Financial markets and Central Bank measures[1]

Liquidity squeeze in the markets

Conditions in the global financial markets have deteriorated markedly since the last Monetary Bulletin *was published in November 2007. The capital markets have changed radically, interest premia have risen steeply, and in a sense, the market is actually closed to many issuers. The market for covered bonds, an important source of funding for financial institutions during the years from 2005 to 2007, has contracted, and liquidity is a growing problem among financial institutions, which have begun to baulk at engaging in transactions with one another for fear of further difficulties. The European Central Bank and the US Federal Reserve Bank have enhanced access to liquidity by relaxing the rules on securities eligible as collateral for transactions with them, and the Federal Reserve has lowered its federal funds rate by a total of 2.5 percentage points. It is widely held that, in the US, the current financial market crisis will lead to an economic recession. Icelandic financial institutions have also felt the effects of the situation. Their access to foreign capital is limited, and interest premia are high. There is a shortage of foreign currency, financial institutions hold fast to foreign liquidity, and the currency swap market is virtually non-functional, which obstructs the transmission of monetary policy. There is no shortage of krónur as yet, but the demand for foreign currency is keen, and the exchange rate of the króna has fluctuated widely.*

Foreign central banks increase access to liquidity

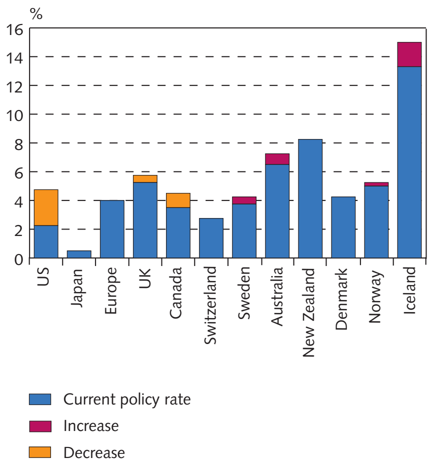
The financial market crunch that began in August 2007 with the US sub-prime mortgage crisis appears likely to continue with no immediate end in sight. Not only is it unclear how much of their assets banks will have to write off, but very little is known about who the owners of the worthless assets actually are. Banks are reluctant to lend to one another except for very short periods of time and with high interest premia. Banks' funding costs have risen substantially, and even the largest and most trustworthy financial institutions have limited access to bond market funding.

Central banks have responded by increasing banks' access to liquidity. Rules on collateral have been relaxed, and central banks have concluded swap agreements to guarantee access to foreign-currency liquidity. Since September the US Federal Reserve Bank has lowered its federal funds rate from 4.75% to 2.25% in five increments, despite mounting inflationary pressure. The European Central Bank has not lowered its base interest rate but has relaxed its collateral requirements, while the Bank of England has lowered its minimum bid rate by 0.5 percentage points, to 5.25%. The Bank of England and the central banks in the United States, Europe, Canada, and Switzerland have concluded agreements in order to increase banks' access to liquidity in currencies other than their own. They originally made such agreements in December 2007, thus demonstrating just how international the structure and operations of banking institutions are.

Lack of liquidity has already driven many financial institutions into a liquidity squeeze. The British government stepped in and nationalised the mortgage lender Northern Rock, and in the US, JP Morgan acquired securities broker Bear Stearns with support from the Federal Reserve. Many fear that there is more to come. Thus the current financial market situation could persist for some time.

Chart 1

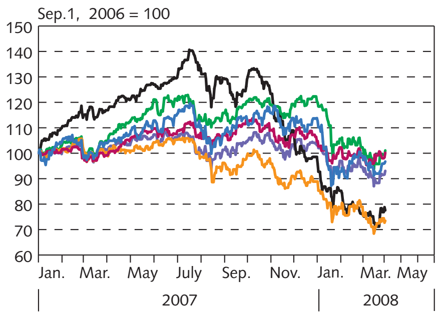
Changes in selected central banks' policy interest rates since the last *Monetary Bulletin*



Source: Reuters.

1. This article uses data available on April 7, 2008.

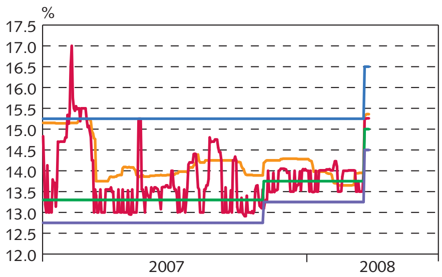
Chart 2
Development of selected share indices
Daily data January 1, 2007 - March 31, 2008



OBX (Norway)
DJIA (US)
NIKKEI 225 (Japan)
DAX (Germany)
OMXI15 (Iceland)
FTSE100 (UK)

Source: Bloomberg.

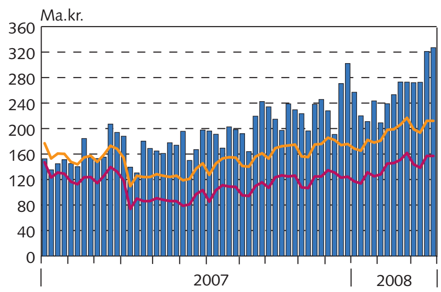
Chart 3
Interest rates in the interbank market and Central Bank policy rate
Daily data January 3, 2007 - March 31, 2008



Central Bank overnight rate
One day (O/N)
Central Bank policy rate (adjusted to flat rate)
Three months (3M)
Central Bank current account rate

Source: Central Bank of Iceland.

Chart 4
Collateral loans, Treasury deposits and revenue requirements
Weekly data February 6, 2007 - March 26, 2008



Collateral loans
Treasury deposits
Reserve requirement and Treasury deposits

Source: Central Bank of Icleand.

Equity prices have plunged all over the world, and investors have fled to less risky options such as government bonds.

The Central Bank of Iceland increases access to liquidity …

Domestic financial institutions have felt the effects of the liquidity squeeze. They have limited access to foreign markets, and interest premia are higher than ever before. Banks hold tight to foreign capital, and as a result the currency swap market no longer reflects the differential between interbank rates in krónur and foreign currencies. Because of the high funding costs sustained by Icelandic banks, spreads on swap agreements have dropped precipitously, and there is great reluctance to make swap agreements at all. Foreign investors hesitate to hedge their positions through the money market because of increased counterparty risk. In March, the Treasury and the Central Bank responded with increased issuance of short-term Treasury notes and electronic registration of Central Bank certificates of deposit, which are fully transferable. These securities are a viable alternative for investors that have issued Glacier bonds but can no longer hedge their positions through swap agreements or deposits. The Treasury also held an auction of short-term Treasury notes (RIKB 08 1212) in order meet the demand for risk-free króna-denominated bonds, and sold T-notes for roughly 7.5 b.kr. in the auction.

… and adapts its rules to coincide with Europe

Concurrent with the changes in its certificates of deposit, the Central Bank amended its rules concerning reserve requirements and collateral for transactions with financial institutions. The purpose of changing the rules on reserve requirements was to co-ordinate the Central Bank's rules with those of the European Central Bank to the extent possible. The new rules assume that the obligations of Icelandic banks' foreign branches do not constitute a foundation for reserves. The amendments will take effect when regular information gathering concerning the balance sheet items of Icelandic financial companies' foreign branches has been implemented. Although no figures are currently available, it can be expected that this change will considerably lighten the reserve requirements of those banks that operate branches abroad; however, the effect on individual financial institutions varies greatly. The minimum reserve requirement in April was 53 b.kr.

The liquidity crunch has not yet increased volatility in the domestic money market. Domestic financial institutions appear more cautious than before in their transactions with one another, however, and have increased their overnight loan transactions with the Central Bank as a result. In a two-step move made in January and March, the Bank liberalised its rules on collateral for regular transactions and overnight loans. It now accepts foreign securities if they meet the requirements concerning registration, credit rating, and so forth. Covered bonds are also accepted if stringent credit rating requirements are met, and securities submitted by the issuers themselves are likewise eligible. Liquidity facilities have increased somewhat as a result of these amendments to Central Bank rules.

The Treasury’s balance with the Central Bank has continued to increase, and Treasury finances have been sound. Balances fluctuate to a degree, but the trend is upward.

Foreign funding is difficult for the banks …

The Icelandic króna has depreciated substantially since *Monetary Bulletin* was issued in November. There is a discernible lack of foreign liquidity, and domestic financial institutions have had difficulty obtaining funding from abroad due to tight market conditions and high interest premia.

Unlike the situation in 2006, Iceland's banks are now far from being alone in a tight position, but their interest premia are much higher than those of other banks with similar credit ratings. It is likely that the collapse of the market for collateralised debt obligations (CDO) pressed domestic banks' CDS spreads upwards. Foreign bond issues by domestic banks have been popular in CDOs in recent years, as their interest premia have been high in relation to their credit ratings since 2005. Many CDOs have been unwound in recent months, and those who receive the securities hedge against the credit risk by purchasing credit default swaps. Another explanation for the high CDS spreads is that Iceland is not an active securities lending market, and there is a limited supply of securities for short sales. Short positions are therefore taken through the CDS market.

Króna under pressure

Trading on the currency market has been brisk so far this year. March saw record trading volumes of 1,200 b.kr. In August 2007, the second-busiest month to date, volumes were quite a bit less, or 750 b.kr. The króna depreciated sharply in March, most likely due in part to the situation in the currency swap market. The króna recovered somewhat in early April. The currency swap market has not functioned normally due to lack of foreign liquidity, and investors have closed short positions on the currency markets and long positions in the króna, as is described above. It is difficult to envision the swap market returning to normal before access to foreign capital improves. However, the issue of securities short-term, risk-free securities denominated in krónur enables investors to hedge their exposures in the króna.

On March 25, the Central Bank responded to the deteriorating inflation outlook triggered by the drop in the exchange rate with a 1.25 percentage point increase in the policy rate. The policy rate hike, which was announced between scheduled interest rate decision dates, was an appropriate move in view of exchange rate developments and the Bank's announcements.

The Central Bank slows down its foreign currency purchases

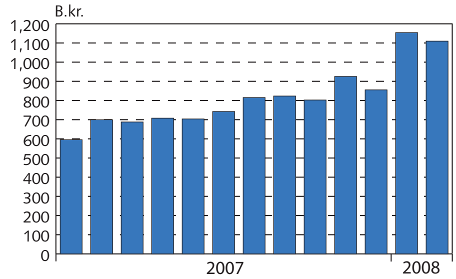
The Central Bank's foreign reserves now stand at 220 b.kr. After having been increased substantially through Treasury borrowing in late 2006. The reserves are invested in highly liquid debt securities with a high credit rating, and in cash. The Central Bank's net foreign reserves consist of euros (45%), US dollars (35%), pounds sterling (15%), and yen (5%), and now exceed the Treasury's entire foreign debt.

At the end of March, the Bank temporarily discontinued its regular purchases of foreign currency due to the turmoil in the markets and the tight foreign liquidity position of domestic financial institutions. However, it reserves the right to begin purchasing foreign currency

Chart 5

Forward currency position
of the commercial banks

At end of month February 28, 2007 - February 29, 2008

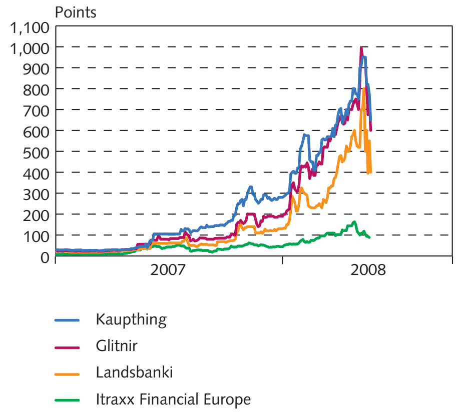


Source: Central Bank of Iceland.

Chart 6

CDSs of Icelandic banks
and Itraxx Financial Index

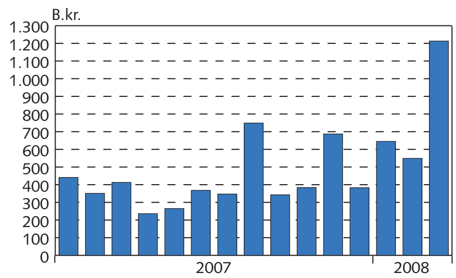
Daily data May 2, 2007 - April 7, 2008



Sources: Bloomberg, Reuters.

Chart 7

FX market turnover
January 2007 - March 2008

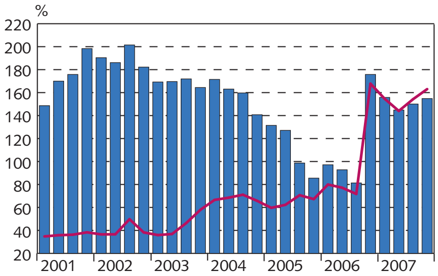


Source: Central Bank of Iceland.

Chart 8

Gross reserves and gross central government foreign debt

Q1/2001 - Q4/2007



Gross foreign debt

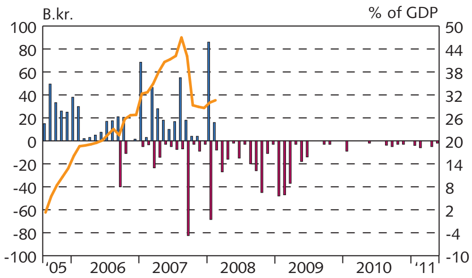
Gross foreign reserves

Source: Central Bank of Iceland.

Chart 9

Króna Eurobond issuance[1]

Monthly data



Glacier bond issuance (left)

Maturities (left)

Cumulative Glacier bond issuance (right)

1. Data until April 2, 2008 inclusive.
Sources: Reuters, Central Bank of Iceland.

again, in the same manner as before, without prior notice. The Bank's regular purchases totalled 6 million US dollars per week.

Positive net issuance of Glacier bonds

Glacier bond issuance increased significantly in January, when bonds valued at 68.5 b.kr. matured. In January alone, issuance totalled 86 b.kr., or just over 17.5 b.kr. net of maturities. However, no Glacier bonds have been issued by foreign parties since February. The banks' balance in forward foreign-denominated assets has also remained largely unchanged in the past three months, but there are few indications that foreign investors have closed out long positions in the króna. The balance has decreased, however, measured in foreign currency. The explanation for the steep decline in the exchange rate of the króna seems therefore to lie rather in currency purchases by domestic entities. Many Icelanders are indebted in foreign currency, and the recent depreciation of the króna has encouraged many of them to swap their debt into the króna. The banks also hold foreign reserves and, in accordance with the Central Bank Rules on Foreign Exchange Balance, are authorised to maintain a long position amounting to 30% of equity. It is possible to obtain an exemption from the Rules in order to protect the capital ratio. The Bank has granted such exemptions.

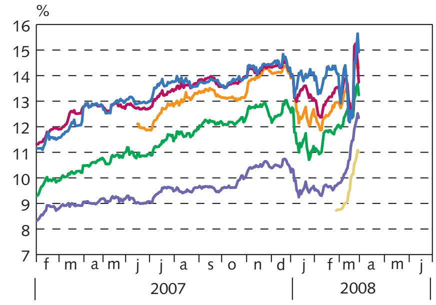
Bond market activity

The bond market has been lively so far in 2008. In the first three months of the year, turnover on the OMX Iceland exchange was 1,619 b.kr., as opposed to 2,430 b.kr. for all of 2007. An overwhelming proportion of total bond trading was in Treasury-guaranteed bonds. In 2007, bonds issued by the Treasury and the Housing Financing Fund (HFF) represented 95% of total trading on the exchange. For the first three months of 2008, they constituted 96% of total trading volume. The second-highest turnover is in bonds issued by banks and savings banks, with a 2% trade ratio, followed by corporate bonds. It must be considered disappointing that the trade ratio of bonds from issuers other than the Treasury and HFF should be no higher. One of the aims of the Treasury issues was to establish a foundation for the pricing of other bonds in the market. Market making in bonds issued by financial institutions and corporations – similar to that with HFF and Treasury bonds – would doubtless stimulate bond trading.

Trends in yields

Yields of the shortest series of Treasury notes have fluctuated between 12% and 15% since the beginning of the year and are now at the upper end of that range, which is positive from a monetary policy standpoint. Due to strong demand for short-term Government-guaranteed bonds, the Treasury decided to open the Treasury note series RIKB 08 1212 and expand it by up to 10 b.kr. The auction was held in March, and the size of the series is now 22 b.kr. According to the Treasury's Issuance Calendar for 2008, a new two-year Treasury note series will be introduced in November 2008, and it is expected that 12 b.kr. will be issued in that series this year. The auction of the shortest T-note series will not affect these plans. No Treasury bill issuance is expected this year, and no bills are currently outstanding. However, as is mentioned above, the Central Bank has issued certificates of deposit, which are transferable electronic securities. They are registered with the Clearstream settlement system, which should facilitate purchase by foreign investors.

Chart 10
Treasury note yields
Daily data February 1, 2007 - March 31, 2008



Source: Central Bank of Iceland.

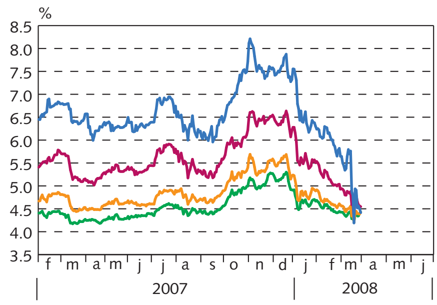
Fluctuating yields …

Yields on indexed bonds peaked in November 2007 and remained high until mid-December, whereupon they declined considerably. In 2007, yields on Treasury notes developed in line with HFF bonds, rising steadily and peaking in mid-December. At that point, yields dropped quickly on all T-note series and bottomed out at the end of January. Since the beginning of February, Treasury note yields have diverged from HFF bond yields. In February and March, yields on nominal bonds rose sharply, while indexed yields continued to fall.

The Treasury introduced a new 11-year Treasury note in February. The market has been demanding longer Treasury note series for some time, and the first auction was a success. The second auction of the series was held under difficult market conditions, on a day of great volatility in all markets. As a result, it was decided only to accept bids for 3 b.kr. The size of the series is now around 14 b.kr., but the Treasury plans to expand it to 30 b.kr. this year.

Yields on Treasury notes and HFF bonds dropped in December, as investors reduced their exposure to risk and moved from equities to bonds late in the year. At that point, investors were most interested in nominal and indexed bonds. Concurrent with the depreciation of the króna in February, yields on indexed bonds fell, while they rose on Treasury notes. The market's inflation expectations therefore changed decidedly in a short period of time. The strengthening of the króna in the beginning of April has eased inflation expectations slightly.

Chart 11
HFF bond real yields
Daily data February 1, 2007 - March 31, 2008



Source: Central Bank of Iceland.

… and falling equity prices

The OMXI15 index has declined significantly in a very short period of time. It stood at 8,200 points in the beginning of November but had fallen to 6,300 at the end of the year. Since then, the OMXI15 has dropped still further, falling to 4,500 points in March, a 50% decline from its peak in July 2007. Financial undertakings and investment companies have led the losses. 78% of the index is composed of the shares of Kaupthing, Glitnir, Landsbanki, FL Group, and Exista, which have fallen in price more than most other companies. Equity prices recovered somewhat in the beginning of April, and the OMXI15 stands at 5,400 as of this writing.