The Global Financial Crisis

Module 7 Anxiety, Part 2

Andrew Metrick

Outline

Module 7

The Global Financial Crisis

Module 7 Anxiety, Part 2

01 Northern Rock: Narrative

Northern Rock

History

Northern Rock began in the nineteenth century as a mutually owned "building society", with a business focused on serving its local community.

The bank went public in 1997 and grew at an annual rate over 20 percent for the next ten years, with total assets of 113.5 billion pounds, the fifth largest U.K. bank by mortgage assets, as of June 2007.

Northern Rock focused on prime lending, had minimal subprime exposure, and the U.K. housing market remained strong in the summer of 2007.

But rapid growth starting in 1997 outstripped the traditional deposit base, and the bank had to rely on non-traditional funding sources.

Repo

2007

Over the summer of 2007, some of these non-traditional funding sources began to dry up, and efforts to organize a private rescue for the bank failed.

On 9/13/07, the BBC broke the news that Northern Rock had sought assistance from the Bank of England; the BoE granted that assistance the next morning. The run on retail-branch deposits began that day.

At the time of the run, full deposit insurance in the U.K. was capped at 2000 pounds, and then 90 percent up to 35,000 pounds.

Despite the public nature of the retail-branch run, the real story was a wholesale run that had intensified in the previous month.

Northern Rock

The Puzzle

"The real question raised by the Northern Rock episode is not so much why retail depositors are so prone to loss of confidence that lead to bank runs, but instead …

why sophisticated lenders who operate in the capital markets chose suddenly to deny lending to a bank that had an apparently solid asset book and virtually no subprime lending."

(Shin, p.102)

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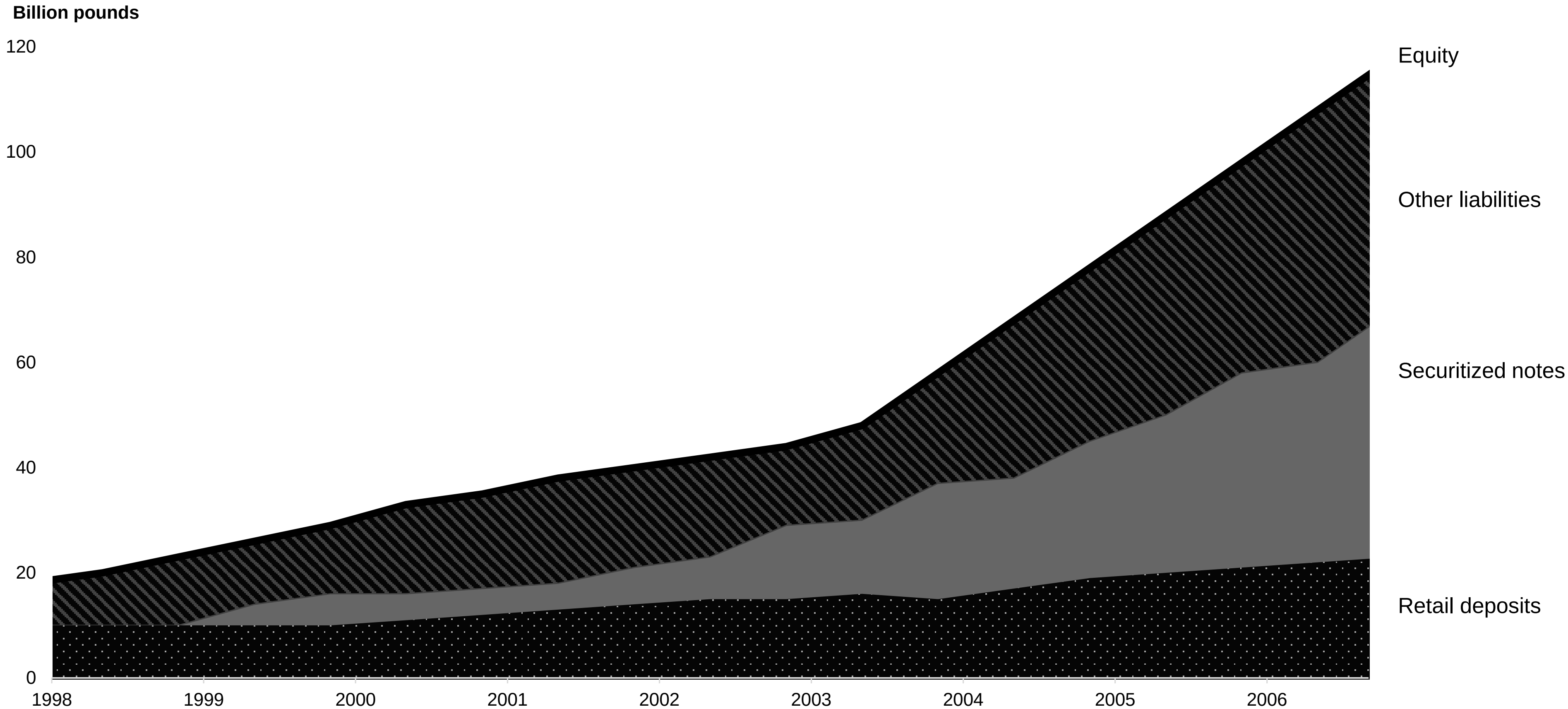
02 Northern Rock and the Global Financial Crisis

Northern Rock grew significantly, relying on wholesale and non-traditional funding

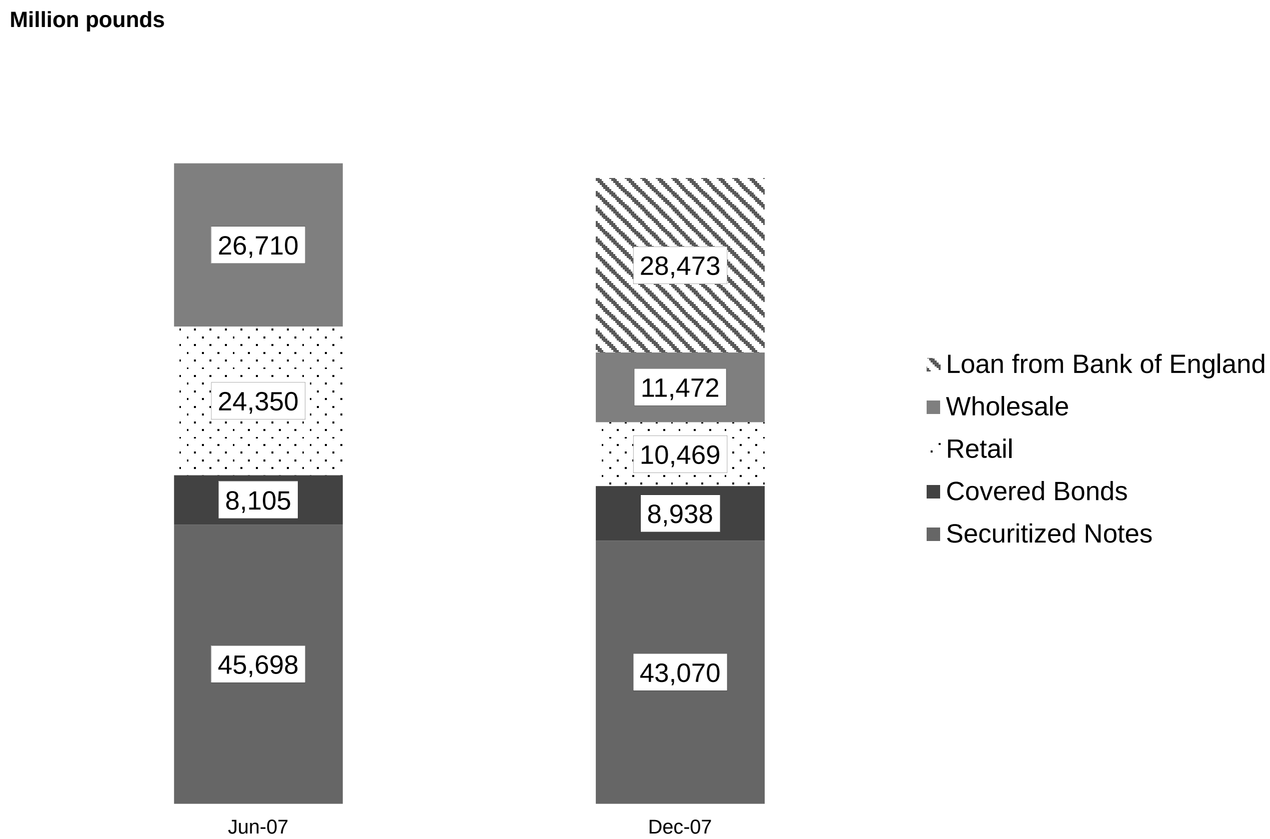
Composition of Northern Rock's Liabilities



Source: Shin, Hyun Song, 2009, Reflections on northern rock: The bank run that heralded the global financial crisis, The Journal of Economic Perspectives 101-120.

Wholesale funding ran first, then retail deposits

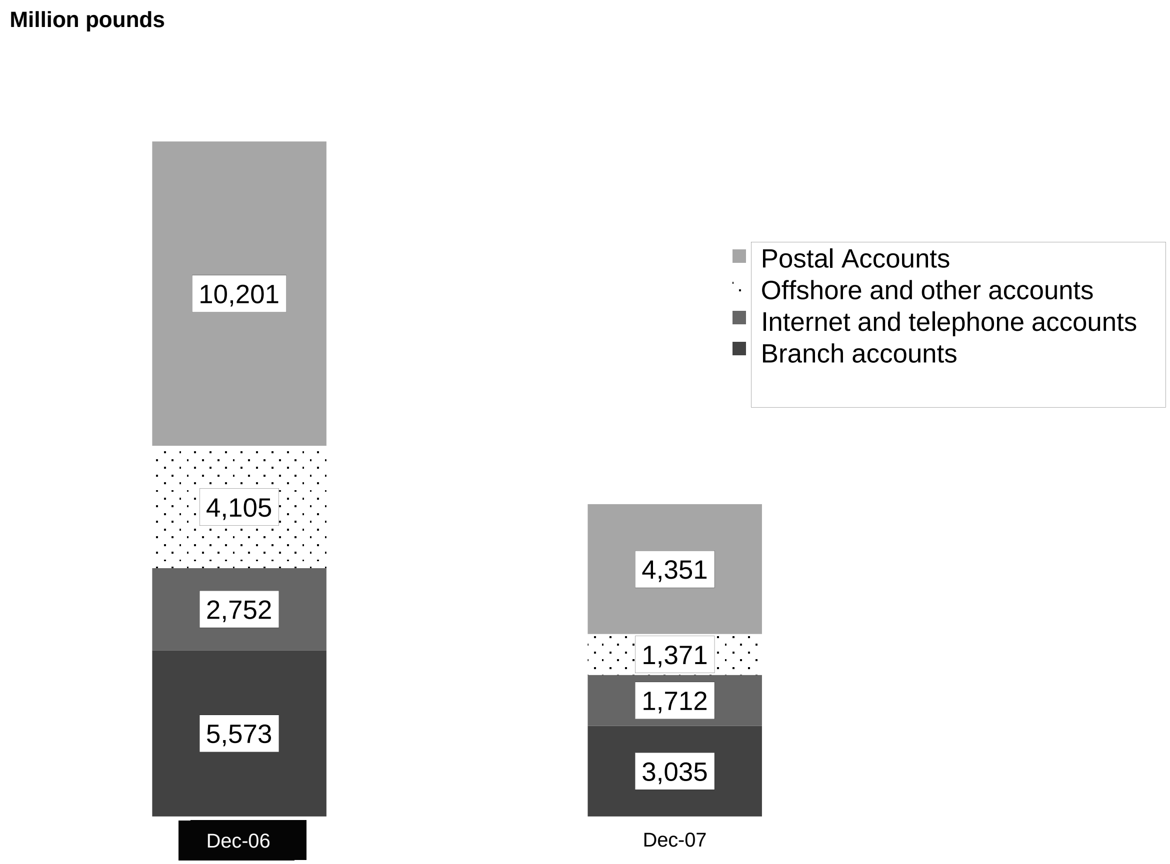
Composition of Northern Rock’s Liabilities Before and After the Run



Source: Shin, Hyun Song, 2009, Reflections on northern rock: The bank run that heralded the global financial crisis, The Journal of Economic Perspectives 101-120.

The retail run was <u>not</u> in traditional branch deposits;

Composition of Retail Deposits of Northern Rock Before and After the Run



Source: Shin, Hyun Song, 2009, Reflections on northern rock: The bank run that heralded the global financial crisis, The Journal of Economic Perspectives 101-120.

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03 The “Monolines”

The “Monolines”

Background

Since they began in the 1970s, bond insurers main business was to provide credit enhancement to municipal bond offerings.

This insurance was provided by specialized companies that do not sell other types of insurance products – hence the name “monolines”.

In the roaring 2000s, they expanded into insurance provision for structured products (securitizations and CDOs).

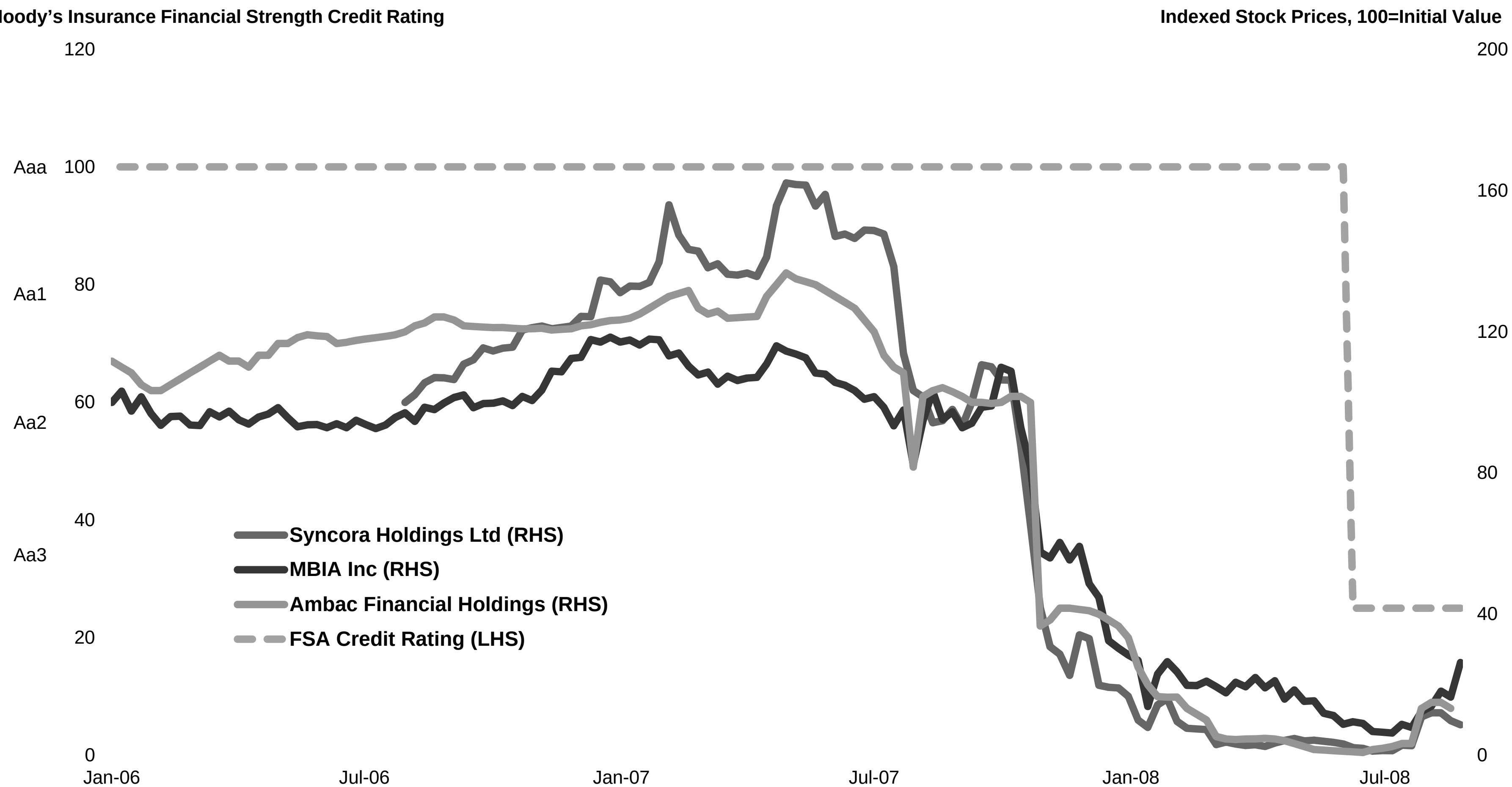
January 2008, MBIA and Ambac (the two largest insurers), had a combined $265 billion in structured-product guarantees.

Starting in mid-2007, the markets became worried about these insurers.

Source: FCIC, p. 276

The "Monolines"

Stock Prices and Credit Rating



Source: Bloomberg, Moody's.

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04 Auction Rate Securities

Auction Rate Securities

Background

The traditional way to sell securities is with a primary offering, followed by the management of a secondary market. For some types of securities, the secondary markets are so illiquid that investors are scared away.

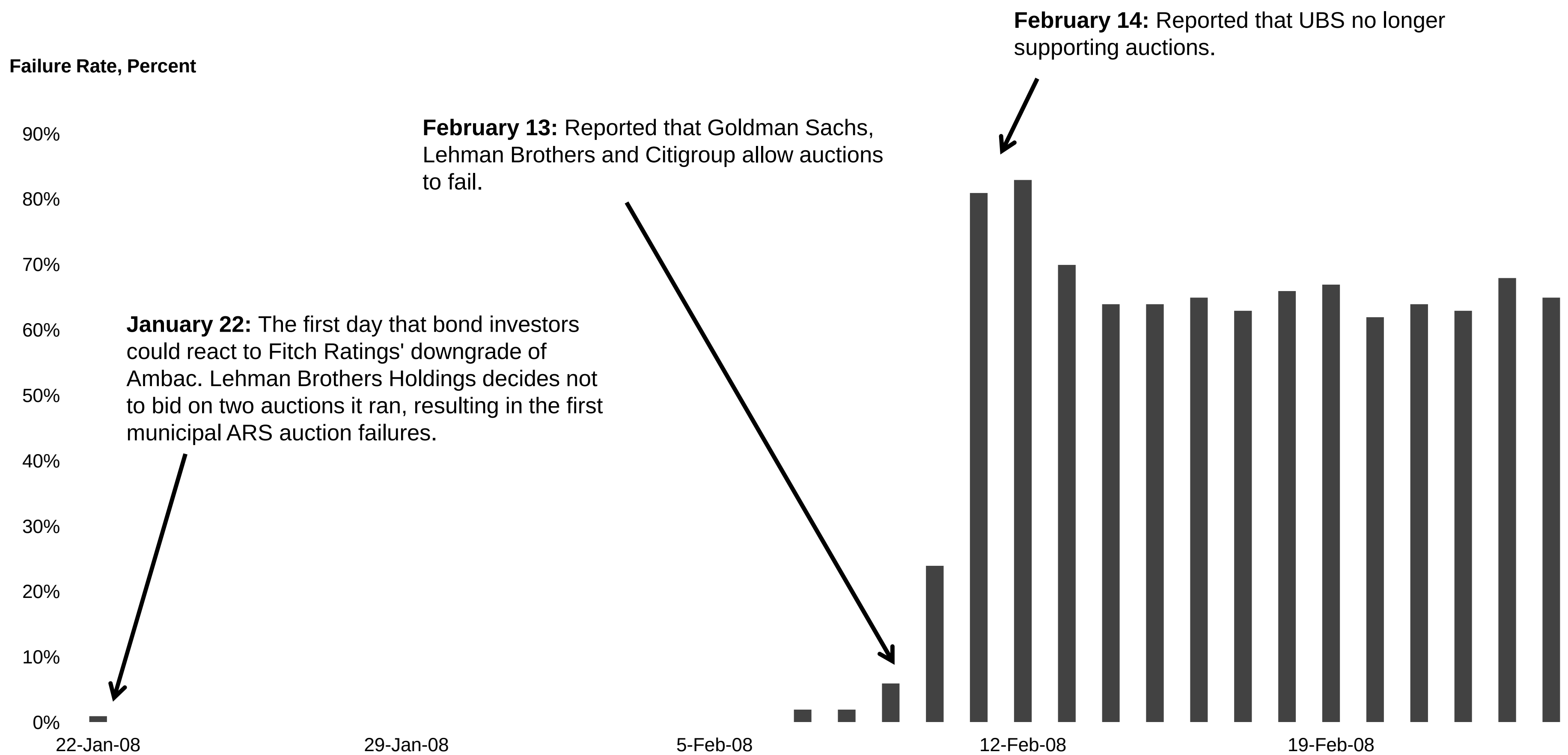
Auction rate securities (ARS) are a solution to this illiquidity, with a broker-dealer holding periodic auctions of long-term bonds to reset the interest rates based on demand.

Historically, broker-dealers reputational concerns meant that they provided a backstop to the market, holding paper to manage short-term liquidity disruptions.

ARS are used for a very quiet type of securities: mostly student-loan pools and municipals.

The municipal securities were given credit enhancement by the monolines … uh-oh.

Failures of US Municipal Auction Rate Securities



Source: Bloomberg, S&P.

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05 Bear Stearns, Part 1

Bear Stearns

In mid-2007, Bear Stearns was the fifth-largest investment bank in the United States, with assets of about $400 billion.

The firm was a significant player in all parts of the subprime space, from loan origination to trading.

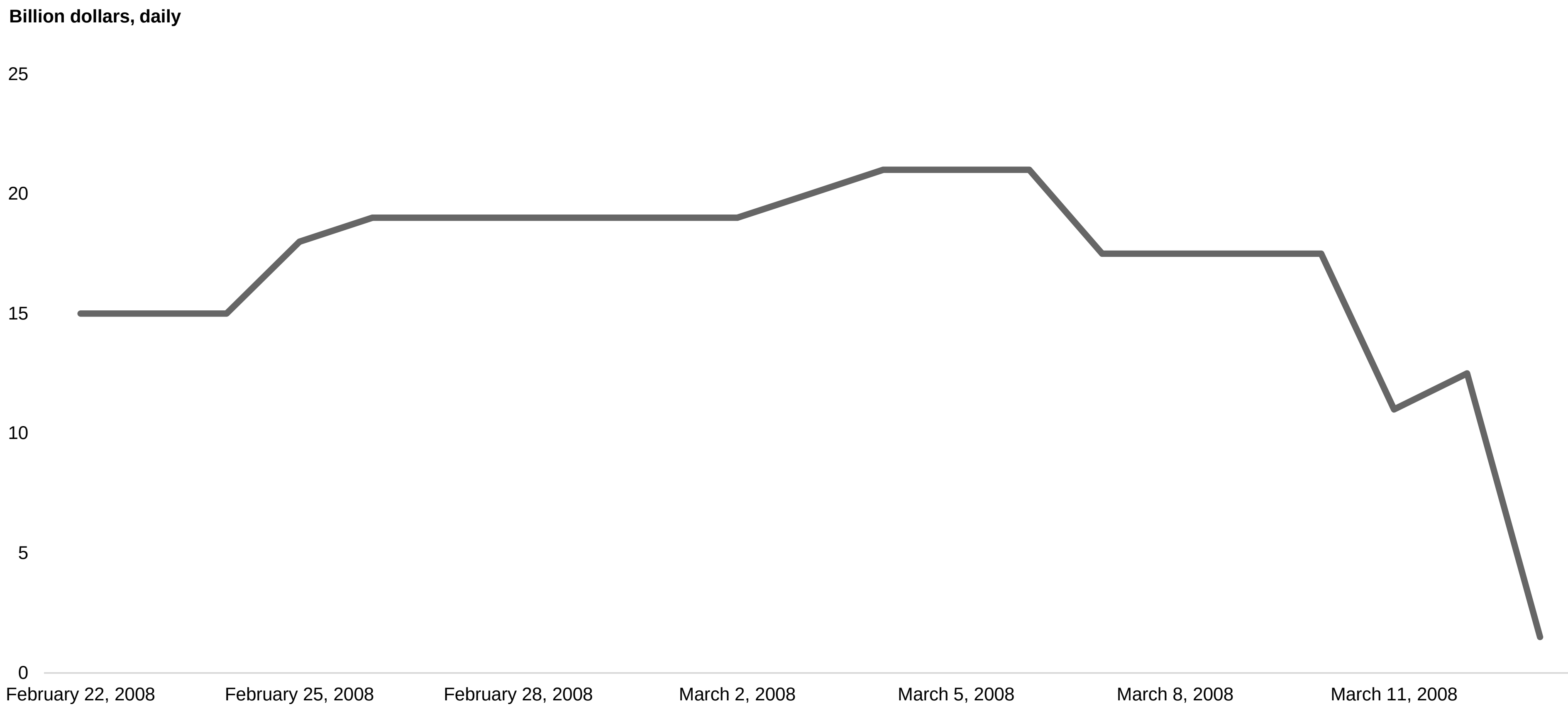
The first problem occurred in June 2007, with a suspension of redemptions in two Bear-managed hedge funds.

For reputational reasons, Bear bailed out these funds after liquidation on 7/31 by paying off their lenders and taking the collateral onto its own balance sheet.

This action, and the losses from other asset holdings, were not nearly enough to drive Bear Stearns into insolvency. So what happened?

Bear Stearns

Daily Liquidity



Source: Securities and Exchange Commission

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06 Bear Stearns, Part 2

Bear Stearns

What happened? A remarkable combination of liquidity pressures that took virtually everyone by surprise.

- **Prime brokerage withdrawals**
- **“Novations” of derivatives**
- **Collateral calls**
- **Maturity shortening on secured “repo” loans**
- **And, finally, a run on repo**

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07 Bear Stearns, Part 3

Bear Stearns

Aftermath

The Federal Reserve supported a JP Morgan buyout of Bear Stearns, initially set at $2 per share, later raised to $10.

After Bear Stearns policymakers introduced several new tools to support liquidity in interbank markets.

The markets did not learn their lesson. The failure of Lehman Brothers six months later followed a similar script.

Some argue that Fed actions during the Bear Stearns crisis created a false sense of complacency and belief that there would always be support for other “too-big-to-fail” institutions – a belief that proved false and damaging before Lehman.

An alternative explanation is that these wholesale banking operations were inherently fragile – in ways that were simply not understood at the time – and our regulatory system was not equipped to handle their rapid failure.

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08 Summary

Summary

Module 7

01 Institutions with subprime exposures began to fail in early to mid 2007.

02 These failures were not expected to be a problem for broader economy, but led to stresses in wholesale funding markets, notably the ABCP market.

03 These tensions would contribute to failures of seemingly unrelated or sufficiently insulted firms and markets: Northern Rock, auction rate securities and Bear Stearns.

04 The vulnerabilities were not fixed, and there would be worse problems to come.