BOOK SUMMARY

# A Piece of the Action

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# BOOK SUMMARY OF "A PIECE OF THE ACTION" by JOSEPH NOCERA

***By Pradyumn Kothari***

This book is not easy to get your hands on in India, but it is a fine read for anyone interested in how the Financial Markets in the United States of America have shaped up in the 20th century till about 1993. This also gives interesting insights into how the Indian financial markets could evolve over the next few years. When I use the term "financial markets" I am referring to the entire eco-system of Banks, Non-Banking Financial Companies, Mutual Funds, Brokerage Firms, Credit Card Companies, etc.

It is difficult to believe, but the USA as a country was at least as conservative as India was till a few years back till the 1940s and possibly even up to the 1960s; and then a combination of macro-economic conditions, geo-politics, policy interventions, regulatory changes and creativity of financial market participants created a tectonic shift in the structure of the financial markets for the USA – both for institutions as well as for individuals. The end result was the consumer credit fuelled economy the USA is better known for today.

In the early 1900s, banking was a service only available to the rich or to large financial entities. Consumer loans or "retail" loans were only given by "finance" companies – NBFCs – and were looked down upon by the banking elite. There was no concept of "cross-selling" insurance, stocks or other financial products.

The first banker to think of "retail" loans was the son of an Italian immigrant, A. P. Giannini, who set up the "Bank of Italy" in 1904 in the state of California, and focused on "the little guy" as his primary target base. By 1918, in just 14 years, it had become the 4th largest bank in California – America's 2nd largest state by area and one of its most populous states. In another three years, after a string of acquisitions, the "Bank of Italy" became the largest bank in California with assets of $93 million.

In 1945, the "Bank of Italy" had become the largest bank in the world with assets of $5 billion! And it had a new name – "Bank of America"!!

American banking laws were extremely restrictive, and didn't allow the free growth of banking services. In fact, the "MacFadden Act" passed in 1927, seemed to specifically target A. P. Giannini and outlawed interstate banking – you could only have bank branches in one state! Then the Depression hit the USA and the "Glass-Steagall Act" was passed which explicitly separated banking from insurance and investment firms. American politicians and even people in general believed that taking on any form of debt was dangerous and perhaps even immoral, and politicians felt that it was their job to protect people from themselves! In this environment, it was only the finance companies which prospered, and the banks felt extremely restricted.

But no amount of artificial intervention can stop the flow of the basic economic concept of demand-supply automatically occurring. Due to the depression, trade became tough and customers and merchants were forced to take credit to conduct business operations! Between 1945 and 1960, consumer credit exploded from $2.6 billion to $ 45 billion – almost 17 times in 15 years!! And in 1970 this figure further increased to $105 billion!! This change was led by the Bank of America. They gave loans to the middle class and common people whereas other banks didn't because they thought it was demeaning as well as because the cost structure required to keep track of the loans by employing more people would simply not be suitable for them – a reason because of which Gold Finance companies and micro-finance companies continue to do well in India in 2020 also.

While banks weren't giving out credit cards, there were several functional equivalents of these cards already in existence – gasoline cards, department store cards, Sears cards, airline charge accounts.

To put things in context, Bank of America had 700 branches in JUST the state of California with a population of 1.6 crore people in 1960.

The first tryst American society had with credit cards issued by banks was in 1958 when Bank of America simply mailed 60,000 credit cards in the city of Fresno in California with no prior background check and without any charge. There were no data collected to determine the appropriate credit limits for a card.

Fresno had a working population of around 2,50,000 people, and 45% of the families there did business with the Bank of America!! Before this practice was outlawed 12 years later, 10 crore cards had been "dropped" in this manner in the USA.

The bank intended to generate revenue by charging a 6% "merchant discount" and by charging money for the printing machines given. It is important to understand that any successful credit card programme can only be run if both sets of entities are amenable to the terms – customers and the merchants–middle men.

The haphazard manner in which the cards were sent out created some obvious issues such as frauds, cards being stolen, duplication of cards, theft of cards, etc. There wasn't even a collection department. As a result, the Bank of America had lost a princely sum of $ 20 million in a year and a half.

Despite this, credit cards were here to stay because they solved very real problems for both sets of its users – the merchants and the customers. The merchants had finally found a reliable counterparty in the Bank of America who would give them their money in a few days rather than a few months, and for the common man it replaced the need to go to a bank to withdraw money for each small transaction or to go through the hassle of generating a loan from some financial entity.

The 2nd chapter of the book changes to discussing another aspect of the financial system – the broking business. Charlie Merrill of Merrill Lynch was the one who popularized the stock market for the common people of America. His firm was founded as Charles E. Merrill & Co in 1914. It became the largest and most successful brokerage firm on Wall Street.

Till now, the stock market was a preserve solely of the affluent and the insiders, where brokers decided who would be permitted to trade and who would be turned away. Merrill had the foresight to see that this had to change. The second insight he had was that large banks only financed the already large entities in rail roads and utilities which was also done only to promote their stocks. He felt that these stocks were overvalued and started financing the "emerging growth stocks" of the auto industry and the chain departmental stores. This allowed him to make a large sum of money in the run up to the Depression.

And then he had possibly his most staggering insight in terms of protecting his capital. On March 31, 1928 Merrill was the first to tell his clients to get out of the stock market. He was early and the market made new highs. He had even told the President of the USA to dampen speculation, but the President didn't act on it. But Merrill sold the rest of his stock on the way up and then the crash happened. The crash was so bad that Merrill wouldn't come back to the broking business for a decade because selling stocks to people was simply impossible in the backdrop of the fall.

Merrill's next big tryst with brokerage came when he acquired a dying firm of E. A. Pierce & Co in 1939, to rechristen his firm Merrill Lynch, E. A. Pierce, and Cassatt & Co. Then Merrill had the insight to use the successful principles of the chain store industry to broking!! He focused on mass marketing, high volume, low cost, saturation advertising and even setting up a national distribution network!! This was unheard of in those days and was in fact even mocked when he announced his intentions to do so.

At this time, collecting dividends was charged by brokerage firms. Merrill did it for free. He would charge the minimum brokerage legally allowed instead of the high rates other brokers charged. Finally, his employees would be paid by a salary instead of the commission that they earned through the trades which was the then prevailing Wall Street practice. This last bit set the incentives right for Merrill's employee's vis-à-vis the ones in other firms.

He made it a mission to target the common American who wasn't very affluent but still had some disposable income. To do so he went on a blitzkrieg of advertising. $1 out of $4 spent on advertising done by Wall Street was done by Merrill Lynch. The organization published some 11 million pamphlets, articles, reports in 1955 alone!! They were running television ads years before anyone else.

By the time Charles Merrill died in 1956, his company had 122 offices, 119 partners and 5,800 employees with $83.5 million in revenues and $18 million in profits!! Merrill Lynch did 20% of the odd lot volume (below 100 shares) and 12% of the larger round lot volume. In 1953, stocks were still shunned by people and there were only 65 lac individual investors in the market, about 4% of the population. This figure had grown to 1.2 crore people in 1959, but in general people were still aloof. Most of these people had seemingly made money in their professions of being doctors, lawyers and middle managers of growing companies like IBM and Eastman Kodak.

The markets seemed to become interesting again due to the publicity generated by a fund manager Gerald Tsai, of Fidelity Management and Research, which was owned by Edward Crosby Johnson 2d. Otherwise, mutual funds were quite uninteresting to the general populace. Tsai had started managing Fidelity's Capital Fund in 1957 from 0 and turned it into a $340 million mutual fund eventually. The performance of this individual fund manager started generating the publicity which Merrill Lynch had only dreamed off but never got remotely close to despite its best efforts.

However, Tsai would leave Fidelity in 1965, when it was apparent that the reigns of Fidelity would be handed over to the owner's son Edward Crosby Johnson 3d, who was himself, a successful fund manager. He set up his own firm by raising $250 million – a figure beyond his wildest expectations, and it charged 8.5% upfront commission!! To understand how hot mutual funds had become here is a figur e - $1.6 billion of new money had come in just 3 months!! But then the market tanked and Tsai fell off from the scene as dramatically as he had appeared – but not without popularizing mutual funds in a way which seemed impossible before just a few years back.

The 3rd chapter deals with the Bankers of America from November 1966 onwards.

Bank of America had enjoyed a monopoly on the credit cards market of California for almost 8 years! Finally, its rivals started thinking of getting together to offer an alternative credit card programme called Master Charge. In fact, on the east coast, First National City Bank, better known now as Citibank, was looking to buy Carte Blanche – a travel and entertainment card provider – which had a national network of clients. It did so in 1965.

Thus, after decades, banks in America were finally thinking of competing against one another again. All of a sudden, from one single bank, hundreds of banks started issuing credit cards in America – big or small, single or otherwise.

Banks across the country were right in fearing that Bank of America would try and capture the entire country's credit card market. Such a suggestion was mooted by Kenneth Larkin on March 25, 1966 to his superiors.

In April 1967, 627 banks were issuing credit cards, and this number was rising.

32 million cards were issued in 1967 alone!

Chicago, which was the "lab rat" for the banks' competition in credit cards, had 5 million cards simply mailed to people in a few months!! This was without any background or demographic check. Most people were still conservative and they started throwing away these cards! These were then of course used by unscrupulous people thereby creating bad debts for the banks.

Here, it is important to understand the system involved in dealing with credit cards – something which is taken for granted nowadays. But this was even before the Computers era, let alone the Internet!! When a customer used a credit card, which could be of any bank! – the merchant's bank had to confirm whether such a card was genuine. Then, the card would be accepted for payment. After this, the merchant discount would be deducted and the merchant bank had to make the payment to the merchant. A draft of this transaction would then be sent to the bank which had issued the credit cards so that these banks could reimburse the merchant banks, after taking a cut for the transaction. And finally, when the customer paid this money, the transaction would be complete!!

All of this had to be done without the instant communication we have through the Internet today, and even without computers!! This had to be done via telephone and manual verification of data!!

This complexity caused obvious issues and almost all cards collapsed. There were just two cards left – BankAmericard – which would later become Visa operated in 44 states, and Master Charge – which would later become Master Card operated in 49 states.

Even Bank of America struggled with the complexity of handling these transactions. Their systems were collapsing and other banks working with them also knew it.

This was salvaged by one man Dee Ward Hock – who envisioned that the credit card would replace cash as the medium for transaction, and that all these would be codified in the binary digits of the computer world!!

The 4th chapter deals with events relating to the Mutual Fund Industry post the heady years of the late 1960s.

In this period, Mutual Funds had been promoted as the ideal way to invest in the stock market, and Fidelity had also benefited from it. But then the Dow crashed from 1052 in 1973 to 578 in 1975. Fidelity, along with all mutual funds had been lampooned in this period.

However, Fidelity, under Edward "Ned" Johnson 2d, had filed for a product which was basically the equivalent of liquid funds in India today. Until then, there was no such system in USA where a person could park surplus cash! It would be only be in bank accounts where money could ONLY be saved, not invested. This "cash management vehicle" allowed a person to park their savings and get more interest than what banks offered in their savings accounts, and also gave them the option to invest in mutual funds without having to withdraw that money and then give it to another institution. It became a one stop-shop for people.

An important factor to understand here, is that the savings rate offered by banks was regulated at around 5% in the 1970s by a piece of legislation called Regulation Q which was set up post the Depression and allowed their Central Bank – the Federal Reserve – to set interest rates, but those offered by these money mutual funds were not, and they offered 10-11%. This created a regulatory arbitrage. But bankers mocked this and believed it was doomed to fail.

However, no bankers had also never complained about Regulation Q in nearly 40 years. This was because they had no serious competition from any alternate source of funding, and banking was a "friendly" business till then. Consumers also hadn't clamoured for higher rates because inflation had been virtually non-existent for decades. Surprisingly, no mutual fund had struck upon this idea for all these decades either.

Another arbitrage soon opened up. The Federal Reserve had raised the minimum ticket size for investing in T-bills from $1,000 to $10,000 in 1970 under Paul Volcker. The cash management funds initially only purchased T-bills and allowed for a minimum investment of $1,000 and top-ups of only $100. This was then changed to include other bonds and debentures also.

Two other very significant events happened at this juncture. The US President Nixon took the dollar off the gold standard and also announced wage and price controls.

Despite such an obvious arbitrage, the fund launched by the pioneers Bruce Bent and Henry Brown on the East Coast, was nearly sold due to financial distress even after 1 year of operations.

Then, seemingly a random event happened. In January 1973 the "New York Times" featured an article on the Sunday edition covering this fund titled "Overnight Mutual Fund for Surplus Assets". This triggered nothing less than an avalanche of funds. By February, the Fund had $2 million in assets and by year end this figure had become $100 million.

The above fund created another novel scheme – "dollar pricing". This essentially meant that the principal was separated from the interest on a daily basis. This allowed this fund to resemble a bank account!

The last addition which needed to be done to make it completely replicate a bank account was the feature of writing cheques against it. This, however, was introduced by Ned Johnson of Fidelity. While the interest provision was quickly replicated by other funds including its much larger rival, Dreyfus, what was a game changer was allowing people to quickly take money out of these funds by writing cheques, unlike what the norm had been wherein it often took weeks to take money out of a mutual fund.

This led to another major idea for Ned Johnson which shook up the broking industry. What if mutual funds could be marketed like money market funds – directly to the public with no intermediary? This would reduce costs and allow them to build a brand.

The 5th Chapter deals with how the system for dealing with credit card transactions was computerized and all the intense organizational politics, complicated negotiations, power struggles and technical issues that came along with it. This is largely due to the efforts of one man – Edward Dee Hock.

A large part of the consolidation of the credit card industry took place because Hock managed to convince several banks to come together under one umbrella wherein Bank of America would become the sole clearing agent for credit card transaction since it had the financial muscle and the technical knowhow under him – a feat extremely difficult for most banks. This resulted in the formation of National BankAmericard Inc: NBI for short. This is what would eventually become Visa.

American society as a whole was still debating the merits and demerits of credit cards, and at least overtly they still considered it to be immoral. But it had simply become too deeply enshrined in their daily lives. Several surveys were conducted. Some obvious results which came through were that higher income families preferred to use cards, and so did younger people. But there were some paradoxical observations as well. People who used credit cards tended to write more cheques than others. And about 15% of affluent people tended to pay interest of 18% on their credit card bills despite having the resources to pay up in time!

At the cost of repetition, it is important to understand the process linked to the working of credit cards even in 1993 when this book was written to understand the complexity before this era.

When a person used a card to make a payment, the storekeeper swiped it in a device which triggered a phone call, after which he keyed in the purchase price. While he filled out the credit receipt he had to wait for the device to “authorize” the purchase. This took a minute in 1993. It took over 5 minutes in the 1970s!! We should pause to think of the scale at which technology improved in this period, and it is this that led to a greater acceptability of the credit card. The network for connecting the calls also had to be constant and without any glitches the entire time! In 1974, there were more than 200 million transactions; and in 1994, this figure was nearly 6 billion!

All this while, Hock kept on being technologically a step ahead of their rival – Interbank, which would later become Master Card.

The 6th Chapter describes the role of a man whose luck in the broking business that he operated can be only termed extraordinary – Charles Schwab.

On May 1, 1975, the New York Stock Exchange deregulated brokerage commissions after 183 years! This enabled the space for competition in terms of charges in the broking industry, and gave rise to discount brokerages. People initially thought that the big brokerage houses would reduce commissions to kill competition, but in fact the reverse happened! The biggest house of them all – Merrill Lynch INCREASED retail commissions by 10%!! This was quite different from the ethos on which it had been built.

Schwab was initially helped by his perennial and recurring benefactor – his uncle, William Schwab. In the Go-Go years of the late 1960s, Schwab managed to set up a fund of $ 20 million in assets – the largest in California. But by 1972, the venture collapsed and Schwab was in debt of $ 100,000. Once again, his uncle Bill financed this deficit and bailed him out. A new firm First Commander Corporation was set up.

After a couple of years of floundering, in the April before May Day happened, the NYSE deregulated commission prices on a trial basis. Schwab seized this opportunity to offer brokerage at a progressive rate of 30% to 80% below what others offered! And when May Day finally came, he went hammer and tongs at it. But this wasn't as easy as it sounded. The NYSE was still a clique of elite brokers who decided to cartelise and take advantage of every law to keep the club limited, including refusing to transact with brokers outside their cartel.

Around this time, NASDAQ had been set up as alternate stock exchange. But NYSE brokers refused to cede ground and in fact went to the SEC to demand a further increase in commissions of 10-15%. This was granted. But by getting in exchange a promise for deregulation of brokerages in 1 year time by end of April 1975. All firms working in the NYSE had been on board with this, except one. The one was Merrill Lynch under Donald Regan who actually wanted to embrace these changes.

Merrill Lynch was one of the first brokerage firms to go public with an issue of $56 million, and it created over 200 millionaires. He used this money to fend off competition and expand by taking over distressed brokerage houses. But despite his support for deregulating brokerage, Regan was forced to increase brokerage charges to pay for the commissions needed to sustain Merrill's bloated structure. Here, it is important to note the scale of Merrill Lynch.

In 1974, Merrill Lynch had $800 million in revenues generated by over 6,000 brokers and through 200 offices. Merrill Lynch was FOUR times larger than the second largest wirehouse.

Schwab used this opportunity coupled with an insight from a well-known fact. 10% of customers generated 90% of revenues. He intelligently exploited another loophole. Brokers thus far, sold stocks to clients. So they had to recommend stocks according to the risk profile. Schwab decided he simply wanted to execute trades and make no recommendations, so he didn't have to "know his client".

While Schwab caught on to the right theme, financially managing his company was another matter altogether. He was simply focused on expanding without any regard for building a proper set-up. He kept on hiring more and more telephone operators, paying them much more than industry to handle call volumes. Schwab's volumes had jumped from 4 trades a day in April 1974 to over 2000 a day in 1978. Even with computers this turned out to be an onerous task.

Schwab's had another insight purely due to chance. The importance of a physical presence and proximity. This happened because his uncle Bill again gave $300,000 to Schwab to expand post May Day, but on the condition that he opened a branch in the small town of Sacramento. It seemed like an additional cost for a discount broker like Schwab since trades could have been executed via telephone. However, when the branch opened in September there was a very noticeable jump in trade volumes, and this was without advertising. The only answer seemed to be that branches did matter psychologically. Schwab successfully

repeated this process in city after city post that. The importance of proximity was again seen when Schwab opened branches closes to Silicon Valley, where large numbers of computer companyemployees were being granted with stock options, and they began to trade with Schwab.

To cement his growth, Schwab began using his own face in advertisements. This was mocked by other people, but it brought him huge success.

The 7th Chapter of the book describes the important outcomes of some surveys conducted in the financial markets, and the aggressive actions of Citibank which made it "The World's Most Hated Bank"!

The 1970s was a time when America was changing financially, fast. Debt averse America saw the usage of credit cards increase 30% a year on occasion. The Glass-Steagall act was being regularly assaulted and organizations were actively hunting opportunities for cross-selling products. A major action favouring Savings and Loan Institutions(S&Ls) took place in the 1970s. S&Ls were just allowed to pay interest to people. For writing cheques, people had to go to a bank to do so. But with the permissibility of the Negotiable Order of Withdrawal (NOW) account, S&Ls were also able to do the same. This was an extremely important development. This allowed these institutions to do the same business as banks but without any of the strangulating regulations.

The Stanford Research Institute (SRI), which is also responsible for the security features of cheques even today, authorised Carl Speltzer to undertake a survey of the financial services structure in America. There was one other person who was pivotal in the work being done at SRI – Andrew Kahr. Andrew was born in 1941 and was a Ph D in mathematics from MIT – a financial wizard whose focus was observing patterns and finding solutions. He turned his attention towards the financial markets.

In the financial survey conducted by the SRI, Kahr insisted that only questions examining past behaviour be asked.

There were several important facts that came out from the survey.

- Savings and checking accounts held 16% of total household assets, second only to real estate
- People had money in the bank, but still they revolved credit card debt! People didn't view credit card debt as a loan.
- Females seemed to be more risk averse as compared to males.
- People's financial decisions seemed to be only driven by inertia. For instance, people bought life insurance only because their friends did.
- The only aspect important to retail banking was the convenience of location, not service or even lower loan rates.

During this time period, Citibank launched a feral assault on the credit card market of America. Its credit card drop which began in August 1977, culminated in 26 million credit card solicitations.

Citibank had become the country's second largest bank behind Bank of America after surpassing Chase Manhattan in deposits in 1971. Under the aegis of Walter Wriston, it was a bank designed to disrupt, at any cost. Its middle level management had people from marketing backgrounds in food companies who thought of bank accounts as "product lines" which had to be sold. Citibank started lending internationally aggressively. It did business in 92 countries. Wriston wanted all the regulations in banking to go because he realised it was allowing all other financial institutions other than banks and S&Ls to take advantage. Wriston's deputy was a young man named John Reed.

John Reed was being groomed as Wriston's successor, but more importantly he had a clear focus on how technology could help in consumerism. He forcefully set up the first ATMs against customer wishes. He kept on doing phenomenal "R&D" expenditure which seemingly had no benefit. In fact, in the end the cost was some $500 million. But Citi had the financial muscle and the willingness to do it.

There were several events which allowed Citi to conduct such a credit card drop in 1977 after the monumental failure seen earlier. The mid 1970s saw the emergence of credit bureaus which allowed better data to evaluate even unknown faraway people. In 1976, "duality" was allowed. Duality meant that the same bank could issue both Visa, as well as Master Cards. Citibank took advantage of this to issue 3

million Visa cards, and coupled with its Master Charge portfolio, it became the largest issuer of credit cards in the world. It stayed this was till at least 1993.

The 8th chapter of the bank describes the importance of Donald Regan, and possibly his single biggest contribution to the financial markets – the cash management account.

Donald Regan was the second over-bearing figure Merrill Lynch had seen after Charles Merrill. He wanted to get into banking, but without the hassles of regulatory oversight. He was instrumental in coining the successful slogan "Merrill Lynch is bullish on America". He eventually became Treasury Secretary under the Ronald Reagan government in 1981. Regan acquired a firm called Lionel D. Edie to finally expand into the mutual fund business from the broking business. He also had an early insight into the importance of "asset gathering" as the economy grew.

Regan was as astute as he was arrogant and bull headed. He was quick to recognize that once May Day happened, Merrill could very well expand into other financial divisions. He was also able to understand the need for diversifying from just the mutual fund and broking business which was susceptible to the vagaries of the markets to something which provided a more consistent earnings stream. He was aided in this endeavour by two individuals – a consultant Ted Braun, and Andrew Kahr.

Kahr, just like his reputation suggested, designed a product which shred all financial regulation like a hot knife through butter. It was an extremely intricate piece of technical work in the back-end, but an extremely simplifying tool for the customer called the Cash Management Account (CMA). The CMA had a stock or bond portfolio at its base, but it also had a money market fund attached to it. This allowed the dividends and other pay-outs to be directly credited to this account which immediately started earning interest. Cheque writing naturally was also there.

Kahr came up with another remarkable feature. He attached a card along with the CMA which would act as a debit or credit card depending on circumstances. This was initially targeted only at the rich since there was a minimum balance requirement of $20,000. This was a direct assault on the basic operation of banks.

There was a serious drawback in the CMA in relation to a brokerage house. It took away all the free money clients left with brokers, not only depriving Merrill of interest earned on the idle money, but also having them to pay interest to customers as well. This was opposed by the insiders of Merrill Lynch who believed the CMA was a lame product and was hurting their key business of earning commissions. The only reason CMA continued was because Don Regan forced it to be so. The loss of interest was compensated by levying an annual fee. And when the customers started using the CMA as a one stop-shop, Merrill collected a figure TEN times their best estimates!

It wasn't easy to roll the CMA nationally due to local opposition from Banks in various places, but Regan found a way. And another unforeseen factor led to the mass acceptance of the CMA – inflation, the likes of which had not been seen before in decades, and the stringent regulations preventing the banking sector from acting appropriately.

The next few chapters discuss the economic and political scenarios which led to the acceptance of the money revolution.

The 9th chapter talks about the effect inflation had on the middle class in particular and how it drove them to accept the new financial products which were on offer. The inflation figures are staggering.

America experienced an inflation of 12.3% in 1974 under President Gerald Ford. Although inflation was then tamed to under 5% in 2 years' time, the unemployment rate shot up to 8%. This resulted in Jimmy Carter becoming President in 1976. Low unemployment and low inflation just do not go together according to Keynesian economics. Carter chose the path of lowering unemployment.

The expectation of inflation ended up creating even more inflation. People were no longer helpful to one another in terms of sharing of resources as they had done during the Depression. In fact, people were now happy to hoard resources and didn't find this to be immoral. Workers demanded higher increase in wages to counteract the high inflation rates. In 1977, when the government buckled down to allow a 37% wage increase for the United Mine Workers, Carter's administration was never taken seriously again.

Inflation again began inching up and the Consumer Price Inflation (CPI) rose to 6.7% in 1977. By end 1978, CPI was at 9%, and by the end of 1979 CPI was at 13.3%!! This was the worst level since 1946.

It's not that there were no steps taken by the Carter administration to rein in inflation. It's just that they were feeble and half-hearted, and also lacked a clear strategic direction. Then external factors added to the inflationary tendencies. OPEC had increased prices by 14% in one stroke in December 1978. But they would almost DOUBLE oil prices to $22 in a single stroke in June 1980!

To understand, what the common man was enduring we can look at some stats. Wage negotiations resulted in 30% hikes. Meat prices went up 85% in 3 months. Medical costs went up by 11% in no time at all. There was panic.

This also led to the first thought in the minds of people of taking loans to pay tuition bills, a common practice today but unthinkable in conservative America till then. The only asset class which seemed to protect against inflation was housing. And housing prices rocketed up.

This also resulted in stagflation and the American Gross National Product was expected to contract by 1% in 1980! The government seemed to have thrown in the towel. The field of action now shifted to the Federal Reserve with the appointment of Paul Volcker as Federal Reserve Chairman in early 1979.

Volcker's intention was to regulate money supply to bring down inflation. It was eventually successful, but in the interim, prime banking rates moved up from 12% to 15.75% in 1979, then to 16.5% in February 1980, and finally to 19% in March 1980!! Inflation was measured at 16.4% when Carter remitted his Presidency to Ronald Reagan in 1980!!

The 10th chapter puts out some mind boggling statistics and observations. It then describes, finally how, bankers tried to fight against money market funds, and especially the CMA.

The only way for Americans to fight inflation was to work more to earn more! This created another huge social shift with the increase in two-income couples. They formed 1/3 of America's families in the late 1960s, but a decade later, this figure had already shot up to 45%. Thus far, Americans bought houses to live in. For the first time, people began expecting that they would never pay up for the entire mortgage, merely till the time they lived in this house. This is because people began trading the houses in which they lived like stocks, selling them at a time so that they just escaped short term capital gains on it!

There were two significant changes that took place in this period of "Great Inflation". The large young population of America had never experienced the Depression, so they had never experienced financial distress, and so they started borrowing like never before using the newest medium of borrowing – credit cards. The second was the shift of savings from the trusted banks, to money market funds, fuelled by Regulation Q.

It is important to consider the magnitude of the following figures to understand the transformation of the financial landscape of America.

- In 1970, credit card spending was at $7 billion. This figure was $13.8 billion in 1973, $22 billion in 1976, $31.7 billion in 1977 and $44.5 billion in 1978!!
- Most Americans owned 2 credit cards, and around 20 million people held 3 or more cards. 60 million people held credit cards by 1978.
- The typical credit card purchase increased from $20 to $60 in a decade.
- Total consumer borrowing in 1975 was $165 billion. This figure almost doubled to $315 billion by 1979!
- Money market funds had $1.7 billion in assets in 1973, $3.7 billion in 1974, $10.9 billion in 1978, and $ 200 billion in 1982!!

Despite these developments, counterintuitively, banks' credit card divisions which were making $22 of $1000 of revenues in 1978, were LOSING $30-$50 per $1,000 of revenue in 1980! This was due to two reasons. Firstly, banks were unable to charge higher interest rates off customers despite having to pay a higher cost for their funds due to usury laws. Secondly, customers were being offered cards free and they had learnt how to maximize the interest savings from it by paying close to the last possible date to avoid paying interest.

Two changes happened as a result. Regulation on usury finally had to be changed. And banks began levying annual fees of $10-$20 per card creating a steady earnings stream.

Money market funds had taken off in the manner described above due to the strangulation of Regulation Q. The spread between regulated bank interest rates of 5.25% and unregulated money markets had increased from 4% in 1974 to as large as 11-12% in 1981!! This was obviously starting to hit banks' asset base. Banks finally woke up to this when the asset base of money market funds had already swollen up to $80 billion. Possibly the most pitched battle was fought in the state of Utah. But after a lot of politicking by banks, finally the money market funds managed to continue their operations.

Chapter 11 details the steps the Government and the Federal Reserve took to help rein in inflation.

Possibly the only but extremely significant step Jimmy Carter had taken against inflation was in March 1980 when he signed the Depository Institutions Deregulation and Monetary Control Act. The act legalized NOW accounts across America, freed the S&L industry from several regulations, raised Federal Deposit Insurance from $40,000 to $100,000, but most importantly set the stage for the removal of Regulation Q, but in a phased manner over several years. A committee called the Depository Institutions Deregulation Committee (DIDC) was formed. It was headed by Paul Volcker.

The DIDC had to address several issues like usage of gifts by banks to lure deposits, the possibility of deregulation of interest rates, the possible negative outcome on financial institutions post that.

Here is the paradox which was faced by the DIDC. Banks' deposits had shrunk from $500 billion in 1978 to $350 billion in 1981 due to the disparity in interest rates with money market funds. S&Ls also had the same issue, but S&Ls only lent money for low rate long term mortgages. Now if suddenly rates were deregulated, the S&Ls would have to pay higher to source their short term deposits, possibly as much as 10-11% versus 5.5% earlier against mortgage loans costing 7%! In such a stressful scenario the DIDC did almost nothing for one whole year.

Some changes started happening when Don Regan, ex-boss of Merrill Lynch become Treasury Secretary under the new President Ronald Reagan. Regan believed in free market economics and tried to get laws deregulated, but he failed to do so in this new environment where his word wasn't law. Finally, he was appointed as Chairman of DIDC in place of Paul Volcker.

While the DIDC was thinking of raising the ceiling for deposit rates from 5.25% to 10.25%, and the Reagan administration had legislated a huge tax cut, the prime lending rate was stuck around 20%!! By now the middle class had begun shopping for yields, taking their money to whoever offered the highest interest rate.

Money market funds started 1981 with $80 billion in assets, and ended the year with $183 billion! And the money that had passed through these funds in that year was $452 billion!

There were still more deliberations in the DIDC without any outcome. Finally, Congress intervened to allow a 0.5% increase in savings rates. This resulted in a massive protest by the S&L industry and this minor increase also had to be rolled back in a couple of months in December 1981.

Even in the midst of such a crisis, and even in America, bureaucrats continued to dilly-dally as can be seen in the DIDC. The politicians offered a solution, but were forced to retract their measures due to pressures. Finally, on October 15, 1982, Reagan passed a bill known as the Garn-St Germain bill which significantly deregulated financial institutions in America after a lot of compromises between the participants. DIDC 0, Congress 2!

The new legislation allowed banks to set up a money market deposit account to pay higher interest rates for deposits, while allowing S&Ls to lend at market rates. This was still not the complete deregulation one might have imagined. And it did result in financial disaster later. The money market funds continued to remain UNREGULATED in the midst of all this, and after suffering a minor drop in assets after the initial push for deregulation, they were on their way to surpassing $400 billion in a couple of years' time.

Finally, the age of inflation ended in late 1982 when the CPI dropped to 3% but its effects' on the American financial system continued and grew!

The next few chapters of the book describe how the financial markets really took off under various the aegis of different people.

The 12th chapter describes how Ned Johnson took advantage of the prevailing situation to create a niche for Fidelity, and the predominant reason for its success was their star fund manager, Peter Lynch.

Till the mid-1970s, the American society had still been financially conservative. But the Age of Inflation taught them the importance of optimizing returns on their investment and hunting for the best avenues to do so. Money market funds had taught them to do so. The stock market had seen vicious cycles between 1966 and 1982, dipping 25%-40% at times, but the Dow hadn't crossed its high of nearly 1,000 points in those 16 years!! Stocks were still anathema to the general population.

The Dow finally took off in October 1982 seemingly after the news that the Federal Re serve had begun to ease the money supply after years of tightening. Inflation and interest rates had both come down, but unemployment was still high and corporate profits were mediocre.

To understand how ignored the stock market had been, it is important to view the figures at Fidelity. In 1968, Fidelity managed $4.6 billion in assets with 90% in equity. In 1982, Fidelity managed $17 billion but with only 12% in Equities – a decrease of nearly $2 billion when Inflation was raging and money market funds had lapped up most of the surplus funds from banking!!

While brokerage firms had been despondent in general, Ned Johnson seemed to have been waiting for this opportunity for a decade! He was able to feel the pulse of the middle class' quest for returns, and finally realised Charlie Merrill's dream of making stocks accessible to the common man.

Ned Johnson had been curtailing commissions all through the Age of Inflation. He was installing computers to support the back-end of Fidelity. He began selling mutual funds directly to the public. He installed numerous toll free telephone lines when they were extremely rare. The quest for returns and the growing impersonal nature of the financial industry ensured that for the first time people mailed money to Fidelity and they were certain that it would end up in the right fund!

"Customer service" was now becoming about efficiency rather than having physical access like it had been demonstrated by Charles Schwab a few years earlier. All this was at a time when the situation couldn't have been worse for the brokerage industry! Fidelity had started to resemble a consumer goods company trying to find out what the customer's financial needs were and started creating and selling funds to address them. Fidelity had over 100 funds in the 1980s! Some catered to the small saver through a money market fund, another for people wanting gold, yet another for tax free municipal funds.

Since Americans were now interested in yields, Fidelity began advertising its funds on that basis alone. But Fidelity had an Ace in the Hole for the highest yielding equity funds – Peter Lynch.

Peter Lynch had been associated with Fidelity since 1965. The Magellan fund, which mostly handled the Johnson family money, had been launched in 1963 and was managed quite ably by Ned Johnson himself. Peter Lynch was to the surprise of everyone at Fidelity, given control of Magellan in 1977 at 33 years of age, when it had $20 million in assets.

The success Lynch had was phenomenal. When Lynch finally quit the fund in 1990, Magellan had $13 billion in assets. Assets under management of $20 million to $13 billion in 13 years!! If someone stayed invested for those 13 years, his returns were 27 times!! This return was generated while owning over 1,700 stocks in this fund.

While the Maestro of Magellan was busy excelling at his craft, Ned Johnson took anotherphenomenal business decision. Lynch’s performance gave him the platform to market his funds, and since American’s were willing to pay for higher yields, he began to charge a 2% commission on Magellan, when it was finally opened up to the public in 1981. This was the nation’s first “low load” fund. More money flowed into Fidelity with the commission than ever before. Johnson increased the load to 3% in 1982. The result - Magellan had $200 million in assets at the end of 1982, it turned in a superlative performance of 48% versus 21% for the year, and Magellan ended 1983 with $1.6 billion in assets!!

The 13th chapter shows how the process of subverting the straitjacket of regulations had truly taken off through various methods, but most notably via the financial wizard Andrew Kahr.

Andrew Kahr had developed a sterling reputation by creating the CMA Money Trust for Merrill Lynch which managed $2.5 billion in September 1980. He ultimately left the organization due to his headstrong nature and tried to find greener pastures for himself. He wanted to get into a profit sharing agreement with some entity where he would devise financial products for them and take a percentage of the profits generated by the product. He tried to structure deals through his 3 colleagues Adolph Mueller, McQuown and James Fuller, since he was arrogant and socially very inept. But the prospective deals kept on falling through.

Kahr finally found his success at two companies – Charles Schwab and a Dallas based finance company called the Associates, which was ultimately owned by a conglomerate, Gulf + Western.

Charles Schwab was introduced to Andrew Kahr by James Fuller when he started working at Schwab in 1981. Schwab agreed to pay Kahr 20% of profits in exchange for which Kahr developed a product called the Schwab One which significantly improved upon the CMA at Merrill Lynch and still was one of its best products in the 1990s!

Despite, all the financial juggling that had been taking place, one rule had been sacrosanct – finance companies wouldn't encroach upon the areas operated by banks. Kahr managed to shred this rule by his work at Associates.

Kahr wanted to put Associates, a finance company, into the credit card business. He couldn't do so directly since the laws of Visa and Mastercard, the 2 major credit card companies, prevented a non-bank entity from doing business with them. So Kahr managed to co-opt a bank Baton Rouge, which would process the credit card transactions for a fee. This arrangement was approved by Dee Hock when he was on the board of Visa in January 1978. The card, named Execu-Charge, was a runaway success. It catered to the section of the middle class who had no qualms of using debt to maintain its standard of living. The card ha 90% of customers revolving debt when the corresponding figure was only 50% for other cards. Just 2 years after its launch in 1980, Execu-Charge had 250,000 customers in America and was part of the top 25 credit cards issued.

Kahr didn't end here. He thought why Associates couldn't own a bank which would process the credit card transactions. He found a loophole after reading the Bank Holding Company Act. He found a company which accepted deposits but only made "consumer" loans and not commercial loans. Technically, such an institution – a "non-bank bank" - could be owned a finance company. The company Kahr managed to acquire was initially called Fidelity National Bank. This arrangement still need the Federal Reserve's approval – and the most conservative Paul Volcker allowed it!!

All financial companies wanted to become one stop-shops for financial products now – an idea originally thought of by A. P. Giannini decades before!

We now see the return of the lucky entrepreneur, Charles Schwab. Out of the blue, Schwab wanted to re-purchase Kahr's stake in Schwab & Co. This was because Schwab, a discount broker, was being bought by Bank of America in an all-stock deal. This is because Schwab was in need of funds once again after the breath taking expansion in size. It had quadrupled in size every 2 years since it was created in 1975. It had 370,000 customers but discount brokers still did only 10% of broking in America. To put it in context, Citibank had over 7 million credit card customers at this time, and Fidelity had more customers in just its money market funds.

Despite this growth, Schwab never made much money. It was an inefficient organization with a lot of back-office issues running one of the most inefficient brokerage setups, and a serious shortage of capital.

Schwab had tried to go public but the offering failed. And then as luck would have it, Bank of America came calling!

Bank of America's need for the deal was to become visible and regain the clout it had lost to the ultra-aggressive Citicorp. And Schwab needed capital desperately to survive. The purchase price for the deal was $53 million when Schwab had never earned even $2 million in any one year before! But this was for 2.2 million shares of expensively valued Bank of America stock, which was yet to reveal its true financial picture under new CEO Samuel Aramcost in just a few months.

Bank of America stock dropped 20% post that. However, Schwab started making $3 million A MONTH for the last 5 months of 1982 under the new ownership of Bank of America. The deal was then sweetened to offer 2.6 million shares but still valued at $53 million.

The 14th chapter describes how publicity helped the growing cult of stocks and mutual funds, and how Fidelity once again took advantage of it.

Due to the growing interest in stocks, magazines related to finances started coming up. The most popular one was called “Money” whose chief editor from 1980 was Marshall Loeb. Loeb waxed eloquent about stocks and mutual funds like no one ever had before. Due to the recently experienced high inflation and the people’s habit to chase for yields, Loeb touted stocks as the panacea for America. He used every possible kind of marketing means to prop up stocks – most which turned out to be duds, but which nonetheless made stocks the subject of discussion in the general American public. This can be surmised due to the fact that “Money” was a loss making enterprise in 1980, but in 1984 it earned $ 10 million in profits!

But for all of the ills of Money, it did always have a section on taxes. And this was where a lot of action took place under Ronald Reagan in 1981. America had a progressive tax rate ranging from 14% to 90%!! Reagan reduced the overall tax rate by 25% over 3 years!! It especially had benefits for the middle class, which was of course promptly propagated by “Money”.

The 1981 bill also had another critical tax-saving feature for the middle-class. People could reduce their taxable income by $2,000 by putting that money in a special tax-deferred retirement account knownwas the Individual Retirement Account (IRA). This was the equivalent of people being encouraged to put money in SIPs via Mutual Funds in 2020 by giving them tax breaks.

The importance of the IRA cannot be understated. Even the best estimates pegged $50 billion in IRA funds by 1992. In 1992, IRA funds held $724 billion!!

The huge scope for IRAs was once again spotted at Fidelity, but not by Ned Johnson. It was Charles L. Jarvie who did so. Jarvie was a marketing professional with a past in consumer goods companies and had marketed Tide and Pringles at P&G. He believed in “the theory of discontinuity” which postulates that you really make money in a business by changing the way something is done in a way so fundamental that consumers are forced to react to it. Some examples are disposable diapers versus cloth diapers, detergents versus soap and television versus radio. He believed the IRA had given people a different way to save.

To market the IRA as a product, Jarvie had two insights. First, make people believe that it is a savings vehicle with an investment opportunities rather than an investment vehicle with opportunities for savings. Second, make people feel comfortable enough with mutual funds so that they can entrust them with $2,000 of their money. Fidelity began an extensive nationwide marketing blitz at a much larger scale than companies like Merrill Lynch and Schwab, and the results were there to be seen.

Fidelity had $400 million of IRA funds in 1982. In 1985, the figure was $3.2 billion!

But publicity is a double edged sword. Fidelity tried to generate more publicity by giving an interview to “Money” magazine. Marshall Loeb didn’t chose Peter Lynch. Instead he opted to take an interview of one of Fidelity’s younger fund managers, thirty year old Michael Kaasen when his technology fund was up 131% in 8 months! Kaasen started managing assets of $650 million versus $200 million two months before. And then the fund lost 20% of its value in the next few months.

The 15th Chapter presents some very interesting facts and then discusses the paths of the two of the money revolution's most important characters – Andrew Kahr and Dee Hock.

In the 1980s, Americans were more willing to take on debt than ever before. And use credit cards to do so. Consumer debt had risen from $300 billion to $ 600 billion from 1980-1987, and credit card debt had tripled in this period. Home loans were virtually non-existent before the 1980s and were worth $80billion of new debt in 1986. The ratio of household instalment debt to household disposable income had gone up from 14% in 1983 to 25% in 1986!! However, while household debt had gone up as a percentage of income, they had gone down as a percentage of assets.

A very important reason for this rush to debt were the change in personal bankruptcy laws in 1978. This made "personal bankruptcy lose its stigma". In one of the surveys conducted in the mid-1980s, 55% people felt that borrowing was wrong, but 60% of them had credit cards and half of them borrowed regularly. The depth of penetration of credit cards can be gauged by the following:

- By 1984, 71% of Americans between 17 and 65 carried a credit card.
- 25% of all instalment loan payments were credit card payments.
- The average balance outstanding was up from $1,472 to $649 from 1970 – 1986.
- By 1985, almost 8 million Americans held either a Citibank Visa or a Mastercard and used it to fund $8 billion of payments. By the early 1990s, Citibank had 30 million cards outstanding.

The banks made a fortune in this period because consumer spending habits were the same as during inflationary times, but their cost of funds had meaningfully gone down. In addition they had started levying a fixed charge on cards per year, and the penal charges on outstanding loans had not gone down.

Dee Hock had managed to successfully steer Visa to 53% share of credit cards transactions versus 46% for MasterCard. But his clients at Visa, the banks, were not happy with him because Hock was too domineering a personality. Hock's next mission was to make Visa the centre of all electronic transactions. But Bankers felt that Hock was trying to take control of the banking space.

There were two serious episodes with Hock. Hock landed a huge coup by persuading J. C. Penney to accept Visa. They were the first retailer to do so after which all other retailers except Sears followed suit. But Hock did so without informing the board.

The second episode was what led to Hock's ultimate ouster from Visa. Hock had a grand vision of having people use one single charge card which acted either like a credit card or a debit card depending on the user's preference. This was at a time when debit cards itself hadn't been created! Banks were very reticent to allow the use of debit cards for payment transactions. They wanted its use to be limited to withdrawing money from ATMs. Another sub-issue was in the use of debit cards ATMs banks didn't want to allow any other bank's debit card to be used at their ATM. The man leading this opposition was a contemporary of Hock – Dale D. Browning of the Colorado National Bank, which already had a system to deal with ATMs called the Plus System. Dee Hock finally quit Visa in 1984.

Andrew Kahr had been floundering for a few years waiting for his next big financial innovation. Kahr through his work in the back office of Wells Fargo had known enough about credit cards for a decade, but hadn't acted on it because he didn't find it to be challenging enough! Finally, Thomas Simons, the CEO of Capital Holdings – which had bought Parker Pen's stake in First Deposit - managed to goad him into constructing a credit card program for First Deposit.

Credit cards make money for the issuer when people pay interest on the debt. And Kahr was able to figure out there were only 10% such people who made most of the money. Through his financial modelling, he

wanted to issue credit cards only to such "profitable" customers – that is one who always pays their minimum balance on time and keeps on rolling the debt.

To get access to such a customer, Kahr did several revolutionary things to the First Deposit credit card. He abolished the annual fees and the amount of the minimum payable balance to make the product attractive; but he eliminated the grace period, while adding a number of penalty fees, and charged interest higher than anyone else at about 22%!!

Such sharp practices were ultimately reined in by the Congress, but by 1989, Kahr had retired as CEO of First Deposit and bid adieu to the world of finance after selling his stake for a small fortune and had become financially independent.

It is pertinent to note that the same man Andrew Kahr had built the CMA, the non-bank bank and then the most attractive credit card in the country.

The 16th chapter discusses the demerger of Schwab from Bank of America, and how Fidelity had taken advantage of the cult of equity in the mid-1980s.

The Schwab-Bank of America merger was not working out very comfortably. The working culture in both organizations was very different. Schwab progressed from strength to strength, while the losses started piling up for Bank of America due to their past excesses. Bank of America reported its first ever quarterly loss of $338 million two and a half years after the merger.

In the period of 1982-1985, when Bank of America owned Schwab, Schwab had tried to diversify from just being a discount broker very successfully. In 1982, Schwab had 375,000 clients. In 1985, this figure was 1.2 million. Its revenues had also tripled from $67 million to $200 million, and it reported $20 million in profits in 1985. (Bank of America had paid $53 million in stock for Schwab!)

Schwab had ended up with a seat on the board post the merger, and he used this to continuously point out flaws in the capital allocation of the bank. This didn't sit well with the other members. Finally, Schwab wanted to buyback his company from Bank of America. Aramcost was obviously unwilling to do so but due to a technical clause, Schwab was able to retain control of the brand name of his company "Charles Schwab & Co." Bank of America wanted to auction the company from which it hoped to raise $300-$400 million since Schwab was making $60 million in profits by 1986. But Schwab with the help of Gorge Roberts of Kohlberg, Kravis & Roberts (KKR) was able to buy back Schwab for a total value of $280 million while actually paying just $190 million by virtue of it being a leveraged buyout. Schwab, almost fortunately or presciently, decided to take his firm public within a few months after becoming independent again in 1987.

To understand the cult of equity in the 1980s here are some figures.

- At the end of 1984, the Dow was at 1211. The Dow would be above 2700 in August 1987.
- There were 1246 mutual funds in America, and this would further triple by the time the 1980s ended.
- 28 million mutual fund accounts had been opened in 1984 alone and the number was increasing every year.
- In 1987, there were 55 million mutual fund accounts in America, with 40 million people directly investing in equities.
- In 1982, stock and bond funds held $53.7 billion in assets. In August 1987, this figure was $430 billion. All of this was due to the "sudden participation" of the middle class!

At the same time, Fidelity had observed this phenomenon and was trying to take advantage of it by offering as many fund variants as possible. The only way to distinguish a fund out of 1246 was by out-publicising the others. Fidelity had correctly anticipated a bull run in the Over the Counter stocks and created an OTC fund. This OTC fund was being handled by 29-year old Paul Stuka. It started with a capital of $100,000 of Fidelity's money. When the OTC market took off, Fidelity took the fund public and began charging a commission of 2-3% on it. This process was repeated with every successful fund.

Here are some figures to understand Fidelity's magnitude of success. One of their funds run by George Noble had $2 billion in assets in 2 years. Another fund run by Tom Sweeney had $1.5 billion in assets in 2 years, and by December 1985, Paul Stuka's fund had $1 billion in assets. Fidelity spent $ 100 million in advertising in 1986 alone. Its customer base had grown from 400,000 to 1 million and its AUM had grown from $30 billion to $70 billion – all in a span of just 2 years.

In all of this change in the markets, operations at Fidelity changed significantly. The fund manager was no longer the most important person. It was the marketing executive of the funds who stood at the top of

the food chain. This was an active choice of Ned Johnson. And before the markets topped out in 1987, not to be left far behind, Merrill Lynch was charging a load of 6% in some of its funds.

The 17th Chapter details the events surrounding the topping of the bull market and especially of the 22% single day drop in the Dow, at Fidelity and Schwab.

There were enough contrarian voices fearing that the market might top out from the beginning of 1987. Some investors are always right in their sense of the top – like Charlie Merrill was in 1929. Gorge Soros was on the opposite side, making statements like old fashioned p-e ratios didn't matter in that market.

While fund managers in Fidelity were uncomfortable, Ned Johnson had a clear aversion to keeping cash idle. Fidelity had continued to churn out more and more funds through 1987.

Charles Schwab & Co went public on September 22, 1987 when the Dow was at around 2,500, about 10% down from the peak. Schwab was taken public by issuing 1/3 of its equity of 8 million shares at $16.50 per share valuing the firm at $400 million, just 6 months after the firm had been purchased from Bank of America at an equity cost of $190 million!! Could there possibly be a luckier person in the broking business?! The stock traded for $6.50 post the crash.

Peter Lynch used to say that markets would mostly drop on Mondays, and it was a Monday on October 19, 1987 when the Dow crashed 22% in one day! This was after the Dow was done 9% in the previous 3 sessions.

Fidelity was responsible in part for the exaggerated decline because they had sold over $500 million of stock which formed 4.5% of the day's volume on a day when there were no opening prices for stocks like IBM and Merck! Fidelity had handled 500,000 investor calls that day versus 300,000 normally but this was manageable due to the large investment they had made in their back-end operations. Ultimately Fidelity came out relatively unscathed without losing any significant clientele.

For Charles Schwab & Co. it was a different story altogether. Schwab was woefully unprepared. They received 60,000 calls versus 15,000 on a normal day and had to issue newspaper apologies to salvage some face. However, this wasn't the only problem Schwab had to grapple with. In a bid to expand, Schwab had been reckless in expanding abroad and especially in Hong Kong. One single client, a Chinese real estate developer, The Huei "Ted" Wang, ended up defaulting on $100 million on options he had sold. This was after he had paid up some $40 million including $13 million on the day of the crash. The account was finally settled for a payment of $60 million.

The 18th chapter details the aftermath of the crash of 1987 for various financial institutions and instruments, and for Peter Lynch and Fidelity in particular.

The most important development in the aftermath of the 1987 crash was that despite the monumental fall Americans were still willing to take the risk of investing in equities due to the promise of higher yield. They were willing to do so by putting money in mutual funds because they felt a professional was handling their funds and it gave them a sense of comfort. This also had a very important outcome on the movement of the markets post the crash. The fall was not further exacerbated because people didn't continue withdrawing money from the markets in any meaningful manner after the fall.

However, mutual fund institutions did not go unscathed. Merrill Lynch was the worst affected. While people didn't withdraw money, the inflow of new money slowed down significantly. They fired more than 3000 employees in January 1988, and suffered losses of $213 million in 1989 – a year which was the 2nd best in the history of mutual funds. They managed to find their feet only in 1991. In 1989, 20% of all new money had ended up in mutual funds. Fidelity also had to fire some employees, but they shortly bounced back along with Dreyfus by offering no frills money market and short term bond funds.

Schwab too had a miserable time post the crash due to their horrendous back-end operations. Their volumes had halved over the next 2 years till 1989. Schwab managed to correct course in 1990 by offering an index fund and by finally ensuring that it was technologically equipped to tackle operational risks.

Another important event happened towards the end of the 1980s. T-bills started approaching 9% in March 1989. This caused money to flow into money market funds at an accelerated pace since people were now really into chasing higher yields. By 1986, money markets had clawed back all the assets lost post the deregulation of banking. And, by middle 1990, their assets had crossed $400 billion.

Initially, money market funds only held T-bills, but in search for better yields, they began lending money to the companies which had loaned them the T-bills. This worked well initially, but as this practice gained acceptance, money market funds started accepting T-bills from lesser stable companies, and when in 1990, one of the companies from which a fund had gotten T-bills defaulted on its debt repayment, a money market fund was in danger of "breaking the dollar" or defaulting. It did happen with some funds, but the markets seemingly shrugged it off and the assets held in money markets continued to spiral up.

The vast majority of fund managers underperformed the index in the 1980s. People like John Neff and Peter Lynch were truly exceptions. There were some like Elaine Garzarelli who had been able to call the crash, but they miserably underperformed subsequently when they were given meaningful assets to manage. The point is it was extremely difficult to outperform the index for most mutual fund managers. It was very easy to gain publicity by performing well, but publicity was a double edged sword.

On the day of the crash of 1987, Peter Lynch was on a vacation. His fund underperformed the S&P 500 only for the second time in his career. He was on the receiving end of a lot of criticism. But he wanted to prove his critics wrong and started working Sundays also. In 1988, the S&P 500 rose by 16.6%, Magellan gained almost 23%, and in 1989, when the S&P 500 rose by 31.7%, Magellan, now with assets of $12.5 billion, outperformed it by 3%. Magellan had almost 10% of Fidelity's total assets of $100 billion. It was after this, in March 1990, that Peter Lynch decided to quit.

In 1990, the number of mutual funds had increased to 3,107 from 170 in 1965. The total number of mutual fund accounts was at over 60 million in 1990 versus 7 million in 1965, and these accounts now held over $1 trillion. More than 25% of American households had some money in mutual funds.

Peter Lynch's replacement was Morris Smith. He tried his best to fill in Lynch's boots, and in fact he did a great job. By 1992, Magellan, which had still outperformed the benchmark after Lynch's retirement, had a corpus of over $20 billion. And then he quit on a high, just like Peter Lynch.

The 19th and final chapter of the book briefly discusses the state of many of the companies previously discussed, and also the state of several of the financial instruments which had come into being by August 1993.

Markets had become a more integral part of the American population's mind space than ever before. The middle class kept on participating in the market by the droves. By 1993, 1/3 of all American households had some exposure to mutual funds. Credit cards were being used to purchase goods worth $400 billion. Credit card debt amounted to 35% of all outstanding debt – up from 25% in 1989! 70 million households had 220 million credit cards!! In fact, middle class Americans had become so involved in the market that stock price movements seemed to be dictated by the crowd and not by Wall Street companies!!

Apart from 1990, inflation was never a problem in the recent past. In fact, disinflation started being an issue due to the recession which came in 1992. Gas prices were down to 1970s levels, food prices started getting lower due to competition, and house prices started stagnating or even dropping. This actually caused considerable consternation in the general American population since they had become accustomed to chasing yields. 1992 had ended with the CPI increasing by only 1.7%.

Along with this, the prices of T-bills had also fallen sharply from almost 9% in 1989 to 2.5% in mid-1993. This of course helped companies to borrow cheaply, and helped people to refinance their mortgages cheaper. But this triggered a massive bond rally. By mid-1991, Americans had $440 billion in bond funds and by the end of 1993, this figure had jumped up to $760 billion. This of course resulted in an outflow from the bank accounts of middle class Americans – of $200 billion in 1 year! When bond rates finally increased in 1994, people were caught off-guard and ended up incurring large losses. But the chase for yields was on! All of this was because of the change in mind-set caused by the Great Inflation of the 1970s.

The 1990s were marked by companies making forays into industries that had been clearly demarcated thus far. The credit card industry was disrupted not by another bank, but by a telephone company! AT&T launched a credit card in 1990. It marketed it by removing the annual fee which had become a normal part of operations, and by offering a 10% discount on phone calls made by using its card.

So strong was this disruption, that within 1 year of its launch, AT&T had 8 million cards in circulation. It was the 5th largest card issuer behind Citibank, Chase Manhattan, First Chicago and Bank America. By 1992, it was the 2nd largest card issuer behind Citibank. Once AT&T broke the barrier to enter the credit card market, other companies like Ford and General Motors followed suit. Non-banks now contributed to 43% of the gross volume of Visa and Master card compared to 7% in 1987!

At Fidelity, the success just kept on coming. Morris Smith was replaced by Jeffrey Vinik who again outperformed the S&P 500 in 1993. Fidelity had over 200 funds in 1994, and the total number of mutual funds had soared to 4,500. Fidelity kept on rolling out fund after fund and also produced one star manager after another. Fidelity also ploughed back profits to invest in technology and research. And by the end of 1993, Fidelity had $268 billion in assets, twice more than its nearest competitor! Ned Johnson had done a remarkable job! Fidelity accounted for over 10% of the volume of the New York Stock exchange.

By now the Vanguard group was also managing assets worth $100 billion. Merrill Lynch had managed to steady itself by 1990 and was now managing assets worth $500 billion. Charles Schwab had 2.7 million active customers by early 1994 with $1 billion in revenues and over $100 billion in assets. Schwab had finally set itself right.

Banks now started offering mutual funds and held 10% of all mutual fund assets. Something unthinkable a decade or so earlier when the Glass–Steagall Act was still in operation. Citicorp now was underwriting insurance, Merrill Lynch managed more money in IRA accounts than the 100 largest banks combined, and Fidelity Investments held $100 billion more in customer assets than the biggest bank in the United States.

The mutual fund industry was about to pass the $2 trillion figure in assets, just 3 years after reaching $1 trillion.

1992-1993 was a remarkable period when both bonds and equities had rallied!

By this time, Peter Lynch had written both his best-selling books – One Up on Wall Street, and Beating the Street.

The End.