THE PENNSYLVANIA STATE UNIVERSITY
SCHREYER HONORS COLLEGE

DEPARTMENT OF ECONOMICS

FINANCIAL MARKET RESPONSES TO POLICY OPTIONS IN HONG KONG, INDONESIA, AND SINGAPORE DURING THE 1997 ASIAN FINANCIAL CRISIS

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Spring 2011

A thesis
submitted in partial fulfillment
of the requirements
for a baccalaureate degree
in Economics
with honors in Economics

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Abstract

During the Asian Financial Crisis of 1997, the governments of Hong Kong, Indonesia, and Singapore took specific actions in response to the effects of the crisis. Analyzing the reaction of respective financial markets using respective indices to each action leads to a broad blueprint for any nation experiencing a similar crisis. Findings reveal that nations can avoid the devastating nature of short term shocks by pursuing fixed or managed rates, bilateral loans, pro-business policies, defense against speculators, and transparency. The fundamentals and foundations of a national economy will always dictate the long-term ability of a nation to weather a crisis but placating financial markets, thereby escaping the effects of shocks, will benefit every citizen and avoid economic degradation.

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Introduction

In June of 1997, Prime Minister of Thailand Chavalit Yongchiayudh openly stated that the Thai government would not devalue the baht after it had been the target of major speculative attacks in May. A Thai economy which had enjoyed an average growth rate of nine percent for over ten years (Khan, 2004) stagnated almost instantly. Widespread layoffs resounded throughout the country as more than 600,000 foreign workers were deported to their home countries.

Forcing Thailand's government to free-float the baht on the world exchange, its value plunged, along with a 75% drop in stock market value and the collapse of the largest finance company in Thailand (Garay, 2003). This refusal of the Thai government to defend the baht became the catalyst for the 1997 Asian Financial Crisis, a financial panic and resulting run that spread throughout the region.

While many papers have sought to explain the underlying causes of the crisis and the various effects in specific countries, there is a substantial absence of research on the reaction of financial markets to specific actions taken by respective governments in the short term. Using the efficient market theory, this paper seeks to identify and explain the economic effects and resulting implications of sanctions and safeguards on financial markets in Singapore, Indonesia, and Hong Kong during the 1997 Asian Economic Crisis.

In order to accomplish this, the paper will first examine theories for the spread of the crisis to the region as a whole. It will then look at the specific cases of Singapore, Indonesia, and Hong Kong. By pinpointing the announcement and enactment of various actions taken by the respective governments as they respond to the crisis, coupled with analysis of respective financial indices, this paper will identify the market reaction of the financial community to each specific government action. The findings will be discussed in a broad context and used to develop a blueprint as to which specific actions are either essential or should be avoided in order to placate financial markets during crises in the future.

These countries were specifically picked for various reasons. The major reason is that the three countries house the largest and most diversified financial markets in the region. All three financial systems have similar markets. Also, the three countries are peripheral to the crisis and while all three were substantially affected, none of them directly transmitted the crisis elsewhere. Finally, all three countries were governed by authoritarian or pseudo-authoritarian governments. This fact gives more weight to conclusions because while the market may have expected certain actions or intervention, the lack of transparency in debate and decision making will ensure direct, immediate effects on financial markets after the announcement of actions, using the efficient market theory.

Background of Crisis

Before the crisis of 1997, Asia had enjoyed almost fifty percent of total foreign investment to developing countries (Garay, 2003). The steady flow of substantial capital (especially in South-East Asia) resulted in high growth rates and a substantial increase of prices in financial markets and of various commodities. The high growth rates, often reaching double digits, were such an accomplishment for developing countries at the time that the term “Asian economic miracle” became a common term not only with Western investors, but with the IMF and World Bank institutions as well.

While many financial investors embraced the (in hindsight) bubble, some academics took exception to the fundamentals of the current market. The most famous academic to take exception was economist, and future Nobel Prize winner, Paul Krugman. In 1994 Krugman published a controversial paper titled “The Myth of Asia’s Miracle.” Within the paper, Krugman compares the new Asian economic powers to the rise of the Soviet Union. He argues that the majority of perceived economic growth was merely a result of increased capital investment and a related rise in asset pricing. Because productivity has not nearly increased at the same rate, Krugman argued that the growth being observed at the same time was unsustainable and possibly a total mirage (Krugman, 1994, 6). As it often happens, the academic paper of Krugman was dismissed by financial and global institutions. One relatively obscure economic calculation could not derail confidence (and the profits) observed in the vast economic growth of the Asian Tigers.

While financial institutions are observed regularly as creating bubbles and ignoring tell-tale signs of collapse (observed in the Great Depression, the dot-com bubble, and the most recent 2007 Great Recession), one must investigate the relative failures of government regulators within Thailand and other various South-East Asian countries. While now known for strict fiscal policy, this was not always the case. Within each respective country, government regulators were merely a victim of their own success. High growth rates in countries that had long lagged behind developed nations were a welcome sign. While there may have been some worry over the rate of growth, there was no letup in foreign direct investment. With capital constantly being invested into the country, it created a self-perpetuating cycle, placating the fears of regulators and leading to inaction, or in some cases totally incorrect policies.

There is still a large and heated debate over the specific causes of the crisis, the reasons for its severity, and its ability to infect so many countries around the region. At the very least, there is a consensus that there was indeed a bubble within Asian countries and the collapse and stagnation of so many economies were interrelated. As mentioned earlier, the catalysts for the crisis were the events that transpired in Thailand.

One may ask why events in Thailand slowly triggered similar crashes in recessions throughout the region. One part of a paper written by Urbi Garay, an Assistant Professor of Finance at the *Instituto de Estudios Superiores de Administracion* in Caracas, Venezuela seeks to answer this question. At the broad, financial level, there are several reasons for interdependence and a spread of a crisis or crash. First is that financial markets within a region are often highly integrated, resulting in a shock in one country being almost instantly translated into the trading markets of another (Garay, 2003). Secondly, extensive trade and agreements that are normally seen within a region foster strongly correlated currency phenomena. If one currency is quickly devalued, the trade balance from that economy is instantly devalued, frequently causing massive shocks in supply with the partner country.

The third reason for stock co-movements is the speed and partnership that almost always accompanies countries in close proximity to each other. The shared technological advances and quick exchange of capital, not only through financial intermediaries but also physically across borders, led to the rational devaluation of markets. In turn, this resulted in the devaluation of currencies by predicting comparative shocks and loss in economic growth.

A final reason, usually more psychological than actually rational, is the tendency for investors to believe that if one country within a region is experiencing economic degradation, the entire region is in trouble, without taking standard macroeconomic fundamentals into account. Studied extensively by Calvo and Reinhart (1996), these sentiments become self-fulfilling as the majority pulls their money out of the region, actually causing the crisis themselves by personally bursting the bubble (or the appearance of a bubble) by pulling out of assets. This phenomenon can be viewed as a massive bank run on the entire national economy.

One should note that it is not always entirely irrational. Besides reasons for economic weakness due to proximity to a country in crisis, there is another case for withdrawal. When Thailand felt the economic shock, foreign investors and ratings agencies instantly devalued Thai assets due to a now weak currency and the dismal economic future of the country. This was instantly felt on balance sheets by Western companies that had invested in the country and its businesses. Worried about liquidity, corporations were forced to liquidate assets. In many cases, the most rational and obvious assets to liquidate were ones held in nearby countries. Not only did this create liquid capital for use by corporations, but the company indirectly insulated itself from other investors' runs and interdependence.

As the crisis began to take hold across borders affecting multiple countries throughout the region, academics and financial institutions began to theorize about the causes. Many arguments are based around currency issues. One popular theory is that South Korea, Indonesia, and Thailand were running large deficits in the years leading up to the crisis (IMF Staff, 2010). This coupled with fixed exchange rates creates an incentive for borrowing from other countries. As exports began to slow around late 1995, national currencies began to be strained.

Another argument contends that the large amount of investment and capital entering various developing countries led to low interest rates, incentivizing massive levels of borrowing, creating an extremely risky, far too leveraged, economy. One event, such as the Thai devaluation, caused massive panic, capital flight, capital devaluation, and an overall financial crisis.

After his economic studies had been proved correct, Paul Krugman (now enjoying increased credibility) studied the causes of the crisis in a paper titled "What Happened to Asia?" Studying Malaysia, Indonesia, and Thailand, Krugman uses mostly qualitative methodology with technical, theoretical equations (coupled with data when available) for capital, rent prices, and various assets within the respective economies (1998). His findings argue that the general consensus on currency being the main subject of the crisis may be incorrect. Instead, the 1997 crisis was actually caused by bad banking and its consequences, fitting in more with the leveraging argument. The argument contends that currency was not the direct mechanism responsible for the size or scope of this crisis, but merely an incidental phenomenon caused by bad banking.

Jonathan Leightner also studied the crisis, focusing mainly on the epicenter: Thailand. Through a more political and historical analysis, Leightner is more convinced by the credit crunch argument, citing several examples where threats were to made to managers of financial institutions. He is highly critical of Thailand's leadership at the time, inferring the severity of the crisis could have been far less with a better, more decisive leadership.

While Krugman and Leightner are academics by trade, the crisis has also been studied extensively by research arms of trading firms as well as individual investors in general. Before becoming a director at the International Monetary Fund, Jonathan Lipsky had a career in trading at JPMorgan. Because of this, Lipsky takes a strictly market perspective, discussing various concerns global investors took into account while analyzing Asian economies during the crisis (1998). Combining these points with trade flow data, he blames the individual countries ultimate failure to fully examine all policy options and, after identifying the regional crisis it was creating, to act on a coordinated, regional foundation. While focusing on market forces, he does take the time to theorize on the various difficulties in creating policy to halt or at the very least slow capital flight once an international run has begun.

In a Congressional Research Support Report for Congress, Dick Nanto, a specialist in the Industry and Trade Division, cites four causes and effects contributing to or from the Asian financial crisis:

> (1) a shortage of foreign exchange that has caused the value of currencies and equities in Thailand, Indonesia, South Korea and other Asian countries to fall dramatically, (2) inadequately developed financial sectors and mechanisms for allocating capital in the troubled Asian economies, (3) effects of the crisis on both the United States and the world, and (4) the role, operations, and replenishment of funds of the International Monetary Fund (1998).

Once the crisis began to spread, and the severity of the situation was fully realized, the International Monetary Fund (IMF) was called in to create rescue packages before individual countries could default and hurt the global economy to an even greater extent. The IMF created packages for Indonesia, Thailand, and South Korea.

While the IMF did provide loans to the afflicted countries, they came with several conditions. One of the most controversial measures provided in each loan was to raise interest rates through the central banks of each country. While making the domestic currency more attractive, many business owners had already borrowed money in dollars when the crisis first began to take hold within the country. By increasing interest rates, the local currency increased as well. This made debts (now in dollars) extremely hard to pay because revenue was still in the local currency. This put a squeeze on various business owners and corporations as their balance sheets strained to stay in business. With private sector loans now even harder to come by, the credit crunch worsened, putting some companies and small business owners out of business. By raising interest rates, possibly not understanding the underlying reasons for the crisis to begin with, the IMF arguably exacerbated the crisis in some countries.

Years after, the IMF has still not acknowledged implementing any incorrect policies or any wrongdoings whatsoever. One paper written by the IMF staff investigates (obviously from the IMF perspective) what went wrong in terms of the crisis (IMF Staff, 2010), how can the effects be mitigated, and what steps should be taken to prevent future crises. By analyzing net capital flows as well as exchange rates and equity prices, the authors came to several conclusions, the most prominent being that the severity of the crisis (both in the stock market and currency markets) was due to authorities' initial hesitation in introducing IMF reforms. While not acknowledged by the IMF itself, the institution has come under intense criticism for various demands and reforms. A former Chief Economist of the IMF has stated, "The rationale for conditionality is not to inflict pain and suffering on the borrower but to ensure that the IMF gets repaid" (OxResearch, 2008). Unfortunately, ensuring repayment and inflicting pain tend to coexist, and therefore have an initially negative impact on financial markets.

Thesis Statement

While fundamentals will always dictate the long-term ability of a nation to weather a financial crisis, a state can avoid the traumatic and sometimes devastating nature of short term shocks through fixed or managed rates, bilateral loans, pro-business policies, defense against speculators, and transparency, as demonstrated through success and failure in Hong Kong, Indonesia, and Singapore during the 1997 Asian Financial Crisis.

This paper will examine the governmental actions of each country individually, as well as the financial market response to each such action. The final section will combine and evaluate these observations in order to identify actions to take or avoid when attempting to placate domestic financial markets.

Hong Kong

Of all the countries affected by the 1997 Asian Financial Crisis, Hong Kong was in one of the most unique situations. Within twenty four hours of Britain ending its ninety-nine year rule of Hong Kong and handing sovereignty to China, the Thai baht entered its collapse (Yahuda, 2006). In one of the financial epicenters of the region and the world, the regulators and policy-makers of Hong Kong were instantly thrown into panic. While the transfer of rule did not have that much of an effect on the government (due to a stable status quo and harmony between China and the United Kingdom), it did put greater stress on financial markets as they sought to make sense of the new developments.

The authoritarian nature of Hong Kong's government along with an esteemed and long-established Hong Kong Monetary Authority (HKMA) allowed for strong, coordinated response to various attacks on the currency and markets. Through subtle, gradual actions, Hong Kong spent the beginning of the Asian Flu protecting its currency and its peg to the United States dollar. Having experienced multiple speculative attacks in the past, the government actively placated long-run investors by forcing interest rates above floating levels and injected large amounts of capital into stock and futures markets in order to punish the speculators (mostly large, well-financed hedge funds) that had targeted the currency (IGCC, 2010, 3). One must keep in mind that these actions were possible because of the enormous amount of reserves Hong Kong had in place, one of the largest in the world.

One such specific event during Hong Kong's experience with the Asian crisis was in October of 1997. Speculators sought to break the linked exchange rate between the Hong Kong Dollar and the US Dollar by taking extremely large short positions against the Hong Kong Dollar. The attacks automatically triggered safety measures that drove up interbank interest rates (IGCC, 2010, 2). The size of the attack led to interest rates reaching peaks of 280%. The high rates forced speculators to borrow locally in order to finance short positions and continue day to day operations. This forced these same speculators to abandon their short positions and incur major losses.

While the measures in place had been effective in staving off complete collapse, the investors had predicted the skyrocketing of interest rates due to the transparency and automatic nature of the financial system. When interest rates hit nearly three hundred percent, mortgages (mostly variable throughout Hong Kong) also went through the roof, practically creating a housing bubble overnight. Payments rapidly declined, drastically hurting the value of assets within the stock market. Speculators had foreseen this secondary effect and had taken short positions against the stock market as well (IGCC, 2010, 2).

In terms of value, the Hang Seng index fell from an adjusted value of 15,128 on October 3rd, 1997 to 9059.9 on the 28th of the same month. Leading up to October, the standard deviation of the adjusted Hang Seng had been 1150.6; in the month of October alone, it reached 1881. This meant the coordinated speculative attacks had created one of the most volatile, not to mention devastating, months in the history of the index (Yahoo! Finance, 2011).

Speculators made off with enormous profits as the gains from shorting the stock market eclipsed any losses incurred from maintaining normal bank operations on interest rates reaching 300%. While speculation did manage to drive down the stock market, the Hang Seng index soon stabilized around the adjusted 11,000 mark. While major losses were incurred in terms of asset values, it can be argued that it was a victory for the Hong Kong government that the automatic safeguards staunched the bleeding once the market had reached a certain level, a level that was arguably even appropriate due to the economic climate of the region at the time.

The automatic safeguards had successfully beaten back currency speculation, but the transparent nature of the safeguards had opened up a new vulnerability. The Hong Kong government may have considered freezing mortgages during the attack, but this would have led non-speculative investors to question what other authoritarian actions the government might take, leading to more uncertainty. Once speculators accomplished one success manipulating markets, it was only a matter of time before they would use the events of the financial crisis to try again. This second attempt happened in August of 1998.

Again the private financial arena of hedge funds and investment banks used the same strategy in order to raise interest rates through the automatic currency safeguards. The action was further compounded by whispered, swirling rumors surrounding policy regarding the Hong Kong dollar and Chinese renmenbi (the nation had now enjoyed sovereign control over Hong Kong for more than a year). Adjusting the peg of the renmenbi would send financial centers into further chaos, speculation that devaluation was about to go into effect caused an even greater credit crunch: higher interest rates and lower asset prices.

The Hong Kong Monetary Authority had anticipated another attack similar to the one in October of 1997, and had created a strategy to combat it in order to protect stockholders. Instead of the Monetary Authority buying up the dumped Hong Kong dollars in order to maintain the fixed rate, the HKMA had the Treasury buy them up under the guise of planning to run a fiscal deficit for a stimulus package (IGCC, 2010, 3).

This meant no large change in the interbank lending rates (the rates that had skyrocketed the previous year and had decimated the stock market). At first there was no immediate effect, as the stock market maintained its value. Unfortunately this did not last long as investors embraced a new fear: that Hong Kong was now abandoning the peg that linked the Hong Kong Dollar to the greenback.

While the HKMA had fought off short-sellers through the interest rate mechanisms, financial hedge funds seemed to be too well-funded with thousands of future contracts soon expiring. The HKMA even went so far as to purchase stocks in an attempt to make sure speculators would not profit. In the end, this cost the Hong Kong government more than 15.2 billion United States dollars (Cruz, 1998), an astronomical amount relative to the size of the city-state.

While staunching profits, the fears exacerbated and combined with the continued fear that China would devalue as well, the Hang Seng index reached a more than five-year low, closing at an adjusted level of 6660.42 on August 13th, 1998. While the market did partially recover, the damage was already done.

On a more holistic level, these actions made many domestic and foreign investors question if Hong Kong was still dedicated to the free market process that it had long embraced. Hong Kong had set a precedent, an extremely strong message, that they would attempt to thwart any coordinated attack by speculators, rather than allowing the free market to run its course. The Hong Kong government would actively pursue stable markets through direct action, while not only protecting the economy from speculation, but actively creating disincentives to fight it.

The very strengths that made Hong Kong a financial center made the city-state extremely vulnerable to mass speculation and manipulation. Mechanisms (while fundamentally strong) were extremely predictable, as were their resulting effects. While a large financial center, compared to the size of international capital as whole, the HKMA could only stick to its pledges of openness and transparency, leaving only the variable of immediate action (within the legal realm of the Monetary Authority) (IGCC, 2010, 1).

The market did not fully recover to pre-crisis levels until almost a year later, nearing the end of 1999. Due to the relative collapse of financial markets, many Hong Kong citizens were financially ruined and stripped of any chance at economic prosperity. Speculation ripped through markets, causing untold hardship to thousands if not millions of people. Due to these measures, many developing countries developed regulation in order to wrestle back the stranglehold that hedge funds and investment banks looking for short-term profits can have.

While Hong Kong's central authority did a brilliant job insulating the country from the far-reaching effects of the 1997 Asian Financial Crisis, speculation based on its indirect causes did cause some hardship for the citizens of the city-state. At great cost, Hong Kong managed to maintain its currency's peg to the United States dollar and fight speculation. Unfortunately, it did not have enough tools at its disposal to adequately protect financial markets from (mostly foreign) speculation. It begs the question, what level of priority safeguards and market intervention is necessary in financial markets, and at what cost should they be initiated?

Before the second attacks of speculation, the country was struck a major blow. Not from an organized attack by speculators, but from the balance sheet of a private financial institution. On January 12th, 1998, Peregrine Investments, a Hong Kong based investment bank, filed for liquidation (Business Standard, 1998). The significance lies in the fact that it also happened to be, at the time, the largest private investment bank in all of Asia.

The filing of liquidation obviously had an enormous effect on the stock market at the time, causing more than a 700 point drop in the adjusted Hang Seng index in the weekend leading up to the admission. While an important event, it did not directly influence any major action taken by the Hong Kong government. The significance of the filing lies in the fact that Peregrine Investments' hand was forced almost solely because of bad exposure to loan investments in Indonesia, the next country of study in this paper.

Indonesia

Indonesia was one of the greatest casualties of the 1997 Asian Financial Crisis. As the crisis first set out, it seemed that Indonesia was untouchable. The nation enjoyed foreign reserves valued at more than $20 billion USD, low inflation, a substantial and stable banking sector, as well as strong Western support in the form of both trade and political support (Martinez-Diaz, 1996, 401).

What followed was one of the largest declines in modern history. From the economy as a whole, to the businesses, politicians, and other players in it, all were severely hurt, some destined to never recover. The government (in this case, namely the dictator Suharto) directed many interventions into the fundamentals and mechanisms of the economy and financial markets. By looking at the response from financial markets, one can get an excellent idea of how financial markets view these various actions and interventions, much more than the relatively passive governments of Hong Kong and Singapore.

To totally understand the actions taken by Suharto, one must also analyze the coalition that Suharto aimed to appease through his actions. While Hong Kong aggressively defended financial markets and its own economy, it understood the importance of foreign investment and capital inflow to the state. As opposed to Hong Kong's technocratic regime, Suharto was a pure dictator who had risen to power through a military coup. While enjoying Western support due to his policies and relative appeasement, his main loyalty was to the military that had put him into power, and the enormous amount of assets they controlled. This should be kept in mind regarding all policy decisions.

As mentioned earlier, as the crisis began Indonesia was in very good fiscal shape for a variety of reasons. Unfortunately, the currency crisis that had begun in Thailand had infected other countries in the region (for reasons previously discussed). Currency speculators saw massive potential profits by short-selling and buying puts on various currencies through the region. By manipulating markets and selling a negative outlook to Western investors, they profited on several economies.

Before the crisis had begun, Indonesia held a tight, fixed exchange rate on the rupiah. When Thailand began to float the baht, providing a catalyst for the crisis, the Indonesian government proactively widened the level of variation the rupiah was allowed to deviate from eight percent to twelve percent. Put into effect on July 11, 1997, the action was viewed favorably by the financial community as a proactive attempt to calm currency markets. Indonesia's authoritarian government had enacted similar policies in the past in response to other, more indirect crises such as the Mexican crisis. The Jakarta Composite Index saw only a slight decrease in adjusted value, even as the region continued to experience constant economic shocks and degradation.

While Indonesia was in good fiscal shape, it had the ill fortune of being in the same geographic region as where the crisis was unfolding, important for investing reasons due to trade and the interconnectivity of markets, in both financial assets and commodities. Daragh Maher, an economist at ING Baring Securities of Singapore, stated that while Indonesia was in better economic health, "the currency players are painting all regional markets with one brush" (*New York Times*, 1997)

Though there is a significant consensus that Indonesia took the correct action (given the restraints and circumstances the nation was under), the deepening crisis and the wealth of Indonesia opened too large of an opportunity for speculators. Rumors regarding extensive government corruption and misuse of resources began to pick up speed, slowly becoming accepted fact throughout the Western investment community.

Multiple reports on government corruption have a distinct impact on investor confidence for various reasons. The most important and evident is the simple fact that corruption leads to incorrect policy actions and decisions, viewed as irrational by the investor community. Investor confidence in Indonesia began to plummet as several reports surfaced arguing that Indonesia's economy was extremely overvalued.

Due to previous deregulation (lobbied for heavily by the West), most of the Indonesian stock market was foreign owned, and therefore controlled by foreign investors. Due to the reports of government corruption, overvaluation, and the current regional economic atmosphere, foreign investors began to sell assets at an incredible rate.

Aided by further speculation from hedge funds and investment banks, the value of the rupiah began to rapidly decline. Soon the free market exchange rate of the rupiah was far below the minimum limits of the Indonesian regulated rates.

Bank Indonesia attempted to return the rates to within or near the previous band through market intervention by buying up assets in order to raise rates. After a few attempts, the Bank made the controversial decision to totally abandon policies of currency management, and allow the rates of the Indonesian Rupiah to be determined totally by the market and float freely.

On the day the floating exchange rate was enacted, August 14th 1997, the Jakarta Composite Index only lost a few points in value, as most investors had foreseen the change in policy. Probably due to the previous stability of Indonesia, most market analysts and research arms did not realize that the value of the rupiah would continue to drop. The policy provided a catalyst for an accelerated drop in value as the Jakarta Composite Index experienced a decline from 643.01 on August 14th to 479.01 on September 2nd.

While other variables had an impact, there was one major reason for the inability of forecasters to measure the impact the value of the Rupiah had on the economy. In the years leading up to the crisis, Indonesian corporations and banks had enjoyed immense success as large amounts of foreign investment flowed into the country. As these corporations grew in size, both in capital and scope, the government continued to deregulate towards foreign investment, and the value of the rupiah began to strengthen. This was allowed under the trading band, and created an incentive to borrow United States dollars. Companies took full advantage of this incentive, able to decrease debt levels and finance projects at a lower cost (Hill, 1998).

Due to massive and probably dangerous borrowing, the balance sheets of Indonesia's major and often vital corporations were devastated once the rupiah began to crash. Even as the value of the rupiah continued to plunge, corporations were forced to continue to sell the rupiah in order to meet obligations made in U.S. dollars. This further undermined the market rate of the rupiah.

Capital flight and the currency devaluation had a vast impact, reaching far beyond these corporations as the economic effects were trickled down to consumers and commodity prices.

After the two week slide in financial market value after free-floating the currency, the negative trend began to subside both in financial markets and in the general economy as well. The government under Suharto sought to get the economy back on track during the month of September through several ambitious measures.

The first measure was to restructure the banking sector, cancel various government projects, and to support major banks with cheap loans and liquidity from the government (Pangestu, 2003, 10). This coincided with three separate cuts in the government's debt. While this stabilized (actually seeing a one day gain of 54 points on September 5th) the market index for the months of September and October (as investors approved of the measures taken), the value of the rupiah continued to fall.

As its currency nosedived, Indonesia had no choice but to turn to the International Monetary Fund (IMF) in order to save the nation from defaulting, an event that would surely lead to economic devastation throughout Indonesia's islands. Rumors surfaced that Indonesia was negotiating with the IMF, and a deal was formally announced on November 1st, 1997. The deal included a moderately flexible loan package (that finally reached $40 billion) and Indonesia agreed to far-reaching, comprehensive reforms towards free-market values, including closing sixteen banks.

The public announcement of the deal began a drastic decline in the value of the Jakarta Composite Index. Before the IMF announcement, the variation of the adjusted JKI value in September and October had been 974.03, with closing levels actually increasing from 485.97 to 500.42, never closing below 472.05. In the months of November and December, the index experienced a massive variation of 1448.149, at one point dropping to 335.69 on December 15th.

It is clear that foreign and domestic investors alike feared for the long-term growth of the country, selling off assets, even at major losses.

While the IMF is extremely necessary and its practices have been generally viewed positively by the mainstream (especially in recent years), investors feared and disapproved of the IMF intervention for several reasons. The most obvious is the concessions that IMF forces countries to make (as previously mentioned) in terms of reforms regarding banking systems and financial markets. These reforms are not always beneficial to the actual country (at least at the time), but rather the global financial market as a whole as the nation in question is opened up for increased foreign investment and intervention.

Any reforms will most likely have a negative effect on assets in the short term. Another reason for fear is that it still does not guarantee that the struggling nation will not default on payments. Finally, the IMF often requires severe devaluation, affecting asset prices and generally influencing the financial fabric of the troubled state negatively.

The IMF loans staved off any further catastrophe as the reforms were slowly put into place. On January 8th, 1998 however, President Suharto released his state budget plan (PBS, 1999). Not only was the budget extremely unrealistic, but it did not even adhere to the reforms that the IMF had demanded and Suharto had formally agreed to. Instantly the value of the JKI nosedived to an all time low, and the Jakarta Composite Index lost 46 points of value in one day.

Investors vehemently disapproved of the new state budget not only because it didn’t provide a path out of the financial crisis or help Indonesia’s economic situation, but also for the blatant fact that it wasn’t even legal under the signed IMF agreement. This clearly hurt the valuation of Indonesian assets as it was apparent that Suharto had no considerable grip on the situation. Losing confidence in a nation’s (in this case, ultimate) leader has a devastating impact on assets within the nation's borders (especially in a time of crisis). It is made clear the person in control of the country's direction and future is detached, meaning the current situation will probably not improve without change in policies or leadership.

Within the same week, the IMF rejected Suharto's state budget and forced the dictator to reiterate his commitment to reforms by postponing fifteen major "government-subsidized projects [in order to]…help cut expenditures and foreign debt" (PBS, 1999). It was soon revealed that the majority of these projects were directly linked to Suharto family members. The depth and severity of crony capitalism and nepotism further damaged investor confidence.

A week later Suharto signed another IMF formal agreement and loan deal to immediately remove all state subsidies and break established and recognized monopolies. Immediately the price of food rose nearly eighty percent, coinciding with another nosedive of the rupiah. Massive panic and buying spread throughout Indonesia. The trading day saw nearly a twenty-point drop in the Jakarta composite index, the severity (as compared to previous events) diminished for two reasons. Investors had already foreseen this would soon happen as it was a common IMF action. The other reason is simply that values had already diminished to such a low level, and would not decrease further quickly. Still, it was approximately a four percent loss in value, in only a single day of trading.

The index stabilized throughout January and the beginning of February with no large variations except for January 28th. On this day, Indonesia reached an agreement to reschedule debts in Korea (Bloomberg, 1998). The agreement had an extremely positive impact on investor confidence (before at an all-time low), as investors now believed Indonesia had a reasonable chance of negotiating better terms for bilateral loan agreements. The announcement saw an astonishing 28 percent rise in the valuation of the rupiah.

Better repayment terms are comparable to receiving bilateral loans. Investors favorably view bilateral loans exponentially over IMF loan packages because other states do not demand controversial reforms or measures. While interest rates are usually slightly higher, it also demonstrates that another country has enough faith in the struggling nation that it will eventually repay its loans.

Once again the Jakarta Composite Index stagnated around the 500 point level, coinciding with a continually weak rupiah. President Suharto attempted to create a spark for growth by firing the Governor of Bank Indonesia J. Soedradjad Djiwandono (Richburg, 1998). The attempt had no significant effect on markets as investors saw it as a clear political ploy, and confidence in Suharto's leadership continued to wane.

Financial markets and the rupiah continued to stagnate, showing no real growth into the month of March. On the 9th, the IMF announced that it was delaying a three billion dollar portion of the greater loan package due to Suharto's reluctance to enact the reforms he agreed to and impeding various other changes. While investors have an unfavorable view of IMF loans, the agreement was already in place and investors would not view opposition favorably. The stoppage of some payments only increased the crisis of confidence around Suharto's leadership and the nation's economy, especially when the dictator claimed the reforms were "unconstitutional," only a few months after he agreed to them. The day saw more than a 25 point drop in the Jakarta Composite Index as investors reacted.

While superficially it may seem that Suharto was simply failing in his leadership and actions, part of his apparent irrational behavior can be explained by his political position and his attempt to save face. By actively fighting and arguing with the IMF over every individual agreement, Suharto sought to paint the IMF as a villain seeking to harm the economic prosperity of the Indonesian people. This attempt was to create a smoke screen that would divert attention away from Suharto's ineptitude in the hope that the citizenry would focus on his sharp rhetoric against the IMF, which was charged with racism and neo-colonialism. This guise was marginally successful, and due to the global criticism of the IMF's policies at the time (and in hindsight), may have been justified. For the time being, this quelled opposition in the general population, but as mentioned earlier, Suharto's ruling coalition and general power was not based on a referendum of the people.

The military elite continued to see their assets and wealth dwindle, along with the power it afforded them. By 1998, Suharto had ruled over Indonesia for more than thirty-two years and the Army's top leadership, which possessed the ability to overthrow their dictator, now began to weigh its options. The rift between Suharto and the IMF lasted until April 8th, the third agreement in six months. Suharto did gain a minor victory by negotiating with the IMF to abandon demands of completely abolishing fuel and food subsidies (Gupta, 2000). On the other hand, Suharto was forced to close even more banks, as more had become insolvent.

By this time, the financial market had stagnated, centering around the low five hundred level. Since this was the third compromise in the last sixth months, investors had easily foreseen the endgame, and had entered this factor into asset value calculations. Furthermore, Suharto's attempt to delay and disrupt IMF reforms had also proven that cronyism and corruption would still be a major factor during Suharto's reign, as banks owned by relatives received special support by Suharto during negotiations with the IMF (Fried, 1998).

Reports emerged that unrest was beginning to appear and intensify on the main islands, even spreading to the more minor cities and towns (Spencer, 15A, 1998). Although there is not enough variation in valuation to prove causation, the financial market did drop from 508.16 on

April 20th to 414.62 on May 6th, possibly due to financial markets reacting to and predicting civil unrest.

The catalyst needed to drive widespread turmoil was the shooting of peaceful student protesters by Indonesian troops on May 12th (Head, 1998). This quickly sparked a full week of protests, and drove the JKI from 430.53 on May 12th to a low of 384.1 on May 18th. Throughout modern finance, civil unrest has had an extremely negative impact on financial markets. Civil unrest causes instability in everything from trade to property rights. This makes the future of a country extremely unclear and precarious, and scares off investors in the process. This paper will not focus largely on the protests, as it is a clearly accepted phenomenon that civil unrest has a devastating impact on financial markets. Also, it is optimal for the best interests of both leaders and the country's elite be to avoid civil unrest if possible.

Student protests spread throughout the country. Suharto attempted to placate demonstrators by promising new elections, but students rejected all proposals. Suharto's allies began to call for his resignation. The military began to split over support, resulting in General Wiranto telling Suharto that he no longer had the support of the army (Bourchier, 1998). On May 21st, 1998, General Suharto stepped down, replaced by his Vice President, Habibie. The JKI saw a one day rise from an opening 426.32 to 445.14 on the Monday following the announcement.

In the end, the nature of Habibie's rule did not vary much from Suharto's. The IMF continued to enact reforms, resulting in another agreement focusing on bank reform. At first financial markets remained stagnant, until reports of audits and stress tests began to trickle out. Banks were in an even worse condition then once thought. By the end of 1998, total bank capital had reached negative 245 trillion rupiah. Four state banks were forced to merge in October 1998 (Adams, 1999, 156), coinciding with the Jakarta Composite index lowest point in the last five years, nearly reaching a horrendous low of 250 towards the end of September and the first half of October.

During the crisis, the currency had lost nearly seventy percent of its original valuation (Yahoo! Finance). This certainly affected inflation which rose sixty to seventy percent during the same time, partly due to civil unrest and IMF reforms (especially food and fuel subsidies), which surely affected the currency in turn. From 1999, the rupiah regained its stability and the reforms that had at first devastated Indonesia slowly began to benefit it. Financial markets responded in kind, rising from 256.83 on September 21st, 1998 to 676.92 on the last trading day of 1999. (Yahoo! Finance, 2010).

Suharto severely failed in various policy areas during the 1997 Asian Financial Crisis. From abandoning any pegged currency rate during the beginning stages of a rampant crisis and leaving already weak banks and financial markets at the mercy of speculators, while extending corruption and negligence when even at the mercy of the IMF, Suharto bumbled all policy options. These failures were so monumental that they were able to devastate Suharto's thirty year rule and force him to give up power many thought would never be relinquished in his lifetime.

Singapore

As opposed to Indonesia, Singapore took a much more passive role regarding government intervention in financial markets, similar to Hong Kong. While passive in financial market intervention, Singapore did take an extremely active role in managing other aspects of the economy, most notably policies regarding the relative value of the Singapore Dollar.

Singapore is one of the leading examples of technocratic rule. While it is officially a democratic republic, the ruling party has never enjoyed less than a two-thirds majority rule in parliament. This has allowed for the governing parliament to make long-term policy decisions without the inefficiency of negotiation or the need to compromise with other viewpoints. While Singapore has significant problems regarding human rights violations and the democratic process, it has had success in several other areas. One bright spot has been the financial system. Due to its size and lack of natural resources or manufacturing power, Singapore was forced to embrace Western powers and quickly became a financial center in Asia, transforming itself into a near microcosm of the West.

Since its inception, Singapore's leadership has actively preached four powerful foundations for its financial system: maintenance of strong economic fundamentals, including a healthy banking system, a managed exchange rate system, an adjustable wage system able to quickly respond, and controls on bank lending made with the Singapore dollar (Kee Jin, 8, 2000).

The fundamentals needed to weather the crisis were extremely basic. Singapore maintained low foreign debt, enormous exchange resources, regular budget surpluses, low inflation, and high foreign investment (Kee Jin, 2000, 9), especially from the West.

Management of currency has been a recurring theme noticeable in the last two cases. In Singapore's case, the government used a managed exchange rate system. While most currencies in the developing world are pegged to one specific currency, usually the United States Dollar, Singapore's leadership took a different course. The Monetary Authority of Singapore (MAS) actively manages the Singapore dollar on a group of various currencies, weighted by the amount of trade the originator of the currency carries out with Singapore (Kee Jin, 2000, 10). Because of its abstract nature with no real market value, it is also known as the nominal effective exchange rate (NEER).

Currencies that require strong government interaction are often very slow to react. Overvaluation opens up the economy to harmful speculative attacks while undervaluation leads to massive borrowing, spending, and eventual inflation. The MAS would allow the NEER to float freely at times, but often intervened in order to negate the effect that large fluctuations in foreign currencies could have on the Singapore Dollar. After a few instances of overvaluation and slow growth in the 1980's, Singapore had learned several lessons after experiencing a number of speculative attacks. Singapore had initiated a strong active, independent, and nearly constant management of the currency. The hybrid nature of Singapore's currency management system allowed it to enjoy the benefits of a strong, tradable currency that the West took full advantage of, while still being able to protect its financial centers if necessary.

Furthermore, the trading band of the Singapore Dollar under the guidance of the MAS was undisclosed (Kee Jin, 2000, 10). This created a rare phenomenon of uncertainty that was actually positive to the nation, as speculators could not manipulate the system as they had in Hong Kong.

Instead of one specific instance of devaluing the Singapore Dollar in order to keep it competitive overseas (from which most of Singapore's revenue originated), the Singapore government expertly guided the dollar to a gradual twenty percent depreciation (Reuters, 2009). This was heralded as a major success by the international community, as the gradual and smooth manner in which the Singapore government conducted the depreciation allowed for a relatively stable (and short) recession (Kee Jin, 2000, 15). Because it was gradual, it is nearly impossible to see the direct effect it had on the stock market, due to the other inputs that would affect prices during the many weeks of depreciation.

Besides active and diligent management of currency, another important fundamental that allowed Singapore to insulate itself somewhat from the crisis was a healthy banking system. Even by international standards, and tremendously by South-East Asian standards, Singaporean banks had strong capital budgets. Again learning lessons from the 1980's, capital requirements were already at sixteen percent in 1996 before an additional increase by the government in order to stave off bank runs and failures that had plagued neighboring economies.

Singapore banks were even able to enjoy some profits at the height of the crisis in 1998. While other banks in the region closed and required government or IMF intervention, Singapore's local banks survived by limiting global assets and surviving domestic devaluation through already strong balance sheets (Kee Jin, 2000, 9). While the guided depreciation of the Singapore dollar was probably the most significant action taken by the government, the announcement of other noteworthy programs had a direct effect on financial markets, and can be specifically studied.

Due to Singapore's strong and extensive fundamentals, the city-state braved 1997 extremely well. The chain reaction of Thailand's devaluation and floating currency had spread throughout the region, but Singapore looked extremely strong, practically immune to any of the immediate effects. Unfortunately, these strong fundamentals sometimes led to a form of ignorance in policy making. While Singapore's fundamentals were still extremely strong, its trading partners were not as lucky. Due to the nature of Singapore's economy, let alone its size, it was extremely dependent on foreign neighbors for trade in all its forms, from manufacturing and services to simply financial assets. While Singapore itself was successful, the region's status began to take its toll on Singapore and led to some policy-making missteps.

The Singapore budget for the 1998 fiscal year was announced and released on February 27, 1998 (Desai, 1998). Due to Singapore's status as a financial hub and center for the region, the financial elite were and continue to be extremely knowledgeable of the entire region. Knowing that other nations (Singapore's major trading partners) were in trouble, they knew the recession would soon hit Singapore without strong government intervention. Instead of action, the 1998 budget released was extremely prudent and "clearly underestimated the crisis" (Tan, 1999, 7).

Even with enormous reserves, the budget actually contained a projected surplus of more than seven billion dollars (Tan, 1999, 7). The Strait Times Index (STI) had declined from the beginning of 1997, but had done so smoothly with no distinct shocks. The market showed no distinct selloff or devaluation specifically on the 27th, but did begin a six trading-day decline from one of the highest values in two months (1615.4) to 1538.7. While by no means totally accounting for the slide, the ability of investment firms to digest and adjust their models presumably led to at least part of this decline.

On June 1st of 1998, Richard Hu, the Minister of Finance, spoke to parliament on the current economic condition of Singapore. Hu predictably lowered the forecasts for Singapore's growth through the end of the year, and also stated that the government would step in with measures if it was found necessary (Desai, 1998). He did not disclose what measures would be made (though a deputy prime minister did state that public works spending would be at the forefront of any measure) (Tan, 1999, 7), or at what level of growth or decline measures would be necessitated.

On the other hand, he angered financial investors when he made clear through these statements that there would be absolutely no immediate stimulus action taken by the government.

Viewed as yet another failure of the government (while very successful in other areas) to act in a proactive, coordinated manner, markets instantly began to decline. June 1st saw a twenty point drop as the STI saw a quickened six day plunge before returning to the steady decline it had been experiencing for months.

The Singapore government soon realized its mistake as the economy, along with financial markets, continued to rapidly decline. Before the end of June, the government unveiled a two billion (Singapore) dollar off-budget, pseudo-stimulus package. The budget contained three broad objectives: to reduce business costs, strengthen economic infrastructure, and stabilize specific markets including the highly volatile property market (Kee Jin, 2000, 16). The last objective was deemed the most important and vital as rapidly declining property prices were obliterating local banks' balance sheets, pushing many towards bankruptcy.

The package was released on June 30th, 1998 by Finance Minister Hu and was met favorably by the financial establishment. The day itself did not see any increase in STI valuation, but it did begin one of the few five day spans of positive average growth of the prior three months. Unfortunately, stresses from neighboring countries, the global market in general, and the stagnating city-state itself forced financial markets to begin to decline.

October, 21st 1998 saw a direct attempt at placating financial markets as the Corporate Finance Committee of the MAS issued securities market final recommendations (MAS). While the recommendation language is filled with rhetoric on efficiency, transparency, and disclosure, the most impactful recommendations (soon to become law) were the plans to further liberalize or deregulate financial markets. This included increased derivative trading and softening rules regarding currency and other financial instruments. The changes attempt to evolve the national market into a doppelganger of Western financial markets (namely the United States).

Softening rules regarding regulation can be extremely dangerous in the long term (as best illustrated in the recent 2007 financial crisis), but it will obviously do a brilliant job in making financial markets appear healthier for profits and investment, therefore increasing asset valuation. The day's announcement saw a nearly thirty point boost in the STI, one of the largest in the past few months.

The Singapore government continued to make moves in order to stimulate the economy, while also keeping the government's budget sheet intact and ensuring domestic businesses were still competitive in the general region.

On November 11th, 1998, a "government-linked committee" announced measures to cut businesses costs by billions (Associated Press, 1998, 11). The move sought to reduce corporate costs by about fifteen percent annually in order to ease hardship caused by the economic downturn. Furthermore, though parliament still had to discuss the measures, it was universally expected that the government would implement most if not all of the measures recommended (The Nation, 1998, 11).

Not a day later, the government addressed wages and labor costs as well. As mentioned earlier, Singapore had an adjustable wage system already in place. The National Wages Council (NWC), made up of employers, unions, and government, set "non-mandatory annual wage guidelines in the light of external market pressures and domestic inflationary concerns" (Kee Jin, 2000, 10). The public and private sectors had historically followed these guidelines rather closely. The public sector had adopted a more flexible wage scheme after the crises of the 1980's, which allowed for short-term change, while the private sector still had relatively sticky wages and required time for change (usually year-end bonuses, contribution rates, etc.).

On November 12, the day after business cuts were advocated, the NWC recommended five to eight percent cuts in wages to "reduce business costs and restore its competitive edge" (New Sunday Times, 1998, 18). These cuts coincided with cuts in the Central Provident Fund (pension) and sought to decrease overall wage costs by fifteen percent. Obviously this created a pro-business environment and financial markets responded.

The 11th saw massive increases in the STI as the index opened at 1172.9 and closed at 1246.82. This was one of the largest single trading day gains in nearly a month and one of the largest of the year. The market approved of measures taken as workers' wages were cut, allowing larger profits, or at least the ability to survive, for businesses and corporations throughout Singapore and any business operating in Singapore. November 12th saw a slight decrease in STI valuation, presumably due to announcements merely agreeing with government measures rather than conducting large policy change, and the self-correcting phenomenon of the market after such a large gain from the day before.

Finally, on February 23rd, 1999, the Singapore government released the budget for the 1999 Fiscal Year. As opposed to the 1998 budget, this package contained more expansionary fiscal policy in order to combat the negative effects of the regional crisis, and included long term spending in strategic areas such as infrastructure and education (Kee Jin, 2000, 17). Many critics pointed out that this budget came too late. The crisis had started nearly twenty months before, and the Singaporean economy, including financial markets, was already showing strong signs of recovery (Tan, 1999, 8). The budget most likely did stimulate the recovery through personal rebates and tax exemptions (many targeting the bond market), but the government did receive a large amount of criticism for moving extremely slowly and making reactive policies rather than preemptive ones.

The Singapore government was a highly technocratic and fundamentally sound government and economy which for the most part managed to stave off the worst of crisis. Leadership decided to never intervene in financial markets, allowing the STI to drop nearly sixty percent during the crisis. Fortunately, this luxury and faith that financial markets would soon bounce back was afforded due to Singapore's extremely strong economic fundamentals, mechanisms already in place after lessons learned from the 1980's, and transparency (or lack of it) when necessary.

It can be argued that Singapore policymakers made mistakes in handling the crises, but it should be noted that almost all of the economic shocks affecting Singapore were regional. The city-state's worst flaw was the unavoidable fate of being within the same region as the origin of the crisis, and for creating strong trading ties with neighbors that were essential and probably extremely necessary for survival and growth.

One could say that Singapore's ability to benefit from the West rather than be manipulated by it was primarily because prior to the crisis it was fully integrated into Western markets, rather than merely a pawn of natural and financial resources, such as Indonesia. While Singapore could have made some interventions in financial markets, it made the needed policy moves towards budgets, businesses, and financial mechanisms when necessary.

Evaluations and Lessons Learned

By observing the effects of policies on financial markets in the three nations of Hong Kong, Indonesia, and Singapore, one can begin to analyze the shortcomings and success in these various countries. Also, one can begin to conclude what actions similar nations should take when experiencing similar situations and find it necessary to placate or steady financial markets.

In analyzing specific actions and their effects on stock markets, this paper may have presumed too direct a correlation. The problems with this type of analysis are clear. But the relative amount of volatility and change in financial market indices directly coinciding with strong policy moves and action are undeniable.

Even when any independent source looks at the data a different way (looking at financial market trends and identifying specific time lapses of extreme volatility and valuation change), it is apparent that under the efficient market theory, the indices are reacting. Furthermore, when global events, as well as private events, are identified and accounted for only policy actions can explain an inconsistency or deviation from the general trend of a longer term.

Through these mechanisms, one can be fairly confident that policy actions implemented and announced are having a direct influence on markets. By analyzing the direction markets take, one will be able to paint a larger picture of the best actions one can take in order to keep capital and steady investment within a country's borders. Obviously not every nation is capable of these actions as they often require large amounts of capital reserves and certain measures already in place. That being said, a developing nation will unquestionably experience a similar shock or financial crisis in the future and plan ahead.

Many tools are available to individual countries when combating the effects of a regional crisis or shock in a financial market. These can range from financial market structures and currency policies to the very makeup of a state's government. The following are conclusions that can be made regarding individual types of action, based on analyzing the three developing, authoritarian-type nations discussed in this paper.

One of the most important policy matters that affected every nation, including every market, is anything regarding currency status. Almost all developing countries have their currencies pegged to a foreign one (usually the United States Dollar) in one way or another. Based on the evidence shown in this paper, it is clear that rather than pegging one's nation's currency to a single foreign currency (as in the case of Indonesia), it is much more prudent and desirable to peg it to a basket of currencies, weighted by the amount of trade done with said nation.

Pegging to one currency, especially one thousands of miles away such as the United States, can lead to disaster. A regional crisis in South-East Asia will not affect the United States in the same way it will affect Indonesia. The disparity in how trade, currencies, and every facet of the global economy will be affected creates problems with currency, sometimes forcing governments to make drastic decisions.

Maintaining a currency system such as Singapore's requires constant diligence and a well-oiled bureaucracy in order to constantly make changes. Obviously this type of bureaucracy and expertise is not always available in a developing nation, but in any government, especially an authoritarian one, it should be one of the chief concerns.

As mentioned, disparity in currency can lead to drastic decisions. As seen in Indonesia (and Thailand), governments chose (and were somewhat forced) to give up any fixed or pegged currency and let the currency float freely, totally dictated by the free market. This led to disaster in both cases, and the evidence dictates that while governments can adjust and devalue currencies during a crisis, they must defend the rates they set at all costs. Realizing currency mechanisms, this usually requires large amounts of capital.

This leads to another lesson learned from the evidence. It is extremely important for a developing nation to hold massive amounts of foreign reserves. Extremely common in South-East Asian governments, it allows a government to adjust pegs and rates through global market mechanisms, rather than strictly dictating exchange rates. Strictly dictating often leads to massive problems of black markets and unofficial money changers, as seen in Myanmar and various African countries. One realizes that it is not always possible for a developing nation to hold foreign reserves as it does take money away from citizens, but merely having the ability to intervene creates a large amount of stability not only in currency markets, but in the economy as a whole as well.

In regards to currency, a government must also look after vital corporations at home. The largest company or bank in one country filing bankruptcy can have a devastating effect on a national economy. Companies and banks of this size usually run into bankruptcy due to currency or lending decisions. This can be averted through capital requirements, as well as dictating how much capital can be borrowed in a foreign currency. Many Indonesian companies and banks watched as their balance sheets were destroyed after borrowing in United States Dollars once the rupiah was drastically devalued.

Governments must also ensure that as many businesses survive as possible and make sure their long-term profitability stays positive. This means creating a pro-business environment, at least during the crisis. As demonstrated, especially in Singapore, cutting wages and cutting overall costs to businesses instantly raised the valuation of stocks and bonds. While this is extremely beneficial during a time of crisis or a deep recession, it is also important to identify where these benefits are coming from. If a pro-business environment is created through cutting wages and various public services (on the back of the working class), the government must return to the status quo, or compensate after the country returns to regular growth. It is vital that governments realize these sudden and far-reaching measures are used purely as a stimulus.

Businesses and banks are essential during times of crisis, but only looking out for their best interest in the long term fosters inequality and volatility as workers are harmed.

Another quick but dangerous fix is relaxing financial market regulations. As observed, especially in Singapore, allowing more leeway in terms of financial mechanisms, currency, and borrowing instantly increases financial valuation as banks and trading houses believe they will make a greater profit. In Singapore's instance, they were merely attempting to mirror Western trading. Unfortunately, massive deregulation and allowing mechanisms that lack disclosure can eventually lead to devastating effects (especially if enacted too soon in a developing country) as seen in the recent financial crisis. Governments can open up financial markets, but must stay vigilant in ensuring trading does not put the country in a compromising position.

Another aspect could be viewed as one of the simplest: strong rhetoric. Often, nations do not provide a large or coordinated message to investors: both foreign and domestic. Transparency of government actions can be extremely important in quelling the fears of investors for the long-term progress of the nation. By providing clarity, for example, that the currency will stay pegged or will not be devalued, rumors of these actions (which can take a massive toll on valuations, as seen in Hong Kong) would be squashed.

One obvious lesson is to avoid IMF loans at all costs. While the IMF has demanded far less drastic reforms recently, they can still have an extremely negative effect on the economy and therefore financial markets. Countries are not always able or strong enough to withstand the reforms often demanded from global organizations such as the IMF. Bilateral trades are much more beneficial as they do not demand far-reaching reforms, and they demonstrate to investors that another nation has faith that the borrowing country will one day repay. It may sometimes be difficult to find a lender, as loans often come from major trading partners, and chances are trading partners will be hit by the same crisis the troubled state is in. Nevertheless, all measures should be explored and taken as the IMF should be a last resort.

Another phenomenon, also seen in Hong Kong, is to vehemently defend markets against speculators. Coordinated attacks by investment banks and hedge funds can have a disastrous effect on financial markets, and therefore the economy as capital markets dry up. Governments and regulators must take a strong stance against speculation and short-selling as it can artificially lower asset prices, sometimes permanently destroying them.

Countries can defend against speculation by levying requirements in the financial markets in times of vulnerability. This creates a paradox against deregulating financial markets in order to boost asset prices. A government must identify the vulnerability of markets, and identify to what degree they can be deregulated or regulated further. Singapore was strong enough to withstand any short-term attack, and therefore had the luxury of deregulating.

Hong Kong, on the other hand, attempted to fight speculators by buying assets and using interest rate mechanisms. Ultimately Hong Kong's government failed because it did not take a strong or forceful enough stance, and was defeated by its own transparency as banks and funds were able to identify the way government financial mechanisms would react, as it was open information.

While transparency is important for nurturing an economy in crisis, it can also be hurtful in some areas and situations. One of the reasons Singapore was so successful in currency policy was that they never disclosed the trading band for the Singapore Dollar. This allowed the MAS to regulate the national currency without any organization or group of organizations being able to manipulate it purely for profit.

Limiting transparency is not always an option in an open government, and for this reason, a level of authoritarianism is often useful. While an authoritarian type of government may not be viable in the long term, it can be useful in a time of financial crisis within a developing country and its region. In a time of crisis, governments should be preemptive, not reactive. Authoritarian governments, besides being able to limit transparency, allow for strict, efficient decisions and actions, sidestepping the slow-moving bureaucracy that is common in open governments.

Authoritarian governments often eventually lead to nepotism and corruption. Besides being extremely inefficient, and therefore detrimental to a national economy, corruption and nepotism can lead to a loss of confidence in a leader, as cases are often uncovered in a time of recession or crisis. As seen in Indonesia, this was devastating to the national leader, as well as the general economy as a whole.

While these actions and recommendations are by no means universal, they do provide a substantial template for what actions should be taken by developing countries in times of financial crisis. Capital is essential for a surviving and growing economy, and is almost always tied to or immersed in financial markets. By being able to stop the decline in assets and assuage fears through these proposals, developing countries can hope to avoid economic devastation and harm to the citizenry that a crisis may levy if left unchecked.

Conclusion

The Asian Financial Crisis of 1997 was extremely devastating to the South-East Asian region. Wreaking havoc on economies and financial markets alike, it extracted a considerable toll on the hard-working citizens of each country. Only by studying past events such as these, can other developing countries, in Asia or otherwise, begin to comprehend how to identify a crisis early and react to it sufficiently.

Capital is essential for developing countries in crisis to survive. For better or for worse, this capital is tied up in major financial markets. Governments must take care to protect and nurture financial markets from the brink and back to health. The foundations and fundamentals of a nation will always command overall events as a developing nation enters a crisis, but this paper provides an analysis and hopeful blueprint in how to keep losses to a minimum through financial markets.

Many forces and phenomena attack developing nations in times of financial challenges, crises, and epidemics. Only by understanding these forces can we hope to stabilize the economy and ultimate populace from prolonged poverty and economic degradation.

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