

# Asian Bureau of Finance and Economic Research (ABFER)

## INTERNATIONAL MACROECONOMICS AND FINANCE, BANKING AND FINANCIAL REGULATIONS

May 20 - 21, NUS Business School Room 5-4

### **Comments on Understanding Bank Runs: Do Depositors Monitor Banks?**

**(Paper by Rajkamal Iyer, Manju Puri and Nicolas Ryan; Comments by Poonam Gupta)**

It is an interesting paper which analyzes the behaviour of depositors of an Indian bank during two distinct events. The first event was specific to the health of the bank and is called a “fundamental shock” in the paper. The second event was a shock to another bank, which did not impact the bank’s fundamentals, but nevertheless caused some pressure on deposits, and is called a “non fundamental shock” in the paper. The paper distinguishes between small and large depositors, by defining three size categories of deposits. The first category is for deposits up to Indian rupees (INR) 1000; the second category is for deposits between INR 1000 and 100,000, the latter being the maximum amount insured under the deposit insurance; and the third is for deposits larger than INR 100,000. The paper also looks at whether the staff of the bank behaved differently from the general depositors; and whether the depositors who had loans outstanding at the bank behaved differently from non borrowers.

The main findings of the paper are that the depositor behaviour is different during the fundamental and the non fundamental shock: depositors do not necessarily react to rumours, and in the non fundamental shock analyzed in the paper, there is little evidence of contagion in the banking industry. Large depositors with uninsured deposits withdraw more than the small depositors in response to a shock; and the bank staffs, who are perhaps privy to more accurate and timely information on the bank’s health, withdraw more than the uninformed depositors. Finally, the depositors with outstanding loans withdraw more sharply.

The policy messages of the paper are that the deposit runs/contagions can be avoided by providing better information on banks that are healthy; and by extending more comprehensive deposit guarantees.

My comments are given below under different heads.

#### **The Role of Interest Rates**

The paper does not incorporate the role of prices (interest rates) in deposit movements. A fundamental question is whether the bank responded to the negative impact on its deposits through an interest rate increase. Similarly, did the other banks with branches in the vicinity of the bank revise their interest rates to attract the depositors fleeing from the bank? Did the interest rate revisions differ for different types of depositors, and could perhaps explain their differential response? Did the revisions in interest rates differ during the fundamental and non fundamental shocks, and could it be the reason why the depositors’ behaviour varied across the two shocks?

## **Any Other Events Affecting the Deposit Flow**

Another important question is whether there were any other supply side factors that may explain the observed deposit movements? Was the experience of this bank isolated? Could there be something specific to the banking industry at that time which perhaps prompted a withdrawal from other banks as well. The authors could compare the deposits growth of the bank with the growth in comparable banks during this period to see whether the deposit withdrawal was more general.

Though not related to the question in hand, it would also be interesting to know where the depositors reallocated their savings. Did they flee to a nearby public bank; or to the State Bank of India, the largest public sector bank in India with the most extensive branch network; or to another private bank; or to another asset class? Eichengreen and Gupta (2013) show that depositors withdrew from private banks and reallocated their deposits to the State Bank of India during the 2008 global financial crisis. Is there any such evidence during the shocks studied here?

## **What Type of Depositors Withdrew**

Which depositors switched banks? Who was better at discriminating good banks from bad banks: government or private depositors or firms? The paper usefully distinguishes between deposits of different sizes. But this distinction could be enriched along the following lines.

First, often deposits with small balances, e.g. less than INR1000 in this case, are inactive deposits and unlikely to see any action. Hence these deposits could perhaps be dropped from the analysis. A second suggestion is to see whether the effect is non linear for deposits larger than INR 100,000; or to see whether there are any other thresholds in deposits over INR 100,000, above which the effect on deposit withdrawal is perhaps even sharper. If indeed this is the case what could be the reasons for it.

It would be useful to see whether, the effect differed for time deposits and savings deposits. It has been observed during the recent global financial crisis that the retail and wholesale depositors behaved differently to news. It would be useful to see whether that was the case for this bank as well.

## **The Role of Deposit Insurance**

The paper relates the sharper effect on deposits larger than INR 100,000 to the limit on deposit insurance of INR 100,000. However, a more robust way to establish the effect of deposit insurance on deposit withdrawals would be to conduct the regression discontinuity analysis and see whether the depositors who are otherwise similar, but hold deposits just below or just above the threshold of INR 100,000 behaved differently to bad news. Without a more robust methodology or without adequately incorporating other features of the various types of deposits, it is difficult to attribute the result to the limit on deposit insurance.

## **Other Plausible Explanations for Deposit Withdrawals**

The paper finds that the bank staff reacted more negatively to news than the general depositors. One obvious factor to which the paper alludes is that they were privy to information about the bank's health before the general depositors. I wonder whether there could be other reasons as well, e.g. was any downsizing carried out, or was being planned, at that time and if so, the staff may have left, or planned to leave, and take their deposit accounts with them. It would thus be interesting to see whether there were large scale account closures as well, especially by staff, after the shock.

The result in the paper that the depositors with outstanding loans reacted more negatively to the fundamental shock is a bit curious and I am trying to think of plausible explanations. One possibility is that perhaps the depositors with outstanding loans are also the ones with very large deposits. Perhaps once one looks for further threshold effects, be the effect of loan outstanding would weaken or disappear. Another plausible explanation could be that the debtors perhaps think that when the bank is in receivership they could far more easily default on their loans, but before doing so they shifted their

deposits out of the bank. It would be useful to analyze the quality of the loans of the depositors who retrenched during the fundamental shock.

### **More Information on the Bank**

Some more information on the bank would have been useful, to put the results in perspective. Some more information in the paper pertaining to the size of the bank; whether the bank's business is concentrated primarily in urban areas or does it have a rural reach as well; and more importantly whether it is a public or a private bank would be useful. The latter is a crucial distinction since public banks offer an implicit guarantee on their deposits, and usually do not face a run on deposits. It is not explicit in the paper, but it seems that the bank being analyzed here is perhaps a small private bank. It is not clear then to what extent the results obtained here can be generalized to the public sector banks or to the larger private banks.