Financial Innovations

How financial institutions shaped our world?

By

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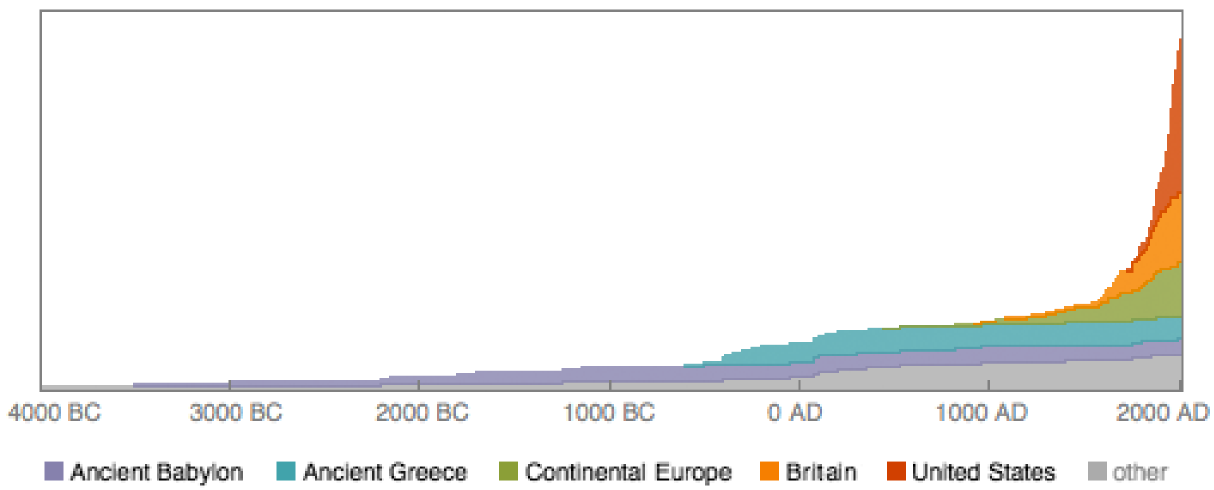
Introduction

Have you ever observed the technologically advanced world around us and wondered who brought us up here? Who were these people and how they did it? From almost a kilometre tall skyscraper in Dubai to mere electronic toothbrushes we use to clean our teeth, everything amazes me to such an extent that I went ahead to look for the gentlemen who provided us with all these brilliant inventions. Apparently, it's the scientists and engineers that take all the credit of making us the most advanced generation of history. But the ancient periods also had brilliant scientists and engineers, why weren't they able to come up with such inventions? I understand that every invention supports creating another invention and ancient scientists could not have suddenly come up with a rocket to land on moon. Only after a series of inventions we came to a point where we were able to explore space. But have a look at scientific advancements graph below.



If you study the graph closely, you will notice that all through history we had a steady increase in scientific advancements until 16th century. But after the 16th century, there can be seen an abrupt rise in our scientific achievements. What explains this sudden rise? What really happen during 16th century that boosted our pace towards an advanced world?

By going through the books of history and observing current times closely, I figured out there is one profession that was missing in the ancient times which has recently played a very important role in helping us achieve rapid technological advancements. They are the bankers! Not the one you meet when visiting your nearest bank, but the people who have developed the modern financial systems by evolving money from precious metals to paper notes and now to numbers in your bank statements.

Success of scientists and engineers depends on amount of research they are able to carry out and number of times they are allowed to fail and try again. All of this requires tons of money. In 2010, a trillion dollars were spent on research and development. Never did the world had this much money for R&D before. Money has been the root of most progress. Every breakthrough in finance in last 3-4 centuries was later translated into breakthroughs in technology and science. It is undeniable that financial innovation has been an indispensable factor in man's advance from miserable living conditions to the heights of material prosperity that so many people know today.

But the question is what did these men called bankers did to make so much money available for R&D? In rest of this series, I will walk you through the 400 years of financial history and how bankers influenced some very important historical events that made us what we are today.

Masters of Florence

Medici, an Italian family of bankers in 1400s, was probably the first to successfully operate a bank. Their main job was to do book keeping while sitting behind a table in streets which was called a bank. Most of the previous attempts to earn by lending money failed because of large defaults, but Medici diversified their business by providing multiple financial services like money exchange which allowed them to survive. Although they came before the 16th century, but mentioning of their story is particularly important because they are a perfect example of what wonders can be achieved when too much wealth is concentrated in few hands. They ideally represent the mentality of people who control the money and how they influence society. Also, it was their banking system that became the model for other North European nations who went on to achieve some greatest commercial success in the coming centuries.

The Medici family were devout Christians who enthusiastically sponsored religious art. The only problem was that devout Christian and banking does not go hand in hand. The banking system in essence works on the principles of interest, and any person who deals with interest is indulging in usury which is one of the most major sins in Christianity. The Medici was no different; their banking business made profits from usury and elevated their status in the Florence, but on the same time it was at the expense of eternal damnation.

But there must have been a way out for surely they did not want to leave their banking business. And so they found a way to salvation. In the early days, according to Church doctrine, you could buy your way out of hell (or at the very least reduce the time you spend there), by sponsoring a great work of art and architecture. In the 1430s, the Pope Eugene IV promised Cosimo de' Medici, then head of Medici family, redemption if he would pay for the construction of the monastery of San Marco. It was a great opportunity for him to wash his and his family’s hands from the sins of usury.

This was how Medici family was introduced to art. In an attempt to escape the punishment for their sins, they discovered the extraordinary potential of art. They were staggered by the influence it had on people’s mind and how dramatically it turned the tables for them. Art helped them alter their image from greedy bankers who sucked on people’s wealth to noble men who do great deal of service for the religion. By showing themselves in religious scenes they portrayed themselves as pious figures to the illiterate population of Florence. Art became the easiest way of studying religion.

The picture above by Botticelli is one of the highlights of Medici Art. If you look closely, you'll discover that many figures in this religious scene are none other than members of the Medici family. Cosimo the Elder is the one depicted as the eldest king, who is almost touching the feet of the baby Christ. Right at the centre is his son, the royally dressed and red-cloaked Piero. Next to him is his brother Giovanni dressed in white and some other members of the family. Soon they were respected and loved in the society.

With enormous wealth and now also the support of people, position of the family was stronger than ever. Although they never held any political office, their influence became so great that even kings had to consult the head of the family, Cosimo de' Medici, when making important decisions. By 1458, Pope Pius II commented on the power of Cosimo as: "*Political questions are settled at his house. The man he chooses holds office ... He it is who decides peace and war and controls the laws.. . He is King in everything but name.*" They clearly dominated Florentine representative government without abolishing it altogether.

Directing massive wealth towards art led to artistic talent flourishing in Florence like anything. Some of the greatest artists of history like Leonardo da Vinci, Michelangelo and Botticelli were born in this era largely due to the interest driven by the wealth of Medici. An environment was developed where everyone appreciated art and artists. A lot of attention was diverted towards this as people continuously looked for new ways to bring innovative pieces of art. A new kind of architecture emerged where paintings and sculptures were present on walls and roofs of buildings. Art became a part of visible culture for the Florence and attracted tourists from all parts of Europe. Medici, through the power of money, focused the interests of people towards something that benefited them the most. They created a sensation to divert people's energies towards where they wanted.

The impact money has on talent is similar to what water has on a seed. Just as water helps grow a tiny pip buried underground into a huge tree, money allow people to express talent buried inside them more extravagantly. Getting paid well for something is considered as a symbol of success and appreciation. And people tend to do more of what gives them these two things. They get more motivated and do it wholeheartedly which brings even greater results. Thus people who control finance literally decide what success would mean for masses. And it was Medici in 15th century who got this authority and truly became masters of Florence and Italian renaissance.

Financial Alchemy

A very important period of our history that paved way for the advanced world we live in today was industrial revolution.

Just as bankers of Florence were behind the epic Italian renaissance, financial innovators had a strong influence in making industrial revolution happen. Although historians disagree as to how far financial institutions can be directly credited for industrialisation as the decisive breakthroughs in textile manufacturing and iron production, which were the spearheads of the industrial revolution, did not rely very heavily on banks for their financing. But the fact that financial revolution preceded industrial revolution gives us very strong hint that it were the brilliant innovations in finance of 17th century that made room for exponential success in industry known as industrial revolution.

Let's explore this further to uncover the hidden influence of these financial geniuses behind one of the most remarkable revolution of human history.

Financial revolution (1668)

In 17th century three major innovations in finance took place which proved very important for the future of banking. Their effect was so profound that this period is known as financial revolution.

The first of the three was cashless transactions. During the Dutch Golden Age in the late-16th and early 17th centuries, the Dutch Republic dominated world trade. Merchants from around the world brought goods here to trade. This resulted in problem of multiple currencies which made trading process complex. There were no fewer than fourteen different coins which were involved in the trading process. To solve this problem Amsterdam exchange bank also known as Wisselbank was setup in 1609. This bank allowed merchants to setup their accounts in a standardised currency and to make a transaction, they simply made adjustments to account balances of two parties involved, by debiting their account and crediting counterparty's account. This allowed more and more commercial transactions to take place without the need for physical transfer of coins. This Exchange Bank pioneered the system of cheques and direct-debits that we take so for granted today.

Development of this exchange bank led to the second most important innovation in finance in 17th century when the bankers observed that never do the depositors come at once to withdraw all their cash and deposits are uselessly kept by the bank as reserves. Which if loaned out could become a source of earning for the bank. This practise was officially carried out a half century later in Stockholm by Swedish Riksbank. Although it performed the same functions as the Dutch Wisselbank, the Riksbank was designed to be engaged in lending as well as facilitating commercial payments. By lending amounts in excess of its metallic reserve, it may be said to have pioneered the practice of what would later be known as ‘fractional reserve banking’, exploiting the fact that money left on deposit could profitably be lent out to borrowers. Since depositors were highly unlikely to ask for all their money at once, only a fraction of their money needed to be kept in the Riksbank's reserve at any given time.

Now if banks are to keep only 10% as reserves (which is normally the case) and lend out 90% of deposits, this technique can increase money supply in the market by a good 1000% (10 times). Imagine if an economy had 10 times more money than its current cash reserves, how much more economic activity it will be able to carry out? That’s how banks boosted economies of western countries in 17th century (where industrial revolution took place).

The third great innovation of the seventeenth century occurred in London with the creation of the Bank of England in 1694. This bank had a monopoly on the issue of banknotes that were designed to facilitate payments without the need for both parties in a transaction to have current accounts. Due to this the very nature of money evolved in a profoundly important way. No longer was money to be understood as precious metal that had been dug up, melted down and minted into coins. Money now mostly consisted of banknotes recognized as legal tender along with the invisible money that existed only in deposit account statements. Some of this money might still be in form of precious metal, though majority of which would be held in the central bank's vault and not in circulation.

This transformation of money from precious metals to figures in bank account statements and paper notes provided an infrastructure for rapid exchange of goods. Exactly what was required for something like industrial revolution to take place. Industrial revolution was about mass production, and what is use of mass production if there can’t be mass consumption? This new form of paper and invisible money allowed quick transfer of goods from producers to consumers and hence made industrial revolution so successful. Bankers of 14th century made Italian renaissance happened, bankers of 17th century made an environment which allowed an event like industrial revolution to take place.

There may not be a direct and visible impact of financial revolution on industrial revolution but it seems perfectly plausible that the two processes were interdependent and self-reinforcing. And it will not wrong to say that without financial revolution, industrial revolution might not have taken place or to the very least, not have been as significant as it was.

Winning the wars

Wars are the most pivotal points of history. They literally decide where a society will head towards in future. Who will become the king and who will be turned into slavery. Who will rule and who will be ruled. And if you can influence the outcomes of wars, you surly are the most significant person around.

Genius of a banker again made itself relevant even in the most undesirable situation for someone who deals with money. By figuring out an innovative way to gather finance, bankers have become as important, in the context of a war, as the warriors themselves.

Financing a war through public debt or what we call today the bond market was, like so much else in financial history, an invention of the Italian Renaissance. 'War', said the ancient Greek philosopher Heraclitus, 'is the father of all things.' It certainly was the father of the bond market when in 15^{th} century city states of Tuscany were fighting among each other. These wars were fought as much by money as by men. And rather than requiring their own citizens to do the dirty job of fighting, each city hired military contractors who raised armies to conquer land and loot treasure from its rivals. These contractors would fight for anyone who paid them. And to pay such fighters, cities of that time decided to take loans from their own people by issuing them a contact known as a bond.

The most significant use of this technique was made in early 19^{th} century by England when a young French army leader, Napoleon Bonaparte, emerged by winning two battles against Austria. For the next two decades, he posed a great threat to the security and financial stability of the British Empire. Britain had to defeat him to truly become a global power but doing so would require a mountain of public debt to be raised.

The Battle of Waterloo was climax of more than two decades of conflict between Britain and France. But it was more than a battle between two armies, it was also a contest between two rival financial systems. One, used by French, which under Napoleon was based on plunder. Heavily taxing people and illegitimately occupying their wealth to fund the war. The other, used by Britain, based on debt. The method used by Britain was more sophisticated and caused less trouble as Britain raised ample cash to wage the war. Never had so many bonds been issued before to finance a military conflict. Between 1793 and 1815 the British national debt increased by a factor of three. But there was one problem; banknotes were of little use on distant battlefields.

To provide for troops and pay Britain's allies, Wellington needed a currency that was universally acceptable. The challenge was to transform the money raised from the bond market into gold coins, and to get them to where they were needed. Sending gold coins overseas during the time of war was expensive and extremely risky. The man who solved this problem and helped Britain in defeating Napoleon at Waterloo was, you guessed it right, a banker. The master of the bond market and European politics a gentleman named Nathan Mayer Rothschild.

The Rothschild

Financial history is incomplete without mentioning of the Rothschild. Their contribution to banking and their influence on politics was so significant that 19th century is often referred to as 'The age of the Rothschild'. Just like Medici, Rothschild banking family also used its financial power to influence political affairs. Only difference was that influence of Medici was redistricted to Florence, Rothschild on the other hand had influence over entire western world.

Grown up in Frankfurt ghetto, the son of a moderately successful Frankfurt antique dealer, Nathan Rothschild arrived in England only in 1799. It was not long when he started to make his presence felt. Along with his brothers, Nathan setup banks in four countries across Europe. He himself operated from London, his brother Amschel from Frankfurt, another, Carl, from Amsterdam, the youngest, James, from Paris and Salomon travelling wherever Nathan wanted him to be. Like this, these brothers developed the first ever multinational bank within family that provided them with great strategic advantages.

Scatter around Europe, the five Rothschild brothers were perfectly positioned to exploit price and exchange rate differences between markets. For example, if the price of gold was higher in London than in Amsterdam, Nathan in London would sell gold for cash and then send these to Amsterdam, where Carl would use them to buy a larger quantity of gold. The advantage they had for their presence in multiple countries brought in a lot of profit for the business.

This readymade network of banks was what made Rothschild so suitable for the job of providing gold coins to Wellington's army at the battle field. Also, Nathan had previously build channel of smuggling gold to different European countries as part of his business which proved crucial to carry out this risky task. The job was done so well that soon Wellington wrote back to express his gratitude for 'ample supplies of money'. This service by Nathan brought him close to the British government and soon the prime minister referred to him as a ‘very useful friend’. He was also found saying that 'I do not know what we would have done without him'.

Another way battle of waterloo benefited Rothschild was due to their gamble on the bond market. Part of Nathans banking network was his extremely rapid courier system developed so brothers spread across Europe could communicate and coordinate with each other. Taking advantage of his strategic position, Nathan received the news of victory of Wellington at waterloo 48 hours before the official news. Having tons of gold already at his disposal, which he bought to provide for war that was over, Nathan made a bet at bond market. He knew that as the war was over, price of gold which was soaring due to war would come back to normal. To protect his wealth, he converted all the gold in exchange for bonds. According to a legend, Nathan purposefully spread a rumour that Britain had lost the war which resulted in fall in price of bonds. Buying up all the bonds he could get his hands on at lowest price possible, Nathan was set to make huge profits when the official news came. It is natural for price of bond to fall if a country loses a battle and rises if a country wins a battle. It is estimated that he multiplied his wealth 20 times as a result of this bet.

This made Rothschild family so rich and their influence grew so strong that it became impossible for someone in Europe to successfully wage a war without the support of Rothschild. Like Cosimo de' Medici of 15th century, Nathan Rothschild in 19th century had ministers of state on his pay. He boasts that he is the arbiter of peace and war, and that the one he supports during a war is the one who wins. One German poet declared that 'if money is the god of our time, Rothschild is his prophet.'

Significance of battle of Waterloo

Battle of waterloo was not a regular battle fought between two nations. Its influence and impact exceeded not just to the other countries in Europe but to the entire world. Wellington's victory here put an end to Napoleonic wars, which killed around six million people, and made it clear that no power on earth now equalled or even threatened Britain's power.

Following the battle, Britain got hold of territorial possessions, such as modern day South Africa, Trinidad and Sri Lanka, which become strategic naval bases the U.K. subsequently used to control its vast colonial empire. France had been the world's superpower for centuries, with it out of the way, there was no one to compete with Britain.

Having played such an important role at such a crucial point in history, bankers have proven their importance yet again. Had Britain lost this war, they may not have become the superpower they became and we might be living in a very different world then the one we currently live in.

Napoleon might have been a better military leader but he did not have the financial system available to raise funds for the war. He may have been better at skills but his resources were exhausted while Britain still had plenty up their sleeves. Napoleon lost not because of military expertise, but because of lack of financial resources. “Fighting is possible only if you can raise the money to pay for it.” And to raise money, bankers are your go to guys.

Making of empires

The reason why world had never seen an empire as great as Britain before was because the world had never seen individuals as clever as bankers before. With state banks formed, paper notes issued, and bond market setup, bankers had made economies for European countries and in particular England's economy extremely strong. And with their next innovation, they were ready to bring in wealth from around the world to the small island of Britain. They started off with India.

Corporate finance was the necessary foundation of both the Dutch and British empires. Dutch were the first to come up with a public limited company when, in 1602, they pooled in resources from its rich people in order to trade spices with India. They wanted to defeat their competitors from Britain, Spain and Portugal by creating a company bigger of them all. It was called the Dutch East India Company (VOC). New method of structuring the company where it is broken into small components, up for anyone to buy or sell them at any point in time, made corporation flexible and provided immense potential for growth. The separation of ownership and control was also crucial as owners are not always the best people to run a company. Hiring specialist managers to run a company improved its efficiency a lot. With this also came into existence the world's first stock market when company directors refused to redeem shares and the only option left for the investors who wanted their money back was to sell shares to other investors in the market.

Britain however did not wanted to lose trade with India so they fought three battles with the Dutch in an attempt to take control of the trade routes to the east. When no decisive result was reached through wars the matter was resolved through a merger, not business merger but a political merger. William of Orange from Dutch married Queen Mary of England and became chief executive of Britain. Dutch businessmen became major shareholders in the English East India Company and trade items were divided. Dutch were allowed to trade spice with India and England was given textile trade.

The new financial innovation of combining resources to form a single entity corporation proved extremely successful. First ever limited liability company literally changed the world. East India Company (EIC) brought in so much wealth for the Empire that at its height it was worth around $7.9 trillion in today's dollars. That equals to the combined market caps of 20 of the world's largest companies today, including Apple, Microsoft, Amazon, ExxonMobil, Berkshire Hathaway and Tencent. Power of money mixed with clever politics gave the company control over entire Indian land, where they initially went just for trade but left as supreme rulers. If ever an empire was built on economics, then British Empire surly was it. And bankers certainly deserve credit for making empire so economically strong.

No single person could have made a company as big as this, but multiple rich people together did. EIC is a prime example to what extent can large corporations influence the countries they operate in. Things have not much changed since the days of EIC as even today many people believe that multinational companies are actually the ones who rule the world. Or rather what I believe is the handful of investors behind these corporations rule the world.

Whenever there is immense saturation of wealth in few hands it results in development of something extraordinary. When it was in the hands of Medici, world saw mind-bobbling art. When it was in hands of European bankers, world saw mind-bobbling industrial revolution. And when it got in hands of English bankers like Rothschild, world saw rise of an empire never seen before. The international bankers of today, through their series of innovations over the centuries, have gathered enough finance to become major investors in large multinationals. Now the 1% of the rich elite of the world that controls 50% of the world's wealth wants resources to be allocated towards technology, thus we have become the most technologically advanced generation.

Over 90% of technology start-ups fail yet these rich investors do not shy away to invest, and on most occasions lose, billions of dollars. These financial wizards turned investors are the reason we see young twenty something becoming billionaires while their companies make literally zero dollars in revenue. I'll quote a few examples. A few centuries ago, who would have funded a company that made loss of over 1 billion dollars in first 5 years of its operations? This only happened in 21st century where the most important company of our time went through a similar start. I am talking about Facebook. Just imagine if there was no one to bear losses Facebook made initially, how different our lifestyles would be.

How a company that made almost no revenue was sold for $19 billion? It's the story of WhatsApp when it got acquired and Mark Zuckerberg, the man who acquired it, said he scored the messaging service for cheap! If you told this story to someone from the previous century he would take you to a psychiatrist thinking you have gone crazy. But anyone who follows Silicon Valley would know that stories like these are routine for this industry.

Another very innovative company of our time, Uber, is around for 10 years now and yet it is making losses in billions of dollars each year. Surviving on investors’ money for over a decade, this luxury was never available to entrepreneurs in the past. Still wonder how the world comes up with such innovative businesses every few years?

I see a weird similarity between 15th century Florence and 21st century California. Back then master of Renaissance, Medici, wanted people to focus their energies towards arts as that’s what brought power for them. Now international bankers want us to focus our energies towards technology for the very same reason. And as Florence saw some of the world greatest artists, California has produced some of the most brilliant inventors, like Steve Jobs, Elon Musk & Bill Gates.

Magic of numbers

May that be through the practise of fractional reserve banking, issue of paper currency, bond market or stock exchange, the job of a banker has always been to induce as much money in circulation as possible. Through their genius and well thought out mathematical calculations, bankers have successfully accumulated all the wealth from society in their own hands. This has allowed them to invest even the savings of people which otherwise would have kept uselessly in their cupboards.

Another very genius innovation brought in to take every last bit of extra money left in people's pockets was insurance. By exploiting the fearful nature of human beings, insurance has been made as necessary expense of the modern world as the purchase food items, and surprisingly it is paid most by the people living in the safest regions of the world. Ever wondered how this system took off?

Two ministers of a church in Scotland, Alexander Webster and his friend Robert Wallace, were the ones who deserve the credit for creating the first modern insurance fund back in 1744. The need for an insurance fund arose when the duo saw one group of people especially vulnerable to the consequences of unexpected deaths. The widow and children of a dead minister at Church of Scotland received only half a year's salary in the year of the minister's death and after that, they were left in poverty.

The plan Wallace and Webster came up to provide for them was ingenious. Rather than merely having all ministers pay an annual amount, which could be used to take care of widows and orphans when ministers died, they argued that the yearly payments should be used to create a fund that could then be invested profitably. Widows and orphans would be paid out of the returns on the investments and not just from the premiums themselves. Now all that was required for the scheme to work was an accurate projection of how many beneficiaries there would be in the future, a calculation which Webster and Wallace did with extraordinary accuracy.

Webster and Wallace gathered data of clergymen from all over Scotland. Their research showed that there tended to be around 930 ministers alive at all times and medium of last 20 years showed that 27 of 930 ministers die yearly. 18 of them leave Widows and 5 of them Children without a Widow. After series of trial and error, a fixed annual rate of ‘insurance’ was decided that was to be paid by all ministers. The money collected would then be used to create a fund that could be profitably invested to earn sufficient income to pay annuities to new widows and also to cover the fund's management costs.

The Scottish Ministers' Widows' Fund was truly a milestone in financial history. It was based on correct financial principles and not just gambles rich merchants made prior to that. It established a model not just for Scottish clergymen, but for everyone who aspired to provide for life eventualities. Modern actuaries still marvel at the precision with which Webster and Wallace did their calculations. I certainly admired a lot the genius of people sitting in Silicon Valley until I came across statistical prodigies like Robert Wallace.

By 1815 the idea of insurance was so widespread that it was adopted even by the men who were to fight wars against Napoleon. A soldier's odds of being killed at Waterloo were roughly 1 in 4. But if he was insured, he had the consolation of knowing that even if he is killed on the battle field, his wife and children would not be thrown out onto the streets.

In insurance size matters because the more people who pay into a fund the easier it becomes, by the law of averages, to predict what will have to be paid out each year. Although no individual's date of death can be known in advance, but with the help of statistics we can calculate the likely life expectancies of a large group of people with astonishing precision using the same principles first applied by Wallace & Webster.

This brilliant system alone was not the reason why insurance is considered as one of the most important development in finance. What was achieved with the insurance money is what made it so impactful. Nobody anticipated back in the 1740s that by constantly increasing the number of people who participated in an insurance fund would make insurance a multi-billion pound industry. Large insurance companies have become, like banks, the mighty investors of the world - the so-called institutions who dominate global financial markets today.

As soon as the insurance companies were allowed invest in stock markets, right after the Second World War, they quickly owned a huge chunk of the British economy. By the mid 1950s they were sitting on board of around a third of major UK companies. Today Scottish Widows fund alone has over £100 billion under management.

Insurance was considered as yet another technique used to raise funds and invest for the gains of investors until one country made a very productive use of its sister innovation, the pension funds. They literally took their economy out of financial crisis by simply making its people open a pension funds account. The funds put aside by individuals to deal with the uncertainties of future, solved the nation's financial crisis of present. Let's find out how.

Miracle of Chile

By September 1973 the first ever Marxist president of Chile, Salvador Allende, made a complete mess of the country's economy. His attempt to turn Chile into a Communist state ended in total economic chaos and parliament called military for a takeover. New government under the military dictator, Augusto Pinochet, was eager to stop inflation and rescue the drowning economy of the country.

Pinochet hired some young and well educated economists who suggested solutions for Chile’s economy. One such solution came from José Pinera to create a radically new pension system for Chile. He proposed a scheme where every person with a stable job was required to pay 10% of his income for pension fund. He argued that pension payments would not act just as small percentage of money kept aside by individuals for future, but when paid by every worker in the country, it becomes an income for the state that can be used to boost economic activity. To José Pinera, a state level large-scale system of insurance was simply a system of taxation. The idea was to give the Chilean workers a sense that the money being set aside was really their own capital.

By the end of 2006, around 7.7 million Chileans had a Personal Retirement Account. Specialists were hired to invest pension money in stock markets and they did a pretty good job with it. Average pension account had a return of 10% per year. And within 20 years, Chilean stock market had gone up by a factory 18. Fifteen years before military coup growth rate was 0.17 per cent and in fifteen years that followed, it was 3.28 per cent, nearly twenty times higher. The poverty rate has declined dramatically to just 15 per cent, compared with 40 per cent in the rest of Latin America.

Financial wizard have time and again proved to be of immense importance to various head of states. They have helped them during wars, bailing them out of financial crises or making ample amount of cash available for various ventures. But are these people really the financial messiah who saves nations from economic disasters and put them on path of prosperity? In the last chapter of this series we will discuss the ‘other side’ of these brilliant financial innovations. What have we lost in exchange for the material advancements that we have gained?

The other side

Till now we have discussed the history of money and its evolution. How banks have played extremely significant role in the rise of our civilisation as the most technologically and materially advanced. Buts lets now discuses the dark side of the story. As they say nothing is free, so the question is, what has these bankers taken from us in exchange for what they have provided us with?

Starting off with a very modest beginning, we saw how bankers gradually raised to a status of extreme importance and power. Use, or rather abuse, of financial power to influence politics by a banker was visible even back in 15th century when Medici family frequently bribed state ministers to get things done. They also backed their nominated candidates to hold key government positions and asked for favours later on. Similar kinds of practices were seen during 18th century and this time the culprits were the mighty Rothschild.

At the height of their power, Nathan Mayer Rothschild and his brothers, thanks to their network of banks, had complete control of Europe's economy. All the battles fought during 19th century in Europe were financed by their banks and none of the countries could successfully carry out a military expedition independently. According to one story, the family was involved in practise of funding both sides of a war when

Nathan in England supplied gold to Wellington's army and Jacob in France provided financial assistance to Napoleon's army. This way both the governments got in debt to the Rothschild, and they used that as a bargaining tool.

The father of these five Rothschild brothers, Mayer Amschel Rothschild, said back in 1790 that "*Let me issue and control a nation's money and I care not who writes the laws*". It is clear by this statement that the Rothschild family knew from the very beginning that simply by controlling economy of a country you can dominated its representative government without abolishing it altogether. May be this was the very reason why the family aspired banking business so much. At the time of her death in 1849, Mama Rothschild i.e. mother of the five Rothschild brothers, Gutle Schnaper, reportedly said "*If my sons did not want wars, there would be none*." This statement suggests that bankers have purposefully brought two nation states at the battlefield to achieve their own diplomatic targets. The most striking of all these statements came from the man himself, Nathan Rothschild, in 1815 when he said:

"*I care not what puppet is placed upon the throne of England to rule the Empire on which the sun never sets. The man who controls Britain's money supply controls the British Empire, and I control the British money supply*."

Now this is coming at a time when Britain just defeated France and it became an established fact that no power on earth then could challenge them. British Empire was at its peak and a mere banker makes such a statement reflects the power he had to influence the throne.

Making the elephant dance

Island of America has been paradise for people who desire absolute freedom from all kind of obligations. Such were the aspirations of elders who risked everything they had to migrate to this virgin island. They desired freedom in all aspects of life and to be answerable to none. Most of the early immigrants were Europeans who were sick of the strong religious and cultural bondage in Europe. They wanted a land where they could live on their own terms and not being suppressed by the centuries old customs and traditions.

One such group was the money lenders. We saw earlier how Medici family had hard time coping up with the societal backlash for being indulged in sinful practises like usury. Although social conditions for bankers were not as bad in 18th century as they were during the days of Medici, money lenders were still considered grave sinners in the eyes of influential religious class of Europe. But USA, being a godless society with no interference of the religious laws, provided a lot of respect for the bankers.

Bankers certainly believed that the principles American society was built on were more compatible with their long term objective of dominating world finance than the Britain.

Britain, as mentioned before, was a religious society and the form of government it had made more challenging for bankers to apply their free will. America on other hand was godless and democratic, which meant easier path for bankers.

The movement of American independence was started by the same people who first moved to America and for the very same reason why they moved there. They came to America in search of absolute freedom but being a British colony, America had to abide by British laws and pay taxes to their government. This defeated the purpose for migration in first place. The war of American Independence was funded by a rich Jewish financial broker called Haym Salomon. Some stories suggest that Haym had support from bankers back in England. He was reportedly found running multiple fundraisers across Europe to raise funds for the campaign. Now this was unusual as bankers who had been funding Britain to wage wars against its enemies for most part of the century were now funding America to gain independence against Britain. So in other words the same men who made Britain so economically strong were now putting their weight behind USA.

In 1791, post war of independence, America was in need of a central bank in order to pay back war debts and raise money for the new government. This was the moment when bankers seized the opportunity to have an influential say in

American government. The plan proposed by Alexander Hamilton, first Secretary of the Treasury, was to raise initial funds for the central bank was through sale of $10 million worth of stocks of which the United States government would purchase the first $2 million in shares. The remaining $8 million of stock would be available to the public, both in the United States and overseas. The new central bank was called the 'First Bank of United States' and it is estimated that around 70 percent of it was owned by foreigners. As Britain was the primary source of capital for the U.S during this era, it is safe to say that the same people who dominated British economy occupied substantial stake in the First American National Bank as well.

In 1811, First Bank's 20 year charter ended and was not given extension by the congress as they did not wanted private or foreign interests to dictate the money supply of the country. However this was not very pleasing for the foreign investors as this meant they lost control over America's monetary policy. Some stories suggest that as a result of this, bankers forced Britain to go on war against USA, thus we had 'War of 1812'. Although I failed to produce sound proofs to back this claim made by conspiracy theorist, the result of this war was exactly what bankers would have wanted. America found itself in mounting debt from a war with England, soaring prices, and devalued money from rising inflation. So in 1816, to address these issues, President James Madison authorized the creation of the Second Bank of the United States based on the same principals as the First Bank.

Like the First Bank, Second Bank of U.S also had a charter of 20 years and was also was denied renewal when it ended. This time the man who stood against bankers was the great American patriot and 7th President, Andrew Jackson. In 1932, Jackson carried out election campaign for his second term in office under the slogan, "Jackson And No Bank!" This is in reference to his plan to take back the control of the American money system to benefit the American people and not the banks. He started removing the government's deposits from the Second Bank of the United States and deposited them into banks controlled by democratic bankers. But this bold move came with a price when bankers who controlled Second Bank contracted money supply causing a depression in the country. Jackson personally had to face an assassination attempt when a gunman opened fire on him. Miraculously both of the assassin's pistols misfired and President Jackson survived. He would later claim that he knew the banks were responsible for that attempted assassination. In 1945, before his death he is asked what he regarded his as greatest achievement. He replied without hesitation:

"I Killed The Bank!"

Next American president who withstood financial institutions and was later subject to their persecution was Abraham

Lincoln. Lincoln is one of the most loved American presidents and was truly faithful to his country. During his is entire presidential period America was undergoing civil war and coping up with it was his biggest challenge. He reached out to banks for war financing but was appalled at the offer by them. The Bankers were going to charge him 24% to 36% interest on the loans. Lincoln was greatly distressed, for he knew this would put his beloved country into a debt they would find impossible to pay back. Eventually, he was advised to get Congress to pass a law authorizing the printing of his own debt free money and informed the public that this is now legal tender for both public and private debts. Few years later, in 1865, he gave this statement to Congress:

"I have two great enemies, the Southern Army in front of me, and the financial institutions in the rear. Of the two, the one in my rear is my greatest foe."

Historians consider dealing with civil war was the greatest challenge president Lincoln had to tackle, but in his own words his struggle against the powerful banks was his hardest battle. Having tremendous support from American people, and to the disliking of the international bankers, he won the next presidential election for his second term. Unsurprisingly, he was assassinated a few months later.

For next 100 years, no United States president dared to mess with international bankers' monopoly over U.S monetary policy. Only in 1963, when John F. Kennedy was in office, he ventured to go down the “wrong path”. Kennedy understood how the Federal Reserve System was being used to destroy the United States and being loyal to his country, he could not tolerate such a system. So on June 4th, 1963, he issued Executive Order 11110 which gave him, as President of the United States, legal clearance to create his own money to run the country. But only six months later, In November of 1963, that the world received the shocking news of President Kennedy's assassination. It is interesting to note that, only one day after Kennedy's assassination, all the currency which Kennedy had issued, were called out of circulation.

> “**The world is governed by very different people from what is imagined by those who are not behind the scenes.**”
>
> —— *Benjamin Disraeli*

If you study closely the lives of great leaders faithful to their people from last century or more, you would find one thing common in majority of them: they all at some point in their career were tyrannize by these large financial institutions. Not just the leaders, central banks through their monetary policy have time and again robbed even the masses to fill up their reserves. One such incident took place on 5 April 1933 in USA when President Franklin D. Roosevelt signed Executive

[Order 6102] that prohibited hoarding of gold within the continent of United States. All citizens were required to redeem any gold they possessed to the Federal Reserve before May 1, 1933 in exchange for $20.67 per ounce. Anyone found with more than 160 grams of gold after the given deadline was punishable by fine up to $10,000 or up to ten years in prison, or both. This way the Fed sucked all the gold from American people in its reserves and leaving people only with paper currency.

What they did next was heinous! In January 1934, under Gold Reserve Act, Fed again allowed U.S citizens to buy back their gold but this time at an increased price of $35 an ounce. This meant all those who deposited their gold the previous year would receive around 40% less gold than what they initially had. Through this process, in less than one year, Federal Reserve ripped off American people by taking away around two fifth of their wealth.

> **“Behind every great fortune there is a crime.”**
>
> —— *Honore De Balzac*

These rich elite of America has treated the country like a corporation, where they are the shareholder and thus permanent, American people are the poor workers, and their government is the management that changes every four years. It would be fair enough to say that America is more of plutocracy then a democracy, where there is dictatorship of the capitalists.

If you still want a simple answer to what you have lost in exchange to the services provided by the banks, it's your freedom stupid!

Conclusion

I have always believed that finance to a society is what blood is to a body and anyone who controls flow of money plays the role of heart for the society. Bankers have been extremely successful in developing such complex financial systems which had allowed them to become heart of this modern world. Complexity of modern financial systems has given hard time even to the very well educated people in understanding them and this inability of majority to understand these systems has allowed bankers to exploit and control the world.

In my quest to find the answer to why human civilisation got so much more material success in recent three to four centuries as compare to all previous years of human history, I have come to this conclusion that financial innovations are to take most of its credit than any other factor. I do not undermine work done by scientist and engineers who had play significantly important role in modernising us, but their work was highly dependent on availability of capital. Had bankers not proliferated money in so many important ways, achievements scientist and engineers would have been relatively modest.

The goal of this series was to convince the reader to agree with me on this conclusion and on this fact that people who pioneered financial innovation are, we like it or not, masters of this modern world. Now I wonder what the next important event to take place after the most recent innovation where we have been introduced by a new form of money called crypot-currencies. Only time will tell.

One question might be still bouncing around your head, who are these bankers? Is there a common characteristics found in most banker? Do they belong to a single ethnic group or are followers of similar ideology? Hmm let’s leave that for some other day.