



## OF E.U. AND US INFLATION AND 👿 MACROECONOMI C ANALYSI S



Macroeconomic Forecast and Analysis Laboratory, IFL, Nº 119, August, 2004.

The perspectives for total inflation in the euro zone have been constantly worsening during the first half of the 2004 due to the rise in energy prices.

### ANNUAL FORECASTS FOR THE EMU INFLATION (year-on-year rates) 2.5 2.3 2.1 1.9 1.7 1.5 2002 2003 2004 2005 Observed Value - Historical Inflation mean (1995-2003) Feb-04 (Last Obs) March-04 (Last Obs.) April-04(Last Obs.) July-04 (Last Obs.) Source: Eurostat UC3M & IFL Date: August 23, 2004

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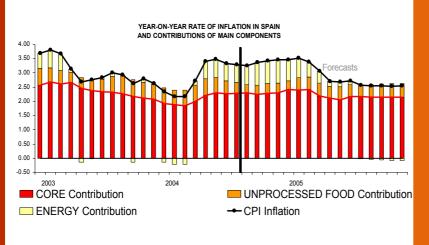
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High energy price growth rates push spanish CPI inflation up during 2004 and the early stages of 2005.



Source: Eurostat, Uc3m & IFL Date: August 20, 2004











# OF E.U. AND US INFLATION AND MACROECONOMIC ANALYSIS University U



## **Supporting Entities**









# OF E.U. AND US INFLATION AND MACROECONOMIC ANALYSIS



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### **TERMINOLOGY USED:**

In inflation analysis it is advisable to break down a consumer price index for a country or an economic area in price indexes corresponding to homogenous markets. An initial basic breakdown used in this publication is 1) Non-processed Food price index (ANE) 2) Energy price index (ENE), 3) Processed Food (AE), 4) Other commodities (MAN), 5) Other services (SERV). The first two are more volatile than the others, and in Espasa et al. (1987) a core inflation measure exclusively based on the latter ones was proposed; the Spanish Statistical Institute and Eurostat proceed in the same way. Later, in the BULLETIN EU & US INFLATION AND MACROECONOMIC ANALYSIS was proposed to eliminate from components of core inflation those indexes which are excessively volatile.

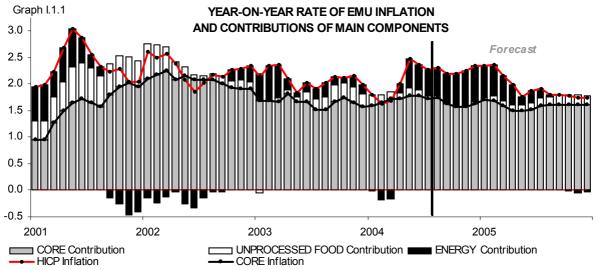
Thus, the previous basic breakdown has been amplified for Spain in the following manner: a) ANE, b) ENE, c) Tobacco, Oils and Fats, and Tourist Packages, d) Processed Foods excluding Tobacco, Oils and Fats, (AEX).ge) Other Goods (MAN), and f) Other services, excluding Tourist Packages (SERT). The measure of inflation obtained with the AEX, MAN, and SERVT indexes we term trend inflation, as an alternative indicator similar to core inflation, but termed trend inflation to indicate a slightly different construction. The measure of inflation established with the price indexes excluded from the CPI to calculate trend inflation or core inflation, depending on the case, is termed residual inflation.

For the United States the breakdown by markets is principally based on four components: Food, Energy, Services, and Commodities. Trend inflation or core inflation is based in this case as the aggregation of services and non-energy

#### I. MAIN POINTS AND NEW RESULTS

#### I.1. ECONOMIC AND MONETARY UNION

For this month, we are forecasting a positive monthly inflation rate of 0.2%, without increasing annual inflation in the euro zone from last month's figure, 2.3%. Core inflation will reach an annual rate of 2.1% in August, due to stable growth in this component. Within core inflation, there is a reduction in the mean inflation rate for non energy industrial goods in 2004, due to a heavy fall in these prices in July because of the second sales of the year. The energy price growth forecasts have increased in August, but the effect of this on the year-on-year rate of total EMU inflation is compensated by the decrease in the rates of core inflation expected in non-energy industrial goods.



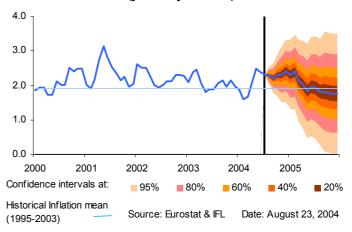
Source: EUROSTAT, IFL & UC3M Date: August 23, 2004

- Inflation in July in the euro zone performed better than expected, with a negative growth of 0.17% in the monthly rate compared to the negative forecast of 0.06%, and with the annual rate falling to 2.3%. The annual inflation rate in the EMU fell for the second consecutive month. The main innovations in the monthly rate have occurred in core inflation, which has performed slightly better than expected, with a negative value of 0.26% instead of the forecast negative value of 0.14%, and in energy, with a growth of 0.63% instead of the 1.23% expected. At the end of July, the annual rate of core inflation was 2.1%, whereas inflation in energy and unprocessed food was 6.01% and 0.76%, respectively.(tables 2.1.1 of section II.1 and A2 in the appendix).
- The expected performance of inflation in the euro zone in 2004 is characterised by the stability of annual core inflation, with rates of around 2.1% for the remaining months of the year, and the marked volatility of annual inflation in energy. Thus, the total annual inflation rate has been on the increase from the 1.6% registered in February to the 2.5% observed in May, but annual rates are expected to stabilise at around 2.3% starting in July .This difference between the evolution of total and core inflation is caused by the performance of energy prices, which started to grow in March and are not expected to decrease until March, 2005, so their effect on the annual rate of total inflation will continue until the first quarter of 2005 (see graph I.1.1 on the contributions of components to European inflation). The last few energy price growth forecasts have increased slightly; we are expecting rates of around 8% for the end of the year.
- □ For 2004, we forecast a mean total inflation rate of 2.2%, with which the probability of the mean annual inflation rate exceeding 2% is over 60% as we can see from fan chart 1.1 2 of the forecasting intervals for 2004. On the other hand, the risk of deflation in the EMU disappeared several months ago.



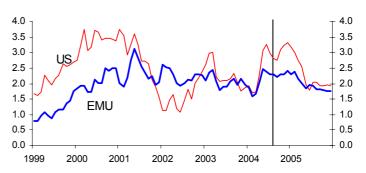
- The differential between total inflation in the EMU and the US prior to 2002 was systematically one percentage point, in favour of the Economic and Monetary Union. The annual inflation rate last year and in the first months of this year in the two economies appears to converge at values of around 2%, but due to the rapid rise in crude oil prices. which influenced energy prices in both economies starting in March, this situation has changed. Since March, the two inflation rates have again diverged because of the greater sensitivity of U.S. inflation to crude oil market fluctuations. We thus expect the differential between the two economies for June and July to be around one percentage point in favour of the EMU, and this situation should remain unaltered until the first quarter of 2005 (see page 16).
- Independently from the above, the inflation differential in services continues to be in favour of the EMU, in non-energy industrial goods in favour of the U.S. Whereas expectations for the mean annual rates of service prices, excluding owner's equivalent rents in the U.S., are 3.4% in 2004 and in 2005, compared to the 3.2% observed in 2003, in the EMU they are 2.6% in 2004 and 2005, compared to the 2.6% also observed in 2003. In non-energy industrial goods, the corresponding rates for the U.S. have a negative value of 1.0% in 2004 and a positive value of 0.1% in 2005, and 0.7% in 2004 and 2005 in the EMU (Graphs I.1.3).

ANNUAL FORECASTS FOR THE EMU INFLATION (year-on-year rates)



Graph I.1.3

YEAR-ON-YEAR RATES OF TOTAL INFLATION
IN THE EMU AND THE USA



Source: BLS, EUROSTAT, IFL & UC3M

Date: August 23 / 2004

Table I.1.1 FORECASTS FOR THE MEAN ANNUAL RATES IN THE HICP OF THE EMU									
Harmonised Indices of Consumer Prices	2000*	2001*	2002*	2003*	Forecasts				
(HICP)	2000	2001	2002	2003	2004	2005			
TOTAL INFLATION (100%)	2.1	2.3	2.3	2.1	2.2	2.0			
CORE INFLATION (84,17%)	1.0	1.9	2.5	2.0	2.0	1.9			
Non energy processed goods HICP ( 42,85%)	0.6	1.5	1.9	1.5	1.5	1.3			
Services HICP (41,33%)	1.5	2.5	3.1	2.6	2.6	2.6			
RESIDUAL INFLATION (15,82%)	7.5	4.4	1.1	2.6	2.9	2.2			
Non Processed Food HICP (7,69%)	1.7	7.0	3.1	2.2	1.1	1.7			
Energy HICP (8,13%)	13.0	2.3	-0.6	3.0	4.4	2.4			

\* Observed Values (revised)

(1) Monthly and annual rates can be found in tables A5A and A5B in the appendix.

Source: Eurostat & UC3M/ Date: August 23, 2004



## **I.2 MACROECONOMIC TABLE OF EURO-ZONE**

		Annual Averages Growths				
	2001	2002	2003		sts BIMA (*)	
				2004	2005	
GDP p m	1.6	0.9	0.5	1.7	2.0	
Demand						
Final Consumption	2.0	1.2	1.2	1.6	1.9	
Capital Investment	-0.3	-2.8	-0.8	2.2	2.1	
Contribution Domestic Demand	0.9	0.4	1.1	1.7	1.8	
Exports of Goods and Services	3.4	1.5	0.1	4.1	4.7	
Imports of Goods and Services	1.7	0.3	1.9	4.2	4.6	
Contribution Foreign Demand	0.7	0.5	-0.6	0.0	0.2	
Supply						
Gross Value Added Total (market prices)	1.6	0.9	0.5	1.7	2.0	
Net Taxes	-2.9	-1.0	-0.9	0.9	1.9	
Gross Value Added Total (basic prices)	1.9	1.0	0.6	1.8	2.0	
Gross Value Added Agriculture	-1.2	0.8	-3.4	1.1	1.2	
Gross Value Added Industry	0.5	0.3	0.0	1.8	1.8	
Gross Value Added Construction	-0.6	-1.0	-0.5	0.8	0.3	
Gross Value Added Services	2.7	1.4	1.0	1.9	2.2	
Private	3.1	1.1	0.9	2.2	2.4	
Public	1.7	2.1	1.1	1.3	1.6	
Prices						
CPI harmonized, annual average	2.3	2.3	2.1	2.2	1.4	
CPI harmonized, dec./dec.	2.1	2.3	2.0	2.4	1.8	
Employment						
Unemployment rate	8.0	8.4	8.9	8.9	9.0	
Others Economic Indicators						
Production Index of Industry (excluding construction)	0.4	-0.5	0.4	2.3	2.1	

Source: EUROSTAT & UC3M

Date: July 20, 2004

Section Sponsorship: Cátedra Fundación Universidad Carlos III de Predicción y Análisis Macroeconómico.



<sup>(\*)</sup> Bulletin EU & US Inflation and Macroeconomic Analysis.



#### I.3. UNITED STATES

□ The general index forecast for **August** is an 0.21% increase, with the annual rate falling from 2.99% to 2.82%. This slight reduction in the annual rate is explained by the energy index, due to the heavy increases registered last August. For core inflation, we forecast a 0.28% increase, with its annual rate growing from 1.76% to 1.89%.

Table I.3.1
OBSERVED VALUES AND FORECAST ON CONSUMER PRICE FIGURES IN US
-July 2004-

CONCLIMED DDIOES INDEX (ODI)	Monthly G	Confidence	
CONSUMER PRICES INDEX (CPI)	observed (a)	forecasts (b)	Intervals at 80% level (+ -)
Residual Inflation	-0.62	-0.42	0.43
Core Inflation	0.00	0.13	0.15
Total inflation	-0.16	0.00	0.12

Source: BLS & Universidad Carlos III Madrid

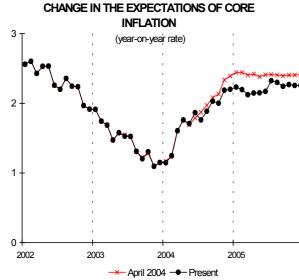
Data: August 17, 2004

- □ In **July**, the U.S. CPI fell by 0.16% from the previous month's figure, instead of the forecast price stability (see **Table I.3.1**1), with the annual rate decreasing by three tenths from 3.27% to 2.99%.
- Most items performed better than expected, particularly non-energy industrial goods such as new cars, apparel and footwear. Likewise, petrol and diesel prices fell more than expected. Telecommunication services performed particularly well in the service sector.
- □ The rate of **core inflation** remained constant instead of increasing as forecast by 0.13%, with the annual rate going from 1.87% to 1.76%. The fall registered in non-energy manufactured goods was 0.86%, more than the 0.65% forecast, and the annual rate fell from a negative value of 0.99% to 1.22%. On the other hand, service prices rose by 0.35%, less than expected (0.43%), with the annual rate remaining at 3.00%. Core inflation, not including owner's equivalent rent of primary residence and tobacco, and therefore comparable with the underlying rate in Europe excluding food, decreased by 0.08%, instead of the forecast increase of 0.06%, with the annual rate decreasing from 1.61% to 1.47%.
- □ For **2004** and **2005**, we forecast mean total annual inflation rates of 2.7% and 2.2%, respectively, which means that we maintain last month's forecasts. The higher price of crude oil on the international markets has had a negative impact on inflation forecasts. However, these worse forecasts have been compensated by the good performance in July of core inflation (see **Table I.3.2** and **Graph I.3.2**).
- After the first few months of the year in which core inflation forecasts were constantly corrected upwards, the May and June figures were as predicted, and July finally registered better figures than expected. Nevertheless, we expect core inflation to accelerate to 2.3% before the end of the year (see **Graph I.3.1**).
- In 2004, when we add food and energy prices to this context of rapid core inflation growth, this generates a general CPI annual mean growth rate of around 2.7%, with the lowest level in September (2.8%) and the highest in December (3.3%). This is explained by the evolution of energy prices (see **Graph I.3.2**).

<sup>1</sup> The official information provided is with one decimal aggregation error

Graph I.3.1

## Graph I.3.2





Source: Universidad C.III Madrid & BLS / Date: August 17, 2004 Source: Universidad C.III Madrid & BLS / Date: August 17, 2004

Table I.3.2

AVERAGE ANNUAL RATE OF GROWTH IN US

CONSUMER PRICES INDEX (CPI)	2000	2001	2002	2003	2004 (forecasts)	2005 (forecasts)
Food (1)	2.3	3.1	1.8	2.1	3.6	2.9
Energy (2)	16.9	3.8	-5.9	12.2	10.6	1.4
Residual Inflation (3=2+1)	6.8	3.3	-0.8	5.3	6.0	2.4
Non-food and non-energy goods (4)	0.5	0.3	-1.1	-2.0	-1.0	0.1
Less tobacco	-0.1	-0.2	-1.5	-2.1	-1.1	0.0
-Durable goods	-0.5	-0.6	-2.6	-3.2	-2.3	0.0
-Nondurable goods	1.4	1.1	0.4	-0.7	0.4	0.2
Non-energy services (5)	3.3	3.7	3.8	2.9	2.9	3.0
-Services less owner's equivalent rent of primary residence (5-a)	3.5	3.6	3.6	3.2	3.4	3.4
-Owner's equivalent rent of primary residence (a)	3.0	3.8	4.1	2.4	2.3	2.5
Core Inflation (6=4+5)	2.4	2.7	2.3	1.5	1.8	2.2
Core inflation less owner's equivalent rent of primary residence (6-a)	2.2	2.3	1.7	1.1	1.6	2.1
Core inflatión less owner's equivalent rent of primary residence and tobacco	2.1	2.1	1.5	1.1	1.6	2.1
Total inflation (7=6+3)	3.4	2.8	1.6	2.3	2.7	2.2
All items less owner's equivalent rent of primary residence (7-a)	3.5	2.6	1.0	2.2	2.8	2.2

Source: BLS & Universidad Carlos III Madrid

Data: August 17, 2004

(\*) Monthly and annual growth rates can be found in tables A6A and A6B in Appendix



#### I.4. SPAIN

- □ The total monthly inflation rate forecast for August is 0.4%, with the annual rate expected to fall to 3.3% from the 3.4% observed in July (graphs I.4.2 and I.4.3).
- The monthly rate of total inflation in July fell by 0.76%, better than our forecast negative value of 0.69%. All the components of core inflation (processed food, industrial goods and services) registered downwards innovations. Residual inflation (non-processed food and energy) increased largely due to the poor performance of energy (table I.4.1)
- ☐ The annual rate of core inflation was 2.8% in July 2004, the same rate as in June, putting a stop to the growth in the annual rate observed since March. In July, all the components of core inflation

Table I.4.1 OBSERVED VALUES AND FORECASTS IN THE MONTH-ON- MONTH RATE OF GROWTH IN THE COMPONENTS OF THE CPI IN SPAIN									
Consumer Price Index (CPI)	growth Forecast								
Total Inflation(100%)	-0.76	-0.69	± 0.15						
Core inflation (82.28%)	-1.07	-0.92	± 0.13						
Residual inflation (17.72%)	0.53	0.33	± 0.22						

(\*) At 80% confidence level.

Source : INE & UC3M / Date: August 12, 2004

fell, especially non-energy industrial goods (MAN) where the effect of the sales was greater than expected, with a fall in the monthly rate of 3.7% instead of the expected negative value of 3.47%. On the other hand, the monthly rate of inflation in processed food ahs fallen slightly, but this has not prevented its annual rate increasing from the 4.0% observed in June to 4.2% in July, 2004. As for services, the monthly rate also fell, 0.58% observed instead of the 0.67% forecast, largely due to a better performance of tourism prices, 5.48% compared with the expected 8.32%. Most service components, such as transport, household goods, restaurants and housing, continue to have annual rates of over 4%, whereas university expenses have an annual rate of over 5% (5.05).

In July 2004, the annual rate of inflation in non-energy industrial goods in Spain and the EMU registered downwards innovations, at 0.8% and 0.7%, respectively. The annual rate in Spain is expected to be 0.8%, slightly higher than the 0.7% rate forecast for the EMU. In the U.S., negative expectations are maintained for the mean annual rate of growth, 1.0% for 2004, compared with a negative 2.0% value observed in 2003.

Table I.4.2 FORECASTS FOR THE MEAN ANNUAL RATES OF GROWTH IN THE CPI IN SPAIN								
Consumer Prices Index (CPI)	2002	2003	Forecasts					
	2002	2003	2004	2005				
TOTAL INFLATION (100%)	3.1	3.0	3.0	2.9				
CORE INFLATIÓN (82,28%)	3.7	2.9	2.6	2.7				
TREND INFLACIÓN (77,21%)	3.4	2.9	2.5	2.6				
Non energy industrial goods (30,05%)	2.5	2.0	0.8	1.0				
Services CPI (35,05%)	4.6	3.7	3.7	4.0				
Processed food CPI (17,17%)	4.3	3.0	3.6	3.1				
RESIDUAL INFLATION (17,72%)	2.6	3.6	4.9	3.6				
Non processed food CPI (8,60%)	5.8	6.0	5.3	5.1				
Energy CPI (9,12%)	-0.2	1.4	4.5	2.1				

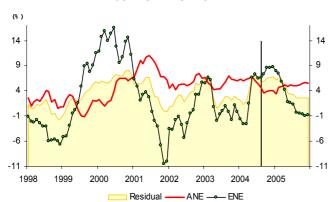
Monthly and annual rates can be found in tables A7A and A7B in the appendix

Source: INE. IFL  $\,$  & .UC3M / Date: August 20 , 2004



Graph I.4.1

## ANNUAL RATES OF RESIDUAL INFLATION AND ITS COMPONENTS IN SPAIN



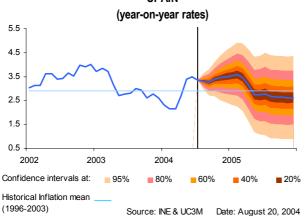
Source: INE, IFL & UC3M / Date: August 20, 2004

- For this month, the annual rate of core inflation is forecast at 2.8%, the same value observed since June, with an expected annual rate of 4.2% in processed food, 0.8% in non-energy industrial good prices, and 3.6% in services. The mean annual rate of core inflation in 2004 will be around 2.6%, beneath the 2.9% registered in 2003. We should emphasise the poor performance of inflation in processed food, with a mean rate expected in 2004 of 3.6%, compared with 3.0% in 2003. food prices have been Processed especially affected by tobacco prices, with a forecast mean annual rate of 5.7% compared to the 3.8% observed in 2003, and higher prices of fats and oils, with a forecast mean annual rate of 15.7% in 2004 compared to the 3.5% observed in 2003 (table I.4.2).
- □ In the EMU, the annual rate of core inflation in July 2004 remained unaltered since March at 2.1%. Forecasts for the mean annual rate are 2.0% in 2004 and 1.9% in 2005, compared with the 2.6% and 2.7% forecast in Spain for the same years. Therefore, the differential between Spain and the euro zone for 2004 is expected to be more than half a percentage point.
- As for the evolution of residual inflation components, the mean annual rate of non-processed food prices is expected to fall from values of around 6.0% in the first half of 2003 to values around 4.0% at the end of 2004. A mean annual rate of 5.3% is expected for 2004, and 5.1% for 2005. Energy, however, tends to increase more than the previous month, and the annual rate expected for August 2004 is 6.6%. The mean annual rate forecast for 2004 is 4.5%, over the 1.4% observed in 2003.

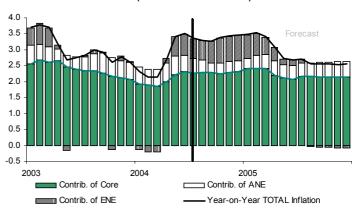
Graph I.4.3

ANNUAL FORECASTS FOR TOTAL INFLATION IN

SPAIN



Graph 1.4.2 CONTRIBUTIONS TO TOTAL INFLATION IN SPAIN
(YEAR-ON-YEAR RATES)



Source: INE & UC3M Date: August 20, 2004

Total inflation in Spain for the remaining months of 2004 and the first few months of 2005 will have an annual rate of over 3.0%. The contribution of core inflation and non-processed food is expected to remain stable until 2005. The fall in the contribution of energy for the second half of 2005 will make total annual inflation return to levels close to those observed in 2003 (see graph I.4.2). The mean annual total inflation rate in Spain was 3.0% in 2003, and will be 3.0% in 2004 and 2.9% in 2005 (table I.4.2). Chart I.4.3 confirms the high likelihood of the total annual inflation rate in 2004 exceeding its historic mean of 2.9%.



## I.5. MACROECONOMIC TABLE OF SPANISH ECONOMY

	Annual Rates								
				s BIMA(*)	Budget				
	2002	2003	2004	2005	2004				
Private Final Consumption Expenditure	2.6	3.0	3.3	3.4	3.1				
<ol> <li>Public Final</li> </ol>									
Consumption	4.4	4.6	4.1	3.4	2.9				
Expenditure	1.0	2.0	3.4	2.0	3.8				
Gross Fixed Capital Formation	1.0 -5.4	3.0 1.9	3.4 4.0	3.8 5.8					
Equipment		_			(3)				
Building	4.2	3.7	3.0	2.2	3.0				
Other products	2.6	2.8	3.5	5.8	(3)				
Inventary     change (1)	0.0	0.1	0.0	0.0	0.0				
Domestic Demand	2.6	3.3	3.4	3.5	3.3				
Exports of Goods and Services	0.0	4.0	5.5	7.1	6.3				
Imports of Goods and Services	1.8	6.7	6.8	7.4	7.0				
Net Exports (1)	-0.6	-1.0	-0.6	-0.4	-0.4				
GDP	2.0	2.4	2.9	3.2	3.0				
GDP, current prices	6.6	6.7	6.4	6.5	5.9				
Prices and Costs	0.0	<u> </u>	0	0.0					
CPI, annual average	3.1	3.0	3.0	2.9					
CPI, dec./dec.	4.0	2.6	3.4	2.6					
Average earning per worker	3.8	3.9	3.5	3.4					
Unit labour cost	3.1	2.9	2.6	2.6					
Labour Market (Data poll labour force)	0.1	2.0	2.0	2.0					
, <u> </u>	3.0	2.6	2.0	1.7					
Labour Force (% variation)	3.0	2.0	2.0	1.7					
Employment (EPA)	2.0	2.7	2.2	2.3					
Annual average variation in %	2.0 312.5	2.7 437.0	2.2 367.0	2.3 392.5					
Annual average variation in thousands	312.5 11.4	437.0 11.3	11.1	392.5 10.8	11.0				
Unemployment rate	11.4	11.3	11.1	10.0	11.0				
Basic balances									
Foreign sector	40.004	00.000	00.047	40.000					
Current Account (m. €.)	-18.691	-23.660	-20.247	-19.023					
Net lending or borrowing (% GDP) (2)	-1.6	-2.0	-2.6	-2.3	-2.6				
AA.PP. (Total) / Public Administration									
Net lending or borrowing (% GDP) (2)	-0.1	0.0	-0.1	-0.1					
Other Economic Indicators									

Source: INE & UC3M Date: July 27, 2004.

Section Sponsorship: Cátedra Fundación Universidad Carlos III de Predicción y Análisis Macroeconómico.



<sup>(1)</sup> Contributions to GDP growth
(2) In term of national accounts
(3) Equipment goods and other goods: Forecast PGE, 5.0; Forecast BIAM, 5.2.

<sup>(\*)</sup> Bulletin EU & US Inflation and Macroeconomic Analysis.



## **I.6 FORECAST SUMMARY**

INFLATION FORECASTS AND EVOLUTION IN THE EMU AND USA (1998-2005)									
	1998	1999	2000	2001	2002	2003	Fore	casts	
	1330	1999	2000	2001	2002	2003	2004	2005	
TOTAL INFLATION									
Euro-zone (100%).	1.1	1.1	2.1	2.3	2.3	2.1	2.2	2.0	
USA (81.5%). <sup>(1)</sup>	1.1	2.1	3.5	2.6	1.0	2.2	2.8	2.2	
A HOMOGENEOUS MEASURE OF CORE INFLATION (2)									
Services and Non-energy industrial goods excluding food and tobacco.									
Euro-zone (72.34%).	1.4	1.1	1.0	1.8	2.4	1.8	1.8	1.8	
USA (55.6%). <sup>(1)</sup>	1.8	1.4	2.1	2.1	1.5	1.1	1.6	2.1	
DIFFERENT COMPONENTS OF THE HOMOGENEOUS MEASURE OF CORE INFLATION									
(1) Services.									
Euro-zone (41.33%). USA (27.4%). <sup>(1)</sup>	1.9 2.9	1.5 2.7	1.5 3.5	2.5 3.6	3.1 3.6	2.6 3.2	2.6 3.4	2.6 3.4	
(2) Non-energy industrial goods excluding food and tobacco.									
Euro-zone (31.01%).	0.9	0.7	0.4	0.9	1.5	8.0	0.7	0.7	
USA (29.0%). INFLATION IN EXCLUDED COMPONENTS FROM THE HOMOGENEOUS MEASURE OF CORE INFLATION	-0.1	-0.5	-0.1	-0.2	-1.5	-2.1	-1.1	0.0	
(1) Food.									
Euro-zone (19.53%). USA (14.9%).	1.6 2.2	0.6 2.1	1.4 2.3	4.5 3.1	3.1 1.8	2.8 2.1	2.7 3.6	2.4 2.9	
,			0	<b>U.</b> 1	0		0.0		
(2) Energy. Euro-zone (8.13%).	-2.6	2.4	13.0	2.3	-0.6	3.0	4.4	2.4	
USA (9.90%).	-7.7	3.6	16.9	3.8	-5.9	12.2	10.6	1.4	

Source: EUROSTAT, BLS, IFL & UC3M. Date: August 23 / 2004



<sup>(1)</sup> less owner's equivalent rent of primary residence.
(2) This homogeneous measure of underlying inflation does not coincide with the usual measure of core inflation for the EMU nor for the USA. It has been constructed in order to compare the data in the EMU and in the USA.

### YEAR-ON-YEAR RATES OF INFLATION IN THE EMU AND USA

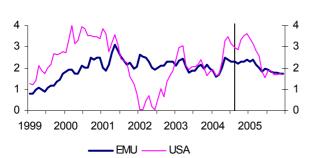
3

1999

2000

2001

### YEAR-ON-YEAR RATES OF TOTAL INFLATION IN THE EMU AND TOTAL INFATION LESS OWNER'S EQUIVALENT RENT OF PRIMARY RESIDENCE IN USA



## 

2003

2004

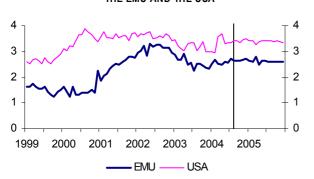
USA

2005

YEAR-ON-YEAR RATES OF HOMOGENEOUS CORE INFLATION IN THE EMU AND THE USA

3

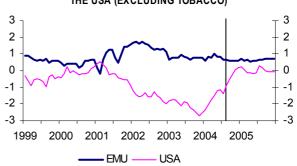
## YEAR-ON-YEAR RATES OF SERVICES INFLATION IN THE EMU AND THE USA



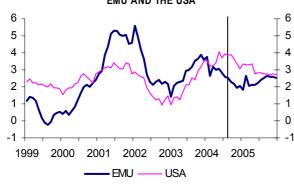
YEAR-ON-YEAR RATES OF NON-ENERGY
INDUSTRIAL GOODS INFLATION IN THE EMU AND
THE USA (EXCLUDING TOBACCO)

- EMU

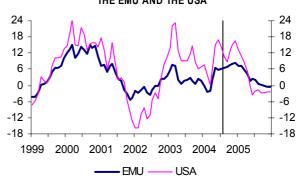
2002



## YEAR-ON-YEAR RATES OF FOOD INFLATION IN THE EMU AND THE USA



## YEAR-ON-YEAR RATES OF ENERGY INFLATION IN THE EMU AND THE USA



Source: EUROSTAT, BEA, IFL & UC3M

Date: August 23, 2004



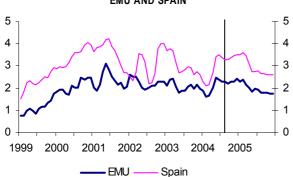
INFLATION FORECASTS AND EVOLUTION IN THE EMU AND SPAIN (1998-2005)									
	1998	1999	2000	2001	2002	2003	Fore	casts	
	1990	1999	2000	2001	2002	2003	2004	2005	
TOTAL INFLATION						-			
Spain (100%).	1.8	2.3	3.4	3.6	3.1	3.0	3.0	2.9	
Euro-zone (100%).	1.1	1.1	2.1	2.3	2.3	2.1	2.2	2.0	
CORE INFLATION									
Services and Non-energy processed goods.									
Spain (81.40%).	2.2	2.2	2.5	3.4	3.7	2.9	2.6	2.7	
Euro-zone (84.18%).	1.4	1.1	1.0	1.9	2.5	2.0	2.0	1.9	
DIFFERENT COMPONENTS OF CORE INFLATION									
(1) Services.									
Spain (34.87%).	3.6	3.4	3.7	4.2	4.6	3.7	3.7	4.0	
Euro-zone (41.33%)	1.9	1.5	1.5	2.5	3.1	2.6	2.6	2.6	
(2) Non-energy processed goods.									
Spain (46.53%).	1.4	1.7	1.7	2.9	3.1	2.4	2.2	1.9	
Euro-zone (43.26%).	1.1	0.7	0.6	1.5	1.9	1.5	1.5	1.3	
INFLATION IN EXCLUDED COMPONENTS FROM CORE INFLATION									
1) Non-processed food.									
Spain (9.40%).	2.1	1.2	4.2	8.7	5.6	5.6	5.2	5.0	
Euro-zone (7.69%).	2.0	0.0	1.7	7.0	3.1	2.2	1.1	1.7	
(2) Energy.									
Spain (9.14%).	-3.8	3.2	13.3	-1.0	-0.2	1.4	4.5	2.1	
Euro-zone (8.13%).	-2.6	2.4	13.0	2.3	-0.6	3.0	4.4	2.4	

Source: EUROSTAT, BLS, IFL & UC3M. Date August 23 / 2004.

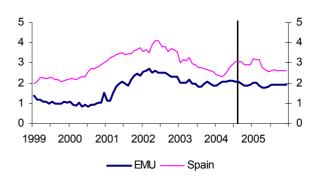


#### YEAR-ON-YEAR RATES OF INFLATION IN THE EMU AND SPAIN

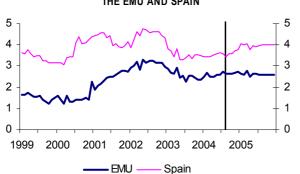
## YEAR-ON-YEAR RATES OF TOTAL INFLATION IN THE EMU AND SPAIN



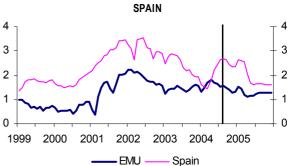
YEAR-ON-YEAR RATES OF SERVICES AND NON-ENERGY PROCESSED GOOS IN THE EMU AND SPAIN



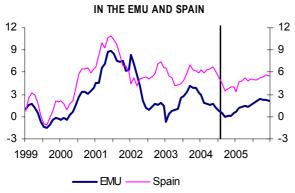
YEAR-ON-YEAR RATES OF SERVICES INFLATION IN THE EMU AND SPAIN



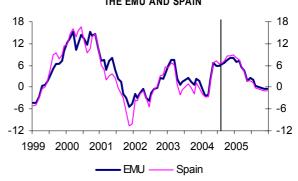
YEAR-ON-YEAR RATES OF NON-ENERGY PROCESSED GOODS INFLATION IN THE EMU AND



## YEAR-ON-YEAR RATES OF NON-PROCESSED FOOD



YEAR-ON-YEAR RATES OF ENERGY INFLATION IN
THE EMU AND SPAIN



Source: EUROSTAT, BEA, IFL & UC3M

Date: August 23, 2004



#### 1.7 INFLATION FORECASTS OF DIFFERENT INSTITUTIONS

INFLATION FORECASTS OF DIFFERENT INSTITUTIONS <sup>1</sup>										
	ВІА	AM <sup>2</sup>		ENSUS CASTS <sup>3</sup>	IN	IF <sup>4</sup>	EC	CB⁵	OCDE <sup>6</sup>	
	2004	2005	2004	2005	2004	2005	2004	2005	2004	2005
UME	2.2	2.0	2.1	1.8	1.7	1.6	2.1	1.9	1.7	1.4
EE.UU.	2.7	2.2	2.7	2.4	2.3	2.2	-	-	2.3	2.0
<b>ESPAÑA</b>	3.0	2.9	2.9	2.7	2.7	2.7	-	-	2.3	2.6

- 1 The forecasts are based on CPI in USA and Spain and on HICP in the EMU.
- 2 Bulletin EU & US Inflation and Macroeconomic Analysis, August 2004
- 3 August 9, 2004.
- 4 IMF. World Economic Outlook. April 2004.
- 5 ECB. Monthly Bulletin. Survey of Professional Forecasters. August 2004
- 6 OECD Economic Outlook 75. June 2004. For Spain, the forecasts are based on HICP.

Our forecasts for total inflation in the EMU and Spain are slightly greater than the previsions derived from other institutions because with the methodology applied in our Bulletin, total inflation is breaking down in core and residual inflation. Last one is composed by inflation in non-processed food and energy prices.

The innovations come in different components are transferred in future thorough different multipliers. The innovations derived from residual inflation are less persistent.

Our expectations about total inflation in the EMU and Spain are slightly higher than the previous bulletin: 2.2% in 2004 and 2.0% in 2005 in the EMU and 3.0% for 2004 and 2.9% in 2005, in the case of Spain. Non-processed foods inflation expectations for EMU and Spain in 2004 are 1.1% and 5.3% respectively. Total inflation in 2004 and 2005 will be benefit from an expected lower inflation rate in non-energy industrial goods but energy prices are expected to increase due to the evolution of crude prices. The expected average inflation rate for 2004 in energy prices is 4.5% in Spain and 4.4% in the EMU.



## **TABLES & PLOTS**

#### **TABLES:**

- A1A: Spanish CPI desaggregation.
- A1B: EMU HICP desaggregation.
- A1C: USA HICP desaggregation
- A2: Europe forecast errors for euro-zone and Monetary Union countries.
- A3: HICP Europe forecast errors by sectors in Monetary Union.
- A4A: Harmonized Consumer Price Index (HICP) Annual Growth Rates for 2003,2004, and 2005 for EMU. countries.
- A4B: Harmonized Consumer Price Index (HICP) Annual Growth Rates for 2003,2004, and 2005 for EMU countries.
- A4C: Harmonized Consumer Price Index (HICP) Monthly Growth Rates for 2003,2004, and 2005 for EMU countries.
- A4D: Harmonized Consumer Price Index (HICP) Monthly Growth Rates for 2003,2004, and 2005 for EMU countries.
- A5A: Harmonized Consumer Price Index (HICP) Annual Growth Rates by sectors for 2003,2004, and 2005 for EMU.
- A5B: Harmonized Consumer Price Index (HICP) Monthly Growth Rates for 2003,2004, and 2005 for EMU.
- A6A: US CPI Annual Growth Rates for 2003,2004, and 2005.
- A6B: US CPI Monthly Growth Rates for 2003,2004, and 2005.
- A7A: Spanish CPI Annual Growth rates for 2003,2004, and 2005.
- A7B: Spanish CPI Monthly Growth rates for 2003,2004, and 2005.

#### **PLOTS:**

- A1A: HICP monthly growth rates in EMU.
- A1B: CPI monthly growth rates in US.
- A1C: CPI monthly growth rates in Spain
- A2A: Annual Forecast For The EMU Inflation
- A2B: Annual Forecast For The USA Inflation
- A2C: Annual Forecast For The Spanish Inflation
- A3A: Year-on-year rate of EMU inflation and contributions of main components

BASIC CO	OMPONENTS .	AGGREGATES	BASIC COMPONENTES	BASIC CO	OMPONENTS AGGRE	GATES
	BENE 46.527% 1+2+4	AE 16.376% 1+4	(1) AE-X 13.331% processed food excluding fats and tobacco CPI.	BENE-X 44.481% 1+2	IPSEBENE-X-T 77.206% 1+2+3	
IPSEBENE 81.401% 1+2+3+4+5  CORE INFLATION IT IS CALCULATED ON THE IPSEBENE INDEX			(2) MAN 30.150% non-energy industrial goods CPI (3) SERV-T 33.725% services excluding packages tourist CPI (4) X 3.046% fats and tobacco CPI (5) T 1.149% tourist packages CPI (6) ANE 9.398% non-processed food CPI (7) ENE 9.142% energy CPI	R 22.735% 4+5+6+7  RESIDUAL INFLATION IT IS CALCULATED ON THE R INDEX	TREND INFLATION IT IS CALCULATED ON THE IPSEBENE-X-T INDEX	IPC 1+2+3+4+5+ 6+7  GLOBAL INFLATION IT IS CALCULATED ON THE IPC INDEX
IPC = 0.13331  AE-X + 0.13331  AE-X	0.3150  MAN + 0.371	5 <b>SERV- T</b> + 0.03046 <b>X</b> + 0.0	01149 T + 0.09398 ANE + 0.09142 ENE		(weights 03)	

## Methodology: Analysis of EMU inflation by SECTORS

BASIC COMP	ONENTS AGGREGATES	BASIC COMPONENTS
IPSEBENE 84.178% 1 + 2 +3 + 4	BENE 42.845% 1+2+3	(1) AE <sup>(a)</sup> 9.463% HICP Processed Food (2) TOBACCO 2.373% HICP Tobacco (3) MAN 31.009% HICP Non Energy Industrial Goods  (4) SERV 41.334% HICP Services
•	RESIDUAL INFLATION 15.822% 5 + 6	(5) ANE 7.689% HICP Non processed Food  (6) ENE 8.133% HICP Energy
CORE INFLATION (IT IS	CALCULATED ON THE IPSEBENE INDI	EX)
PCA = 0.09463 AE + 0	0.02373  TOBACCO + 0.3100	09 MAN + 0.41334 SERV + 0.07689 ANE + 0.08133 ENE

## Methodology: Analysis of USA inflation by SECTORS

BASIC COMP	ONENTS AGGREGATES	BASICS COMPONENTS
CORE CPI 78.54% 1 + 2 +3+4+5	SERVICES LESS ENERGY 56.28% 1+2	(1) OWNERS' EQUIVALENT RENT OF PRIMARY RESIDENCE 23.38% (2) SERVICES LESS OWNER' EQUIVALENT RENT OF PRIMARY RESIDENCE 32.90%
	COMMODITIES LESS FOOD AND ENERGY 22.25% 3+4+5	(3) TOBACCO 0.81% (4) NON DURABLES LESS TOBACCO 10.17% (5) DURABLES 11.28%
RESIDUAL CPI 21.46% 6+7+8+9	ENERGY 7.08% 7 + 8+9	(6) FOOD 14.38%  (7) GAS 1.17%  (8) ELECTRICITY 2.43%  (9) MOTOR FUEL AND FUEL OIL 3.48%

Source: EUROSTAT & Instituto Flores de Lemus, Universidad Carlos III

Table A2

## FORECAST ERRORS IN THE MONTHLY INFLATION RATE FOR JULY IN THE EUROPEAN UNION

	Weights 2004 MU	Weights 2004 EU	Observed Monthly Rate	Forecast	Observed Annual Rate	Confidence Intervals at 80%
Spain	111.07		-0.72	-0.62	3.34	<u>+</u> 0.15
Germany	292.58		0.36	0.45	2.02	± 0.29
Austria	31.43		-0.27	-0.12	2.09	± 0.37
Belgium	33.18		-1.05	-1.18	2.07	± 0.32
Finland	15.65		-0.26	-0.26	0.18	<u>+</u> 0.37
France	206.97		-0.18	-0.05	2.63	<del>±</del> 0.20
Greece	26.55		-1.94	-1.89	3.14	<b>±</b> 0.78
Netherlands	52.90		-0.33	-0.13	1.24	<u>+</u> 0.33
Ireland	12.86		-0.39	-0.32	2.54	± 0.30
Italy	192.65		-0.25	-0.16	2.22	± 0.23
Luxembourg	2.73		-0.84	-0.15	3.78	± 0.32
Portugal	21.43		-0.86	0.39	2.94	<u>+</u> 0.66
Denmark		11.78	-0.34	-0.43	1.13	<del>1</del> 0.27
United Kingdom		181.92	-0.27	-0.36	1.37	± <sub>0.33</sub>
Sweden		18.65	-0.18	-0.20	1.16	± 0.50

<sup>(1)</sup> aggregation error -0.03%

Source: EUROSTAT, IFL & UC3M

Date: August 18, 2004

<sup>(2)</sup>aggregation error -0.08%

Table A3

## FORECAST ERRORS IN THE MONTHLY INFLATION RATE FOR JULY 2004 BY SECTORS IN THE EMU

	Weights 2004	Observed Monthly	Forecast	Annual Growth	Confidence interval at
		Growth		Observed	80%
HICP Processed Food	118.36	0.08	0.15	3.83	± 0.14
HICP Processed Food excluding tobacco	94.63	0.11	0.16	1.41	± 0.09
HICP Tobacco	23.73	0.00	0.11	13.67	± 0.13
HICP Non Energy Industrial Goods	310.09	-1.58	-1.38	0.67	± 0.10
HICP Non Energy Processed Goods	428.45	-1.12	-0.95	1.54	± 0.09
HICP Services	413.34	0.75	0.69	2.73	± 0.14
CORE INFLATION (1)	841.78	-0.26	-0.14	2.06	± 0.08
HICP Unprocessed Food	76.89	-1.08	-0.55	0.76	± 0.46
HICP Energy (2)	81.33	0.63	1.23	6.01	± 0.60
RESIDUAL INFLATION (3)	158.22	0.00	0.38	3.60	± 0.39
GLOBAL INFLATION (4)	1000.00	-0.17	-0.06	2.30	± 0.09

<sup>(1)</sup> aggregation error 0.02%

Source: EUROSTAT, IFL & UC3M

Date: August18, 2004

<sup>(2)</sup> aggregation error -0.03%

<sup>(3)</sup> aggregation error 0.04%

<sup>(4)</sup> aggregation error -0.09%

Table A4A

## HARMONIZED CPI (HICP) ANNUAL GROWTH FOR EMU COUNTRIES (1)

	EMU12		I	II	III	IV	v	VI	VII	VIII	IX	x	ХI	XII	<i>Avr</i> 03/02(b)	<i>Avr</i> 04/03(b)	<i>Avr</i> 05/04(b)
		2003	3.8	4.2	4.1	3.1	2.8	2.6	2.5	2.5	2.4	2.6	2.8	2.7	3.1		
Spain HICP	11.11%	2004	2.3	2.2	2.2	2.7	3.4	3.5	3.3	1.9	3.4	3.5	3.5	3.6		3.1	
_		2005	3.7	3.7	3.6	3.2	2.9	2.9	2.9	2.7	2.7	2.7	2.7	2.7			3.0
		2003	0.9	1.2	1.2	1.0	0.6	0.9	0.8	1.6	1.1	1.1	1.3	1.1	1.0		
Germany HICP	29.26%	2004	1.2	0.8	1.1	1.7	2.1	1.9	2.0	1.3	2.0	2.1	2.2	2.2		1.8	
_		2005	1.7	1.8	1.6	1.4	1.2	1.4	1.3	1.3	1.1	1.0	1.0	1.0			1.3
		2003	1.7	1.8	1.8	1.3	0.9	1.0	1.0	1.7	1.4	1.1	1.3	1.3	1.3		
Austria HICP	3.14%	2004	1.2	1.5	1.5	1.5	2.1	2.3	2.1	1.4	1.9	2.0	2.0	2.0		1.8	
		2005	2.0	1.9	1.9	1.9	1.8	1.8	1.8	1.8	1.8	1.8	1.8	1.8			1.8
		2003	1.2	1.6	1.7	1.4	0.9	1.5	1.4	1.6	1.7	1.4	1.8	1.7	1.5		
Belgium HICP	3.32%	2004	1.4	1.2	1.0	1.7	2.4	2.0	2.1	1.9	2.0	2.0	1.9	1.9		1.8	
		2005	2.3	2.2	2.2	2.0	1.8	2.0	2.0	1.9	1.9	2.0	1.9	1.9			2.0
		2003	1.4	2.1	1.9	1.3	1.1	1.2	1.0	1.6	1.2	0.9	1.2	1.2	1.3		
Finland HICP	1.57%	2004	0.8	0.4	-0.4	-0.4	-0.1	-0.1	0.2	-0.3	0.0	0.0	0.1	0.1		0.1	
		2005	0.3	0.1	0.4	0.4	0.4	0.5	0.6	0.6	0.5	0.6	0.6	0.6			0.5
		2003	1.9	2.5	2.6	1.9	1.8	1.9	1.9	2.9	2.3	2.3	2.5	2.4	2.2		
France HICP	20.70%	2004	2.2	1.9	1.9	2.4	2.8	2.7	2.6	1.6	2.5	2.5	2.4	2.5		2.4	
		2005	2.2	2.1	2.0	2.0	1.8	1.8	1.8	1.8	1.6	1.6	1.5	1.5			1.8
		2003	2.7	2.9	2.8	2.2	2.3	2.1	2.1	1.9	2.0	1.9	2.0	1.6	2.2		
Wetherlands HIC	5.29%	2004	1.5	1.3	1.2	1.5	1.7	1.5	1.2	1.6	1.3	1.5	1.6	1.8		1.5	
ecincifando mio	3.230	2005	1.8	1.9	2.0	2.0	1.9	2.1	2.2	2.2	2.2	2.2	2.2	2.2		1.5	2.1
		2003	4.7	5.1	4.9	4.6	3.9	3.8	3.9	4.5	3.8	3.3	3.3	2.9	4.0		
Ireland HICP	1.29%	2003	2.3	2.2	1.8	1.7	2.1	2.5	2.5	1.9	2.5	2.7	2.7	2.8	1.0	2.4	
iiciana mior	1.230	2005	3.0	3.0	3.2	3.3	3.2	3.1	3.1	3.1	3.1	3.1	3.1	3.1			3.1
		2003	2.9	2.6	2.9	3.0	2.9	2.9	2.9	4.1	3.0	2.8	2.8	2.5	2.8		
Italy HICP	19.26%	2003	2.2	2.4	2.3	2.3	2.3	2.4	2.2	0.9	1.9	2.0	2.1	2.2	2.0	2.2	
reary mice	17.200	2004	2.6	2.3	2.2	2.1	2.3	2.3	2.4	2.4	2.5	2.5	2.5	2.6		2.2	2.4
		2003	3.3	3.2	3.7	3.0	2.3	2.0	1.9	3.2	2.7	1.8	2.0	2.4	2.5		
Luxembourg HICF	0.27%	2003	2.3	2.4	2.0	2.7	3.4	3.8	3.8	2.2	2.8	3.1	2.0	3.0	2.5	2.9	
Luxembourg HICF	U.2/8	2004	3.4	2.4	2.0 2.6	2.7 2.5	2.4	2.3	3.6 3.4	3.0	2.8 2.8	3.1	3.1	3.0		2.9	2.8
			-		_			_	-		_	_	_		2.2		2.8
<u> </u>		2003	4.0	4.1	3.8	3.7	3.7	3.4	2.9	3.5	3.2	2.8	2.3	2.3	3.3		
Portugal HICP	2.14%	2004	2.2	2.1	2.2	2.4	2.4	3.7	2.9	1.9	2.5	2.4	2.8	2.8		2.6	١.,
		2005	2.9	3.0	3.0	2.9	2.8	2.2	2.8	3.0	2.9	3.0	3.0	3.0			2.9
		2003	3.3	4.2	3.9	3.3	3.5	3.6	3.5	6.7	3.3	3.2	3.5	3.1	3.5		
Greece HICP	2.65%	2004	3.1	2.6	2.9	3.1	3.1	3.0	3.1	-0.1	2.9	2.9	2.8	2.8		3.0	
		2005	2.9	3.0	2.7	2.6	2.6	2.6	2.8	2.8	2.6	2.6	2.5	2.5			2.7

<sup>\*</sup> The annual rate of growth reflects fundamental changes in prices with respect to monthly growth rates

Source: EUROSTAT, IFL & UC3M

Date: August 23, 2004

<sup>(1)</sup> Figures in bold type are forecasted values.

<sup>(2)</sup> Annual average rate of growth.

				ŀ	HARMONI	ZED CPI (	HICP) ANI	NUAL GRO	OWTH FOI	R EU COU	NTRIES (1	)					
	EU15		I	II	III	IV	v	VI	VII	VIII	IX	х	ΧI	XII	Avr 03/02(b)	Avr 04/03(b)	Avr 05/04(b)
		2003	2.6	2.9	2.8	2.5	2.1	2.0	1.8	2.0	1.7	1.1	1.4	1.2	2.0		
Denmark HICP	1.18%	2004	1.0	0.7	0.0	0.5	1.1	0.9	1.1	0.8	1.0	1.4	1.3	1.4		1.0	1
		2005	1.5	1.6	2.0	1.8	1.7	1.9	1.9	1.9	1.9	1.9	1.9	1.9			1.8
		2003	1.4	1.6	1.6	1.5	1.2	1.1	1.3	2.1	1.4	1.4	1.3	1.3	1.4		
UK HICP	18.19%	2004	1.4	1.3	0.9	1.2	1.5	1.6	1.4	0.6	1.4	1.3	1.4	1.3		1.3	1
		2005	1.3	1.3	1.5	1.4	1.3	1.4	1.4	1.4	1.4	1.4	1.3	1.3			1.4
		2003	2.6	3.3	2.9	2.3	2.0	2.0	2.4	3.0	2.3	2.0	2.0	1.8	2.3		
Sweden HICP	1.87%	2004	1.3	0.2	0.4	1.1	1.5	1.2	1.2	0.5	1.1	1.1	1.3	1.3		1.1	1

1.5

1.6

1.6

1.5

1.5

1.5

1.5

1.5

1.8

1.5

1.4

1.2

1.5

2005

Source: EUROSTAT, IFL & UC3M

Date: August 23, 2004

Table A4B

<sup>\*</sup> The annual rate of growth reflects fundamental changes in prices with 6 months lags with respect to monthly growth rates.

<sup>(1)</sup> Figures in bold type are forecasted values.

<sup>(2)</sup> Annual average rate of growth.

Table A4C

## HARMONIZED CPI (HICP) MONTHLY GROWTH FOR EMU COUNTRIES (1)

						•						. ,					
	EMU12		ı	II	III	IV	v	VI	VII	VIII	IX	х	ΧI	XII	D03 / D02	D04 / D03	D05 / D04
		2003	-0.4	0.2	0.8	0.8	-0.1	0.1	-0.6	1.9	-1.1	0.7	0.3	0.2	2.7		
Spain HICP	11,11%	2004	-0.8	0.1	0.7	1.4	0.6	0.2	-0.7	0.5	0.3	0.8	0.4	0.2		3.6	
		2005	-0.7	0.1	0.6	1.0	0.2	0.1	-0.7	0.3	0.3	0.8	0.4	0.3			2.7
		2003	-0.1	0.6	0.2	-0.3	-0.3	0.2	0.3	0.6	-0.6	-0.1	-0.2	0.9	1.1		
Germany HICP	29.26%	2004	0.0	0.2	0.5	0.3	0.2	0.0	0.4	-0.2	0.1	0.0	-0.1	1.0		2.2	
		2005	-0.4	0.2	0.2	0.1	0.0	0.2	0.3	-0.1	-0.1	-0.1	-0.1	1.0			1.0
		2003	0.2	0.2	0.3	-0.1	-0.2	0.0	-0.1	1.0	-0.5	0.0	0.2	0.3	1.3		
Austria HICP	3.14%	2004	0.1	0.5	0.4	-0.1	0.4	0.2	-0.3	0.3	0.1	0.0	0.2	0.3		2.0	
		2005	0.1	0.4	0.3	-0.1	0.2	0.1	-0.2	0.3	0.2	0.0	0.2	0.3			1.8
		2003	-1.0	2.1	0.3	-0.2	-0.4	0.4	-1.2	1.7	0.2	-0.4	0.2	0.0	1.7		
Belgium HICP	3.32%	2004	-1.3	1.9	0.1	0.5	0.3	-0.1	-1.0	1.5	0.3	-0.4	0.2	0.0		1.9	
_		2005	-1.0	1.8	0.1	0.3	0.2	0.1	-1.0	1.4	0.2	-0.3	0.1	0.0			1.9
		2003	0.2	0.9	0.4	-0.1	-0.1	-0.1	-0.5	0.6	0.1	-0.1	-0.1	0.1	1.2		
Finland HICP	1.57%	2004	-0.3	0.4	-0.4	0.0	0.2	-0.1	-0.3	0.1	0.3	0.0	0.0	0.1		0.1	
		2005	-0.1	0.3	-0.2	0.0	0.1	0.0	-0.1	0.1	0.2	0.0	0.0	0.1			0.6
		2003	0.3	0.7	0.5	-0.2	-0.1	0.2	-0.1	1.1	-0.4	0.2	0.1	0.1	2.4		
France HICP	20.70%	2004	0.1	0.4	0.4	0.3	0.4	0.1	-0.2	0.1	0.5	0.2	0.1	0.2		2.5	
		2005	-0.2	0.4	0.3	0.2	0.1	0.1	-0.2	0.2	0.2	0.2	0.0	0.2			1.5
		2003	0.6	0.8	0.9	0.1	-0.1	-0.5	-0.1	-0.1	1.2	-0.2	-0.4	-0.6	1.6		
Netherlands HICP	5.29%	2004	0.5	0.6	0.8	0.3	0.2	-0.7	-0.3	0.3	0.9	0.0	-0.3	-0.4		1.8	
	0.20 / 0	2005	0.5	0.6	0.9	0.4	0.1	-0.5	-0.2	0.3	0.9	0.0	-0.3	-0.4			2.2
1		2003	0.0	1.0	0.7	0.5	-0.2	0.1	-0.4	1.2	-0.4	0.0	0.0	0.4	2.9		
Ireland HICP	1.29%	2004	-0.6	0.9	0.4	0.3	0.2	0.5	-0.4	0.6	0.2	0.2	0.0	0.5		2.8	
ii olalla i ii ol	1.20 /0	2005	-0.4	0.9	0.5	0.4	0.2	0.4	-0.4	0.6	0.2	0.2	0.0	0.5		2.0	3.1
		2003	-0.3	-0.4	1.2	0.8	0.2	0.1	-0.1	1.0	-0.6	0.3	0.3	0.0	2.5		<del></del>
Italy HICP	19.27%	2004	-0.6	-0.2	1.1	0.8	0.2	0.2	-0.2	-0.3	0.5	0.4	0.3	0.0	2.0	2.2	
italy filo	13.27 /6	2005	-0.1	-0.5	0.9	0.7	0.3	0.1	-0.2	-0.2	0.5	0.5	0.3	0.1			2.6
		2003	-0.3	1.1	0.5	-0.2	-0.2	0.0	-0.8	2.1	-0.2	-0.4	0.4	0.2	2.4		
Luxembourg HICP	0.27%	2004	-0.3	1.3	0.1	0.5	0.5	0.4	-0.8	0.6	0.4	-0.1	0.3	0.2	2.4	3.0	
Luxellibourg filer	0.27 /6	2004	0.0	0.3	0.1	0.3	0.4	0.4	0.2	0.0	0.4	0.2	0.3	0.2		3.0	3.0
-				0.0		0.4	0.4	0.0	-0.2	0.2	-0.4	0.2	1		2.3		3.0
Downwal HICD	2.14%	2003 2004	0.1 0.0	-0.2	0.1 0.2	1.0	0.7		-0.2 -0.9	- <b>0.7</b>		0.2 <b>0.2</b>	0.1	0.1 <b>0.1</b>	2.3	2.8	
Portugal HICP	2.14%			-		-		1.2 <b>0.6</b>			0.1		0.4	_		2.8	٠,
+		2005	0.1	-0.1	0.3	0.9	0.7		-0.3	-0.1	0.1	0.3	0.4	0.1	2.4	<del> </del>	3.0
0	0.070/	2003	-0.8	-0.2	2.5	0.2	0.5	-0.2	-2.1	3.2	-1.1	0.4	0.4	0.4	3.1		
Greece HICP	2.67%	2004	-0.8	-0.7	2.9	0.4	0.4	-0.2	-1.9	0.0	1.8	0.3	0.3	0.3		2.8	0.5
		2005	-0.8	-0.6	2.6	0.3	0.4	-0.2	-1.7	0.0	1.6	0.3	0.3	0.3			2.5

<sup>(1)</sup> Figures in bold type are forecasted values.

Source: EUROSTAT, IFL & UC3M

Date: August 23, 2004

<sup>(2)</sup> Annual average rate of growth.

Table A4D																	
	HARMONIZED CPI (HICP) MONTHLY GROWTH FOR EU COUNTRIES (1)																
	EU15		I	II	III	IV	V	VI	VII	VIII	IX	х	ΧI	XII	D03 / D02	D04 / D03	D05 / D04
		2003	0.2	0.7	0.8	0.0	-0.3	0.0	-0.6	0.4	0.3	-0.3	0.2	-0.2	1.2		
Denmark HICP	1.18%	2004	-0.1	0.4	0.1	0.5	0.3	-0.3	-0.3	0.1	0.5	0.1	0.1	-0.1		1.4	
		2005	0.0	0.5	0.5	0.3	0.3	0.0	-0.4	0.0	0.6	0.1	0.1	-0.1			1.9
		2003	-0.6	0.4	0.4	0.3	0.0	-0.1	-0.1	1.1	-0.5	0.2	-0.1	0.4	1.3		
UK HICP	18.19%	2004	-0.5	0.3	0.0	0.5	0.4	-0.1	-0.3	0.3	0.4	0.1	0.0	0.3		1.3	
		2005	-0.6	0.3	0.2	0.4	0.3	0.0	-0.3	0.3	0.3	0.1	0.0	0.3			1.3
		2003	0.3	1.0	0.6	-0.4	-0.1	-0.2	-0.2	0.7	0.0	0.1	-0.3	0.2	1.8		
Sweden HICP	1.87%	2004	-0.3	-0.1	0.9	0.3	0.4	-0.5	-0.2	0.0	0.6	0.1	-0.1	0.2		1.3	
		2005	-0.1	0.2	0.6	0.1	0.2	-0.3	-0.1	0.0	0.5	0.1	-0.1	0.2			1.5

<sup>(1)</sup> Figures in bold type are forecasted values.
(2) Annual average rate of growth.

Source: EUROSTAT, IFL & UC3M

Date: August 23, 2004

Table A5A																	
			Н	ARMONIZ	ED CPI (H	ICP) ANN	UAL GRO	WTH BY S	SECTORS	IN THE EN	/IU 2003-2	004-2005 (	a)				
			I	II	III	IV	v	VI	VII	VIII	IX	х	ΧI	XII	Avr 03/02(b)	Avr 04/03(b)	Avr 05/04(b
		2003	1.9	2.1	2.2	2.1	2.1	2.2	2.0	2.0	2.0	2.2	2.1	1.9	2.1		
AE	9.46%	2004	1.9	1.9	1.7	1.7	1.5	1.4	1.4	1.4	1.4	1.4	1.5	1.6		1.6	
		2005	1.5	1.5	1.7	1.8	1.9	2.0	2.1	2.1	2.1	2.1	2.1	2.1			1.9
		2003	6.7	7.7	7.5	7.9	7.9	7.6	7.7	7.5	7.8	9.3	11.7	11.7	8.4		
TOBACCO	2.37%	2004	9.0	8.3	13.9	13.1	13.8	13.8	13.7	13.6	13.4	12.0	9.6	9.3		12.0	
		2005	12.0	11.7	6.2	5.8	5.3	5.3	5.4	5.4	5.4	5.4	5.4	5.4			6.5
		2003	0.7	0.8	0.8	0.8	0.9	0.9	0.8	0.7	0.8	0.8	0.8	0.8	0.8		
MAN	31.01%	2004	0.6	0.9	0.8	1.0	0.8	0.8	0.7	0.7	0.6	0.6	0.6	0.6		0.7	
		2005	0.7	0.6	0.6	0.6	0.6	0.6	0.7	0.7	0.7	0.7	0.7	0.7			0.7
		2003	1.3	1.4	1.4	1.4	1.6	1.5	1.4	1.3	1.4	1.5	1.6	1.6	1.5		
BENE	42.85%	2004	1.3	1.5	1.7	1.8	1.7	1.7	1.5	1.6	1.5	1.4	1.3	1.3		1.5	
		2005	1.5	1.4	1.2	1.1	1.1	1.2	1.2	1.3	1.3	1.3	1.3	1.3			1.3
		2003	2.9	2.7	2.7	2.9	2.5	2.6	2.3	2.5	2.5	2.5	2.4	2.3	2.6		
SER	41.33%	2004	2.5	2.7	2.5	2.5	2.6	2.6	2.7	2.6	2.6	2.7	2.7	2.7		2.6	
		2005	2.6	2.6	2.8	2.5	2.6	2.6	2.6	2.6	2.6	2.6	2.6	2.6			2.6
		2003	2.0	2.0	2.0	2.2	2.0	2.0	1.8	1.8	2.0	2.1	2.0	1.9	2.0		
<b>IPSEBENE</b>	84.18%	2004	1.9	2.0	2.1	2.1	2.1	2.1	2.1	2.1	2.0	1.9	1.9	2.0		2.0	
		2005	2.0	2.0	1.9	1.8	1.8	1.8	1.9	1.9	1.9	1.9	1.9	1.9			1.9
		2003	-0.7	0.3	0.8	0.9	1.1	2.6	2.8	3.3	4.2	3.8	3.8	3.2	2.2		
ANE	7.69%	2004	2.9	1.9	1.7	1.6	1.8	1.3	0.8	0.5	0.0	0.1	0.1	0.5		1.1	
		2005	0.6	1.2	1.3	1.4	1.4	1.7	1.9	2.1	2.4	2.3	2.3	2.2			1.7
		2003	5.9	7.6	7.5	2.2	0.6	1.6	2.0	2.7	1.6	0.8	2.3	1.8	3.0		
ENE	8.13%	2004	-0.3	-2.3	-2.0	2.0	6.7	5.9	6.0	6.4	6.8	7.5	8.0	8.2		4.4	
		2005	7.1	7.1	5.7	4.5	1.9	2.6	1.9	0.4	0.1	-0.2	-0.5	-0.4		ĺ	2.4
		2003	2.1	2.4	2.4	2.1	1.8	1.9	1.9	2.1	2.2	2.0	2.2	2.0	2.1		
HICP	100.00%	2004	1.9	1.6	1.7	2.0	2.5	2.4	2.3	2.3	2.2	2.3	2.3	2.4		2.2	
		2005	2.3	2.4	2.1	2.0	1.8	2.0	1.9	1.8	1.8	1.8	1.8	1.8			2.0

Source: EUROSTAT, IFL & UC3M Date: August 23, 2004

Table A5B																	
			HA	ARMONIZI	ED CPI (HI	CP) MONT	THLY GRO	WTH BY	SECTORS	IN THE E	MU 2003-2	2004-2005	(a)				
			ı	II	III	IV	V	VI	VII	VIII	IX	х	ΧI	XII	D03 / D02	D04 / D03	D05 / D04
		2003	0.2	0.3	0.2	0.2	0.1	0.2	0.1	0.2	0.1	0.2	0.1	0.0	1.9		
AE	9.46%	2004	0.2	0.2	0.0	0.1	0.0	0.1	0.1	0.2	0.1	0.2	0.2	0.1		1.6	
		2005	0.2	0.2	0.1	0.2	0.2	0.2	0.2	0.2	0.1	0.2	0.2	0.1			2.1
		2003	4.2	1.0	0.1	1.2	0.1	0.1	0.1	0.1	0.3	1.4	2.3	0.3	11.7		
TOBACCO	2.37%	2004	1.7	0.3	5.3	0.4	0.6	0.1	0.0	0.1	0.1	0.1	0.1	0.1		9.3	
		2005	4.2	0.1	0.1	0.1	0.1	0.1	0.1	0.1	0.1	0.1	0.1	0.1			5.4
		2003	-1.4	0.0	1.1	0.6	0.3	-0.2	-1.4	-0.1	1.1	0.6	0.3	-0.1	0.8		
MAN	31.01%	2004	-1.6	0.3	1.0	0.8	0.1	-0.2	-1.6	-0.1	1.1	0.6	0.3	-0.1		0.6	
		2005	-1.5	0.2	1.1	0.8	0.1	-0.2	-1.5	-0.1	1.1	0.6	0.3	-0.1			0.7
		2003	-0.8	0.1	0.9	0.5	0.3	-0.1	-1.0	0.0	0.9	0.5	0.3	0.0	1.6		
BENE	42.85%	2004	-1.0	0.3	1.1	0.7	0.1	-0.1	-1.1	0.0	0.8	0.5	0.2	0.0		1.3	
		2005	-0.8	0.2	0.8	0.6	0.1	-0.1	-1.0	0.0	0.8	0.5	0.2	0.0			1.3
		2003	-0.2	0.3	0.2	0.3	0.0	0.3	0.6	0.3	-0.3	-0.1	-0.1	0.9	2.3		
SER	41.33%	2004	0.0	0.5	0.0	0.3	0.1	0.3	0.8	0.2	-0.3	-0.1	-0.1	0.9		2.7	
		2005	-0.1	0.5	0.2	0.1	0.2	0.3	0.7	0.2	-0.3	-0.1	-0.1	0.9			2.6
		2003	-0.5	0.3	0.5	0.4	0.1	0.1	-0.2	0.1	0.4	0.3	0.1	0.4	1.9		
<b>IPSEBENE</b>	84.18%	2004	-0.5	0.4	0.6	0.4	0.2	0.1	-0.3	0.1	0.2	0.2	0.1	0.4		2.0	
		2005	-0.4	0.3	0.5	0.3	0.2	0.1	-0.2	0.1	0.2	0.2	0.1	0.4			1.9
		2003	1.4	0.3	0.5	0.4	0.3	0.6	-0.6	-0.4	1.2	-0.3	-0.2	0.0	3.2		
ANE	7.69%	2004	1.1	-0.7	0.3	0.3	0.4	0.1	-1.1	-0.7	0.7	-0.2	-0.2	0.3		0.5	
		2005	1.3	-0.1	0.5	0.4	0.4	0.4	-0.8	-0.5	0.9	-0.2	-0.2	0.2			2.2
		2003	3.1	1.9	1.0	-2.9	-2.1	0.0	0.5	1.1	-0.1	-0.3	-0.2	-0.2	1.8		
ENE	8.13%	2004	1.0	-0.1	1.3	1.1	2.5	-0.8	0.6	1.5	0.3	0.3	0.4	-0.1		8.2	
		2005	0.0	-0.1	-0.1	-0.1	-0.1	-0.1	-0.1	0.0	0.0	0.0	0.0	0.0			-0.4
		2003	-0.1	0.4	0.6	0.1	-0.1	0.1	-0.1	0.2	0.4	0.1	0.1	0.3	2.0		
HICP	100.00%	2004	-0.2	0.2	0.7	0.4	0.3	0.0	-0.2	0.2	0.3	0.2	0.1	0.4		2.4	
		2005	-0.3	0.3	0.5	0.3	0.2	0.1	-0.2	0.1	0.3	0.2	0.1	0.4			1.8

Source: EUROSTAT, IFL & UC3M Date: August 23, 2004

Table A6A

## US ANNUAL RATES OF GROWTH ON CPI AND ITS COMPONENTS(1)

		I	II	III	IV	V	VI	VII	VIII	IX	Х	ΧI	XII	Avr 03/02(b)	Avr 04/03(b)	Avr 05/04(b)
	2003	-1.4	-1.5	-1.4	-1.8	-1.9	-1.8	-1.8	-2.2	-2.4	-2.4	-2.6	-2.5	-2.0		
Non energy commodities	2004	-2.3	-2.0	-1.6	-1.4	-1.1	-1.0	-1.2	-0.8	-0.4	-0.1	0.2	0.3		-1.0	i
less food (1)	2005	0.3	0.1	0.0	0.0	-0.1	0.0	0.4	0.3	0.1	0.1	0.0	0.0			0.1
	2003	3.4	3.2	3.0	2.9	3.0	2.9	2.9	2.7	2.7	2.9	2.6	2.6	2.9		
Non energy services (2)	2004	2.5	2.5	2.9	3.1	2.9	3.0	3.0	3.0	3.0	2.9	3.0	3.0		2.9	i
	2005	3.0	3.0	2.9	3.0	3.0	3.0	3.1	3.1	3.1	3.1	3.1	3.1			3.0
	2003	1.9	1.7	1.7	1.5	1.6	1.5	1.5	1.3	1.2	1.3	1.1	1.1	1.5		
Core inflation (3=1+2)	2004	1.1	1.2	1.6	1.8	1.7	1.9	1.8	1.9	2.0	2.0	2.2	2.2		1.8	i
	2005	2.2	2.2	2.1	2.1	2.2	2.2	2.3	2.3	2.2	2.3	2.3	2.3			2.2
	2003	1.4	1.2	1.2	1.0	1.2	1.2	1.3	1.0	0.9	1.0	0.7	0.8	1.1		
Core inflation less owner's equivalent	2004	0.9	1.0	1.5	1.6	1.5	1.6	1.5	1.7	1.9	1.9	2.2	2.1		1.6	i
rent of primary residence	2005	2.2	2.1	2.0	2.0	2.0	2.0	2.2	2.2	2.1	2.1	2.0	2.0			2.1
	2003	1.0	1.4	1.4	1.2	1.7	2.1	2.1	2.5	2.4	2.9	3.2	3.6	2.1		
Food (4)	2004	3.5	3.3	3.2	3.4	4.1	3.7	4.0	3.9	3.9	3.6	3.4	3.0		3.6	
	2005	3.3	3.3	3.3	3.4	2.7	2.8	2.8	2.7	2.7	2.7	2.7	2.7			2.9
	2003	14.1	22.0	23.4	13.0	9.0	9.3	9.1	11.8	14.7	8.8	6.2	6.9	12.2		
Energy (5)	2004	7.8	3.8	0.4	5.6	15.0	17.0	14.2	10.5	8.6	13.4	15.0	16.6		10.6	i
	2005	13.2	10.9	8.5	5.5	-0.6	-3.4	-2.0	-1.7	-2.6	-2.9	-2.3	-2.6			1.4
	2003	2.6	3.0	3.0	2.2	2.1	2.1	2.1	2.2	2.3	2.0	1.8	1.9	2.3		
All items (6=3+4+5)	2004	1.9	1.7	1.7	2.3	3.1	3.3	3.0	2.8	2.8	3.1	3.2	3.3		2.7	1
	2005	3.2	3.0	2.8	2.6	2.0	1.8	2.0	2.0	1.9	1.9	2.0	1.9			2.2
	2003	2.4	3.0	3.1	2.1	1.9	2.1	2.1	2.2	2.4	2.0	1.7	1.9	2.2		
All items less owner's equivalent	2004	1.9	1.6	1.7	2.3	3.3	3.5	3.2	2.9	2.9	3.3	3.5	3.6		2.8	1
rent of primary residence	2005	3.4	3.2	2.8	2.6	1.8	1.6	1.9	1.9	1.7	1.7	1.7	1.7			2.2

<sup>(1)</sup> Figures in bold type are forecasted values.
(2) Mean level of 2003 over 2002 growth rate.
(3) Mean level of 2004 over 2003 growth rate.

Source: BLS & Universidad Carlos III Madrid

Data: August 17, 2004

<sup>(4)</sup> Mean level of 2005 over 2004 growth rate.

#### Table A6B US MONTHLY RATES OF GROWTH ON CPI AND ITS COMPONENTS (1) D03 / D02 | D04 / D03 | D05 / D04 Ш Ш IV ν VI VII VIII ΙX Х ΧI XII 2003 -0.6 0.3 0.4 -0.1 -0.6 -0.6 -0.6 -0.4 -0.6 -2.5 -0.1 0.4 0.1 Non energy commodities 2004 -0.4 0.6 0.7 0.1 -0.2 -0.6 -0.9 0.3 0.7 0.4 -0.1 -0.5 0.3 2005 -0.3 -0.3 -0.5 0.2 -0.1 -0.5 less food (1) 0.4 0.5 0.2 -0.5 0.5 0.4 0.0 2003 0.5 0.4 0.2 0.0 0.3 0.2 0.4 0.3 0.0 -0.1 0.0 2.6 0.4 Non energy services (2) 2004 0.5 0.4 0.6 0.2 0.1 0.3 0.3 0.3 0.0 0.3 0.0 0.0 3.0 2005 0.5 0.4 0.5 0.2 0.1 0.3 0.4 0.3 0.0 0.3 0.0 0.0 3.1 2003 0.2 0.4 0.3 0.1 0.1 -0.1 0.1 0.2 0.1 0.4 -0.2 -0.2 1.1 Core inflation (3=1+2) 2004 0.2 0.5 0.6 0.2 0.0 0.1 0.0 0.3 0.2 0.3 0.0 -0.1 2.2 2005 0.2 0.4 0.5 0.2 0.0 0.1 0.2 0.3 0.1 0.4 0.0 -0.1 2.3 2003 0.2 0.5 0.3 0.1 0.0 -0.1 -0.4 -0.3 0.8 0.1 0.1 0.0 0.4 Core inflation less owner's equivalent 2004 0.2 0.6 8.0 0.2 -0.1 0.0 -0.1 0.3 0.2 0.4 -0.1 -0.3 2.1 rent of primary residence 2005 0.3 0.5 0.7 0.2 -0.1 0.0 0.1 0.3 0.1 0.4 -0.2 -0.3 2.0 2003 0.1 0.5 0.2 -0.1 0.2 0.4 0.1 0.4 0.2 0.6 0.4 0.7 3.6 Food (4) 2004 0.1 0.2 0.2 0.1 0.9 0.1 0.3 0.3 0.2 0.3 0.1 0.3 3.0 2005 0.4 0.1 0.1 0.1 0.3 0.2 0.3 0.2 0.2 0.3 0.2 0.3 2.7 3.4 6.2 5.3 -3.2 -3.0 1.9 2.8 -5.3 -2.8 -1.0 6.9 2003 0.3 2.7 Energy (5) 2004 4.2 2.3 1.8 2.0 5.6 3.6 -2.1 -0.6 1.2 -1.2 -1.4 0.4 16.6 2005 1.2 0.3 -0.5 -0.8 -0.5 0.7 -0.7 -0.4 0.2 -1.5 -0.8 0.1 -2.6 2003 0.4 8.0 0.6 -0.2 -0.2 0.1 0.1 0.4 0.3 -0.1 -0.3 -0.1 1.9 All items (6=3+4+5) 2004 0.5 0.5 0.6 0.3 0.6 0.3 -0.2 0.2 0.3 0.2 -0.1 0.0 3.3 2005 0.0 0.3 0.4 0.4 0.1 0.1 0.1 0.2 0.1 0.2 -0.1 -0.1 1.9 2003 0.5 1.0 0.7 -0.3 -0.2 0.1 0.1 0.4 0.3 -0.2 -0.4 -0.2 1.9 All items less owner's equivalent 3.6 2004 0.6 0.7 8.0 0.3 0.7 0.4 -0.3 0.2 0.3 0.2 -0.2 -0.1 rent of primary residence 2005 0.4 0.4 0.5 0.1 -0.1 0.1 0.1 0.2 0.1 0.2 -0.2 -0.1 1.7

Source: BLS & Universidad Carlos III Madrid

Data: August 17, 2004

<sup>(1)</sup> Figures in bold type are forecasted values.

<sup>(2)</sup> December 2003 over December 2002 growth rate.

<sup>(3)</sup> December 2004 over December 2003 growth rate.

<sup>(4)</sup> December 2005 over December 2004 growth rate.

Table A7A																	
				CONSU	IMER PRIC	CE INDEX,	ANNUAL	GROWTH	RATES II	N SPAIN 20	003-2004-2	2005 (a)					
			I	II	Ш	IV	v	VI	VII	VIII	IX	х	ΧI	XII	Avr 03/02(b)	Avr 04/03(b)	Avr 05/04(b
		2003	3.7	4.2	4.1	3.1	2.8	2.6	2.5	2.5	2.4	2.6	2.8	2.7	3.0		
(1) AE	17.17%	2004 2005	2.5 <b>4.0</b>	2.4 <b>4.0</b>	2.4 <b>4.0</b>	2.9 <b>3.6</b>	3.7 <b>2.8</b>	4.0 <b>2.7</b>	4.2 <b>2.6</b>	4.2 2.7	4.2 2.7	4.1 2.6	4.0 2.6	4.0 2.6		3.6	3.1
		2003	2.0	2.2	2.3	2.6	2.6	2.5	2.2	2.0	2.1	1.5	1.2	1.2	2.0		
(2) MAN	30.05%	2004	0.7	0.5	0.5	0.7	0.9	1.0	0.8	0.8	0.7	0.8	0.9	0.9		0.8	
		2005	1.1	1.1	1.1	0.9	0.8	0.8	1.1	1.1	1.0	1.0	1.0	1.0		<u>'</u>	1.0
		2003	4.0	3.9	3.6	4.0	3.5	3.5	3.6	3.7	3.5	3.7	3.7	3.6	3.7		
(3) SER	35.05%	2004	3.6	3.6	3.6	3.7	3.8	3.8	3.7	3.6	3.7	3.7	3.9	3.9		3.7	
		2005	4.0	4.0	4.1	3.8	3.9	3.9	4.0	4.0	4.0	4.0	4.0	4.0			4.0
IPSEBENE		2003	3.2	3.3	3.2	3.3	3.0	2.9	2.9	2.8	2.8	2.6	2.6	2.5	2.9		
(4)=(1)+(2)+(3)	82.28%	2004	2.3	2.3	2.2	2.4	2.7	2.8	2.8	2.8	2.8	2.7	2.8	2.8		2.6	
		2005	3.0	2.9	3.0	2.7	2.6	2.5	2.7	2.6	2.6	2.6	2.6	2.6			2.7
		2003	2.9	3.0	3.0	3.2	3.1	3.0	2.8	2.8	2.7	2.6	2.6	2.6	2.9	,	
IPSEBENE-XT	77.21%	2004	2.4	2.4	2.3	2.5	2.6	2.6	2.6	2.6	2.6	2.5	2.5	2.5		2.5	
		2005	2.8	2.8	2.7	2.4	2.4	2.4	2.7	2.7	2.7	2.6	2.6	2.6			2.6
		2003	7.2	5.9	5.6	4.5	4.6	4.8	5.5	6.5	7.7	7.0	6.7	6.4	6.0	1	
(5) ANE	8.60%	2004	6.5	6.1	6.5	6.8	7.0	6.2	5.5	4.6	3.3	3.8	4.1	4.1		5.3	
		2005	3.6	5.1	5.1	5.4	5.0	5.4	5.0	5.0	5.2	5.4	5.6	5.5		<b></b> '	5.1
		2003	5.5	6.7	6.1	8.0	-1.9	-0.6	0.0	1.1	-0.2	-1.8	1.1	-0.1	1.4	<b> </b>	
(6) ENE	9.12%	2004	-1.7	-2.5	-2.5	1.4	6.6	7.2	6.6	6.6	7.3	8.6	8.6	8.8		4.5	
		2005	8.0	7.4	5.8	4.3	1.7	1.7	1.2	-0.3	-0.6	-0.7	-0.9	-0.9		<b></b> '	2.1
		2003	3.7	3.8	3.7	3.1	2.7	2.7	2.8	3.0	2.9	2.6	2.8	2.6	3.0	1	
IPC	100%	2004	2.3	2.1	2.1	2.7	3.4	3.5	3.4	3.3	3.3	3.4	3.4	3.5		3.0	
IPC	100%	2004	2.3	2.1	2.1	2.7	3.4	3.5	3.4	3.3	3.3	3.4	3.4	3.5		3.0	1 .

2.7

2.7

2.6

2.9

2.7

2005

3.5

3.4

Source: INE, IFL & UC3M Date: August 20, 2004

<sup>3.1</sup> \* T1,12 growth rate lags fundamental changes in prices 6 months with respect to monthly growth rates. It is necessary to evaluate forecast in order to analyze current situation.

<sup>\*\*</sup> Weights on General CPI are shown in brackets.
(a) Figures in bold type are forecasted values

<sup>(</sup>b) 2003 over 2002 mean growth

<sup>(</sup>c) 2004 over 2003 mean growth

<sup>(</sup>d) 2005 over 2004 mean growth

Table A7B

## CONSUMER PRICE INDEX, MONTHLY GROWTH RATES IN SPAIN 2003-2004-2005 (a)

			ı	II	Ш	IV	V	VI	VII	VIII	IX	х	ΧI	XII	D03 / D02	D04 / D03	D05 / D04
		2003	0.5	0.6	0.3	0.1	0.1	0.1	0.1	0.2	0.1	0.3	0.2	0.1	2.7		
(1) AE	17.17%	2004	0.4	0.5	0.3	0.5	1.0	0.4	0.2	0.2	0.1	0.1	0.2	0.1		4.0	
		2005	0.4	0.4	0.3	0.2	0.2	0.2	0.2	0.2	0.1	0.1	0.1	0.1			2.6
		2003	-3.1	0.0	1.0	2.7	0.5	-0.2	-3.5	-0.3	1.0	2.3	1.1	-0.1	1.2		
(2) MAN	30.05%	2004	-3.6	-0.2	0.9	3.0	0.6	-0.1	-3.7	-0.3	1.0	2.4	1.1	-0.1		0.9	
		2005	-3.4	-0.1	0.9	2.8	0.6	-0.1	-3.4	-0.3	0.9	2.4	1.1	-0.1			1.0
		2003	0.6	0.4	0.5	0.7	-0.2	0.4	0.7	0.7	-0.5	0.2	-0.2	0.4	3.6		
(3) SER	35.05%	2004	0.6	0.4	0.5	0.7	-0.1	0.4	0.6	0.6	-0.3	0.2	-0.1	0.4		3.9	
		2005	0.7	0.4	0.6	0.4	0.0	0.4	0.6	0.6	-0.4	0.2	-0.1	0.5			4.0
IPSEBENE		2003	-0.8	0.3	0.6	1.3	0.1	0.1	-1.0	0.2	0.2	1.0	0.4	0.1	2.5		
(4)=(1)+(2)+(3)	82.28%	2004	-1.0	0.2	0.6	1.5	0.4	0.2	-1.1	0.2	0.2	0.9	0.4	0.2		2.8	
		2005	-0.8	0.2	0.6	1.2	0.3	0.2	-0.9	0.2	0.2	0.9	0.4	0.2			2.6
		2003	-0.9	0.2	0.7	1.3	0.3	0.1	-1.3	0.1	0.4	1.1	0.5	0.1	2.6		
IPSEBENE-XT	77.21%	2004	-1.1	0.2	0.6	1.5	0.3	0.1	-1.3	0.1	0.4	1.0	0.5	0.1		2.5	
		2005	-0.8	0.2	0.6	1.2	0.3	0.1	-1.1	0.1	0.3	1.0	0.5	0.1			2.6
		2003	0.4	-1.5	0.5	0.0	0.6	0.3	1.5	1.9	2.2	-0.4	0.0	0.9	6.4		
(5) ANE	8.60%	2004	0.6	-1.9	0.8	0.3	0.8	-0.5	0.8	1.1	0.9	0.1	0.3	0.9		4.1	
		2005	0.1	-0.5	0.8	0.6	0.4	-0.2	0.5	1.0	1.1	0.2	0.4	0.8			5.5
		2003	2.2	1.3	1.4	-2.6	-2.5	-0.6	0.9	1.4	-0.4	-1.1	0.3	-0.3	-0.1		
(6) ENE	9.12%	2004	0.6	0.4	1.5	1.3	2.5	0.0	0.3	1.5	0.2	0.1	0.3	-0.1		8.8	
		2005	-0.1	-0.1	-0.1	-0.1	-0.1	-0.1	-0.1	-0.1	0.0	0.0	0.0	0.0			-0.9
		2003	-0.4	0.2	0.7	0.8	-0.1	0.1	-0.6	0.5	0.3	0.7	0.3	0.2	2.6		
IPC	100.00%	2004	-0.7	0.0	0.7	1.4	0.6	0.2	-0.8	0.4	0.3	0.8	0.4	0.2		3.5	
		2005	-0.7	0.1	0.6	1.0	0.2	0.1	-0.7	0.3	0.3	0.8	0.4	0.2			2.6

<sup>\*\*</sup> Weights on General CPI are shown in brackets.

(a) Figures in bold type are forecasted values

(b) December 2003 over December 2002.

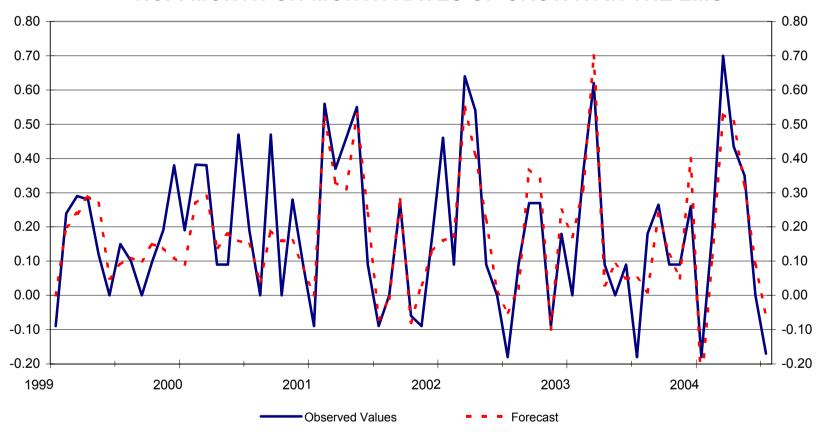
Source: INE, IFL & UC3M Date: August 20, 2004

<sup>(</sup>c) December 2004 over December 2003.

<sup>(</sup>d) December 2005 over December 2004.

Graph A1A

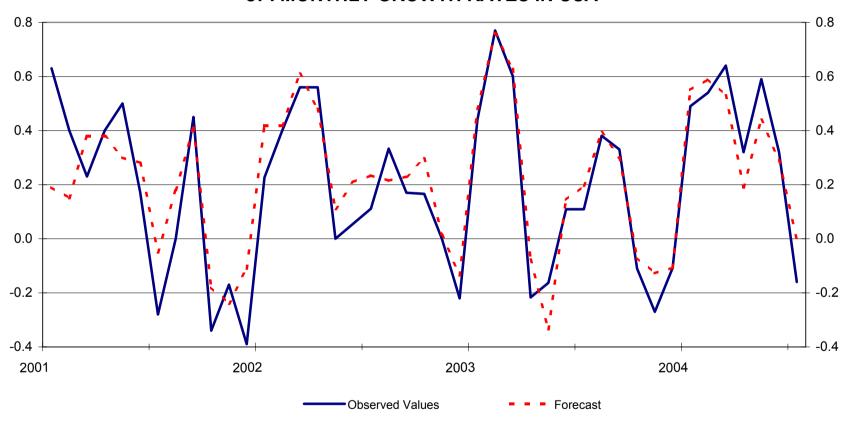
## **HCPI MONTH-ON-MONTH RATES OF GROWTH IN THE EMU**



Source: EUROSTAT, IFL & UC3M Date: August 18, 2004

Graph A1B

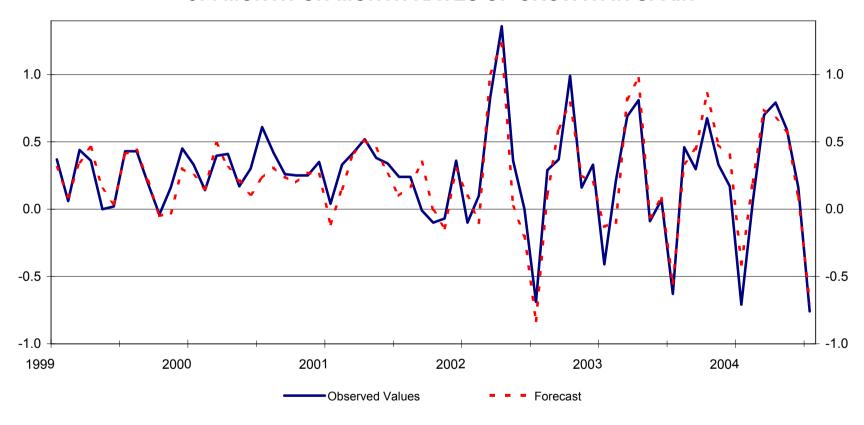
## **CPI MONTHLY GROWTH RATES IN USA**



Source: BLS, IFL & UC3M Date: August 17, 2004

Graph A1C

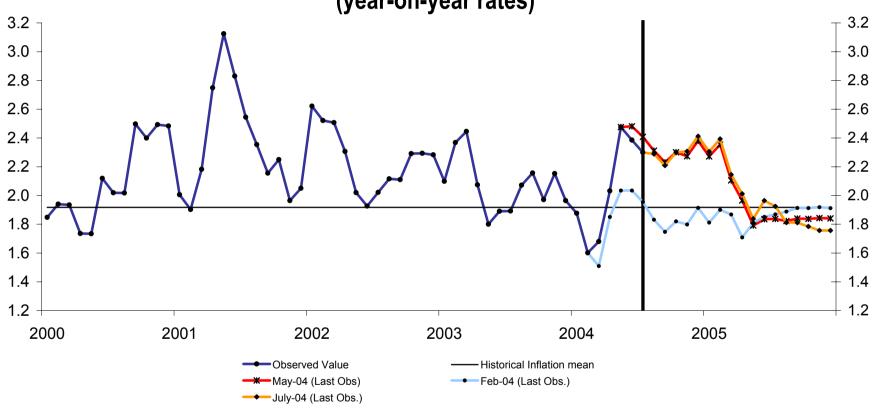
## **CPI MONTH-ON-MONTH RATES OF GROWTH IN SPAIN**

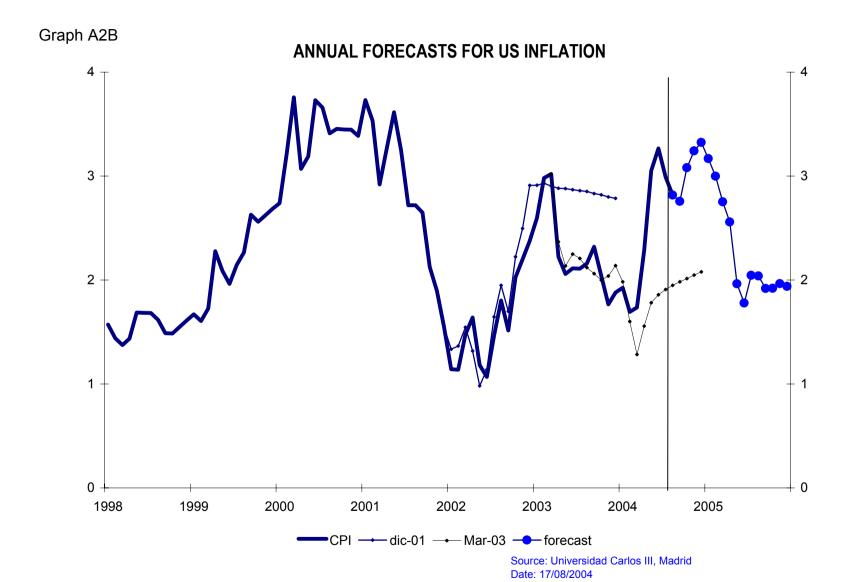


Source: INE, IFL & UC3M Date: August 12, 2004

Graph A2A

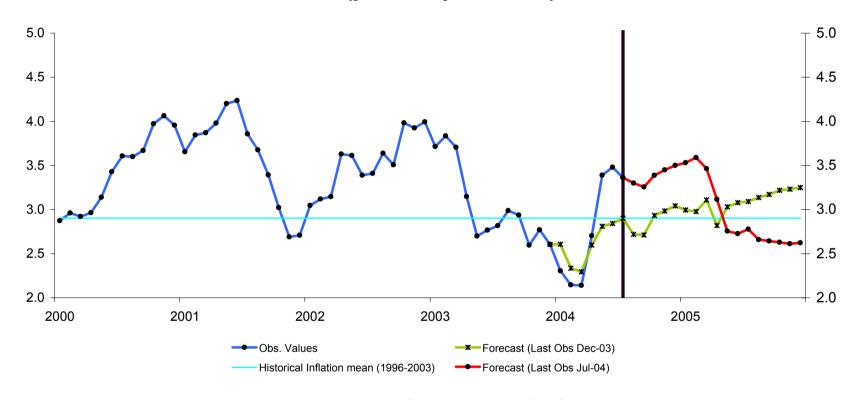






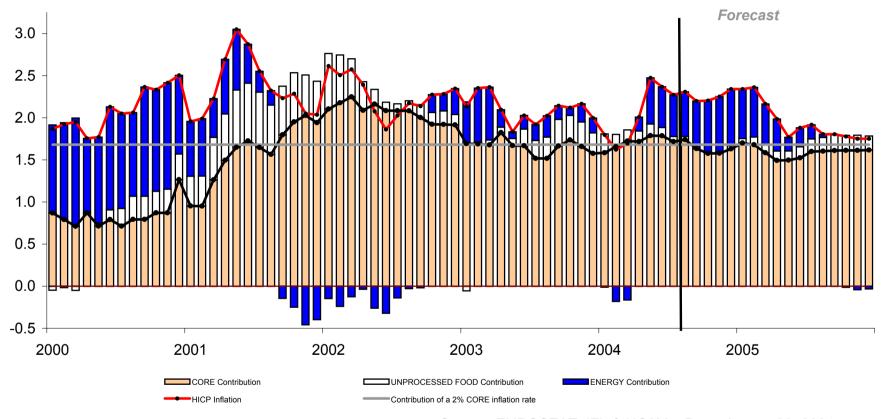
Graph A2C

## ANNUAL FORECASTS FOR TOTAL INFLATION IN SPAIN (year-on-year rates)



Source: INE, IFL & UC3M Date: August 20, 2004

## YEAR-ON-YEAR RATE OF EMU INFLATION AND CONTRIBUTIONS OF MAIN COMPONENTS



Source: EUROSTAT, IFL & UC3M Date: August 23, 2004





# OF E.U. AND US INFLATION AND MACROECONOMIC ANALYSIS



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INTERN	ΔΤΙΟΝΙΔΙ	INEL ATI	ON FORE	CASTS			
INTERN	AVERAGE ANNUAL RATES						
	Monthly Rate	Annual Rate	2001*	2002*	2003*	2004	2005
ECONOMIC MONETARY UNION							
Total Inflation	0.2	2.3	2.3	2.3	2.1	2.2	2.0
Core Inflation	0.1	2.1	1.9	2.5	2.0	2.0	1.9
Goods	-0.1	0.7	0.9	1.5	0.8	0.7	0.7
Services	0.2	2.6	2.5	3.1	2.6	2.6	2.6
GDP			1.6	0.9	0.5	1.7	2.0
Private Final Consumption Expenditure			2.0	1.2	1.2	1.6	1.9
Gross Fixed Capital Formation			-0.3	-2.8	-0.8	2.2	2.1
Exports of Goods and Services			3.4	1.5	0.1	4.1	4.7
Imports of Goods and Services		1.7	0.3	1.9	4.2	4.6	
Gross Value Added Total			1.6	0.9	0.5	1.7	2.0
Gross Value Added Agriculture			-1.2	0.8	-3.4	1.1	1.2
Gross Value Added Industry			0.5	0.3	0.0	1.8	1.8
Gross Value Added Construction			-0.6	-1.0	-0.5	0.8	0.3
Gross Value Added Services			2.7	1.4	1.0	1.9	2.2
OTHER ECONOMIC INDICATOR					1.0	1.0	
Industrial Production Index (excluding o	onstruction)		0.4	-0.5	0.4	2.3	2.1
industrial i roddollori indox (excidentig e	orioti dotiori)		0.1	0.0	0.1	2.0	
UNITED STATES							
Total Inflation	0.2	2.8	2.8	1.6	2.3	2.7	2.2
Core Inflation	0.3	1.9	2.7	2.3	1.5	1.8	2.2
Goods	0.3	-0.8	0.3	-1.1	-2.0	-1.0	0.1
Services	0.3	3.0	3.7	3.8	2.9	2.9	3.0

<sup>\*</sup>Observed values.

SPANISH ECONOMY FORECASTS											
	AUGUST 2004 AVERAGE ANNUAL RATES										
	Monthly Rate	Annual Rate	2001*	2002*	2003*	2004	2005				
Total Inflation	0.4	3.3	3.6	3.1	3.0	3.0	2.9				
Trend Inflation	0.2	2.8	3.4	3.7	2.9	2.6	2.7				
Goods	-0.3	8.0	3.1	2.5	2.0	0.8	1.0				
Services	0.6	3.6	7.1	4.6	3.7	3.7	4.0				

<sup>\*</sup>Observed values.

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