Rising Inflation: Lessons from India's response to rising inflation in recent history

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***Abstract*: This paper examined inflation, its causes, and, as a case study, the reason for the year 2008 inflation rate increase and India's response to combating the same. From the year 2000 until the end of 2007, India's inflation rate remained relatively stable between 5 and 7 percent. Although the Reserve Bank of India had set a target inflation rate of 4.11 percent for 2008, the inflation rate skyrocketed, shocking everyone. Recent inflation rate growth has kept India's central bank, RBI, on edge. This article examines the dynamics of inflation, the reason for its sudden rise, and India's response to containing inflation. Speculation in the markets, a lack of food products, a rise in global prices, and an overabundance of money are discussed as some of the major causes of India's rising inflation rate. We also discuss the inflation of 2022, which is caused by a variety of factors, such as supply chain disruptions caused by the Covid-19 pandemic and the Russia-Ukraine war.**

***Keywords:* inflation, India, economic crisis, WPI, CPI, crude oil, supply-chain disruptions, Russia-Ukraine war**

I. INTRODUCTION

In simple terms, inflation is the increase in the price level of goods, resulting in a decline in the purchasing power of currency. Inflation occurs when the demand for goods exceeds the supply of goods in the economy. We are aware that prices fluctuate whenever the demand and supply equation is altered. When there is sufficient supply to meet demand, prices fall, and when there is insufficient supply to meet demand, prices rise. Inflation can also occur when the market is flush with cash. When a country is flush with cash or paper currency, commodity prices are bound to rise. The third type of inflation is known as "imported inflation." This occurs when the price of goods is not determined by domestic demand and equation, nor is there an excess of cash on the market; rather, the price increase is solely attributable to the price increase of imported goods.

Inflation in India has become a sudden concern since 2008, when the country experienced a sudden increase in its inflation rate. In 1992, one kilogramme of pulses could be purchased for only six rupees. Now, one kilogramme of pulses at the local supermarket costs up to one hundred rupees. What then has changed? Simply put, the Rupee now buys significantly less than it did twenty years ago. Consider another scenario: a person works for company A, and the company decides to increase his salary by 10 percent due to his excellent performance. Now, if the same year's inflation rate is 10 percent, this individual has likely lost everything that your salary increase gave him. Even though he received a 10 percent raise, his money still buys the same amount of goods as it did last year due to 10 percent inflation. Inflation has eroded his hard work, which earned him a raise.

From 2000 to the end of 2007, the average rate of inflation in India remained relatively stable between 5 and 7 percent. However, since February 2008, it has risen sharply. The Reserve Bank of India had set an inflation target of 4.11 percent for 2008, but the inflation rate soared unexpectedly high. No matter what the government did or how hard it tried to tame inflation, it was futile. Inflation in the early 1990s and before was primarily caused by domestic factors, whereas imports dominated inflation in 2008.

The purpose of this paper is to examine inflation, its causes, and, as a case study, the reason for 2008's rise in inflation rate and India's response to it.

According to McLure et al. (1990), inflation destroys the premise that money is stable, which is the foundation of traditional accounting. In such a scenario, historical values recorded in accounting records become heterogeneous amounts measured in various units. The use of such data under traditional accounting methods without prior correction is illogical and yields meaningless results. Steady inflation, which is the steady and sustained increase in the price level, is a relatively benign phenomenon because expectations tend to incorporate it (Friedman, 1963; Roger, 1998). However, inflation that occurs in spurts poses a threat to the economy because it is less predictable (Friedman, 1963). Inflation is classified into four tiers based on the annual percentage rate of price increase. Inflation between 2 and 4 percent is referred to as "creeping inflation." If it falls between 5 and 10 percent, it is termed "trotting inflation." However, alarm bells will sound if the inflation rate rises above 10 percent. This phenomenon is known as "galloping inflation" (Haberler, 1958; Silaski & Durovic, 2010). When the inflation rate exceeds 20 percent, it is referred to as hyperinflation (Kiguel, 1989). An economy may experience accelerating inflation for a long or short period of time. If inflation returns to normal levels, a nation can breathe a sigh of relief. However, if it remains in this range for an extended period, the government and its central bank must take drastic action to control inflation. Hyperinflation has the potential to severely disrupt an economy. In the early 1920s, Germany experienced unimaginable levels of hyperinflation (Rowley, 1994). People who had saved their entire lives' earnings suddenly discovered that their savings were so worthless that they could not even afford a month's supply of bread. Recent years have been difficult for Zimbabwe, as its inflation rate has reached a staggering 165,000 percent year-over-year (Hanke, 2008).

Inflation can be caused by a variety of factors, including 'demand pull inflation,' which occurs when there is more demand for a product but not enough supply to meet the demand, 'cost-push inflation,' which occurs when there is an increase in production costs due to wages and profits of entrepreneurs, 'monetary inflation,' which occurs when there is an excessive supply of money, 'structural inflation,' which is caused by the government's monetary policy, and "global inflation" occurs when the cost of foreign commodities imported into a country rises. (Argy, 1970; Bryan & Pike, 1991; Lipsky, 2008; Machlup, 1960). There are also "disinflation," "deflation," "reflation," and "stagflation." (Eijffinger, 2009). As Japan witnessed in the 1990s, deflation is a dangerous phenomenon. In this situation, commodity prices decline, but so do employment opportunities and the national economy as a whole. The opposite of inflation is deflation. Deflation is one of the ways to combat inflation. In this scenario, job losses could be halted and the economy could return to normal.

II. CASE OF INFLATION IN INDIA

The research utilises time-series inflation data (WPI) from 2000 to 2011 compiled from the nic.in website (http://www.eaindustry.nic.in/). Simple statistical analysis, such as the mean and standard deviation, have been applied to these data to determine the year-over-year change in the inflation rate. The author then discusses subjectively a number of possible causes of inflation, including crude oil prices, population growth, and price increases for agricultural commodities.

In August of 2008, inflation approached 11 percent (see Table 1). The Indian government was already operating on all cylinders to combat inflation. In a country like India, where nearly half of the population lives below the poverty line, inflation functions as a tax on the poor.

In India, inflation is determined by using the Wholesale Price Index, or WPI. The prices of 435 commodities at the producer level are collected and compiled weekly in this instance. The Consumer Price Index is followed by most other nations, including developed nations (CPI). This is the cost borne by consumers. In the case of India, the WPI does not accurately reflect actual consumer inflation. Consumers ultimately pay a significantly higher price. Economists believe that India must switch to the CPI in order to calculate inflation. Consumer-level commodity prices have increased by close to 40 percent over the past year. For instance, the cost of cooking gas has increased significantly. Some agricultural commodities have not increased in price to the same extent

Table 1: Inflation Rate (WPI): 2000 -2012 (source: investing.com).

Year	Jan	Feb	Mar	Apr	May	Jun	Jul	Aug	Sep	Oct	Nov	Dec	Mean	Std Dev
2012	7.23	7.56	7.69	7.23	7.55								7.45	0.21
2011	9.47	9.54	9.68	9.74	9.56	9.51	9.36	9.78	10	9.87	9.46	7.74	9.48	0.58
2010	8.68	9.65	10.36	10.88	10.48	10.25	9.98	8.87	8.98	9.08	8.2	9.45	9.57	0.83
2009	5.87	3.61	1.65	1.21	1.45	-0.39	-0.31	0.54	1.4	1.79	4.73	7.15	2.39	2.42
2008	4.54	5.68	7.71	7.86	8.2	10.89	<u>11.15</u>	<u>11.12</u>	10.78	10.66	8.65	6.68	8.66	2.28
2007	6.64	6.63	6.72	6.22	5.52	4.46	4.42	4.04	3.39	3.19	3.73	4.01	4.91	1.35
2006	4.36	4.45	4.24	4.97	6.05	6.8	6.54	7.11	6.96	6.93	6.73	6.96	6.01	1.15
2005	4.87	4.33	4.64	5.33	4.59	4.68	4.84	3.48	4.38	4.67	3.94	4.38	4.51	0.47
2004	6.5	6.14	4.78	4.51	4.86	5.12	6.14	7.46	6.19	6.1	6.46	5.47	5.81	0.87
2003	4.22	5.35	5.99	6.65	6.51	5.34	4.71	3.95	4.9	5.13	5.42	5.74	5.33	0.83
2002	1.51	1.39	1.76	1.5	1.56	2.43	2.79	3.34	3.53	3.08	3.39	3.34	2.47	0.87
2001	8.7	8.33	6.42	5.41	5.6	5.3	5.23	5.41	4.52	2.91	2.59	2.08	5.21	2.05
2000	3.55	3.54	5.58	6.53	6.3	6.56	6.54	6.09	6.47	7.49	7.62	8.49	6.23	1.47

The United States consumes nearly one-third of the world's products, goods, and commodities. Consequently, it could be considered the "centre" of global consumption. Whatever good or bad occurs in the United States has global repercussions. The classic example is the 2008 economic recession in the United States, which was precipitated by a credit crunch (Mizen, 2008). Whenever the DOW Industrial Average declines, global markets also decline. With a growing fear of repercussions from the U.S. recession, world markets were falling as if they had no bottom. Countries such as China and Japan have artificially devalued their currency to make their goods cheaper in the United States, thereby bringing more dollars to their country. This dollar is reinvested in the United States to purchase assets and treasury bonds. Thus, in a sense, the United States has outsourced the protection of its currency to these nations. Nations whose export models are centred on the United States cannot help but defend the dollar, as a decline in its value will inevitably harm their economy and currency as well. Economies are hedging against the impending decline of the U.S. dollar on the commodities market. There are therefore both psychological and technical aspects to maintaining the value of the US dollar.

The prices of commodities have increased gradually over the past year, but by roughly 40 percent in the past year alone. The rising cost of goods is putting a significant strain on everyone's finances, especially the poor. On the markets, there is an excessive amount of speculation that cannot be justified by the fundamentals. In July 2008, the price of crude oil experienced a sharp increase. At one point, it reached approximately $150 per barrel (July 2008). Even the Organization of the Petroleum Exporting Countries (OPEC) stated that it does not understand why the price of oil is increasing when demand has not increased proportionally.

Unreasonable price increases result from speculative activity. Traders and investors simply believe there will be an excessive demand for oil, and with a predicted oil shortage in the next 30 to 40 years, they engage in relentless buying at the bourses, driving up prices. However, due to the possibility of a U.S. recession, oil prices have fallen below US$70 per barrel once more.

Crude Oil

A rise in the price of crude oil could wreak havoc on nations that do not export oil, such as India. Early in 2008, when the price of crude oil began to rise, commodity prices followed suit. In fact, it posed an existential threat to the ruling government. Why is Crude Oil so essential? From agriculture to the operation of industries to transportation, oil is utilised. It even powers our kitchen appliances and home heating systems. Consequently, a slight increase in the price of oil causes most commodity prices to rise. Oil is subsidised by the government in India, despite taking a massive hit due to the recent fuel price increase. When the government increased the price of gasoline by only 10 percent, there was widespread outrage. In recent years, India's political system has not been especially robust. The ruling political party, the UPA, is actually a coalition of parties with opposing views on the vast majority of issues. When the government increased oil prices, one of the major parties that supported it from the outside withdrew its support. The government nearly fell due to this. In India, elections are scheduled to occur every five years; however, if mid-term elections are forced upon the populace, it could result in additional government expenditures of several billion rupees, leading to higher prices for goods.

Population

India and China are two of the world's most populous nations, accounting for nearly 40 percent of the global population between them. These two nations have been experiencing a phenomenal growth rate. It is estimated that even a 200-dollar increase in the per capita income of these two nations would add an additional $500 billion to the global market. This cash must be spent. This expenditure would result in increased commodity demand and subsequently higher prices. With the growing populations of the BRIC countries consuming more resources each year, it is highly probable that higher inflation rates will persist for a considerable time. Each nation desires growth, but not at the expense of inflation. Indeed, inflation is a complex and difficult problem for governments to manage.

III. RISE IN THE COSTS OF AGRICULTURAL PRODUCTS

Agricultural commodities are becoming scarce. In 2006, the United States diverted approximately 20% of its maize production to oil production. Similarly, Brazil converted fifty percent of its sugarcane harvest to biofuel production. European Union even imported vegetable oil for Biofuel production.

Biofuel is less expensive than petroleum. Nonetheless, they remove a resource that could have been used to satisfy people's dietary requirements. The increase in agricultural prices raises the price of industrial goods, resulting in a rise in the inflation rate (Patnaik, 1975).

India's central bank has been adjusting interest rates in accordance with reported inflation. A rise in interest rates contributes to the market's loss of capital. India is eliminating import duties on a variety of goods, which will assist in meeting domestic demand. This has again aided in containing inflation to some degree. India has also endeavoured to maintain the lowest possible interest rate differential. If a person is receiving less interest in money kept in a bank in the United States or Europe, he will attempt to keep his money in a country that provides a higher return on investment. In India, the annual rate of return has been 7 percent, whereas it is much lower in the United States. Inflation is caused by an abundance of currency. In October 2007, India prohibited the use of PNotes on the stock market to prevent an excessive influx of capital. However, to prevent inflation, India must also consider implementing the family planning programme strictly. More mouths to feed would increase product demand and inflation. The family planning programme in India has been moving very slowly and has not reached the rural population. This must be approached with a military-like mentality.

The majority of India's current inflation problems are a result of a fragmented monetary policy. When inflation is a problem, the government's sole concern is how to control it. However, focusing solely on controlling inflation will not solve the problem. Government efforts must be made to strengthen its monetary policy. India's currency has become increasingly pegged to the U.S. dollar. This peg must be broken, as was done between June and July of 2007, when the Rupee appreciated significantly (close to 9 percent). In addition to controlling inflation, the RBI is currently tasked with a number of other duties. Rewriting the RBI Act would help stabilise inflation while maintaining a healthy growth rate. Breaking the dollar's peg would prevent an influx of excessive funds into the country. With its massive population, India cannot afford soaring inflation. In a global economy that is constantly shifting, it is imperative that India keep a close eye on inflation and do everything possible to fine-tune its monetary policy. India must exert significant effort to maintain an annual growth rate of 8 percent (the average over the past five years) and to keep inflation within the 4 percent range. Although daunting, the task is not impossible.

What it means to the inflation in 2022

The globe was already reeling from supply-chain interruptions caused by the Covid-19 outbreak when the Russia-Ukraine war compounded the crisis in February of this year

There is a relationship between freight rates and inflation. When freight rates double, inflation rises by 0.7 percentage points. Most nations in the globalized world are interwoven into global supply networks. Therefore, nations that import more products are more likely to experience inflation than nations that import fewer. It is quite likely that inflationary pressure will remain until the end of 2022 due to the uncertainty caused by the epidemic as well as the prolongation of the conflict in Europe. The central bankers who are coping with inflation and a slowing economy will have to make difficult choices because of this.

For the most part, stable inflation, which refers to a long-term rise in prices, is a benign phenomenon. An example of this may be found in the well-known Philips curve, which shows that inflation and unemployment are linked inversely. Nevertheless, sudden spikes in inflation pose a threat to the economy since they are less predictable.

Consumer prices have risen significantly since before the epidemic, according to a Pew Research Center analysis of data from 44 nations with the highest and lowest rates of inflation.

Crude oil is a major economic input. As a result, rising crude oil prices have a direct effect on inflation and economic growth in countries that import oil. One example is Sri Lanka. Its inflation in June 2022 has gone through the roof, putting the island country in the middle of its worst economic crisis since it became independent in 1948. The nation has stopped selling fuel for two weeks, except for what is needed for essential services, because the country's fuel reserves are so low that they won't even last a few days.

Due to the geographical separation between the ASEAN region and Europe, some people in ASEAN believed that the war in Europe would not immediately have a major impact on the region. Recent reports, however, show that inflation in the ASEAN region jumped by about 1.5 percentage points from April to May. ASEAN and EU have a long history of trade and cooperation. If the battle continues, a slowdown or recession in the EU would cause collateral damage to the ASEAN area in the form of decreased FDI flows, exports, and growth.

However, while the situation is still under control, measures must be done to prevent inflation from spiraling out of control. If the cost of living goes up even more, the situation will be much worse, and it could lead to unrest among the public.

IV. CONCLUSIONS

The majority of India's current inflation problems in 2008 were a result of a fragmented monetary policy. When inflation is a problem, the government's sole concern is how to control it. However, focusing solely on controlling inflation will not solve the problem. Government efforts must be made to strengthen its monetary policy. India's currency has become increasingly pegged to the U.S. dollar. This peg must be broken, as was done between June and July of 2007, when the Rupee appreciated significantly (close to 9 percent). In addition to controlling inflation, the RBI was tasked with a number of other responsibilities. Breaking the dollar's peg would prevent an influx of excessive funds into the country. With its massive population, India cannot afford soaring inflation. In a global economy that is constantly shifting, it is imperative that India keep a close eye on inflation and do everything possible to fine-tune its monetary policy. India must exert significant effort to maintain an annual growth rate of 7 to 8 percent (the average over the past five years) and to keep inflation within the 4 percent range. Although daunting, the task is not impossible.

Lastly, we wish that both the COVID-19 epidemic and the Ukraine-Russia conflict come to an end or at least become less worrisome than they are currently. This will stabilise supply networks throughout the world. In the meanwhile, central banks may need to implement monetary policies, such as gradual interest rate increases, to combat inflation without triggering a recession. Rising interest rates are costly for the economy, but they have traditionally been effective at reducing inflation.

REFERENCES

[1] Argy, V. (1970). Structural inflation in developing countries. Oxford economic papers, 22(1), 73-85.

[2] Bryan, M. F., & Pike, C. J. (1991). Median price changes: an alternative approach to measuring current monetary inflation. Federal Reserve Bank of Cleveland Economic Commentary, 1.

[3] Eijffinger, S. (2009). Deflation or stagflation in the Eurozone? VoxEU. org, 15.

[4] Friedman, M. (1963). Inflation: Causes and consequences. Asia Publishing House.

[5] Haberler, G. (1958). Brief Comments on the Recession: I. The Review of Economics and Statistics, 309-311.

[6] Hanke, S. (2008). From Hyperinflation to Growth, Centre for Global Liberty and Prosperity. Development Policy Analysis: Washington: CATO.

[7] Kiguel, M. A. (1989). Budget deficits, stability, and the monetary dynamics of hyperinflation. Journal of Money, Credit and Banking, 21(2), 148-157.

[8] Lipsky, J. (2008). Commodity prices and global inflation. New York: Council on Foreign Relations.

[9] Machlup, F. (1960). Another view of cost-push and demand-pull inflation. The Review of Economics and Statistics, 125-139.

[10] McLure, C. E., Dell, S., Mutti, J., Zodrow, G. R., & Thuronyi, V. (1990). The taxation of income from business and capital in Colombia. Duke University Press.

[11] Mizen, P. (2008). The credit crunch of 2007-2008: a discussion of the background, market reactions, and policy responses. Federal Reserve Bank of St. Louis Review, 90(September/October 2008).

[12] Patnaik, P. (1975). Current inflation in India. Social Scientist, 22-42.

[13] Roger, S. (1998). Core inflation: concepts, uses and measurement. Reserve Bank of New Zealand Discussion Paper(G98/9).

[14] Rowley, E. E. (1994). Hyperinflation in Germany: Perceptions of a Process. Scolar Press.

[15] Silaski, N., & Durovic, T. (2010). Catching the inflation by the tail. Ibérica(20), 57-80.