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Focus on Austria

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Contents

Readily available information about the current term structure of interest rates, its level and recent trends in important countries has become a standard tool of monetary policy analysis. Interest rate curves can be used for inflation and output forecasts, they may give useful indications about the differences in regional monetary stance and contain information about market expectations of future changes in interest rates. This information can alleviate the implementation of monetary policy, for example by judging the timing of the Bank's market operations. For comparative purposes it is important to use a common technique to estimate the term structure for all countries. This report presents the results of estimating parametric models of the term structure for Austria, Germany, U.K., U.S.A. and Japan over the period 1993 to 1998.

The opinions expressed in the section *"Studies"* are those of the individual authors and may differ from the views of the Oesterreichische Nationalbank.

Reports

Austria

January 1999

21 The Base Rate and Reference Rate Regulation (Basis- und Referenzzinssatzverordnung) is promulgated in accordance with the First Euro-Related Amendment to Civil Legislation promulgated in August 1998, which provided for the substitution of the base rate for the discount rate and of the reference rate for the lombard rate. In line with a recommendation of the OeNB, the Regulation stipulates that the ESCB's interest rate for the deposit facility will serve as the basis for changes in the base rate, while the ESCB's interest rate for the marginal lending facility will serve as the basis for changes in the reference rate. This means that the base rate stands at 2.5% at the beginning of 1999, while the reference rate comes to 4.75%.

Eurosystem

December 1998

22 The Governing Council of the ECB announces the interest rates for the first refinancing operations of the Eurosystem. The interest rate for the first main refinancing operation, which will be a fixed-rate tender to be allotted on January 5, 1999, is set at a level of 3%. The Governing Council furthermore decides that the interest rate for the marginal lending facility will be set at a level of 4.5% and the interest rate for the deposit facility at a level of 2%. As a transitional measure, between January 4 and 21, 1999, the corridor between the interest rates on the two standing facilities is narrowed, with the marginal lending rate set at 3.25% and the deposit facility rate at 2.75%.

January 1999

22 The Governing Council of the ECB decides to revert to the interest rates on the Eurosystem's two standing facilities which it had set for the start of Stage Three, i.e. to set the interest rate for the marginal lending facility at a level of 4.5% (previously: 3.25%) and that for the deposit facility at a level of 2.0% (previously: 2.75%).

Economic Background

Overview

Recent evidence points to a marked setback in Austrian exports in the third quarter of 1998: Preliminary, seasonally adjusted data show the growth rate of goods exports to have turned negative by comparison with the second quarter. Against this background, manufacturing output growth continued to decelerate in the predominantly export-oriented sectors of the economy.

This downward tendency is corroborated by the quarterly national accounts compiled by the Austrian Institute of Economic Research (WIFO). These data show GDP growth to have slowed to 2.7% in the third quarter year on year, down from the first two quarters (+4.4 and +4.3%). The main factor underpinning output growth was private consumption; its year-on-year rise of 2.0% indicates, by comparison with the first (+1.0%) and second quarter (+2.3%), a stable growth path. By contrast, export growth and capital spending decelerated in the third quarter. Goods exports, which had advanced by 8.2 and 12.6% in the first half, augmented just 4.2% year on year between July and September. With import growth rates likewise contracting, if at a slower pace (+6.4%), the contribution to annual growth from net exports was therefore negative. The bleaker prospects for the export industry also fed through to capital spending: The growth rate of gross fixed investment dropped to 4.9% in the third quarter, from annual percentage changes of 10.4 and 6.4% in the first half.

While the decline in investment did not come as a surprise, the export setback appears to have been somewhat stronger than projected. As far as overall 1998 results are concerned, the impact of the deceleration will be limited. For 1999 the slowdown would, however, induce a negative base effect should the data for the fourth quarter, which are not yet available, corroborate the downtrend. This might necessitate a moderate downward revision of the growth forecast for 1999. Nevertheless, for the time being there is no case for abandoning the baseline projection – stable private consumption and a recovery of exports in the second half of 1999 – presented in the "Economic Outlook for Austria from 1998 to the Year 2000" (see Focus on Austria, issue 4/1998).

Employment figures already available for the fourth quarter of 1998 do, in fact, point to a further weakening of the export-oriented sector. Manufacturing industry payrolls declined 0.1% year on year in the fourth quarter, while they had still risen 2.5% in the second quarter.

Turndown in Exports

In 1997, exports of goods surged 16.8% and imports of goods jumped 10.9% in nominal terms according to the Austrian Central Statistical Office's foreign trade statistics. As a consequence, the trade deficit improved by ATS 32.5 billion, and net exports of goods (according to the national accounts) contributed 0.9 percentage points to GDP growth. The gratifying development of exports can be ascribed to the growing interlinkage of world trade in general and more specifically to the dynamic growth of Austrian export markets (+7 1/2%) and the marked improvement of Austrian relative unit labor cost compared to trading partner countries. Moreover, the real effective exchange rate of the Austrian schilling deteriorated 3.3% in 1997.

In terms of industrial unit labor cost, Austria's price competitiveness in fact augmented by no less than 5.4%. Last but not least, 1997 results were boosted by the exceptionally buoyant growth of exports to transition economies (+33.7%), which contributed 5.2 percentage points to export growth.

By contrast, the first three quarters of 1998 saw a pronounced contraction of export growth, notwithstanding the fact that, cumulatively, January-through-November exports and imports still exceeded the respective 1997 figures by 7.4 and 7.1%. The aggregate growth rates obscure a significant cascading downtrend which is evidenced by a quarterly breakdown. Measured as annual percentage change over the same quarter a year earlier (annual rate), exports grew 15.2% in the first, 8.4% in the second, and finally 3.9% in the third quarter. The respective import growth rates came to 14.0, 7.6 and 4.0%.

Actually, even the changes over the same quarter a year earlier paint too favorable a picture. The annual rates are inflated by the robust growth of goods exports in the first half of 1998 over the first half of 1997, which translated into a strong base effect. As is evident from Table 1, which shows quarterly rates (percentage change over the previous quarter) on the basis of preliminary, seasonally adjusted data, the growth rate of goods exports even turned slightly negative in nominal terms in the third quarter against the second quarter.[1]) Data currently available point toward continued weak growth in the fourth quarter of 1998.

Table 1

Foreign Trade Growth Rates

Seasonally adjusted percentage change over the previous quarter

		Exports	Imports
		%	
1997	1st quarter	+4.2	+1.8
	2nd quarter	+6.1	+3.8
	3rd quarter	+3.2	+4.6
	4th quarter	+2.8	+2.2
1998	1st quarter	+1.5	+1.1
	2nd quarter	+0.8	+0.7
	3rd quarter	−1.0	+0.5

In 1997, the deficit of the Austrian current account had corresponded to 1.9% of GDP. Eleven months into 1998, a slight improvement on the year-earlier figures is apparent, the gap having narrowed by ATS 7.1 billion year on year to ATS 46.0 billion (on a cash basis). By major subaccounts, the deficit on merchandise payments deteriorated by ATS 2.4 billion to ATS 59.5 billion, whereas the services surplus grew ATS 12.8 billion to ATS 37.2 billion. The latter was largely driven by an improvement of the travel balance by ATS 8.9 billion to ATS 18.7 billion.

Manufacturing Output Dampened by Weak Export Growth

According to a business survey conducted by the Austrian Central Statistical Office, manufacturing output had increased 5.6% in 1997. Output continued to rise throughout the first ten months of 1998, but at an expansion of 4.2% the preliminary 1998 result clearly fell short of the 1997 average. Here too a quarterly breakdown indicates a marked slowdown in the course of the year: Year-on-year growth rates dropped from 5.0 and 5.5% in the first half to 1.9% in the third quarter of 1998.

Business expectations for future developments have been getting gloomier since the first quarter of 1998. According to the WIFO business survey of October 1998, the number of companies banking on output increases shrank to 2% net (as offset by companies expecting output drops). The downward trend is especially conspicuous with basic and intermediate goods, whereas the outlook for the capital and consumer goods industries continues to be favorable.

Ongoing Impetus from Consumer Demand

With a growth rate of 1.5%, domestic demand had been rather muted throughout 1997. By contrast, as 1998 progressed, growth was being more and more led by consumer demand, which was fueled by the fact that real disposable incomes rebounded in 1998, following two years of decline. Consumption growth is anticipated to stay resilient also in 1999 thanks to the improved employment situation and the planned tax reform.

The preliminary national accounts compiled by the WIFO apart, this development is most conspicuous in retail trade turnover and consumer confidence. Retail sales grew 3.3% (year on year) in the third quarter of 1998 in real terms. Sales of consumer durables, which are more sensitive to changes in personal incomes, advanced at a faster clip (+4.9%) than nondurable consumer goods (+2.4%). Evidently households are now making up for purchases of durable consumer goods put off during the past two weaker-income years.

The December 1998 Consumer Confidence Barometer points to sustained robust consumer confidence. Sentiment indexes suggest that consumers felt much more upbeat about both their own financial situation in the upcoming 12 months and the condition of the economy in general than a year earlier. There is no evidence of a dip in consumer confidence toward year-end.

Mixed Labor Market Situation

The situation on the labor market varied a lot 1998, basically because labor supply was very high while labor demand strengthened or slowed in close alignment with cyclical developments throughout the year. At the beginning of the year the manufacturing industry was hiring on a large scale. But as exports weakened and output growth started to be led by domestic demand rather than exports, employment growth stagnated in the manufacturing industry, while it increased in the service sector.

Whereas in the second quarter of 1998 employment growth in the manufacturing industry was 2.5% above the corresponding 1997 figure, it even contracted by 0.1% year on year in the fourth quarter. Meanwhile, payrolls in the service sector were rising as the year progressed (year-on-year changes: +0.7% in the second quarter; +1.9% in the fourth quarter).

Average 1998 employment growth largely obscures the divergent developments apparent during the year: In terms of annual averages, payroll expansion was fairly balanced between the manufacturing industry (+1.1%) and the service sector (+1.3%). Total employment climbed 0.6% on average in 1998; when persons doing compulsory military service and persons on paid parental leave are factored out, the labor force actually expanded by 1.0%. Aggregated employment figures point to a loss of momentum in the second half of the year. From a peak of 1.0% in July, the monthly addition to the payroll dropped to 0.6% in December.

Net employment growth must be seen against the background of a significant expansion of labor supply in response to a number of special factors which reinforced the underlying tendency of labor supply to grow at a much faster rate when the economy is expanding. In the wake of various legislative changes certain groups that display a strong tendency to taking part-time jobs (women in particular) entered the labor market in large numbers. Evidently they met up with adequate demand – in turn fueled by measures to make the labor market more flexible –, with the result that the bulk of 1998 employment growth can be ascribed to part-time jobs (based on micro-census data compiled by the Austrian Central Statistical Office).

The increased labor supply also triggered a 0.1% rise of the annual unemployment rate to 7.2%. This development is, however, put into perspective somewhat by the fact that there continues to be a potential for part-time jobs, which should, in turn, keep pushing up the employment rate.

Austria Remains a Price Stability Leader in the EU

Austria has been among the countries with the lowest inflation rates in the EU since 1997. The inflation rate according to the Harmonized Index of Consumer Prices (HICP) ran to 0.8% in 1998 (1997: 1.2%), and the CPI rate equaled 0.9%. As 1998 progressed, the uptick of prices diminished steadily. In December 1998, HICP inflation amounted to just 0.6% year on year, down from 1.0% in May. In January 1999, the HICP rate of inflation was a mere 0.3%.

Several factors have coincided to produce this inflation result. To begin with, a moderate wage policy pursued since 1995 caused real wages to drop 1.1% on balance between 1996 and 1997. Moreover, world market prices for nonenergy raw materials sank some 10%, and oil prices by even roughly 30% in the first few months of 1998. The weakness in commodity prices drove energy prices at the consumer level down 4.6% year on year, translating into a 0.4% drop of the overall HICP. The weaker commodity prices may have played a major role in pushing down the wholesale price index, which in December 1998 was 2.3% below the corresponding 1997 figure. Last but not least, lower food prices also contributed to the reduction of the inflation rate.

In a reversal of a two-year downward trend, the effective exchange rate of the Austrian schilling started to rise again toward the middle of 1998. The December index of nominal exchange rates stood 1.6% above the corresponding 1997 figure. With an annual increase of 0.5%, the upward movement of the real effective exchange rate index was much slower; it was dampened by the negative inflation differential.

1 *Comparisons with the same period a year earlier tend to give rise to so-called (positive) phase shifts. In other words, current developments will manifest themselves in annual percentage changes only with a certain time lag. This is why, in monitoring economic developments, it is important to adjust economic data for seasonal variations.*
The negative export growth rate for the third quarter of 1998 should, incidentally, not be overrated because the data are after all preliminary. Lately the preliminary foreign trade data have always been lower than the revised data. Furthermore, quarterly growth rates are principally subject to a somewhat higher unsystematic volatility than cumulative figures.

Development of Selected Economic Indicators

	1997	1998	1999[1])	2000[1])	last recently available period 1997	1998
	Annual change in %					
Economic output					*1st to 3rd quarter*	
Real GDP at 1983 prices	+ 2.5	+ 3.3[1])	+ 2.4	+ 2.7	+ 2.1	+ 3.8
thereof: investment	*+ 2.8*	*+ 4.8[1])*	*+ 3.2*	*+ 3.8*	*+ 2.4*	*+ 6.9*
private consumption	*+ 0.7*	*+ 1.8[1])*	*+ 2.0*	*+ 2.2*	*+ 0.4*	*+ 1.8*
Productivity					*January to October*	
GDP per employee	+ 2.4	+ 2.3[1])	+ 1.7	+ 1.9	×	×
Industrial output	+ 5.3	+ 5.5[1])	+ 3.0	+ 4.0	+ 5.0	+ 4.9
Productivity per hour	+ 6.6	+ 5.0[1])	+ 4.0	+ 4.3	×	×
Labor market					*January 1998*	*January 1999*
Dependent employment	+ 0.3	+ 0.7	+ 0.8	+ 0.9	+ 0.6	+ 0.7
Registered unemployment	+ 1.2	+ 1.9	− 0.8	− 3.3	+ 1.4	+ 0.1
	%					
Unemployment rate						
EU concept	4.4	4.5	4.4	4.3	4.4	4.3
National concept	7.1	7.2	7.1	6.8	9.1	9.1
	Annual change in %					
Prices						
National CPI	+ 1.3	+ 0.9	+ 1.0	+ 1.2	+ 1.2	+ 0.5
HCPI	+ 1.2	+ 0.8	×	×	+ 1.2	+ 0.3
Wholesale price index	+ 0.4	− 0.5	×	×	+ 0.2	− 2.3
Wages						
Negotiated standard wage rate index	+ 1.8	+ 2.2	+ 2.8[2])	+ 2.8[2])	+ 2.4	+ 2.4
Unit labor cost						
General	− 1.3	+ 0.1[1])	+ 1.1	+ 0.9	×	×
Manufacturing industry	− 5.0	− 3.1[1])	− 1.3	− 1.4	×	×
Relative unit labor cost[3])						
Vis-à-vis major trading partners	− 4.9	− 1.2[1])	− 0.6	− 1.1	×	×
Vis-à-vis Germany	− 0.6	− 0.7[1])	− 0.6	− 0.5	×	×
External trade (ÖSTAT)					*January to November*	
Imports, in nominal terms	+10.9	+ 7.1[1])	+ 6.0	+ 8.1	+13.5	+ 7.1
Exports, in nominal terms	+16.8	+ 8.3[1])	+ 6.6	+ 8.1	+10.0	+ 7.4
	ATS billion					
Balance of payments[4])					*January to December*	
Current account balance	−61.4	−53.1[1])	−45.4	−43.1	−44.7	−41.9
Goods balance	−52.0	×	×	×	−57.0	−62.9
Service balance	+12.7	×	×	×	+28.4	+42.8
Travel balance[5])	+10.8	+21.2	+37.1	+44.7	+10.8	+21.2
	%					
Interest rates					*December*	
Call money rate	3.27	3.36	×	×	3.46	3.22
					January 1998	*January 1999*
Eonia	×	×	×	×	×	3.14
Secondary market yield (government bonds)[6])	5.68	4.71	4.30	4.80	5.19	3.84
	Annual change in %					
Effective exchange rate					*December*	
Nominal	− 2.3	+ 0.6	+ 1.2	+ 0.3	− 1.7	+ 1.6
Real	− 3.3	− 0.1	+ 0.2	− 0.6	− 2.9	+ 0.8
	% of GDP					
Budget						
Net central government debt	2.6[7])	2.5[7])	2.5[7])	2.8[8])	×	×
Net general government debt	1.9[7])	2.1[7])	2.0[7])	2.3[9])	×	×

Source: OeNB, ÖSTAT, WIFO, AMS, Association of Austrian Social Security Institutions.

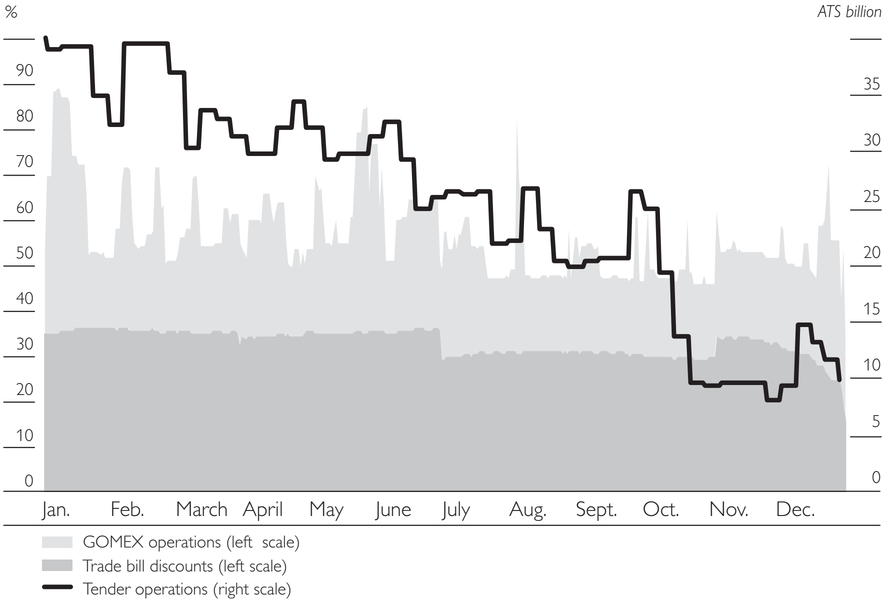
[1]) WIFO forecast of December 1998.
[2]) Change in gross earnings per employee.
[3]) Manufacturing industry.
[4]) Interim cash balance.
[5]) Forecast based on the old balance-of-payments concept (including international passenger transport).
[6]) Ten-year federal government bonds (benchmark).
[7]) Budget notification of March 1999.
[8]) According to the Austrian Stability Program (baseline scenario): 2.2% of GDP.
[9]) According to the Austrian Stability Program (baseline scenario): 1.7% of GDP.

Liquid Money Market Conditions

The Austrian money market was highly liquid throughout 1998. Measured against the refinancing limits set by the central bank, somewhat more liquidity was injected into the banking sector than in 1997. The bulk of central bank funds was made available in the weekly tender operations through which liquidity was controlled. In the first quarter of 1998, liquidity demands were comparatively high so that on average more than 90% of the funds earmarked for tender operations were allocated. Subsequently the allocation rate dropped continuously, to 75% on average in the second, 58% in the third and 31% in the final quarter of 1998.

Refinancing of Banks at the OeNB in 1998

recourse to refinancing facilities and tender allocation rates

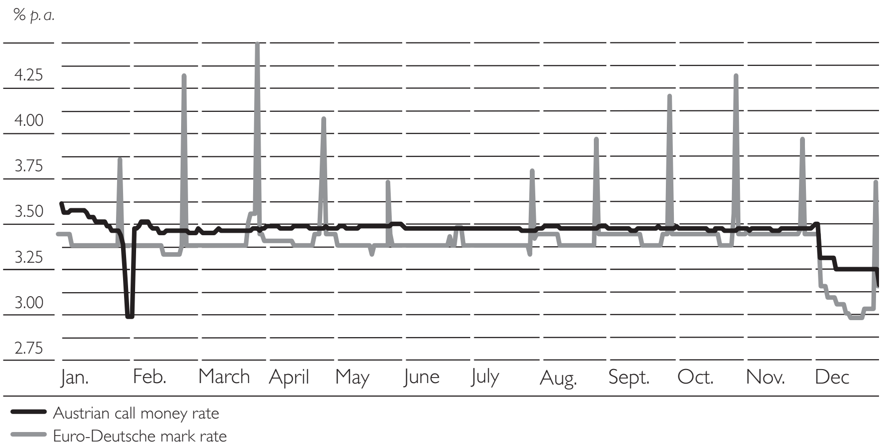


Source: OeNB.

Schilling money market interest rates remained very stable throughout 1998, with the exception of a brief nosedive of the call money rate below the level of the tender rate to an exceptionally low 2.95% at the end of January/beginning of February. For the remainder of the year the call money rate moved within a very narrow range between 3.35 and 3.40% until the cut in the OeNB's key rate in December triggered a drop to 3.18%. Apart from the temporary end-January fall of the call money rate and repeated end-month surges of the euro-Deutsche mark rates, schilling short-term interest rates stood slightly above the comparable euro-Deutsche mark rates all through 1998. The interest rate differential vis-à-vis the Deutsche mark continued to be positive even after the preannouncement of the bilateral conversion rates of the euro area currencies.

In a coordinated round of interest rate cuts by all ESCB central banks, the OeNB reduced its tender rate from 3.20 to 3.00% on December 3, 1998. It subsequently moved to lower its interest rate for short-term open market operations (GOMEX rate) by 20 basis points to 3.20% with effect from December 11, 1998. The discount rate (2.5%) and the lombard rate (4.75%) were left untouched in the period under review.

Call Money Rates Austria – Germany 1998



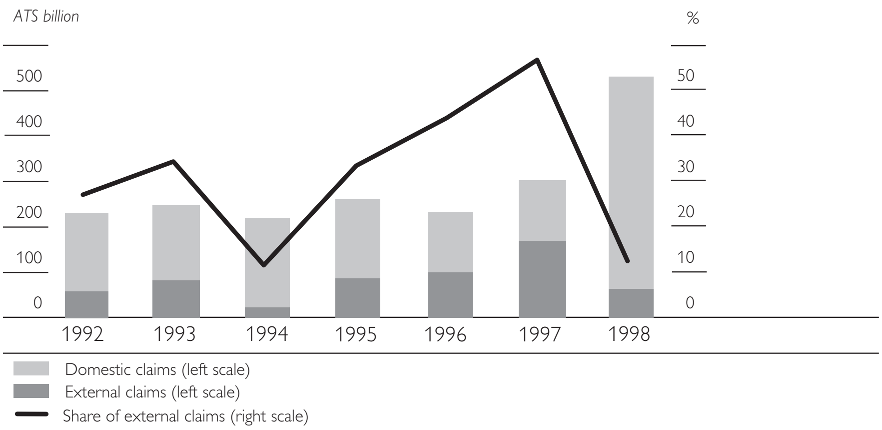
Source: OeNB.

Balance Sheet Growth Largely Driven by Domestic Interbank Business

1998 saw a much heftier expansion of Austrian banks' balance sheet total than the previous years. On balance, the total grew by ATS 617 billion (EUR 45 billion) or 10.2% to ATS 6,617 billion (EUR 481 billion). Contrary to 1997, when banks' external business had been the mainstay of growth, growth of this position decelerated strongly as 1998 progressed. External transactions accounted for a mere 12% of the overall expansion of the balance sheet in 1998, with external claims (+ATS 74 billion, +EUR 5.3 billion) augmenting at a lower rate than external liabilities (+ATS 97 billion, +EUR 7.1 billion).

A major part of the expansion of the balance sheet total is attributable to livelier domestic interbank business, the bulk of which can, in turn, be traced to intra-group reallocations made in the process of restructuring. Overall

Balance Sheet Growth



Source: OeNB.

interbank claims grew by ATS 340 billion (EUR 25 billion), and interbank liabilities rose by ATS 347 billion (ATS 25 billion). In domestic nonbank business, most of which was conducted in foreign currency, claims rose somewhat more rapidly in 1998 than in previous years. Lending to nonbanks augmented by ATS 129 billion (EUR 9.4 billion) to ATS 2,766 billion (EUR 201 billion). Deposits placed by nonbanks rose by ATS 110 billion (EUR 8.0 billion) to ATS 2,294 billion (EUR 167 billion). Among deposits, savings deposits advanced by ATS 30 billion (EUR 2.2 billion) on the 1997 year-end figure to ATS 1,648 billion (EUR 120 billion), but solely thanks to the year-end capitalization of interest totaling ATS 47 billion (EUR 3.4 billion).

Marked Setback in International Business from Mid-Year 1998 Onward

The external business of banks operating in Austria lost considerable momentum as 1998 progressed, eventually contributing a mere 12% to the expansion of the balance sheet total (down from 56% in 1997). On balance, external claims accounted for 23% of the balance sheet total, which is a drop of 1.2 percentage points from 1997. In 1998, external claims rose by ATS 74 billion or 5.1%, while external liabilities mounted ATS 97 billion or 5.9%. Austrian banks' net liabilities vis-à-vis nonresidents thus reached ATS 223 billion.

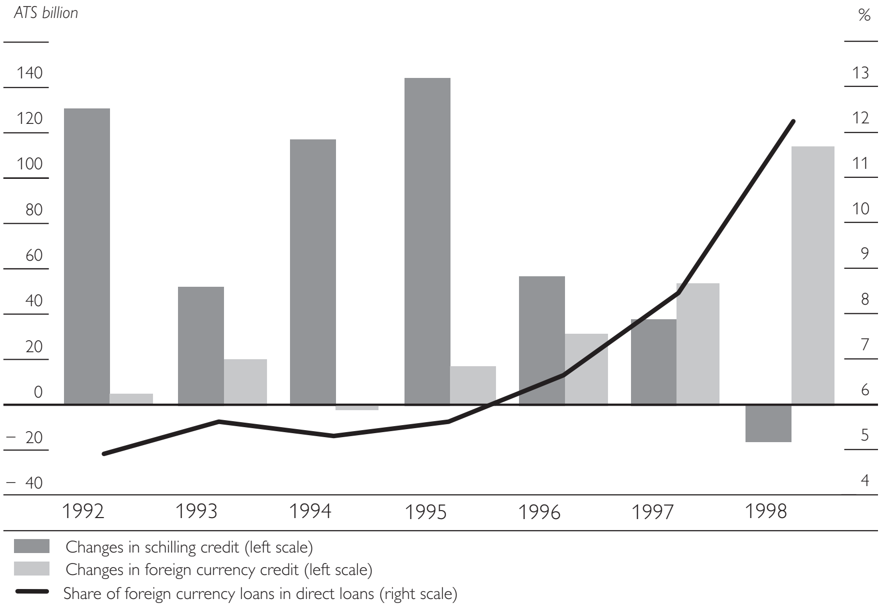
Against the background of the global financial market turmoil, credit institutions retrenched considerably in their cross-border business from mid-year onward. As is evident from the balance of payments, the external claims of Austrian banks shrank ATS 81 billion from August to October 1998 alone. In particular, credit institutions limited their exposure to foreign banks, cutting lending positions by ATS 145 billion in the second half of the year. At the same time they were a lot more cautious about new lending to foreign nonbanks, which edged up by ATS 39 billion or 9.9%. While this was less than half the 1997 growth rate, the increase was still twice as high as the expansion of claims on domestic nonbanks. The only field in which domestic credit institutions continued to markedly step up their foreign activities even beyond the summer of 1998 was foreign portfolio and direct investment.

Also on the liabilities side, Austrian banks significantly cut their interbank positions in the second half of 1998, by ATS 82 billion on balance. The volume of issues launched on international capital markets in the second half corresponded to a mere tenth of first-half flotations. By contrast, deposits placed by nonresidents rose more rapidly than in the previous year, namely by 10.9%. They grew ever more strongly as the year progressed, with second-half additions alone surpassing the final 1997 result.

Pronounced Expansion of Foreign Currency Loans

Direct lending to residents grew by ATS 98 billion or 3.7% in 1998, just marginally faster than in 1997 (+3.6%). With respect to borrowing groups, direct lending – including securitized lending – to domestic nonbanks rose by ATS 129 billion in 1998 (1997: +ATS 100 billion) to ATS 2,766 billion. As in the previous year, the public sector further trimmed its bank liabilities, while households and business corporations expanded their liabilities vis-à-vis banks at roughly the same rate as a year earlier (1998: +6.3%; 1997: +6.4%). Banks' claims considerably accelerated as the year progressed; growth practically doubled from the first half (+ATS 45 billion) to the second half of the year (+ATS 84 billion), with fourth-quarter results again outpacing third-quarter results.

Changes in Direct Lending



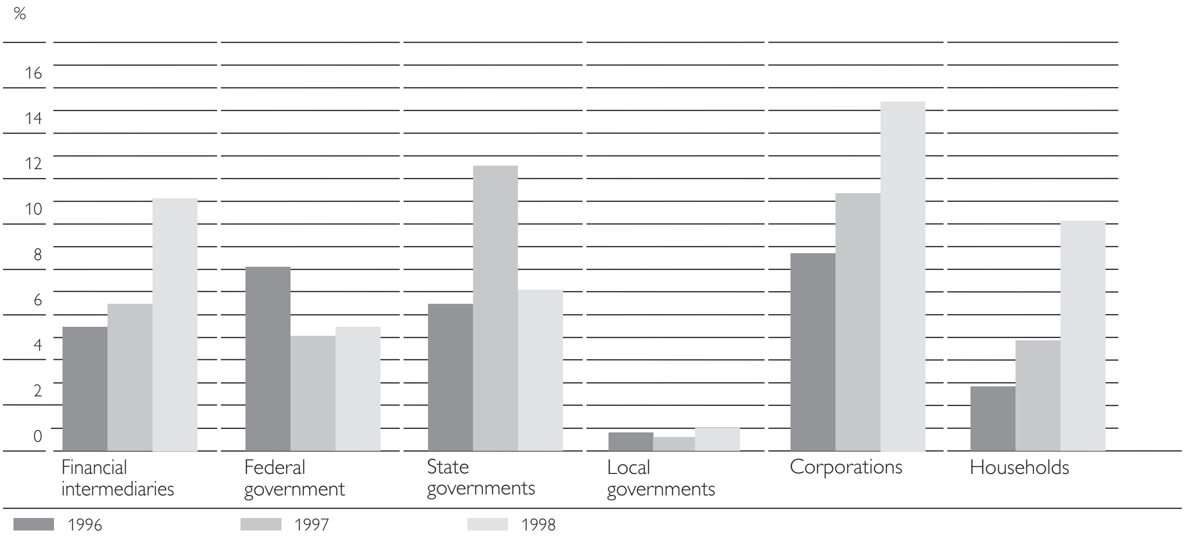
Source: OeNB.

1998 saw a further acceleration in the shift from schilling credit to foreign currency credit. While schilling-denominated loans gradually contracted, foreign currency loans expanded more and more strongly, jumping ATS 80 billion in the second half of 1998, up from +ATS 35 billion in the first half. Notwithstanding the low and sinking nominal interest rates payable on schilling credit, the even lower interest rates which a number of foreign currencies continue to carry made such financing particularly attractive.

With households accounting for almost one third of the foreign currency loan expansion, their share in total foreign currency loans more than doubled in 1998. Of all personal loans outstanding in 1998, already more than 10% were denominated in foreign currency, as opposed to less than 3% two years ago. The past two years saw a doubling of the share of households in banks' total foreign currency claims on nonbanks to 20%. Like households, the corporate sector also markedly raised its foreign currency loans, by ATS 75 billion to ATS 237 billion. The public sectors' foreign liabilities, by contrast, went down further. After the federal government had slashed its foreign currency liabilities by half in 1997, the state governments reduced their foreign currency loans by 43% in 1998.

In anticipation of the changing role of *bills of exchange* in bank refinancing in European Monetary Union and due to a change in the handling of export credits, total discount credits declined strongly during the final months of 1998. The volume outstanding (including rediscounts) shrank by two thirds to ATS 18 billion year on year.

Foreign Currency Loans in Percent of Total Borrowing by Sector



Source: OeNB.

Growth of total housing loans slowed to +5.7% in 1998, down from +6.2% in 1997. Subsidized housing loans contracted by 4.3%, causing the share of subsidized credit in housing loans to drop from 47.6 to 43.1%.

Interests payable on loans were trimmed further by banks in the course of 1998. Between January and December 1998, the average interest rate for commercial loans sank from 6.54 to 6.12%, and for personal loans from 7.81 to 7.16%. Only the discount rate rose a few basis points in the final months of 1998, after the phasing out of rediscounts had made discount credits markedly less attractive.

Securitized loans including GOMEX transactions shrank in 1998 as in the previous year (–ATS 24 billion or –6.1%). Loans denominated in foreign currency expanded sharply, more than doubling over the year, while schilling loans dropped.

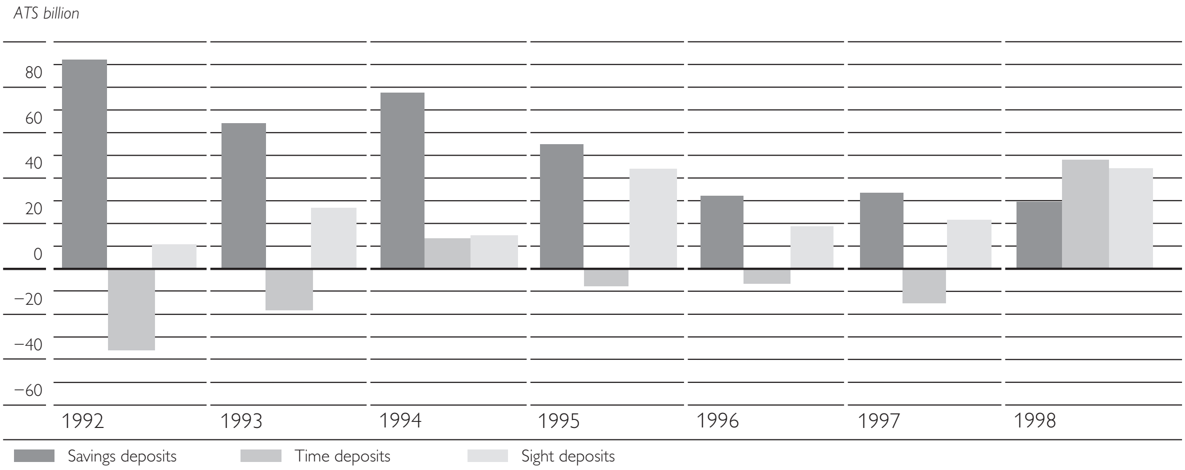
The volume of domestic bank bonds rose more steeply than a year ago (+17%), while the volume of corporate bonds sank 7.7%. Stocks contracted as well, but more and more mutual funds shares were incorporated into banks' portfolios (+35.1%; both in schilling and in foreign currency).

The bulk of domestic interbank business growth can be traced to foreign currency transactions. On balance, credit institutions' interbank claims progressed ATS 340 billion or 38% in 1998, and their interbank liablities rose ATS 347 billion or 37%. The lion's share of these gains is attributable to intra-group reallocations made in the wake of company restructurings. Even when these one-off effects are excluded, interbank volumes still rose between 10 and 12%. Part of the increment is attributable to the unwinding of bill-of-exchange positions when the export refinancing scheme was changed.

Sharp Increase in Commerical Bank Deposits in December

Deposits placed with credit institutions rose ATS 110 billion in 1998, at a much faster clip than in 1997 (+ATS 39 billion). This surge can be traced above all to the strong rise of sight and time deposits in December 1998, when business corporations alone upped their respective deposits by ATS 55 billion. By comparison, the December 1997 increase had equaled a mere ATS 4 billion. In other words, the hefty rise registered in December 1998 certainly cannot stem from capitalized interest alone.

Change in Schilling Deposits



Source: OeNB.

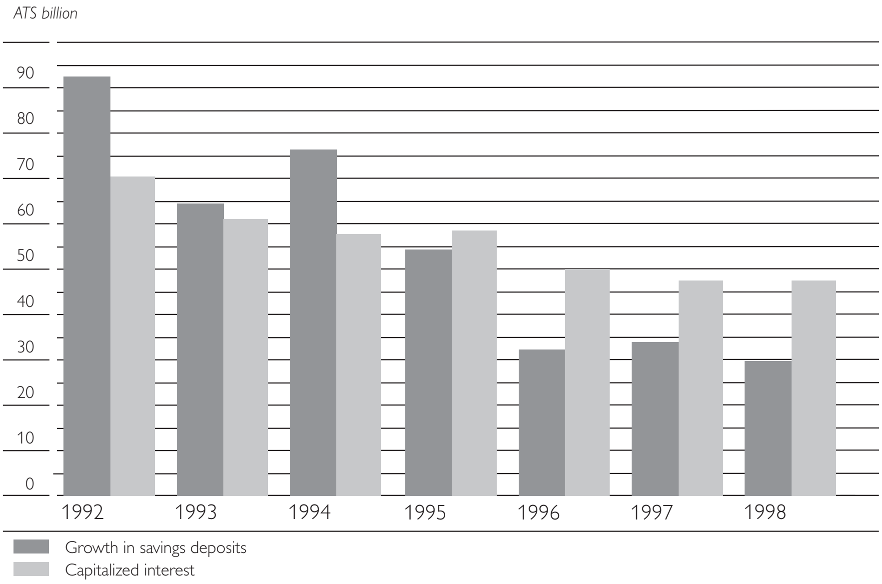
Sight deposits in particular had expanded sharply already in the months leading up to December, since the opportunity cost of holding such assets was low amid the low level of nominal interest rates. Business corporations and households augmented their deposits by larger volumes than the year before, while public sector deposits remained practically unchanged. On balance, sight deposits grew ATS 44 billion or 15% in 1998 (1997: +ATS 22 billion or +7.6%).

Time deposit business was slack in the first eleven months. In December it picked up again because, as in previous years, the public sector boosted its time deposits in that month. When those public sector deposits are factored out, the growth rate was even negative from the summer onward.

Until the fall of 1998, savings deposits continued to downtrend, as in the previous two years. On balance, they advanced ATS 30 billion or 2.5% over the year-end 1997 figure, with the gain again trailing interest capitalized at year-end (ATS 47 billion, same as last year). When capitalized interest is deducted, 1998 was in fact the fourth year in a row that saw a contraction of savings deposits.

Foreign currency deposits posted record growth rates in the first three quarters but subsequently slipped below the year-end 1997 figure (1998: –ATS 12 billion).

Savings Deposit Growth and Capitalized Interest



Source: OeNB.

Outstanding own domestic issues (paper sold to other banks and open market transactions excluded) dropped ATS 15 billion or 2.5% to ATS 592 billion.

Equity Ratio Rises to 13.50%

Banks' own funds rose ATS 37 billion or 9.3% in 1998 to reach ATS 433.2 billion, less strongly than in 1997 when they had expanded by ATS 50.0 billion or 14.3%. Banks' equity ratio according to § 23 of the 1993 Austrian Banking Act thus climbed from 12.94% in 1997 to 13.50%. Other than in 1997, core capital (tier I capital), which mounted by 13.9%, accounted for the bulk of own funds. By contrast, supplementary capital (tier II capital) only inched up 2.4%. In this process the share of core capital in banks' own funds increased from 69.7 to 72.6% in 1998.

Balance of Payments in the First Three Quarters of 1998

As the following report refers to an observation period before the start of Stage Three of EMU, figures are still presented in Austrian schillings. However, to take account of the new framework conditions, which have been in place since January 1999, the key items of the Balance of Payments Summary Table are given both in ATS (Table 1a), as usual, and in euro (Table 1b).

The values shown in the euro table are based on the conversion rate of December 31, 1998: EUR 1 = ATS 13,7603.

1 Current Account[2])

With recording governed by the transaction principle, Austria's current account closed the first three quarters of 1998 with a deficit of about ATS 40 1/2 billion, which compares with a shortfall of ATS 41 billion in the analogous 1997 period (see Table 1a).

This almost unchanged deficit masks a significant jump of around ATS 15 1/2 billion in the services surplus, which was, however, canceled out by the contraction of the other main subaccounts of the current account.

The uptrend of Austria's quarterly transaction-based current account abated over the course of the year. While the first quarter of 1998 outperformed last year's first-quarter result by about ATS 2 1/2 billion, the positive differential narrowed to around ATS 3/4 billion in the second quarter. A further decline by approximately ATS 2 1/2 billion followed in the third quarter. According to preliminary data no further decrement is to be expected for the fourth quarter of 1998, so that the annual current account deficit will most likely be around 2% of GDP.

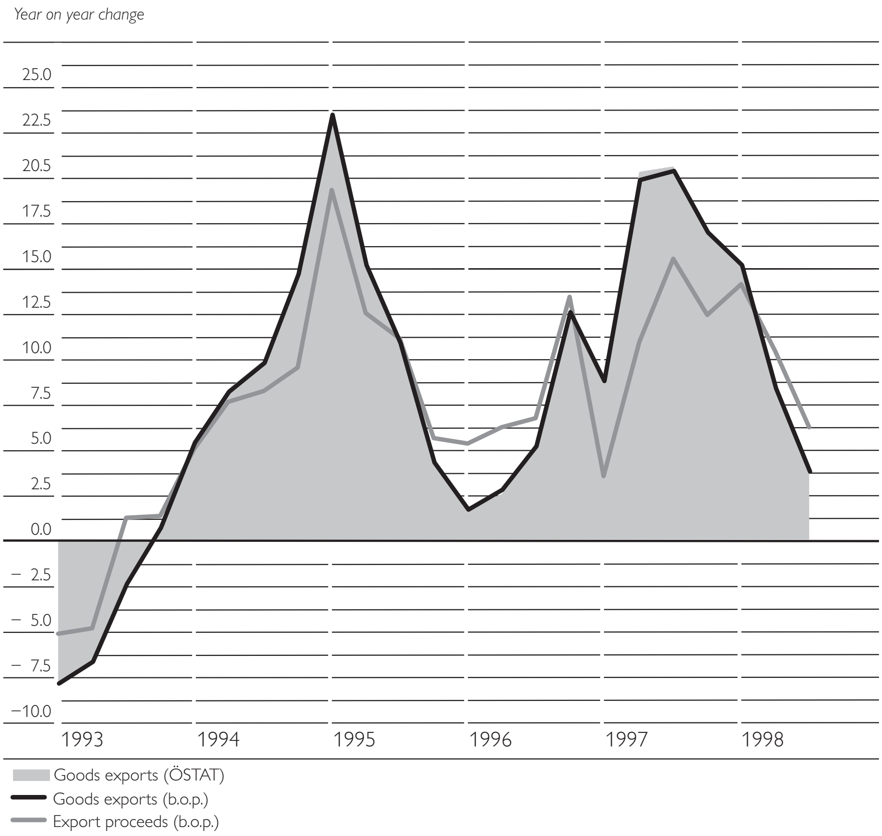
1.1 Goods

In the past few quarters, foreign trade growth rates trended pronouncedly downwards with regard to both imports and exports. This is evidenced not only by the foreign trade statistics as compiled by the Austrian Central Statistical Office (ÖSTAT), but also by goods imports and exports as well as merchandise payments as presented in the balance of payments (see chart).

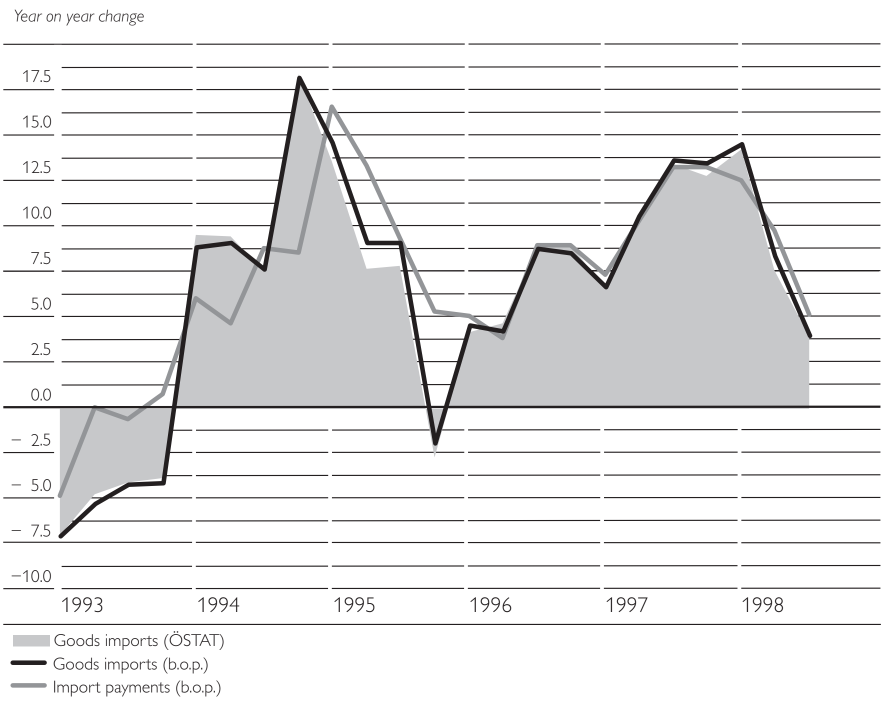
Judged by growth rates, the most recent business cycle of Austria's external trade, which had started in 1996, surpassed its peak around the turn of the year 1997 to 1998 and has since been regressing towards its initial level. According to the foreign trade statistics, exports were the first to be hit by the downtrend. In fact, the growth rate recorded by goods exports descended to 9% in the first nine months, down from 16 1/2% in the corresponding 1997 period. By contrast, imports, edging down from somewhat over 10 to about 9%, registered a markedly smaller contraction. Goods imports were ATS 46 billion higher than goods exports in the first three quarters of the year under review. As a result, the balance on goods transactions trailed the corresponding 1997 figure by almost ATS 3 1/2 billion.

As payments grew at a more moderate pace during the upswing, merchandise payments did not match the massive trade account amelioration of the first three quarters of 1997. Not only did the figures not advance substantially; they even deteriorated slightly during that period. In 1998, the

Exports



Imports



balance on export proceeds and import payments, by contrast, showed a marked advancement over the course of the year, which, in turn, fed through to the current account. This is most noticeably evidenced by the reduction in the negative balance on "unclassified transactions" of close to ATS 9 billion.

The data for foreign trade analyses by geographic area and commodity category, respectively, are still gleaned from the ÖSTAT merchandise statistics, according to which the balance on exports and imports amounted to –ATS 62 1/2 billion in the first three quarters of 1998. In other words, it had deteriorated by almost –ATS 2 1/2 billion on the corresponding 1997 period. While the current external trade cycle was initially carried by extraordinary growth rates vis-à-vis third countries, in 1998, it was primarily driven by goods transactions effected within the EU. Compared to 1997, the structurally negative trade balances with the euro area and the EU, respectively, improved by about ATS 2 billion. The trade balance with Austria's most important trading partner Germany worsened by almost ATS 1 billion, whereas the balance with Italy shot up by ATS 5 billion. Following the considerable gains recorded vis-à-vis Central and Eastern European countries in 1997, the goods subaccount contracted by nearly ATS 4 billion over the course of 1998. Nevertheless trade with these countries registered a surplus of almost ATS 23 billion. The trade balance with the U.S.A. improved by roughly ATS 2 billion; the balance with Japan, however, worsened by slightly less than ATS 3 billion.

By commodity category, only semimanufactured goods scored an above-average increase in exports in the first three quarters of 1998. With regard to imports, merely energy imports showed a contraction. The improvements achieved in these categories were, however, more than offset by the drag from consumer goods and, above all, capital goods.

1.2 Services

The surplus on the services subaccount surged by ATS 15 1/2 billion to over ATS 35 billion in the first nine months of 1998, with travel contributing around 50% to this gain.

1.2.1 Travel[3])

According to the 1998 quarterly data already available, travel profited both from continued efforts to enhance the supply structure and from the stable price level prevalent in Austria. Foreign exchange receipts, which were significantly higher than in previous years, combined with a decrease in foreign exchange outlays resulted in a rise of the travel surplus by ATS 7 1/2 billion to ATS 19 billion.

Foreign exchange receipts (see Table 4) from nonresident vacationers advanced by 4% or over ATS 4 billion to ATS 111 1/2 billion in the first three quarters of 1998. Tourist bednights only climbed by 1 1/2% in the like period, with stays in first-rate hotels mounting and stays in no-frills accommodations falling. The gains were primarily accounted for by Italian, British and overseas tourists; Germans' overnight stays, by contrast, remained stagnant. The uptrend regarding tourists from Central and Eastern Europe held, but their market share is still limited to not much more than 3%.

It is interesting to note that after six consecutive years in which *foreigners' bednights* had consistently receded, the summer season of 1998 for the first time again registered an increase by a good 2%, which almost offset the loss of the previous summer.

At the same time, Austrians' *travel expenses* abroad sank, what with the moderate 1996/97 wage increases, by over 3% or ATS 3 billion to ATS 92 billion in the first three quarters of 1998.

1.2.2 Other services items

The surplus on the other services items augmented by a total of ATS 8 billion to ATS 16 billion in the first nine months of 1998. As mentioned above, this was primarily due to "unclassified transactions" (basically the balance on goods transactions and merchandise payments), which advanced by almost ATS 9 billion. Furthermore, the "transport" and "other business services" (including e.g. technical consulting) balances improved by about ATS 3 billion each. All the other services items not explicitly named here deteriorated by a total of over ATS 6 billion, however.

1.3 Income

In the first three quarters of 1998, the income subaccount was in deficit by almost ATS 10 billion. During the like period of 1997, cross-border transactions had almost been in balance. As Austria posted a positive net balance on the "compensation for employees" item of around ATS 5 billion both in the 1997 and 1998 period, the only changes concerned the "investment income" item (see Table 6).

The significance of *investment income* is underlined by the fact that at about 10%, the share held by gross investment income in the total current account is more or less on a par with that of travel. While Austrian investors managed to lift their income on investment by about ATS 4 billion from 1997 to 1998, foreigners boosted their income on investments in Austria by roughly ATS $13^1/_2$ billion in the like period.[4]) On balance, this brought about a deterioration of ATS $9^1/_2$ billion, some ATS $2^1/_2$ billion of which were accounted for by net direct investment income, ATS 5 billion by net portfolio investment income and ATS 2 billion by income on other investment[5]). Direct investment income showed an upward tendency both on the assets and the liabilities side. But since the liabilities side still outweighs the assets side in income terms, both sides trending towards growth portends a further worsening of net direct investment income.

Net income on portfolio investment shrank by around ATS 5 billion, which is mainly traceable to the drop in financial derivatives based on interest-rate contracts (–ATS $3^1/_2$ billion) and in income on money market paper. Compared to the corresponding 1997 period, net income on debt securities changed only by ATS $^1/_2$ billion to –ATS 18 billion in the first three quarters of 1998. In line with Austria's securities-related liabilities vis-à-vis foreign residents, Austrian debtors forked out ATS $40^1/_2$ billion worth of income to foreign investors, while interest payments on foreign securities held by Austrians only ran to ATS $22^1/_2$ billion. Income on equity securities stood at about ATS 2 billion on the assets side and at slightly less than

ATS 3 billion on the liabilities side, so that the negative balance hardly budged on the corresponding 1997 period.

1.4 Current transfers[6])

In the first three quarters of 1998, the balance on current transfers amounted to close to –ATS 20 billion compared to –ATS 18 billion in the analogous 1997 period, with the deterioration basically attributable to private transfers, above all tax payments.

EU transactions

The current transfers item covers most of Austria's transactions with the EU, yet part of them are categorized under the capital account (contributions to infrastructure projects). Like in the first three quarters of 1997, Austria's expenditure amounted to about ATS 22 billion in the period under review, while its receipts totaled roughly ATS 11 billion.

2 Capital account[7])

Capital transfers encompass transactions in cash, such as the purchase of patents, the sale of customer bases, transfer fees for professional athletes and the like on the one hand, and transactions in kind, such as EU subsidies granted to infrastructure projects (see above), private sector debt forgiveness, migrants' transfers, legacies, foundations newly set up and the like on the other hand.

The capital account edged up from slightly below ATS 1 billion to about ATS $1^1/_2$ billion in the first three quarters of 1998.

3 Financial account

The assets side of the financial account (see Table 7) reflects changes in direct investment abroad, net acquisitions of foreign securities including the change in interest accrued, deposits placed and lending as well as the transactions-induced change in official reserves. Financial accounts assets closed the first three quarters of 1998 with net capital exports of ATS 192 billion. In the period under review, a hefty 74% of total assets was accounted for by foreign securities. Equity capital invested abroad and external foreign deposits and loans of nonbanks also held relatively high shares of close to 15% each.

On the liabilities side, net capital imports covering direct investment in Austria, the purchase of domestic securities, deposit-taking and borrowing amounted to ATS 238 billion in the first three quarters of 1998. Similar to the developments on the assets side, the gains exceeded the additions recorded in the years 1994 to 1997, and the predominance of securities is also noteworthy on the liabilities side (67%). Bank deposits and loans as well as direct investment in Austria held about 20 and 15%, respectively.

When financing of the negative current account balance via capital imports is measured against the entire liabilities side of the financial account, the share of capital imports amounts to 17%, which lies below the 1994 to 1997 average. This indicates that a further rise in transactions has strengthened Austria's financial cross-border ties rather than served to finance current account deficits.

3.1 Direct investment

On the back of continued investment activity in the third quarter, direct participations significantly grew year on year both on the assets and the liabilities side in the first three quarters of 1998.

At ATS 26 billion, total outward direct investment recorded in the first three quarters of 1998 exceeded the corresponding 1997 figure by more than ATS 9 billion. Net acquisitions of equity holdings in companies (including property) came to ATS 20$^1/_2$ billion, thus falling only marginally short of total 1997 participations. The remainder of asset-side direct investment to the tune of about ATS 6 billion basically concerns earnings ploughed back into direct investment enterprises already in existence, as loans among affiliated enterprises in net terms remained unchanged on the assets side.

Third-quarter investments in equity holdings were carried by a few large-scale projects in industry and trade, which concerned above all EU countries. Outward direct investment was thus dominated by the trade sector and oil companies over the course of 1998. The banking sector's activity was limited to medium-sized investments, which altogether accounted but for a minor share in the total volume. Compared to overall 1997 figures and with regard to a regional breakdown of direct investment, Eastern Europe's current share shrank during the first nine months of 1998 in light of the somewhat greater momentum in EU and overseas countries.

Inward direct investment, which ran to almost ATS 37 billion in the first three quarters, already eclipsed the total annual turnover of the previous year by more than ATS 8 billion. Here, a good ATS 22 billion can be ascribed to net acquisitions of new equity capital (participation in companies, including plants and premises) and approximately ATS 12 billion to ploughed-back earnings. In addition, credits to affiliated enterprises pushed up liabilities by ATS 2$^1/_2$ billion in the first three quarters.

The third quarter saw sizeable investments, e.g. in the areas of telecommunications as well as media and publishing. Over the whole of the year, participations in the energy sector, in telecommunications and media and publishing predominated. Apart from that, the banking and manufacturing industries registered a few major investments as well. Holding a share of nearly 75%, investors resident in EU countries are clearly the most important players.

3.2 Portfolio investment

Capital transactions in securities in the first three quarters of 1998 were performed amid consistently low interest rates, the convergence of ten-year government bond yields among the currencies slated for amalgamation on January 1, 1999, the depreciation of major global currencies against the euro currencies, and high volatility in stock and bond markets since the summer, not least in response to the financial crises in Russia and Asia.

Preliminary data indicate that domestic investors did not resort to selling off larger portions of debt or equity paper of the countries hit by the crises. Neither did the decision of May 1998 on which Member States would participate in Monetary Union drive Austrian investors into large-scale portfolio rebalancing.

Domestic investors increased their stocks by acquiring additional paper and accruing interest due by tallying a transaction value of more than ATS 141 billion. This translates into a gain of slightly less than 20% on the 1997 portfolio investment stock as at year-end. Even though fixed-income debt securities are still the primary growth driver, equity securities have due to, above all, performance factors been gaining ground at the expense of bonds and bond-based investment certificates.

At the end of the first three quarters of 1998, acquisitions of fixed-income long-term securities including interest payments due ran to a transaction value of ATS 98 billion and, thus, already matched the 1997 total. In the third quarter, domestic investors boosted their claims by ATS 31 billion, which about equals the gains registered in the previous two quarters.

Austrians' third-quarter investment activity in long-term fixed-income paper almost exclusively centered on currencies slated for substitution by the euro on January 1, 1999. In other words, there was no departure from a trend which had already been observed in 1997 and had continued into the first half of 1998. Some 60% of all investment in bonds and other debt securities was denominated in euro area currencies, with Deutsche mark paper holding the lion's share at 50%. Securities denominated in Greek drachma and U.S. dollars were also sought after.

Of the expansion of portfolios through acquisitions and interest accrued over the first nine months of 1998, about ATS 57 billion were accounted for by gains in banks' holdings and ATS 44 billion stemmed from institutional investors' portfolios. By contrast, private investors appear to have maintained or to even have scaled down some of their positions.

The transaction-induced advances of foreign equity paper came to ATS 41 billion in the first three quarters of 1998, with foreign stocks and other equity securities accounting for ATS 29 billion and ATS 12 billion for foreign investment certificates. In the stock and other equity paper category, listed stocks from Germany, the United Kingdom, France and the United States took the lead. Almost all of them were acquired by institutional investors. With regard to investment certificates, mainly stocks and mixed funds were in demand and attracted both institutional investors and private households in more or less equal parts.

In the first three quarters of 1998, total net sales (including the increment of interest payments due) of domestic securities to *nonresident investors* ran to about ATS 158 billion, which is in excess of some ATS 20 billion of the corresponding 1997 total. Compared to Austrian portfolio investment stocks abroad as at year-end 1997, this was tantamount to a transaction-induced increase of 13%. While foreign investors committed funds to bank and government bonds, bank stocks and domestic investment certificates, stocks of Austrian companies were mainly bought by residents.

Through transactions at a value of ATS 37 billion, foreign investors boosted their holdings of domestic long-term government bonds in the third quarter. Here, they primarily topped up or supplemented existing bond issues. Over the course of the first nine months of 1998, foreign investors augmented their portfolios by ATS 93 billion via acquisitions and interest accrued (1997 total: +ATS 28 billion).

In a reversal of a trend evident in the first two quarters, long-term bank bonds no longer played a significant role in the third quarter of 1998. While the first half saw a hefty expansion of cross-border net sales of bank issues on the primary market, increased net redemptions (especially in September 1998) even triggered a capital export in the third quarter. However, cumulatively all transactions performed between January and September 1998 resulted in a net rise of domestic long-term bank paper held by foreigners to the tune of ATS 42 billion. This value corresponds to the annual 1997 outcome.

Foreigners unloaded over ATS 3 billion in several domestic bank and industry ATX stocks in the third quarter of 1998, in particular in August and September. This move may have been due to the fact that foreigners were concerned about Austrian banks' and businesses' exposure to Russia, which they considered to be high. As a relatively large volume of domestic bank stocks had been snapped up at the beginning of 1998, the first three quarters recorded a cumulative capital import from the sale of bank stocks to nonresidents of around ATS 6 billion. Austrians invested about the same worth in corporate stocks.

Domestic investment certificates continued to be sold abroad at a steady pace (third quarter 1998: about ATS 3 billion). Nonresident investors were particularly keen on buying into mixed funds (48% of total third-quarter purchases). By the close of the first three quarters of 1998, net sales of domestic investment certificates had racked up ATS 11 billion.

Since both domestic and foreign investors upped their cross-border stocks through transactions, net liabilities from portfolio investment increased by ATS 17 billion in the first three quarters of 1998. This – relative to the assets-side transaction flows – rather low value has been observed since 1997 already.

Compared to the years 1992 to 1996[8]), 1997 saw a pronounced narrowing of the margin between the transaction-induced rise in foreign securities held by domestic investors and the stock of domestic securities held by foreigners; it amounted to a mere ATS 14 billion against the previous average of ATS 40 billion.

The increases on both sides also entailed a shift in the structure of the International Investment Position towards a rising share of securities in cross-border portfolios.

3.3 Other Investment

Claims arising from other investment (deposits placed, loans granted and other capital transactions) grew by ATS 28 billion in the first three quarters of 1998. This capital export corresponds to an increment of cross-border stocks derived from other investment of less than 3% on 1997 year-end figures. Contrary to the trend of recent years, banks did not propel this development. On the opposite, they trimmed their deposits to such an extent that even stepped-up lending did not cancel out the former's reduction. As a result, assets shrank by some ATS 3 billion on balance. As in 1997, the private sector further boosted its credit position abroad (augmentation of claims in the first three quarters of 1998: ATS 10 billion); plus the public sector placed term money abroad (ATS 12 billion).

With regard to liabilities, banks dominated external financing in the form of deposits taken and credits taken out. All in all, foreign capital inflows amounted to about ATS 42 billion, translating into a 4% rise on the 1997 year-end stock.

On balance, capital transactions on the assets and liabilities sides resulted in a net capital import of around ATS 14 billion in the first three quarters of 1998 compared to ATS 23 1/2 billion in the like 1997 period.

3.4 Reserves

Official reserves saw a transaction-related reduction of some ATS 4 billion in the first three quarters of 1998. This contraction was primarily caused by the liquidation of time deposits (ATS 15 billion), which was offset by securities purchases (ATS 8 billion) and an increase in the Reserve Position at the IMF (ATS 3 billion). Official reserves at market prices, thus, lie some 1 1/2% below the 1997 year-end figure (taking into account transactions only).

1 *Transaction-based balance.*

2 *As of the review period of January 1998, the Oesterreichische Nationalbank has been compiling Austria's balance of payments according to a new concept. For a detailed overview of the new concept and definitions of the Austrian b.o.p. statistics, see "Conceptual Changes in the Austrian Balance of Payments" in "Focus on Austria" issue 2/1998.*

In its monthly statistical periodical "Statistisches Monatsheft," the OeNB provides both monthly b.o.p. statistics, which are published six weeks after the close of the respective observation period and, thus, offer timely information, and quarterly b.o.p. statistics featuring a more detailed breakdown. The latter are published with a time lag of three months.

The OeNB's quarterly "Focus on Austria" adheres more strictly to the b.o.p. requirement of measuring economic transactions rather than payments. Note: Given the conceptual differences between the two presentation schemes adding up of nine individual months does not result in the corresponding three-quarter total.

3 *Note that the new concept defines travel in more restrictive terms so that travel includes fewer transportation services, i.e. only use of one's personal car or use of means of transportation within the country of destination. International passenger transport, which above all concerns air traffic, is now recorded as a separate item. Additions and corrections, hitherto performed only once a year, are now carried out continuously so that quarterly results have attained a quality level comparable to the preliminary revised annual result previously used.*

4 *A breakdown into domestic and foreign investment is feasible with the exception of financial derivatives. With financial derivatives, the balance on inflows and outflows is always recorded on the assets side.*

5 *Income on other investment consists of income on deposits and loans and on the assets side additionally of reserve investments.*

6 *Current transfers, a subaccount of the current account, now only encompass those transfers which impact the respective economy's income and consumption. Capital transfers, which had previously been covered by the transfers account, have now been excluded.*

7 *Capital transfers initially affect the respective countries' wealth "only"; in other words, they have no impact on income and consumption. For transfers to be classified under capital transfers, it suffices for the transaction to be considered "unilateral" by one of the two parties concerned.*

8 *With the exception of the year 1994, which has to be seen against the background of the US dollar crisis and the entailing low capital outflows generated by acquisitions of foreign securities as well as the large-scale sales of foreign-owned ATS-denominated government bonds to Austria.*

Table 1a

Balance of Payments Summary

	1st to 3rd quarter 1997[1])	1st to 3rd quarter 1998[2])	Annual change
	balances in ATS million		
Current account	−41,187	−40,551	+ 636
Goods, services and income	−23,422	−20,678	+ 2,744
Goods and services	−23,011	−10,703	+12,308
Goods	−42,736	−45,988	− 3,252
Services	+19,725	+35,285	+15,560
thereof:			
Travel	*+11,810*	*+19,337*	*+ 7,527*
Construction services	*+ 4,767*	*+ 2,080*	*− 2,687*
Financial services	*+ 275*	*+ 495*	*+ 220*
Royalties and license fees	*− 3,596*	*− 6,263*	*− 2,667*
Other business services	*+ 8,042*	*+10,965*	*+ 2,923*
Government services, n.i.e.	*+ 2,794*	*+ 2,460*	*− 334*
Unclassified transactions	*−12,355*	*− 3,605*	*+ 8,750*
Income	− 411	− 9,975	− 9,564
Compensation of employees	+ 5,127	+ 5,114	− 13
Investment income	− 5,538	−15,089	− 9,551
Current transfers	−17,765	−19,873	− 2,108
General government	−16,665	−15,950	+ 715
Private sector	− 1,100	− 3,923	− 2,823
Capital and financial account	+41,438	+44,222	+ 2,784
Capital account	− 849	− 1,372	− 523
thereof:			
General government	*+ 820*	*+ 920*	*+ 100*
Private sector	*− 1,889*	*− 2,148*	*− 259*
Acquisition/disposal of nonproduced, nonfinancial assets	*+ 220*	*− 144*	*− 364*
Financial account	+42,287	+45,594	+ 3,307
Direct investment	+ 6,398	+10,668	+ 4,270
Portfolio investment	− 8,126	+16,822	+24,948
Other investment	+23,451	+14,375	− 9,076
Official reserves[3])	+20,564	+ 3,729	−16,835
Errors and omissions	− 251	− 3,671	− 3,420

Source: OeNB.

[1]) Revised figures.

[2]) Provisional figures.

[3]) OeNB: Gold and foreign exchange, Reserve Position in the Fund, SDRs, etc.; increase: - / decrease: +.

Table 1b

Balance of Payments Summary

	1st to 3rd quarter 1997[1])	1st to 3rd quarter 1998[2])	Annual change
	balances in EUR million[3])		
Current account	−2,993	−2,947	+ 46
Goods, services and income	−1,702	−1,503	+ 199
Goods and services	−1,672	− 778	+ 894
Goods	−3,106	−3,342	− 236
Services	+1,433	+2,564	+1,131
thereof:			
Travel	*+ 858*	*+1,405*	*+ 547*
Construction services	*+ 346*	*+ 151*	*− 195*
Financial services	*+ 20*	*+ 36*	*+ 16*
Royalties and license fees	*− 261*	*− 455*	*− 194*
Other business services	*+ 584*	*+ 797*	*+ 212*
Government services, n.i.e.	*+ 203*	*+ 179*	*− 24*
Unclassified transactions	*− 898*	*− 262*	*+ 636*
Income	− 30	− 725	− 695
Compensation of employees	+ 373	+ 372	− 1
Investment income	− 402	−1,097	− 694
Current transfers	−1,291	−1,444	− 153
General government	−1,211	−1,159	+ 52
Private sector	− 80	− 285	− 205
Capital and financial account	+3,011	+3,214	+ 202
Capital account	− 62	− 100	− 38
thereof:			
General government	*+ 60*	*+ 67*	*+ 7*
Private sector	*− 137*	*− 156*	*− 19*
Acquisition/disposal of nonproduced, nonfinancial assets	*+ 16*	*− 10*	*− 26*
Financial account	+3,073	+3,313	+ 240
Direct investment	+ 465	+ 775	+ 310
Portfolio investment	− 591	+1,223	+1,813
Other investment	+1,704	+1,045	− 660
Official reserves[4])	+1,494	+ 271	−1,223
Errors and omissions	− 18	− 267	− 249

Source: OeNB.

1) Revised figures.

2) Provisional figures.

3) Irrevocable conversion rate for the euro: EUR 1 = ATS 13.7603. Constituent items may not sum to totals because of rounding.

4) OeNB: Gold and foreign exchange, Reserve Position in the Fund, SDRs, etc.; increase: − / decrease: +.

Table 2

Merchandise Exports and Imports as Recorded in the Foreign Trade Statistics
Goods by geographic area

	1st to 3rd quarter 1998					
	Exports		Imports		Balance	
	Annual change	Share of total exports	Annual change	Share of total imports		Annual change
	%				ATS million	
OECD	+17.2	86.7	+13.1	88.7	−66,442	+7,607
EU	+11.6	64.0	+ 8.9	69.3	−73,776	+2,120
EMU	+12.0	57.5	+ 8.9	64.1	−77,423	+1,867
thereof:						
Germany	*+10.7*	*36.2*	*+ 8.6*	*41.7*	*−56,894*	*− 813*
Italy	*+15.2*	*8.8*	*+ 3.0*	*8.2*	*− 1,463*	*+5,065*
France	*+13.8*	*4.2*	*+10.6*	*4.8*	*− 6,251*	*+ 12*
CEECs[1])	+ 4.9	16.7	+12.8	11.4	+22,783	−3,752
U.S.A.	+25.4	4.0	+ 8.0	5.3	−10,471	+2,142
Japan	−26.5	0.9	+ 8.2	2.2	− 9,058	−2,918
Total	+ 9'0	100'0	+ 8'4	100'0	−62,367	−2,267

Source: ÖSTAT.

[1]) *Central and Eastern European countries: Albania, Belarus, Bulgaria, Croatia, Czech Republic, Estonia, Hungary, Latvia, Lithuania, Poland, Romania, Russia, Slovakia, Slovenia, Ukraine, Yugoslavia.*

Table 3

Merchandise Exports and Imports as Recorded in the Foreign Trade Statistics
Goods by commodity category

	Exports			Imports			Balance	
	1st to 3rd quarter 1998	Annual change		1st to 3rd quarter 1998	Annual change		1st to 3rd quarter 1998	Annual change
	ATS million		%	ATS million		%	ATS million	
Foodstuffs	25,104	+ 2,340	+10.3	35,273	+ 2,402	+ 7.3	−10,169	− 62
Crude materials	24,723	+ 208	+ 0.8	51,113	− 2,222	− 4.2	−26,390	+2,430
thereof: fuels (SITC 3)	*5,182*	*− 240*	*− 4.4*	*26,757*	*− 2,772*	*− 9.4*	*−21,575*	*+2,532*
Semimanufactured goods	95,075	+14,687	+18.3	88,690	+ 8,877	+11.1	+ 6,385	+5,810
Manufactured goods	420,855	+27,728	+ 7.1	451,533	+36,885	+ 8.9	−30,678	−9,157
Capital goods	146,201	+10,444	+ 7.7	150,334	+18,172	+13.7	− 4,133	−7,728
Consumer goods	274,654	+17,284	+ 6.7	301,199	+18,713	+ 6.6	−26,545	−1,429
Miscellaneous manufactured articles	1,868	×	×	3,383	×	×	− 1,515	×
Total	567,625	+46,747	+ 9.0	629,992	+49,013	+ 8.4	−62,367	−2,267

Source: ÖSTAT.

Table 4

Travel and International Passenger Transport

	1st to 3rd quarter 1997[1])	1st to 3rd quarter 1998[2])	Annual change	
	ATS million			%
Travel				
Receipts	107,208	111,515	+4,307	+ 4.0
Expenses	95,398	92,178	−3,220	− 3.4
Balance	11,810	19,337	+7,527	+63.7
International passenger transport				
Receipts	11,801	14,327	+2,526	+21.4
Expenses	5,610	8,088	+2,478	+44.2
Balance	6,191	6,239	+ 48	+ 0.8
	in 1,000			%
Foreign tourist bednights	69,340	70,374	+1,033	+ 1.5

Source: ÖSTAT, OeNB.
1) Revised figures.
2) Provisional figures.

Table 5

Foreign Tourist Bednights by Country of Origin

	1st to 3rd quarter 1998			
	Overnight stays	Annual change		Share
	in 1,000		%	
Germany	45,242	− 30	− 0.1	64.3
Netherlands	6,052	− 35	− 0.6	8.6
United Kingdom	2,360	+ 169	+ 7.7	3.4
Belgium, Luxembourg	1,993	− 220	−10.0	2.8
Switzerland, Liechtenstein	2,366	+ 8	+ 0.4	3.4
Sweden	560	+ 17	+ 3.2	0.8
France	1,718	+ 16	+ 0.9	2.4
Italy	2,193	+ 222	+11.3	3.1
Spain	410	+ 34	+ 8.9	0.6
Finland	142	+ 21	+17.6	0.2
U.S.A.	1,035	+ 149	+16.8	1.5
Japan	448	+ 13	+ 2.9	0.6
Hungary	532	+ 47	+ 9.8	0.8
Slovakia	105	+ 26	+32.2	0.1
Czech Republic	543	+ 82	+17.9	0.8
Poland	608	+ 93	+18.1	0.9
Commonwealth of Independent States	322	+ 80	+33.0	0.5
Slovenia	169	+ 6	+ 3.4	0.2
Croatia	193	+ 21	+12.4	0.3
Other countries	3,383	+ 314	+10.2	4.8
Total	70,374	+1,033	+ 1.5	100.0
Memorandum item: Austrian tourists	*24,695*	*391*	*+ 1.6*	*x*

Source: ÖSTAT.

Table 6

Investment Income

	1st to 3rd quarter		Annual change
	1997[1])	1998[2])	
	ATS million		
Investment income receipts	83,951	87,796	+ 3,845
Investment income payments	89,489	102,885	+13,396
Net investment income[3])	− 5,538	− 15,089	− 9,551
Income on direct investment, net[3])	− 8,311	− 10,963	− 2,652
Income on direct investment abroad	7,188	8,159	+ 971
Income on direct investment in Austria	15,499	19,122	+ 3,623
Income on portfolio investment, net[3])	− 9,506	− 14,779	− 5,273
Income on foreign equity securities	1,813	1,991	+ 178
Income on domestic equity securities	2,346	2,789	+ 443
Income on foreign debt securities	17,124	22,850	+ 5,726
Income on domestic debt securities	34,395	40,604	+ 6,209
Income on foreign money market instruments	187	161	− 26
Income on domestic money market instruments	209	1,285	+ 1,076
Financial derivatives on interest contracts, net	+ 8,320	+ 4,897	− 3,423
Income on other investment, net[3])	+12,279	+ 10,653	− 1,626
Income on other investment, assets[4])	49,319	49,738	− 419
Income on other investment, liabilities	37,040	39,085	− 2,045

Source: OeNB.

[1]) *Revised figures.*

[2]) *Provisional figures.*

[3]) *Income on outward foreign investment less income on inward foreign investment.*

[4]) *Income on deposits, credits and official reserves.*

Table 7

Financial Account

(including change in official reserves)

	1997[1])	1st to 3rd quarter 1998[2])	3rd quarter 1998[2])
	ATS million, net		
Financial account	+ 54,863	+ 45,594	+14,694
Assets	−174,727	−191,898	−34,464
Liabilities	+229,590	+237,492	+49,158
Direct investment	+ 5,334	+ 10,668	− 1,734
Direct investment abroad	− 23,758	− 26,041	−10,045
Equity capital	− 21,118	− 20,379	− 8,030
Reinvested earnings	− 4,867	− 5,675	− 1,821
Other capital	+ 2,227	+ 13	− 194
Direct investment in Austria	+ 29,092	+ 36,709	+ 8,311
Equity capital	+ 20,869	+ 22,283	+ 5,804
Reinvested earnings	+ 9,547	+ 11,958	+ 2,513
Other capital	− 1,324	+ 2,468	− 6
Portfolio investment	+ 13,896	+ 16,822	− 2,175
Portfolio investment in foreign securities	−123,542	−141,584	−37,585
Equity securities	− 30,070	− 40,773	−13,958
Long-term debt securities	− 95,106	− 98,354	−31,094
Money market instruments	+ 3,978	+ 252	+10,387
Financial derivatives	− 2,344	− 2,709	− 2,920
Portfolio investment in domestic securities	+137,438	+158,406	+35,410
Equity securities	+ 32,027	+ 10,177	+ 249
Long-term debt securities	+ 87,112	+146,096	+37,472
Money market instruments	+ 15,490	+ 2,233	− 1,988
Financial derivatives	+ 2,809	− 100	− 323
Other investment	− 252	+ 14,375	+18,189
Assets	− 63,312	− 28,002	+12,752
Trade credits	+ 2,904	+ 3,200	+ 2,000
Loans	− 52,133	− 39,321	−13,964
Sight and time deposits	+ 12,667	+ 9,112	+24,464
Other assets	− 26,750	− 993	+ 252
Liabilities	+ 63,060	+ 42,377	+ 5,437
Trade credits	+ 4,887	− 3,100	− 100
Loans	− 5,104	+ 3,893	− 523
Sight and time deposits	+ 66,165	+ 39,401	+ 6,259
Other liabilities	− 2,888	+ 2,183	− 1,989
Official reserves[3])	+ 35,885	+ 3,729	+ 414

Source: OeNB.

[1]) Revised figures.

[2]) Provisional figures.

[3]) OeNB: Gold and foreign exchange, Reserve Position in the Fund, SDRs, etc.; increase: - / decrease: +.

Austria's International Investment Position in 1997[1])

1 Summary

The opening-up of the Austrian economy through cross-border financial investment on both the assets and liabilities side, which continued unabated in the past ten years, gained further momentum in 1997.

As of December 31, 1997, residents held financial claims on the rest of the world (external assets) to the amount of ATS 2,121 billion (equivalent to EUR 154.1 billion or approximately 84% of GDP at market prices). Cross-border bank loans and deposits, monetary financial institutions' and nonbank financial intermediaries' portfolio investment as well as the central bank's reserve assets accounted for the bulk of the Austrian investment stock abroad.

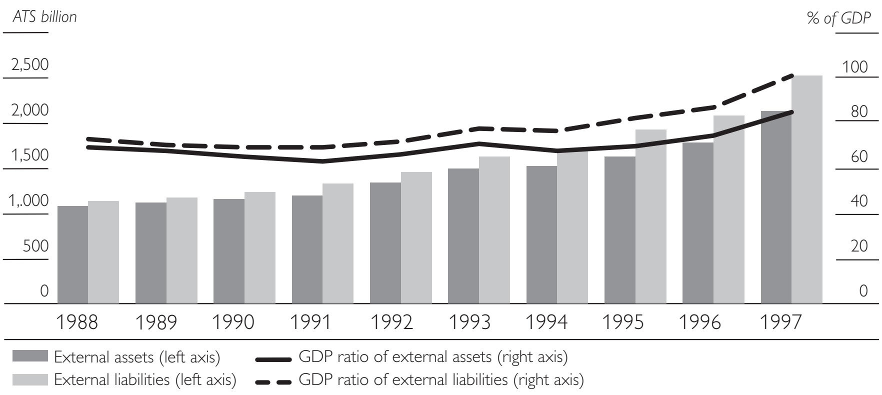
As of the same date, Austria's external liabilities ran to ATS 2,508 billion (equivalent to EUR 182.2 billion or roughly Austria's total GDP at market prices). Nonresident deposits, credit institutions' issues abroad and general government securities held by nonresidents dominated the structure of Austrian liabilities to the rest of the world.

As far as internationalization measured in terms of the GDP ratio of external assets and liabilities is concerned, Austria ranked among the OECD countries with a relatively high internationalization degree of more than 80%.[2])

As external liabilities exceeded external assets as of Dezember 31, 1997, Austria's international investment position (IIP) posted a negative balance of ATS 387 billion (EUR 28.1 billion), primarily on account of the adverse current account development in the 1990s.

Chart 1

Austria's External Assets and Liabilities



Source: OeNB.

2 Statistical Context

2.1 Definition of the IIP

The International Investment Position (IIP) of a country is a statistical statement of the national stock of external financial assets and liabilities. All items are end-of-year stocks and are stated at market prices wherever possible and meaningful. Austria's external assets and liabilities break down into the categories direct investment, portfolio investment, other investment and reserve assets.

With regard to classification, the IIP is based on the IMF standards set out in the 5th edition of the Balance of Payments Manual (1993). Concepts and definitions of the Austrian IIP are in line with the ECB requirements.

To attain this goal, the following adaptations[3]) were made as of December 31, 1997:

- Interest is recorded on an accruals basis. Hence, accrued interest receivable is entered as a reinvestment in the underlying financial instrument, which increases Austria's external claims or liabilities;
- real estate is considered part of direct investment and is no longer subsumed under "others" within the category "other investment";
- overdue loans no longer appear in the loans item; instead, they are entered under "others" within the category "other investment".

The quantitative effects of these adaptations are described in section 3.1. Previous calculations for earlier periods (including reporting date December 31, 1996) have not been revised, as a complete back calculation is not possible.

2.2 Link with the Financial Accounts

The Financial Accounts implemented by the OeNB in Austria in accordance with the European System of National Accounts (ESA95) cover, in the form of asset and liability statements, the financial claims and liabilities of all institutional sectors. The balance sheet pertaining to the sector "rest of the world" (sector 2 in accordance with the ESA95) draws heavily on the IIP[4]). Thus, the position nonresidents' net financial assets (marked with a plus sign) corresponds to the domestic sectors' net liabilities to the rest of the world. The latter denotes a negative net international investment position, i.e. a negative balance of financial assets (external assets) and financial liabilities (external liabilities) vis-à-vis the rest of the world. The Financial Accounts use a breakdown of financial assets and liabilities by financial instruments, based primarily on liquidity and legal features.[5]) The IIP, by contrast, relies above all on a functional breakdown. The table below shows the transfer of these functional categories into the Financial Accounts structure:

In both the IIP and the Financial Accounts, the sectoral classification is geared to domestic sectors. The sectors monetary authorities (central bank), monetary financial institutions and general government are based on identical concepts and definitions in both statistics. In the Financial Accounts, the foreign trade statistics' residual item "other sectors" is subdivided into other financial intermediaries, financial auxiliaries, insurance corporations and pension funds as well as nonfinancial corporations, households and nonprofit institutions serving households.

3 International Investment Position 1997

3.1 External Assets and Liabilities

On the reporting date of December 31, 1997, Austria's financial claims on the rest of the world (external assets) totaled ATS 2,121 billion, while external liabilities ran to ATS 2,508 billion, which resulted in a deficit of the IIP to the amount of ATS 387 billion.

Table 1

Transfer Financial Accounts – IIP

Financial Accounts	International Investment Position (sector 2)															
	Direct investment		Portfolio investment				Other investment				Reserve assets					
	Equity capital and reinvested earnings	Other capital	Equity securities	Long-term bonds and notes	Money market instruments	Financial derivatives	Trade credits	Loans	Deposits	Others	Monetary gold	SDRs	Reserve position in the IMF	Currency and deposits	Securities	Other claims
Monetary gold and SDRs											●	●				
Currency and deposits									●				●	●		
Securities (other than shares) and financial derivatives																
Money market instruments					●										●	
Capital market instruments				●											●	
Financial derivatives						●									●	
Loans		●						●								
Shares and other equity																
Shares and other equity, excluding mutual funds	●		●												●	
Mutual funds shares			●												●	
Insurance technical reserves										●						
Other accounts receivable/payable																
Trade credits and advances							●									
Other										●						●

Source: OeNB.

Since the changes in stocks reported for 1997 by comparison to end-1996 were not only due to transactions and valuation changes but also triggered by changes to the conceptual framework of the IIP (see section 2.1), any comparison with data of the previous year will prove difficult.

Austria's external assets surged by a total of ATS 348 billion (+20%) between December 31, 1996, and December 31, 1997. On a transactions basis, residents increased their foreign claims by some ATS 175 billion, of which about ATS 123 billion can be traced to new portfolio investment abroad. The other half of the expansion of residents' external assets can be pinpointed to the item other adjustments, with valuation changes accounting for ATS 122 billion of this amount. In this context, stocks denominated in USD played a prominent role, due to the dollar's appreciation by approximately 15% vis-à-vis the ATS. The rise in the prices of securities held abroad following the decline of long-term interest rates of major investment currencies was another factor contributing to the valuation gains. The remaining "other effects" cover conceptual changes, comprising the increase in claims stemming from the reclassification of accrued interest receivable as reinvestment in securities (approximately ATS 6 billion) and from the recalculation of equity securities (some ATS 45 billion).

During the same period, *Austria's external liabilities* soared by more than ATS 434 billion (+21%). New investments accounted for roughly ATS 230 billion, with foreign investors in particular raising their stock of domestic securities by ATS 137 billion on a transactions basis. Apart from this volume component, the price component resulting from valuation changes accounted for roughly ATS 134 billion. Of key importance in this expansion were valuation gains of foreign currency securities, due to the rise in the exchange rates of the USD, CHF and JPY vis-à-vis the ATS. Moreover, Austrian securities commanded slightly higher prices as of December 31, 1997, than one year before. The calculation of accrued interest receivable for domestic securities on the liabilities side resulted in an increase of approximately ATS 23 billion, with the recalculation of equity securities amounting to some ATS 48 billion.

Table 2

Changes in IIP stocks in 1997

	End-of-1996 Stocks	Changes in positions in 1997					End-of-1997 Stocks
		Total	Trans-actions	Other adjustments			
				Total	Price and Exchange rate effects	Other effects	
	ATS billion						
External assets	1,773.4	+347.5	+174.7	+172.8	+122.3	+50.5	2,120.9
External liabilities	2,073.2	+434.3	+229.6	+204.7	+134.2	+70.5	2,507.5
Net international	− 299.8	− 86.8	− 54.9	− 31.9	− 11.8	−20.1	− 386.6

Source: OeNB.

Broken down by sectors and financial instruments, external assets and liabilities developed as follows:

Given the important role *credit institutions* continue to play as financial intermediaries, they accounted for more than 50% of total cross-border claims and liabilities as of December 31, 1997. On the assets side, almost half of banks' cross-border claims (ATS 1,109 billion) consisted of short-term loans and deposits and nearly 30% of long-term loans. At some 15%, banks' holdings of foreign securities (in particular long-term bonds and notes) also figured prominently.

On the liabilities side, 53% of Austrian external liabilities (ATS 1,340 billion) can be traced to the domestic banking sector. At close to 60%, cross-border short-term deposits and loans also dominated the liabilities side. Apart from deposits placed by nonresidents, credit institutions also refinanced themselves abroad through the sale of money market instruments as well as long-term bonds and notes. The share of cross-border liabilities from securities held by nonresidents came to 30% of credit institutions' total external liabilities. A breakdown by currencies shows that approximately 45% of these liabilities arising from securities issues are denominated in euro area currencies.

General government being a typical debtor sector in national accounts terms, its external assets (ATS 31 billion) were dwarfed by its external liabilities to the amount of more than ATS 500 billion, of which the major part consisted of long-term bonds and notes held by nonresidents (ATS 473 billion). External liabilities thus accounted for more than 40% of all government long-term issues outstanding as of December 31, 1997. As of the same date, schilling securities accounted for ATS 122 billion, with benchmark issues making up 27% in terms of value. 60% of the securities held by nonresidents were denominated in currencies that were replaced by the euro as of January 1, 1999.

The category *other sectors,* which is made up of other financial intermediaries, insurance corporations and pension funds (nonbank financial intermediaries) as well as nonfinancial corporations and households (including nonprofit institutions serving households) posted external assets to the amount of ATS 695 billion and thus about one third of Austria's total external assets: Nonfinancial corporations accounted for roughly ATS 330 billion, with ATS 147 billion thereof stemming from direct investment abroad, according to provisional calculations. As a percentage of the sector's total financial assets[6]) as stated in the Financial Accounts, external claims accounted for some 33%. As of December 31, 1997, the foreign debt securities, shares and mutual funds shares held in households' portfolios had a market value of approximately ATS 100 billion, which corresponded to a share of some 15% in households' total securities portfolios or 3% in their total financial assets.

As of the same date, the external liabilities of domestic nonbank financial intermediaries, nonfinancial corporations and households to nonresidents came to roughly ATS 660 billion, with domestic nonfinancial corporations accounting for some 75%. The external liabilities situation was primarily influenced by inward direct investment (according to provisional calculations: ATS 210 billion) and nonfinancial corporations' bonds and notes held by nonresidents with a market value of some ATS 105 billion (35% thereof denominated in euro area currencies). As a percentage of the sector's total financial liabilities[7]) as stated in the Financial Accounts, external liabilities accounted for somewhat more than 20%.

As of December 31, 1997, the *OeNB* held reserve assets with a market value of ATS 278 billion, equivalent to 13% of residents' total external assets.

The *structural pattern* of the IIP is basically unchanged from the year before, although – from a medium-term perspective – the share of the various financial instruments has tended to vary:

- Between 1992 and 1997, residents' investment stock in foreign securities grew from 14% of total external assets to 27%. Over the same period, nonresidents' holdings of domestic securities became the single most important nonresident investment category in Austria, accounting for 48% of total financial claims on Austria as of December 31, 1997.
- Equity-based financial instruments (equity component of direct investment and investment in shares and mutual funds shares) also gained in importance. In 1992, their share had stood at rougly 8% on the assets

side and 10% on the liabilities side, while in 1997 it came to 14 and 17%, respectively.

Moreover, the changes to the conceptual framework dealt with in section 2.1. led to changes in the structure of the IIP between 1996 and 1997, which are outlined in the table below:

Table 3

Changes in the structure of the IIP 1997

	End-of-1996 Stocks	Changes in positions in 1997					End-of-1997 Stocks
		Total	Trans-actions	Other adjustments			
				Total	Price and Exchange rate effects	Other effects	
	ATS billion						
Assets							
Nonresident real estate							
From "other investment/others"	11.7	×	×	×	×	×	×
to "direct investment"	×	2.3	1.7	0.6	0.0	0.6	14.0
Overdue loans of MFIs							
From "other investment/loans"	20.0	×	×	×	×	×	×
to "other investment/others"	×	17.4	17.4	0.0	0.0	0.0	37.4
Liabilities							
Domestic real estate							
From "other investment/others"	2.4	×	×	×	×	×	×
to "direct investment"	×	0.6	0.5	0.1	0.0	0.1	3.0

Source: OeNB.

3.2 External debt

External debt in the broad definition is the balance of Austria's total external assets and liabilities minus the claims or liabilities arising from equity-based financial instruments (equity component of direct investment and investment in shares and mutual funds shares) and the OeNB's reserve position in the International Monetary Fund and the public sector's participations in international organizations. In other words, all those assets and liabilities for which a specified repayment obligation exists and for which financial cover must be provided are sorted out.

Thus external debt in the broad definition comprises

- Currency, deposits and loans (including trade credits, intercompany debt and overdue loans) as well as claims and liabilities from cumulative balance-of-payments transactions subsumed under "other investment/ others",
- money market instruments, long-term bonds and notes, financial derivatives; and
- the items gold, SDRs, currency and deposits, securities and other claims recorded under reserve assets.

At the end of 1997, Austria's nonequity assets ran to ATS 1,770 billion, which corresponds to around 83% of total external assets. Monetary financial institutions accounted for a share of 61%, with the OeNB trailing behind at 15% and nonfinancial corporations at 11%. A breakdown by the currencies[8]) in which domestic investors held assets as of December 31, 1997, shows a preference for currencies that were replaced by the euro as of January 1, 1999. About 60% of all financial assets were denominated in those currencies. The share of claims denominated in USD came to 27%, while EU currencies not participating in EMU accounted for 5%.

As of December 1, 1997, Austria's *nonequity liabilities* (gross external debt) came to ATS 2,075 billion, which is equivalent to 83% of total external liabilities. Among domestic sectors, monetary financial institutions relied most on financing abroad, so that their share in gross external debt amounted to 62%. Due to the larger financing needs of the public sector, which were increasingly met abroad in the past few years, general government accounted for a share of some 25% in gross external debt, with nonresidents holding primarily bonds and notes.

A breakdown by currencies shows that half of the domestic securities held by foreign investors were denominated in currencies which were replaced by the euro as of January 1, 1999. Other major investment currencies in this category were USD and CHF, whose share came to 20 and 16%, respectively.

Austria's net external debt at market prices reached approximately ATS 305 billion on December 31, 1997. This was equivalent to

– 12% of GDP at market prices,
– 29% of exports of goods and services, and
– 15% of gross external debt.

The OeNB (ATS 265 billion), nonbank financial intermediaries (ATS 149 billion) and households (ATS 48 billion) were net creditors vis-à-vis the rest of the world, whereas general government (–ATS 491 billion), monetary financial institutions (–ATS 215 billion) and nonfinancial corporations (–ATS 61 billion) were net debtors.

1 *All euro figures given in this report are based on the conversion rate determined on December 31, 1998 (EUR 1 = ATS 13.7603).*

2 *E.g. France and Denmark.*

3 *Adaptations to the same effect were carried out in the 1997 balance-of-payments statistics. Thus, the survey period 1997 marks the complete harmonization of both statistical statements in terms of breakdowns and definitions.*

4 *In line with current practice, data from sources other than the IIP are in some cases incorporated into the statement of cross-border claims and liabilities, in particular in cases where the breakdown of the IIP is inadequate.*

5 *The memorandum item direct investment is an exception.*

6 *Financial assets arising from financial claims on residents and nonresidents.*

7 *Indebtedness arising from financial liabilities to residents and nonresidents.*

8 *Excluding reserve assets of the OeNB.*

Annex

Austria's International Investment Position

	1997	
	ATS billion	*EUR billion*
Direct investment		
Outward direct investment	180.8	13.1
Inward direct investment	249.6	18.1
Portfolio investment		
Portfolio investment abroad	573.5	41.7
thereof money market instruments and long-term bonds and notes (total)	*412.5*	*30.0*
Portfolio investment in Austria	1,214.0	88.2
thereof money market instruments and long-term bonds and notes (total)	*1,016.0*	*73.8*
Other investment		
Cross-border deposits and loans to nonresidents	1,089.2	79.2
Cross-border deposits and loans to residents	1,043.9	75.9
Reserve assets	277.4	20.2
thereof monetary gold	*29.2*	*2.1*
External assets	2,120.9	154.1
External liabilities	2,507.5	182.2
Net international investment position	– 386.5	– 28.1
Nonequity assets	1,770.1	128.6
thereof in euro area currencies[1])	*884.3*	*64.3*
Nonequity liabilities	2,075.0	150.8
thereof in euro area currencies	*1,030.7*	*75.0*
Net external debt	– 304.9	– 22.2

Source: OeNB.

[1]) Excluding reserve assets. Reserve assets under the item nonequity assets come to ATS 265.2 billion.

Special Survey on the Regional Allocation of Nonresident Securities Held by Residents as of December 31, 1997

The key motive for conducting this special survey was the rapid growth of international flows in the form of portfolio investment in the 1980s and 1990s. In this process ever larger discrepancies evolved at the worldwide level between external portfolio assets and external portfolio liabilities.

As a result, the IMF launched a project in 1994 aimed at putting securities statistics on a more consistent basis worldwide. More specifically, the goal of the project was to harmonize national statistics in terms of definition and valuation by drawing up the Coordinated Portfolio Survey[1]) for equities and long-term bonds and notes and thus to attain better comparability of cross-border assets and liabilities arising from portfolio investment.

Austria took part in the task force established with the purpose of drawing up the Survey and contributed moreover to the compilation of statistics as of December 31, 1997. By contrast to the regular International Investment Position (IIP), financial instruments took priority in the breakdown. Thus, the focus in collecting information was on ownership of nonresident equities as well as long-term bonds and notes by each domestic economic sector, regardless of whether they fall under the category portfolio investment or reserve assets.

In March 1999, the preliminary results were discussed at a meeting in Washington, with the final results expected to be available by the fourth quarter of 1999.

The main results of the statistics compiled by Austria are as follows:

On December 31, 1997, domestic investors' portfolios contained *nonresident securities* with a market value of ATS 656 billion (EUR 47.7 billion[2])), with long-term bonds and notes accounting for 75%, shares for 20% and mutual funds shares for 5%.

Generally, investors concentrated on a few issuer countries, most of them member states of the EU. Claims on this group of countries accounted for close to 60%, with 45 percentage points being traceable to the euro area.

Almost 80% of Austria's total external assets (i.e. nonresident long-term bonds and notes as well as nonresident equities) were held in portfolios managed by the financial sector (i.e. OeNB, monetary financial institutions and nonbank financial intermediaries).

Domestic investors opted for relatively conservative investment strategies, choosing primarily long-term bonds and notes and issues launched by EU countries, the U.S.A. and international organizations.

The holdings of *nonresident long-term bonds and notes* with a market value of nearly ATS 500 billion reflected investment in 72 countries. It should be taken into account, however, that investor interest was heavily focused on a few countries, concentrating on the euro area, other European states and America. Other important developments were as follows:

- 45% (ATS 225 billion) of the holdings can be traced to issues of the euro area, with German securities accounting for a share of 30%;
- as concerns issues from outside the euro area, domestic investors owned above all securities launched by the U.S.A. (17%), other EU countries (14%) and international organizations (6%);

- domestic investors' comparatively strong interest in America excluding the U.S.A. (8%) is also noteworthy.

Investment in Asia, Africa as well as Australia and New Zealand, by contrast, was moderate (5%), as was domestic investors' interest in issues floated by Eastern European countries, including the Baltic states and Russia (4%).

Investment in the 20 most important issuer countries according to the Austrian ranking – primarily G 10 countries – represented a share of some 90% of the total. This concentration on a rather limited number of countries was true for private investors (nonfinancial enterprises and households), the OeNB and nonbank financial intermediaries (mutual funds, insurance corporations and pension funds), but not for monetary financial institutions.

The financial sector was responsible for roughly 83% of total portfolio investment, focusing on Germany, the U.S.A., the United Kingdom, the Netherlands, Italy and international organizations. Liquidity and credit standing considerations may have played an important role in the financial sector's investment decisions, as it preferred large-volume bank and government bonds.

The other investor groups also showed a preference for German issues, which accounted for some 40% of total portfolio assets. With a share of 22%, securities launched by Argentina (government bonds) and international organizations enjoyed a relatively strong position. This may be due to the fact that Argentina floated schilling issues in Austria, which were attractive mainly for tax reasons.

The holdings of *nonresident equities* with a market value of almost ATS 160 billion consisted of shares with a market value of ATS 130 billion and mutual funds shares equaling somewhat less than ATS 30 billion.

The major countries for investment in shares were Germany and the U.S.A. with a share of approximately 20% each as of December 31, 1997, as well as Switzerland and the Netherlands with a share of roughly 8% each. Investors acquired almost exclusively listed shares and showed a strong preference for blue chips.

A sectoral breakdown shows that about half of the share portfolios were owned by institutional investors (excluding MFIs), while the remaining 50% were held, in relatively equal proportions, by MFIs, nonfinancial enterprises and households. All sectors showed a strong preference for investment in Germany, the U.S.A., Switzerland and the Netherlands.

Ownership of foreign mutual funds shares focused, as could be expected, on issues of mutual funds domiciled in Luxembourg, which accounted for a share of some 80%. Roughly 70% of the total value was in domestic households' portfolios.

1 *IMF: Coordinated Portfolio Investment Survey, Survey Guide; August 1996.*
2 *Conversion rate as of December 31, 1998: EUR 1 = ATS 13.7603.*

Nonresident Securities Owned by Residents as of December 31, 1997

	Total		Long-term bonds and notes		Equities		Share in nonresident securities	
	Market value in ATS billion	*Share in %*	*Market value in ATS billion*	*Share in %*	*Market value in ATS billion*	*Share in %*	*Share in %*	
	1 (2+3)		2		3		4 (2 in 1)	5 (3 in 1)
Germany	181.2	28	151.6	30	29.5	19	84	16
France	17.2	3	12.7	3	4.5	3	74	26
Italy	19.4	3	17.1	3	2.3	1	88	12
Netherlands	31.5	5	23.0	5	8.5	5	73	27
Other euro area countries	48.8	7	20.6	4	28.2	18	42	58
Euro area	298.0	45	225.0	45	73.0	46	75	25
Denmark	10.8	2	10.6	2	0.2	0	98	2
United Kingdom	53.8	8	43.8	9	10.0	6	81	19
Greece	7.4	1	7.4	1	0.0	0	100	0
Sweden	9.1	1	7.8	2	1.3	1	86	14
Other EU countries	81.2	12	69.7	14	11.5	7	86	14
EU 15	379.2	58	294.7	59	84.5	53	78	22
Croatia	2.1	0	2.0	0	0.1	0	95	5
Hungary	9.4	1	6.3	1	3.2	2	67	33
Russia	4.3	1	3.9	1	0.4	0	91	9
Other Eastern European countries	8.8	1	7.4	1	1.4	1	84	16
Eastern Europe	24.6	4	19.6	4	5.1	3	80	20
Other European countries	14.4	2	3.3	1	11.1	7	23	77
U.S.A.	111.4	17	84.6	17	26.8	17	76	24
Canada	12.9	2	11.6	2	1.3	1	90	10
Mexico	4.0	1	3.3	1	0.7	0	83	17
Argentina	7.9	1	7.9	2	0.0	0	100	0
Brazil	4.0	1	3.8	1	0.2	0	95	5
Cayman Islands	11.2	2	4.4	1	6.8	4	39	61
Netherlands Antilles	6.9	1	6.7	1	0.2	0	97	3
Other American countries	3.1	0	3.0	1	0.1	0	97	3
America	161.5	25	125.4	25	36.1	23	78	22
Australia und New Zealand	5.5	1	4.6	1	0.9	1	84	16
Japan	8.1	1	3.3	1	4.8	3	41	59
China	2.4	0	1.8	0	0.6	0	75	25
Korea, Republic	3.3	0	3.3	1	0.0	0	100	0
Hong Kong	0.6	0	0.6	0	0.0	0	100	0
Singapore	0.6	0	0.3	0	0.3	0	49	51
South Africa	1.9	0	1.7	0	0.2	0	89	11
Other Asian and African countries	13.9	2	13.9	3	0.0	0	100	0
Asia and Africa	27.1	4	21.2	4	5.9	4	78	22
International organizations	29.2	4	29.2	6	–	–	100	–
Non-classifiable	14.9	2	–	–	14.9	9	–	100
Total	656.5	100	498.0	100	158.5	100	76	24

Source: OeNB.

Financial Assets and Liabilities of Enterprises and Households in the Years 1995 to 1997

Austria's financial accounts on the basis of the European System of Accounts (ESA95), developed and recently published by the OeNB, provide crucial data on the financial assets and liabilities of households and enterprises, two key sectors of the economy. These data are not just – for a number of reasons – highly relevant to economic analysis, but are also given broad attention by economic policymakers, the media and a wider public. It is now for the first time that recent data on these areas are made available on the basis of the most advanced international standards. In future, the data will be updated regularly.

1 Introduction: Some Remarks on the Methodology

Council Regulation (EC) No 2223/96 of June 25, 1996, on the European system of national and regional accounts in the Community (ESA95) stipulates that all EU Member States transmit national accounts data calculated on the basis of the harmonized theoretical framework provided by the ESA 95 to the European Commission, where the data will be used in the analysis of economic developments in Europe. First transmissions of balance sheets and reports on financial flows will be required in September 2000, covering the period 1995 through 1999. With a view to the vital role these data will play in economic analysis, the Statistical Office of the European Communities (EUROSTAT), the European Monetary Institute (as the predecessor of the European Central Bank – ECB) and the Member States agreed to transmit the data for the years 1995 to 1997 in advance.

The OeNB also takes part in this EU project and in the context of developing financial accounts on the basis of the ESA95, has recently completed the conceptual basis of the stocks calculations for the years 1995 to 1997. The stocks accounts for all sectors of the economy, including the 1998 update, are due to be published in autumn 1999.

Austria's financial accounts for 1995 to 1997 based on the ESA95 represent the first set of current data on financial claims and liabilities of the enterprise sector ("non-financial corporations" in the ESA95) and households compiled on the basis of a standardized manual. This standardized manual provides a common basis for analyses, which so far were only carried out on an isolated basis (on topics such as households' financial assets and private debt[1])) and thus employed diverging approaches and definitions.

Just as in other countries, the statisticians had to resort to estimates, extrapolation techniques and assumptions as to sectoral distributions due to a lack of primary data in some areas. As regards financing instruments, for example, a data gap exists for shares and other equity, on both the creditor and the debtor side. What is more, plausibility checks against previous reports are hardly feasible (except on the level of a very rough estimate), as the ESA 95 – other than earlier calculations on a nominal basis – is based on valuation at market prices.

In Austria, the ESA sector "non-financial corporations" in its current definition includes nonfinancial enterprises and thus is not as narrowly defined as the ESA95 standard. Whereas in ESA95 the category "non-financial corporations" – true to its name – comprises above all corporations, the definition of "non-financial enterprises" in Austrian banking statistics also includes sole proprietorships, professions and partnerships.

Similarly, the EU manual makes a distinction between "households" and "non-profit institutions serving households," while in Austria the two sectors are recorded in aggregate figures as the data sources currently used do not make it possible to ascribe the data more precisely. Furthermore, the term "households" is more broadly defined in the ESA95 than in everyday language; it also includes the abovementioned subsectors of "non-financial corporations," namely sole proprietorships, professions and partnerships. However, in Austria's current financial accounts the sector "households" does not include these subsectors and the distinction between households and corporations is therefore to be interpreted differently than in the ESA concept.

The financial instruments included in the accounts comprise the main categories "currency and deposits," "securities other than shares," "loans," "shares and other equity," "insurance technical reserves," "monetary gold and special drawing rights," and "other accounts receivable/payable." Compared with the structures used so far in Austrian money flow analyses, the new categorization of financial transactions in the ESA95 is less detailed, and above all the separation into schilling and foreign currency has been omitted.

2 Financial Assets and Liabilities of "Non-financial Corporations"

See Tables 1.1 through 2.2

Within the framework of a national economy, the enterprise sector is by default a net debtor. In Austria's financial accounts at year-end 1997, the enterprise sector reported net liabilities of ATS 1,344 billion (at market prices), which represented a growth by 9% against year-end 1996 (1996 against 1995: +5%).

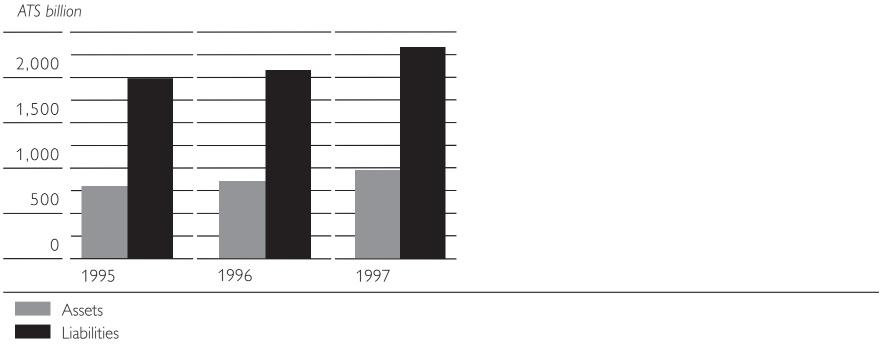
Enterprises' net liabilities as of December 31, 1997, include liabilities of ATS 2,329 billion which are counterbalanced by the substantial sum of financial claims of ATS 985 billion (+11 and +14%, respectively, against year-end 1996).

The main source of finance for Austrian enterprises is borrowing: In 1997, 69% (1996: 73%; 1995: 72%) of liabilities were in the form of loans granted by domestic banks, insurance companies or foreign institutions. Only about 7% (up from 5% in the previous two years) of corporate debt was financed through national and international bond markets. At the end of 1997, equity issues (shares and other equity) accounted for some 21% of capital raised (1996: 19%; 1995: 18%). (See Table 2.2)

The sizeable amount of financial assets held by the enterprise sector largely consists of highly liquid instruments (currency and deposits stood at 31% in 1997); however, with a 19%-share of bonds and 33% in equity issues (shares and other equity, including mutual funds shares), there are also substantial long-term financial assets. (See Table 2.1)

Chart 1

Financial Assets and Liabilities of Austria's Non-financial Corporations



Source: OeNB.

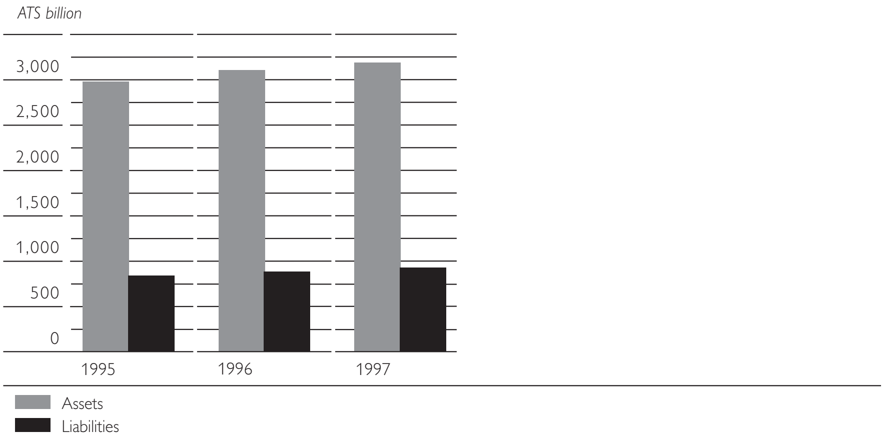
3 Financial Assets and Liabilities of „Households"[2])

See Tables 3.1 through 4.2

In a developed economy, the sector "households" typically generates the main surplus. It is only due to households' savings activity that enterprises and the state can be financed with domestic capital (see Chart 2). With the exception of the studies on financial claims and liabilities of the household sector mentioned above, no quantifying data on households' financial assets and liabilities were available thus far. Data were available only for single points in time and even then the figures were based largely on assumptions and estimates, without provisions for updates at regular intervals.

Chart 2

Financial Assets and Liabilities of Austria's Households



Source: OeNB.

The "households" sector's surplus – i.e. its net financial assets – amounted to ATS 2,292 billion at the end of 1997. Financial assets of ATS 3,225 billion stood against financial liabilities of ATS 933 billion. Calculated at market value, households' financial assets grew by 3% between the end of 1996 and year-end 1997 (1996 against 1995: +5%), while the debt level rose somewhat faster, by some 4% (1996 against 1995: +6%).

Gauged on GDP, households' financial assets stood at 128% at the end of 1997, while liabilities only came to 37%, which is extremely modest compared to other industrialized countries. With net financial assets of 91% of GDP, Austrian households are relatively close to the international average.[3])

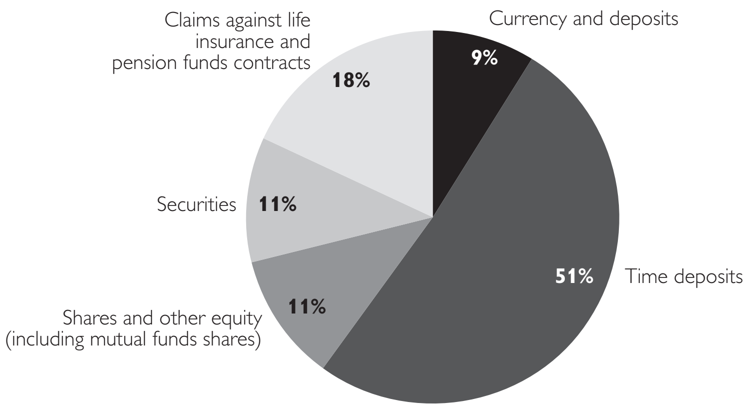
Portfolio Structure of Households' Financial Assets

See Table 4.1

As in the past, bank deposits make up the lion's share of Austrian households' financial portfolios. Savings deposits and time deposits (in schilling and foreign currency), at ATS 1,648 billion, represented more than half of households' financial assets in 1997. However, even over the very short observation period from 1995 to 1997, a distinct downward tendency be discerned for these types of assets: Their share of households' financial assets declined from 53% at the end of 1995 to 52% in 1996 and 51% at year-end 1997. The highly liquid forms of assets held in currency and in sight deposits remained more or less constant at approximately 9% throughout this period.

Chart 3

Portfolio Structure of Households' Financial Assets in 1997



Source: OeNB.

Compared with households in Germany, the ratio of highly liquid assets is more or less at a par, while other deposits' share in households' financial assets is 20 percentage points higher in Austria than in the Germany.[4])

The division of long-term financial investment into the subsectors securities, life insurance and pension funds has brought new results on Austrian households' portfolio structure. The growing importance households attach to long-term financial investment is more clearly evident than in previous statistics: At the end of 1997, Austrian households held ATS 368 billion (11%) in bonds, ATS 327 billion (10%) in shares and other equity (of which mutual funds shares, at ATS 257 billion, form by far the largest part) and ATS 592 billion (18%) in claims against life insurance and pension funds contracts. Boisterous growth, both in absolute and relative terms, was reported above all in the subsectors mutual funds shares (+ATS 55 billion or

+27% in 1997; +ATS 48 billion or +32% in 1996) and claims against life insurance and pension funds contracts (+ATS 49 billion or +9% in 1997; +ATS 60 billion or +12% in 1996).

Table A

Portfolio Structure of Households' Financial Assets at the End of 1997

	Austria	Germany
	Share of financial assets in %	
Currency and sight deposits	9	9
Other deposits (incl. building societies)	51	32
Bonds	11	14
Shares excl. mutual funds	2	8
Mutual funds shares	8	9
Net equity in life insurance and pension funds reserves[1])	18	19
Others	1	9
Total	100	100

Source: OeNB.

[1]) Including prepayments of insurance premiums and reserves for outstanding claims.

These figures illustrate the fact that the share of net equity in life insurance and pension funds reserves in Austria has attained a level close to Germany's level (Austria: 18%, Germany: some 19%), the same is true of mutual funds shares' portion of households' assets (Austria: 8%; Germany: 9%). In Austria, the proportion of households' assets held in shares and bonds is far lower than in Germany (Austria: 2 and 11%, respectively; Germany: 8 and 14%, respectively).

1 *The following studies are available in German: P. Mooslechner: „Die Geldvermögensposition privater Haushalte in Österreich," Vienna 1997; P. Brandner, P. Mooslechner: „Ökonomische Aspekte der Verschuldung privater Haushalte,"Vienna 1992; „Privatverschuldung in Österreich," edited by Institut für Gesellschaftspolitik,Vienna 1990.*

2 *In this report, the sector "households" also includes "non-profit institutions serving households (NPISH)," to the extent in which they were recorded in the primary statistics.*

3 *See also: P. Mooslechner, (1997), op. cit.: „Übersicht 27A: Finanzielle Position privater Haushalte im internationalen Vergleich."*

4 *See Table A: Own calculations on the basis of „Ergebnisse der gesamtwirtschaftlichen Finanzierungsrechnung für Deutschland 1990 bis 1997," in „Statistische Sonderveröffentlichung 4," published by Deutsche Bundesbank, 1998. The structural comparisons with Germany fail to take into account the differences between data structures and the valuation of data in the two countries.*

Table 1.1

Financial Assets (Non-consolidated) of Non-financial Corporation (S11)[1]

Financial instruments	Instrument code (ESA95)	1995	1996	1997
		End of year, ATS million		
Financial assets	**AF**	810,626	863,838	985,052
Monetary gold and SDRs	**AF1**	×	×	×
Currency and deposits	**AF2**	312,815	325,256	307,250
Currency	AF21	15,450	15,770	15,636
Transferable deposits	AF22	159,111	185,142	170,963
Other deposits	AF29	138,254	124,344	120,651
Securities other than shares	**AF3**	148,636	159,273	190,053
Securities other than shares, excluding financial derivatives	AF33	148,636	159,273	190,053
Short-term	AF331	22,292	27,142	59,712
Long-term	AF332	126,344	132,131	130,341
Financial derivatives	AF34	–	–	–
Loans	**AF4**	31,800	44,600	57,400
Short-term	AF41	16,800	18,900	26,200
Long-term	AF42	15,000	25,700	31,200
Shares and other equity	**AF5**	207,017	237,378	326,907
Shares and other equity, excluding mutual funds shares	AF51	157,708	169,148	224,571
Mutual funds shares	AF52	49,309	68,230	102,336
Insurance technical reserves	**AF6**	×	×	×
Net equity of households in life insurance reserves and in pension funds reserves	AF61	×	×	×
Net equity of households in life insurance reserves	AF611	×	×	×
Net equity of households in pension funds reserves	AF612	×	×	×
Prepayments of insurance premiums and reserve for outstanding claims	AF62	×	×	×
Other accounts receivable	**AF7**	110,358	97,331	103,442
Trade credits and advances	AF71	64,387	55,409	49,420
Other	AF79	45,971	41,922	54,022

Source: OeNB.
[1]) *Preliminary figures.*

Table 1.2

Liabilities (Non-consolidated) of Non-financial Corporation (S11)[1])

Financial instruments	Instrument code (ESA95)	1995	1996	1997
		End of year, ATS million		
Liabilities	**AF**	1,985,345	2,094,911	2,329,174
Currency and deposits	**AF2**	×	×	×
Currency	AF21	×	×	×
Transferable deposits	AF22	×	×	×
Other deposits	AF29	×	×	×
Securities other than shares	**AF3**	107,759	94,417	165,648
Securities other than shares, excluding financial derivatives	AF33	107,757	94,417	165,648
Short-term	AF331	1,857	492	5,160
Long-term	AF332	105,900	93,925	160,488
Financial derivatives	AF34	2	–	–
Loans	**AF4**	1,427,464	1,527,235	1,599,171
Short-term	AF41	494,104	514,576	522,556
Long-term	AF42	933,360	1,012,659	1,076,615
Shares and other equity	**AF5**	366,243	400,887	492,076
Shares and other equity, excluding mutual funds shares	AF51	366,243	400,887	492,076
Mutual funds shares	AF52	×	×	×
Insurance technical reserves	**AF6**	×	×	×
Net equity of households in life insurance reserves and in pension funds reserves	AF61	×	×	×
Net equity of households in life insurance reserves	AF611	×	×	×
Net equity of households in pension funds reserves	AF612	×	×	×
Prepayments of insurance premiums and reserve for outstanding claims	AF62	×	×	×
Other accounts payable	**AF7**	83,879	72,372	72,279
Trade credits and advances	AF71	44,000	42,000	37,979
Other	AF79	39,879	30,372	34,300
Net financial assets	**BF90**	−1,174,719	−1,231,073	−1,344,122

Source: OeNB.
[1]) Preliminary figures.

Table 2.1

Financial Assets (Non-consolidated) of Non-financial Corporation (S11)[1])

Financial instruments	Instrument code (ESA95)	1995	1996	1997
		% of total		
Financial assets	**AF**	100.0	100.0	100.0
Monetary gold and SDRs	**AF1**	×	×	×
Currency and deposits	AF2	38.6	37.7	31.2
Currency	AF21	1.9	1.8	1.6
Transferable deposits	AF22	19.6	21.4	17.4
Other deposits	AF29	17.1	14.4	12.2
Securities other than shares	**AF3**	18.3	18.4	19.3
Securities other than shares, excluding financial derivatives	AF33	18.3	18.4	19.3
Short-term	AF331	2.7	3.1	6.1
Long-term	AF332	15.6	15.3	13.2
Financial derivatives	AF34	–	–	–
Loans	**AF4**	3.9	5.2	5.8
Short-term	AF41	2.1	2.2	2.7
Long-term	AF42	1.9	3.0	3.2
Shares and other equity	**AF5**	25.5	27.5	33.2
Shares and other equity, excluding mutual funds shares	AF51	19.5	19.6	22.8
Mutual funds shares	AF52	6.1	7.9	10.4
Insurance technical reserves	**AF6**	×	×	×
Net equity of households in life insurance reserves and in pension funds reserves	AF61	×	×	×
Net equity of households in life insurance reserves	AF611	×	×	×
Net equity of households in pension funds reserves	AF612	×	×	×
Prepayments of insurance premiums and reserve for outstanding claims	AF62	×	×	×
Other accounts receivable	**AF7**	13.6	11.3	10.5
Trade credits and advances	AF71	7.9	6.4	5.0
Other	AF79	5.7	4.9	5.5

Source: OeNB.
[1]) *Preliminary figures.*

Table 2.2

Liabilities (Non-consolidated) of Non-financial Corporation (S11)[1])

Financial instruments	Instrument code (ESA95)	1995	1996	1997
		% of total		
Liabilities	**AF**	100.0	100.0	100.0
Currency and deposits	**AF2**	×	×	×
Currency	AF21	×	×	×
Transferable deposits	AF22	×	×	×
Other deposits	AF29	×	×	×
Securities other than shares	**AF3**	5.4	4.5	7.1
Securities other than shares, excluding financial derivatives	AF33	5.4	4.5	7.1
Short-term	AF331	0.1	0.0	0.2
Long-term	AF332	5.3	4.5	6.9
Financial derivatives	AF34	0.0	–	–
Loans	**AF4**	71.9	72.9	68.7
Short-term	AF41	24.9	24.6	22.4
Long-term	AF42	47.0	48.3	46.2
Shares and other equity	**AF5**	18.4	19.1	21.1
Shares and other equity, excluding mutual funds shares	AF51	18.4	19.1	21.1
Mutual funds shares	AF52	×	×	×
Insurance technical reserves	**AF6**	×	×	×
Net equity of households in life insurance reserves and in pension funds reserves	AF61	×	×	×
Net equity of households in life insurance reserves	AF611	×	×	×
Net equity of households in pension funds reserves	AF612	×	×	×
Prepayments of insurance premiums and reserve for outstanding claims	AF62	×	×	×
Other accounts payable	**AF7**	4.2	3.5	3.1
Trade credits and advances	AF71	2.2	2.0	1.6
Other	AF79	2.0	1.4	1.5

Source: OeNB.
[1]) Preliminary figures.

Table 3.1

Financial Assets (Non-consolidated) of Households and Non-profit Institutions Serving Households (S14 and S15)[1]

Financial instruments	Instrument code (ESA95)	1995	1996	1997
		End of year, ATS million		
Financial assets	**AF**	2,988,937	3,125,770	3,224,847
Monetary gold and SDRs	**AF1**	×	×	×
Currency and deposits	**AF2**	1,843,656	1,909,047	1,937,615
Currency	AF21	139,052	141,929	140,721
Transferable deposits	AF22	129,244	151,670	148,400
Other deposits	AF29	1,575,360	1,615,448	1,648,494
Securities other than shares	**AF3**	447,600	414,869	368,415
Securities other than shares, excluding financial derivatives	AF33	447,600	414,869	368,415
Short-term	AF331	5,726	5,252	2,398
Long-term	AF332	441,874	409,617	366,017
Financial derivatives	AF34	×	×	×
Loans	**AF4**	–	–	–
Short-term	AF41	–	–	–
Long-term	AF42	–	–	–
Shares and other equity	**AF5**	215,129	259,288	326,911
Shares and other equity, excluding mutual funds shares	AF51	61,612	57,299	69,746
Mutual funds shares	AF52	153,517	201,989	257,165
Insurance technical reserves	**AF6**	482,366	542,209	591,542
Net equity of households in life insurance reserves and in pension funds reserves	AF61	355,353	406,389	445,428
Net equity of households in life insurance reserves	AF611	309,126	352,328	379,593
Net equity of households in pension funds reserves	AF612	46,227	54,061	65,835
Prepayments of insurance premiums and reserve for outstanding claims	AF62	127,013	135,820	146,114
Other accounts receivable	**AF7**	186	357	364
Trade credits and advances	AF71	–	–	–
Other	AF79	186	357	364

Source: OeNB.
[1]) *Preliminary figures.*

Table 3.2

Liabilities (Non-consolidated) of Households and Non-profit Institutions Serving Households (S14 and S15)[1])

Financial instruments	Instrument code (ESA95)	1995	1996	1997
		End of year, ATS million		
Liabilities	**AF**	852,419	901,090	933,213
Currency and deposits	**AF2**	×	×	×
Currency	AF21	×	×	×
Transferable deposits	AF22	×	×	×
Other deposits	AF29	×	×	×
Securities other than shares	**AF3**	×	×	×
Securities other than shares, excluding financial derivatives	AF33	×	×	×
Short-term	AF331	×	×	×
Long-term	AF332	×	×	×
Financial derivatives	AF34	×	×	×
Loans	**AF4**	852,343	900,991	933,114
Short-term	AF41	83,019	91,726	96,196
Long-term	AF42	769,324	809,265	836,918
Shares and other equity	**AF5**	×	×	×
Shares and other equity, excluding mutual funds shares	AF51	×	×	×
Mutual funds shares	AF52	×	×	×
Insurance technical reserves	**AF6**	×	×	×
Net equity of households in life insurance reserves and in pension funds reserves	AF61	×	×	×
Net equity of households in life insurance reserves	AF611	×	×	×
Net equity of households in pension funds reserves	AF612	×	×	×
Prepayments of insurance premiums and reserve for outstanding claims	AF62	×	×	×
Other accounts payable	**AF7**	76	99	99
Trade credits and advances	AF71	–	–	–
Other	AF79	76	99	99
Net financial assets	**BF90**	2,136,518	2,224,680	2,291,634

Source: OeNB.
[1]) Preliminary figures.

Table 4.1

Financial Assets (Non-consolidated) of Households and Non-profit Institutions Serving Households (S14 and S15)[1])

Financial instruments	Instrument code (ESA95)	1995	1996	1997
		% of total		
Financial assets	**AF**	100.0	100.0	100.0
Monetary gold and SDRs	**AF1**	×	×	×
Currency and deposits	**AF2**	61.7	61.1	60.1
Currency	AF21	4.7	4.5	4.4
Transferable deposits	AF22	4.3	4.9	4.6
Other deposits	AF29	52.7	51.7	51.1
Securities other than shares	**AF3**	15.0	13.3	11.4
Securities other than shares, excluding financial derivatives	AF33	15.0	13.3	11.4
Short-term	AF331	0.2	0.2	0.1
Long-term	AF332	14.8	13.1	11.3
Financial derivatives	AF34	×	×	×
Loans	**AF4**	–	–	–
Short-term	AF41	–	–	–
Long-term	AF42	–	–	–
Shares and other equity	**AF5**	7.2	8.3	10.1
Shares and other equity, excluding mutual funds shares	AF51	2.1	1.8	2.2
Mutual funds shares	AF52	5.1	6.5	8.0
Insurance technical reserves	**AF6**	16.1	17.3	18.3
Net equity of households in life insurance reserves and in pension funds reserves	AF61	11.9	13.0	13.8
Net equity of households in life insurance reserves	AF611	10.3	11.3	11.8
Net equity of households in pension funds reserves	AF612	1.5	1.7	2.0
Prepayments of insurance premiums and reserve for outstanding claims	AF62	4.2	4.3	4.5
Other accounts receivable	**AF7**	0.0	0.0	0.0
Trade credits and advances	AF71	–	–	–
Other	AF79	0.0	0.0	0.0

Source: OeNB.

[1]) *Preliminary figures.*

Table 4.2

Liabilities (Non-consolidated) of Households and Non-profit Institutions Serving Households (S14 and S15)[1])

Financial instruments	Instrument code (ESA95)	1995	1996	1997
		% of total		
Liabilities	**AF**	100.0	100.0	100.0
Currency and deposits	**AF2**	×	×	×
Currency	AF21	×	×	×
Transferable deposits	AF22	×	×	×
Other deposits	AF29	×	×	×
Securities other than shares	**AF3**	×	×	×
Securities other than shares, excluding financial derivatives	AF33	×	×	×
Short-term	AF331	×	×	×
Long-term	AF332	×	×	×
Financial derivatives	AF34	×	×	×
Loans	**AF4**	100.0	100.0	100.0
Short-term	AF41	9.7	10.2	10.3
Long-term	AF42	90.3	89.8	89.7
Shares and other equity	**AF5**	×	×	×
Shares and other equity, excluding mutual funds shares	AF51	×	×	×
Mutual funds shares	AF52	×	×	×
Insurance technical reserves	**AF6**	×	×	×
Net equity of households in life insurance reserves and in pension funds reserves	AF61	×	×	×
Net equity of households in life insurance reserves	AF611	×	×	×
Net equity of households in pension funds reserves	AF612	×	×	×
Prepayments of insurance premiums and reserve for outstanding claims	AF62	×	×	×
Other accounts receivable	**AF7**	0.0	0.0	0.0
Trade credits and advances	AF71	–	–	–
Other	AF79	0.0	0.0	0.0

Source: OeNB.
[1]) Preliminary figures.

Studies

An International Comparison of Term Structures – Estimations Using the OeNB Model

Richard Mader

Term Structures – The Basic Concept

The term structure of interest rates can be used as a basis for calculations of the present value of future cash-flows. It is based on the relation between bond prices and associated coupon and redemption payments. The term structure provides an interest rate, the so-called spot rate, for each maturity (which is defined as the time to payment). The term structure curve reflects the formal relation between interest rate and maturity. This type of representation is used ever more frequently internationally. *It allows for a more accurate analysis of interest rate expectations in bond markets than other approaches and ensures better comparability of international interest rate developments.*

In this context, the difference between the term structure and the yield structure is important to note. The yield to maturity of a bond assumes one single interest rate applying to all payments, regardless of their respective maturities. Yield to maturity can also be interpreted as an average interest rate. When the term structure shows a rising (falling) tendency, the yield curve is below (above) the term structure curve so that interest rates are underestimated (overestimated). *Thus, yield structures are not fully suited to support monetary policy decisions.*

All term structures imply forward rates. Forward rates pertain to interest on investments at a future point of time. Forward rates can be calculated from the differences between spot rates for various maturities. According to the expectations theory of the term structure, forward rates equal expected future spot rates. Thus, forward rates are particularly interesting from the monetary policy angle. However, the expectations theory of the term structure neither accounts for risk premia nor for liquidity premia although, in practice, these have a strong bearing on implied forward rates. Since the existence of risk and liquidity premia cannot be disproved empirically, forward rates should rather be interpreted with caution.

Term Structure Estimations

The spot rate pertaining to a certain maturity can directly be determined from the price of a zero coupon bond. In most markets, calculations of term structure curves directly based on zero bonds will cause problems because the prices of zero bonds with a sufficient range of maturities are needed. However, most countries, with the exception of the United States, do not have a liquid market of zero bonds covering the entire range of maturities.[1]) The instruments traded in the bond markets are primarily coupon bonds. Estimates of term structures on the basis of observed coupon-bond market prices can only be produced by means of an econometric model. Due to favorable empirical experience, the Nelson/Siegel model[2]) was selected for the purpose.

The basic idea behind this approach can be summarized as follows: First, the following functional relationship between interest rate r and maturity m is assumed:

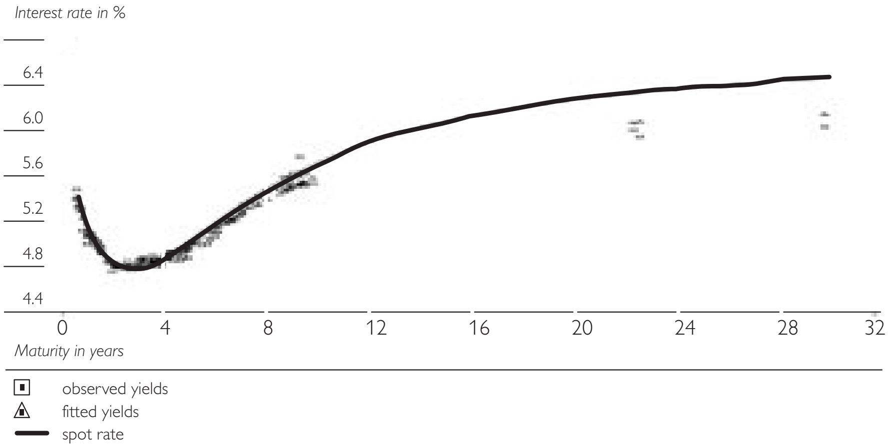
$$r(m, \beta)=\beta_0+\beta_1\left(\frac{1-\exp(-m/\tau_1)}{(-m/\tau_1)}\right)+\beta_2\left(\frac{1-\exp(-m/\tau_1)}{(-m/\tau_1)}-\exp(-m/\tau_1)\right).$$

The four parameters $\beta = \{\beta_0,\beta_1,\beta_2,\tau_1\}$= determine the shape of the curve. The parameters β_0 and β_1 can be interpreted as follows: β_0 is the long-term interest rate obtained as maturity tends to infinity. If maturity tends to zero, the spot rate converges on the sum $\beta_0+\beta_1$. This further implies that $(-\beta_1)$ equals the spread between long-term and short-term interest rates. The parameters β_2 and τ_1 determine the shape of the curve, there is no direct economic interpretation to them. *The Nelson/Siegel function is very flexible, enabling the representation of curves that may rise or fall monotonically, or are U-shaped or S-shaped.*

Estimation of Parameters on the Basis of Bond Prices

Coupon payments of traded bonds can be discounted on the basis of the Nelson/Siegel function. The resulting cash values can be compared with the market prices[3]) of bonds. For an estimation of the term structure, the model parameters are modified until model prices coincide with market prices. Term structure estimates can be improved – especially for short times to maturity – if the fit of observed yields to yields implied in the model is applied as a criterion.

The illustration below demonstrates the flexibility of the Nelson/Siegel model; it depicts a typical result of the model estimation. Observed yields are indicated by squares, fitted yields – i.e. yields implied in the model – are indicated by triangles. There is close correspondence between data and model, in particular for maturities of up to 10 years. The flexible functional form of the Nelson/Siegel model provides for a reasonable approximation of different interest rate levels across maturities. The spot rate curve is smooth and, as expected, lies above yields in long maturities. Fitted yields and spot rates only coincide (approximately) if no more than one or few coupon payments remain outstanding.



Source: OeNB.

Daily Estimations for Five Countries

The OeNB used the Nelson/Siegel model for estimations of the term structure curves pertaining to Austria, Germany, the United Kingdom, the U.S.A. and Japan. The model was applied to estimations for all trading days from January 1993 to July 1998. Country-specific conventions for accrued interest calculations, which may be due to different settlement and ex-dividend periods,[4)] were taken into account. Bonds containing options were excluded (e.g. convertible bonds and warrant bonds) because their prices cannot be compared with those of regular bonds. Moreover, only government bonds were used because they are not subject to credit risk. Tax effects were deliberately left unaccounted for since it is difficult to define a tax rate applicable to the whole market.

The number of bonds which can be used for the model estimation changes in the course of time. The range of maturities cannot always be covered fully. However, the basis of data available for each country was always large enough to produce reliable term structure estimates. On average, 64 bonds were taken into account for Austria, 105 for Germany, 39 for the United Kingdom, 172 for the Unites States, and 109 for Japan. In about two thirds of the bonds from Germany and the United States used in the estimates, remaining times to maturity were in the range of up to five years while the bonds from the other three countries were spread almost evenly across the entire range of maturities up to 10 years. In the U.S.A., the U.K. and Japan, there is also a relatively large number of bonds with maturities exceeding 10 years.

Typical Shapes

As the shapes of the curves representing estimated term structures differ, the following tendencies can be summarized. During the sample period from 1993 to 1998, term structure development was predominantly represented by a simple and monotonically rising curve. Flat or inverted term structures were rare. From mid 1997 to mid 1998 (the end of the sample period), an inversion of the term structure was observed in the United Kingdom. Its beginning coincides with the Labour Party's coming into power. U-shaped or S-shaped curves are very rare and can be observed for short periods only, Germany – with a U-shaped term structure from early 1993 to early 1994 – being one exception.

Thus, the extension of the Nelson/Siegel model according to Svensson[5)] used by some central banks has turned out not to be necessary. Several experiments using the Svensson extension have shown that the additional flexibility it offers is not actually required when the term structure curve has a conventional shape (which is usually the case). The Nelson/Siegel model represents U-shaped or S-shaped curves almost equally well. Apart from the fact that longer periods of time are needed for estimations, the Svensson model has a drawback in that it is prone to outliers and may reflect spurious features of the term structure.

Interest Rate Developments over Time

The most important results can be summarized as follows: The term structure for Austria (Chart 1) and Germany (Chart 2) from 1993 to mid 1994 was inverted or flat. Long-term interest rates in both countries fell almost monotonically as from late 1994, with the interest spread widening until late 1996 and narrowing again as from 1997. Similar irregularities in term structure developments can be found in the United Kingdom where the term structure was inverted from around mid 1997 to the end of the sample period in mid 1998 (Chart 3). During the period from 1993 to 1997, the term structure curve showed various slopes and curvatures. In the years 1993 and 1994, the difference between long-term and short-term interest rates decreased markedly and then remained about the same until 1997 (Chart 4). As from 1997, the term structure curve was relatively flat, the interest rate level fell. The term structure development observed in Japan was very regular. As from 1993, the interest rate level for all maturities decreased almost monotonically, with the difference between long-term and short-term interest rates largely remaining constant (Chart 5).

Summary

Having developed its own model on the basis of the Nelson/Siegel method, the OeNB is now in a position to carry out regular term structure estimations. The model is based on data obtained from Datastream which produced good empirical results during the sample period from 1993 to 1998. Term structure estimations using up-to-date data can thus be done for several countries without delay. The term structure model is an additional analytical tool available to the OeNB. It will not only be used for the correct representation of term structures but also in the field of inflation and output forecasts. The spot rates obtained from the model will serve as a basis for further empirical research.

1 *However, a number of countries – including Germany and Austria – have started to establish market segments for stripable bonds.*

2 *Nelson, C. R., Siegel, A. F. (1987): "Parsimonious modeling of yield curves." Journal of Business, vol. 60, 474–489.*

3 *In this context, accrued interest has to be taken into account.*

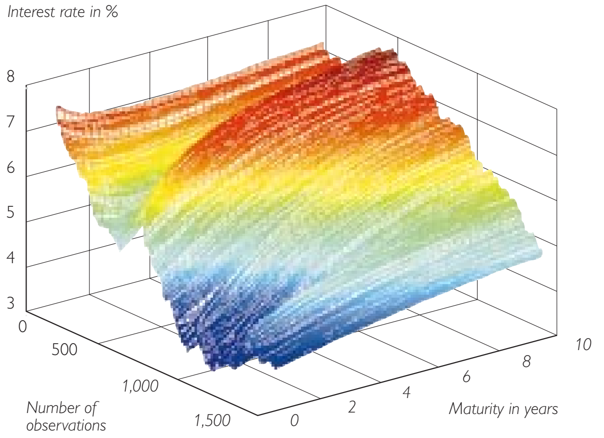
4 *During the ex-dividend phase, bonds do not entitle to the following coupon payment. Accrued interest is negative.*

5 *Svensson, L.E.O. (1994): "Estimating and interpreting forward interest rates: Sweden 1992–1993." CEPR Discussion Paper, no. 1.*

Chart 1

Spot Rates – Austria

January 1, 1993 to July 31, 1998

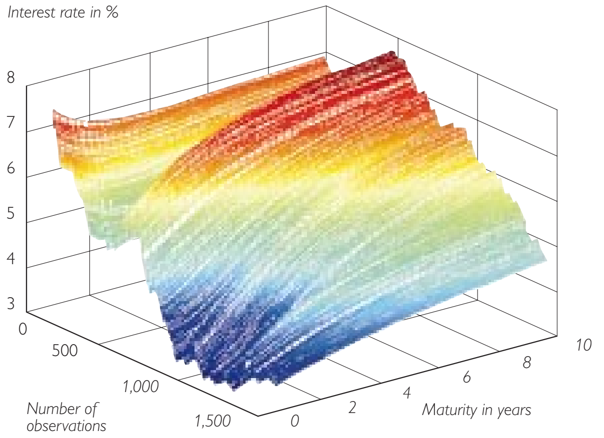


OeNB model: Nelson-Siegel.

Chart 2

Spot Rates – Germany

January 1, 1993 to July 31, 1998

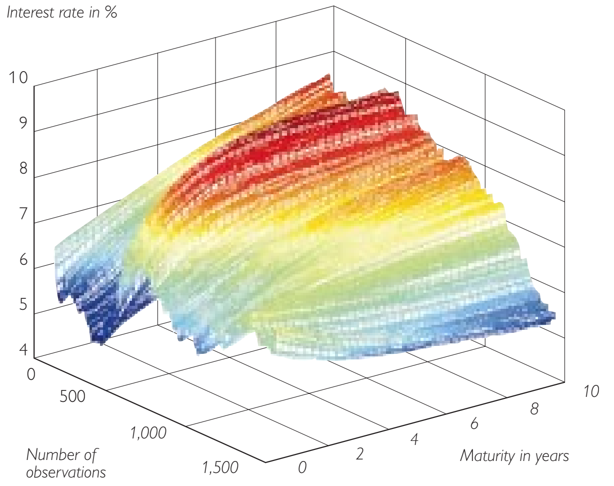


OeNB model: Nelson-Siegel.

Chart 3

Spot Rates – United Kingdom

January 1, 1993 to July 31, 1998

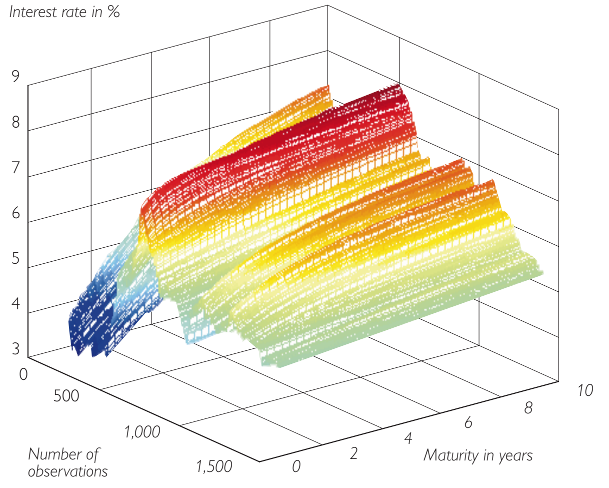


OeNB model: Nelson-Siegel.

Chart 4

Spot Rates – U.S.A.

January 1, 1993 to July 31, 1998

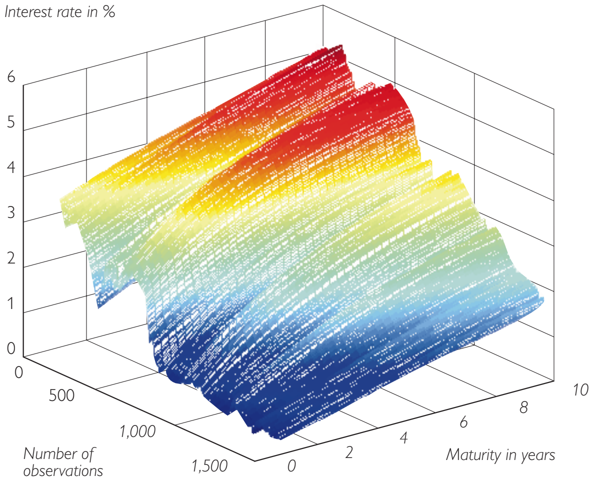


OeNB model: Nelson-Siegel.

Chart 5

Spot Rates – Japan

January 1, 1993 to July 31, 1998

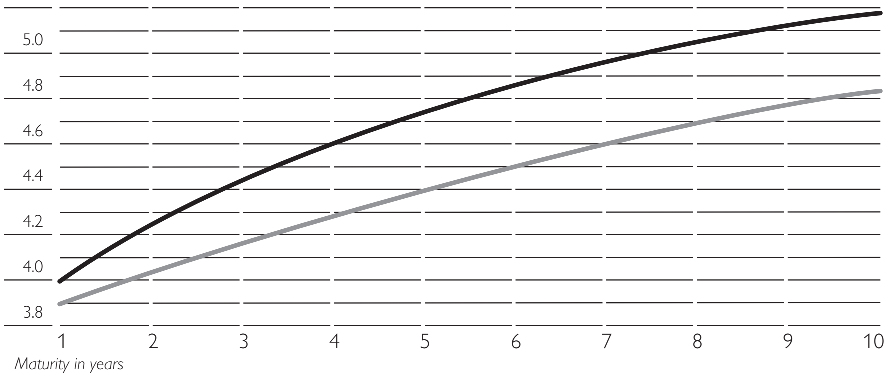


OeNB model: Nelson-Siegel.

Spot Rates – Austria

April 30, 1998 to July 31, 1998

Interest rate in %



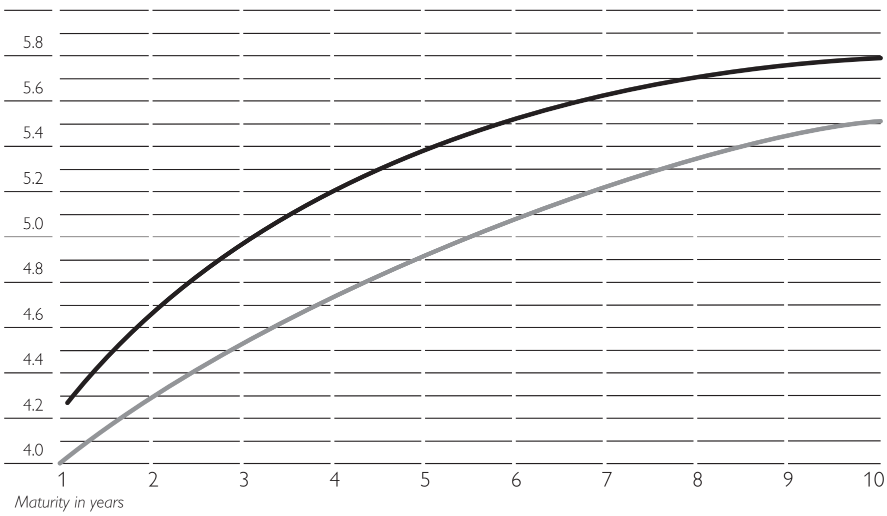
April 30, 1998
July 31, 1998

OeNB model: Nelson-Siegel.

Forward Rates – Austria

April 30, 1998 to July 31, 1998

Interest rate in %

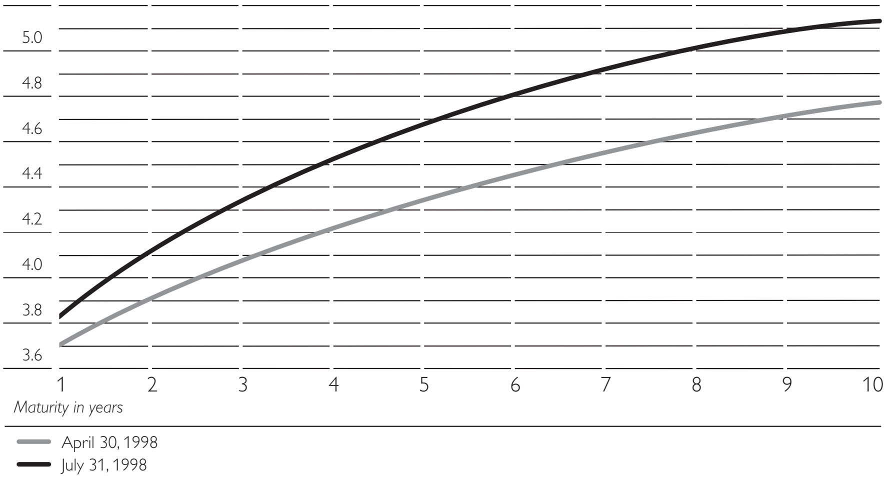


April 30, 1998
July 31, 1998

OeNB model: Nelson-Siegel.

Spot Rates – Germany

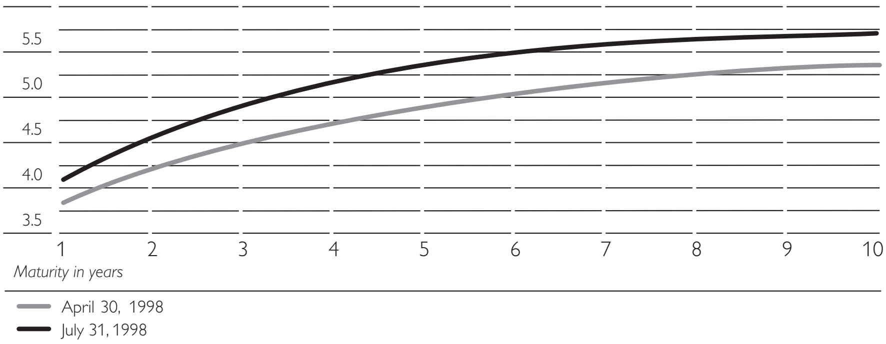
April 30, 1998 to July 31, 1998
Interest rate in %



OeNB model: Nelson-Siegel.

Forward Rates – Germany

April 30, 1998 to July 31, 1998
Interest rate in %

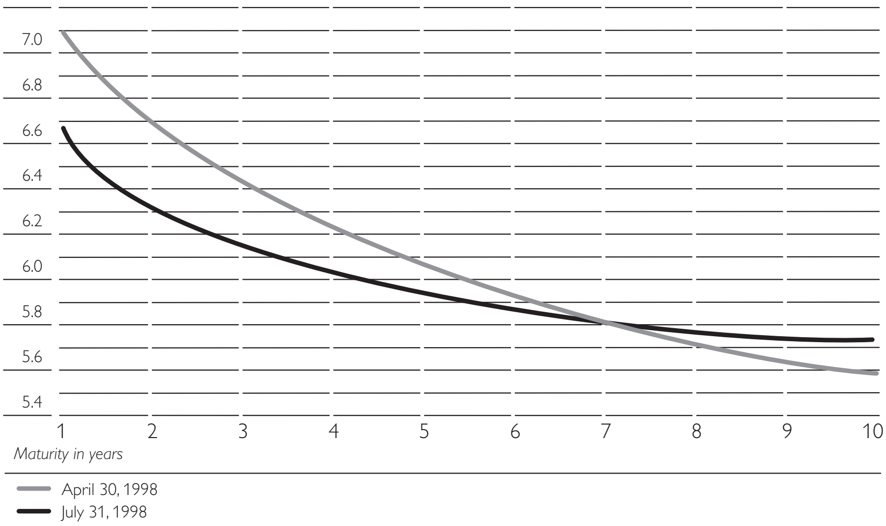


OeNB model: Nelson-Siegel.

Spot Rates – United Kingdom

April 30, 1998 to July 31, 1998

Interest rate in %

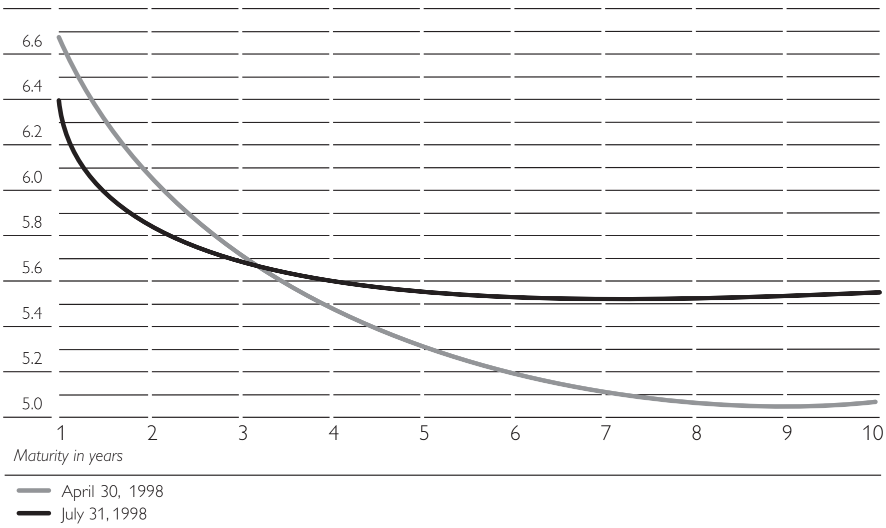


OeNB model: Nelson-Siegel.

Forward Rates – United Kingdom

April 30, 1998 to July 31, 1998

Interest rate in %

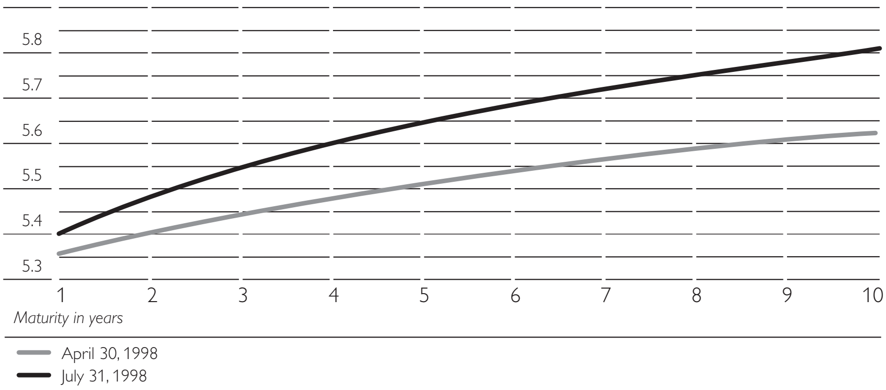


OeNB model: Nelson-Siegel.

Spot Rates – U.S.A.

April 30, 1998 to July 31, 1998

Interest rate in %

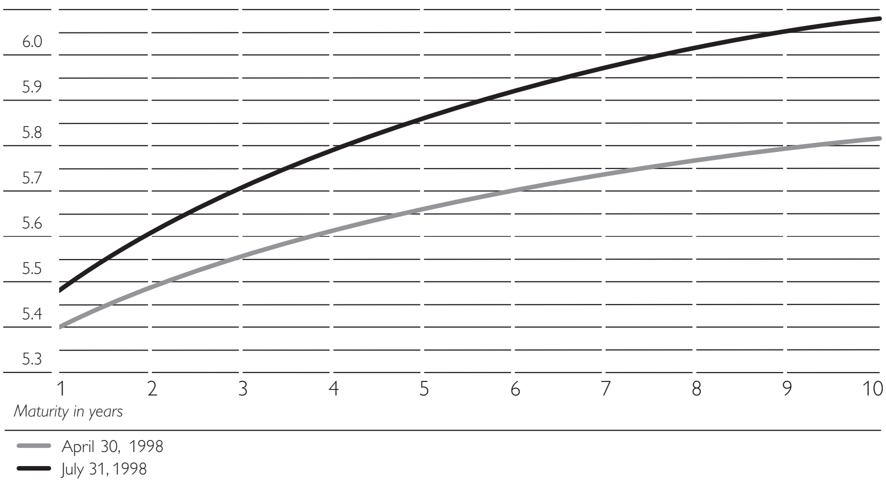


OeNB model: Nelson-Siegel.

Forward Rates – U.S.A.

April 30, 1998 to July 31, 1998

Interest rate in %

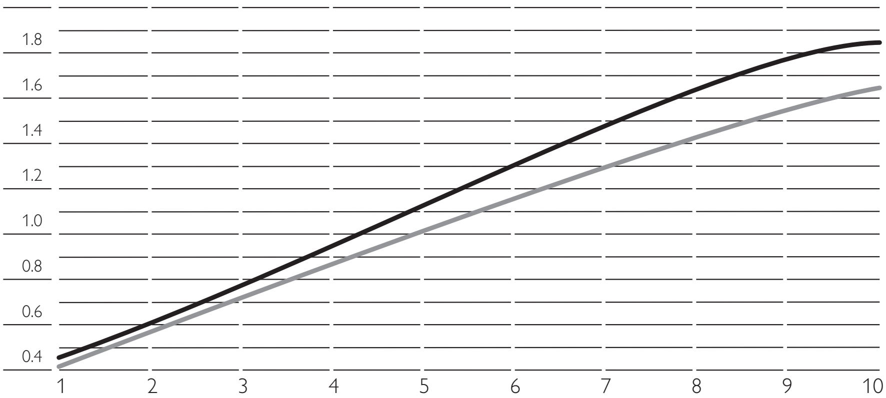


OeNB model: Nelson-Siegel.

Spot Rates – Japan

April 30, 1998 to July 31, 1998

Interest rate in %



Maturity in years

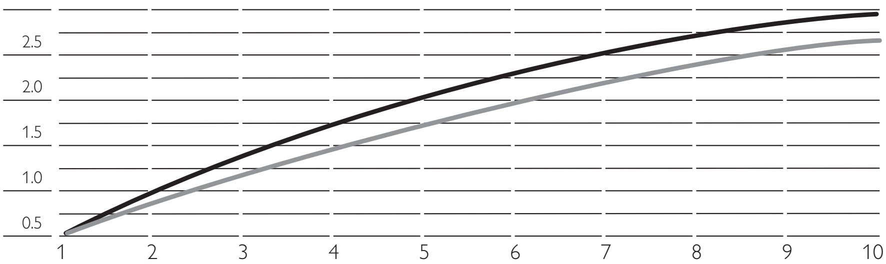
April 30, 1998
July 31, 1998

OeNB model: Nelson-Siegel.

Forward Rates – Japan

April 30, 1998 to July 31, 1998

Interest rate in %



Maturity in years

April 30, 1998
July 31, 1998

OeNB model: Nelson-Siegel.

Abbreviations

AMS	Arbeitsmarktservice Österreich (Austrian Public Employment Office)
ARTIS	Austrian Real Time Interbank Settlement
BWA	Bundes-Wertpapieraufsicht (Federal Securities Supervisory Authority)
BWG	Bankwesengesetz (amendments to the Banking Act)
CAD	Capital Adequacy Directive
CEECs	Central and Eastern European Countries
COICOP	Classification Of Individual Consumption by Purpose
CPI	Consumer Price Index
EC	European Community
ECB	European Central Bank
EEA	European Economic Area
EEC	European Economic Community
EGVG	Einführungsgesetz der Verwaltungsverfahrensgesetze (Introductory Act to the Administrative Procedure Acts)
EMI	European Monetary Institute
EMU	Economic and Monetary Union
EQOS	Electronic Quote and Order Driven System
ERM	Exchange Rate Mechanism
ERP	European Recovery Program
ESCB	European System of Central Banks
ESNA	European System of National Accounts
EU	European Union
EUROSTAT	Statistical Office of the European Communities
GDP	Gross Domestic Product
GOMEX	Zinssatz für kurzfristige Geldmarkt-Offenmarktgeschäfte (interest rate for short-term open market operations)
HICP	Harmonized Index of Consumer Prices
IHS	Institut für Höhere Studien (Institute for Advanced Studies)
IIP	International Investment Position
IMF	International Monetary Fund
NACE	Nomenclature générale des Activités économiques dans les Communautés Européennes (Statistical Classification of Economic Activities)
ÖCPA	Austrian version of the Classification of Products by Activities
OECD	Organisation for Economic Co-operation and Development
OeKB	Oesterreichische Kontrollbank
OeNB	Oesterreichische Nationalbank
ÖNACE	Austrian version of the Statistical Classification of Economic Activities
ÖSTAT	Österreichisches Statistisches Zentralamt (Austrian Central Statistical Office)
REGOM	Liquiditätsabschöpfende Offenmarktgeschäfte (interest rate for contractionary short-term open market transactions)
RTGS	Real-Time Gross Settlement System
SDR	Special Drawing Right
SNA	System of National Accounts
TARGET	Trans-European Automated Real-Time Gross Settlement Express Transfer System
TEU	Treaty on European Union
VIBOR	Vienna Interbank Offered Rate
WAG	Wertpapieraufsichtsgesetz (Securities Supervision Act)
WIFO	Österreichisches Institut für Wirtschaftsforschung (Austrian Institute of Economic Research)

Legend

– = The numerical value is zero.
. = Data not available at the reporting date
× = For technical reasons no data can be indicated
0 = A quantity which is smaller than half of the unit indicated
_ = New series
Note: Apparent arithmetical discrepancies in the tables are due to rounding.

Official Announcements of the Oesterreichische Nationalbank

Please see the German-language publication "Berichte und Studien" for a list of all Official Announcements in German.

Official Announcements Regarding the Foreign Exchange Law

		Authentic German text published in the Official Gazette (Amtsblatt zur Wiener Zeitung)	Translation published in "Reports and Summaries" issue no.
DL 1/91	Promulgation of the new Official Announcements regarding the Foreign Exchange Law; general provisions 1. Issuance of new Official Announcements 2. Definitions 3. Fees	Sept. 24, 1991	4/1991
DL 2/91	Granting of general licenses 1. General license 2. Waiver of obligation to declare; release 3. Nonbanks 4. Banks not engaged in foreign business 5. Foreign exchange dealers 6. Exchange bureaus 7. Special banks and financial institutions 8. Provisions applying to both banks and financial institutions	Sept. 24, 1991	4/1991
DL 3/91	Reporting requirements 1. General provisions 2. Exemptions from the reporting obligation 3. General reports 4. Reports by banks 5. Reports by nonbanks and financial institutions 6. Special reports	Sept. 24, 1991	4/1991
DL 4/91	Assets of nonresidents with residence (domicile) in Iraq	Oct. 29, 1991	4/1991
DL 2/93	Modification of the Official Announcement DL 3/91	May 5, 1993	2/1993
DL 3/93	Modification of Official Announcement DL 2/91; Sanctions of the United Nations Against Libya (SC Resolution No. 883/1993)	Dec. 15, 1993	4/1993
DL 1/96	Modification of Official Announcement DL 3/91	Sept. 3, 1996	3/1996
DL 1/99	Modification of Official Announcements DL 2/91 and DL 3/91 to the Foreign Exchange Act	Dec. 21, 1998	4/1998

Official Announcements Regarding Minimum Reserve Requirements

Council Regulation (EC) No 2531/98 of November 23, 1998 concerning the application of minimum reserves by the European Central Bank

Regulation (EC) No 2818/98 of the European Central Bank of December 1, 1998 on the application of minimum reserves

Council Regulation (EC) No 2532/98 of November 23, 1998 concerning the powers of the European Central Bank to impose sanctions

List of Reports, Summaries and Studies[1])

Published in
F = "Focus on Austria"

Please see the German-language publication "Berichte und Studien" for a list of all German-language reports, studies and special publications of the OeNB.

1 For a comprehensive list of reports, summaries and studies hitherto published please refer to issue no. 1/1999 of "Focus on Austria."

Published in
F = "Focus on Austria"

Austrian Real Economy

Economic Background	F 1/1998
Economic Background	F 2/1998
Economic Background	F 3/1998
Economic Background	F 4/1998
Economic Background	F 1/1999
Financial Assets and Liabilities of Enterprises and Households in the Year 1995 to 1997	F 1/1999

External Sector

Austria's Balance of Portfolio Investment 1997	F 2/1998
Balance of Payments in 1997	F 2/1998
Conceptual Changes in the Austrian Balance of Payments	F 2/1998
Balance of Payments in the First Quarter of 1998	F 3/1998
Balance of Payments in the First Half of 1998	F 4/1998
Balance of Payments in the First Three Quarters of 1998	F 1/1999
Austria's International Investment Position in 1997	F 1/1999
Special Survey on the Regional Allocation of Nonresident Securities Held by Residents as of December 31, 1997	F 1/1999

Economic and Monetary Union

Disinflation and Fiscal Indicators – A Comparative Analysis of the EU Meber States between 1970 and 1996	F 2/1998
Core Inflation in Selected European Union Countries	F 3/1998

Publications of the Oesterreichische Nationalbank

	Published
Periodical Publications	
Statistisches Monatsheft	monthly
Statistische Daten der inländischen Kreditinstitute (advance excerpts from “Statistisches Monatsheft”)	monthly
Leistungsbilanz Österreichs, revidierte Jahresdaten gegliedert nach Regionen und Währungen	annually
Berichte und Studien	quarterly
Focus on Austria (selected chapters from “Berichte und Studien”)	quarterly
Focus on Transition	semiannually
Geschäftsbericht	annually
Annual Report (English translation of “Geschäftsbericht”)	annually
Volkswirtschaftliche Tagung (for a list of the topics discussed at the conferences see below)	annually
The Austrian Financial Markets – A Survey of Austria’s Capital Markets – Facts and Figures	annually
Other Publications	
National Bank Act 1984 (as of September 1990)	1990
New Developments in Banking and Finance in East and West (Kranichberg 1989)	1990
Erfahrungen Österreichs beim Übergang von administrativer Regulierung zur Marktwirtschaft (Moscow 1990)	1990
Challenges for European Bank Managers in the 1990s (Badgastein 1990)	1991
From Control to Market – Austria’s Experiences in the Post-War Period (Warsaw 1990)	1991
The Economic Opening of Eastern Europe (Bergsten Conference Vienna 1991)	1991[1])
Erneuerung durch Integration – 175 Jahre Oesterreichische Nationalbank	1991
Striking a Balance – 175 Years of Austrian National Bank	1991
Transparente Dispositionen – Liberalisierter Devisenverkehr unter Beachtung internationaler Publizitätsverpflichtungen	1991
Ausgeglichene Position – Die neue Präsentation der österreichischen Zahlungsbilanz	1992
Aktive Bilanz – Ein Jahr vollständig liberalisierter Devisenverkehr in Österreich	1992
Nationalbankgesetz 1984 (as of January 1993)	1993
Economic Consequences of Soviet Disintegration (Bergsten Conference Vienna 1992)	1993
Neuorientierung – Internationale Vermögensposition und Außenwirtschaftliche Investitionsbilanz Österreichs	1993[1])
Bankwesengesetz 1993	1994[1])

1 *Out of print.*

	Published
Other Publications (cont.)	
Internationale Vermögensposition 1992 – Die grenzüberschreitenden Forderungen und Verpflichtungen Österreichs	1994[1])
International Investment Position for 1992 – Austria's cross-border assets and liabilities	1994
Western Europe in Transition: The Impact of the Opening up of Eastern Europe and the former Soviet Union	1995
Die Oesterreichische Nationalbank als Unternehmen	1996
Monetary Policy in Central and Eastern Europe: Challenges of EU Integration 1996	1996[1])
Monetary Policy in Transition in East and West	1997
Die Auswirkungen des Euro auf den Finanzmarkt Österreich	1997[1])
Die Bank der Banken	1997
Die Zukunft des Geldes: Auf dem Weg zum Euro Grundlagen – Strukturen – Termine	1997
Geld und Währung	1997
Kompendium von Texten zur Wirtschafts- und Währungsunion	1997
Information literature on banknote security	recurrently
Working Papers (for a list of the topics discussed in the papers, see below)	occasionally
Videos	
Wie Mozart entsteht (banknote security)	1990
The Evolution of W. A. Mozart (English version of "Wie Mozart entsteht")	1995
Bank der Banken (tasks and functions of the OeNB)	1991
The Banks' Bank (English version of "Bank der Banken")	1991

1 *Out of print.*

List of the Topics Discussed at the Volkswirtschaftliche Tagungen

1975	Die ökonomischen, politischen und sozialen Konsequenzen der Wachstumsverlangsamung
1976	Störungsanfällige Bereiche in unserem ökonomischen und sozialen System
1977	Fiskalismus kontra Monetarismus
1978	Wirtschaftsprognose und Wirtschaftspolitik
1979	Technik-, Wirtschaftswachstums-, Wissenschaftsverdrossenheit: Die neue Romantik – Analyse einer Zeitströmung
1980	Probleme der Leistungsbilanz in den achtziger Jahren
1981	Systemkrisen in Ost und West
1982	Forschung und Wirtschaftswachstum
1983	Ausweg aus der Krise – Wege der Wirtschaftstheorie und Wirtschaftspolitik
1984	Der Weg zur Welthandelsnation
1985	Weltanschauung und Wirtschaft
1986	Vollbeschäftigung, ein erreichbares Ziel?
1987	Vollendung des Binnenmarktes in der Europäischen Gemeinschaft – Folgen und Folgerungen für Österreich
1988	Sand im Getriebe – Ursachen und Auswirkungen der Wachstumsverlangsamung in Österreich
1989	Banken und Finanzmärkte – Herausforderung der neunziger Jahre
1990	Wettbewerb und Kooperation im Finanzbereich
1991	Wirtschaftliche und politische Neugestaltung Europas – Rückblick und Perspektiven
1992	Zukunft regionaler Finanzmärkte in einem integrierten Europa
1993	Europäische Währungspolitik und internationaler Konjunkturverlauf
1994	Neue internationale Arbeitsteilung – Die Rolle der Währungspolitik
1995[1])	Die Zukunft des Geldes – das Geld der Zukunft
1996[1])	Auf dem Weg zur Wirtschafts- und Währungsunion – Bedingungen für Stabilität und Systemsicherheit
1997	Die Bedeutung der Unabhängigkeit der Notenbank für die Glaubwürdigkeit der europäischen Geldpolitik
1998	Wirtschaftspolitik 2000 – Die Rolle der Wirtschaftspolitik und nationaler Notenbanken in der WWU

1 *Out of print.*

List of the Topics Discussed in the Working Papers

		Published
No. 1[1])	Hat Böhm-Bawerk recht gehabt? Zum Zusammenhang zwischen Handelsbilanzpassivum und Budgetdefizit in den USA[2])	1990
No. 2[1])	Ost- und Mitteleuropa auf dem Weg zur Marktwirtschaft – Anpassungskrise 1990	1991
No. 3[1])	Die Wirtschaft Österreichs im Vergleich zu den EG-Staaten – eine makroökonomische Analyse für die achtziger Jahre	1991
No. 4[1])	The Soviet Banking Reform	1991
No. 5[1])	Die Auswirkungen der Finanzmarkt- und Kapitalverkehrsliberalisierung auf die Wirtschaftsentwicklung und Wirtschaftspolitik in Norwegen, Schweden, Finnland und Großbritannien – mögliche Konsequenzen für Österreich[2])	1991
No. 6[1])	Zwei Jahre G-24-Prozeß: Bestandsaufnahme und Perspektiven unter besonderer Berücksichtigung makroökonomischer Unterstützungsleistungen[2])	1991
No. 7[1])	Die Finanzoperationen der öffentlichen Haushalte der Reformländer ČSFR, Polen und Ungarn: Eine erste quantitative Analyse	1991
No. 8[1])	Erfüllung der Konvergenzkriterien durch die EG-Staaten und die EG-Mitgliedswerber Schweden und Österreich[2])	1992
No. 9[1])	Alternative Strategies For Overcoming the Current Output Decline of Economies in Transition	1992
No. 10[1])	Signaling a Hard Currency Strategy: The Case of Austria	1992
No. 11[1])	The Impact of the Opening-up of the East on the Austrian Economy – A First Quantitative Assessment	1993
No. 12[1])	The Scope for Regional Autonomy in Russia	1993
No. 13[1])	EMU and the International Monetary System: A Transatlantic Perspective	1993
No. 14[1])	Austria's Role as a Bridgehead Between East and West	1993
No. 15[1])	Prospects for Growth in Eastern Europe – Some questions raised in the course of a macroeconomic forecasting exercise	1994
No. 16	A Survey of the Austrian Capital Market	1994
No. 17	Trade and Employment: Can We Afford Better Market Access for Eastern Europe?	1994
No. 18	Interdependence of Politics and Economic Development: Financial Stabilization in Russia	1994
No. 19[1])	Austrian Exchange Rate Policy and European Monetary Integration	1995
No. 20[1])	Monetary Spill-over Effects in the ERM: The Case of Austria, A Former Shadow Member	1995
No. 21	Investing in Insider-dominated Firms: A Study of Voucher Privatization Funds in Russia	1995
No. 22	Pessimism Confounded? Economic Recovery in Eastern Europe	1996
No. 23	Will Asymmetric Shocks Pose a Serious Problem in EMU?	1996
No. 24	Exchange Rates and Monetary Policy in Central Europe – a Survey of Some Issues	1997

1 Out of print.
2 Published in a modified form in "Berichte und Studien".

List of the Topics Discussed in the Working Papers (cont.)

		Published
No. 25	Sources of Currency Crises: An Empirical Analysis	1998
No. 26	Structural Budget Deficits and Sustainability of Fiscal Positions in the European Union	1998
No. 27[1])	Trends in European Productivity: Implications for Real Exchange Rates, Real Interest Rates and Inflation Differentials	1998
No. 28	What Do We Really Know About Real Exchange Rates?	1998
No. 29	Goods Arbitrage and Real Exchange Rate Stationarity	1998
No. 30	The Great Appreciation, the Great Depreciation, and the Purchasing Power Parity Hypothesis	1998
No. 31	The Usual Suspects? Productivity and Demand Shocks and Asian Pacific Real Exchange Rates	1998
No. 32	Price Level Convergence Among United States Cities: Lessons for the European Central Bank	1998
No. 33	Core Inflation in selected European Union Countries	1998
No. 34	The impact of EMU on European unemployment	1998
No. 35	Room for Manoeuvre of Economic Policy in the EU Countrries – Are there Costs of Joining EMU?	1998
No. 36	Heterogeneities within Industries and Structure-Performance Models	1998

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