Financial markets in Germany

Capital market and bank interest rates

Stable capital market rates alongside a slightly steeper yield curve

German long-term capital market interest rates have remained broadly stable in the past few months. The yield on ten-year Federal bonds outstanding fluctuated only a little around 5 ¼ %. Interest rates on Federal securities with a shorter residual maturity, which are influenced more by conditions in the money market, increased in the second half of August in anticipation of an interest rate rise by the ECB and for a time were higher than the yields on longer-dated Federal bonds. From September, however, the interest rate level of short-dated paper fell again. The yield curve of Federal securities, which in August had been completely flat, therefore showed a slight upward slope again from October. In mid-November the interest rate spread between ten-year and one-year Federal bonds observable in the market amounted to 10 basis points, compared with 1½ percentage points at the end of 1999. The co-movement between interest rates in the German bond market and yields in the other euro-area countries weakened appreciably in the third quarter. The spread widened to a maximum of 40 basis points, while the average euro-area capital market rate (excluding Germany) was 26 basis points above the German equivalent rate (see box on page 21).

Special effect of the UMTS licence auction

The auction of the UMTS mobile phone licences in August had a marked impact on the German capital markets. Even prior to the auction, expectations of a squeeze in the supply of Federal bonds pushed down yields on long-dated *Bunds.* Even though no prema-

Widening of yield spreads between European government bonds

The differential between the average yields on ten-year government bonds across the euro area (excluding Germany) and German Federal bonds has increased continuously since the middle of this year and currently amounts to 26 basis points. Interest rate spreads between individual euro-area countries are still mainly attributable to liquidity differences and, to a smaller extent, to different default risks; but they can no longer be attributed to different exchange rate risks. Thus bonds issued by countries with a higher default risk are typically "dearer" from the issuer's point of view; in other words, the borrowers have to pay their creditors a higher yield. A liquid secondary market enables holders of bonds to buy and sell them freely at any time and therefore attracts a bonus from market players in the form of a higher bond price and smaller yield. Owing to their extensive availability and to the existence of a liquid futures market, German Federal bonds are thus among the European government bonds with the lowest yields. There is no evidence, however, that credit risks and liquidity differences are responsible for the recent widening of spreads in Europe. A more important factor was probably the expectation of a squeeze in the supply of German Federal bonds in the context of the ample proceeds from the auction of UMTS licences, which led to a further fall in yields during summer 2000.

Not only the average interest rate spread but also its dispersion in the euro area has widened. It would seem that government bond yields in Europe are again being influenced more strongly by country-specific developments. The significance of special factors, such as the massive proceeds from the auction of third-generation mobile phone licences or more favourable fiscal developments, can be gauged by comparing the yields on government debt securities with the interest rates on ten-year swaps, which are not affected by these special factors.

Whereas the rates for long-term interest rate swaps have remained at a fairly stable level since the beginning of this year, the yields on government bonds have declined, especially since March. It follows that the gap between the two financial market instruments – the swap spread – has widened considerably. Swap spreads in the EMU member countries widened back in autumn 1998 and towards the end of 1999. That was caused by a liquidity bonus on the part of German Federal bonds owing to their "safe haven" function during financial market turbulences and, to a lesser extent, by an increased likelihood of defaults on the part of the financial intermediaries engaged in swap business in the wake of the crisis in Russia as well as demand-side effects in connection with the anticipated Year 2000 problems. There are no indications at present, however, of any deterioration in the banking sector's credit standing. The latest divergence between the interest rates of long-term swaps and government bond yields is therefore more probably due to the expected contraction in the supply of benchmark bonds. This may also be inferred from the fact that the swap spreads have reached a record of up to 54 basis points for the weighted euro-area average (see chart on page 22). In Germany the swap spreads peaked at ¾ percentage point in mid-August concurrently with the end of the UMTS auctions. Since then they have narrowed slightly.

On the whole, states which anticipate or have already experienced similar supply squeezes from the sale of mobile phone licences are showing a smaller yield gap vis-à-vis German benchmark bonds than other countries. If the movement in the interest rate spreads of other euro-area countries vis-à-vis Germany is compared with the level of their licence auction proceeds, a negative correlation can be identified. The higher the proceeds in a given country, the less its government bond yield has moved away from its German counterpart. By contrast, in those countries in which expectations of supply shortages in the market for government bonds have remained within narrow bounds, swap spreads are small, yet the interest rate differentials compared with Germany are relatively large.

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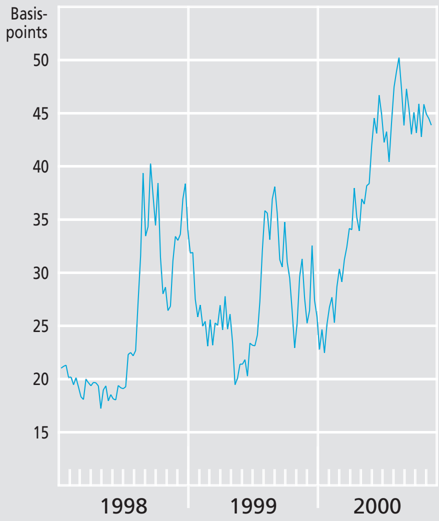
Average swap spreads
in the euro area *

Weekly averages



Source: Primark-Datasteam, Bundesbank calculations. — * Weighted average of the differences between the rates on ten-year interest rate swaps and the yields on outstanding ten-year government bonds of the euro-area countries; GDP-weighted.

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ture repurchasing of Federal securities is envisaged – except in the case of a debt security issue of the Currency Conversion Equalisation Fund – market players are expecting the supply of Federal bonds to contract in future on account of increased redemptions. Even the announcement of a larger-than-expected volume of issues for the fourth quarter failed to dampen the demand pressure in the government bond market. The interest rate spread between ten-year debt securities issued by domestic banks and comparable Federal bonds, which had widened appreciably in spring, thus has not narrowed, amounting in mid-November to 60 basis points.

A large financing requirement arose in the telecommunications sector, which led to increased issuance of corporate bonds even prior to the auction of the UMTS licences. However, these were launched via foreign financing subsidiaries, with the result that they do not show up in the domestic sales statistics. Nevertheless, in summer corporate bond yields in the German capital market rose temporarily, and hence the interest rate spread of such bonds over Federal paper widened as well. As there are next to no signs of any increase in the risk of debt securities outstanding, this indicates a declining risk propensity on the part of the investors. The share prices of telecom firms were likewise negatively affected in the light of their huge financing requirements coupled with the fact that the associated revenues are not expected to flow until well into the future (see page 23 ff).

Inflation expectations only marginally higher

The continuing flat yield curve in the market for Federal securities and the stable level of interest rate swaps, which are less influenced by liquidity considerations, indicate that market players' inflation expectations in Germany and throughout the euro area remain within narrow bounds. That conclusion is borne out by surveys of economic agents' assessment of the long-term price outlook. For example, the inflation expectations culled by the Consensus Forecast in October for the average of the next ten years in Germany amounted to 1.7 %. The real capital market rate for the ten-year maturity range expected by the market in October (calculated as nominal yields less inflation expectations) was thus 3¾ %, compared with around 4 % on average during the 1990s. Hence both the real and nominal level of long-term interest rates still offer German businesses favourable financing terms.

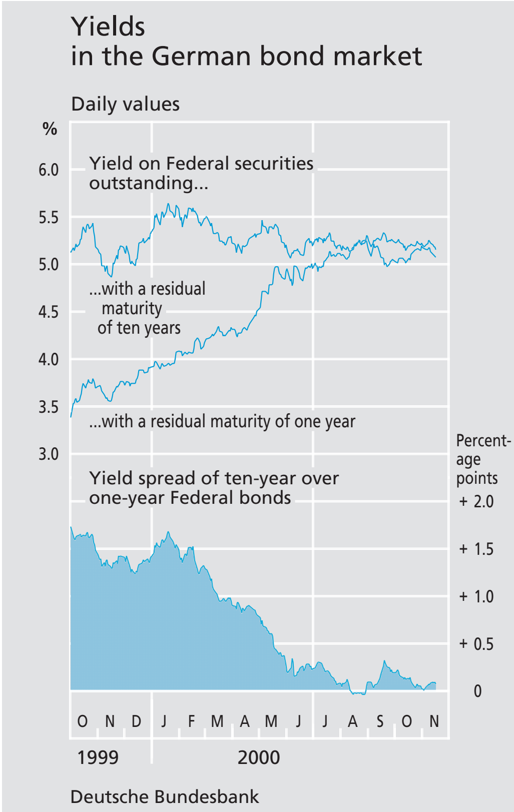
Higher bank rates

Short-term bank interest rates rose distinctly in the third quarter. In October banks charged 9 % for current account credit (for a credit volume of DM 1 million to less than DM 5 million), which was 0.4 percentage point more than in July. A similar interest rate rise was evident for personal credit lines, which cost 12 ½ % on average when this Report went to press. In October time deposits at one month's and three months' notice (for an investment volume of DM 100,000 to less than DM 1 million) attracted just under and just over 4 % interest, respectively; that was around 0.3 percentage point more than in July. Since October 1999 the rates for short-term bank loans and time deposits have increased by approximately 1½ percentage points, which means that they have gone up more slowly than central bank interest rates. Long-term bank rates – like capital market yields – have changed only marginally of late. Mortgage loans at a rate of interest locked in for ten years continued to cost 6 ¾ % in the past four months. The effective interest rates for long-term fixed-rate loans to enterprises rose slightly to 7 ¼ % (for a credit volume of DM 200,000 to less than DM 1 million) and 7 % (for a credit volume of DM 1 million to less than DM 10 million).

Share prices

Equity market still in correction phase

The consolidation in the German equity market that began in the second quarter of 2000 has continued of late. From their peak in March to the time this Report went to press, share prices had fallen by 23 % measured by the comprehensive CDAX share price index.



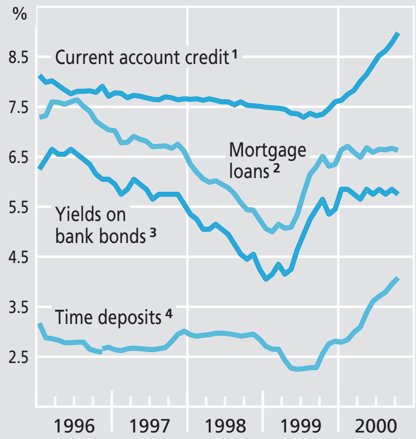
As a result, German equities fared worse than the European average. Compared with end-1999 they were down by 8 %. In the context of this ongoing correction of share prices, uncertainty on the German stock exchanges remained initially low. At the beginning of September the expected share price volatility of the German blue-chips which make up DAX, as measured by the VDAX index, reached its lowest level since 1997. However, the volatility of share price levels then rose temporarily in the wake of stronger share price fluctuations in late September and early October.

Individual market segments still showing different trends

In recent months the individual segments of the German equity market were affected by the consolidation process to varying degrees and for a time even showed contrary price trends. As on other major stock markets, the

Bank interest rates in Germany

Monthly averages



1 DM 1 million and more, but less than DM 5 million. — 2 On residential property; effective interest rate, fixed rate over ten years. — 3 With a mean residual maturity of over nine to ten years. — 4 Time deposits with an agreed maturity of one month (up to and including October 1996: a maturity of between one and three months), for amounts of DM 100,000 and more, but less than DM 1 million.

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value of firms in the technology, media and telecommunications (TMT) industries plummeted. These stocks, which are mostly listed on the *Neuer Markt,* lost more than half of their market value up to mid-November compared with their peak level in spring. Vis-à-vis the end of 1999 they were down by 34 %. Telecoms prices dropped by the biggest margin, losing 63 % of their capitalisation compared with the record level they had reached in March and 44 % since the beginning of the year. By contrast, the market values of non-TMT sectors climbed to a new high at the beginning of November following a fairly continuous rally.[1] But since then those share prices, too, have declined slightly. On balance, the stock market quotations of German non-TMT firms were still 4 % ahead of their end-1999 level.

The pronounced volatility of many technology stocks listed on the *Neuer Markt* was caused by substantial uncertainty as to the future trend in the market value of these mostly young firms. The insolvency of two enterprises listed on the *Neuer Markt* confirmed fears expressed in the United States and Germany concerning apparently unwarranted expectations of success and the deteriorating credit standings of some high-tech companies. The NEMAX-All-Share price index, which comprises all equities traded on the *Neuer Markt,* was recently trading 61 % below its peak of March 10. Its level was 27 % down on the end of 1999.

Borrowing in the securities markets

Sales of bonds

Borrowing via the issuance of domestic debt securities slackened in the third quarter. Gross sales of bonds and notes issued by domestic borrowers, calculated at market prices, totalled € 183.9 billion. Although this was slightly higher than in the previous quarter, after subtracting redemptions and taking account of the changes in issuers' holdings of their own bonds, net domestic bond sales, at € 38.3 billion, raised less than in the preceding three months (€ 52.3 billion).[2] By contrast, sales of foreign bonds, at € 21.2 billion, were more than twice as high as in the second quarter (€ 9.9 billion). German investors exclusively bought foreign debt securities

1 Measured by Primark-Datastream's market-wide sectoral indices.
2 As from the beginning of the year 2000, the figures discussed here also contain debt securities issued by non-banks with an original maturity of up to and including one year plus commercial paper.

denominated in euro or one of its national currency units. Most of these issues were launched in other euro area countries.

Lower sales of bank debt securities

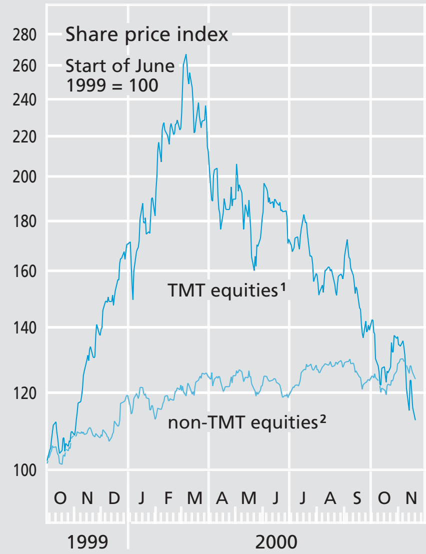
Banks were the principal beneficiaries of the resources raised from sales of domestic debt securities. Between July and September they sold their own debt securities for € 30.7 billion net, compared with € 45.4 billion in the second quarter. The bank debt securities sold primarily took the form of paper issued by specialised credit institutions, at € 11.2 billion, and other bank debt securities, which yielded € 10.0 billion. Net sales of mortgage *Pfandbriefe* amounted to € 4.9 billion, while public *Pfandbriefe* fetched € 4.6 billion. Corporate bonds were sold in the net amount of € 6.1 billion, which was twice as much as in the second quarter. € 1.6 billion net accrued to government from the issuance of its debt securities, compared with € 3.7 billion in the preceding three months and € 12.5 billion in the third quarter of 1999.

Issuing activity in the equity market

At € 5.5 billion, the market value of the new shares placed in the German equity market by domestic enterprises in the third quarter was distinctly less than the corresponding second-quarter figure of € 8.0 billion. By contrast, foreign enterprises accommodated equities worth € 42.8 billion net in the domestic market, as against € 27.7 billion in the preceding quarter. Issuing activity was noticeably subdued on the *Neuer Markt,* in particular, in the wake of the ongoing slide in share prices and low interest shown by investors. The placement volume dropped by 45 % against the second quarter to around € 2 billion (see chart on page 27). Whereas in July

Price movements in the equity market

Daily values, log. scale



Source: Primark-Datastream. — 1 Shares of firms in the technology, media and telecommunications (TMT) industries. — 2 Total market excluding TMT shares.

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20 firms went public via the *Neuer Markt,* less than ten firms listed in each of the following three months. Since the beginning of this year 127 new issues have taken place in this market segment. As a result, the total number of enterprises listed on the *Neuer Markt* has increased to 328, of which 54 are foreign firms.

Investment activity in the securities markets

Purchases of bonds

Foreign investors were the principal buyers in the bond market in the third quarter. On balance, they bought domestic debt securities for € 21.0 billion, compared with € 35.4 billion between April and June. Private-sector paper predominated, accounting for € 13.8

Investment activity in the German securities markets

€ billion; in 1999 excluding money market paper

Item	2000 April to June	2000 July to Sep.	1999 July to Sep.
Bonds and notes 1			
Residents	26.7	38.6	40.0
Credit institutions 2	22.2	19.6	20.5
of which Foreign bonds and notes 3	5.6	9.6	11.9
Non-banks 4	4.6	18.9	19.5
of which Domestic bonds and notes	0.2	7.3	14.3
Non-residents 3	35.4	21.0	36.3
Shares			
Residents	– 4.5	37.9	19.9
Credit institutions 2	– 28.1	– 2.6	– 0.7
of which Domestic shares	– 31.7	– 1.0	– 1.5
Non-banks 4	23.6	40.4	20.6
of which Domestic shares	– 0.6	– 3.9	– 1.0
Non-residents 3	40.2	10.5	10.6
Investment fund certificates			
Investment in specialised funds	8.5	9.5	7.7
Investment in funds open to the general public	8.0	7.7	9.5
of which: Share-based funds	9.1	8.9	3.9

1 Since the beginning of 2000 including debt securities issued by non-banks with an original maturity of up to and including one year plus commercial paper. — 2 Book values, statistically adjusted. — 3 Transaction values. — 4 Residual.

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billion. Domestic credit institutions invested € 19.6 billion net in bonded debt during the period under review, compared with € 22.2 billion in the previous quarter. They added equal amounts of domestic and foreign debt securities to their portfolios. Within the category of domestic bonds, credit institutions concentrated their interest exclusively on bank debt securities (€ 16.3 billion), whereas they sold public paper and corporate bonds on balance. Domestic non-banks increased their bond holdings by € 18.9 billion net, compared with € 4.6 billion in the second quarter. They mainly purchased foreign debt securities (€ 11.7 billion).

Purchases of shares

Domestic non-banks were the principal purchasers on the share market in the third quarter. They bought equities to the net value of € 40.4 billion, compared with € 23.6 billion between April and June. As in the preceding quarter, they bought foreign shares and sold domestic equities on balance. Foreign investors increased their portfolios of German stock by € 10.5 billion net, as against € 40.2 billion in the second quarter. Credit institutions sold German shares worth € 1.0 billion and foreign equities for € 1.5 billion.

Investment fund certificates

Sales of investment fund certificates of domestic investment companies stabilised in the third quarter. At € 17.2 billion, they slightly exceeded the sales volume between April and June. Foreign investment funds sold certificates to the value of € 8.2 billion, which was somewhat less than the result of € 9.7 billion for the second quarter.

Between July and September institutional investors placed new resources amounting to € 9.5 billion net in specialised funds (preceding period: € 8.5 billion). At € 6.5 billion, two-thirds of this sum accrued to mixed securities-based funds. Domestic funds open to the general public raised € 7.7 billion net from the sale of certificates, which was a little less than in the previous quarter. As between April and June, share-based funds attracted the bulk of these resources, with inflows of € 8.9 billion net. By contrast, bond-based funds and money market funds recorded outflows on balance of € 2.3 billion and € 1.7 billion, respectively. So far this year retail investors have already invested € 30.9 billion on balance in share-based funds. Despite the ongoing consolidation in the equity markets, therefore, shares continued to attract the interest of private investors.

Deposit and lending business of monetary financial institutions (MFIs) with domestic customers

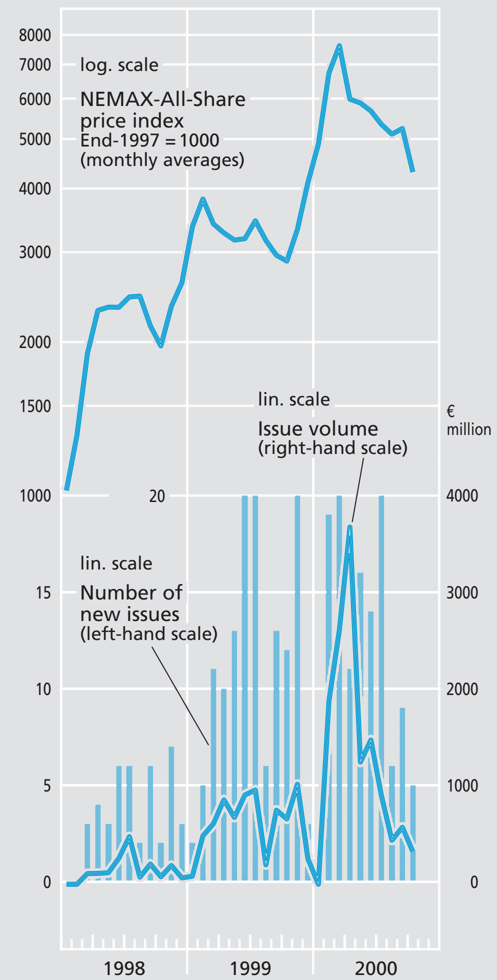
Continuing decline in overnight deposits

In the deposit business of German MFIs, the overnight deposits of domestic customers declined considerably in the third quarter of 2000, measured on a seasonally adjusted basis. Against the background of rising short-term interest rates and the associated increase in the opportunity cost of holding cash and cash equivalents, the level of liquid funds continued the return to normal which had begun in the previous three months, after stocks of overnight deposits had expanded sharply following the launch of monetary union and during the phase of strong expectations of interest rate rises at the start of the year. Over the past 24 months their volume has nevertheless grown at an annual rate of 10 %.

Marked increase in shorter-term time deposits

These interest rate-related portfolio shifts particularly benefited deposits with an agreed maturity of up to two years, which carry a market rate of interest. In seasonally adjusted terms, however, their increase was concentrated on the month of September, when deposits lodged hitherto in the Euro-market were retransferred to Germany. Deposits with an agreed maturity of up to two years expanded overall by € 18.3 billion during the third quarter, compared with € 4.3 billion in the preceding three months. By contrast, deposits with an agreed maturity of more than two years rose hardly at all in the period under review. They increased by merely € 0.6 billion between July and September, compared with € 2.6 billion in the second quarter

Price movements and issuing activity in the *Neuer Markt*



Source: Daily data of Deutsche Börse.

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and € 7.5 billion in the third quarter of last year. The quite moderate rise, compared to the preceding quarters, in longer-term time deposits of domestic insurance enterprises, which traditionally constitute the most important component of deposits with an agreed maturity of more than two years, was unable to offset the sustained fall in longer-term time deposits of employed persons and

Moderate expansion of longer-term time deposits

Movement of the lending and deposits of monetary financial institutions (MFIs) in Germany *

€ billion

Item	2000 July to Sep.	1999 July to Sep.
Deposits of domestic non-MFIs 1		
Overnight	− 13.6	+ 3.5
With agreed maturities		
up to 2 years	+ 18.3	+ 0.9
over 2 years	+ 0.6	+ 7.5
At agreed notice		
up to 3 months	− 16.6	− 3.8
over 3 months 2	+ 5.1	− 2.2
Lending		
Lending to domestic enterprises and individuals		
Loans	+ 23.0	+ 23.5
Lending against securities	+ 5.0	+ 3.5
Lending to domestic public authorities		
Loans	− 8.8	− 1.1
Lending against securities	− 5.8	+ 1.2

* As well as banks (including building and loan associations, but excluding the Bundesbank), monetary financial institutions (MFIs) here also include money market funds; see also Table IV.1 in the Statistical Section of this Report. — 1 Enterprises, individuals and public authorities. — 2 Savings deposits.

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other individuals in the third quarter to the same extent as in the first half of the year.

Further fall in savings deposits at three months' notice

The fall in deposits with an agreed period of notice of three months continued during the period under review. A declining trend was recorded not only by the traditional savings deposits but also by the special savings facilities attracting a higher rate of interest which, with a share of almost 70 %, make up the bulk of deposits redeemable at three months' notice. Even though the month-on-month decline has decelerated somewhat, it underscores the low attractiveness at present of such forms of saving. Savings redeemable at three months appear to have been shifted to some extent into more highly remunerated fixed-term deposits, but in part they seem also to have been transferred into longer-term savings deposits redeemable at a period of notice of over three months, whose interest rate advantage over conventional savings accounts has likewise widened perceptibly in the wake of the higher interest rates in banks' lending and deposit business. They grew by € 5.1 billion between July and September, whereas in the third quarter of 1999 they had contracted by € 2.2 billion.

Slight rise in lending to the private sector ...

MFI lending to domestic enterprises and individuals picked up in the third quarter, after having been rather slack in the preceding three months, largely as a result of extensive disposals of securities by German MFIs in connection with forward transactions. However, loans to the domestic private sector, which are not affected by such transactions, grew only a little faster than in the previous quarter after seasonal adjustment. They expanded at a seasonally adjusted annual rate of just under 5 ½ %, following 4 ½ % in the second quarter. The growth of loans was again fuelled principally by an increase in medium and long-term borrowing.

... especially to manufacturing firms

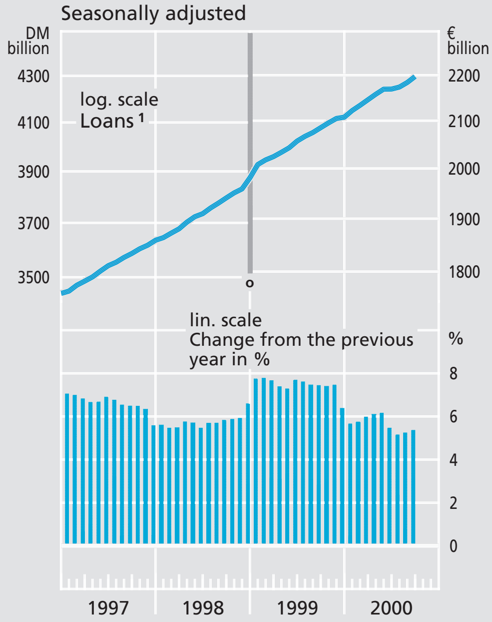
Looking at the different categories of borrowers, lending to enterprises expanded in the third quarter after having been rather slack in the preceding three months. Besides the manufacturing sector, firms in the energy and water supply and mining industries considerably stepped up their level of borrowing from domestic MFIs. On the other hand, borrowing by private individuals was moderate, just as it had been in the second quarter, while lending to the housing sector weakened.

Marked decrease in public sector debt

The level of indebtedness of German public authorities to domestic MFIs decreased by € 14.6 billion in the third quarter of 2000, compared with a marginal increase of € 0.1 billion one year earlier. For one thing, domestic MFIs ran down their stocks of domestic government bonds by € 5.8 billion. For another thing, loans to the public sector – especially to the Federal Government – were curtailed by € 8.8 billion. The Federal Government presumably used the proceeds from the sale of UMTS mobile phone licences partly to replace such loans and partly to build up its deposits with the domestic banking system. The total deposits held by the Federal Government and its special funds with German MFIs increased by € 13.3 billion.

Loans to domestic enterprises and individuals

Seasonally adjusted



1 End-of-month level; excluding statistical changes. — o Figures in euro from 1999.

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