 years is a short term fund for a person with a goal 25 years away. And is a risky, long-term fund for a goal, 4 years away. Read more: [Poor Debt Fund Advice: Match Investment Horizon With Fund Maturity Profile](#)

When to choose Ultra Short term funds?

For any requirement that is more than 1Y away. For less than that, you can use liquid funds. Of course, you can get a bit more adventurous for needs that are several years away, but I suggest that you get comfortable with UST first.

How to choose Ultra Short Term Funds?

Value Research defines a UST fund as

Funds whose average maturity over the last 12 months is less than 1 year, but which are not liquid funds

A liquid fund will have a maximum average maturity of 91 days or 0.25 years.

Note the definition is with respect to last 12 months. So if you head over to

<https://www.valueresearchonline.com/funds/fundSelector/>

and make these settings:

Compare funds in My Portfolio **Fine tune the fund selection**

Search by Fund House

- 15 Largest Fund Houses
- Axis
- Baroda Pioneer
- Birla Sun Life
- BNP Paribas
- BOI AXA
- Canara Robeco
- DHFL Pramerica
- DSP BlackRock
- Edelweiss
- Escorts
- Franklin Templeton
- HDFC

Search by Fund Category

- Debt: Credit Opportunities
- Debt: Dynamic Bond
- Debt: FMP
- Debt: Gilt Medium & Long Term
- Debt: Gilt Short Term
- Debt: Income
- Debt: Liquid
- Debt: Others
- Debt: Short Term
- Debt: Ultra Short Term
- Equity: Banking
- Equity: FMCG
- Equity: Infrastructure

Exclude

- Fixed Maturity Plan (FMPs)
- Plans Suspended for Sales
- Direct Plans
- Regular Plans
- Open-ended
- Closed-end
- 5-Star Funds
- 4-Star Funds
- 3-Star Funds
- 2-Star Funds
- 1-Star Funds
- Not Rated

Update Fund List

Then click on the portfolio tab:

Snapshot	Returns	Portfolio	Risk Stats	NAV Details	Fees & Details		
Download Data ▾							
Fund Rating	Equity Fund Style	Market Cap (Cr)	Turnover (%)	Bond Fund Style	Average Credit Quality	Average Maturity (Yrs)	Net Assets (Cr)
ICICI Prudential Ultra Short Term Plan - Direct Plan ★	-	-	-	☐	AAA	2.96	9,357
Kotak Banking and PSU Debt Fund - Direct Plan ★★★	-	-	-	☐	AAA	2.8	1,111
HDFC Cash Management Fund - Treasury Advantage Plan - Direct Plan ★★	-	-	-	☐	AA	1.68	13,073
Birla Sun Life Savings Fund - Direct Plan ★★★★★	-	-	-	☐	AA	1.61	17,804
Axis Banking & PSU Debt Fund - Direct Plan ★★★	-	-	-	☐	AAA	1.6	599
Birla Sun Life Floating Rate Fund - Long Term Plan - Direct Plan ★★	-	-	-	☐	AAA	1.56	5,459
JM Money Manager Fund - Super Plus - Direct Plan ★★★	-	-	-	☐	AAA	1.547	682
HDFC Floating Rate Income Fund - Short Term Plan - Wholesale Plan - Direct Plan ★★★★★	-	-	-	☐	AA	1.52	15,226
IDFC Money Manager Fund - Treasury Plan - Direct Plan ★★★	-	-	-	☐	AAA	1.493	1,721
ICICI Prudential Savings Fund - Direct Plan ★★★	-	-	-	☐	AA	1.416	7,627
ICICI Prudential Flexible Income Plan - Direct Plan ★★★	-	-	-	☐	AA	1.405	20,012
Sundaram Income Plus Direct ★★	-	-	-	☐	AA	1.39	389

And observe the average maturity, you will see many funds over 1Y. This of course, is the *current* value not the annual average.

If you wish to choose your first UST fund, your goal should be to stick to funds that satisfy the following criterion:

1: Its average maturity should be much less than 1 year. About 0.3 to 0.6 years for most part of the year, if not always (preferable). That is, choose funds that have a specific investment mandate and not stray. Just because a 3Y gilt fund is an attractive proposition now (well, many months ago), the fund should not hold those!

In other words, its interest rate sensitivity should be less.

2: Its average credit quality should be AAA. You do not need a fund that holds cash. Then it will be a liquid fund. Although one need not worry too much about selecting a liquid fund, here is a guide for beginners: [How to Choose a Liquid Mutual Fund](#)

If you choose a fund with average credit quality AA, A or BB then there is a risk of losing money if the bond is devalued or if the bond issuer defaults. Read more: [Understanding Credit Rating Risk in Debt Mutual Funds](#)

3: The investment style box should be this:

There are funds in the Value Research UST list with medium interest rate sensitivity. Avoid them. If you stuck to funds with average portfolio maturity well below 1Y, you ensure the rate sensitivity is also lower. Read more: [Understanding Interest Rate Risk in Debt Mutual Funds](#)

4: Never get enticed by returns and star ratings. True for all funds, but especially for debt funds. A fund providing higher returns (and not holding gov bonds) is holding bonds of lower credit quality.

5: Sort the above list by decreasing credit rating as shown in the three figures below and shortlist funds with average maturity less than 1Y. I have made an arbitrary choice. You can choose as you like.

Credit Quality			Interest Rate Sensitivity
High	Medium	Low	
			High
			Medium
			Low

Fund Rating	Equity Fund Style	Market Cap (Cr)	Turnover (%)	Bond Fund Style	Average Credit Quality	Average Maturity (Yrs)	Net Assets (Cr)
Axis Banking & PSU Debt Fund - Direct Plan ★★	-	-	-	☒	AAA	1.6	599
Axis Treasury Advantage Fund - Direct Plan ★★★★★	-	-	-	☒	AAA	0.496	2,340
Birla Sun Life Floating Rate Fund - Long Term Plan - Direct Plan ★★	-	-	-	☒	AAA	1.56	5,459
Canara Robeco Treasury Advantage Fund - Direct Plan ★★★★★	-	-	-	☒	AAA	0.47	77
DHFL Pramerica Short Term Floating Rate Fund - Direct Plan ★★	-	-	-	☒	AAA	0.95	1,106
DHFL Pramerica Ultra Short Term Fund - Direct Plan ★★★★★	-	-	-	☒	AAA	0.49	2,483
DSP BlackRock Ultra Short Term Fund - Direct Plan ★★★★★	-	-	-	☒	AAA	0.88	3,651
Franklin India Savings Plus Fund - Direct Plan ★★★★★	-	-	-	☒	AAA	0.62	309
ICICI Prudential Ultra Short Term Plan - Direct Plan ★	-	-	-	☒	AAA	2.96	9,357
IDBI Ultra Short Term Fund - Direct Plan ★★★★★	-	-	-	☒	AAA	1.241	1,352
IDFC Banking Debt Fund - Direct Plan ★★★★★	-	-	-	☒	AAA	0.277	1,213
IDFC Money Manager Fund - Treasury Plan - Direct Plan ★★★★★	-	-	-	☒	AAA	1.493	1,721
IDFC Ultra Short Term Fund - Direct Plan ★★★★★	-	-	-	☒	AAA	1.236	5,864

List part 1

Indiabulls Ultra Short Term Fund - Direct Plan ★★★★★	-	-	-	☒	AAA	0.35	1,343
Invesco India Credit Opportunities Fund - Direct Plan ★★★★★	-	-	-	☒	AAA	0.077	1,327
Invesco India Ultra Short Term Fund - Direct Plan ★★★	-	-	-	☒	AAA	0.992	3,951
JM Floater Long Term Fund - Direct Plan ★★★★★	-	-	-	☒	AAA	0.186	193
JM Money Manager Fund - Regular Plan Direct ★★★★★	-	-	-	☒	AAA	1.232	108
JM Money Manager Fund - Super Plan - Direct Plan ★★★	-	-	-	☒	AAA	0.218	236
JM Money Manager Fund - Super Plus - Direct Plan ★★★	-	-	-	☒	AAA	1.547	682
Kotak Banking and PSU Debt Fund - Direct Plan ★★★	-	-	-	☒	AAA	2.8	1,111
Mirae Asset Savings Fund - Direct Plan ★★★	-	-	-	☒	AAA	1.1	192
Motilal Oswal MOST Ultra Short Term Bond Fund - Direct Plan ★	-	-	-	☒	AAA	0.31	249
Peerless Ultra Short Term Fund - Direct Plan ★★★★★	-	-	-	☒	AAA	0.5	79
Principal Retail Money Manager Fund - Direct Plan ★★★★★	-	-	-	☒	AAA	0.252	34

List part 2

Fund Rating	Equity Fund Style	Market Cap (Cr)	Turnover (%)	Bond Fund Style	Average Credit Quality	Average Maturity (Yrs)	Net Assets (Cr)
Peerless Ultra Short Term Fund - Direct Plan ★★★★★	-	-	-	☐☐☐	AAA	0.5	79
Principal Retail Money Manager Fund - Direct Plan ★★★★★	-	-	-	☐☐☐	AAA	0.252	34
SBI Treasury Advantage Fund - Direct Plan ★★★★★	-	-	-	☐☐☐	AAA	1	6,012
Sundaram Flexible Fund - Short Term Plan - Direct Plan ★★★	-	-	-	☐☐☐	AAA	0.27	1,527
Sundaram Ultra Short Term Fund - Direct Plan ★★★	-	-	-	☐☐☐	AAA	1	2,757
Taurus Short Term Income Fund - Direct Plan ★★★★★	-	-	-	☐☐☐	AAA	0.54	85
Baroda Pioneer Treasury Advantage Fund - Direct Plan ★★★★★	-	-	-	☐☐☐	AA	0.9	3,358
Birla Sun Life Cash Manager - Direct Plan ★★★★★	-	-	-	☐☐☐	AA	1.09	7,652
Birla Sun Life Savings Fund - Direct Plan ★★★★★	-	-	-	☐☐☐	AA	1.61	17,804
BNP Paribas Money Plus Fund - Direct Plan ★★★	-	-	-	☐☐☐	AA	1.2	383
BOI AXA Treasury Advantage Fund - Direct Plan ★★★★★	-	-	-	☐☐☐	AA	0.74	343
Canara Robeco Savings Plus Fund - Direct Plan ★★★	-	-	-	☐☐☐	AA	1.05	1,053
DHFL Pramerica Low Duration Fund - Direct Plan ★★★★★	-	-	-	☐☐☐	AA	0.74	1,439

List part 3

You now have about 13-14 funds marked in green squares above.

Among these, remove all amcs that you are not familiar with or do not hold an account with. I would wager that the list is now down to 5-6.

Now in this list, observe the fund names. Do they say just UST fund or is there anything more technical there? For example, I see

IDFC Banking Debt fund. Now that sounds like a narrow investment mandate. Interesting. Now I would head over to IDFC website and read the scheme strategy and scheme investment document (SID).

Axis treasury fund, Canara Robeco treasury fund: These are funds that can dabble in money market instruments. That is, for a good part they can act like liquid funds too.

The goal is to choose a UST fund that (for most the time) sticks to short term bonds. You can look up the fund fact sheet history to see how it has invested in the past. dssds

Caution

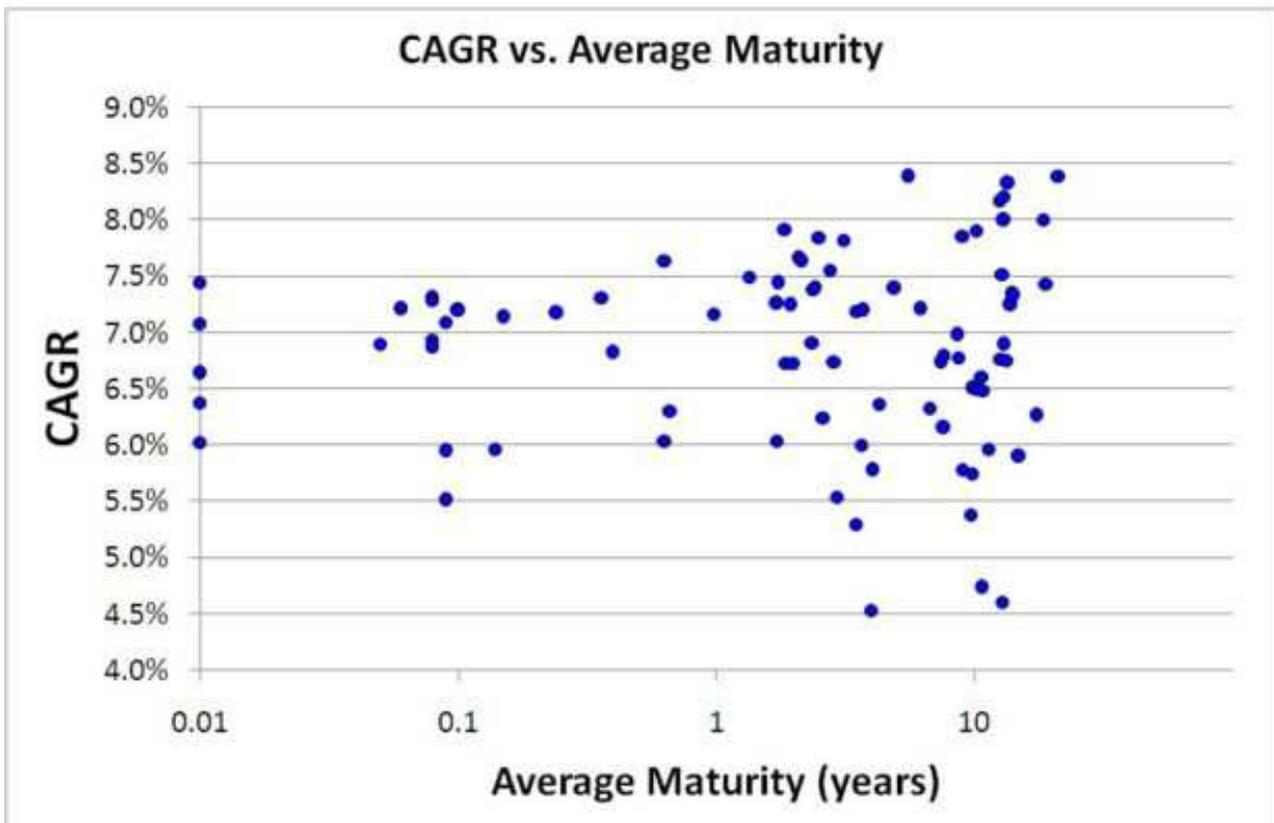
Except liquid funds, the investment mandates of other debt funds are quite broad and they can change character. Therefore, **DO NOT INVEST IN ANY DEBT FUND WITHOUT UNDERSTANDING RISKS AND WITHOUT READING THE SCHEME DOCUMENT.** It will take about 30 minutes.

That is time better spent than asking for random opinions from strangers at Asan Ideas For Wealth.

Choosing Debt Mutual Funds For the Long Term

If my financial goal is 15-plus years away, PPF is an obvious and pretty good choice for a debt instrument while trying to put together a diversified portfolio. 'Which debt mutual fund should I choose for the same purpose, if my goal is less than 15 years away?', is a question that is asked often enough.

The answer had presented itself to us earlier in an earlier post: [Debt Mutual Fund Returns: How to expect when you are expecting!](#)Opens in a new window

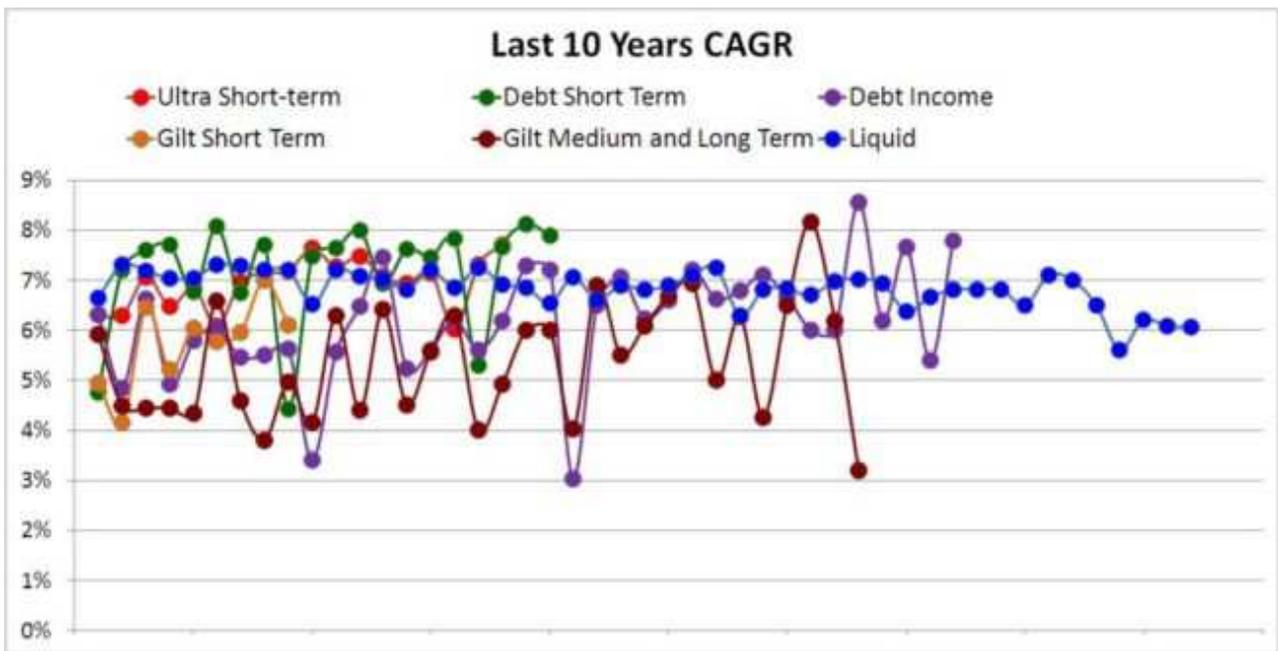


I was quite astonished to see debt funds with high average maturity (typically medium and long-term gilt funds) had a 10 year CAGR comparable to liquid funds!

So why bother taking on volatility that does not pay? Why not be content with simple accrual type ultra-short term funds? As reader Deep pointed out in response to this graph, "no brainer to go for liquid funds as both credit risk and volatility risk are lowest".

Let us now look at returns of *all* debt mutual funds categorized as per Value Research Online. The horizontal axis represents the number of mutual funds in each category and is not shown. Data is take from Value Research.

Last 10 year CAGR

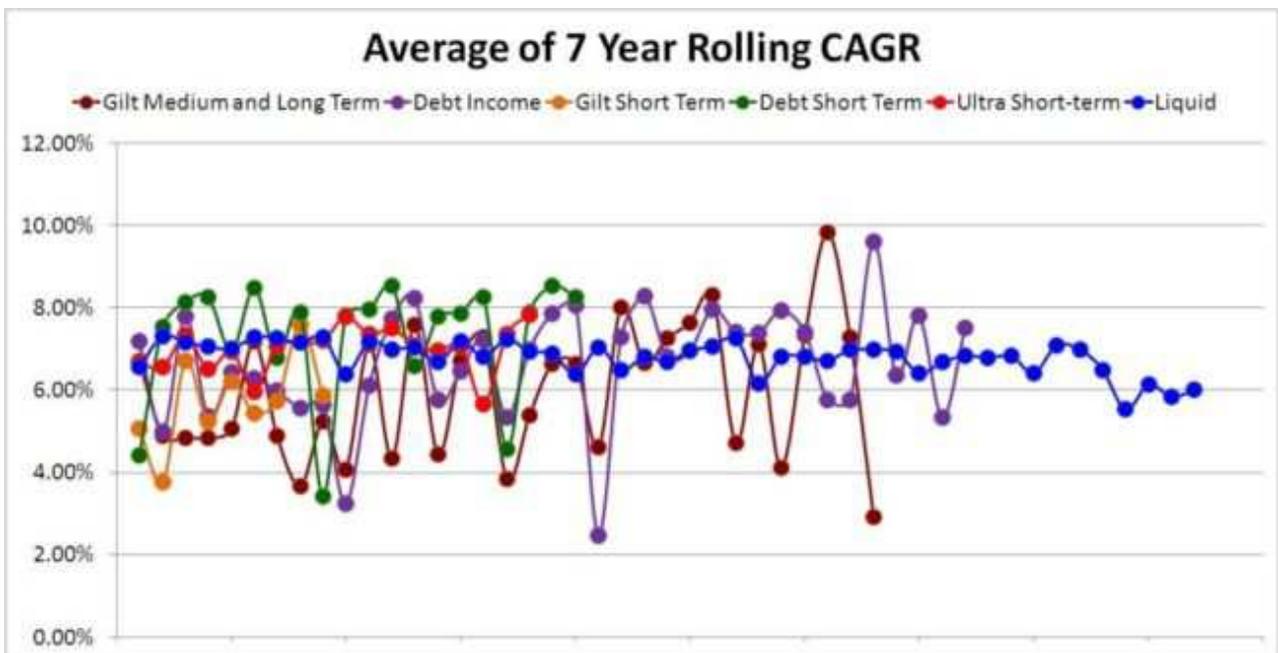


Notice that liquid fund returns of all mutual funds are typically the same. So it does not matter which AMC you choose. What a relief! of course, this is just one data point. If we stare at rolling returns, there will be some variation (see below).

Clearly funds with low average maturity (liquid, ultra short-term and short-term) are less volatile across AMCs. Many comfortably best the Debt-Income (including dynamic bond funds), Gilt-Short-term and Gilt-Medium and Long-term categories.

7 year average CAGR

Here is the average of the rolling 7 year CAGR.



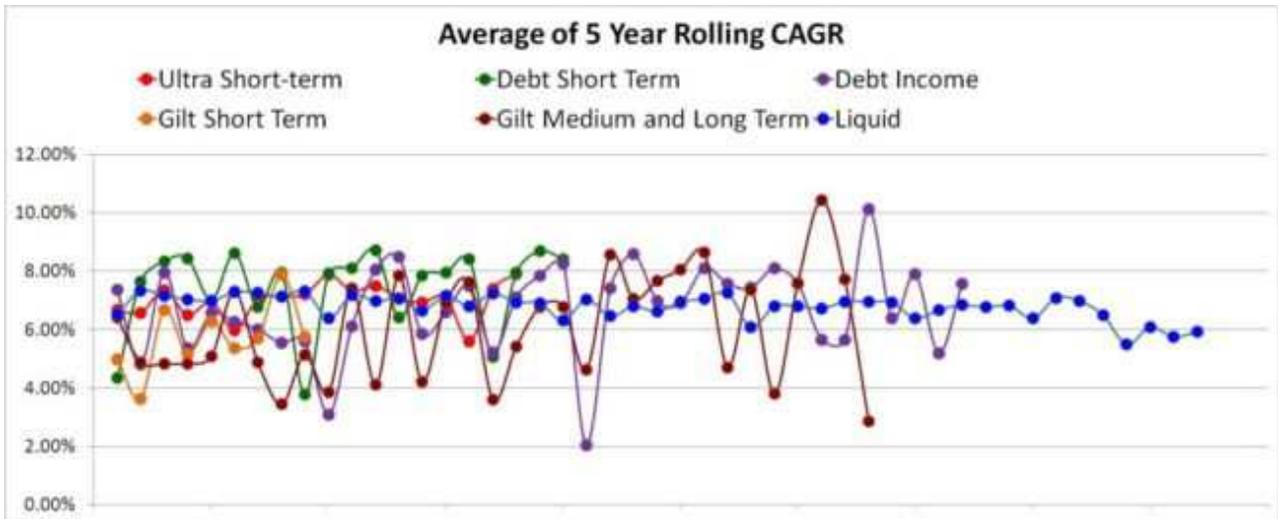
Note: It is unfair to include funds that hold bonds with maturity period greater than the duration over which we calculate returns. Therefore, when the duration is decreased the long-term funds lose relevance. However, I have

included them in the graphs for an overall perspective.

Amusingly, this graph (and the ones to come) look similar to the 10Y return graph! The conclusions do not change!

5 year average CAGR

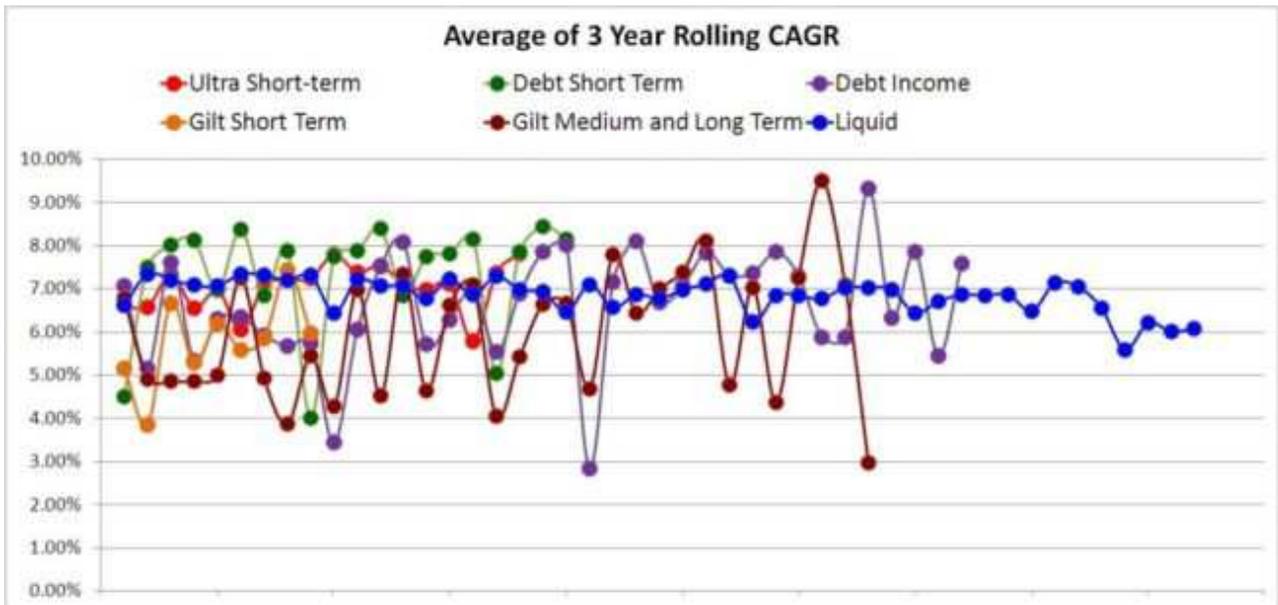
Average of the rolling 5 year CAGR.



Again, you can buy a liquid fund, liquid-plus fund or ultra short-term fund and relax!

3 year average CAGR

Average of the rolling 3 year CAGR.

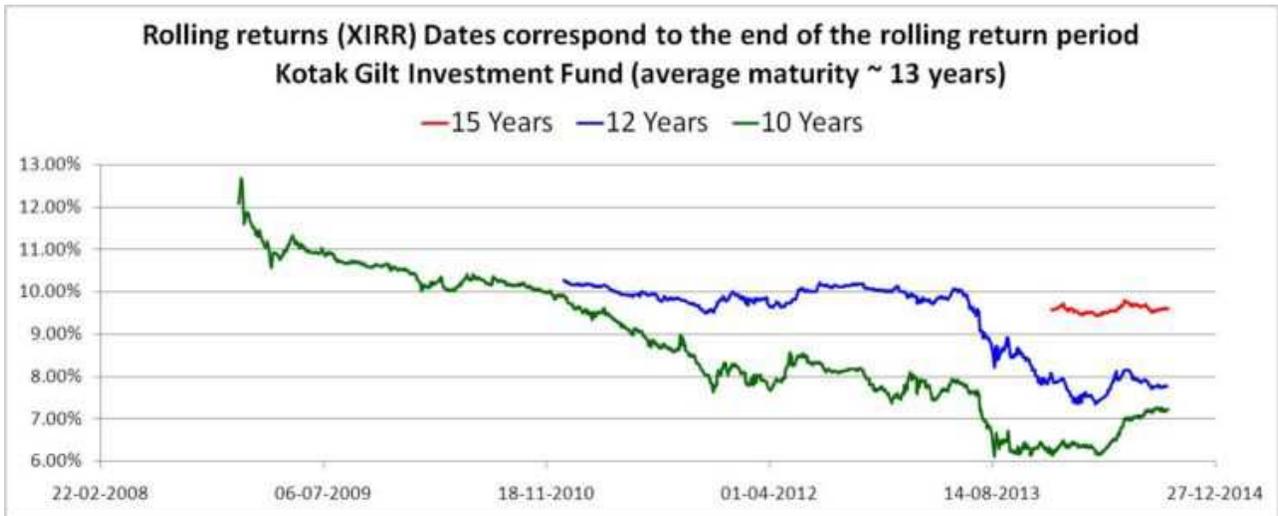


Bottom Line

The next time an 'expert' says, *'match the average maturity of a debt fund with the duration of your financial goal'*, **Let us ignore them!**

Let us now look at rolling returns of two funds: a long-term gilt fund and a liquid fund.

Long-term Gilt fund



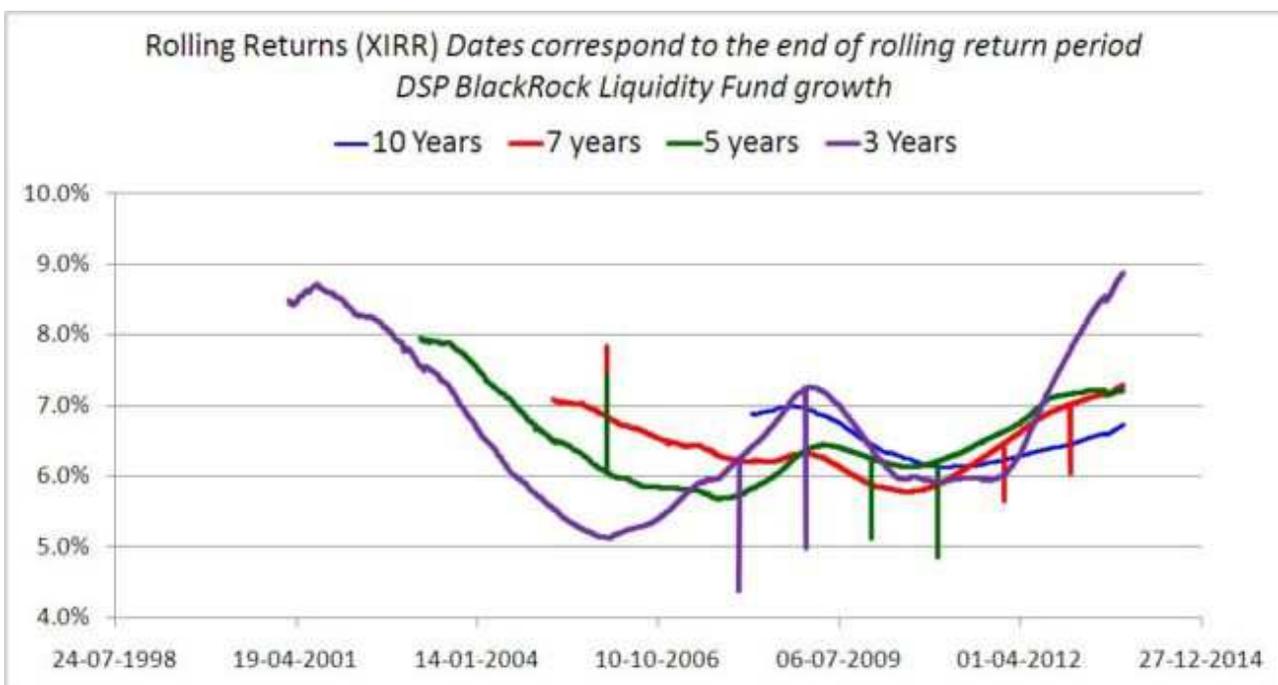
Notice the progressive decrease in returns. The 15 year returns are steady but not spectacular. Considering the volatility and associated emotional stress, I don't think they are good enough.

Perhaps since the economy is supposedly reviving as we speak, interest rates will fall and the gilts will shine again!

However, 10+ years is more than one market cycle. So what one gains when rate fall, one could lose when they rise again! I am no expert, but I am willing to wager that this is the reason long-term gilt funds, if held for a long time, fail to impress.

Liquid Fund

Liquid funds are not angels either! Their returns can vary quite a bit.



Please do not believe any 'expert' who says that liquid funds are better than fixed or recurring deposits. There is no guarantee that post-tax liquid fund returns would beat post-tax FD returns, irrespective of the duration. For 'short time periods, liquid funds are suitable when the redemption date and amount are uncertain.

Should I buy Long Term Gilt Mutual Funds?

 freefincal.com/buy-long-term-gilt-mutual-funds/

12/1/2016

Bond yields have been dropping rapidly since the demonetization announcement. As a result, the NAV of long-term gilt mutual funds has been on the increase. At a time when many investors want to benefit from this move, Mr Srinivasan Sundarajan, in this third guest post, cautions to look before you leap.

+==++==+

About 10 days ago, SBI announced its decision to slash the interest rate for deposits, post the huge fund flow from the demonetization scheme. In fact, they published interest rates less than the Savings Bank deposit rate of 4% for bulk fixed deposits.

So people who prefer the safety of debt (and do not like the volatility of Equity) are wondering (and are being told) whether they should invest in Debt Mutual funds. Some of them are seeing numbers like 15% (annualized) return over a 3-year term in Long Term Gilt funds. At the other end, liquid funds are showing a return of 8% (annualized) over the same 3-year timeline.

When headlines and statistics are combined – you have a powerful cocktail; enticing, intoxicating when taken – but if you did not get it right you could have a bad hangover. (Pun intended)

Are you asking the right question?

One of the most important things to do is to ask the right question.

Let's see how this dialogue progresses (between an Investor who is used to investing in FD and a Seller/ Advisor who is advocating Gilt Fund)

Q: Tell me where can I have the highest safety of my principal (at least like a bank)?

A: Well if you have invested directly or indirectly in Government of India bonds – you have the highest safety. So you should consider Gilt funds.

Q: My FD allows me to prematurely withdraw “any time”, with a little penalty. Will I have the same flexibility?

A: Of course, you can withdraw any time from your Gilt Fund. Some funds have a small period of penalty. Otherwise, you do not even have any penalty. In a couple of working days, the fund house will credit the proceeds to your account.

Q: I do not have TDS. (The bank collects my Form 15G/ 15H). What happens to that?

A: There's no TDS. You do not need to provide Form 15G/ 15H either.

Q: What type of returns can I get from a Debt Gilt fund?

A: In the last 3 years, people who invested in Long Term Debt Gilt funds have made 13% – 15% annualized returns. In fact, those who entered even last year, have made more returns 15% – 18%. All this is happening when “all you have seen” is your FD rate falling. Further the person who invested 3 years ago – does not have to pay tax on the entire amount (gets indexation benefit as well!)

If you look at the above dialogue, it sounds very convincing to the investor that Long Term Debt Gilt funds are the

way to go. They are invested in Government Bonds which carry no principal risk, have liquidity, no TDS, far better returns than FD. The investor thinks he was a fool to have not invested 3 years ago!

So, what is the issue then?

The Seller/ Advisor answered all the questions that the Investor asked. There was no falsehood in the statements either.

Now let's look at the issues that were not addressed in the above questions.

1. There is no TDS. However, if the Investor assumed that he could opt for a quarterly dividend – so that he can have some regular income, it's going to attract significant Dividend Distribution Tax (28.33%). This is paid by the fund house directly. Where's it paid from? Your fund's earnings. [Of course, you can talk about SWP et al and optimise it.]
2. There's no principal risk with GOI bonds. That's absolutely true. However, if the fund is invested in long duration government bonds – it's extremely sensitive to interest rate change. In the last 2 years, we have seen interest rates go down, so these long-term bonds have appreciated in value. But when interest rates go up, you will see the bond value depreciate.

To help understand this better, I am going to source my data from Value Research Online (on 30th Nov 2016).

Illustration

Let me take an example of a fund - [SBI Magnum Gilt Fund - Long Term Plan](#) [Note – you can pick [any other fund](#), and you would have some similar finding. This is not an attempt to target this fund, by any means. It is used for illustrative purpose only.] to explain.

If you look at the aggregate portfolio data for this fund, there are a few fields - Modified Duration (years) – 6.76; Yield to Maturity% – 7.02.

I am not going to get into the technicalities of all the terms but will do my best to explain how to interpret this information.

A modified duration of 6.76 translates to a 6.76% increase in your NAV for every 1% drop in the interest rate. Let me try to see if I can explain it with this illustration – You have invested 100,000 today. Let us say tomorrow there's a drop of 0.5% (half a percent) drop in the bond interest rate. This translates to an impact of $0.5\% * 6.76 = 3.38\%$ on your NAV. In other words, you 100,000 will now jump up in value to 103,380.

Now let us understand what the Yield to Maturity – 7.02% means. It means that with the current investments in this fund, it will generate a return of 7.02% every year. In layman's term it is the equivalent of this fund earning 7,020 on a corpus of 100,000 in a year (assuming there's no change to the underlying investment by the fund house).

Estimating first year return

Currently, a 10 Year Government bond averages about 6.25% yield. If you take the [long-term history](#), the lowest yield it has reached has been about 5% for a brief period around 2004. It touched about 6% briefly in 2009.

So let us say if in the next one year the 10 year GOI bond yield drops from 6.25% to 5.50%. Now let us compute a possible return in such a scenario (note there are lots of approximation – so use this for illustrative purpose only)

Total returns = Impact due to Modified Duration + Interest Yield

Modified duration impact = $(6.25\% - 5.50\%) * 6.76 \sim 5.00\%$

Interest yield ~ Average of Opening Interest and closing interest. (Assume closing interest will drop by the same 0.75% interest)

Interest yield = $(7.02\% + (7.02\% - 0.75\%))/2 \sim 6.65\%$

So, total returns = $5.00\% + 6.65\% = 11.65\%$

The fund has an expense ratio of 0.97%. [What this means is you will be paying about 1% of your money every year to the fund house to manage the fund.]

So after deducting the expense ratio, you can expect $11.65\% - 0.97\% \sim 10.65\%$ return in the next year.

Estimating next year return

So, let's continue from the prior year. The starting interest yield will be $\sim 6.25\%$ ($7.02\% - 0.75\%$).

Further, the 10 year GOI bond yield above was about 5.50%. It's difficult to expect it to go any further lower given our inflation target is 4% +/- 2%. So let's assume that the 10 year Government bond yield stays flat through the year.

There will be no impact due to Modified duration in this case. The interest yield is 6.25%. The expense ratio is 1.00% (approx.).

So, your return in the next year could be $0\% + 6.25\% - 1.00\% = 5.25\%$

You will dread to think: what will happen if the interest rate starts to move up, again?

Findings from the illustration

The average return in the 3 prior years was 15.00% (every year) – way above the FD rates!

The next year could give you a return of 10.65% – still significantly above the FD rate.

The year after that could return 5.25% - going below the FD rate, now!

You don't want to think what will happen if the 10 Year Bond rate starts to move up!

In other words, if the investor did not ask the right question about what will impact and how much is the likely impact on the returns – he is unlikely to get the full picture.

Further, the investor needs to understand that the principal does not have any risk, but the returns are highly sensitive from 15% – 10% – 5%.

As the returns drop lower, the impact of the expense ratio – is even higher!

Conclusion

Beware! Remember the famous statutory disclaimer of every fund – Past performance is not an indicator of future trends.

Understand your investing psychology – Why did you invest in FD so far? Is it because you were uncomfortable with volatility; is it because you knew that you will get some steady income (even though it may be low); it is because you felt assured of the principal. Will this new product appeal to your investing psychology?

If you are getting into long term gilt funds, you need to understand how it works – otherwise, you may become the captain of a sinking ship!

There could be arguments in favour of dynamic bond funds, income funds – which are also different types of debt funds. Well, they carry their own stories – which you need to understand.

So am I predicting anything in this post? The simple answer is NO! I am just attempting to share my knowledge with an effective illustration.

As always feel free to share your thoughts, comments and ideas.

+==+==+

These are the links to Mr Srinivasan's other guest posts:

[Health Insurance: Switching out of my job current – My experiences](#)

[Experience: After porting from group health insurance to a family floater](#)

Related Reading

[Understanding Interest Rate Risk in Debt Mutual Funds](#)

How Floating Rate Debt Mutual Funds Reduce Interest Rate Risk

 freefincal.com/floating-rate-debt-mutual-funds-reduce-interest-rate-risk/

2/22/2017

There are two main risks associated with a debt mutual fund: capital losses due to (1) an increase in interest rates since old bonds are not as valuable as new bonds that offer higher rates; (2) an actual default in the payment of interest or the possibility of default. In this post, I shall introduce a little-known class of fixed income funds - the floating rate debt mutual fund and discuss how it reduces interest rate risk.

I have covered both the above-mentioned risks in detail before and I would urge new readers to have a look at them:

[Understanding Interest Rate Risk in Debt Mutual Funds](#)

[Understanding Credit Rating Risk in Debt Mutual Funds](#)

[Debt Mutual Funds: Credit Risk and Interest Rate Risk Can Co-exist!](#)

It is easy to understand how interest rate risk can be minimised *theoretically*. If the rates are about to fall, buy long-term bonds (usually gilts, but others too). The NAV of the fund would then increase if rates drop. Then hold on to them until rates are low and when they are about to increase again, sell them for a profit and shift to low-duration bonds that will not be affected as much when rates head north again.

This is the main mandate of dynamic bond funds. However, very few fund managers get this right and most of them are only a notch less risky than long-term gilts funds. This is why I recommend [not buying dynamic bond funds](#).

Interest rate risk can be minimised with the help of floating rate bonds. This post is about how funds that use such bonds operate. **I do not recommend buying such funds. This post is for information and my education only.**

Floating Rate Bonds

Typically a bond has a fixed coupon rate. That is if a bond is purchased for Rs. 1000 and a coupon rate of 8% will pay out an annual interest of $8\% \times 1000 = \text{Rs. } 80$. until the bond matures.

If my aim is to buy and hold, there is no problem. However, if I wish to sell the bond mid-tenure or if I am managing an open-ended debt mutual fund where the NAV depends on market value, I need to worry about the bond's current market price.

If new bonds are available at 9%, then my bond will sell at a discount. If new bonds offer only 7% then I can demand a premium for mine if I wish to sell.

In a floating rate bond, the current market price of the bond is quite close to its face value (rs. 1000 above), but the interest rate payments will change with rate movements.

So one way to gain from interest rate movements is to buy more of such floating rate bonds when rates are about to move up, and shift to fixed rate bonds when they are about to fall. Of course this again, in theory as rate movements are not easy to predict (nothing related to the market is).

There are other methods by which rate sensitivity can be reduced.

1 Interest Rate Swaps

Suppose I hold a fixed rate bond and another party (call it 'X') holds a floating rate bond. I expect rates to move up and therefore ask X for an exchange of interest rate payments.

That is, I would receive his floating rate interest payments (less a price) and X would receive my fixed rate payments (plus a fee).

If my expectation goes to plan, I would receive more interest (due to rate hike) than X after all fees/expenses. If my call goes wrong, then I would lose interest. Or if X is not trustworthy, I would lose all interest payments.

However, the actual principal invested in the bonds are not swapped. Only coupon payments.

Conversely, if I am holding a floating rate bond and expect rates to fall, I would swap it for a fixed rate bond.

This is a simplistic explanation of a rate swap. Floating rate funds employ such swaps to a good extent.

2 Forward Rate Agreements

Reinvestment risk is an interest-rate risk that very few consider. Three years ago, If I had opened a bank FD, I would have got 8.5%. After maturity today, if I reinvest, I will get only about 7% or so. This is the reinvestment risk when rates fall in future.

A forward rate arrangement (FRA) is an agreement between two parties to pay *only the excess interest rate*. That is if current FD rates are 7% and I expect them to fall to 6% after a year, then I can reduce this reinvestment risk with a FRA.

In a FRA, I agree to pay or receive the difference between the current FD rate (7%) and say the RBI policy rate *after a period of time*. If the policy rate falls to 6%, then I will receive interest payment corresponding to the difference: 1%. So I will reinvest a little extra at a new lower rate, mitigating my loss.

If the rates move up to 8%, then I will have to pay the difference: 1%. I will lose some money but gain it over time as the new rate is higher.

3 Interest Rate Futures

Suppose I buy a bond for Rs. 1000 today and expect rates to increase in future (say 6 months). This means his bond will lower in value. So I enter into a contract with another party to sell the bond at say Rs. 1005 after 6 months. This is known as a futures contract.

If after 6 months, the rates fall and the price of the bond drops to Rs. 950, I make a loss of Rs. 50 when I sell my bond. However, the other party promised to buy it from for Rs. 1005. So I make a profit of Rs. 55 in my futures contract. The net profit is Rs. 5.

By buying and selling a bond and its futures contract at the same time, I reduce or hedge interest rate risk.

Read more about such transactions:

[How Arbitrage Mutual Funds Work: A simple introduction](#)

There are other types of fixed income arbitrage and this is only a simplistic introduction to arouse interest.

Floating Rate Mutual Funds In India

Floating rate funds employ a combination of strategies, some of which are mentioned above to reduce rate risk.

These are funds with "floating" in their name (duh!!). Many other debt funds use swaps, FRA and IFs. So this is not an exhaustive list. The categories are mentioned to the right as classified by VR. UST is ultra short-term, ST is short-term.

Birla Sun Life Floating Rate Fund - Long Term Plan	UST
Birla Sun Life Floating Rate Fund - Short Term Plan	Liquid
DHFL Pramerica Short Term Floating Rate Fund	UST
HDFC Floating Rate Income Fund - Long Term Plan	ST
HDFC Floating Rate Income Fund - Short Term Plan - Wholesale Plan	UST
L&T Floating Rate Fund	UST
Reliance Floating Rate Fund - Short Term Plan	ST
UTI Floating Rate Short Term Fund - Regular Plan	UST

The standard recommendation is that floating rate funds do well when rates are expected to increase. This means that they would do not so well when rate falls or at least not gain as much.

I am surprised that none of these floating rate funds has a dominant gilt exposure. So from what I see, they seem to be mitigating interest rate risk associated with PSU, bank and corporate bonds. Which makes me wonder if this is even necessary! So my recommendation would be, explore more about these if interested, but do not invest in them. At least not before understanding more about them.

How to Select Mutual Fund Fixed Maturity Plans (FMP)

A mutual fund Fixed Maturity Plan (FMP) is a closed-ended debt mutual fund. A discussion on how and when to choose FMPs.

A closed-ended mutual fund is one in which no purchase or redemption can be made after the new fund offer (NFO) period. The scheme has a fixed maturity date and unitholder can redeem from the AMC only after that date. These schemes are listed on the exchange and in principle can be bought and sold with a Demat account in the secondary market. However, this is unlikely and most closed-ended mutual funds do not have any liquidity.

Before we begin, You Can Be Rich With Goal-Based Investing -my new book with Subra(money.com) - published by CNBC TV 18 has a detailed account of equity and debt mutual fund selection. It is now available at a discount of 33% off for ₹267 (Amazon Prime members) and ₹307 for others. link to [AmazonOpens in a new window](#)This is most likley a weekend discount.

What is a Fixed Maturity Plan?

A fixed maturity plan is a one such closed-ended mutual fund which invested in fixed income securities - bonds offered by banks, PSUs, corporates, GOI, cash and even debt arbitrage. There is a wide spectrum of FMPs and only those that understand where the fund will invest should choose them or any mutual fund for that matter.

Although the NAV of the FMP will be marked-to-market - the *value of bonds will fluctuate with supply and demand forces driven by interest rate and credit rating changes* - the fund manager will typically not actively trade these bonds. She would buy the bonds and hold them until maturity.

Therefore, even if the NAV fluctuates (+ve or -ve), it will recover* when the bonds held in the portfolio mature. A dramatic example of this in an FMP can be found here: [Debt Mutual Funds: NAV Recovery after Credit Rating Downgrade](#)

* If the bond issuer does not default.

Therefore, as long as the fund manager has done her research well and chosen credit-worthy bonds, the risk associated with an FMP is lower than an open-ended debt mutual fund.

If I can afford to lock my money for the next 3-4 years (often only a gamble as future money needs are uncertain), then I can afford to choose an FMP that invests in PSU or corporate bonds that mature over that time period.

If there are no defaults (not rare!), then I can expect to earn the indicative yield mentioned in the scheme information document. Which us to:

Who Should Invest in FMPs?

Only an investor who is not lazy enough to download the scheme information document (SID) from the AMC website and understand the scheme

- the scheme objective
- intended asset allocation
- investment strategy

- risks
- indicate yield

And most investors are lazy. They want pre-packaged, sorry make that pre-digested information. Good luck finding that for an FMP NFO.

An FMP is less liquid than a fixed deposit. The money will be practically locked in until maturity. So tread with caution. FMPs are not suitable for most retail investors who have only a small investible surplus to spare.

In certain situations, an FMP makes sense. For example, say you have just become a parent or just got married and received a gift of say, Rs. 5000 or Rs. 10,000. This is not money that you going to depend on in future (if). Then you can put that in FMPs and keep rotating them **IF** that kind of asset allocation would be suitable for your future needs. Just an example. Don't read too much into it.

Tax treatment of FMPs

Any mutual fund which holds less than 65% of Indian stocks on average over a year is a non-equity mutual fund as far as the income tax department is concerned. So is FMP.

The capital gains arising from units purchased less than *or equal to* 3 years ago will be added to income and taxed as per slab. Gains from units older than 3 years is taxed at a flat 20% (+cess) with indexed capital gain.

During periods of high-cost inflation, the gains from an FMP could be tax-free. By the same token, during periods of low inflation, the gains would be considerably less, even before tax. And after-tax not very different from FDs.

Where do FMPs invest?

Anywhere and everywhere in the fixed income universe! To find out, go to

<https://www.valueresearchonline.com/funds/fundselector/>

and use the following settings: *Exclude* commission-based (regular) plans, open-ended plans (yes, there are open-ended FMPs too!! Also known as interval funds. More on this in a separate post)

The screenshot shows the 'Debt: FMP' filter settings on the Value Research Online website. The interface is divided into three main sections:

- Search by Fund House:** A list of fund houses with checkboxes, including Axis, Baroda Pioneer, Birla Sun Life, BNP Paribas, BOI AXA, Canara Robeco, DHFL Pramerica, DSP BlackRock, Edelweiss, Escorts, Franklin Templeton, and HDFC.
- Search by Fund Category:** A list of categories with checkboxes. 'Debt: FMP' is checked and highlighted with a red arrow. Other categories include Debt: Dynamic Bond, Debt: Gilt Medium & Long Term, Debt: Gilt Short Term, Debt: Income, Debt: Liquid, Debt: Others, Debt: Short Term, Debt: Ultra Short Term, Equity: Banking, Equity: FMCG, and Equity: Infrastructure.
- Exclude:** A list of options to exclude with checkboxes. 'Regular Plans' and 'Open-ended' are checked and highlighted with red arrows. Other options include Fixed Maturity Plan (FMPs), Plans Suspended for Sales, Direct Plans, Closed-end, 5-Star Funds, 4-Star Funds, 3-Star Funds, 2-Star Funds, 1-Star Funds, and Not Rated.

At the bottom left, there is a red button labeled 'Update Fund List'. At the bottom, the 'Categories:' dropdown menu shows 'Debt: FMP' selected.

You would then get a list of ongoing FMPs. **You cannot invest in any of these!**

Do not waste time over analysing the returns they have made. Each FMP is different and so will be the returns be. Also, current bond yields would be very different. So unless you check the SID, you cannot get an approximate idea of the return expected from an FMP.

This exercise is to understand different types of FMPs and how returns can vary. **Remember:** When it comes to debt funds, higher the returns, lower the credit quality!

Now click on the portfolio tab in the above page.

Snapshot	Returns	Portfolio	Risk Stats	NAV Details	Fees & Details		
Download Data							
Fund Rating	Equity Fund Style	Market Cap (Cr)	Turnover (%)	Bond Fund Style	Average Credit Quality	Average Maturity (Yrs)	Net Assets (Cr)
HDFC Fixed Maturity Plans - 3360 Days - March 2014 (1) - Direct Plan	-	-	-	GOI/Cash	6.41	521	
ICICI Prudential Fixed Maturity Plan - Series 74 - 9 Years - Plan U - Direct Plan	-	-	-	High	6.04	27	
Tata FMP Series 46I Direct	-	-	-	High	0.08	27	
ICICI Prudential FMP Series 70 367 Days Plan N Direct	-	-	-	High	0.02	0.25	
Kotak FMP Series 107 Direct	-	-	-	Cash	0.003	4	
Kotak FMP Series 113 Direct	-	-	-	Cash	0.003	4	
Kotak FMP Series 115 Direct	-	-	-	Cash	0.003	3	
Kotak FMP Series 116 Direct	-	-	-	Cash	0.003	9	
L&T FMP Series X Plan E Direct	-	-	-	Cash	0.003	45	
SBI Debt Fund Series 36 Months 7 Direct	-	-	-	Cash	0.06	39	
Sundaram FTP ES Direct	-	-	-	Cash	0.02	7	
Tata FMP Series 45D Direct	-	-	-	Cash	0.07	8	
HDFC FMP 554D Nov 2013 (1) Direct	-	-	-	BB	0.619	121	
Axis Fixed Term Plan - Series 61 (1122 Days) - Direct Plan	-	-	-	AAA	0.4	27	
Axis Fixed Term Plan - Series 64 (1877 Days)	-	-	-	AAA	2.07	8	

Click on average (portfolio) maturity column - to arrange in ascending order. Notice that there are FMPs which are basically liquid funds with an average maturity of 0.003 Years (~ 1 day!!) to 6.41 years (long-term gilt funds + cash).

Click on average credit quality to arrange in ascending order. Cash or Gilt (GOI) to AAA to A.

Click on bond fund style and hover over the square to understand its placement.

You can download this data as a spreadsheet and play around with it too.

The tenure of the FMP need not match with the average portfolio maturity. The latter can be much less (not more). So within the holding period, the fund manager can use the gains from a matured bond and buy more that mature before the closing date of the fund.

There are no FMPs below (or equal to) 3Y today. Just in case, be sure to select one that matures in 1096 days or more. Not 1095 days (365 x 3) - then you will have to pay tax as per slab!

So once you are comfortable, you can decide what kind of FMP you would like to invest in.

Over to the Scheme Information Document

Here are some extracts from the (randomly chosen)SID of [UTI FTIF Series XXV-XII _1198 days Opens in a new window.](#)

Reading suggestion from the table of contents.

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Fundamental attributes

II. INFORMATION ABOUT THE SCHEME

A. TYPE OF THE SCHEME

UTI-Fixed Term Income Fund – Series XXV – XII (1198 days) is a close-ended income scheme with scheme tenure of 1198 days.

B. WHAT IS THE INVESTMENT OBJECTIVE OF THE SCHEME?

Investment objective: The scheme aims to generate returns by investing in a portfolio of fixed income securities maturing on or before the date of maturity of the scheme. However, the scheme does not guarantee / indicate any return. There is no assurance that the funds objective will be achieved.

C. HOW WILL THE SCHEME ALLOCATE ITS ASSETS?

Asset Allocation (% to NAV):

Under normal circumstances, the asset allocation under the schemes will be as below

Instruments	Indicative Allocation (% of Net Assets)		Risk Profile
	Minimum	Maximum	
Debt Instruments	80%	100%	Low to Medium
Money Market Instruments	0%	20%	Low

The scheme will invest only in a portfolio of fixed income securities that mature on or before the date of maturity of the scheme as per SEBI guidelines contained in SEBI Circular No SEBI / IMD / Cir No 12 / 147132 / 08 dated Dec 11, 2008.

How to Estimate FMP Returns

If you knew where the FMP would be investing, it is easy to make a conservative estimate of returns. The following two snapshots from the SID are crucial.

Intended Portfolio allocation:

Instruments	Credit Rating					
	A1	AAA	AA	A	BBB	Not Applicable
CDs	-	-	-	-	-	-
CPs	-	-	-	-	-	-
Non Convertible Debentures (NCDs)*	-	80%	20%	-	-	-
Government Securities / Treasury Bills/ Reverse Repos / CBLO	-	-	-	-	-	-

* Includes CDs issued by select All-India Financial Institutions permitted by RBI from time to time.

(v) Types of security issuance and eligible investors:

Issuer	Instruments	Yields (as on 28.10.2016)	Maturity	Investors
Central Government	Dated Securities	6.53% - 7.20%	1-30 years	Banks, Insurance Co, PFs, MFs, PDs, Individuals, FPI
Central Government	T-Bills	6.43% - 6.35%	364/91 days	Banks, Insurance Co, PFs, MFs, PDs, Individuals, FPI
State Government	Dated Securities	7.15% - 7.20%	10 years	Banks, Insurance Co, PFs, MFs, PDs, Individuals
PSUs Corporates	Bonds	7.30% - 7.52%	5-10 years	Banks, Insurance Co, PFs, MFs, PDs, Individuals, FPI
Corporates (AAA rated)	Bonds	7.20% - 7.50%	1-10 years	Banks, MFs, Corporates, Individuals, FPI
Corporates	Commercial Papers	6.72% - 7.45%	15 days to 1 yr	Banks, MFs, Fin Inst, Corporates, Individuals, FPIs
Banks	Certificates of Deposit	6.40% - 6.93%	15 days to 1 yr	Banks, Insurance Co, PFs, MFs, PDs, Individuals
Banks	Bonds	7.70% - 8.00%	10-15 years	Banks, Companies, MFs, PDs, Individuals

The scheme can invest in both Bank, PSU and corporate NCDs of AAA (80%) and AA quality. So I see that 1Y corporate AAA bond have a yield (IRR) of ~ 7.2%.

Therefore, I can assume that the FMP would offer a return of about 7% conservatively. Whether this return is good enough (compared to an FD) or if should consider another FMP etc. are questions that I need to ask and answer from a personal perspective (Speaking of which, I value liquidity of a portfolio above all else and will not use FMPs).

In conclusion, FMPs can be used intelligently by an informed user who understands the pros and cons of the instrument.

What should investors new to debt funds do?

Stay away from any debt fund with an average maturity profile greater than one year.

Read more:

[Debt Mutual Funds: Risk vs. Reward](#)

[How to choose debt mutual funds with no credit risk and low volatility](#)

Introduction to Interval Income Mutual Fund Schemes

 freefinancial.com/introduction-interval-income-mutual-fund-schemes/

12/27/2016

An interval income mutual fund or more generally, interval funds is a lesser known class of mutual funds that are open for subscription and redemption only at specified time intervals. A discussion about their main features and how to use them.

An open-ended mutual fund allows purchase and redemptions on all business days. A closed-ended fund is "open" only during the New Fund Offer period. Thereafter, it is closed but can be transferred to someone else via the stock exchange. A Fixed Maturity Plan (FMP) is one of the well-known types of closed-ended mutual funds.

It is important to understand how FMPs work before looking at interval funds. Therefore, I would suggest that you first read [How to Select Mutual Fund Fixed Maturity Plans \(FMP\)](#) and then come back here.

An interval fund is one that is open for subscription only at the end of a specified interval period - monthly, quarterly or yearly or more.

In terms of investment strategy, it resembles a fixed maturity plan: choosing bonds that maturity on or before the interval duration.

For example, consider [Birla Sun Life Interval Income Fund - Annual Plan IX Opens in a new window](#). This has an interval of 368 days. Meaning, the fund will remain closed for 367 days after the NFP period is over. On the 368th day or the next business day, it will open for purchase and redemptions for two days. Then will be closed for 367 days and open again for two days and so on.

Like an FMP, although the daily NAV will react to bond market movements, the maturity value is independent of interest rate risk. However, it is subject to credit risk. If a bond issuer defaults, the NAV will fall - significantly.

To learn more about these risks,

[Understanding Interest Rate Risk in Debt Mutual Funds](#)

[Understanding Credit Rating Risk in Debt Mutual Funds](#)

[Debt Mutual Funds: Credit Risk and Interest Rate Risk Can Co-exist!](#)

List of Interval Mutual Funds

To get a list of interval funds, go to

<https://www.valueresearchonline.com/funds/fundSelector/>

Select Categories: **Debt FMP**

Exclude: **Regular plans, Closed-ended funds and plans suspended for sales.**

Debt: FMP		Compare funds in My Portfolio		Fine tune the fund selection			
Categories:		Debt: FMP					
Exclusions:		Plans Suspended for Sales		Regular Plans		Closed-end	
Snapshot	Returns	Portfolio	Risk Stats	NAV Details	Fees & Details	Download Data	
Fund Rating	Equity Fund Style	Market Cap (Cr)	Turnover (%)	Bond Fund Style	Average Credit Quality	Average Maturity (Yrs)	Net Assets (Cr)
Reliance Interval Fund IV Series 3 Direct Plan	-	-	-	Grid	AA	1.7	68
Reliance Interval Fund IV Series 2 Direct Plan	-	-	-	Grid	AA	1.57	118
Birla Sun Life Interval Income Annual Plan IX Direct	-	-	-	Grid	AAA	0.85	145
Birla Sun Life Interval Income Annual Plan V Direct	-	-	-	Grid	AAA	0.43	61
Birla Sun Life Interval Income Annual Plan X Direct	-	-	-	Grid	AAA	0.83	25
Birla Sun Life Interval Income Quarterly Series I Direct	-	-	-	Grid	Cash	0.14	4
Birla Sun Life Quarterly Interval Series 4 Direct	-	-	-	Grid	Cash	0.01	0.55
DHFL Pramerica Interval Annual Plan Series 1 Direct	-	-	-	Grid	AAA	0.78	55
HDFC Annual Interval Series I Plan A Direct	-	-	-	Grid	AAA	0.449	61
HDFC Annual Interval Series I Plan B Direct	-	-	-	Grid	AAA	0.436	32

You will see that there are different types of interval funds. Some hold cash (money market) and some corporate, PSU and bank bonds of varying credit quality.

Those who wish to invest in interval funds must read the scheme information document and understand the intended asset allocation and associated risks. An indicative return can also be calculated as described in the FMP selection guide above.

How to use Interval Mutual Funds

First, we need to recognise their lack of liquidity. Although they can be traded with a Demat account, this only remains a theoretical possibility. Redemptions are possible only when the fund opens after the interval period.

In the case of an FMP, the duration is nowadays more than 3 years because of taxation benefits. In case, of interval funds, it can still be monthly or yearly.

One can buy more units each month or each quarter as part of a long-term debt portfolio, but the lack of liquidity is a major disadvantage. One can also use this to invest salary bonuses each year.

In essence, an interval fund is an FMP where the units do not mature and can be held for as long as one desires, and exit at the end of the designated interval. One can also add more units at that time. This can be more convenient than opening multiple FMPs. By choosing a shorter time interval (say monthly), the lack of liquidity can be tackled.

Smart Ways to Invest in Corporate Fixed Deposits

 freefinancial.com/smart-ways-invest-corporate-fixed-deposits/

1/18/2017

Have you ever wondered why a corporate fixed deposit offers a higher rate of return than a bank deposit? Have you ever considered investing in corporate FDs, but worried about the "risks"? In this post, I simple ways to invest in corporate fixed deposits.

Before we begin, allow me to point out that You Can Be Rich Too With Goal Based Investing is now available at Rs. 307 - a 23% discount at [Amazon.in](#) Opens in a new window or at [Infibeam](#) Opens in a new window for at the same price plus an additional 10% discount with coupon code REPUBLIC10

The reason why corporate FDs offer higher return is because their reputation is not as good as a bank FD. So if we look at only the return, we ignore the risk. If we look at only the return, then we have to settle for less. There is a middle path via debt mutual funds.

Before we consider the types of debt mutual funds to invest in, let us ask another question: What is the difference between Equity [Mutual Fund Investing vs Stock Investing](#)? This is key to understanding the difference between a debt mutual fund and corporate FD.

A stock investor typically has anywhere between 5-15 stocks (above that it is a mutual fund folio!). The risk is concentrated in these stocks and so is the reward. A fund manager cannot by design afford to take such concentrated bets. A fund cannot hold more than 10% of a stock. This dilutes both the risk and (potential) reward.

So a person who can afford to take such a concentrated risk can choose direct equity over mutual funds. The reward may or may not be higher. It is stupid to assume any old joe can be a fund manager.

The analogy with corporate FDs should be clear. Buying a corporate FD is taking a highly concentrated risk, even if the issuer is AAA rated. If the rating drops, interest payments will get delayed and there could also be a default.

A debt mutual fund spread this risk across a basket of corporate FDs (and other types of bonds) - the same 10% limit now applies to debt funds also after the [JP Morgan Debacle](#).

There are three choices here, each with its own pros and cons.

Open-ended income funds

Open-ended income or corporate bonds funds is probably the most straight forward choice. A fund link Franklin Corporate Bond Opportunities with an average portfolio maturity of 3-4 years can be used for long-term goals 10s of years away.

Pros: Open to subscription and redemption at all times. So one can conveniently invest each month and rebalance at will.

Cons: If the credit rating of a bond in the portfolio is degraded, the NAV will fall. Investors may panic and start redeeming. SEBI now has rules that prevent AMC's from limiting redemptions unless there is a market-wide crisis.

So if a single bond fails, redemptions cannot be stopped. The AMC may panic and sell it at a loss. This will result in a permanent loss in NAV.

A credit rating downgrade will result in a temporary NAV drop IF the issuer honours all payments and gives back the

principal on maturity. Here is an example: [Debt Mutual Funds: NAV Recovery after Credit Rating Downgrade](#)

Closed-ended Debt Funds: Fixed Maturity Plans

If you do not know what a fixed maturity plan (FMP) is, then I suggest you read this and then come back here: [How to Select Mutual Fund Fixed Maturity Plans \(FMP\)](#)

Pros: Typically if an FMP has a tenure of 3 years, the bonds in the portfolio will match that tenure. Since the fund is closed, there will be no panic selling if a bond is degraded.

Cons: FMPs these days have a minimum tenure of 3 years. They are not liquid and the money will be locked-up till maturity. This makes portfolio management and monthly investing impossible with FMPs. Unless one buys a new FMP each month, which would be silly.

Semi- closed-ended Debt Funds: Interval Funds

An interval fund will remain closed for subscription and redemption for a specified interval, open for about two days, when the money can be redeemed and more invested and then close for the interval and so.

For example, a fund can be closed for 367 days after the NFO period, open for transactions in the 368 and 369th day and then remain closed for next 367, open for next two days and so on.

Those two days are known as specified transaction period (unfortunately called STP - not to be confused with systematic transfer plan)

Read more about them here: [Introduction to Interval Income Mutual Fund Schemes](#)

Pros: The fund can only hold that mature on or before the interval period: 367 days in the above example. So if I choose an annual interval fund, I take a bit more risk than if I choose quarterly or monthly interval funds. This helps the investor control the credit risk they take, much better than the other two options.

One can invest in old interval funds during the next STP. One cannot invest in old FMPs.

FMPs have an interval of minimum 3Y+1day to escape short term taxation as per slab. Interval funds (at least the old ones) do not have to set the interval based on tax rules.

Monthly, quarterly or annual investing is possible with interval funds.

Cons: They are not popular, have low AUM and could close if there is not enough interest among investors (a pity because it is a great way to invest in corporate bonds).

Just like FMPs, fast-food-free-lunch is not available. One will have to read the scheme information document to understand where the scheme will invest. Not suitable for lazy investors.

They are illiquid in between two STP periods - 367 days in the above example.

For those who can handle NAV ups and downs, open-ended income funds are simpler and can be used for medium and long-term goals. Interval funds can be used to invest say once a year if that is convenient.

Defer taxes to power compounding!

 freefincal.com/defer-taxes-to-power-compounding/

9/2/2016

A financial instrument that lets you defer paying taxes until maturity is way superior to one where you need to report and pay tax on the income generated each year of investment. That is the single most important reason why debt mutual funds are superior to fixed deposits. This is an illustration of the power of compounding with deferred taxation, suggested by subra(money.com).

I have already illustrated this point here: [Budget 2014: Debt Mutual Funds vs. Fixed Deposits](#) and in other posts. Subra felt it would nice to have a generic deferred taxation calculator and hence this post.

First let us look fixed deposits alone. There are two ways in which you can pay taxes: (1) pay each year, (2) pay upon maturity. A court has ruled that every citizen has a right to choose the style of accounting and taxation – pay each year or upon maturity. However, they cannot change style once made. More details about this with documentation can be found here: [Debt Mutual Fund vs. Fixed Deposit Comparator – Version II](#)

Unfortunately FDs and RDs have TDS. This means that even if you choose to pay tax upon maturity, 10.3% tax as TDS would get deducted each financial year. Therefore it would be a mess to split the taxation in two different ways – TDS, and maturity) from the point of view of ITR. In today's connected world, the ITO is already serving up pre-filled ITR forms. The banks have our PAN no and we declare bank details while filing.

So sooner or later, the TDS would be an auto-filled entry when we set to file ITR. Therefore, deferring tax on FD until maturity can be a nightmare if the IT dept senses a red flag and calls an enquiry. One may quote rules, but there is no guarantee that the assessing officer would buy that.

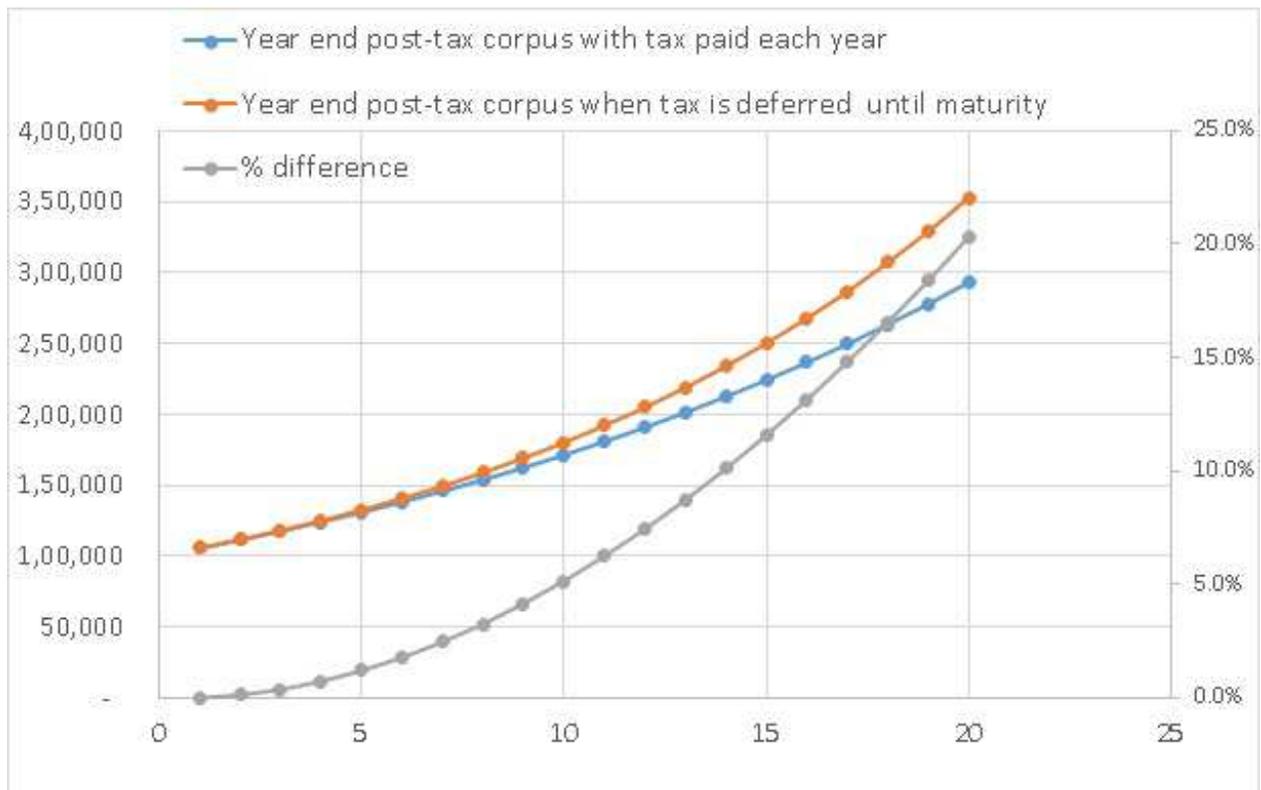
Conclusion: Even if you don't have to, it is prudent to pay tax on FD interest each year.

As a simple illustration of the power of compounding with deferred taxes, consider a fixed deposit where gains are taxed as per slab with no TDS.

For an individual in the 30% slab investing 1,00,000 in a (hypothetical) 20 year(FY) old fixed deposit at 8% return compounded annually, the final corpus

1. by deferring tax upto maturity is 3,52,972
2. by paying tax each financial year is 2,93,328

A difference of 59,644 or about 20% more. This is simply because, by paying tax on the gains each year, the amount left to compound is lesser. Higher the duration, more would be the impact.



Note: It is innumeracy to argue that the FD grows untouched and I paying taxes out of a different pocket and not disturbing the compounding.

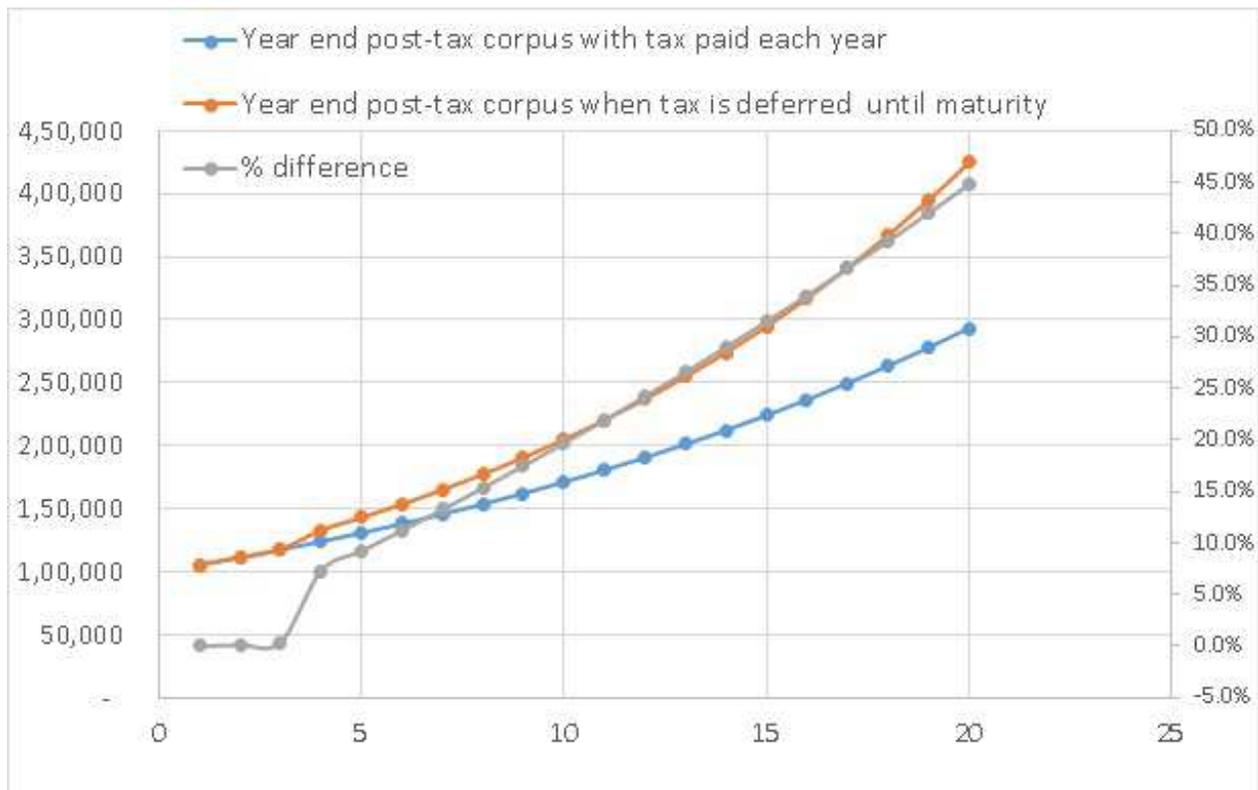
Now instead of a fixed deposit, had a debt fund been chosen, 8% before tax is a pretty reasonable return over 20 years. Before 3 years (if redeemed) the gains would be taxed like a fixed deposit – added to income and taxed per slab.

After 3 years, the tax rates is 20.6% and the gains will have to be calculated after hiking the investment amount by the cost inflation index. For the present illustration we will assume that cost inflation index grows each year at the rate of 5% (again reasonable).

So we have,

1. by paying tax each financial year, the 20-year FD maturity value is 2,933,280
2. by deferring taxes until redemption and using indexed capital gains for taxation, the maturity value with a debt fund is, 4,24,738.

A difference of 1,31,410 – deferring taxes and taking advantage of the lower tax slab results in a significant difference (~ 45%) in corpus.



These illustrations may seem obvious to you.

Now what if the tax slab of the person was 10% for the next 20 years? Entirely possible for a retiree. Should such a person invest in fixed deposits or in debt funds?

For each of those 20 years, the FD would be taxed at 10%. For the first 3 years, the debt fund would be taxed at 10% and then 20% with indexation (when redeemed).

As counterintuitive as it seems, the debt fund is better!

For 1,00,000 invested, the FD (with 10% tax paid out each year) would yield, 3,99,900

The debt after 20 years (with 20% tax on indexed gains) would yield 4,24,738.

This is only a 6% difference and once argue the comfort of FDs is better for those in the 10% slab. I agree with that. However, I think it is clear that deferring taxes powers compounding.

Here is a calculator with which you can play around to get a feel for this idea.

[Download the power of compounding with deferred taxation calculator](#)