Activity 9.1
Strategies for Wealth Building

For many people who are struggling from month to month financially, even the term "wealth building" seems alien. Yet when people spend less than they receive and make good decisions, they can, slowly over time, build up the value of what they own.

Wealth building is good for individuals, families, and society because it improves people's quality of life. Whatever goods and services you would like for yourself, your family, or nation—better housing, higher-quality medical care, or anything else—they can be more nearly within reach if you engage effectively in wealth building.

The Three Rules

Many people act as if wealth building were very complex. In fact, an effective approach to wealth building can be summarized in three rules:

1. Start early.
2. Buy and hold.
3. Diversify.

Case Study: Charlayne, the Accidental Millionaire

When Charlayne was getting started in her first job, she didn't use any of her pay to play the lottery or head for the casino along with all her friends. "Come on," they said. "It's the only way you'll ever be a millionaire." She took note of the "Who Wants to Be a Millionaire?" show on television. But she was pretty sure she would never become a millionaire by hitting the lottery or answering game-show questions. Yet Charlayne became a millionaire. How?

Charlayne made an important decision when she began to work. With advice from the company's benefits manager, she decided to have $25 withheld from each weekly paycheck and put into a mutual fund account. That wasn't easy to do. Charlayne had many possible uses for an extra $25 each week. But the benefits manager persuaded her that putting $25 aside each week would be the best thing to do for her future.

Charlayne's company matched the $25 deposit she made each week. This meant an immediate doubling of Charlayne's weekly savings.

Over time, Charlayne didn't exactly forget about her account, but she didn't always monitor it closely. As printed statements arrived in the mail, generally showing that the value of her account was increasing, Charlayne became increasingly comfortable about her retirement plan.

There were times when Charlayne really would have liked to have the money she was saving. But she never considered trying to take her money out of the retirement account. Somehow she found a way to scrape through when there was a financial crisis.

When Charlayne retired, it became clear that her sustained program of investment had served her well. She had become a millionaire. Her retirement account was worth more than a million dollars. Steady payments from that account enabled Charlayne to travel and visit her grandchildren, go to movies or concerts when she wanted to, and live in comfort. She was even able to help with college expenses for next-generation members of her family.

Most people are skeptical when they're told that matched weekly contributions of $25 could make them millionaires — but the math works. The next chart shows how the money kept growing, in this case, until Charlayne became a millionaire.

The chart assumes an average return of 8 percent each year, calculated on the average yearly balance and compounded once per year.

Charlayne Becomes a Millionaire — Accidentally

Year	Beginning Balance	Addition to Principal	Return	Ending Balance
0	$0.00	$2,600.00	$104.00	$2,704.00
1	$2,704.00	$2,600.00	$320.32	$5,624.32
2	$5,624.32	$2,600.00	$553.95	$8,778.27
3	$8,778.27	$2,600.00	$806.26	$12,184.53
4	$12,184.53	$2,600.00	$1,078.76	$15,863.29
5	$15,863.29	$2,600.00	$1,373.06	$19,836.35
6	$19,836.35	$2,600.00	$1,690.91	$24,127.26
7	$24,127.26	$2,600.00	$2,034.18	$28,761.44
8	$28,761.44	$2,600.00	$2,404.92	$33,766.36
9	$33,766.36	$2,600.00	$2,805.31	$39,171.66
10	$39,171.66	$2,600.00	$3,237.73	$45,009.40
11	$45,009.40	$2,600.00	$3,704.75	$51,314.15
12	$51,314.15	$2,600.00	$4,209.13	$58,123.28
13	$58,123.28	$2,600.00	$4,753.86	$65,477.14
14	$65,477.14	$2,600.00	$5,342.17	$73,419.32
15	$73,419.32	$2,600.00	$5,977.55	$81,996.86
16	$81,996.86	$2,600.00	$6,663.75	$91,260.61
17	$91,260.61	$2,600.00	$7,404.85	$101,265.46
18	$101,265.46	$2,600.00	$8,205.24	$112,070.70
19	$112,070.70	$2,600.00	$9,069.66	$123,740.35
20	$123,740.35	$2,600.00	$10,003.23	$136,343.58
21	$136,343.58	$2,600.00	$11,011.49	$149,955.07
22	$149,955.07	$2,600.00	$12,100.41	$164,655.47
23	$164,655.47	$2,600.00	$13,276.44	$180,531.91
24	$180,531.91	$2,600.00	$14,546.55	$197,678.46
25	$197,678.46	$2,600.00	$15,918.28	$216,196.74
26	$216,196.74	$2,600.00	$17,399.74	$236,196.48
27	$236,196.48	$2,600.00	$18,999.72	$257,796.20
28	$257,796.20	$2,600.00	$20,727.70	$281,123.89
29	$281,123.89	$2,600.00	$22,593.91	$306,317.80

30	$306,317.80	$2,600.00	$24,609.42	$333,527.23
31	$333,527.23	$2,600.00	$26,786.18	$362,913.41
32	$362,913.41	$2,600.00	$29,137.07	$394,650.48
33	$394,650.48	$2,600.00	$31,676.04	$428,926.52
34	$428,926.52	$2,600.00	$34,418.12	$465,944.64
35	$465,944.64	$2,600.00	$37,379.57	$505,924.21
36	$505,924.21	$2,600.00	$40,577.94	$549,102.14
37	$549,102.14	$2,600.00	$44,032.17	$595,734.32
38	$595,734.32	$2,600.00	$47,762.75	$646,097.06
39	$646,097.06	$2,600.00	$51,791.76	$700,488.83
40	$700,488.83	$2,600.00	$56,143.11	$759,231.93
41	$759,231.93	$2,600.00	$60,842.55	$822,674.49
42	$822,674.49	$2,600.00	$65,917.96	$891,192.45
43	$891,192.45	$2,600.00	$71,399.40	$965,191.84
44	$965,191.84	$2,600.00	$77,319.35	$1,045,111.19
45	$1,045,111.19	$2,600.00	$83,712.90	$1,131,424.08

Call Charlayne lucky if you want to, but most people could do what she did. In getting her lifetime net wealth to $1 million by age 65, she followed the three rules:

1. Start early. Charlayne began saving when she turned 20, so she had 45 years in which her savings could grow.
2. Buy and hold. Charlayne bought a tiny bit more in financial assets each payday with the small amount withheld from her pay. She never touched that account as it grew over the years. Most importantly, she did not withdraw her money and spend it even when times were tough.
3. Diversify. Charlayne's retirement account was invested in a broad variety of financial assets. It wasn't put into any one asset.

And that is how Charlayne became a millionaire. Let's look at the three rules she followed in more detail.

Rule 1: The Importance of an Early Start

Rule 1 says "Start early." Money that's saved early so that it can work for a long time has a great deal of importance in overall wealth building.

An early start works well because of the magic of compounding. When you save money, you receive a return. In the case of bank accounts, that return is called interest. If you leave the interest in the account, that money also earns interest. In other words, you earn interest on interest. The longer this process goes on, the more it works for you.

Next is a different example that also shows the importance of an early start: Charlayne had a co-worker who didn't start early. Instead of starting to save at the beginning of his career, Marcus held off for 10 years. Then, like Charlayne, he saved $25 per week, and his company matched these deposits for the next 35 years. Marcus accumulated more than $500,000 by

saving as he did. (See the chart.) That's a lot of money. But because Charlayne started early, she became a millionaire and Marcus did not. This example shows how you need to get an early start in order to build significant wealth in a lifetime.

But even if you don't get an early start, then (like Marcus) you can still take big steps toward wealth building. You just have to save more (or settle for less) than if you had gotten off to an early start.

Marcus's Mistake: Waiting to Start Saving

Year	Beginning Balance	Addition to Principal	Return	Ending Balance
0	$0		$0	$0
1	$0		$0	$0
2	$0		$0	$0
3	$0		$0	$0
4	$0		$0	$0
5	$0		$0	$0
6	$0		$0	$0
7	$0		$0	$0
8	$0		$0	$0
9	$0		$0	$0
10	$0.00	$2,600.00	$104.00	$2,704.00
11	$2,704.00	$2,600.00	$320.32	$5,624.32
12	$5,624.32	$2,600.00	$553.95	$8,778.27
13	$8,778.27	$2,600.00	$806.26	$12,184.53
14	$12,184.53	$2,600.00	$1,078.76	$15,863.29
15	$15,863.29	$2,600.00	$1,373.06	$19,836.35
16	$19,836.35	$2,600.00	$1,690.91	$24,127.26
17	$24,127.26	$2,600.00	$2,034.18	$28,761.44
18	$28,761.44	$2,600.00	$2,404.92	$33,766.36
19	$33,766.36	$2,600.00	$2,805.31	$39,171.66
20	$39,171.66	$2,600.00	$3,237.73	$45,009.40
21	$45,009.40	$2,600.00	$3,704.75	$51,314.15
22	$51,314.15	$2,600.00	$4,209.13	$58,123.28
23	$58,123.28	$2,600.00	$4,753.86	$65,477.14
24	$65,477.14	$2,600.00	$5,342.17	$73,419.32
25	$73,419.32	$2,600.00	$5,977.55	$81,996.86
26	$81,996.86	$2,600.00	$6,663.75	$91,260.61
27	$91,260.61	$2,600.00	$7,404.85	$101,265.46
28	$101,265.46	$2,600.00	$8,205.24	$112,070.70
29	$112,070.70	$2,600.00	$9,069.66	$123,740.35

30	$123,740.35	$2,600.00	$10,003.23	$136,343.58
31	$136,343.58	$2,600.00	$11,011.49	$149,955.07
32	$149,955.07	$2,600.00	$12,100.41	$164,655.47
33	$164,655.47	$2,600.00	$13,276.44	$180,531.91
34	$180,531.91	$2,600.00	$14,546.55	$197,678.46
35	$197,678.46	$2,600.00	$15,918.28	$216,196.74
36	$216,196.74	$2,600.00	$17,399.74	$236,196.48
37	$236,196.48	$2,600.00	$18,999.72	$257,796.20
38	$257,796.20	$2,600.00	$20,727.70	$281,123.89
39	$281,123.89	$2,600.00	$22,593.91	$306,317.80
40	$306,317.80	$2,600.00	$24,609.42	$333,527.23
41	$333,527.23	$2,600.00	$26,786.18	$362,913.41
42	$362,913.41	$2,600.00	$29,137.07	$394,650.48
43	$394,650.48	$2,600.00	$31,676.04	$428,926.52
44	$428,926.52	$2,600.00	$34,418.12	$465,944.64
45	$465,944.64	$2,600.00	$37,379.57	$505,924.21

Rule 2: Buy and Hold

The second rule is "Buy and hold." This means that to build wealth over time, you have to hold on to your long-term savings. You can't be dipping into them frequently, or they won't compound over time in the same way.

To buy and hold, you have to have your finances in order. Here are three steps to consider:

- Spend less than you receive. You do this either by earning more or spending less. You can help yourself to spend less by keeping track of where your money is going; then you cut back in places where you can save small amounts. You take the small amounts you're saving and get them out of sight so you won't be tempted to spend what's there.
- Make intelligent choices about financial institutions. Here the goal is to open and maintain accounts at mainstream financial institutions such as banks, credit unions, and brokerages. Then you can accomplish savings and budgeting goals that simply wouldn't be possible if you were still operating on a cash basis.
- Manage your credit properly. When you're managing your credit properly, you're limiting the number of credit cards you have. You're limiting your purchases to what you can pay off each month, without leaving a balance to accumulate interest that you'll also have to pay. As time goes by, your credit score goes up, making it possible for you to borrow when you have a good reason to borrow.

If you're doing all this, you can buy and hold with confidence. Remember the case of Charlayne, the accidental millionaire? Surprisingly, one of the smartest things she did with her retirement account was to neglect it. She just kept having money taken out of her paycheck and put into financial assets, no matter what.

That meant that when her financial assets declined in value because of the normal ups and downs of the market, she didn't change her strategy. Even when the market crashed and the news was full of doom and gloom, she kept her money invested. Financial assets were then, at down-market times, relatively cheap, and her regular contributions bought more than they bought when financial assets were more expensive.

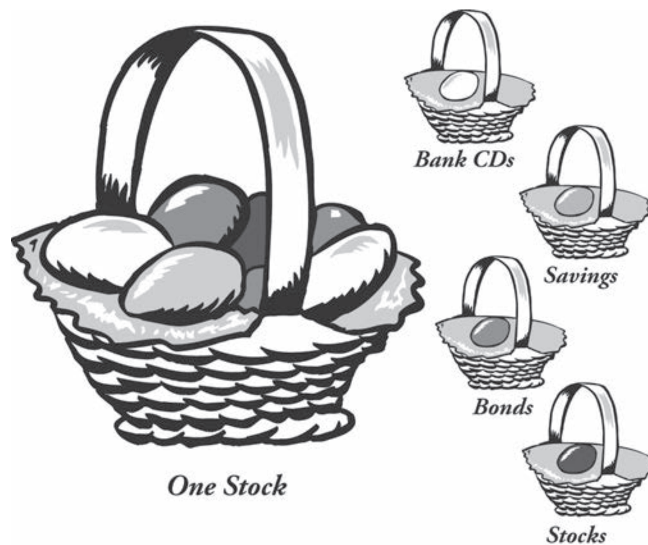
When financial markets went up, those inexpensively-bought financial assets became worth a whole lot more. Charlayne saw televised accounts of people who became rich overnight playing the stock market because the values of their financial assets had become so high. But she didn't think she could play that game, so she just left her retirement fund alone. She held onto it and kept most of the gains, though she was aware that markets were always going up and down.

Over time, Charlayne came out better than many people who worked much harder trying to make more. They tried to jump in and out of the markets with their retirement money. They tried to "buy low" and "sell high," but in the end didn't do as well as people like Charlayne who stuck with the unexciting rule, "buy and hold."

Rule 3: Diversify

Somebody probably once told you, "Don't put all your eggs in one basket." This saying hearkens back to the time when knocking over a single basket might wipe out a week's supply of eggs from the henhouse—if you had put all the eggs in one basket.

To diversify is to take on many small risks rather than one large risk. If you put all of your savings into a new start-up toy company, you could get rich if the company succeeded. Or you could lose all your money if the company failed. That's like having all your eggs in one basket. The same point would apply if you were approached by someone proposing that you invest in a business opportunity. If you put all your savings there, you would again be putting your money at risk.



Any time you take one large risk with your money, you're not diversifying. That's dangerous. It's far safer to spread risks out. This means holding a variety of financial assets rather than just one.

Questions for Discussion

A. What are the three rules of wealth building?

B. Explain how Charlayne, the accidental millionaire, followed all three rules.

Activity 9.2
Forms of Saving and Investing

Below are some of the assets you can choose when you're thinking about where to put your money. We'll start with the safest kinds and then proceed down the list to some riskier ones.

- Savings Accounts. These accounts are kept at banks. They are insured by the federal government, and no one has ever lost even a penny of federally-insured individual savings deposits. Your money will be safe in a savings account. There are two other things to know about savings accounts, however. The first is that the money won't be as easy to spend as cash or money in a checking account. You'll have to make a separate transaction to withdraw the money from a savings account before you can spend it. The second is that the money will not earn a high return. The interest paid on savings is small but steady.
- Certificates of Deposit. Just like savings accounts, certificates of deposit (often called CDs) are made available by banks and are federally insured. When you buy a certificate of deposit, you're tying your money up for a specified period—from one month to a number of years. That means it's harder to spend than money from a checking or savings account. Before spending it, you have to wait until the term is up—or be assessed interest penalties for an early withdrawal. In return for giving the bank greater use of your money, you earn interest at rates somewhat higher than the rates paid on a savings account.
- Bonds. When you buy a bond, in effect you're making a loan. You're lending your money to the organization that issued the bond. The bond will specify under what terms you get your money repaid and what the interest will be. Some bonds are very safe, such as those issued by the federal government.

  Some bonds have medium safety, such as those issued by major corporations. Almost certainly, you'll get your money back with interest, but there's a chance that a major corporation could fail. Some bonds are known as "junk bonds." Junk bonds are high-risk investments. There is a real probability that the companies issuing them may not be able to pay investors back.
- Stocks. When you buy a stock, you're actually becoming a part-owner of a corporation. Ownership is easy to see when four people contribute equally to a new corporation and each owns a fourth of the venture. All four would share in the profits of the business and all four would have a fourth of the decision-making authority. Ownership is harder to see in today's corporations. But while modern corporations issue millions of shares, the principle is the same. If a corporation issues 200 million shares of stock, then buying a share makes you a 1 200-millionth owner of the corporation. You have a claim on 1 200-millionth of the worth of the corporation, and you have 1 200-millionth of the decision-making authority in the corporation. More importantly for investors, some corporations make payments to shareholders, called dividends. You can earn money with stocks by getting dividends, and also by the increase in the value of the stock over time, if the company does well. Of all the assets mentioned so far, stocks carry the highest risk. Some stocks are considered safe or conservative—such as stocks of well-established companies in stable markets. Other stocks are more speculative, such as those of new and growing companies. But there is always risk in holding stocks, along with the possibility of a high return.

- Real Estate. When you own your own home for a long time, it's a relatively safe investment. You pay on the home and you get a place to live. Over time, its value will likely go up and you'll pay down the amount of the loan. But it's also possible to invest in real estate as a landlord. You might buy half of a duplex and rent it out, for example. Being a landlord can be rewarding, but you should know that there are risks that come with investing in real estate (other than your own home). You are responsible for the upkeep on a rental property you own, and also for finding renters who will pay their rent on time. If something breaks, you have to fix it or hire someone to fix it. If a renter is late with a monthly payment, that doesn't excuse you from making payments to the bank on any loans you used to buy the property.

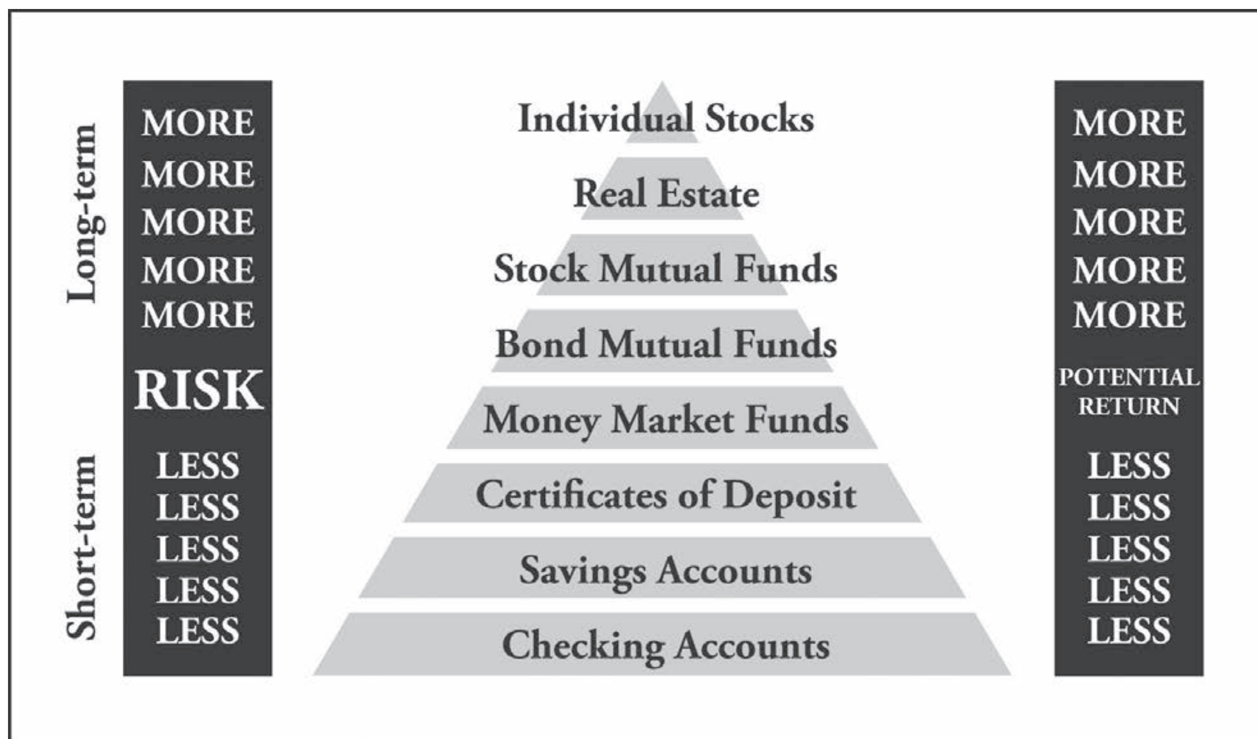
Risk and Return

You may have noticed a relationship in reading about different forms of investing. Safe investments don't offer a big return. If you choose the safety of a bank account for your money, you won't earn a lot of money on your account.

The other side of the coin is that riskier investments offer the possibility of a larger return. If they didn't, nobody would invest in them. As we move from bank assets to bonds to stocks and real estate, we're moving toward assets with many possibilities for things to go wrong—and for things to go right. A company whose stock you buy may succeed wildly or go bankrupt, or anything in between. You take that risk when you own a single company's stock.

Look at the pyramid in the accompanying figure. Toward the bottom of the pyramid there are safe places to keep money. They offer lower returns than the riskier investments noted toward the top. In investing, you should build the bottom of the pyramid with safe investments like bank accounts and certificates of deposit first. Later you can venture into riskier choices, closer to the top of the pyramid.

The Risk-Return Pyramid



Mutual Funds

How do we get a high return while managing the risk? The answer lies in diversifying. When we diversify, we take a lot of small risks rather than a single large risk. The small risks don't add up to much, and they get smaller and smaller over time for an investor who buys and holds onto a variety of financial assets.

We might think of diversifying as a matter of buying small amounts of a lot of different stocks or bonds. But because it costs something to buy each asset, that approach would quickly get to be expensive. Fortunately, there are mutual funds that buy financial assets on behalf of individual investors.

A mutual fund gets a pool of money by accepting payments from thousands of individual investors. It invests its pool of money in a collection of assets. As that collection generates income, the mutual fund sends that income back to its investors in proportion to how much money they have put in. Because of its large size, a mutual fund can efficiently buy large numbers of different stocks and bonds. In the pyramid diagram we saw, mutual funds have lower risks than the individual stocks and bonds that make them up. For example, a single speculative stock has high risk near the top of the pyramid—but a mutual fund made up of speculative stocks has somewhat lower risks because it pools a variety of those stocks. A mutual fund made up entirely of government bonds has very low risks.

Charlayne, the accidental millionaire, owes much of her success to mutual funds. The money in her retirement fund—as is true for most retirement funds—was invested in diversified mutual funds. Charlayne indirectly owned stock in a wide variety of companies. Thus when technology stocks boomed, some of her money was in technology stocks. Also, when automotive company stocks lost value, she didn't lose nearly as much as she would have if she had owned only auto stocks.

Mutual funds are nowhere near as safe as bank deposits. When markets go down, mutual funds follow them down, depending on which stocks and bonds the funds are holding. Over time, however, mutual funds have been an excellent investment, far surpassing bank accounts and bonds in their long-term returns. Many ordinary people have become millionaires by starting early, buying and holding, and using mutual funds to diversify.

Questions for Discussion

What are the advantages and disadvantages of alternative forms of saving and investing?

- Saving Accounts
- Certificates of Deposit
- Bonds
- Stocks
- Real Estate

ACTIVITY 9.3
DIVERSIFICATION

The Callan Periodic Table of Investment Returns

Annual Returns for Key Indices (1992–2011) Ranked in Order of Performance

1992	1993	1994	1995	1996	1997	1998	1999	2000	2001
Russell 2000 Value 29.14%	MSCI Emerging Markets 74.84%	MSCI EAFE 7.78%	S&P/Citi 500 Growth 38.13%	S&P/Citi 500 Growth 23.97%	S&P/Citi 500 Growth 36.52%	S&P/Citi 500 Growth 42.16%	MSCI Emerging Markets 66.42%	Russell 2000 Value 22.83%	Russell 2000 Value 14.02%
Russell 2000 18.41%	MSCI EAFE 32.57%	S&P/Citi 500 Growth 3.13%	S&P 500 37.58%	S&P 500 22.96%	S&P 500 33.36%	S&P 500 28.58%	Russell 2000 Growth 43.09%	BC Agg 11.63%	BC Agg 8.43%
MSCI Emerging Markets 11.40%	Russell 2000 Value 23.77%	S&P 500 1.32%	S&P/Citi 500 Value 36.99%	S&P/Citi 500 Value 22.00%	Russell 2000 Value 31.78%	MSCI EAFE 20.00%	S&P/Citi 500 Growth 28.24%	S&P/Citi 500 Value 6.08%	Russell 2000 2.49%
S&P/Citi 500 Value 10.52%	Russell 2000 18.88%	S&P/Citi 500 Value -0.64%	Russell 2000 Growth 31.04%	Russell 2000 Value 21.37%	S&P/Citi 500 Value 29.98%	S&P/Citi 500 Value 14.69%	MSCI EAFE 26.96%	Russell 2000 -3.02%	MSCI Emerging Markets -2.37%
Russell 2000 Growth 7.77%	S&P/Citi 500 Value 18.61%	Russell 2000 Value -1.54%	Russell 2000 28.45%	Russell 2000 16.49%	Russell 2000 22.36%	BC Agg 8.70%	Russell 2000 21.26%	S&P 500 -9.11%	Russell 2000 Growth -9.23%
S&P 500 7.62%	Russell 2000 Growth 13.37%	Russell 2000 -1.82%	Russell 2000 Value 25.75%	Russell 2000 Growth 11.26%	Russell 2000 Growth 12.95%	Russell 2000 Growth 1.23%	S&P 500 21.04%	MSCI EAFE -14.17%	S&P/Citi 500 Value -11.71%
BC Agg 7.40%	S&P 500 10.08%	Russell 2000 Growth -2.43%	BC Agg 18.46%	MSCI EAFE 6.05%	BC Agg 9.64%	Russell 2000 -2.55%	S&P/Citi 500 Value 12.73%	S&P/Citi 500 Growth -22.08%	S&P 500 -11.89%
S&P/Citi 500 Growth 5.06%	BC Agg 9.75%	BC Agg -2.92%	MSCI EAFE 11.21%	MSCI Emerging Markets 6.03%	MSCI EAFE 1.78%	Russell 2000 Value -6.45%	BC Agg -0.82%	Russell 2000 Growth -22.43%	S&P/Citi 500 Growth -12.73%
MSCI EAFE -12.18%	S&P/Citi 500 Growth 1.68%	MSCI Emerging Markets -7.32%	MSCI Emerging Markets -5.21%	BC Agg 3.64%	MSCI Emerging Markets -11.59%	MSCI Emerging Markets -25.34%	Russell 2000 Value -1.49%	MSCI Emerging Markets -30.61%	MSCI EAFE -21.44%

2002	2003	2004	2005	2006	2007	2008	2009	2010	2011
BC Agg 10.26%	MSCI Emerging Markets 56.28%	MSCI Emerging Markets 25.95%	MSCI Emerging Markets 34.54%	MSCI Emerging Markets 32.59%	MSCI Emerging Markets 39.78%	BC Agg 5.24%	MSCI Emerging Markets 79.02%	Russell 2000 Growth 29.09%	BC Agg 7.84%
MSCI Emerging Markets -6.00%	Russell 2000 Growth 48.54%	Russell 2000 Value 22.25%	MSCI EAFE 13.54%	MSCI EAFE 26.34%	MSCI EAFE 11.17%	Russell 2000 Value -28.92%	Russell 2000 Growth 34.47%	Russell 2000 26.85%	S&P/Citi 500 Growth 4.65%
Russell 2000 Value -11.43%	Russell 2000 47.25%	MSCI EAFE 20.25%	S&P/Citi 500 Value 5.82%	Russell 2000 Value 23.48%	S&P/Citi 500 Growth 9.13%	Russell 2000 -33.79%	MSCI EAFE 31.78%	Russell 2000 Value 24.50%	S&P 500 2.11%
MSCI EAFE -15.94%	Russell 2000 Value 46.03%	Russell 2000 18.33%	S&P 500 4.91%	S&P/Citi 500 Value 20.81%	Russell 2000 Growth 7.05%	S&P/Citi 500 Growth -34.92%	S&P/Citi 500 Growth 31.57%	MSCI Emerging Markets 19.20%	S&P/Citi 500 Value -0.48%
Russell 2000 -20.48%	MSCI EAFE 38.59%	S&P/Citi 500 Value 15.71%	Russell 2000 Value 4.71%	Russell 2000 18.37%	BC Agg 6.97%	S&P 500 -37.00%	Russell 2000 27.17%	S&P/Citi 500 Value 15.10%	Russell 2000 Growth -2.91%
S&P/Citi 500 Value -20.85%	S&P/Citi 500 Value 31.79%	Russell 2000 Growth 14.31%	Russell 2000 4.55%	S&P 500 15.79%	S&P 500 5.49%	Russell 2000 Growth -38.54%	S&P 500 26.47%	S&P 500 15.06%	Russell 2000 -4.18%
S&P 500 -22.10%	S&P 500 28.68%	S&P 500 10.88%	Russell 2000 Growth 4.15%	Russell 2000 Growth 13.35%	S&P/Citi 500 Value 1.99%	S&P/Citi 500 Value -39.22%	S&P/Citi 500 Value 21.17%	S&P/Citi 500 Growth 15.05%	Russell 2000 Value -5.50%
S&P/Citi 500 Growth -23.59%	S&P/Citi 500 Growth 25.66%	S&P/Citi 500 Growth 6.13%	S&P/Citi 500 Growth 4.00%	S&P/Citi 500 Growth 11.01%	Russell 2000 -1.57%	MSCI EAFE -43.38%	Russell 2000 Value 20.58%	MSCI EAFE 7.75%	MSCI EAFE -12.14%
Russell 2000 Growth -30.26%	BC Agg 4.10%	BC Agg 4.34%	BC Agg 2.43%	BC Agg 4.33%	Russell 2000 Value -9.78%	MSCI Emerging Markets -53.18%	BC Agg 5.93%	BC Agg 6.54%	MSCI Emerging Markets -18.17%

- **S&P 500** measures the performance of large capitalization U.S. stocks. The S&P 500 is a market-value-weighted index of 500 stocks that are traded on the NYSE, AMEX and NASDAQ. The weightings make each company's influence on the Index performance directly proportional to that company's market value.
- **S&P/Citigroup 500 Growth** and **S&P/Citigroup 500 Value** measure the performance of the growth and value styles of investing in large cap U.S. stocks. The indices are constructed by dividing the market capitalization of the S&P 500 Index into Growth and Value indices, using style "factors" to make the assignment. The Value Index contains those S&P 500 securities with a greater-than-average value orientation, while the Growth Index contains those securities with a greater-than-average growth orientation. The indices are market-capitalization-weighted. The constituent securities are not mutually exclusive.
- **Russell 2000** measures the performance of small capitalization U.S. stocks. The Russell 2000 is a market-value-weighted index of the 2,000 smallest stocks in the broad-market Russell 3000 Index. These securities are traded on the NYSE, AMEX and NASDAQ.
- **Russell 2000 Value** and **Russell 2000 Growth** measure the performance of the growth and value styles of investing in small cap U.S. stocks. The indices are constructed by dividing the market capitalization of the Russell 2000 Index into Growth and Value indices, using style "factors" to make the assignment. The Value Index contains those Russell 2000 securities with a greater-than-average value orientation, while the Growth Index contains those securities with a greater-than-average growth orientation. Securities in the Value Index generally have lower price-to-book and price-earnings ratios than those in the Growth Index. The indices are market-capitalization-weighted. The constituent securities are not mutually exclusive.
- **MSCI EAFE** is a Morgan Stanley Capital International Index that is designed to measure the performance of the developed stock markets of Europe, Australasia and the Far East.
- **MSCI Emerging Markets** is a Morgan Stanley Capital International Index that is designed to measure the performance of equity markets in 21 emerging countries around the world.
- **BC Agg** is the Barclays Capital Aggregate Bond Index (formerly the Lehman Brothers Aggregate Bond Index). This index includes U.S. government, corporate and mortgage-backed securities with maturities of at least one year.

Callan Knowledge. Experience. Integrity.

© 2012 Callan Associates Inc.