

Economics of Money, Banking and Finance Task

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Introduction: Background, Aims, and Objectives

After the financial crisis of 2008, the economies across the globe suffered in varying patterns according to their prevailing frameworks. The effects of the crisis on countries and how they tackled the crisis were also dynamic across the world. Most countries adopted a tight monetary and fiscal policy after the crisis. Pakistan, being a developing country also adopted a tight monetary policy, but the patterns of policies and other financial indicators varied over the last few years (Ha & Kang, 2015). The aim of the report is to analyze the monetary policy of Pakistan after the recent financial crisis and see how it tackled the situation including issues like inflation, interest rate, unemployment, etc. The objectives are:

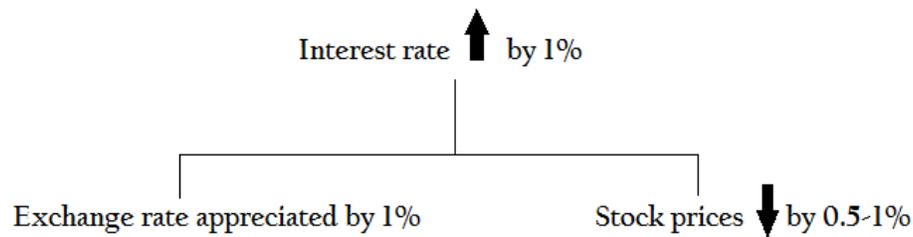
- To analyze the monetary policy of Pakistan post recent financial crisis.
- To monitor how the policy was designed to tackle the crisis.
- To draw a logical inference from the analysis and provide recommendations.

The report is divided into four major sections. The first section of the report includes a literature review about the topic; the studies that have already been conducted on the monetary policies after the recent financial crisis. The second section includes case studies while the fourth section provides analysis. The last section concludes the report and provides recommendations.

Literature Review

(Pennings, et al., 2015), reported in their study that monetary policy and its changes have a lot to do with the exchange and interest rate in the country. If the monetary policy is designed with at least 1% increase in the official interest rate, it results in the appreciation of exchange rate by approximately 1% and also reduces the stock prices by 0.5%-1%. But on the other hand, these changes are slightly less robust if there is a financial crisis but the effects still prevail.

Figure 1: Effects of Increase in Interest Rate



Source: (Pennings, et al., 2015).

Moreover, it was also reported that the effect of monetary policy modification during the financial crisis in the form of an increase in the interest rate has stronger effects on the economy and helps to tackle the crisis in OECD countries than in the non-OECD countries. The study although does not provide much information about the reasons of difference between OECD and non-OECD countries (Pennings, et al., 2015).

The financial crisis of 2008 stirred up a new debate among policy-makers and financial analysts that should the countries respond to the crisis and other major and minor financial shocks by bringing changes into the monetary policies or not? To answer the question, (Bailliu, et al., 2015), reported in their study that no matter how small the financial friction it is, it is always a rational reaction to go with the monetary policy changes because they can help the economy deal with the frictions and might also make the effects of the shocks less intense.

When it comes to the role of banks in financial crisis and monetary policies, they play a vital role in tackling the shocks generated due to the crisis. It is reported that the banks in Asia and the penetration of foreign banks in the region play a significant part in reducing the effect of the crisis and it is mentioned in a study that due to higher penetration of foreign banks, the host countries in Asia are less likely to get negatively affected by the crisis (Jeon & Wu, 2014).

The last financial crisis of 2008 affected several regions of the world including Europe, UK and USA. (Lothian, 2014), mentioned in his study that the financial crisis of 2008 affected the USA and European region to a major extent increasing the inflation and unemployment rate and

reducing the overall productivity of the economies. The study also presented and drew a logical inference about monetary policy changes during the crisis and mentioned that the inflation rate and output volatility are the two factors that move in the same direction. It implied that the idea that policy makers are in a tradeoff while forming the policies does not hold in real economies when it comes to financial crisis. The table below reports the real monetary base growth during and after the financial crisis. It is mentioned that after the financial crisis, the monetary base statistics dropped dramatically in all regions.

Table 1: Monetary Base During and After the Crisis - UK, US and Europe

	USA	UK	Euro Zone
2008-2009	43.37	51.15	19.83
2010-2011	12.75	5.97	11.91
2012-2013	17.06	30.35	-2.68

Source: (Lothian, 2014).

Only focusing on the UK, it is reported that after the financial crisis the Tylor rule broke down in the country after the crisis and is also significant. It is also reported that the monetary policy of the UK was mainly based on output rather than inflation like many other countries who gave much preference to inflation after the crisis (Martin & Milas, 2013). While analyzing the ECB monetary policy in Spain, (Ruiz, 2015), reported that the policy focused on reducing the interest rate had significant effects on the market before the crisis, while, after the crisis, the policy did not seem to affect the economy.

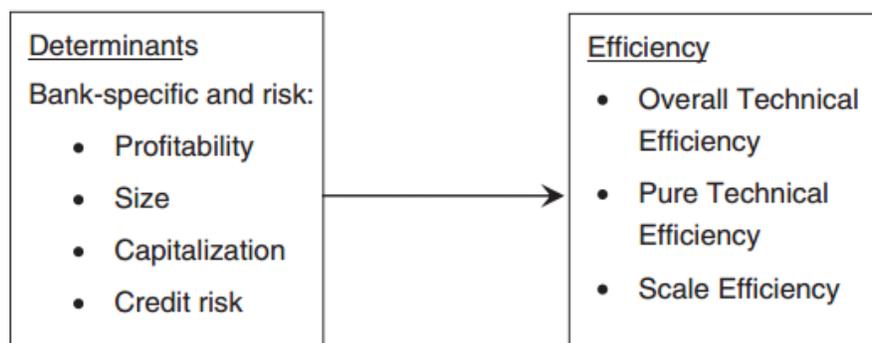
Case Studies

Several studies have been conducted so far on the monetary policy and its effects on the financial crisis. Some of them covering the developing world and Asia on the whole including Pakistan and several of them also focused on Pakistan only. This section of the report includes case studies on a broader scale and then narrow down to the case of Pakistan.

The Performance of Asian/Developing Economies

(Rosman, et al., 2014), mentioned in their study that during and after the financial crisis, the Islamic banks performed better than the conventional banks and their functionalities were more regulated during the crisis as compared to the crisis. Some analyst also suggested that the Islamic banking system should always be the plan B for the economies around the globe to tackle the unpredictable financial crisis. But the study reported some inefficiencies in the system. The figure below shows the determinants of efficiency in an Islamic banking system.

Figure 2: What is Bank Efficiency?



Source: (Rosman, et al., 2014).

The Case of Pakistan

(Zakir & Malik, 2013), mentioned in his study that the changes in the monetary policy of Pakistan are more effective when the output growth is slower in the economy and the effects of this policy are less effective in high growth time. If a tight monetary policy is adopted, the output is more likely to increase especially when there is a downward trend in the economy of Pakistan. While suggesting a monetary policy framework for Pakistan for a financial crisis, (Hassan, et al., 2011), suggested that the intervention of the central bank is always useful to stabilize the situation. Moreover, if the discount rate is reduced, a 4.97% reduction in money supply and increasing the discount rate can result in 3.14% increase in money supply can be observed but that might give a rise to inflation.

At the time of the crisis, macroeconomic stability by increasing the GDP growth to 6%, poverty reduction, fiscal retrenchment and external accounts were at the focal point of the monetary policy. The inflation, on the other hand, declined from 25.3% to 17.2%. From 2008-2009, the real GDP of Pakistan was 2% while the target was 4.5%. Inflation rate declined from 25.5% to 17.2% from 2008-2009. Between the two years, the money supply target was 9.3 but it increased by only 4.6% (Ministry of Finance, 2015).

In 2009, the real growth rate was 1.2% that increased in 2010 but the investment as a percentage of GDP declined from 19% to 16.6% while national saving increased to 13.8% in 2010. The interest rate was adjusted downwards from the financial crisis year 2008 to 2010 to 12.5%, and the inflation rate was 11.6%. The table below shows the Public sector debt dynamic of Pakistan from 2005-2010 (Embassy of Pakistan: Economic Division, 2010).

Figure 3: Public Sector Debt Dynamics 2005-2010

Year	GDP Deflator	Fiscal Balance	Primary Balance	Real Growth of Debt	Real Growth of Revenue	Debt Burden
FY05	7.7	- 3.3	- 1.3	- 1.7	5.7	- 7.3
FY06	7.0	- 4.3	- 2.3	- 0.1	12.6	- 12.8
FY07	10.5	- 4.3	- 1.5	- 0.3	10.1	- 10.4
FY08	16.2	- 7.6	- 2.8	9.7	- 0.7	10.4
FY09	20.3	- 5.2	- 0.3	1.4	3.1	- 1.8
FY10	10.1	- 5.1	- 0.5	2.1	6.3	- 4.3

Source: (Embassy of Pakistan: Economic Division, 2010).

Table 2: Macroeconomic Variables of Pakistan 2008-2014

	2008	2009	2010	2011	2012	2013	2014
GDP growth %	2	1.2	2.4	3.7	2.9	4.14	4.24
Inflation rate	17.2	11.6	14.1	10.8	7.7	8.7	4.8

Investment (% of GDP)	19.7	19	13.4	13.1	12.5	13.9	15.12
Savings (% of GDP)	14.4	13.3	13.8	10.7	13.5	12.9	14.5
Unemployment rate	5.5	5.6	6	6	6.24	6	-
Interest rate	15	12	14	13.5	12	10	7

Source: (Ministry of Finance, 2015).

In 2010-2011, the real GDP growth stood at 2.4%, investment and savings declined to 13.4% and 9.5% respectively, the inflation rate was 14.1%, and the unemployment rate was 5.6%. The interest rate was 14% (Ministry of Finance, 2010). After that, the real GDP growth rate was 3.7%, 2.9%, 4.14%, and 4.24% in 2011, 2012, 2013, and 2014 respectively. Table 2 summarizes the GDP growth, inflation rate, investment and savings in Pakistan from 2008-2014.

Analysis and Discussion

The effects of the financial crisis on Pakistani economy were significant, and the central bank of Pakistan adopted active strategies and monetary policies to alleviate the effects of the crisis. As the effects were widespread, rigorous policies were needed to deal with the situation. The main target of the monetary was to reduce the poverty, make sure that the foreign accounts are maintained on a regular basis, macroeconomic variables of the economy are stabilized after the shocks. The biggest fear at the time of the crisis was reduced output and productivity and the central bank also kept the fact in account that the middle and lower are most likely to get affected by the crisis (Ministry of Finance, 2015). After the sudden shock of the crisis, the economy started stabilizing after 2010, and the macroeconomic variable also started showing better numbers including inflation, unemployment, and output. The real GDP was also increasing that really helped to get out of the hurricane of the crisis. Although the credit condition of the economy was not very good and the economy also faced some investment, and saving problems,

but the issue started to resolve due to more focus on output (Embassy of Pakistan: Economic Division, 2010).

It is reported that the Islamic banking system and the sector that were dependent upon the system were less likely to get affected. Moreover, it is also reported that the crisis made inflation and output more interdependent than ever. In this case, the monetary policy was mainly targeted to keep the unemployment low as the labor force does not become futile and people contribute to the economy in some way to keep it rolling (Ministry of Finance, 2010). The crisis also helped to maintain a scrutiny of the monetary policy of Pakistan and the major transformation would not have been made in any other regular scenario. The crisis helped the policy maker to divert their focus from the government concerns to the common people in the form of stable employment rate and higher output projects (Nazeer, et al., 2015)

Conclusion

After the 2008 crisis, all countries including developing, underdeveloped and developed got affected made several transformations in their monetary policies to reduce the aftereffects. After the crisis, the main aim of the central bank of Pakistan was to target macroeconomic stabilization, poverty reduction, fiscal retrenchment and external accounts. After the crisis, real GDP growth increased while inflation declined and unemployed showed a constant trend. The interest rate also mainly decreased.

Recommendations

On the basis of above analysis, following recommendations are made to form an effective monetary policy especially in financial crisis:

- The monetary policy should not be as straight forward as going only by a rule or by discretion; modifications in the policy need to be made according to the intensity of the crisis and a combination of both should be acceptable (Piazzesi, 2014).
- The higher rate of foreign bank penetration into the Pakistani banking system can help reduce the possible future effects of crisis (Jeon & Wu, 2014).

- Islamic banking can a useful tool to tackle the financial crisis and uncertainties.
- The intervention from the central bank at the time of financial crisis can also be very effective to tackle the situation by increasing output (Erler, et al., 2015).
- Output and productivity focused monetary policy should be formed.

Bibliography

Bailliu, J., Meh, C. & Zhang, Y., 2015. Macroprudential Rules and Monetary Policy When Financial Frictions Matter. *Economic Modelling*, 50(6), pp. 148-161.

Embassy of Pakistan: Economic Division, 2010. *Highlights of the Economy: Fiscal Year 2009-2010*. [Online]

Available at:

<http://www.embassyofpakistanusa.org/forms/Highlight%20of%20Economy%202009-10.pdf>

[Accessed 6 November 2015].

Erler, A., Bauer, C. & Herz, B., 2015. To Intervene, or Not to Intervene: Monetary Policy and the Costs of Currency Crisis. *Journal of International Money and Finance*, 51(1), pp. 432-456.

Ha, E. & Kang, M.-K., 2015. Government Policy Responses to Financial Crises: Identifying Patterns and Policy Origins in Developing Countries. *World Development*, 68(2), pp. 264-281.

Hassan, Rubina & Shahzad, M., 2011. A Macroeconometric Framework for Monetary Policy Evaluation: A Case Study of Pakistan. *Economic Modelling*, 28(2), pp. 118-137.

Jeon, B. & Wu, J., 2014. The Role of Foreign Banks in Monetary Transmission: Evidence from Aisa durnig the Crisis of 2008-2009. *Pacific-Basin Finance Journal*, 29(6), pp. 90-120.

Lothian, J., 2014. Monetary Policy and the Twin Crisis. *Journal of International Money and Finance*, 49(2), pp. 197-210.

Martin, C. & Milas, C., 2013. Financial Crises and Monetary Policy: Evidence from the UK. *Journal of Financial Stability*, 9(4), pp. 654-661.

Ministry of Finance, 2010. *Highlights*. [Online]

Available at: http://www.finance.gov.pk/survey/chapter_11/highlights.pdf

[Accessed 6 November 2015].

Ministry of Finance, 2015. *Highlights of the Pakistan Economic Survey*. [Online]

Available at: http://www.finance.gov.pk/survey/chapters_15/Highlights.pdf

[Accessed 6 Novmber 2015].

Ministry of Finance, 2015. *Overview of the Economy*. [Online]

Available at: <http://www.finance.gov.pk/survey/chapters/overview09.pdf>

[Accessed 6 November 2015].

Nazeer, A., Shafi, K., Idrees, Z. & Hua, L., 2015. Impact of Financial Crisis on an Economy: Pakistan as a Case. *American Journal of Service Science and Management*, 2(2), pp. 14-17.

Pennings, S., Ramayandi, A. & Tang, H., 2015. The Impact of Monetary Policy on Financial Markets in Small Open Economies: More or Less Effective During the Global Financial Crisis. *Journal of Macroeconomics*, 44(3), pp. 60-70.

Piazzesi, M., 2014. Should the Monetary Policy Rule be Different in a Financial Crisis?. *Journal of Economic Dynamics & Control*, 49(4), pp. 18-20.

Rosman, R., Wahab, N. & Zainol, Z., 2014. Efficiency of Islamic Banks During the Financial Crisis: An Analysis of Middle Eastern and Asian Countries. *Pacific-Basin Finance Journal*, 28(2), pp. 76-90.

Ruiz, J., 2015. Response of Spanish Stock Market to ECB Monetary Policy During Financial Crisis. *The Spanish Review of Financial Economics*, 13(2), pp. 41-47.

Zakir, N. & Malik, W., 2013. Are the Effects of Monetary Policy on Output Asymmetric in Pakistan. *Economic Modelling*, 32(4), pp. 1-9.