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The interbank market for krónur

In the Icelandic money markets a formal interbank market operates for short-term lending in domestic currency (krónur) among commercial banks and savings banks. Interbank trading performs an important role in the money market, especially for very short loans related to the liquidity position, although longer loans are also involved. The market today is visible and continuous, with banks presenting guideline interest rate bids for their deposits with and lending to each other for a specific period, e.g. overnight and for a week, a month and a year. In its present form the market was shaped by the Central Bank of Iceland in cooperation with commercial banks and savings banks, and formally began operation in 1998. This article outlines the start of the interbank market for krónur, its development and current arrangement.

The start of the interbank market for krónur

The Central Bank has never been directly involved in the interbank market for krónur, although it has played an indirect part in interbank trading by providing regular facilities in various forms. In 1981 the foundation for interbank trading was in effect laid when the Central Bank introduced its rules on note quotas for deposit money banks (DMBs). Under these rules, commercial banks and the largest savings banks could sell the Central Bank 15-day notes within the scope offered by a quota allocated to each institution on a quarterly basis. The quota was set at 6% of each institution's total deposits and was generally divided into two tiers with different rates of prepaid interest. If an institution did not use its quota in full, the lending ceilings for the following quarter would be raised and could increase in this way by as much as double. The aim was to give DMBs an alternative option for meeting an unexpected deterioration in liquidity, over and above being able to overdraw with the Central Bank. Most institutions took advantage of this option, quotas opened up the possibility of interbank trading and even replaced traditional repos. Commercial and savings banks which did not need to use their quotas in full would convey them to others for a charge.

At this time, interest rates of DMBs were not deregulated, which hindered interbank trading. Liberalisation of interest rates (1984) opened up the possibility for such trading and the DMBs took advantage of it. Two main channels were used. Firstly, direct credit lines from one bank to another, and secondly when a DMB with an unused note quota with the Central Bank conveyed it to another. The Central Bank's policy at this time was that banks should level out fluctuations in liquidity by trading with each other rather than by direct trading with the Central Bank. Financing through interbank loans, for example, was not deducted from the borrower's liquidity within certain limits, under rules on DMB solvency ratios. On March 10, 1987 conveyance of Central Bank note quotas was abolished, bringing the interbank market into a more important role in individual institutions' liquidity management.

However, the Central Bank continued to provide its regular facilities in interbank trading. Around 1991, for example, DMBs could sell the Bank very short-term notes (5 days). This was expensive credit and only used if no other options were at hand for them to avoid overdrawing on their current accounts

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with Central Bank. DMBs could also sell the Bank T-bills with a repurchase provision after 10 days.

In the beginning of 1993 Landsbanki, Íslandsbanki, Búnadarbanki and Icebank established an overnight market for their deposits with the Central Bank. In addition to this trading, Icebank brokered interbank lending between individual savings banks. This enabled monitoring of interbank market lending on a daily basis for the first time. Banking institutions notified the Central Bank by fax of all trading in this market. Yields in these trades largely followed those in T-bill auctions. By this stage, the Central Bank was in effect participating indirectly in the interbank trading since commercial banks and savings banks had the option of selling instruments to it for 10-20 days against a repurchase agreement. Interbank lending did not change very much. Some growth took place in 1996 and 1997 after fairly sluggish trading in 1994 and 1995.

Reorganisation of the interbank market for krónur

In December 1997, liquidity began to tighten in the banking system. The shortage could largely be traced to seasonal demand for liquidity because of Christmas. One consequence was that high interest rates were sometimes offered for short-term funds in capital markets. Considerable discrepancies developed between interest terms in individual transactions. No formal, visible interbank market for krónur was in place, making it difficult to know the terms that were generally being offered. Central Bank credit was easily accessible then through the T-bill market, with repos where T-bills are put up as collateral and also by trading in the secondary market. However, the banks were very short on T-bills at the end of the year, so the Central Bank's most common facility was largely closed to them. Interest rates therefore did not reflect the banks' requirement for funds.

Under these circumstances, financial market participants realised the importance of establishing a formal interbank market for krónur which would continuously show the changes taking place in interest developments in the short-term market. A visible and continuous interbank market also enables banks to set up deposit and lending facilities with each other and ensures that market terms are transparent to all market participants at any time. A market that relays information about changed circumstances in this way also provides the Central Bank with a source of quick information that it can use in its own decision-making.

In league with participants, the Central Bank launched preparations for new rules on the interbank market. The new rules entered into effect on June 10, 1998 and there were eight market participants.

Current market arrangements

Interbank market interest rates in Iceland are termed REIBOR (Reykjavík Inter Bank Offered Rates) and REIBID.[2] The former are lending rates and can conceivably be used as a base rate for banks' variable-interest lending to customers. For instance, such loans can be provided on REIBOR terms (for varying lengths) plus a premium.

Market participants today are Landsbanki, Íslandsbanki, Búnadarbanki, Kaupthing Bank, Icebank, Hafnarfjördur Savings Bank and SPRON Savings Bank.

Regulatory framework and presentation of bids

Under current rules for trading in the interbank market for krónur, market participants are obliged to show publicly (and update at intervals of no less than 5 minutes) interest rate bids in the market for a specific tied or lending period. At the request of another market participant, they must also present a binding interest rate bid for the same tied or lending period for specified minimum amounts. Public bids shall extend to one day (overnight), one week, two weeks, one month, two months, three months, six months, nine months and twelve months.[3] Both deposit and lending bid rates shall be specified and the minimum bid amount from one day to six months shall be 100 m.kr. The amount of nine- and twelve-month bids shall be 50 m.kr. at minimum. Market participants

2. Probably the best known interest rates in international markets are LIBOR (London Inter Bank Offered Rates). LIBOR rates are defined as the general terms offered on loans in a given currency in the London interbank market at the time when the interest rates are determined. LIBOR rates are used as a reference in financial transactions the world over, in traditional lending, currency agreements and derivatives alike.

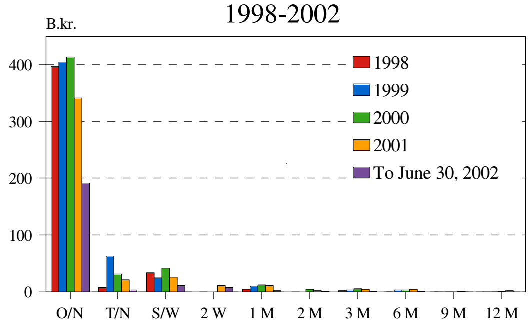
3. Definitions of fixed terms: One day (overnight) is defined as O/N (over/night) or T/N (tomorrow/next), one week as S/W (spot/week), two weeks as 2 W, one month as 1 M, two months as 2 M, three months as 3 M, six months as 6 M, nine months as 9 M and twelve months as 12 M.

have primarily tapped the interbank market for krónur in order to be able to manage their short-term liquidity positions. As Chart 1 shows, by far the largest part of trading is one-day or overnight.

loan and interest rate. The Central Bank then publishes a daily survey in the Reuters system showing total trading volume in the market, broken down and specified according to loan length.

Chart 1

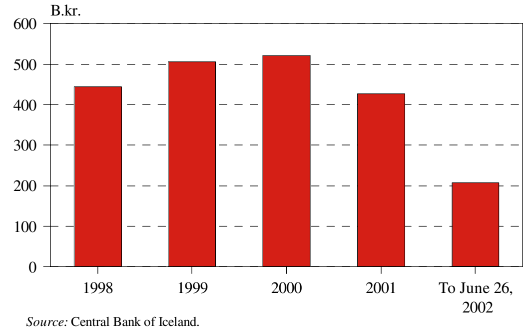
Turnover in the interbank market for krónur, broken down by loan length 1998-2002



Source: Central Bank of Iceland.

Chart 2

Total turnover in the interbank market for krónur 1998-2002



Source: Central Bank of Iceland.

The maximum spread between deposit and lending bid rates for one month or longer is 25 basis points. No maximum spread is specified for bids of a shorter length, but this is supposed to be within reasonable limits. As a rule, no player is allowed to price himself out of the market with unfavourable bids.

Each participant decides how high a daily outstanding level of credit to allow another participant to maintain towards him. These credit lines are decided in advance. Bids are binding unless credit lines are fully utilised. Trading takes place from 9:30 to 14:00 every business day.

Central Bank involvement in the market

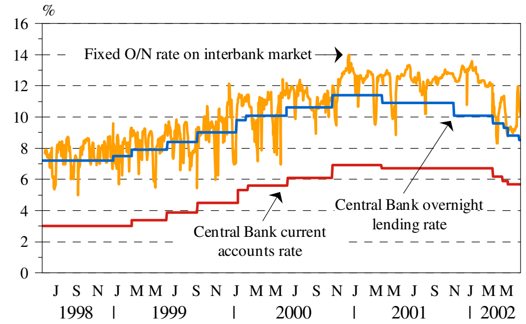
As mentioned earlier, the Central Bank is not a direct participant in the market. Nonetheless, it supervises the market and ascertains that healthy business practices are maintained. The Bank also holds regular meetings with market participants to discuss its rules and norms.

The Central Bank calculates and records participants' average interest rate bids between 11:15 and 11:30 every business day and publishes this on an information page in the Reuters system which is also used to display real-time bids by market participants every business day. If a trade takes place in the market, the participant is obliged to notify the Central Bank of the counterparty to it, the amount, length of

Around the time that the interbank market was reorganised, the Central Bank established a formal overnight lending facility for credit institutions which have required reserves with it. O/N loans are guaranteed with the same collateral that qualifies for repo transactions. Establishing overnight facilities served the purpose of setting maximum short-term interbank market interest rates, while interest rates on current accounts with the Central Bank represent the minimum. These two rates form the ceiling and floor for interbank rates and prevent them from deviating too far from the Central Bank's policy rate.

Chart 3

Central Bank rates and the O/N rate June 2, 1998 - June 28, 2002 (daily data)



Source: Central Bank of Iceland.

Treasury involvement in the market

It should be borne in mind that both regular and irregular payments into and out of the treasury exert an impact on systemic liquidity and thereby on the interbank market for krónur. These are by and large known figures and can take various forms. Some examples of treasury in- and outflows are given below.

Outflow from the treasury	Inflow to the treasury
Wages and payroll expenses for public sector employees paid out monthly	VAT is collected at two-month intervals
Child allowance is paid out four times a year	Income tax and national insurance contributions
Interest relief on mortgages is paid out once a year	Capital gains tax
Irregular payment to public sector employees' pension funds	Irregular revenues from sale of assets (e.g. through a privatisation programme)

Of course, the treasury is not a direct party to the interbank market, but the flow passes through banks and savings banks where individuals and businesses have their accounts. Movements on accounts with banks and savings banks in connection with treasury activities produce a corresponding movement on the treasury's accounts, thereby causing liquidity to ease or tighten in the market. Privatisation can provide an illustration: We can assume that the state sells its share in an enterprise for which it receives 4.8 b.kr. Investors and the public invest in this share through securities houses, paying in cash. The money that was previously kept in accounts in the banks and savings banks is then deposited in the treasury's account with the Central Bank. This transaction removes 4.8 billion from the market, i.e. money in circulation among commercial banks and savings banks is reduced correspondingly. As a rule this transfer of capital out of the market will tighten the credit institutions' scope in the short-term and there is every likelihood that interest rates in the interbank market will go up as a result. The opposite effect applies when a payment is made from the treasury.

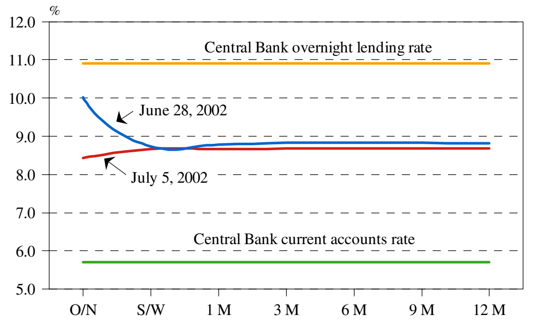
What can be read from the interest rate spectrum

Evaluating interbank market interest rates enables a rough estimate to be made of the liquidity position of the market, and even the position of individual credit institutions. Interest rates are high when liquidity is tight in the market, and low if ample liquid funds are available. Market liquidity can also be estimated from the location of the interest rate curve compared with the Central Bank's rates for its overnight lending and deposits in its current accounts, which form the ceiling and floor of interbank market rates.

Chart 4 shows the time spectrum of interest rates on June 28 and reveals that an O/N loan was expensive to take then, at 10.02%. Borrowing for a week or longer was much less expensive. At this particular time the tied period had just come to an end and market participants had tight short-term liquidity positions, as reflected in the high cost of overnight loans. Just over a week later, on July 5, the participants' position had improved and O/N interest rates were 8.43%. Repo transactions had just been concluded at that time, under which market participants have access to Central Bank funding at predetermined interest rates, against guarantees in the form of securities. At the time of writing the repo yield is 8.5%.

Chart 4

The interest rate spectrum on the interbank market for krónur



Source: Central Bank of Iceland.

Conclusion

Interbank lending, prompted by the different liquidity positions of commercial banks and savings banks, is important for the money market participants' liquidity management. The market ought to enable money market participants to provide or procure capital if needed. This is not a market where the participants' main aim is arbitrage from swings in interest rates; it is primarily conceived as a major tool for market participants in their liquidity management. Interbank market interest rates play an important part in modern financial transactions, for example pricing of various financial products such as derivatives and as base rates in a formal currency swap market. It is vital to continue efforts to cultivate the interbank market for krónur as effectively as possible in cooperation with market participants, because of the major role it plays in intermediation of capital and interest rate determination.

Sources

Central Bank of Iceland: Annual Reports 1964-2001.