Understanding Bank Runs: The Importance of Depositor-Bank Relationships and Networks

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Abstract

We use a unique, new, database to examine micro depositor level data for a bank that faced a run. We use minute-by-minute depositor withdrawal data to understand the role of social networks, the effectiveness of deposit insurance, the role of relationships and other factors in influencing depositor propensity to run. We employ methods from the epidemiology literature which examine how diseases spread to estimate transmission probabilities of depositors running, and the significant underlying factors. Our results suggest that social network effects are important but are mitigated by other factors, in particular the length and depth of the bank-depositor relationship. Depositors with longer relationships, and those who have availed of loans from a bank are less likely to run during a crisis, suggesting that cross-selling acts not just as a revenue generator but also as a complementary insurance mechanism for the bank. We further find that deposit insurance is only partially effective in preventing bank runs. Finally, we find long term effects of a bank crisis in that depositors who run do not return back to the bank. Our results help understand the underlying dynamics of bank runs and hold important policy implications.

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