Comparison of the Influence Between Different Economic System During Financial Crisis

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Keywords: financial crisis, GDP, inflation rate, CPI, unemployment rate

Abstract: Comparing the influence of financial crisis on different economic systems is crucial for making informed economic decisions and dealing with future crisis. In this paper, we choose GDP, inflation rate and unemployment rate, which are the most important indicators in macroeconomics, to compare and analyze the differences between different economies in the decade before and after the 2008 financial crisis. Based on the data chart, we conclude that for different economic system and different social form, financial crisis does not only have negative effect. If government and investors can learn lesson from the past experience, the crisis presume chances. The financial crisis is somehow stimulating economic development.

1. Introduction

Because of the booming of the technology and communication or even the development of the transportation system, globalization become ineluctable, however, after the subprime crisis on 2008, the trend of anti-globalization is another trend cannot be ignored. Trade protectionism, technological revolution and climate crisis make the global economy both integral and divided, thus unpredictable. While people enjoying the benefit of globalization, they try to avoid the influence from any crisis when it happened. At the beginning of 21th century, the global economy recovered from World War II and developed with technology and started information revolution in a high speed. Many counties changed from planned economy to market economy, in which, productivity increased alone with cost decreased. Many countries who has lower cost on labor force and decent productive rate grabbed the chance and raised, such as BRICK and VISTA. However, when subprime crisis happened, people lost their faith for the. Since financial world is built on credit, without credit, the market value for all the financial products or derivatives are going to be vaporized.

When people thinking about financial crisis, they always pay attention to the negative effect of the crisis. It is understandable since the word "crisis" means to be bad. Nevertheless, the situations are diverse in different countries or economic system. The influence of financial crisis in major economic systems such as EU, US, China and Japanese could be distinct. As globalization being an inexorable trend, no one could escape the influence of the crisis. There are differences and connections between every country, also there are positive and negative side for the crisis. We know that economic cycles are inevitably. If we can analyze the influence of the crisis for different economic system, we could be prepared for the advent of next crisis. Since finance is such a complicated world, the reasons for the cause of financial crisis are very hard to summarize. What we could do is learning from the experience, being prepared for the similar situation in the future. Thus, the government ought to figure out a series of countermeasures to reply any circumstance to save any avoidable losses. There are innumerous potential problems in finance industry because of the huge number of the types of financial derivatives and many other untraceable factors. Thus, even though avoiding financial crisis seems to be an impossible job, learning from the past is still an essential job.

2. Theoretical Basis of Financial Crisis

2.1. What Is Financial Crisis

"A financial crisis is any of a broad variety of situations in which some financial assets suddenly lose a large part of their nominal value." (Wikipedia, 2019) Nowadays, because of the capital world is connected all together, the financial problem from any country could led global financial crisis. Financial crisis happens when people have pessimistic expectations on economy. Because of the depreciation, shutting down of a huge number of businesses, increasing of unemployment rate and economic depression are all observable. For instance, "The market of subordinated bond derivative has been amplified to 400 trillion dollars, which is 7 times of global GDP." (Institute of Finance, Chinese Academy of Social Science, 2019). Based on credits, the market would be filled of bubble. The chain reaction would be triggered if one bubble broke. Those 400 trillion could be disappeared over one night.

2.2 Three Financial Crises in History

There are three major financial crises after 20th century, 1929 financial crisis, 1997 south eastern Asia crisis and 2008 subprime crisis. There is an old say: "the higher you fly, the worse you fall." Every time before financial crisis happened, the overall economy, domestic credits, stock price and real estate market usually thrived for a couple years already. Based on the history, people putted too much faith on the market if everything looks excessively booming. However, this is exactly the very first pitfall. After the crisis been triggered, the credit of the market disappeared instantly, many financial institutions go bankrupt and bond market declined. The most influential consequence is the turbulence of the society, which caused by the pressure of financial market. Because of the globalization and the existence of the credit mechanism, the world cannot avoid suffering from financial crisis.

On 10/24/1929, New York stock market price fall 12.8% in one day. The most influential financial crisis in human history began. Except the Soviet Unit, the world was chaos. Stock speculation is the main cause for the crisis, which broke the balance of consumption and production. The duration of the crisis is about five year with the influence spread to all capitalist world. The monetary order been breaking, and golden standard started to fall down with British being as the first one to give up. The market is impossible to be totally free since it could lose control easily because of people's greediness. Macroeconomic regulatory must be done by government with some elites who has professional skill in economics. After this financial crisis, the era of cosmical intervention began.

On 1997, THB deprecation was the direct cause of Southeast Asia financial crisis. China is the only survival country in this global crisis, because of capital system in China was falling back. Because of the abandon of fixed exchange rate, THB lost control on July 2nd. During the crisis, many Asian enterprise shut down, most Asian stock falling down, so that some Asian countries' social and political radicalism began. Every financial crisis can show us the most serious vulnerability on current market. This time, asymmetric information from the market give speculator chance to make profit without taking care of the economic order or being responsible for the crisis. In the future, in order to decrease the loss of any financial crisis, more specific rule or law should be constituted globally.

The most recent and consequential financial crisis is on 2008, so called financial tsunami. From the name, the ponderance of the crisis shows itself. At beginning of 21th century, some financial institution in US used some trick to give out mortgage to some investors who have great possibility not being able to pay back the loan in the future. If the bobble break, millions of people would lose their jobs and default on their loan contract. Even if the innumerous cash been injected in the market in order to increase market liquidity, the crisis still go worse. The method those bankers used that could give them right to issue loan to unreliable investors is called securitization. The only concept in their mind is that more investors could decrease the risk of default, however, they neglected massive breakdown. If all investors are tied together, the chain effect could lead extremely serious aftermath with only one minor trigger. Imaging what could happened if we poke one bubble among a cluster of bubbles that floating in the air. With the first explosion, it is highly possible that all the bubbles are going to break eventually. If we suppose the bubbles are all the loan which been issued with high possibility of default, then the breakage of the cluster would be the financial crisis. Financial industry is based on credit. After the market falls, without credit, all financial institution retrenched loan. Since loan is the engine of the modern financial world. Without engine, no amount of gas would help to drive the vehicle.

3. Indicators Used to Analyze Financial Crises

GDP, gross domestic product, represents the gross value of all the final production and serves from a country or area in a specific time. GDP is an indispensable index to indicate an area or a country economic status. When we analysis the history data of GDP, we can have an explicit understanding of the trend of economy in one area. However, for instance, if we notice that the GDP of a country with one billion population is much higher than a country with one million population, which is not represents that the quality of economy of the one with bigger population is better than the other one. Thus, there is another indicator should be introduced with GDP together-- GDP per capita. GDP per capita equal to GDP/ population. GDP per capita is a more reliable indicator to weigh the standard of living. When we are checking the chart of GDP, we notice that some change in the data with the time line is not obvious. In order to have a direct view of the change of the GDP, introduce another set of data is necessary—GDP growth rate. The change or the slope of the GDP can truly reflect the economic situation.

CPI growth rate—consumer price index growth rate, which is what we usually called, inflation rate. When the inflation rate increasing, the currency purchasing power become lower, vice versa. When inflation rate is about 1%-2%, it is helpful to simulate economic development. Since raising price could increase profit for companies, thus they would try harder to do business with potential higher profit. When the rate is larger than 5%, the serious inflation might happen. Macroeconomic regulation and control are mainly aim on making the CPI stable and increasing with a reasonable rate.

Beside inflation rate, GDP, there is another index which every country attaches great importance to —unemployment rate. To reach social stability, unemployment rate cannot be ignored. Imaging the world with increasing number of people do not have a job to earn their living. The instability of the society would eventually become insurrection if it lose control. However, unemployment rate usually decreasing when inflation rate increasing, and inflation rate decreasing when unemployment rate increasing. Thus, when government cannot solve both problem at the same time, the balance point must be found.

Gini coefficient and Engel's coefficient are two considerable indicators as well. Gini coefficient shows if the annual income distribution is even or not. This ratio is between 1 and 0. Zero shows the income is absolute even, and one is the opposite. Usually, when the ratio exceeds 0.4, people believe polarization of wealth would cause social unrest. For Engel's coefficient, statistician Engel believe that the higher the ratio between food consumption and total expenditure, the lower the standard of live of this sample population. In experience, the coefficient beyond 59% is perceive as poverty, lower than 30% is perceive as rich. However, the data of Gini coefficient and Engel's coefficient are not collected every year. Thus, using those coefficient analyses the influence for the economy is implausible. GDP, inflation rate and unemployment rate could be relatively comprehensive enough for analyzing the condition of the economy during a particular time. Furthermore, in future research, what we could do is using the pattern of the economy condition to predict what would happened on Gini and Engel's coefficient.

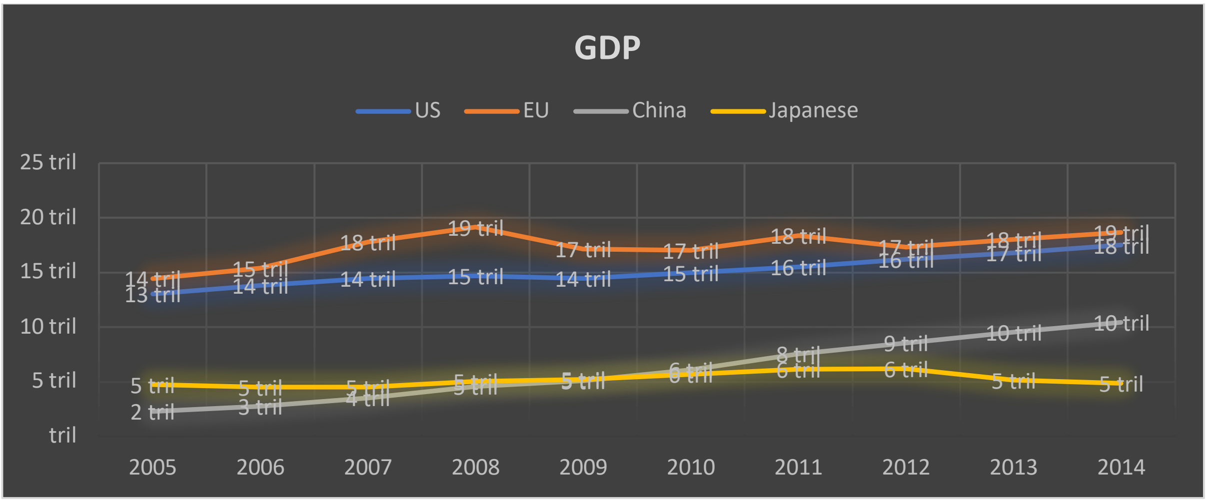

Figure 1: GDP line chart of US, EU, China and Japan during 2005 to 2014.

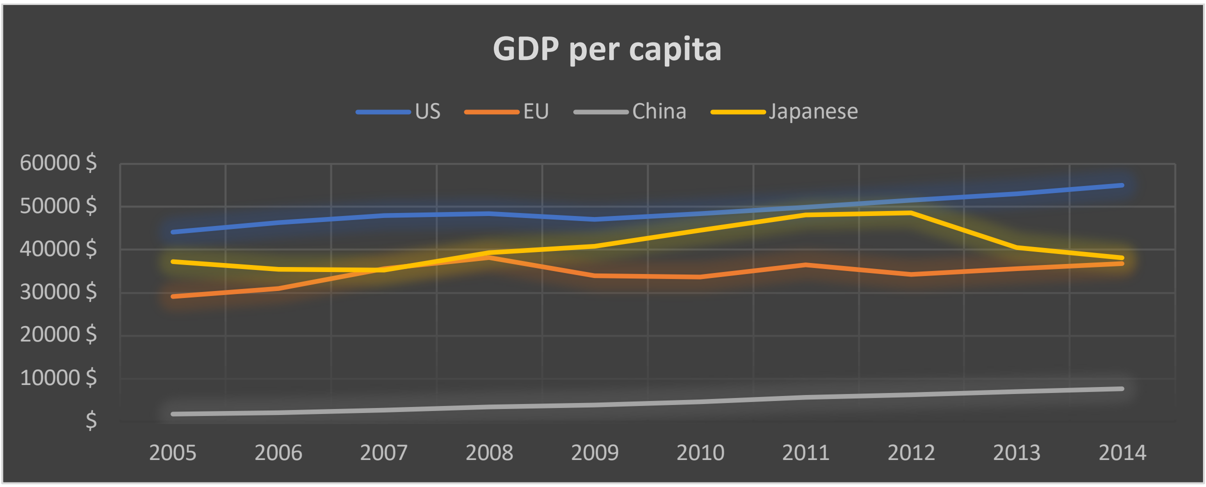

Figure 2: GDP per capita line chart of US, EU, China and Japan during 2005 to 2014.

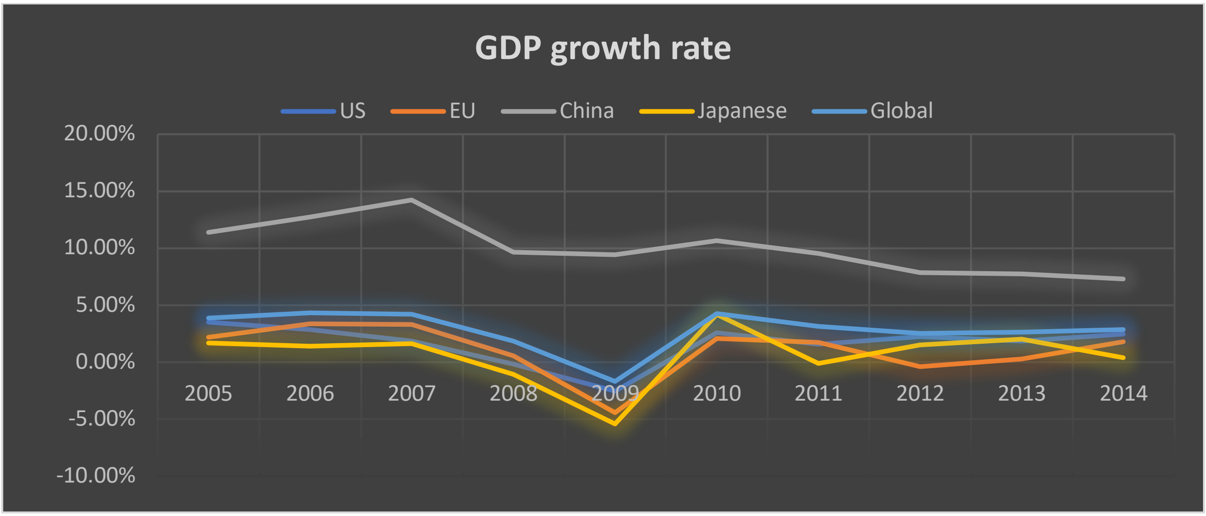

Figure 3: GDP growth rate line chart of US, EU, China and Japan during 2005 to 2014.

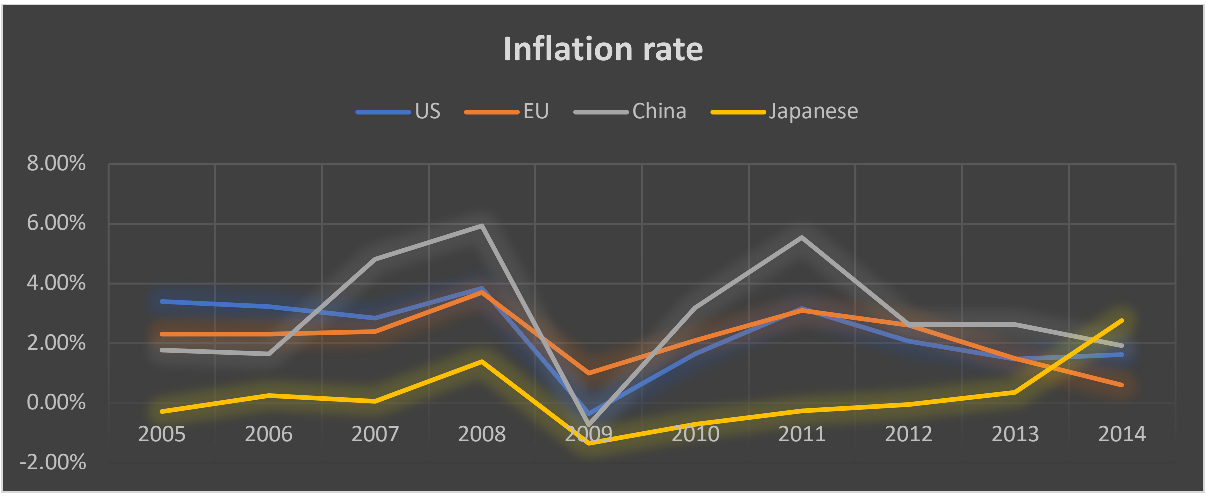

Figure 4: Inflation rate line chart of US, EU, China and Japan during 2005 to 2014.

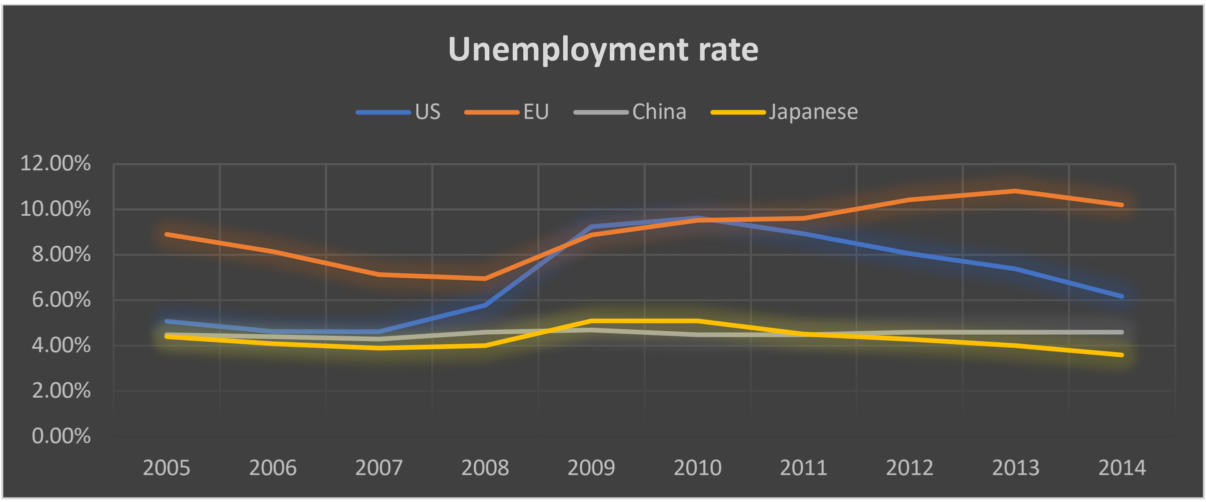

Figure 5: Unemployment rate line chart of US, EU, China and Japan during 2005 to 2014.

4. Comparison Between Four Major Economic Systems

The financial tsunami on 2008 is the most recent and serious financial crisis after WWII. Until now, the influence has not disappeared completely. Since different period has different characteristics, the experience from too far from now has limit reference. Thus, using the data from 2008 financial crisis is persuasive to compare and analysis the influence for major economic systems.

From the GDP ranking in 2018, US, EU, China and Japanese are the top economies system in the world. In 21th century, the main pattern of the world has not been changed much. In addition, those four economies include western and eastern world, counties and political economic union, communism and capitalism, developed counties and developing country. Thus, comparing those four economies is convincing enough to analysis the influence of the financial crisis. From the chart, the fluctuation on GDP and GDP per capita trend directly shows us problems appeared around 2008. EU and US both had decline on GDP during the period. The slope of China and Japanese are also tending to be horizontal.

US is where everything started. The GDP on fourth quarter on 2008 and first quarter on 2009 are both decreased by more than 5%. The unemployment rate had the peak value beyond 10%. Inflation rate drops lower than 0% the first time after 1960. Social unrest was on the verge of breaking out. After the financial crisis, the hidden problem in US financial system had exposed. Since US government were try their best to save all the major enterprises, the national treasury carried tons of burden. Even though, back to 2008, US is the only super power in the world, the pattern of the world changed after this crisis. Base on the fact, US and rest of the world realize that even if US is powerful, it cannot hold off the tsunami by itself. When everything looks great, the greediness controlled everyone's mind, including investors, bankers, property buyer and government. It is impossible that everyone could take a share. Someone wins stand for some others has to lose. The market falls because of the abuse of financial derivative by financial institute, intentionality of stimulate domestic demand by government, decreasing interest rate by federal reserve. Consequentially, real estate market falls, interest rate increased, three of the five largest investment banks in US go through bankruptcy or acquisition. In addition, comparing the margin of inflation rate increases, the decrease of the retail sales and domestic consumption is significant. The hit on real economy is also critical as well, which been reflected on unemployment rate increased. US recovered by using tons of financial remedy and economic incentives. We can saw that on the GDP growth rate chart, on the second half of 2009, the rate became positive and continuously increased. Beside all the superficial phenomenon, which include domestic demand increased, inflation rate been stabilized, export increased, and companies' financing improved, the most important index, which unfortunately cannot be measured, the market credit has been recovered. If people still did not have faith for the market, the financial crisis would always be the crisis.

The data chart shows that EU may suffered more than any other region on the world, even more than US. Because EU is a special economic system which composed by numbers of individual countries with independent government. The system is more fragile and complicated to dominate. EU bought securitized financial products from US, obviously, when the chain started from US broke, EU definitely could not escape from the effect. The second derivative of GDP of EU is the smallest among those four major economic systems, which shows that EU is not only been influenced by the crisis, but it also went through a very hard to recover. Surprisingly, from the data we have, visually, the influence for US and Asian looks relatively lighter than in EU. In fact, US did not change any financial and social structure because of the crisis. Mostly, US just amended act in some aspect and resort predictable measure to save the market. The impact for EU is significant, albeit it is not the main or the first battlefield. Since Euro dollar was first been introduced on 1990s. So, it is unnecessary to criticize integrality for this new currency. EU is so different since it actually has 28 individual countries, in which, every country has their selfishness and concern. It is already hard enough to handle economic direction for only one country, not to mention treat 28 counties as one economic system. From the unemployment rate chart, the rate continuously grows until 2013, then decreased with a relatively small rate. All the counties in EU were suffered from tons of non-preforming assets and also the stocking price was fall back for more than ten years. The car and real-estate industrial were stagnating because they are highly dependent on the loan relationship with banks. We know that unemployment is one of the most significant indexes that government care, since people would have many unforeseeable actions exceed what is proper if they cannot make their lives. Large demonstrations and strike in Europe showed that financial problem had become a social problem. After all, EU is not a single country. The policy established to save and stable the market by central finance is impossible. Hence, the recovering time is longer, and the process is more difficult. All countries in EU comprised a series of solution, such as lower the interest rate, injecting liquidity and release the pressure of inflation. Those approaches are similar with US, but a harder and more complicate version.

The data demonstrates that Japan was steadier visually than other three economic systems. Because of being one of the defeated counties in WWII, Japan become a special economic system, which the only industry it can develop is economy. Not surprisingly, right after US, Japan has been the second biggest economic system in the world for a long time. This country is very hard to be identified whether it is communism or capitalism. The more major companies depend on the government, the more mastery the government could have over the entire economy. Consequentially, the fluctuation of the data is not that significant comparing with others, even if the financial crisis hurt Japan so hard as well. Beside investors lost faith for the market, shrinkage of imports and exports, real estate crisis, and the most damaging part –automobile industry decline, are all the evidence shows that Japan did not shave alone. As we know, Japan is highly dependent on car industry, which occupied above 30% of the total GDP. If credit market goes wrong, car industrial, the one heavily depends on loan market, is definitely going to be stroked. When a country highly rely on the automobile industry, those negative factors for sure have great an impact for the entire country. Also, since Japan is a large electronic devices export country, therefore, when Sony, Panasonic, Toshiba and Fujitsu, etc., the huge influential electronic corporations' export rate decreased significantly, another strike for the economy came. Even though, comparing with western countries, the impact from financial crisis is relatively small to Japan, the economic decline is still obvious. Except lower the interest rate, injection of liquidity, Japan developed financial services industry to complete and recover capital. The financial revolution is what that Japan willing to catch. All the manful merger and acquisition show that this Asian old power still have faith to the global market and themselves.

Among the four systems we are comparing, China is unique. As we know, China is communism, eastern and developing country. The uniqueness also shows on the data chart. On GDP and GDP growth rate chart, when everyone else have a huge decline on 2008, China looks steady, including unemployment rate, not much fluctuation. The only obvious indicator that shows abnormality is inflation rate. Because of the CNY appreciation, billions of international hot moneys entered in to China. The inflation become the major problem for China by that time. When Chinese government was trying to control the inflation rate and decrease the loan amount from real estate bank, the cash flow of many real estate developers was forced to be interrupt. In addition, Chinese investors, including bank and individual investors, hold a large number of US real estate bond. During the financial crisis, the bond market value decreased dramatically, in which, the assets of bond holder in China were shrunk. Since many Chinese investing banks and fund companies are public companies, after the financial crisis started from US, those companies been influenced, so as the Chinese stock market. Chinese A share market that experienced point drop of 21.4% on January 2008 is stand at the forefront of the decline. In addition, export is one of the main elements for Chinese economic growth.

On account of the trade surplus from US, Chinese export would slow down if US economy decline. The reason why there is no significant decline on the indicator data chart which been chosen is that China already have rapid economic growth for couple decades. Although the rate of development had decreased, the inertia of this second super power in the world still support the economy. However, after WWII, the world is split to communism and capitalism. US, the one who take the lead for capitalism kept up the pressure to communism, which lead by China. Therefore, the financial crisis is actually a great chance for China and many other communism countries in the world. In fact, China had done many acquisitions and restructuring during financial crisis, in which, China caught the opportunity to boost international development.

Even though it seems everything is back on track on late 2009 and beginning of 2010, there are many hidden troubles have not been solved or even discovered. The huge fiscal deficit and aging problem still remain insurmountable. Even now, some counties are still picking up the pieces from the leftover of the tsunami. This is destined to be a lasting and painstaking war. However, more importantly, the mission is catching the opportunity which hidden in the crisis.

5. Conclusion

In the paper, we use historical data around timeline of subprime crisis to analysis the influence for different economic system. After seventeen centuries, there are nine relatively influential financial crises. Recall the histories data, they are all similar with the data pattern around 2008 subprime crisis. After the decline, which caused by the economic fluctuation, all the indicators are strongly rebound. The point is the world learned from the past and gained experience after went through the crisis. The recovering makes the world better. The world economy is similar with an elastic ball, on matter how hard it been hit, it would be bouncing back, and jump higher. The elastic force is human being, or be more specific, the greediness. This driving force and elastic force, which push the global economy going further. “Be greedy when others are fearful and be fearful when others are greedy.” (Bill Buffett). The wisdom is mapping the history. When almost everyone has great faith to the market and believe they can make extra money when investing, which is moment the market is about to crash, since the gross value of the market is conservative. People should be careful and modest when something looks too good to be true. The more profit you want to get, the more risk you are going to take. The standpoint, “too big to fail” or “too connected to fail”, which held by US government, is impractical. To be honest, the most significant reason why a financial issue become a global financial tsunami is just because it is too big and too connected. When globalization is an inevitable trend, all the countries should be careful since a minor problem could be magnified infinitely. Thus, anti-globalization is a class need to be learned. The crisis works like a spur, the more the horse feeling pain, the quicker it runs. Even though it hurts at beginning, it makes horse stronger and pain resistance. Besides, the clever horse would know he need to run fast and proper, otherwise, it could be stabbed by the spur once again, maybe at another spot and even harder. Equally, when people are facing a troublesome issue, some say it is challenge, some say it is chance. If the counties who suffered from the crisis had learned the lesson and catch the chance to bounce back, so that they can have a perpetual development in the long course of history.

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