

Research

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The financial crisis – what's next?

- The financial crisis has reached yet another high watermark with Lehman Brothers filing for chapter 11. In this paper we point to the key takeaways of the recent events and look at where the risks lie going forward. We also sum up our views on key financial markets.
- Event risk is now high on the agenda again. With Lehman Brothers filing for chapter 11, it is clear to the market that the US authorities have drawn a line in the sand – no more bail-outs! The implication is that more large banks can go bust if they are not able to provide the necessary capital to compensate for losses. It is now in the hands of other banks to help their ailing peers to raise the necessary capital.
- It was not all bad news over the weekend. The fact that Merrill Lynch was able to find a buyer proves that it is still possible to raise capital – as long as there is positive net worth in the company. The problem for Lehman was that it became insolvent and no one saw value in buying the company.
- In the short term, all focus will be on whether AIG will survive or have to file for bankruptcy. Other drivers will be earnings reports from Goldman Sachs (due September 16) and Morgan Stanley (due September 17), the ability of other troubled companies to raise capital, and developments in the CDS market where contracts on Lehman Brothers now need to be settled.
- We expect the crisis to continue to evolve with high volatility in all markets. Central banks could again come into play. Potential cuts from the Fed and Bank of England are back on the agenda and pressure will mount on the ECB to join in supporting the ailing world economy. Especially as lower oil prices should reduce inflation concerns.

From liquidity crisis to solvency crisis

The financial crisis is now in its second year and it continues to flare up at intervals in all-embracing fashion making risk aversion the paramount driver on financial markets.

This weekend's collapse of Lehman Brothers is the latest in a series of events, and speculation is rife about what will happen next.

Bear Stearns' troubles were due to liquidity problems and US authorities' liquidity played a key role

in the sale of Bear Stearns to JP Morgan. Fannie Mae and Freddie Mac were placed in 'conservatorship' – a de facto nationalisation – and the US Treasury looks set to infuse a massive amount of government money into the mortgage giants. But no one saved Lehman Brothers.

Lehman Brothers' troubles are a solvency crisis centring on its ability to raise the necessary capital. The lack of government intervention marks a clear shift in policy: there is no 'too big to fail' policy and no public funds will be used to bail out the financial sector anymore.

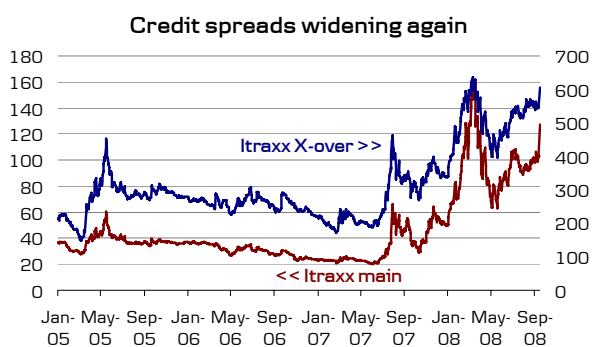
This has clearly spooked financial markets. However, the sale of Merrill Lynch to Bank of America was good news on an otherwise dismal day. Merrill Lynch was thought to be next in line after Lehman, and it is clearly positive that it was able to find a buyer. There has also been some policy response to the Lehman events this weekend with the Federal Reserve Board on Sunday announcing several initiatives to provide additional support to financial markets, including enhancements to its existing liquidity facilities (see [Flash Comment - USA: Lehman files for bankruptcy](#)).

Finally on a positive note: a group of 10 global banks have created a USD 70bn loan programme to ensure liquidity and in an attempt to restore confidence and secure market functionality.

The 'too big to fail' responsibility has been pushed back on the banking system: it is now up to banks themselves to help the ones most hit to raise the necessary capital to survive. If this succeeds it will be a positive sign. But if it fails and another big bank goes bankrupt the crisis could very well intensify.

Credit markets turn very sour

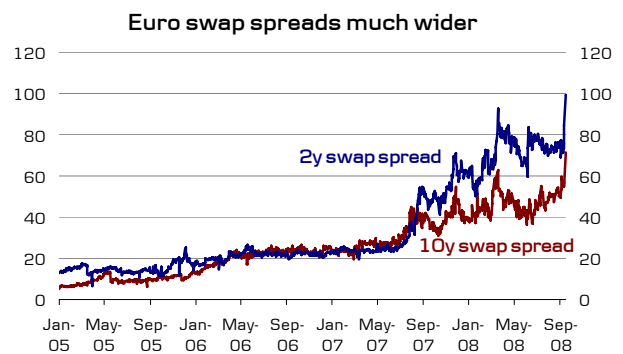
In the credit market, the hectic weekend had a sudden dramatic impact. The investment grade index, iTraxx Europe, opened around 135bp on Monday morning, some 30% wider compared with Friday's close. It tightened substantially during the day to 115bp but closed in the afternoon at 130bp. On Tuesday morning it opened at 135bp, illustrating the exceptionally high volatility driven by a high degree of uncertainty and the number of events that needed to be digested.



It is important to stress that it is only the holding company Lehman Brothers that has filed for chapter 11. None of Lehman's operating subsidiaries – the broker-dealer unit or the asset management arm – have filed. The group debt is nevertheless located at the holding company level and the filing is considered to be a credit event according to the

ISDA documentation (paragraph 4.2). Consequently, investors who have bought CDS protection on Lehman Brothers Holding are entitled to receive par value minus the recovery rate of the bonds from the protection seller. With senior unsecured bonds currently trading at 32-35 cent of the dollar, the market currently prices in a 68-65 cent compensation per dollar notional to protection buyers. The remaining assets further down in the capital structure trade close to a zero recovery.

The Lehman filing fuelled counterparty risk on open derivatives positions as Lehman is a major player in the derivatives market. It is important to again stress that Lehman Brothers Special Finance, which is the typical derivatives counterparty, is not in chapter 11. At the operating subsidiary level, bilateral agreements are now being unwound. Subsequently, these subsidiaries will cease operations once open positions are settled. In case of a remaining surplus, this will go to creditors at the holding company level.



Market participants conducted a special trading session on Sunday, September 14 to reduce Lehman exposure. In essence, market participants tried to offset Lehman counterparty risk by netting derivatives transactions with Lehman and cancelling trades that offset each other. Product classes involved were credit, equity, rates, FX and commodity derivatives.

Whereas the Lehman event was clearly negative for the credit market, the acquisition of Merrill Lynch by Bank of America calmed speculation that Merrill would be next in line to default. In the CDS market, Merrill tightened by some 135bp to 325bp. Contrary, the CDS on Bank of America widened by 35bp to 200bp.

The turmoil has also hit the swap markets where swap spreads have widened substantially due to the increased counterparty risk. This is particularly evident in Euroland. Uncertainty over the turn in money markets has risen substantially.

All eyes on AIG

After the weekend's hectic events we expect inter-daily as well as intra-daily volatility in the credit market to remain significantly elevated for a while. This volatility and the negative sentiment put new issuance on hold, which creates an even larger supply pipeline. The supply pressure will limit how far spreads are able to tighten when volatility dampens, justifying elevated spread levels for a substantial period to come.

As Merrill and Lehman are off the table, the market is turning its attention to other financial institutions in focus (e.g. Goldman Sachs, Morgan Stanley, AIG, UBS, Washington Mutual, Wachovia and HBOS).

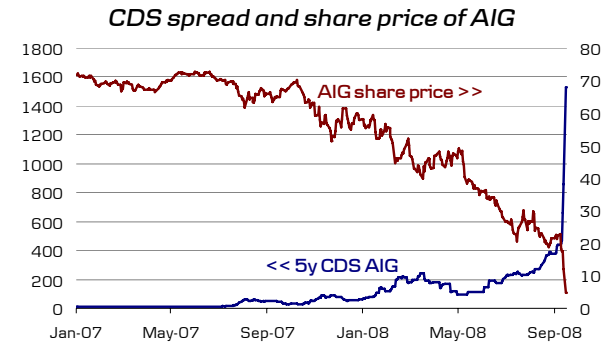
US Banks/Brokers, September 15 @16.00 CET

5yr CDS	Change from Friday
BAC 185/205bp	+35bp
BSC 185/205bp	+30bp
GS 305/335bp	+80bp
JPM 185/205bp	+35bp
MER 310/340bp	-135bp
MS 440/465bp	+150bp
WB 525/575bp	+75bp
WFC 180/200bp	+25bp

Source: Danske Markets

In particular the problems for AIG are spiralling out of control. AIG is one of the world's largest insurance companies but its financial products division and investment portfolio are where the major problems lie. The primary losses stem from exposure to structured credit with mortgage exposure, sold CDS protection and holdings of RMBS. Margin calls are significantly draining liquidity and capital market funding and capital issuance seem impossible (the company failed to raise USD 40bn in capital over the weekend). Following negative rating action on Monday from all three rating agencies, AIG counterparties can demand an additional

USD 14.5bn in collateral. As AIG is one of the world's largest counterparties, this further increases uncertainty, driving up all credit spreads and triggering further margin calls. If no action is taken, AIG is highly likely to fail with severe implications for the global financial system.



As a default of AIG is much more serious than that of Lehman, we believe a solution has to be found for AIG. A sector solution could arise from counterparties not demanding margin calls but should this fail, a full-scale Federal bail-out cannot be ruled out.

Furthermore, investors will carefully monitor the upcoming quarterly results from Goldman Sachs (today 14.30 CET) and Morgan Stanley (September 17). While both firms are expected to report a drop in Q3 earnings, their businesses have remained profitable through 2008, unlike Lehman and Merrill. Further event risk could arise from a potential failure of a large European bank. The challenges facing UK banks and building societies are increasing as illustrated by the number of building societies being downgraded today and late yesterday.

Also keep an eye on UK developments

Focus is also turning to the UK where mortgage players are under huge pressure. UK banks have virtually been locked out of the wholesale funding market for a year now and needless to say are in dire need of longer-term funding. UK banks are currently making intensive use of the Special Liquidity Scheme (SLS) provided by the Bank of England that enables UK banks to raise long-term liquidity (up to three years) by posting illiquid assets such as ABS and covered bonds as collateral. Figures on the use of the facility are not yet public but are reported by the media to be as high as GBP 200bn. Thus, funding should be well in place for the time being. However, the facility is not permanent and will not be extended when it expires on October 20, 2008.

The Bank of England will this week introduce a permanent liquidity facility but Governor Mervyn King has made it very clear that the objective of the new facility will be only to provide short-term liquidity and that the Bank of England will not and cannot solve the shortage of funding to finance bank lending, including mortgage lending. Furthermore, the stressed UK housing market is materialising into credit quality indicators worsening, with non-performing loans (NPL) – especially in the specialist market – shooting up. Thus, UK mortgage banks are not only facing liquidity problems but also credit challenges. In particular HBOS was in the line of fire yesterday with stocks dropping more than 30%. Although it is difficult to gauge the consequences for HBOS of Lehman filing for chapter 11 and a possible failure of AIG, the SLS should ensure liquidity for now and having recently completed a GBP 4bn rights issue, HBOS is well capitalised for the moment.

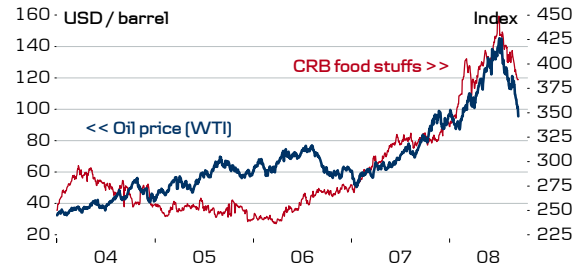
Overall, we expect a highly volatile period ahead with the overall direction highly dependent on the outcome of AIG. If a solution is found, this could trigger a spread tightening but if AIG defaults, this is likely to trigger an additional substantial spread widening. Longer term, credit fundamentals such as a slowing global economy, rapidly tightening lending standard and ongoing deleveraging will continue to weigh on credits for some time to come and prevent a larger tightening.

Macro and central banks: Cutbacks on agenda

The impact on the global economy is clearly negative but the size of the shock is hard to quantify. The big question is to what extent banks and mortgage institutes will significantly tighten their lending practices due to rising funding costs and fear of mounting losses. But the fear of a credit crunch is rising.

Policy response from monetary authorities may differ. For example, the Bank of England and the Fed are much more likely to cut rates on the back of further financial turmoil. Pressure will also mount on the ECB to join in on helping the world economy but the ECB has previously been reluctant to use interest rates to fight the financial crisis. A steep drop in commodity prices should ease the inflation concern, though, and this could push forward ECB cuts.

Commodity price drop should ease inflation worries



An insurance Fed cut at today's ordinary meeting cannot be ruled out, but we think it more likely that the Fed will remain on hold. If the Fed cuts, we think it will probably cut by 50bp.

In the UK the crisis is also getting more intense and the drop in commodity prices should give the Bank of England more room to manoeuvre. If the financial crisis continues, a rate cut at the next meeting in October cannot be ruled out.

Bond markets: Risk appetite main driver again

Flight to safety and rate cut expectations drive short government yields lower

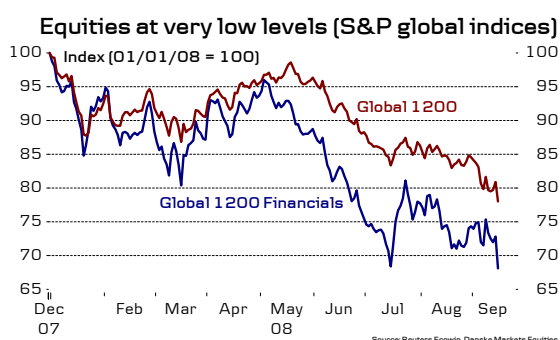


The market reaction on interest rate markets has been text book: lower government yields, steeper curves and wider swap spreads. Event risk will determine the development in the coming days and of course bond markets will react to decisions regarding monetary policy. Macroeconomic developments will take a back seat to news regarding the financial crisis until the crisis abates. Our overall view is still for bond yields to fall in Euroland and that there is room to fall further on a 3-6 month horizon as ECB cuts come closer. In the US much hinges on the response from the Fed. The market is now pricing close to 50bp cuts by February next year. Even though our main scenario is that the Fed will hold, we understand why the market is pricing in a high risk of rate cut(s).

Equity markets: Markets price a lot of bad news

In the short term, we expect phenomenal pressure on financial de-leveraging. No one knows where de-leveraging will take place next although we believe based on current financial markets that, for example, long oil futures contracts are closed due to de-leveraging. With this uncertainty impossible to remove in the short run, the stock market will suffer.

Nevertheless, investors should remember that current developments are removing many financial market participants with unhealthy finances operating 'off-balance sheet' – a situation which we believe will be highly beneficial for the stock market over the next one/two years.



We now ask – with financial markets now trying to understand the significance of Lehman filing for bankruptcy protection, can it get any worse than this? Our answer is that while history shows that it can, we believe fear of the consequences for the credit market is well ahead of actual reality and that valuations compared to risk-free rates are too high for the market to proceed to an ugly second phase with stocks correcting by a further 20-25%. Of course, we now have important new information available concerning the willingness of the US Treasury and Fed to support the US financial system which indicates that it could take some time before financials begin to recover.

To sum up, our conclusion is that the stock market will continue to range trade and that the second phase of the bear market will only add minor new price corrections to the correction already experienced in the first phase of the bear market. In the short term, both oil prices and mortgage yields underpin this view.

FX markets: High volatility to stay

For FX markets, a spike in the expectation to future exchange rate movements and a flight to safe-haven assets has so far been the result of Lehman Brothers filing for chapter 11. For example, the 3M EUR/USD implied volatility has risen to a six-year high while CHF and JPY have appreciated against all other currencies. It is furthermore worth noting that most movements have brought exchange rates closer to short-term fair value estimates, i.e. an alignment to what has been observed in other asset classes.

We believe that FX markets will continue to be nervous in the coming months, i.e. that elevated levels of implied volatility are here to stay for now. It is, however, hard to foresee a further spike in expected FX volatility and the next likely move is therefore probably down. It is quite likely that low-yielders, CHF and JPY, will benefit if other instances of event risk materialises. Both CHF and JPY move positively with risk aversion. The conclusion is however not straightforward with regard to the CHF this time as the highly concentrated financial sector in Switzerland currently is at some risk with subsequent negative economic implications.

We do not see any need to change our FX forecasts at the moment. [Our forecasts](#) are already based on a further unfolding of the financial crisis and a rising risk of global recession. In our view, undervalued currencies like USD and JPY will appreciate further against the overvalued EUR. However, it is important to remember that our FX forecasts as well as others are surrounded by more uncertainty than normal due to the rather tense market conditions.

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