Advanced Concepts & Strategies In Asset Location

Executive Summary

- Effective asset location is primarily a function of two factors: an investment's tax-efficiency, and its expected return. Investments that are high-return and tax-efficient belong in a taxable brokerage account, while those that are high-return and tax-*in*efficient belong in a retirement account. Asset location generally doesn't matter for investments that are relatively low return, as avoiding tax drag for better compounding has limited value when there isn't much growth to compound in the first place.

- The asset location picture becomes slightly more complex when a third type of account – the Roth (or generally, tax-free) account – is included in the analysis. However, in practice the inclusion of Roth-style accounts is relatively straightforward: the highest return tax-inefficient investments that would have gone into an IRA anyway simply go into the Roth instead to maximize the tax-free growth. To the extent there aren't any high-return investments already allocated to the IRA, high-return investments in a brokerage account can be redirected to the Roth, as even a tax-efficient high-return investment is still less valuable than a tax-free one!

- With other types of accounts – such as 529 college savings plans or health savings accounts – investors must be more cautious. While asset location can still be optimized across such accounts, if the funds are earmarked for a nearer-term goal – by virtue of the tax-free status associated with the account – an inappropriately high-risk asset may be associated with a short-term goal. As a result, asset location can be done across multiple account types, but should generally only be done across accounts being used for the same goal (or at least, multiple goals with a similar time horizon).

- Because IRAs are by their very structure pre-tax accounts, asset location decisions amongst IRAs and taxable accounts can actually distort the asset *allocation* of the household's net worth. The reason is that ultimately, an IRA functions as a partnership between the investor and the government, where each owns a share of both the principal and the growth; as a result, when looking at *just* the investor's holdings, asset allocation on an after-tax basis may be materially different than its apparent pre-tax value.

- Adjusting for after-tax asset allocation can also impact an investment's after-tax volatility as well, due to the fact that the government shares in a different percentage of certain types of accounts over others. This essentially results in stocks and bonds held in taxable accounts functioning as different asset classes than stocks and bonds held within IRAs, with different after-tax returns and different after-tax volatility. In turn, mean-variance optimization based on these asset classes may tilt equities towards brokerage accounts, at least in the short term, given what is effectively a lower after-tax volatility for equities held in this manner.

- Advisors should be cognizant that asset location strategies can impact the client psychology of investing, where different accounts may have substantially different performance results due to holding completely different asset classes. While this may still be fully justified on the basis of the household's overall asset allocation and volatility, advisors should be prepared to have clients "mentally account" for each account separately, and ideally should report investment results on a consolidated household basis to reduce any tendency to focus narrowly on one account at a time.

- Ultimately, most advisors will implement asset location using rebalancing/trading software that can help to maintain and systematically apply an asset location priority list. Even with technology support, though, advisors will still need to establish and maintain a proper asset location priority list. Systematizing the advisor's overall investment process will likely make it easier to consistently implement asset location strategies.

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Introduction

With the complexity of today's tax environment, maximizing after-tax wealth is about more than just establishing a properly diversified multi-asset-class portfolio. Holding investments in a manner that maximizes their after-tax return means not only knowing what to invest in, and when to sell it, but also in which account it should be held in the first place, whether a taxable brokerage account, a tax-deferred account, or a tax-exempt one (if available).

In last month's newsletter, we examined how these "asset location" decisions require an analysis of the different tax treatment of various accounts, along with the tax-efficiency and expected return of the available investments, in order to create an "asset location priority list" that ensures the right investments are placed in the right accounts.

In this month's newsletter, we take a deeper dive into asset location concepts and strategies, including a look at how the introduction of Roth-style accounts adds further complexity, the potential to "create" new asset location accounts (e.g., non-qualified deferred annuities) to take advantage of tax-deferral, and how viewing investments on an after-tax basis can impact not only the asset allocation itself but also the after-tax volatility of an investment that can itself further change asset location priorities. In addition, we also look at some of the practical implementation challenges, and some of the client psychology and communication issues that arise in trying to effectively implement asset location.

An Overview Of Asset Location

A proper asset location decision is driven by two fundamental factors: the tax-efficiency of the investment, and its expected return.

Not surprisingly, the priority for a tax-inefficient investment (e.g., high-yield bonds) is towards a tax-preferenced account like an IRA, while a tax-efficient investment (e.g., an equity index fund) is towards the brokerage account. Or viewed another way, if tax-inefficient investments have lower compounding rates of return due to the "tax drag" of ongoing taxation, then the investments with the greatest tax drag should be the first to get sheltered inside of tax-preferenced accounts.

However, the reality is that evaluating the expected return of the investment is also crucial to a good asset location decision, for the simple reason that an investment with a low expected return doesn't have much tax drag in the first place. Even if an investment is highly inefficient, if there isn't much of a return in the first place, there isn't much additional compounding that can be generated by improving the tax-efficiency with a tax-preferenced account like an IRA!

Accordingly, proper asset location will involve placing investments along the "asset location smile" (shown in Figure 1, below), where the highest return efficient or inefficient investments are at the extremes, and the lower return investments – where asset location doesn't really matter – are in the middle.

Once available investments have been ranked in an "asset location priority list" along the asset location

Figure 1. Asset Location "Smile" For Establishing Priority List

smile, they can then be placed into the appropriate types of taxable brokerage or tax-deferred retirement accounts.

With this approach, assets are placed on an "outside-in" approach, where the investments at the left and right extremes – the highest return investments where good asset location decisions matter the most – are placed in the ideal accounts, until eventually one account type is fully allocated, at which point all remaining investments go to the other account.

Thus, for instance, an investor with $100,000 in a taxable account and $900,000 in an IRA would end out filling the taxable account with the investment(s) that lie furthest to the left of the asset location smile. This ensures that the $100,000 taxable account will hold only those tax-efficient high-return investment(s) that most benefit by being there. Everything remaining will end out in the retirement account. *(For further information on building the asset location priority list and the development of the asset location smile, see the January/February issue of The Kitces Report, or contact feedback@kitces.com to request a copy.)*

What About Roth Accounts?

Thus far, we've only looked at two types of accounts: taxable (e.g., brokerage) accounts, and tax-deferred retirement (e.g., IRA or 401(k)) accounts. However, in reality there is a third type of account as well: the tax-free (or tax-exempt) growth account, such as a Roth IRA or Roth 401(k).

From the planning perspective for asset location, adding in a third type of account introduces more complexity to the analysis, but as it turns out, not dramatically so. The reason is that to the extent that tax-deferred accounts are best served for the higher return tax-inefficient investments, the Roth tax-free account simply carves out the *highest* return tax-inefficient investments for its specialized treatment.

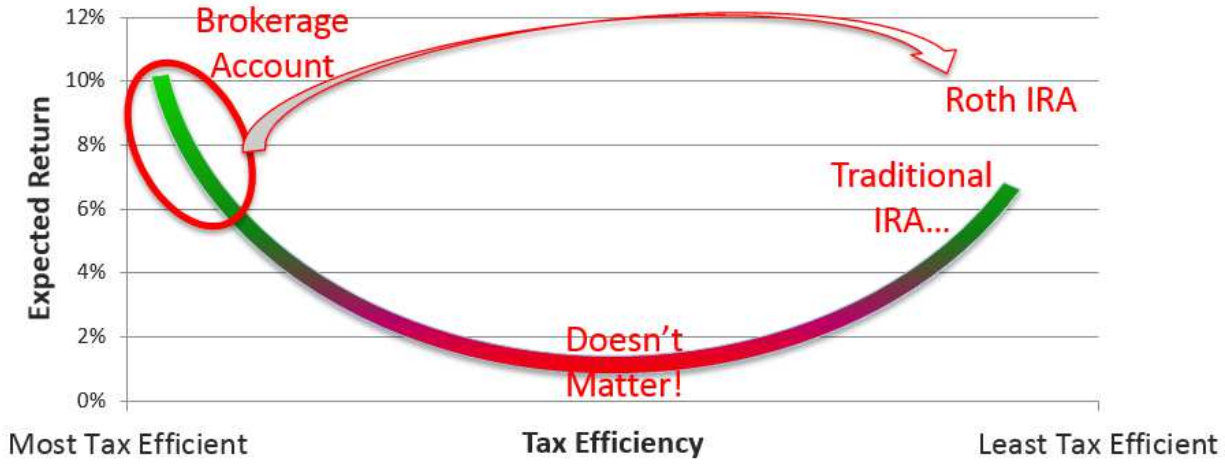
The fundamental reasoning is the same as why high-return tax-inefficient investments are placed into a traditional IRA in the first place – that the benefit of tax-preferenced growth is greatest for investments that have the highest compounding returns, for which the removal of tax drag produces the greatest benefit. In other words, if you have a high-return investment that you thought would benefit from tax-deferred compounding growth, it should only benefit even *more* from tax-*free* compounding growth instead!

Accordingly, Figure 2 below shows an "updated" version of the priority list for asset location, including the placement of a Roth IRA beyond the traditional IRA (or 401(k)) for that subset of the highest return tax-inefficient investments.

However, it's worth noting that ultimately, because even tax-efficient investments in brokerage accounts may ultimately be subject to taxation – e.g., even the bought-and-held index fund is eventually taxed when liquidated for spending – to the extent that there are no high-return tax-*in*efficient investments available, using a high-return efficient-but-still-taxable investment is still superior to using a low-return inefficient investment. In other words, tax-free growth on the highest-return investments still produces the greatest spendable wealth in the future, as shown in Figure 3 (next page).

Figure 2. Updated Asset Location "Smile" For Establishing Priority List Including Roth Accounts

Figure 3. Asset Location "Smile" Including Roth Accounts With Limited High-Return Inefficient Assets



What About Other Types Of Accounts?

Ultimately, even looking at taxable, traditional IRA/401(k), and Roth IRA/401(k) accounts still understates the breadth and depth of available accounts with various tax incentives under the Internal Revenue Code. While all types of accounts fall into one of these three core categories – taxable, tax-deferred, and tax-free – some investors have multiple ways to invest amongst these options. For instance, tax-free accounts include not only Roth-based retirement accounts, but also 529 college savings plans, Coverdell education savings accounts, and Health Savings Accounts as well.

The caveat to incorporating these accounts into the asset location decision-making process, though, is that they often represent a separate "pool" of assets specifically dedicated to a particular goal (which, of course, is why those accounts enjoy preferential tax treatment in the first place). For instance, 529 college savings accounts enjoy tax-free growth specifically because those assets are earmarked for college. Given that separate goals have their own risks, needs, and time horizons, it's not clear that investors would want to incorporate such accounts into their overall asset location decisions. For instance, the fact that a 529 plan is tax free doesn't mean it's a good idea to load it up with tax-inefficient high-return assets that are also highly volatile if the child is going to go to college next year, even if it fits with the overall household asset allocation! The goal associated with the account puts it in a grouping unto itself, separate from the rest of the household asses.

Accordingly, it is perhaps most productive to think of asset location in the context of the goals with which those assets (and accounts) are associated. A large pool of money broadly framed as "long-term" (for retirement and/or other distant goals) might be asset-located together across the household, but mixing goals – especially short-term and long-term ones – can result in sub-optimal allocations for the purpose of achieving those goals, especially since the investments in many types of tax-preferenced accounts must still be earmarked towards a particular goal and expended for that purpose (or fail to be "qualified" expenses, such that distributions may no longer merit their tax-preferenced treatment!).

On the other hand, perhaps one notable exception to this challenge that "most tax-preferenced accounts are too goal-specific to mix the asset location decisions with other

account types" is the deferred annuity, which has comparable limitations to retirement accounts (no early withdrawal penalties beyond age 59 ½), and similar preferential taxation (growth is tax-deferred until withdrawn, then taxed as ordinary income).

The key distinction of deferred annuities, though, is that unlike most other types of retirement accounts, they have no contribution limits, either in terms of the maximum dollar amounts placed into the accounts, or income thresholds to be eligible to contribute. As a result, use of deferred annuities may allow some investors to "create" a new tax-deferred asset location pool of money, which may be especially appealing if investments are otherwise disproportionately concentrated in taxable accounts (see sidebar for further discussion).

Asset Location & Asset Allocation 2.0 – After-Tax Asset Allocation

While the focus on asset location thus far has been primarily about the treatment of *growth* and *future returns* within various types of accounts, there's another factor worth noting when it comes to asset location: the treatment of the *principal* across various types of accounts may be different, too.

In other words, one of the key differences between a taxable account and a pre-tax retirement account is not only that the government shares in different amounts of the gains at different times (one is taxable when sold at capital gains rates, the other is taxable when withdrawn at ordinary income rates), but also that in the case of a pre-tax retirement account, "Uncle Sam" shares in a percentage of the principal, too.

To see why this matters, imagine again that we have an investor with $1,000,000 of liquid investments, with half held in a taxable account and the other half in an IRA. The investor wishes to implement a 50/50 stock/bond asset allocation, and is trying to make a good asset location decision.

As discussed previously, if the equity position will be highly tax efficient (qualified dividends, smaller dividends, eligible for long-term capital gains, low turnover, etc.) it should be tilted towards the brokerage account, while if it's tax-inefficient (non-qualified dividends, large income pass-throughs, short-term capital gains, high turnover, etc.) it should be tilted towards the IRA. Yet the reality is that because a portion of both the income *and the principal*

Deferred Annuities As An Asset Location Vehicle

In the 1980s and 90s when tax rates were higher, variable annuities were a popular tool for tax deferral. Over the past 15 years or so, the primary focus of the annuity industry has shifted to retirement income risk management instead, but as the appeal of such riders has declined in the face of guaranteed income riders with higher costs and more restrictive benefits, variable deferred annuities are once again making a resurgence as a tax-deferred asset location vehicle. The trend has accelerated given the increase in top ordinary income, long-term capital gains, and qualified dividend rates in 2013, not to mention the onset of the new 3.8% Medicare surtax on net investment income.

Of course, the caveat to using a variable annuity compared to other asset location vehicles like IRAs is that the annuity, as a risk management contract, has a cost that must be paid, even if the purpose of buying it was solely for tax-deferral and not the retirement guarantees. However, a new crop of variable annuities, deliberately designed to minimalize any retirement income guarantees – and therefore lower the annuity cost – have begun to emerge, and are making deferred annuities more compelling again as an a tax-deferred asset location vehicle.

At this point, the use of a deferred annuity – given that some costs remain – should still only be done after contributions to other retirement accounts have been maxed out, and only if there are not already sufficient other retirement account assets to shelter the highest return tax-inefficient investments. In addition, using an annuity for tax-deferral will generally work best for those facing the highest tax brackets (including the top 20% long-term capital gains and qualified dividend rates, and the 3.8% Medicare tax); conversely, even with lower cost contracts, the use of an annuity for tax-deferral may not be worthwhile at all for those who fall in the lower tax brackets (especially if eligible for 0% long-term capital gains and qualified dividend rates).

Nonetheless, the reality is that for those who do face high tax rates, and don't otherwise have tax-preferenced accounts available to shelter assets, the potential to "buy" tax-deferral with a low-cost deferred annuity is a strategy to be considered in today's environment!

For further reading, see "Is Variable Annuity Tax Deferral Worth Paying For Again" on the Nerd's Eye View blog at www.kitces.com.

Figure 4. After-Tax Asset Allocation Comparisons

	Gross Value	Gross %	After-Tax Value	A/T %
Stocks in IRA	$500,000	50%	$350,000	**41%**
Bonds in Taxable	$500,000	50%	$500,000	**59%**
Stocks in Taxable	$500,000	50%	$500,000	**59%**
Bonds in IRA	$500,000	50%	$350,000	**41%**

of the IRA will flow to the government (in the form of taxes), when viewed on an *after-tax* basis a shift in the asset location decision *can actually change the household's after-tax asset allocation, too*.

As Figure 4 shows, what appears to be a 50/50 stock/bond mix based on gross account values looks quite different when adjusted for a 30% tax rate on the principal of the IRA. On an after-tax basis, a 50/50 account is suddenly a 41/59 or 59/41 account on an after-tax (A/T) basis – an 18% swing in equities! – depending on whether the bonds or stocks are placed in the taxable account and IRA, respectively!

Of course, that tax associated with a retirement account doesn't have to be paid until the account is ultimately liquidated, but whenever the account *is* consumed the government *will* collect its share. Or viewed another way, the government is effectively a partner in the account and owns a 30% share of it; even if the partnership isn't liquidated for a period of time, it doesn't change the fact that 30% belongs to the government, not the investor, regardless of what assets happen to be held inside the account. Yet in a world of asset location – where a single asset class might be held inside the account – recognizing that the taxpayer only owns a portion of it can itself change the asset allocation, too.

Figure 5. Setting 50/50 *After-Tax* Asset Allocation

	Gross Value	Gross %age	After-Tax Value	A/T %age
Stocks in IRA	$500,000		$350,000	
Stocks in Taxable	*$75,000*	57.5%	$75,000	**50%**
Bonds in Taxable	$425,000	42.5%	$425,000	**50%**
Total	**$1,000,000**		**$850,000**	
Stocks in Taxable	$425,000	42.5%	$425,000	**50%**
Bonds in Taxable	*$75,000*		$75,000	
Bonds in IRA	$500,000	57.5%	$350,000	**50%**
Total	**$1,000,000**		**$850,000**	

Thus, if the investor wanted to maintain an *after-tax* asset allocation that was 50/50 (where the total *after-tax* value of the accounts is $850,000, as shown above), while prioritizing the asset location of stocks or bonds (as appropriate) to the IRA, the asset allocation would theoretically need to be adjusted as shown in Figure 5.

As the chart reveals, given that the pre-tax IRA is worth "less" than the taxable account – due to the fact that the principal is pre-tax – holding $500,000 in one asset class in an IRA and $500,000 in the other asset class in a taxable account is not sufficient to maintain a 50/50 after-tax allocation. Instead, since the total after-tax value of the accounts is $850,000, and the after-tax value of the IRA is only $350,000, then another $75,000 of the asset class in the IRA must be held in the taxable account *as well* to equalize the asset allocation. Thus, if the stocks are tilted into the IRA, another $75,000 must be purchased in the brokerage account (and likewise for buying bonds in the brokerage account if they are also held in the IRA). On a nominal basis, this means the asset allocation must actually be 57.5%/42.5% in *gross* dollars to equalize 50/50 on a *net-of-taxes* basis, and these percentages in turn would vary depending on the exact amount of dollars in the IRA versus taxable account.

A further complication of this adjustment is the fact that not all retirement accounts are *entirely* pre-tax. In a world where clients can make non-deductible IRA contributions – or use nonqualified annuities – it is not always a given fact that a tax-deferred account holding various investments results in a different after-tax allocation; this is only the case in situations where the cost basis of the account is less than its current value. Similarly, one can even make the case that any taxable account that has embedded gains due to prior appreciation should be adjusted for after-tax asset allocation purposes, of not all of the prior gains will be "kept" by the investor in the end. However, no adjustment would apply in the case of a Roth account, as the entire principal is after-tax already and the investor "owns" all of it, as well as all the growth, indefinitely. Notwithstanding these adjustments, it's important to note that this distinction of adjusting the asset *allocation* based on after-tax *principal* is entirely separate from adjusting the asset *location* based on the tax

treatment of *growth*. The asset location principles still determine whether stocks or bonds would go into the IRA (or Roth, or brokerage account); the after-tax asset allocation adjustment just determines how much *more* stocks or bonds might need to be bought/shifted into the other accounts to reach the target asset allocation on an after-tax basis *after* completing the asset location process in the first place.

In other words, asset location isn't impacted directly, but the decision of whether and how much to buy to "fix" the after-tax asset *allocation* will change depending on the asset location decisions and *which* asset classes end out inside the pre-tax retirement accounts in the first place; as shown in Figure 5, $75,000 of "something" must be bought in the taxable account to equalize the after-tax asset *allocation*, but it's not clear whether it will be $75,000 of stocks or bonds until the initial asset *location* process is completed and we know which asset class will be inside the IRA.

Asset Location And Market Volatility

An added wrinkle to the nature of embedded tax liabilities (i.e., the pre-tax principal of an IRA) is that they can not only impact after-tax wealth and therefore after-tax asset allocation; they can impact after-tax market volatility, as well.

For instance, imagine first an investment in a taxable account. If it rises in value, the investor keeps 85% and the government takes 15% (assuming a 15% long-term capital gains rate). If it declines in value, the investor absorbs 85% of the losses, but the government mitigates the last 15% in the form of a deductible capital loss (assuming for the moment that there are capital gains against which the loss can be legitimately deducted/netted to benefit from the deduction at a 15% tax rate). In the end, the fact that the government takes 15% of the gains and subsidizes 15% of the losses effectively means the investor only bears 85% of the upside and downside volatility. Which means if the "normal" standard deviation of equities is about 15%, the after-tax standard deviation would only be 85% of that amount, or 12.75%.

In the context of a pre-tax retirement account, a similar phenomenon occurs. Assuming a 30% ordinary income tax rate, the investor will keep 70% of the investment upside but only bear 70% of the downside as well. *However*, as noted earlier, in the case of a pre-tax retirement account, the investor only owns 70% of the principal as well. Accordingly, since the investor bears 70% of the volatility on 70% of the account balance, the end result is that the standard deviation of gains and losses (which are measured in percentages relative to wealth) remains the same. In essence, if stocks have a 15% standard deviation on a gross basis, they still end out with a 15% standard deviation on a net after-tax basis as well inside the retirement account (just based on 70% of the investor's wealth).

The reason this matters is that we now see a divergence between the after-tax volatility of equities in a brokerage account, versus the same investment held inside of an IRA. Simply put, the after-tax volatility of holding the equities within a taxable brokerage account is lower, because the government shares in the gains/losses but not the underlying principal (unlike the pre-tax IRA, where the government shares in both). And of course, the same effect would apply regarding bonds as well (where those held inside of a brokerage account have less relative after-tax volatility than when held inside of a pre-tax IRA).

In the recent paper "The Asset Location Decision Revisited" in the Journal of Financial Planning, Reichenstein and Meyer (2013) argue that given this framework, investors should view their investments on an after-tax basis not only for asset allocation purposes but also for volatility purposes, such that stocks and bonds held in taxable accounts are treated *as different asset classes* than those held inside tax-deferred accounts, as the (after-tax) expected return and (after-tax) standard deviation are different, as shown below in Figure 6 (assuming stocks earn 8% with 15% standard deviation, bonds earn 5% with 6% standard deviation, no basis in the IRA, and full basis in the taxable account).

Notably, when a mean-variance optimization calculation is run on this mix of "asset classes", the weightings begin to tilt. After all, if an investor is willing to hold a

Figure 6. Gross Vs After-Tax Returns And Volatility

	Gross Return	Gross SD	After-Tax Return	After-Tax SD
Stocks in IRA	8%	15%	8%	15%
Bonds in IRA	5%	6%	5%	6%
Stocks in Taxable	8%	15%	6.8%	12.75%
Bonds in Taxable	5%	6%	3.5%	4.2%

portion of stocks that have a 15% standard deviation, the investor should theoretically be willing to hold even more equities at only a 12.75% (after-tax) standard deviation. In addition, if the investor "must" own something in the taxable account, it's somewhat more appealing to own equities that "only" take a 1.2% gross return haircut, rather than bonds that take a 1.5% haircut for tax drag.

When all of this is taken into account, Reichenstein and Meyer found, as shown in Figure 7 below, that using mean-variance optimization the optimal asset allocation may actually be to hold *all* of the taxable account assets in equities, and *all* of the retirement account assets in bonds. This result was true notwithstanding the fact that it essentially produces a 59%/41% after-tax asset allocation (similar to that shown in Figure 4, earlier). The reason, again, is a combination of the fact that if the investor was willing to hold 50% in equities with a 15% standard deviation, the investor should be willing to hold a greater-than-50% allocation in "equities" with a lower after-tax standard deviation (because the government shares in the potential losses), and that furthermore it's preferable to hold stocks in the taxable account where the tax drag haircut is lessened.

On the other hand, it's also notable that in the longer run, this framework also becomes more complex. After all, the standard deviation decreases with a greater time horizon, and there is less likelihood that there will be a loss in the stocks at all (especially if you assume any level of mean-reversion in stock returns). In turn, this reduces the benefit of having equities held in the brokerage account where losses can be deducted (though in theory losses might still be harvested in the meantime for some small value). In other words, if the whole point of having equities in the taxable account is to benefit from the deductibility of the losses, but the investor's intention is really to buy-and-hold for the long run, arguably there is very little likelihood of having any losses to deduct after a 10+ year holding period!

A further challenge in applying this framework over time is that appreciation itself can alter the after-tax asset allocation and the associated after-tax standard deviation. For instance, imagine a situation where stocks were being held in the taxable account, but over the span of several years, had appreciated significantly, to the point where the current value was up 50% from the original cost basis (e.g., purchased for $100, but value is now $150 with a $50 embedded/unrealized capital gain). Given the appreciation, "Uncle Sam" would now be a partner in a portion of the account balance – due to the embedded gains – in addition to the future gains/losses. If applied in a similar manner to earlier calculations, the end result would be an after-tax standard deviation of 13.42%, not "just" 12.75%. If the investment were up 100%, the after-tax standard deviation would rise further to 13.875%. In fact, the greater the (unrealized) appreciation over time, the more the after-tax standard deviation approaches the gross standard deviation.

Thus, in essence, the challenge with trying to allocate investments on an after-tax volatility basis is that gains/appreciation actually change the calculation of after-tax standard deviation itself, such that the longer the portfolio is held without change the greater the standard deviation becomes (until it reaches what the gross standard deviation would have been in the first place). And remember, as shown in Figure 7, the investor was assumed to hold a greater exposure in equities because the after-tax standard deviation was lower; if it systematically rises over time with appreciation, the portfolio will become "over-risked" relative to the client's risk tolerance. Of course, systematic rebalancing would prevent this distortion of total portfolio risk, trimming excess equity exposure and also reducing the level of embedded gains; but doing so would also increase the turnover of the portfolio, especially through the harvesting of gains on assets held in the taxable account, which would actually reduce their tax-efficiency and make those equities even *less* desirable to hold in the taxable account in the first place.

Nonetheless, the argument remains that at least hypothetically, the location of asset classes might be adjusted for not only the prospective after-tax returns and after-tax value, but also the after-tax standard deviation. While it remains unclear exactly how this could be executed over time in a manner that doesn't itself reduce tax-efficiency, expect to see more research in this area in the future.

Figure 7. After-Tax Mean-Variance Optimized Portfolio

	After-Tax Value	Optimal Weight	After-Tax Return	After-Tax SD
Stocks in IRA	$0	0%	8%	15%
Bonds in IRA	$350,000	41%	5%	6%
Stocks in Taxable	$500,000	59%	6.8%	12.75%
Bonds in Taxable	$0	0%	3.5%	4.2%

Asset Location Final Summation – So Where Does It All Go?

So given all of this discussion regarding asset location, how do final asset location decisions come together?

As discussed in last month's newsletter, the starting point remains to first establish an asset location priority list of the available investments that are being used for client portfolios.

For firms that construct model portfolios, the asset location priority list only needs to be done once for all models and can then be implemented systematically for clients on a consistent basis (ostensibly with the use of rebalancing software that is capable of implementing an asset location hierarchy). If the firm trades somewhat more actively, at worst it must simply update the asset location priority list as new investments are introduced – placing them wherever they belong on the list – and removing those investments from the list that are no longer being held.

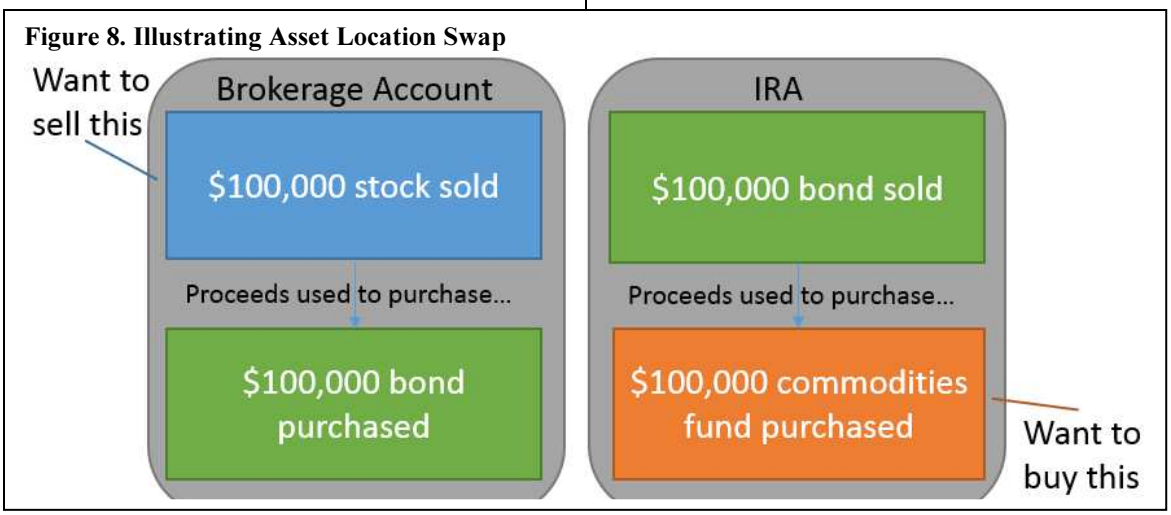
As investments change over time, similar investment types may well swap in a similar position on the list, though notably if a substantively different investment is purchased, it may end out elsewhere on the list, triggering a 'rebalancing' (or really, a 'relocation') trade that swaps particular investments amongst accounts.

For instance, if a client decided to sell a $100,000 position in an efficient stock fund (that was in a brokerage account) for an inefficient commodities fund (that should be held in an IRA), the client may need to sell an existing bond investment that *was* in the IRA, use the proceeds to buy the commodities fund in the IRA, and replace the bond investment with the money in the taxable account that was freed up by selling the stock fund in the first place. This investment change with a bond "swap" from the IRA to taxable account is shown in Figure 8, below.

Notably, in this "swap" scenario, where the $100,000 of bonds in the IRA were sold solely for the purpose of freeing up cash in the IRA to buy the commodities – and "replaced" in the brokerage account with the proceeds from the stock fund – there is no additional tax event. While any gains from the stock fund will be due – that were presumably acceptable given the decision to sell in the first place – the sale of bonds within the IRA is not taxable, and because the investment positions were swapped (rather than actually distributing *from* the IRA), no further taxable events are associated with the change. Going forward, the investor will own the bonds in the taxable account and the commodities in the IRA, ostensibly because the commodities fund is expected to be a higher-return tax-inefficient investment than the bond fund (perhaps similar inefficiency, but commodities with the higher expected return get the greater IRA priority).

As noted earlier, the primary purpose of the asset location priority list is to ensure that the highest return *efficient* investments end out in the taxable account, and the highest return *in*efficient investments end out in the IRA (with the highest of those in a Roth IRA, if available). As a result, the reality is that the precise order of the "middle" of the asset location priority list is not necessarily impactful (as by definition, it will include the lowest return investments for which compounding is less of a benefit and proper as asset location matters less anyway), but the focus on the highest return options at either end of the efficiency spectrum is crucial.

Figure 8. Illustrating Asset Location Swap



In practice, there is typically still some subjectivity to the asset location priority ranking for most investments, as we don't unequivocally *know* which investments will be the highest return, nor necessarily exact when they will be sold/turned over/passing through income/gains (impacting their tax efficiency), and instead can only make educated guesstimates based on available information. Nonetheless, beyond expected return itself, several key factors clearly impact anticipated tax efficiency and the associated asset location ranking decision, including:

- **Character of gains.** Interest as ordinary income? Eligible for long-term capital gains treatment? Taxed as collectibles? Dividends eligible for qualified treatment?

- **Composition of gains.** All interest/ordinary income? All long-term gains? Some long-term and some short-term? Some gains and some interest? Some gains and some dividends? Some qualified dividends and some non-qualified?

- **Embedded gains or losses.** In the case of mutual funds, a key factor.

- **Anticipated turnover.** Important in the case of actively managed mutual funds or separately managed accounts.

- **Anticipated holding period.** Held long enough for long-term capital gains? Likely held for "just" a few years, or for a decade or more?

- **Trading strategy that impacts turnover.** Certain targets or conditions that might trigger liquidation sooner rather than later? Investments with stop-losses or sell targets?

As noted earlier, the rankings of an asset priority list may shift over time as old investments are sold and new ones are introduced. In addition, a firm should have a systematic process for updating its asset location hierarchy at least annually, given that some of the factors above may change over time, which means new clients might even have a different asset location priority than earlier clients (e.g., in the case where a mutual fund has accumulated significant embedded gains, which makes it less efficient for a new investor today who faces a higher probability of a large distribution in the coming year without having participated in the earlier run-up).

In 'extreme' circumstances, the prices of investments may move so far that it impacts the expected return as well – for instance, bond yields are so substantively lower than they were years ago that it materially alters their asset location priority from what it once might have been when the 10-year Treasury yielded 6%. On the other hand, it's also important to note that long-term compounding will often trump short-term tax benefits; for instance, keeping an inefficient investment in the brokerage account just to take advantage of near-term tax-loss harvesting may not be worthwhile if it comes at the cost of losing long-term tax-deferred compounding. *(For further discussion on the limited value of tax deferral, see http://www.kitces.com/blog/is-capital-loss-harvesting-overvalued.)*

Asset Location & Client Psychology

An underlying assumption of asset location strategy is that a client's investment assets will be managed on a "household" basis, rather than an account-by-account basis. In other words, that if the client's goals and risk tolerance specify a 50/50 stock/bond asset allocation, that the allocation will *not* simply be 50/50 in each *account*, but that the 50/50 will be based on *total* (investment) assets across the household, such that strategic decisions can be made about which accounts will hold the 50% in stocks and which will hold the 50% in bonds. That's the whole point of implementing asset location in the first place.

However, it's important to recognize that such an implementation can affect client psychology, as the reality is with asset location on an account-by-account basis, there may be significant differences in return amongst those accounts.

For instance, if inefficient high-return (and generally high-risk) assets are properly placed in a Roth IRA, with the rest of the portfolio in a taxable account, and there is a significant market decline, the taxable account may have small losses but the Roth IRA will have much larger losses. This can lead clients to become concerned about whether "the IRA" is too risky, especially if it's not viewed in the context of *all* the accounts.

The situation can be further exacerbated across each member of a couple; for instance, if a husband's Roth IRA ends out with the highest return (and highest risk) investments, the wife's traditional IRA ends out with the next highest return (and next-highest risk) investments, and their joint taxable account has the rest, and a bear market occurs, the husband may become concerned because "his" account is losing more money than the others, simply because on an asset location

household basis "his" account happened to bear the investments that had the highest risk when a bear market occurred. Conversely, in a bull market, the couple may evoke concerns that the "wife's" IRA is underperforming her husband's, again because the latter has higher-risk higher-return investments than the former.

In situations where the assets of each spouse are intended to remain truly segregated – e.g., in some second marriage scenarios – or where investments in various types of accounts are truly intended for separate goals – e.g., brokerage account assets are for college and a down payment on second home while retirement account assets are really for retirement – advisors should be cautious about managing all accounts on a household basis when they're not really being managed towards a common household goal.

However, to the extent that the assets *are* all intended for a common goal – e.g., retirement – despite where they happen to be held, managing on a household basis can create value through asset location, but client expectations should be managed accordingly. This might entail warning clients in advance that different accounts may have *materially* different returns due to the asset location strategies, but that the investment allocation will be appropriate to their goals and risk tolerance in the aggregate. Ideally, portfolio reporting results should be delivered on a household basis as well, to help ensure that clients view their returns on a consolidated basis, despite their natural tendencies to 'mentally account' for gains and losses by the account types alone.

On the other hand, managing and reporting investments on a true household basis can be more difficult if a substantial amount of client assets are held away in accounts that are not managed by the advisor, but are being accounted for in the asset location process.

For instance, if a significant portion of the client's wealth is tied up in a 401(k) plan that will be designated to hold certain high-return tax-inefficient investments, then the 'remaining' wealth allocated to the advisor may exclude allocations to those asset classes, which can further 'distort' the returns of just "the advisor's" component of the portfolio, making it all the more important that if assets are located and managed on a total household basis, it will be crucial that they are reported that way.

Asset Location For Lower-Income Clients

While asset location results are generally consistent for middle-income and higher-income clients – the tax drag is more severe for the latter, but the asset location *priority list* doesn't change – the picture really *is* different for lower income clients.

The reason is that those whose income falls in the bottom two ordinary income tax brackets are eligible for 0% long-term capital gains and qualified dividend treatment. This materially changes the asset location priority list, as investments that generate such gains and dividends should ideally be held in the taxable account, *regardless* of their efficiency, because the growth will be tax-free anyway. In fact, efficient investments might be made deliberately *less* efficient by systematically harvesting capital gains, just to ensure that the 0% rates are taken advantage of in years they are available.

The end result is that even with a standardized implementation of asset location, advisors should be cautious to recognize that clients with lower income – even if they have significant assets – could be eligible for preferential rates that significantly alter their individual optimal asset location.

Alternatively, some advisors may prefer to 'only' implement asset location amongst the accounts they actually manage to maintain the integrity of their investment process, though such an approach may technically be less than fully optimal amongst the client's *entire* household asset allocation and location.

Implementing some of the aforementioned after-tax asset allocation (and after-tax volatility) strategies may prove to be the most difficult in the real world, due to the associated client psychology. While it can be shown that a 59/41 portfolio (with stocks in the taxable account and bonds in the IRA) really "is" comparable after-tax volatility to a 50/50 after-tax allocation, it may be difficult to keep clients from focusing on the gross gains and losses – especially the losses that occur during the inevitable bear market. Until such an approach is more widely adopted, and/or better illustration tools are available to communicate after-tax asset allocation – and report assets

and performance on an after-tax basis – after-tax allocation and volatility investment management may be difficult to utilize with clients.

Implementation Challenges & Caveats

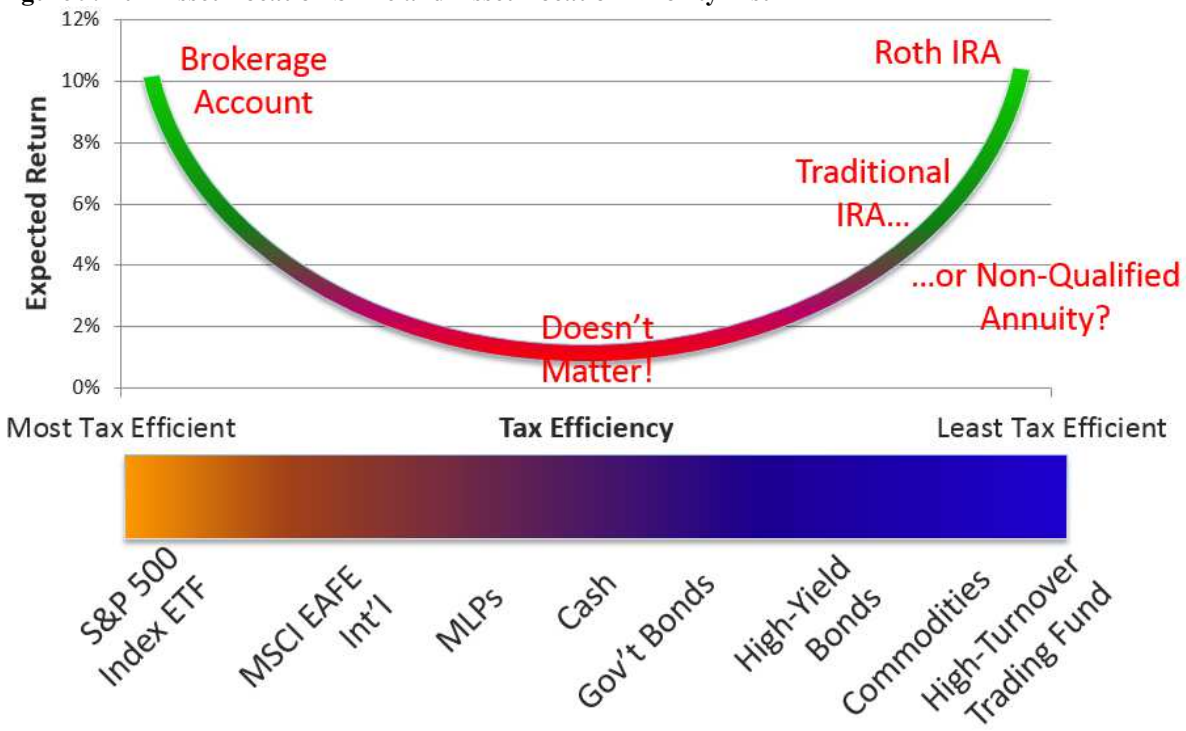
From a practical perspective, for some advisors the greatest challenge of effectively implementing asset location strategies is the *actual* implementation, and the ability to manage asset location properly amongst all the different clients, their available dollars in all the different types of accounts, and the range of investments that will be used (with their various return expectations and tax characteristics).

Fortunately, many (though not necessarily all) of today's "rebalancing" software tools also include an asset location component, where a priority list for asset location can be established and implemented on a systematic basis. Even with such automation, the priority list may have to be updated from time to time – generally, at least once a year to update for currently embedded gains and any potential shift in tax characteristics – but the use of software can dramatically improve the ease of asset location implementation.

Notably, implementing an effective asset location hierarchy also indirectly increases the importance of systematizing an advisor's investment process, as holding different investments for every client requires not only the due diligence on every investment, but a 'customized' asset location priority list for every client (which in turn may also be difficult to automate, as the benefits of rebalancing software tools are limited when every client is different anyway). Conversely, establishing a series of "model" portfolios of varying levels of risk but implemented in a consistent manner via software and matching portfolios to client goals and risk tolerance allows technology to be effectively leveraged to implement asset location with the full range of potential accounts and associated asset location priority list, as shown in Figure 9, below.

On the other hand, available technology still seems limited to effectively manage asset location amongst both managed and outside/unmanaged accounts. While some account aggregation tools exist to at least view account balances and track performance on a total household basis, automating the asset location decisions is less feasible. Again, in practice this means many advisors may decide to only implement asset location strategies to the extent of the assets they can actually manage, or alternatively may encourage clients to

Figure 9. Full Asset Location Smile and Asset Location Priority List



consolidate assets with the advisor *in order to* most effectively implement asset location.
At the even more advanced level, there is no widely available software package to help implement asset allocation including adjustments for after-tax asset allocation and after-tax volatility, as discussed from some of the earlier research. In addition, as also noted, implementing such strategies could be very challenging – even more than the others – from a client psychology perspective. Nonetheless, expect that as asset location strategies become more sophisticated in the future, and the software to support them, that additional tools will emerge to take into account these dynamic after-tax allocation adjustments.

Conclusion

As discussed in last month's newsletter, asset location represents one of those unique "free lunch" opportunities for wealth creation – a mechanism by which investment strategies that are already being implemented can simply be done in a more tax-efficient manner that maximizes long-term wealth creation.

Yet in practice, the idea of a "free" lunch for asset location may be slightly overstated, in that the complexity of implementing it effectively requires more work, with a far more intensive and proactive process to evaluate investments for their prospective return and tax-efficiency characteristics, establish an asset location priority list to be utilized, and then actually implement it – ostensibly with the assistance of rebalancing/trading software – on an ongoing basis. The approach can be even more difficult to implement for advisors who have not already systematized their investment process, and that's before considering even more complex adaptations like considering after-tax asset allocation and after-tax volatility.

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Notably, the value of asset location also requires a longer-term focus to truly maximize, as what may seem best in the short-run (e.g., immediately sheltering ordinary income and allowing long-term capital gains to remain in the taxable account) can be undermined in the long run (e.g., if there is still 'too much' turnover with the long-term capital gains even given their preferential treatment, it can be better to hold equities in retirement accounts).

Nonetheless, given the wealth creation potential – which may over the long run amount to 0.25% or more of annualized wealth creation – asset location will likely only increase in its appeal in the coming years, especially as the tools and technology to implement it easily continue to be developed and improved!

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