**Asset Allocation using Index Funds**

By Henry Wirth

I implemented an index oriented Asset Allocation strategy during 1997, and I have used it for my core portfolio since then. The more I learn about this strategy, which I have back tested as much as possible, the more convinced I become that this strategy will outperform every other investing strategy over the long term, meaning a MINIMUM of ten years.

**This is a two part presentation of about 30 minutes each. We have almost 2 hours, so stop me any time you have a question.**

The Art of War is an ancient Chinese military strategy that is attributed to Sun Tzu, a military general who was active in the late sixth century BC. His strategy is said to be the definitive work on military strategies of its time, and is still read for its military insights.

Here are two of Sun Tzu's most famous quotes.

**If you know the enemy and know yourself, you need not fear the results of a hundred battles.**

**If you are ignorant of both your enemy and yourself, you are certain to be in peril.**

That means that you can be given the best strategy imaginable, but if you do not know yourself and your enemy, then you will not understand how to implement the strategy, and you may not even understand why the strategy should be implemented.

**Tonight I will explain the investing strategy used by most intelligent and knowledgeable professional investors.**

**Intelligent and knowledgeable professional investors implement this strategy because it is essentially unbeatable over the long term, meaning a MINIMUM of ten years.**

**Benjamin Graham, one of the most successful value investors of the 20th century, and Warren Buffet's mentor, was an advocate and practitioner of this strategy.**

**Burton G. Malkiel, the author of A Random Walk Down Wall Street is an advocate and practitioner of this strategy.**

**The beauty of this strategy is its simplicity, its tax efficiency, and its virtual guarantee that it will out-perform every other investing strategy over the long term, meaning a MINIMUM of ten years.**

**However, if you are ignorant of your enemy or yourself, then you are certain to be in peril if you attempt to implement this strategy.**

Because of that fact, most of this presentation will be used to learn about your enemy, and to learn about yourself.

**If you know the enemy and if you know yourself, you need not fear the results of a hundred battles.**

So, who is the enemy?

**In the battle for investment survival, the enemy of every individual investor is every other investor, but the Individual Investor is frequently his own worst enemy.**

I'm going to begin my presentation with a Fairy Tale.

Once upon a time there was a Tropical Paradise...

Imagine living in a tropical paradise.

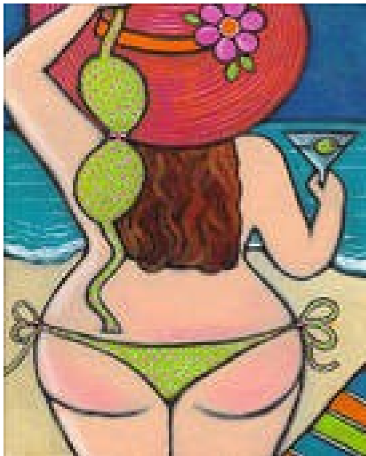
The problem with living in a Tropical Paradise is that most of the natives don't have any money, so this is what their tropical paradise looks like to many of them.

But the natives want money. They want it even more than most North Americans, so many of them leave their tropical paradise to come to the US and Canada. Some come legally and some illegally, but they generally do the work Americans are unwilling or unable to do.

Some of them make huge amounts of money illegally. Their progeny will probably work on Wall Street. And it is not too inconceivable to imagine a Columbian or Jamaican drug lord's granddaughter reigning in the White House.

Some of the natives are unwilling or unable to leave their tropical paradise, and they are unwilling or unable to work illegally, but they still want more money. One of them is the Hero of my Fairy Tale.

Our Hero noticed that most of the wealthy tourists visiting his tropical paradise bared much of their pale skin shortly after arriving.



The consequences were always predictable.

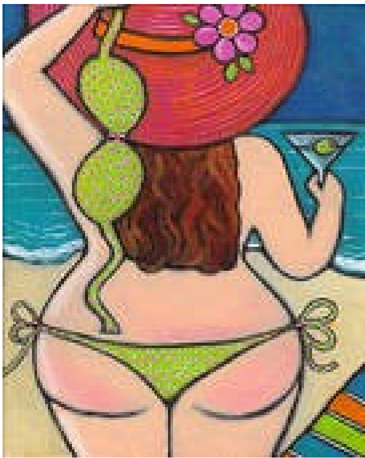
Our Hero decided to buy a business that sold sunburn lotion to all the tourists. He learned of a business that was for sale. It was located on a desirable beach, it had experienced employees, and it included the secret recipe for the exclusive, locally manufactured sunburn lotion.

The owner of the business, Papa Doc, was eager to sell because he was getting old and he wanted to retire. Our hero was able to acquire the business with a modest down payment and favorable terms. His new business opened just as the hurricane season started.

After a few months, our hero was ready to call it quits. Luckily Papa Doc told our hero that retirement did not agree with him, and he'd be willing to take the business back, but the business obviously wasn't worth as much as our hero paid for it, so some concessions would have to be made.

Papa Doc took over just as the hurricane season ended.

And the tourists started arriving again.



**And Papa Doc lived happily ever after**.

The story I just told you was obviously a Fairy Tale because I never met a Third World entrepreneur as stupid as Our Hero.

However, I know plenty of otherwise intelligent investors who behave as naively as the hero of my story when it concerns investing decisions.

Here's what they do:

Some investors intentionally examine investment returns of the last year or two or ten because they naively believe that past performance is an accurate indicator of future performance, even though they have been told, over and over again, that past performance is NOT a valid indicator of future performance.

Think about this: If investing were as easy as purchasing the best performing asset or asset class, then everyone would be rich, and that is clearly not possible.

The Economist told a tale of a brilliant investor in their 1999 Christmas issue:

Felicity Foresight used a clever investment strategy to become the world's richest person. Starting on January 1, 1900 with $1, she would predict which asset class would experience the highest total dollar return over the next year.

By her 100th year Ms. Foresight had turned her $1 into $1.3 Quadrillion, or a little more than 100 times the value of the entire US stock market at the end of 1999.

What would have happened if she had instead invested in the previous year's best performing asset class?

Meet Henry Hindsight, an old flame from Felicity's giddy youth. Unlike Felicity, Henry is more like the typical investor who tends to follow fashion. Over 100 years his initial $1 stake grew to $290.

**<u>Summary</u>**

**Felicity Foresight turned her $1 into $1.3 Quadrillion**
**Henry Hindsight turned his $1 into $290**

Unfortunately, we all know that Felicity Foresight is the mythical investor we all wannabe, but we are presumably more sophisticated than Henry Hindsight, right?

So, how do we become successful investors?

**Do we rely on carefully honed instincts that are the result of a lifetime of failed investing decisions?**

Unfortunately that's exactly what many investors do.

**Try not to be one of them.**

Let's examine the consequences of investing according to the dictates of our finely honed instincts.

A Sentiment Survey was taken during the monthly meeting of this Financial Planning SIG at the end of each quarter from 1998 through 2003.

**The first question was: Will the S&P 500, including dividends, return more OR less than 15% over the next 12 months?**

If the future is anything like the past 40 or 50 years, then the chance of answering correctly is about even.

**Next members were asked if the**
**NASDAQ 100,**
**US Intermediate Term Bonds,**
**Developed Europe,**
**The developed Pacific,**
**Or Emerging Markets**
**Will out or under-perform the S&P 500.**

The Group's "favorite" was the asset class that received the most votes.

A die was then rolled

to determine if the die could pick a winner with better results than the Group's favorites.

Over the 5-year period for which results are available no one was able to consistently predict the future. This should be obvious, but many people believe they can predict the future. Normal humans call this wishful thinking. Cognitive psychologists call this "hindsight bias" i.e., the tendency to believe we knew all along what was going to happen, when in fact we had no such foresight.

Here are the results for the Five Year Period ending December 31, 2003.

**RESULTS**

**−16% = Average annual return of the Group's "Favorites"**

**−3% = Average annual return of the Die's picks**

**−2% = Average annual return of all 6 polled classes**

The five-year period ending with 2003 was a terrible period for stock market investors. That accounts for the negative return of the Group's Favorites as well as the Die's picks, but recognize that the randomly selected picks of the impassive Die were much better choices than the Group's "Favorites".

About 15 years ago I was following the asset allocation models that some well known investment banks were reporting to The Economist. These well known banks were constantly tinkering with their models, and it soon became obvious they were not any better at predicting the future than the SIG.

Whenever a large change was made, it would be reported like this:

**Goldman Sachs and Credit Suisse have OVER-weighted Europe etc.**

The Economist would then write:

**It's probably a good time for investors to UNDER-weight Europe etc.**

The investment banks were wrong so often that they modified their behavior.

Here's what they did:

**They stopped reporting their asset allocation models to The Economist.**

You can easily play this game yourself but if you do, remember to record your forecasts.

**The palest ink is better than the best memory.**

I found that in a fortune cookie a long time ago, and I never forgot it.

If you're any better at predicting the future than the group, then let me know.

Based on the Survey Results and the Mutual Fund research project, I suggested posting the following notice whenever we have a roundtable discussion:

**CAUTION!**
**Implementing investments recommended by this Financial Planning SIG could be hazardous to your wealth.**

Fortunately, investing is not a popularity contest.

The aforementioned survey asked folks to predict asset returns twelve months into the future. Twelve months is a long time if you're trying to predict asset returns, so I decided to start another sentiment survey. This time I decided to ask folks to predict asset returns over a three month period instead of a twelve month period.

Unfortunately, by this time I had worn out my welcome at the SIG.

I have learned that most folks do NOT like to be reminded of their failures.

**However, I have also learned that unexamined failures will probably result in more failures.**

So, if I couldn't survey the group, I decided to survey myself. I made three month predictions, and I kept a careful record of them.

In theory short term forecasts should be more accurate than long term forecasts because the conventional wisdom proclaims that the immediate future is likely to be similar to the immediate past.

**In fact, my three month predictions were no better than my twelve month predictions, and my twelve month predictions were no better than the SIG's.**

**It is <u>EXTREMELY</u> important to recognize the fact that you do NOT have an ability to predict the future. If you don't recognize that fact, then you're probably gonna do something that is likely to cost you money.**

Here's another game I recommend playing: Attempt to determine the future price of a stock, or a stock market over the next ten or so **minutes**. If you can do it successfully, then get back to me. I can guarantee you that we will make a pot of money.

**Most folks know they can't make <u>short</u> term predictions successfully, but many of them believe they can make <u>long</u> term predictions successfully.**

Harold Camping, the radio preacher who inaccurately forecast that the Apocalypse would begin on May 21st of this year, made a rookie's mistake. Any gypsy could have told him that when you forecast an event, you should NOT give a date. But if you are forced to choose a date, then give a date so far into the future that you will not be around to be proven wrong. Harold Camping did not learn from his failure.

**His next prediction was that the Apocalypse would begin on October 21st.**

So, here is what we know from this presentation and from previous presentations:

**1. It is easy to make predictions, but it is not possible to determine which predictions are gonna be wrong, and which ones are gonna be right.**

**2. It may be possible to identify outperforming stocks before the fact, but those who have been successful in the past will probably not be successful in the future.**

**3. It is simply not possible to identify outperforming mutual funds before the fact.**

If you agree with the three preceding statements, then you know more than most investors.

If you don't agree with them, then you are like most investors, which means that your investing returns are likely to be BELOW average, forever and ever after.

Investing is defined as the act of putting money at risk in the hope of obtaining an income or profit.

**Investing in stocks and bonds is defined as a zero sum game with a positive bias.**

**That means that on average, investors in stocks and bonds make money because all things considered, bonds pay interest and stocks rise in value.**

If we are all very lucky, that trend will continue. If it does not continue, then our Golden Years are gonna be a lot less golden.

**However, that does NOT mean that all investors earn equal returns. There is an enormous amount of evidence to substantiate the fact that amateur investors trail the professionals by significant amounts.**

Dalbar, a Boston fund research firm, studied returns at hundreds of mutual funds in the twenty years from 1984 through 2003. By comparing fund performance with the amount of cash that flowed in and out, Dalbar was able to calculate how much money the average investor earned.

**The S&P 500 returned an annual average of 12.98% during the twenty years from 1984 thru 2003.**

**The typical stock fund investor earned only 3.51% annually!**

A subsequent 2010 Dalbar study showed amateurs were closing the gap, but amateurs were still trailing the professionals by huge amounts.

**It should be self evident that any professional investor that trails the S&P 500 by a substantial amount, will not be a professional investor for too much longer.**

The fact that amateurs underperform professionals should NOT be a surprise.

How many of us believe we could compete successfully with professional athletes?

How many of us would even dare to try?

The reason most of us would not try to compete with professional athletes is that most of us have attempted to play athletic games during our youth, and we know that we are incompetent relative to the professionals.

Unfortunately, most of us do not attempt to play the stock market game until we are old enough to know better, but somehow the old enough to know better message did not get thru as forcefully as it should have.

I'm going to take a short break to answer any questions you may have at this point.

Earlier I said most of us do not attempt to play the stock market game until we are old enough to know better, but somehow the old enough to know better message did not get thru as forcefully as it should have.

There are many reasons the message hasn't gotten thru to us, but here is the most important reason.

**Our government and Wall Street have <u>relentlessly</u> promoted mass stock ownership for at least thirty years.**

It is Wall Street's job to promote stock sales and trades because Wall Street makes most of its money from incompetent investors.

By this time, it should also be obvious to everyone that our government works for the Wall Street investment banks and brokerages.

Fred Schwed asked this more than one hundred years ago:

Where are the customer's yachts?

**Regardless: Is the stock market game, a game of chance or a game of skill?**

That question has been asked frequently, but it will probably never be answered satisfactorily. Regardless, here are some data that helped me arrive at my conclusion.

**<u>During the twenty years from 1984 thru 2003</u>**

**The S&P 500 returned an annual average of 12.98%**
**The typical stock fund investor earned only 3.51% annually!**
**Conclusion:**
**Stock market investing is a game of skill in which amateurs seldom succeed**

So, what are the Individual Investor's alternatives?

*Now* I will explain an investing strategy used by most intelligent professional investors, but before I do, let me repeat some important points I made earlier.

**Professional investors implement this strategy because it is essentially unbeatable over the long term, meaning a MINIMUM of ten years.**

**Benjamin Graham, one of the most successful value investors of the 20th century, and Warren Buffet's mentor, was an advocate and practitioner of this strategy.**

**Burton G. Malkiel, the author of A Random Walk Down Wall Street is an advocate and practitioner of this strategy.**

**The beauty of this strategy is its simplicity, its tax efficiency, and its virtual guarantee that it will out-perform every other investing strategy over the long term, meaning a MINIMUM of ten years.**

Furthermore, it's a strategy that's as old as recorded history, and it's a strategy that your parents probably told you to follow.

**1. Don't put all your eggs in one basket.**
**2. Use as many baskets as possible, but keep careful track of all of them.**

If you are an investor there are **ONLY TWO** possibilities.

**Possibility Number 1**

**You *are* outperforming appropriate benchmarks, either absolutely or on a risk adjusted basis. If you are outperforming, then you deserve to be congratulated**.

You may continue doing whatever you were doing, secure in the knowledge that your efforts are adding value to appropriate benchmarks.

If your name is Warren Buffet or Bill Gates, then I will acknowledge that you did well to ignore an asset allocation strategy.

But it may be prudent to remember that Benjamin Graham, one of the greatest value investors of the 20th Century and Warren Buffet's mentor, was an enthusiastic advocate and practitioner of asset allocation.

**Possibility Number 2**

**You *are* NOT outperforming appropriate benchmarks.**

If not, then you may wish to examine your current strategy because an asset allocation strategy is virtually guaranteed to out-perform every other investing strategy over the long term, meaning a MINIMUM of ten years.

**What is Asset Allocation?**

**Simply stated, it is a value oriented system of diversified investing that encourages and counsels you to "Buy Low and Sell High".**

That's easy to say, but it's **impossible** for many to accomplish.

**What are Asset Classes?**

Groups of assets, which on average, will move together. For example, when an economy is healthy and growing, then the stock market represented by that economic system will generally perform well and vice versa.

You can create asset classes yourself e.g., real estate in your home town, or you can invest in broadly diversified markets i.e., global stock or bond markets.

**What is meant by a well designed Asset Allocation Model?**

A well designed Asset Allocation Model contains asset classes for which there is a reasonable expectation of satisfactory performance AND it contains asset classes that are not always expected to move in tandem i.e., when one goes down, the other should go up.

**<u>Example of a simple, well designed, Two Asset US Model</u>**

**<u>Asset #1</u> An Intermediate Term US Bond Index Fund**

**<u>Asset #2</u> A Total US Stock Market Index Fund**

Does the two asset model contain asset classes that are not always expected to move in tandem?

Yes. During an economic crisis, stocks will fall, but high quality bonds will generally rise.

**Why will bond prices rise?**

Central banks will lower overnight rates in an attempt to stimulate the economy. There is also generally a decline in the demand for money during a crisis because very few individuals OR businesses want to borrow money during a crisis. Lower interest rates will drive government bond prices and high quality bond prices up. However, junk bond prices will almost certainly fall during a crisis because low quality debt will generally go into default during a crisis.

**<u>Trick Question:</u> Do historical bond prices verify my explanation?**

Not always, but nowadays almost ALL economists recognize that the fastest way for an economy to recover is to stimulate the economy. There are many ways of accomplishing this, but the easiest method is to LOWER overnight interest rates AND government bond rates. There is always some resistance to this policy because it tends to devalue the currency.

**Is there a reasonable expectation for satisfactory long term performance of the two asset classes in the model?**

Yes. If both stocks and bonds do not perform reasonably well over the long term, meaning about ten years, then the current global economic system probably won't survive, and our golden years are gonna be a lot less golden.

**Is there a guarantee of satisfactory long term performance of the two asset classes in the model?**

No. Investment returns are NEVER guaranteed.

How well did a 50% US Bond and a 50% US Stock model perform over the ten years ending 2010?

**The Two Asset Model Buy & Hold Return was 4.7% per Year**

**The Two Asset Model Return with Quarterly Rebalancing was 5.1% per Year**

**The Two Asset Model Return with Annual Rebalancing was 5.1% per Year**

As you can see, rebalancing added value, but there was no difference between quarterly or annual rebalancing. I'll address this again later.

An average annual return of 5.1% per year is ordinarily nothing to brag about, but this ten year period was an unusual period that will hopefully not be repeated again anytime soon because stocks underperformed bonds by a substantial amount.

**What did professional investors earn during the ten years ending with 2010?**

**The average annual return of the 100 newsletters monitored by The Hulbert Financial Digest for ten years or more was 3.98%**

**Conclusion on the Two Asset US model**

**It is extremely difficult to beat the risk adjusted return of the Two Asset US model if you restrict yourself to a portfolio consisting of 50% US Bonds and 50% US Stocks.**

Note that the two asset US Model is about half as risky as a stock only model.

**Should YOU restrict yourself to US assets?**

The answer to that question depends on YOU

**XENOPHOBIA - Fear and hatred of strangers or foreigners, or of anything that is strange or foreign.**

Almost everyone is xenophobic. If our caveman ancestors had not been xenophobic, then chances are pretty good that they would not have survived long enough to have progeny. Some anthropologists believe that Neanderthals would still be among us if they had been a bit more wary of humans. Modern humans have been taught to be tolerant, but xenophobic inclinations are always ready to erupt.

Most studies show that most investors are much more comfortable investing in their own country. Indeed, many studies show that many investors are more comfortable investing in something in which they believe they have some intimate familiarity, such as the company for which they work. That frequently does not end well, and most competent financial professionals recommend investing no more than 5% of your assets in any single company.

So, once again: **Should YOU restrict yourself to US assets?**

The answer is that it depends on the degree of your xenophobia. If you believe that the US system of socialized capitalism will ultimately return more value to the individual investor than any other system, then you should probably avoid foreign entanglements.

**Why avoid foreign entanglements?**

Because when the foreign markets underperform, and they WILL underperform, you're gonna say, "I knew that was gonna happen", and then you're probably gonna bail out. And that is exactly the wrong thing to do.

Know your enemy, know yourself.

**Should YOU own ANY stock assets?**

Stock markets frequently decline by 50% or more. By this time everyone is aware of that fact, but during the Roaring Nineties AND during the Roaring Twenties many respected economists believed that developed stock markets were exempt from major declines, and would continue to rise steadily. The first decade of the 21st century has disabused all of us of that absurd notion.

**What was YOUR response to the stock market declines of the 21st Century?**

Any stock market decline depresses stock investors psychologically and financially. The greater the decline, the greater the depression. If the decline is great enough to compromise living standards, then severe suicidal depression could result. So, once again: What was YOUR response to the stock market declines of the 21st Century?

**1. Was your living standard severely compromised?**
**2. Did you experience severe depression?**
**That is, some depression is normal; suicidal depression is not.**
**3. Did you panic and run?**

In my OPINION, a positive response to any **one** of the three questions indicates that ***you*** are probably not psychologically or financially equipped to deal with the volatility of the stock market.

**That means you probably should NOT own stock.**

Know your enemy, know yourself.

If you responded negatively to all three questions, then stocks may be an appropriate asset class for you. If your living standard wasn't compromised, if you did not experience suicidal depression, and if you did not panic and run, then there are only two other possibilities. So, once again:

**What was YOUR response to the stock market declines of the 21st Century?**

**1. I ignored my portfolio during both declines.**
**2. I bought more stock after each decline.**

If you ignored your portfolio during both declines, then you probably know that you missed some of the best buying opportunities of your lifetime.

Hindsight is wonderful.

If you bought more stock after each decline, then you took advantage of these buying opportunities. So, the BIG questions are:

**When should you buy stocks or bonds?**

**When should you sell stocks or bonds?**

Here's some advice from Benjamin Graham, Warren Buffet's mentor and probably the greatest value investor of the 20th Century: "The investor should always have a minimum percentage of his total portfolio in common stocks, and a minimum percentage in bond equivalents.

A good case can be made for a consistent 50-50 division here, with adjustments for changes in the market level. This means the investor should switch some of his stocks into bonds on significant rises of the stock market level, and vice-versa when the market declines."

**If you decide to maintain a 50% stock and a 50% bond allocation, then how frequently should you rebalance your portfolio?**

Before we attempt to answer that question, let's examine the potential consequences of maintaining a 50% stock and 50% bond portfolio.

Stock markets frequently decline and lose 50% or more of their value on a more or less regular basis. If you maintain a 50% stock and 50% bond portfolio, and if the stock market loses 50% of its value, that means your portfolio will have lost about 25% of its value.

**$1 Million Before the Decline**

**$500,000 Stocks + $500,000 Bonds = $1,000,000**

**$750,000 After the Decline**

**$250,000 Stocks + $500,000 Bonds (Probably more) = $750,000 or more**

**Why would your bond portfolio probably be worth more than $500,000?**

Because interest rates will probably fall. That means that high quality bonds ***may*** rise in value.

You just lost about 25% of your portfolio.

**Are you psychologically and financially prepared to buy more stock?**

If not, you probably owned too much stock BEFORE the decline.

Know your enemy, know yourself.

**Quarterly Rebalancing versus Yearly Rebalancing**

**Ten Years ending December 31, 2010**

The Ten-Year period ending December 31, 2010 was presumably an extraordinary period during which bonds returned much more than stocks. The experts had assured us that would NOT happen, and they are now, once again, assuring us that stocks will probably return more over the NEXT ten years.

**Which asset class is going to win over the NEXT ten years?**

Does anyone know the answer to that question?

**Absolutely not.**

So, once again:

**Quarterly Rebalancing versus Yearly Rebalancing**
**Ten Years ending December 31, 2010**

**Two Asset US Model Buy & Hold Return was 4.7% per Year**

**Two Asset US Model Return with Quarterly Rebalancing was 5.1% per Year**
**Two Asset US Model Return with Annual Rebalancing was 5.1% per Year**

Those results are more or less consistent with results published in the May 2011 AAII Journal in an article titled A Cost-Effective Strategy for Rebalancing.

Using US stock and bond data from 1926 thru 2009, members of the Vanguard Investment Strategy Group found that the risk adjusted returns are not meaningfully different if a portfolio is rebalanced monthly, quarterly or annually.

**Their conclusion was that rebalancing annually or semiannually at 5% thresholds is likely to be optimal for most investors.**

Note that these conclusions were made from a **US** stock and bond database.

**SUMMARY for the Ten-Year Period ending December 31, 2010**

**5.1% Annual Return for the Two Asset US Model**

**4.0% Annual Average Return of the 100 newsletters monitored by The Hulbert Financial Digest for at least ten years.**

These data show that a **SIMPLE** Two Asset US Model returned more than the average annual return of the 100 financial newsletters monitored by the Hulbert Financial Digest over the ten-year period ending December 31, 2010

**How well would a SIMPLE Six Asset Global Model have worked over the same ten-year period?**

**SIX Asset Global Model**

**1. 50% Vanguard Intermediate-Term Bond Index Fund**

**2. 10% Vanguard 500 Index Fund**

**3. 10% Vanguard Extended Market Index Fund**

**4. 10% Vanguard European Stock Index Fund**

**5. 10% Vanguard Pacific Stock Index Fund**

**6. 10% Vanguard Emerging Markets Stock Index Fund**

**Results for the TWO Asset US and the SIX Asset Global Model**

**8.1% Annual Return for the Six Asset Global Model with Annual Rebalancing**

**7.5% Annual Return for the Six Asset Global Model with Quarterly Rebalancing**

**5.1% Annual Return for the Two Asset US Model with Annual or Quarterly Rebalancing**

**4.0% Annual Average Return of the 100 newsletters monitored by Hulbert**

These data show that the **SIMPLE** US asset allocation model with annual OR quarterly rebalancing outperformed the average return of the 100 newsletters monitored by Hulbert over the ten years ending December 31, 2010.

**These data also show that the Six Asset Global Model with annual rebalancing outperformed 80% of the 100 newsletters monitored by Hulbert over that same ten year period.**

Conclusion:

**Successful investing requires three important components.**

1. **A written Objective and Strategy**
2. **Discipline**
3. **Money**

1. A written Objective and Strategy

A written objective and strategy are extremely important because an unwritten objective or strategy cannot be analyzed and critically examined i.e., anything unwritten is likely to be imaginary.

2. Discipline

If you do not have the discipline to implement your strategy, then your strategy is worthless. A written strategy can be modified, but an imaginary strategy can not be modified.

3. Money

I have given you two strategies that will probably out perform 80% of all professional investors over the long term, meaning a minimum of ten years, but I cannot give you the discipline to implement a strategy, nor can I give you the money.

**Discussion**

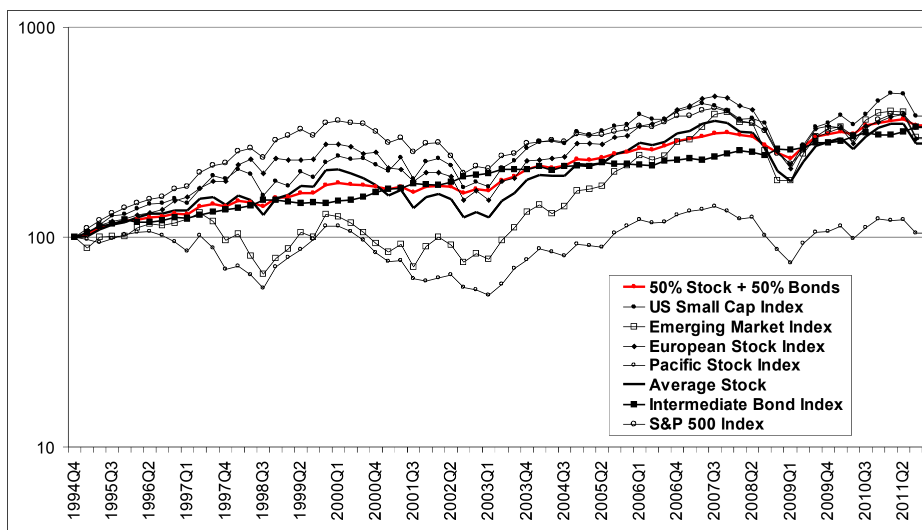
**1. Will the Global Model always outperform the US Model?**

No. There will always be one or two asset classes that outperform all other asset classes over the short run, but these asset classes are impossible to identify before the fact.

**2. Why is the Global Model likely to return more over the long run?**

In theory, risk adjusted returns for all asset classes are equal, and over the long run, risk adjusted returns probably will be equal, but they may NOT be equal for long periods. A global asset allocator will be buying the underperforming assets when they are undervalued, and selling the outperforming assets when they are overvalued.

**3. Performance Chart & Table since 1994 (16.75 years of data)**



Logarithmic versus linear scale: Identical rates of return are linear on the logarithmic scale shown above and have the same slopes regardless of placement on the chart.

That is not true of a linear scale i.e., a linear scale will distort returns; a log scale will give you a realistic image of relative return rates.

| INDEX | Tot Return | Annual | St Dev |
|---|---|---|---|
| S&P 500 Index | 231% | 7.3% | 9% |
| US Small Cap Index | 276% | 8.1% | 11% |
| Emerging Market Index | 199% | 6.6% | 14% |
| European Stock Index | 195% | 6.6% | 11% |
| Pacific Stock Index | 5% | 0.3% | 10% |
| Intermediate Bond Index | 234% | 7.4% | 3% |
| | | | |
| Average Stock | 179% | 6.2% | 10% |
| 50% Stock + 50% Bonds | 239% | 7.4% | 5% |

Try to remember what you were thinking about investing in 1994.

A. Did you have any inkling that the best asset class over the next 17 years would be US Small Caps?

B. Did you have any inkling that an intermediate term bond index would be one of the best performing asset classes in absolute terms, and the best in risk adjusted terms?

C. The Pacific Index is about 75% Japan. What did the conventional wisdom proclaim about Japan at the end of 1994?

D. What did the conventional wisdom proclaim about Emerging Markets and Gold at the end of 1994?

E. Expert opinion is frequently wrong about as often as it is right, i.e., no better than a coin flip, but that does not prevent the experts from making predictions.

**4. Why is the bond portfolio limited to US only high grade bonds?**

There are primarily two reasons to hold bonds in a portfolio:

1. Income
2. To stabilize your portfolio

When you buy international debt, you are destabilizing your portfolio because you are adding currency risk AND you are introducing greater income risk.

When you buy high yielding US bonds, aka junk bonds, you are destabilizing your portfolio because during an economic crisis junk debt is almost certain to fall in value because junk debt will go into default during a crisis.

If you hold ANYTHING other than high quality US debt in your portfolio and if you spend all your time in the US, then you are probably sabotaging your portfolio.

Remember, a high grade bond portfolio will probably rise in value during an economic crisis, but junk bonds and stocks will fall. Do NOT add unnecessary risk to your bond portfolio; there is enough risk in your stock portfolio.

**5. Should an index oriented Asset Allocation model be used for 100% of your portfolio?**

Very few humans are going to be completely satisfied with a simple index oriented asset allocation strategy simply because most humans are never satisfied.

So, if you believe that you can outperform the models I have given you, then I recommend taking about 10% of your total portfolio for experimenting with alternatives.

I also **<u>strongly</u>** recommend carefully benchmarking your performance against appropriate indices and make a serious attempt to determine if your outperformance is attributable to luck or skill.

As someone who has been outperforming appropriate indices for more than ten Years, I can tell you that it will be extremely difficult to determine whether your outperformance is attributable to luck or skill.

Regardless, if you are successful, then you deserve to be recognized. Consider posting a model of your portfolio on the AAII Rochester website so that all of us can admire your success.

**6. Alternate Investments**

There were about 8,000 hedge funds that reported results in 2006, but the total number of hedge funds is impossible to determine because they are unregulated, and reporting results is voluntary, so reported results are meaningless i.e., if you were an underperforming manager, would you report that fact?

Hedge funds typically charge 2% to 3% to manage your assets AND the managers generally take 20% of the profits before anything is given to investors.

Some hedge funds are gonna outperform, and some mutual funds are also gonna outperform, but by this time everyone should know that the winners are impossible to identify before the fact.

**Consider these facts**

1. Hedge Funds typically take 20% of the profits if there are any.
2. Hedge Fund fees are excessive by any standard.
3. Hedge Funds are unregulated
4. Hedge Fund winners cannot be identified before the fact.

It is difficult for me to imagine why any numerate investor would be interested in a hedge fund.

P. T. Barnum said it: "There's a sucker born every minute".

Don't be one of them.

**What about Gold?**

During 1994 thru 98 central bankers were dumping gold and many South African mines were closed because at $300 or so per ounce, gold could not be mined profitably in South Africa.

In late 1997 I stood in front of a group of investors, and said it was a good time to buy gold. Gold closed at $290 in 1997 and four years later it closed at $277 for a total four-year loss of 4.5%

Regardless of my slightly premature recommendation, gold bullion returned a total of 385% from 1997 thru 2010. Contrast this to a 61% return of the S&P 500 over that same period.

I recommended gold in late 1997 because gold was selling for LESS than its production cost. Gold is now selling for about $1700 per ounce. That's about four times its production cost which has been estimated at about $400 to $500 per ounce.

I am not recommending that you buy OR sell gold right now, primarily because an overvalued asset class can continue to grow in value for a long, long time, but if there's an economic recovery, gold will probably decline in value. If not, then gold bullion may be a good bet, but don't advertise the fact that you're buying it.