Introduction

FOR A GOOD PART of my life, I read about the great booms and busts of history—the South Sea bubble, the tulip mania, the 1929 crash—but in the late 1990s, I knew my bubble had finally come.

I've had two loves in my life: One is the stock market, the other psychology. Nothing ever happens without people making decisions. Even the bubbles wouldn't be worth talking about without discussing the psychology that drove them. The moods of the market affect not only stock prices but also the fortunes of business.

The Internet stock craze convinced me that there has never been a more important time to come to grips with what has happened to the markets, what we have brought upon ourselves, and where I think this will lead.

So, in early 2000, as the Nasdaq and the Dow were powering to all-time highs, I decided to write a book about my two great passions.

Two and a half years later, in the summer of 2002, the great financial reckoning that has followed the stock market mania of the 1990s

continues to gather momentum. We have been treated to the sight of congressmen who earlier helped weaken the oversight of markets and accounting now rising in high dudgeon against the executives of firms such as Enron, Adelphia, and WorldCom, who took advantage of congressional laxity and investor inattention to line their pockets. We have the spectacle of analysts trying to explain how they could disparage a stock in private e-mails while maintaining the highest buy recommendations in their public statements, even as the companies they recommended hurtled toward bankruptcy. We have seen case after case of companies that used accounting trickery to report strong "pro forma" earnings right up to the point of defaulting on their obligations for lack of cash, and we have seen a parade of accountants who suddenly seem to have found basic accounting very difficult to understand.

The posturing would be entertaining were it not for the \$7 trillion or so in value that has been wiped out since the market peak, ruining the dreams and retirement plans of countless Americans. There is more to come. My instincts, refined by fifty years of experience in finance, tell me that we are in but the third act of a five-act Shakespearean drama that portends a bad ending. Stock prices may have plummeted from their dizzying heights, but neither consumers nor investors have yet realized the perils of the suffocating pall of debt hanging over the financial world. Nor have they reckoned with the increasing difficulty of competing in a global market burdened with excess capacity and idled workers in almost every industry. Even at today's discounted prices, the markets have yet to digest that the massive tide of foreign money that flowed into the markets in the past decade is ebbing and may begin to flow out, and consumers have only just begun to save more and spend less (a nearly inevitable result of harder times that will drive the last acts of this drama).

We've been here before, of course. That's the good news. The

bad news is that one of those "befores" was the 1930s, when it took more than a decade and a world war to digest the excesses of the 1920s. We've had other booms and busts as well—in the go-go 1960s and in the high-flying 1980s with Ivan Boesky, Michael Milken, and others.

This revisitation points to a larger age-old theme: Good times breed laxity, laxity breeds unreliable numbers, and ultimately, unreliable numbers bring about bad times. This simple rhythm of markets is as predictable as human avarice. Regulatory and accounting laxness is easily ignored when stock prices are climbing, but as companies cut corners and hide expenses (to keep prices rising so that executives can exercise options and get their bonuses), they set up a day of reckoning. At some point, bankers, bondholders, or other investors will demand proof that a company has the money to pay its debts. That is when the party ends and the hangover begins. Markets fall, and exaggerated earnings and reduced oversight become very important indeed.

The cast of bad guys is also familiar. Over time, those with capital get used to the fact that the most aggressive and persuasive people approaching them for financing are not always the most scrupulous. The public now is getting a taste of what financiers have long encountered. In the late 1990s, we witnessed a phenomenon in which the unscrupulous turned to ordinary Americans as a source of capital, taking advantage of the teenage romance between first-time investors and the rising stock market. Fast-talking promoters—as well as respected brokerage firms and mutual funds—spoke of "new paradigms" and the unlimited potential of the Internet, and the public bought it.

No one has the excuse of claiming that there were no omens of impending disaster. *The Wall Street Journal, Barron's,* and *The New York Times* reported ably and responsibly on accounting laxity and

the dangers of margin debt. Even as the market became overheated in the late 1990s, the financial press sounded many alarms about the myriad other monsters lurking beneath the waves. But, to borrow a phrase from Bob Dole, where was the outrage? Now that financial shenanigans have cost investors trillions, everybody wants to tighten accounting standards and address other abuses. It has been ever thus. For four hundred years, history shows, governments impose tighter standards only after a market crashes.

An upbeat market leaves the public unmindful of bad news, whereas during a down market, no one trusts good news. Amid the pain of the recession that dogged the first years of the Reagan administration, it was not at all obvious that this downturn represented one of the best buying opportunities for stocks for the balance of the century. Many investors in 1982, embittered by the wallowing stock market of the previous decade, found it psychologically difficult to jump headlong into stocks. Writing in *The New York Times*, Floyd Norris noted that James Freeman, the director of research at First Boston, warned that the market was poised "to take the ultimate dive," precisely as the great bull market of the next two decades began.

Investors were often scared off by experts like Freeman who predicted disaster. In 1982 the United States was suffering through a deep recession, but that year also marked the final taming of the great inflation of the 1970s, which had undermined confidence in the economy and in the dollar for much of that decade. Once the Federal Reserve's restrictions on the money supply broke the back of inflation, interest rates fell. The new Reagan administration also reduced tax rates and regulations that had restrained businesses in the past. If in 1982 an investor had imagined himself in a lowinterest, business-friendly environment—rather than a high-interest, regulatory regime—he might have then sensed the coming surge in capital spending that contributed mightily to the growth of earnings and soaring stock prices in the coming years.

However, it was perfectly reasonable, given the psychological mood of the times, for investors to sit on the sidelines. Investors are very good at recognizing the moods of the past—for example, the Roaring Twenties, the Great Depression, the Swinging Sixties—but we tend to be oblivious to the mood of the present. When do we notice that the world has changed?

Sometimes change arrives with a bang. The dropping of the atomic bomb on Hiroshima instantly and permanently changed the stakes of great-power conflicts. But more often, change creeps upon us incrementally, punctuated by upheavals that, often as not, are rationalized as part of business as usual. Only later do we realize that the world has been turned on its head. Few of the press witnessing the first televised presidential debate between John F. Kennedy and Richard Nixon in 1960 realized then that this emerging medium had profoundly altered the way campaigns would be run henceforth. Indeed, sometimes it is the most trivial events that jog us into noticing grand changes in society.

At the height of the last bull market, I read that the state pension fund in California fired one of its managers because he had invested in U.S. Treasury bonds. Concerned about the overheated market, the manager simply sought to protect his fund against a market decline. His bosses thought he was being foolishly conservative. Certainly, the firing of a fund manager is not the most earthshaking news compared with events such as the 1997 collapse of Thailand's currency, the baht; the Russian default a year later; the accounting scandals of 2001–2002; or other recent events that have sent tremors through the financial world. The item about the unfortunate fund manager caught my attention, however, because five decades earlier, when I arrived on Wall Street, the protocol was precisely the opposite. In most states it was *illegal* for a trust fund manager to invest more than a small percentage of fund assets in stocks. To a fund manager from the 1950s catapulted into the late 1990s, the

notion that someone could be fired for investing in bonds would make no sense, somewhat akin to hearing that ice cream was good for you. Back then, with memories of the Great Depression still fresh, those entrusted with other people's money eschewed stocks as too risky.

Thus, this little item in the paper served as a tap on the shoulder, reminding me about the extraordinary times of the late 1990s. What does it mean that in the space of my career on Wall Street, attitudes toward risk could completely reverse? Until the collapse of the Nasdaq, some argued it meant that the world had changed, that we had entered a "new economy" in which new technologies, free-market trade policies, and sophisticated ways of monitoring consumer demand and inventories had made recessions a thing of the past and eliminated the risk in stocks. That was before inventories and industrial capacity ballooned (particularly in "new economy" companies), and the United States entered a recession in 2002.

One can only hope that with experience will come the ability to recognize those things that do not change, even as fashions come and go. I'm fond of the remark, attributed to Mark Twain, that "history does not repeat itself, at best it sometimes rhymes." Over time, I've noticed that investors tend to invoke "new economies" when they want to justify actions that are unjustifiable by conventional analysis. Rather than heralding a new era, the shift in attitudes toward risk exposed a neglected but hugely important attribute of all markets, past, present and future: namely, the role of psychology.

In the 1950s, investors were very much aware that stocks could go down as well as up. It seemed preposterous in the recent heyday of Internet stocks, when earnings were scorned as a drag on growth, but in the 1950s, investors bought stocks when companies earned money. And they sold stocks if they could get a higher return from triple-A high-grade bonds. Investors reasoned that stocks were inher-

ently more risky than bonds, and thus when dividend yields dropped below bond yields, stocks were overpriced. Imagine the scorn that would have greeted the investor who attempted to apply that rule in 1999. He would have ended up with a portfolio of cigarette companies, perhaps a utility, and little else. Three years later, however, a company's earnings are once again attracting attention.

Until the Internet bubble popped in 2000 and the broader markets began to fall as well, most investors—anyone born after 1960 had experienced only the great bull market that began in 1982. With the exception of the brief but terrifying crash of 1987 and a short recession in 1991, the lesson for investors up to 2000 was that stocks ultimately rise. Consequently, it's not at all surprising that investors were willing to believe theories of the market that would have been viewed as ludicrous if presented a few decades earlier.

To find the last time investors were that ebullient, we must go back to just before the crash of 1929. Then, financial journals were filled with eerily similar arguments that a new economy was dawning that would cause stock prices to rise for the foreseeable future. Given the enormous impact of the cheap automobile, mass production manufacturing, and the proliferation of radio, the telephone, and electrification, it is arguable that the 1920s had a better claim on the concept of a new economy than did the technophiles of seven decades later. (Indeed, the development of mass production techniques in the 1920s later made possible the U.S. mobilization in World War II.) No matter, "old economy" realities exposed the vulnerabilities of that "new economy" as well.

This pattern of generational forgetting may be obvious and simple, but it has profound effects. Markets affect investor psychology, but investor psychology also affects markets. Basically, we all live three lives: our life, the life of our parents, and that of our children. Events within our experience, particularly our youth, remain the

most visceral in memory, but events that lie beyond the horizon of these generations tend to be more abstract, if only because they don't have an immediate connection to our lives. I might warn a Young Turk incessantly about the horrors of a crash or bad market, but I will not likely make an impression on one who hasn't lived through the experience. If societies can forget and then repeat the horrors of war, they can certainly forget the temporary ruination of a stock market crash.

Try to imagine the role of psychology in your investing. What were you thinking or feeling when you bought or sold a stock or bond? What prompted you to pick up the telephone? To what degree did mood and intuition, as opposed to analysis, affect the decision? What assumptions caused you to pay heed to a particular piece of information? Why did you weigh one piece of information over another? What facts did you include in your decision?

Then try to imagine what the person on the other side of the trade was thinking. Investors tend to forget that whoever buys the stock you sell or sells the stock you buy has undertaken his own analysis of the situation. There is a genius on one side of every trade and a dolt on the other, but which is which does not become clear until much later.

Investing is as much a psychological as an economic act. Even hardheaded types who think they are basing their decisions on fundamentals will discover over time that there are fashions in fundamentals. This, in turn, suggests that fundamentals are sometimes not so fundamental after all. In the 1970s, many investors waited each Thursday afternoon for the Federal Reserve to release the figures for M1, an indicator of the money supply, whereupon they might buy or sell depending on whether M1 was exceeding or failing to meet expectations. The crowd that waits for news of changes in M1 before making investment decisions has all but disappeared.

Despite all the evidence that markets float atop an ocean of beliefs and moods, conventional economics minimizes the role of psychology in freely functioning markets. This is odd, since both market seers and economists talk endlessly about the mood of markets. When they sit down to analyze a stock, sector, or market, however, they tend to look upon markets as rational and efficient.

This outlook is very dangerous for one's economic health. It's even more dangerous to misconstrue success in the markets for rational analysis. Those most adept at profiting from a particular market are often least likely to notice when the game is over, and probably the least psychologically prepared to profit from the successor market. Why should they change something that has worked so well for them? Most of the heroes of the "go go" years in the 1960s turned out to be goats in the 1970s. How the heroes of the great bull market of the late 1990s will fare in the years to come remains to be seen.

But the market has even crueler twists. It's not sufficient that a player figure out when the game has changed. When a market shifts, it usually requires the investor to adopt a psychological stance anathema to the precepts upon which he built his earlier success. It will not be easy for the apostles of the so-called new economy to nimbly adjust should the market decide that quaint old-economy obsessions such as earnings and dividends are important after all.

The message is that mood or investor psychology is as important to markets as is information. It requires tremendous discipline to apply this understanding to one's behavior. I encountered a particularly vivid example of this paradox in 1962. At the time, President Kennedy was jawboning the steel industry not to raise prices, and I believed we were about to enter a recession. My colleagues and I at Oppenheimer and Company brought together our top money managers and asked them for their take on the prospects for the market

in general and the particular stocks they followed. All agreed with me that the market was likely to decline. Then I looked at how they rated the expected performance of their particular stocks. I added these estimates and averaged them, to find that these same managers were predicting that their stocks would rise collectively by 15 percent. In fact, our fund fell about 30 percent.

For most people, the most dangerous self-delusion is that even a falling market will not affect their stocks, which they bought out of a canny understanding of value. Piling delusion upon delusion, most people also believe that no matter what happens, they will be able to get out at or near the top of the market.

Both ideas are dead wrong. Demonstrating the latter is a matter of simple arithmetic. Most investors who sell shares are switching their investments from one stock to another. Only a small percentage are switching from stocks to bonds or cash. Let's say that each year, turnover is 70 percent of all shares listed on all the exchanges. And let's say that 10 percent of all stocks sold in a year are by people leaving the market. That means only 7 out of every 100 shares are being sold by people who want cash instead of stock. The odds of cashing out at the top the year the market peaks are thus 7 out of 100 or about 1 in 15. Only a few investors will get out there. The rest will be stuck, either waiting for the price to return to its heights (many people retain the belief that the market somehow knows or cares what price they paid for a stock), or settling for lesser gains or losses.

When a stock plummets, money vanishes. The \$400 billion in market value of Cisco that disappeared during the Nasdaq swoon and the \$70 billion decline in Enron market value represent money that has disappeared, except for the tiny fraction of that amount that went into the pockets of those who sold as the stock plummeted. The market capitalization that vanished has real effects: There is that much less money to finance investment or consumption.

Lost along with this money is the crucial element of trust. The lesson for the public has been that neither companies nor the analysts supposedly assessing those companies' prospects can be trusted. Nor can people always trust the independent accountants who certify company reports. They cannot even always trust the financial cops of the Securities and Exchange Commission (SEC) to catch cheaters in a timely fashion. When people don't trust the information or institutions of a market, they won't buy its products.

The market meltdown was a reminder to all of us that no one has a system to beat the market. This is not to say that no one can beat the market, but an investor should greet any promise of automatic returns with great skepticism. Most investors know this, but still, people love systems. I remember once visiting Monte Carlo, where I looked up a friend of my mother's who loved to gamble. She was the widow of a successful accountant, and she kept her husband's ashes in a vase on the mantelpiece, along with the ashes of her favorite dog, Gilligan. One day, watching her play roulette and feeling a little mischievous, I said, "Have you ever noticed that the numbers that come up at the other roulette table often come up at this table a few minutes later?" Without missing a beat, she replied, "Oh, yes, that's the echo effect. A lot of players use it."

The example is absurd, of course, but a similar hunger for order in a capricious world causes even very sophisticated investors to impute their success to equally implausible systems. I've always been suspicious of theories about the nature of markets, and my experience as an investor has only served to harden this bias. It is highly unlikely that any of us will encounter a unified theory of markets some equation with variables into which an investor can plug numbers and derive an answer as to where to invest. To the degree that markets are governed by psychology, they resist reduction to some neat theory or system.

Apart from the unfathomable aspects of human psychology, there is never perfect knowledge about the world. Simply put, we don't know what we don't know. In the early 1970s, all the calculations for the cost of the Alaska pipeline were thrown out of whack when environmentalists sought injunctions to halt the project until the pipeline's effects on caribou could be studied and addressed. It was thought that the pipeline as then designed would disrupt the normal migratory patterns of the caribou, which survive by eating lichens in one of the most inhospitable climates on earth. Dealing with the caribou delayed the pipeline for about eight years, and since time is money, the changed timetable forced the pipeline's owner, Atlantic Richfield, to reprice the bonds that would finance the project. Caribou, or their equivalents, always have a way of turning up in big projects, and ever since then, investment professionals have referred to such unknowns as "the caribou factor."

If human nature makes markets inefficient and moody, and the caribou factor defeats the most exquisite analysis of financiers, it is natural to ask how anyone might hope to make money in the markets. Markets may be inherently unpredictable—the efficient-market theorists are right about that—but there are always clues in the actions of government and in the behavior of major economic actors that offer guidance for the attentive about developments that offer opportunities.

A good idea, a long-term perspective, and the creativity to implement a strategy to profit from your insight are necessary to prosper in finance, but they are not sufficient. None of these qualities will bear fruit unless you have the discipline to stay with your strategy when the market tests your confidence, as it inevitably will. When you have made a massive bet and markets start to go against you, it is always a good idea to reexamine the assumptions behind your strategy. Even if you are still convinced you are right, however, it is diffi-

cult to resist the temptation to cut losses or take a quick profit.

In such circumstances, it is easy to lose sight of the fact that ultimately the market does reflect value, even if it may seem to lose its marbles for unbearably long periods. Investors must decide how long they are willing to wait. Investors also have to be alert to changes in the market that could change their original assumptions. We may not have an efficient market, but we do have a pretty efficient market. Or as the legendary value investor Benjamin Graham once put it: In the short term, the market is like a voting machine, reflecting a company's popularity, but over the long term, it more resembles a weighing machine, reflecting a company's true value. This is the aspect of markets that allows the great investors to outdistance those who are lucky.

Now we are learning that the great bull market of the past decade was built almost entirely on illusions. The new economy was slain by old-economy realities. Much of the earnings growth was the result of bookkeeping sleight-of-hand. Even the notion that stocks always outperform bonds over the long run—the mantra that lured so many first-timers into the market—is now under attack as various economists argue that the numbers are far more even when adjusted for stocks that have disappeared from the market, and discounted for the risk inherent in the volatility of stock prices.

Why should the market be any more perfect than the very human emotions and calculations that drive it? Investors overreact, and so do markets. Investors get swept up in moods, and so do markets. And this interplay creates investment opportunities.