

Monographic March 2007:

Household Economies

INDEX

1. U.S.A
2. Euro-zone
3. Spain
4. Germany & France
5. China
6. Mexico

Authors: Vicente J. Pallardó, Nicolás Jannone, Silviano Esteve, Antonio Cutanda, Francisco Requena, Rosa Puertas, M^a Luisa Martí y Héctor Ruiz

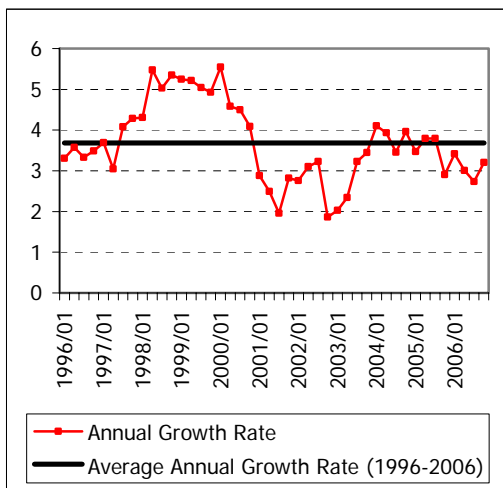
Observatorio de Coyuntura Económica Internacional
Instituto de Economía Internacional
Universitat de València
Campus dels Tarongers
3er piso, edificio Departamental Oriental

1.-United States.

The Situation of Household Economies

The concern regarding the turn the US economy will take over the next few months is inexorably linked to how well households will sustain their spending in what objectively speaking appears to be an entirely unfavourable scenario. The slump in the real estate market, which has been made worse by the crisis in subprime mortgages, the increase in interest rates, the all-time highs in borrowing and all-time lows in savings together with the continuation of the jobless recovery and the wageless recovery... can US consumers overcome all this and for the nth time maintain their demand? How? These are the questions that this report will attempt to answer.

Figure 1: Real Growth in Private Consumption



Source: own elaboration with data from BEA

To begin with, let us have a look at the solid trend in private consumption over the last decade (Figure 1): with peaks at the end of the 1990s and even a 2% growth rate in the worst part of the crisis in 2001 (which explains how

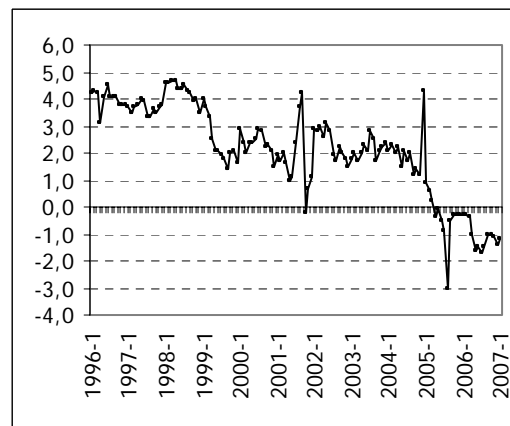
smooth the curve is), the average annual growth rate of private consumption over the period dating from 1996 to 2006 was 3.68%, almost one point higher than the average growth in real personal disposable income.

As a result of this strong trend, private consumption has steadily increased its importance in terms of GDP to 71%. This variable has contributed even more to GDP growth (72%) between 2003 and 2006 and accounted for no less than 150% of the growth during the difficult two-year period during which time the rest of the economy contracted.

Saving and Borrowing

Logically, the negative side of this trend in consumption expenditure that has appeared so many times in these reports in recent years¹ is the virtual disappearance of household saving, which has displayed negative figures for the last two years in a row (Figure 2).

Figure 2: Personal Savings Rate as a Percentage of Disposable Income

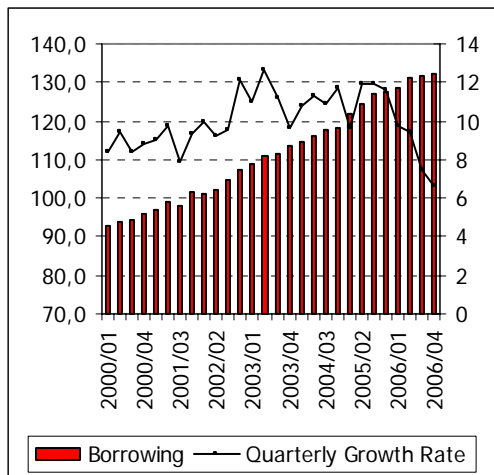


Source: own elaboration with data from FRED II

¹ See particularly the OCEI November 2004 report, which includes a previous specific analysis of the situation of household economies.

As a result of the situation described previously, the level of household borrowing has continuously set all-time highs and reached 132% of disposable income at the end of 2006 (95% of GDP). It is however striking that debt is now growing more slowly (Figure 3). While throughout the current cycle as a whole, household borrowing has risen by an annual 10% or slightly more, the slowdown pushed it down to 6.6% in the last quarter of 2006. The consolidation of a moderate recovery in employment and the beginning of an effective rise in real wages has undoubtedly reduced the need for additional borrowing. Moreover, households are more cautious, mainly through investing less in houses than through spending less on consumption, which has not yet been significantly affected.

Figure 3: Household Borrowing - % of Disposable Income (left axis) and Annual Growth Rate (right axis)

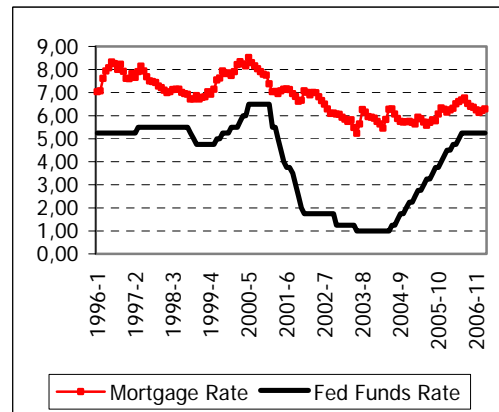


Source: own elaboration with data from FRED II

As regular readers of these reports will already know, the excessive escalation in household borrowing, largely due to the increase in mortgage debt, has one relief valve that distinguishes the United States from, say, many

countries in western Europe: the enormous majority of mortgages have fixed interest rates, despite a markedly upward trend over the past three years not only where variable interest rate mortgages are concerned, but also unusual products such as mortgages that only require interest payments². In fact, Figure 4 reveals, the trend observed in the average mortgage rate has little connection to monetary policy: the increase in interest rates since mid-2004 contrasts entirely with the stability of mortgage rates.

Figure 4: Reference and 30-year Mortgage Interest Rates (%)



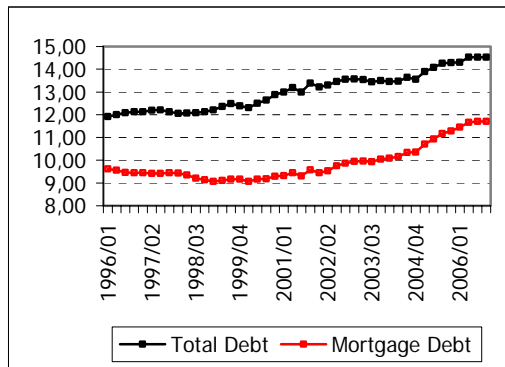
Source: own elaboration with data from FRED II

As a result, although debt servicing, both in the case of mortgage debt and total has certainly risen considerably due to the effect of increased borrowing (Figure 5), prices have had practically no negative effect on the situation. In this sense, faced with an increase in debt over the period dating from 2002 to 2006 of 40 percentage points (in relation to disposable income), current payments of the debt

² These new products were approved by Alan Greenspan and are also involved in the subprime crisis, which saw some analysts criticise the former Fed Chairman for his role in the origin of the crisis.

have only increased by 2.5 percentage points.

Figure 5: Debt Servicing as a Percentage of Disposable Income



Source: own elaboration with data from the Federal Reserve

Once again the key question...is such household behaviour sustainable?

This question not only contains the key to how much economic growth will slow down over the next few quarters, but will be even more important in 2008 when the cohorts from the post World War II baby boom begin retiring.

Indeed, with doubts over the sustainability of the current structure of the pension system and particularly the health system growing³, there is widespread agreement that American saving requirements are rising beyond normalisation that demands its disappearance in recent years.

Therefore, if we combine the two pressing reasons for increasing savings (normalisation and precaution), either the sources of income and wealth will have to record excellent results or the

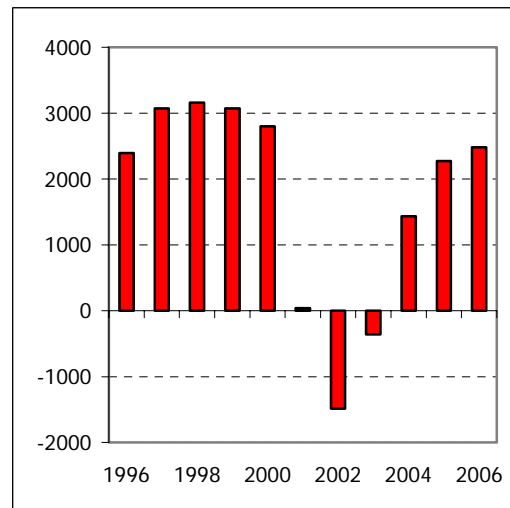
³ It is worth recalling that official forecasts estimated that social security expenditure as a percentage of GDP would rise moderately between 2004 and 2005 from 4.2% to 6.2%. However, total expenditure on behalf of Medicare and Medicaid actually rose from 4.4% to 11.1%, which is simply unsustainable.

slump in consumption could be sizeable. Let's recap.

a) Income

When we first analysed the situation of household economies slightly more than two years ago, we concluded that for the situation to be sustainable, the labour market would have to improve. This improvement has undoubtedly occurred, particularly in terms of job creation (Figure 6). Despite not recovering the figure of three million net jobs per year recorded at the end of the 1990s, the last two years have provided the labour force with 4.75 million new jobs, making the *jobless recovery* in 2002 and 2003 a thing of the past.

Figure 6: Change in Net Private Non Farm Employment (in 1,000s)



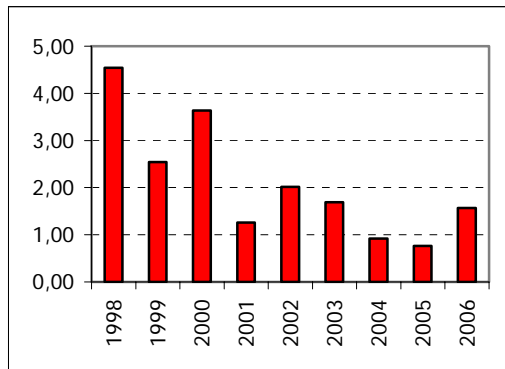
Source: own elaboration with data from the Bureau of Labor Statistics (BLS)

However, wage data is not as promising (Figure 7): the repeatedly analysed wageless recovery has seen growth in real wages virtually grind to a halt in the current expansion and is only half that observed at the end of the last decade. Wages only began to rise clearly in the second half of 2006.

Wage extras (health and pension benefits...), which rose markedly between 2002 and 2004 have decelerated sharply since then, restricting the minimal improvement in wages witnessed in the last two years.

In any case, the increase in the second part of 2006, along with the decrease in energy prices has certainly been a relief for households faced with the real estate crisis.

Figure 7: Real Wages per Hour Worked (annual %)



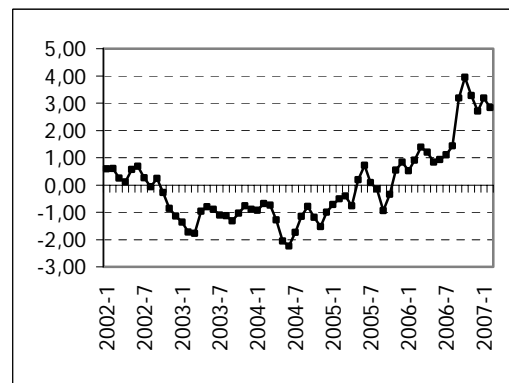
Source: own elaboration with data from BLS

This moderately optimistic news on the labour market front contrasts with the negative turn taken by macroeconomic policy, a change that was inevitable after the extraordinary stimulation injected into the economy between 2001 and 2004.

Monetary policymakers have progressively abandoned the extremely accommodating conditions at the beginning of the decade (Figure 8), which saw real interest rates remain negative for 30 months in a row. Real interest rates were in the vicinity of 3% (page 1 graph) at the end of 2006, double the average for the period 1995-2006. Just because tighter monetary policy has not been felt by the real estate market, does not exempt other segments of the loan

market, which is particularly damaging for economies deep in debt. Bearing this in mind, we insist on the importance of the fact that nearly 80% of mortgages have fixed rates, as real estate debt accounts for almost 75% of total US household liabilities.

Figure 8: Real Interest Rates (Fed Funds Rate – Headline Inflation; %)



Source: own elaboration with data from the Federal Reserve and BLS

Meanwhile, tax policy is forced to purge excessive tax cuts in 2001 and 2003 (which in addition were biased in favour of high income earners). Not only the fact that it is impossible to recover a balanced budget after five years of expansion and growing public debt prevent further tax cuts, but also the open battle between those who support the move to cut social expenditure (Republicans, led by the government) and those who would prefer to raise taxes (Democrats) will also have a negative affect on household expenditure whatever the outcome may be.

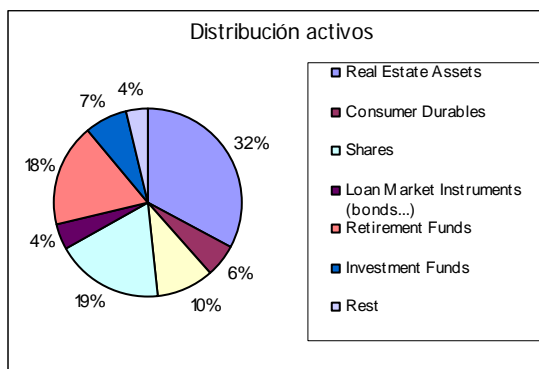
Therefore, as regards income sources, households are faced with only moderately good news in the labour market, a seriously adverse bias in macroeconomic policy and inflation that is higher than desired, with energy, despite the decreases in the last three

quarters, still costing more than normal with respect to the past decade.

b) Wealth

There is no doubt that the strongly (excessively we could say) expansive household expenditure in this economic cycle has a lot more to do with wealth than with income. This has given rise to a serious debate over whether or not this "new model" of consumption is sustainable. The real estate crisis solves that debate.

Figure 9: Household Asset Distribution (end of 2006; %)



Source: own elaboration with data from the Federal Reserve

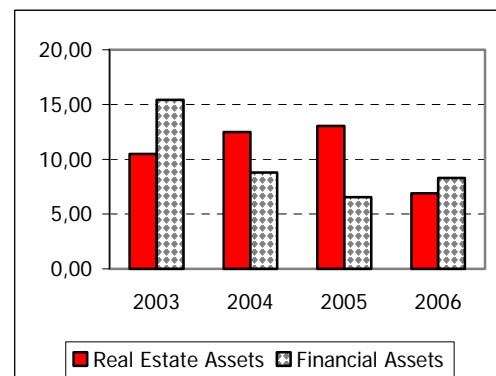
The financial situation of US households would be a good place to start. As regards household assets, real estate, despite the upturn in prices and purchases made over the past five years, accounts for a relatively modest proportion in comparison to other countries and.

This means that, unless there is a marked slump in prices (which is not anticipated), the impact of the real estate crisis on overall wealth should be restricted. In contrast, stagnant prices do limit resources based on property (through loans using houses as collateral), a factor that is probably

basic⁴ to understand how sound consumption has been in recent years.

Returning to the composition of the asset basket, nearly half are investments in variable (more) or fixed income markets. At the same time, these assets are divided almost evenly between those that are owned directly and those that are owned through a retirement fund. On an international scale, this percentage is high, particularly the amount invested in variable income, which is producing highly favourable profit margins since 2004, not only because shares have gone up in price, but also due to the upturn in dividend payments, currently at an all-time high. Yields in other financial markets have not been far behind either in recent years. As a result, although analysts and the media have focused more on real estate developments, the increase in financial assets (Figure 10) has nothing to envy (annual average of 9.77% compared to 10.73% over 2003-2006) real estate about.

Figure 10: Financial and Real Estate Assets Held by Households (annual growth rate)

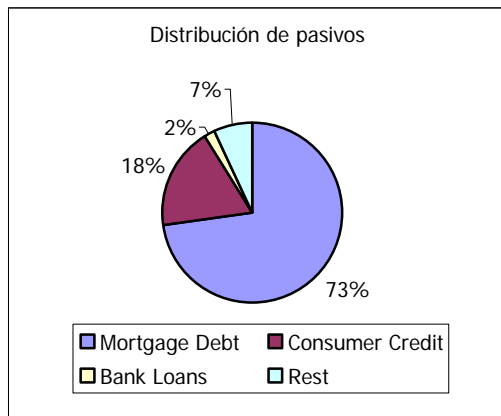


Source: own elaboration with data from the Federal Reserve

⁴ Although not all experts agree with this term; some consider it to be a secondary factor.

Finally, bank deposits, consumer durables and other goods account for the remaining 20% of US household assets.

Figure 11: Household Liability Distribution (end of 2006, %)



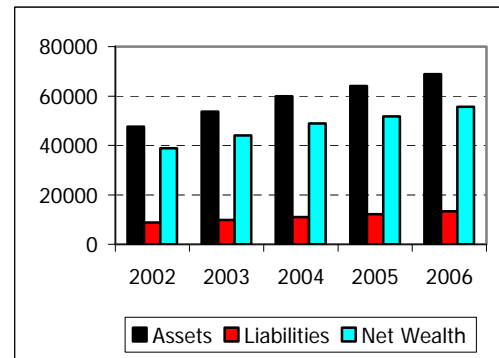
Source: own elaboration with data from the Federal Reserve.

As regards liabilities (Figure 11), most are concentrated in mortgage debt (73%), with the advantage of stable interest rates, regardless of what happens with money rates mentioned previously. As a result, and apart from the high risk segment, the delinquent payment rate barely adds up to more than 1% of the total, which means households are sufficiently capable of returning loans.

The rest of liabilities have been more affected by the rise in market interest rates, especially the most important item, consumer credit, which represents 18% of the total.

Regardless of the precise composition described above, what can help us to understand the role of wealth as source of private consumption in recent years is the evolution of the gap between assets and liabilities. Figure 12 compares the total size of both between 2002 and 2006.

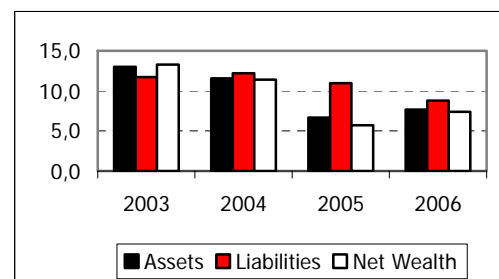
Figure 12: Household Assets, Liabilities and Net Wealth (billions of dollars)



Source: own elaboration with data from the Federal Reserve

As can be observed, household obligations have increased by some four and a half billion dollars in only five years. While this is a considerable amount of money, it is nothing compared to the 21 billion dollar increase in assets. In other terms, while US household liabilities were the equivalent of almost 100% of GDP at the end of 2006, assets were more than five times this figure. For even more clarity, net wealth, which sustains growth in consumption when income is not increasing strongly, rose from 38.8 billion dollars in 2002 to 55.6 billion in 2006 (3.7 times to 4.1 times GDP).

Figure 13: Household Assets, Liabilities and Net Wealth (% change)



Source: own elaboration with data from the Federal Reserve

Nevertheless, it is worth highlighting the fact that the relation between the two variables has changed (Figure 13).

Although both decelerate steadily, liabilities have been outpacing assets since 2004 in contrast to the last few years. Of course, on applying these rates to very different totals (assets are five times as many), net wealth has risen uninterruptedly, although the pace has slowed down⁵. However, nowhere near enough to fear a radical crash in US household spending... unless the repercussions of the real estate crisis are much larger than expected.

Closing Remarks

In short, it is true that certain critical variables have worked against US households' interests and y could do so even more in the immediate future. And we are not only talking about the real estate market, which is the main focus of attention at the moment due to the slump in business that has not ended and which should affect employment and prices in the construction sector and its suppliers. Some of these variables include: tougher monetary policy, much more restrictive tax policy, the disappearance of household savings, increased borrowing and, albeit to a lesser extent, the increase in debt servicing and energy costs, despite the slowdown in recent months.

However, it is also true that some conditions are providing support in the face of an eventual disaster: employment and real wages have improved in recent quarters; the fact that most mortgage debt does not depend on money rates, the spectacular rise in household net

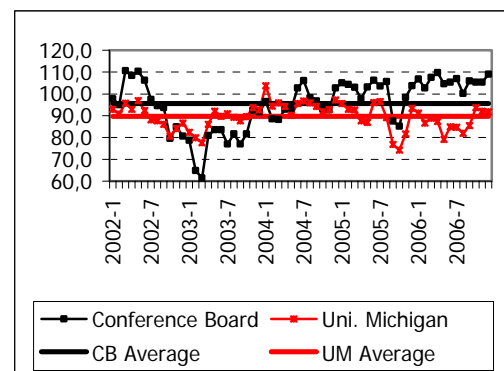
⁵ In relation to income distribution, which we have not mentioned in this report, we refer any readers interested in this variable to our November 2006 monographic report.

wealth throughout the current economic cycle and the strength of the corporate sector and the banking system, which will be examined in future reports.

The combination of all these aspects leads us to reaffirm our forecast for a serious slowdown in the short term in private consumption (from 3.2% to 2.4% in 2007 according to OCEI forecasts), but not a free fall. More in the medium term, we expect growth in household consumption to be considerably lower than the 3.68% average for 1996-2006 mentioned at the beginning of this monograph. Firstly, because an increase in the savings rate is simply unavoidable. Secondly, because such household saving must increase in order to offset the problems in the public system (and corporate plans) in order to face up to the challenges of the health and pension systems.

At present, the most reputed consumer confidence indicators display an interesting sign. Apart from the fact that they are not very reliable as "leading indicators", the truth is that they are useful for assessing citizens' state of mind at present.

Figure 14: Consumer Confidence Indicators



Source: own elaboration with data from the University of Michigan and the Conference Board

After months during which monetary policy has been made tougher, the real estate crisis, political uncertainty..., the Conference Board and University of Michigan indicators (Figure 14) remain stubbornly above (the former) and around (the latter) the average for the current economic cycle⁶.

It remains to be seen whether a possible "Greenspan effect" will set consumer confidence on a downward trend that ends up resulting in effective expenditure data. However, the former Federal Reserve Chairman is not certain to have that much credibility among the average US citizen as he enjoys with the average international investor. At least it is not certain that his pessimistic statements will be received in the same way⁷. We will be watchful.

Vicente J. Pallardó López.
Valencia, 23 March 2007.

⁶ However, it is true that this average is considerably lower than in the second half of the 1990s, when the amazing rallies in both the labour and the stock markets led to all-time highs in consumer confidence indicators.

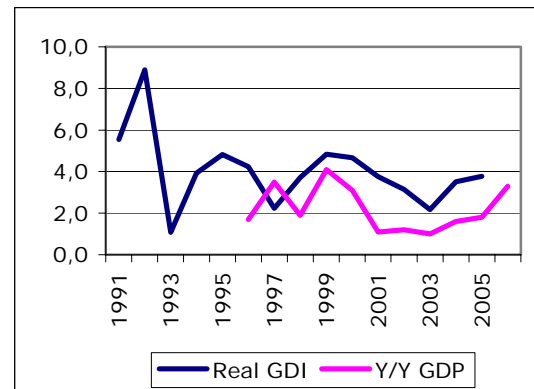
⁷ In any case, by the time this report was finished, the initial negative effect of Greenspan's words on world markets had all but disappeared.

2. Eurozone

Income and its Determinants:

The trend in real gross disposable income in the Euro-zone to a great extent reflects the trend in GDP over the period under analysis, although real disposable income has grown more throughout this period, probably as a result of tax policy.

Figure 1: Annual Growth in GDP and Real Gross Disposable Income

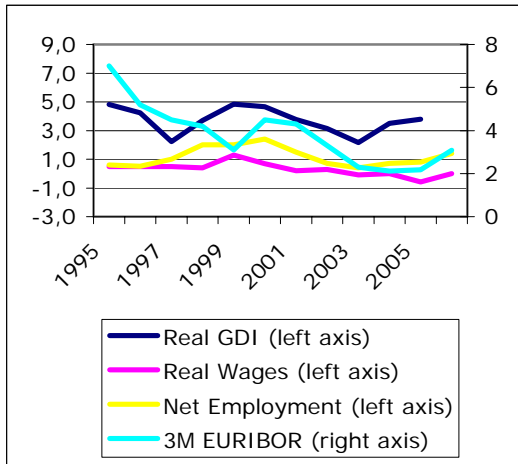


Source: ECB and European Commission

Growth in real gross disposable income has gone hand in hand with growth in net employment and the increase in real wages. In fact, if we take the period 1995-2006, the correlation between disposable income and net employment and real wages is positive and particularly high in the case of net employment (0.45). Correlation is also positive with the interest rate trend, due to monetary policy being adjusted to suit the cyclical situation of the economy.

Nevertheless, employment and wages are not entirely responsible for the growth in disposable income. Other income apart from wages, including bonuses given by companies, are clearly behind the trend in disposable income.

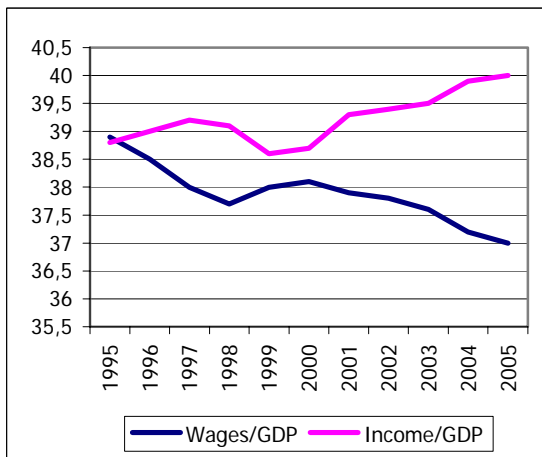
Figure 2: Gross Disposable Income, Net Employment, Real Wages and 3M Euribor



Source: ECB and the European Commission

In fact, if we contemplate the period dating from 1995 to 2006 and leave greater or less net job creation in Europe aside, wages have lost importance in terms of GDP. While in 1995 total wages represented the same percentage of GDP as the rest of incomes, including bonuses, in 2005 the latter saw its share of GDP rise by one percentage point (to 40%), while wages have decreased by two points (to 37%).

Figure 3: Wages and Other Income in Relation to GDP (%)



Source: Eurostat

The inherent cause of these two different trends is really due to weak growth in wages, while labour productivity has been much more favourable, thus opening up a gap between the two variables.

The offshore outsourcing of certain industries to countries where labour costs are lower, particularly those sectors intensive in unskilled labour, has resulted in developed countries losing jobs, which has in turn depressed real wages, especially in the countries that specialize in those industries facing a higher risk of outsourcing and more low skilled employment. In addition, this situation has resulted in unskilled workers moving from those sectors subject to the risk of outsourcing towards other sectors that are not subject to foreign competition and which absorb unskilled labour, such as real estate, retail trade and services linked to consumption.

Figure 4: Real Wages and Labour Productivity (Annual Growth Rates)



Source: ECB

Other factors have also depressed real wages, apart from labour reform which tends to make labour cheaper and avoid outsourcing. These include the level of unemployment, the immigration

factor and the increasing number of part time and temporary contracts.

Notwithstanding, the clear decrease in the importance of wages at European level does not exactly reflect the situation in the various member countries. While in Germany, Italy, the Netherlands and Spain wages have lost ground in terms of GDP, the opposite has occurred in Austria, Belgium, Finland, France and Ireland.⁸

These differences are both cyclical and also due to countries having different economic structure and greater or lesser labour market protection.

In Italy and Spain, real wages have lost ground due to how important retail and consumption related services are, together with the construction-real estate sector, which has a sizeable demand for unskilled and less productive labour. In the case of Germany, the high level of unemployment in sectors subject to strong competition together with the fact that companies need to enhance efficiency and also the fear of outsourcing explain why wages have lost ground.

In France, on the other hand, wages have increased as a percentage of GDP. Productivity gains on behalf of companies due to production specialisation in the financial services sector and a more protected labour market are behind this trend.

Private Consumption:

Household private consumption represents 56.6% of GDP, a figure that

⁸ WP 500-2006 OECD "Labour market performance, income inequality and poverty in OECD countries" by J.M. Burniaux and others.

has recorded only small changes over the period 1995-2006, which are due to changes in the economic cycle. In comparison to the United States, private consumption in the Euro-zone is much less important.

Table 1: Private Consumption over GDP by Euro-zone Member State

	CONS PRIV/PIB
Belgium	51.1
Germany	56.1
Ireland	42.1
Greece	70.4
Spain	60.1
France	56.3
Italy	59.7
Luxembourg	44.8
The Netherlands	47.8
Austria	57.1
Portugal	64.1
Finland	49.6
EURO-ZONE	56.6

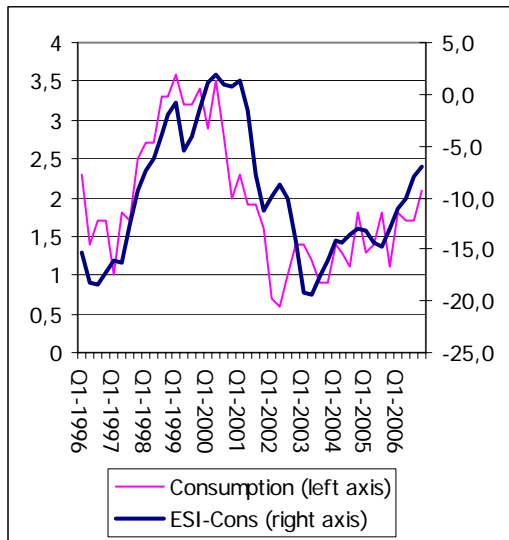
Source: Eurostat

Private consumption as a percentage of GDP varies greatly across the Euro-zone. While the share of private consumption in Ireland, Luxembourg, Finland and the Netherlands is very low, in other countries such as Greece, Spain and Portugal it is well above the average.

Private consumption maintains a close-knit relationship with the consumer confidence index, included in the ESI regardless of whether the data is annual or quarterly. In this case, annual growth data are used. The correlation between the two variables is 77% with annual data and 72% if quarterly data are used, which is a good indicator of how strong or weak private consumption is in the Euro-zone.

However, the ESI seems to work more as a coincident indicator than a leading indicator.

Figure 5: Private Consumption and Consumer Confidence Index



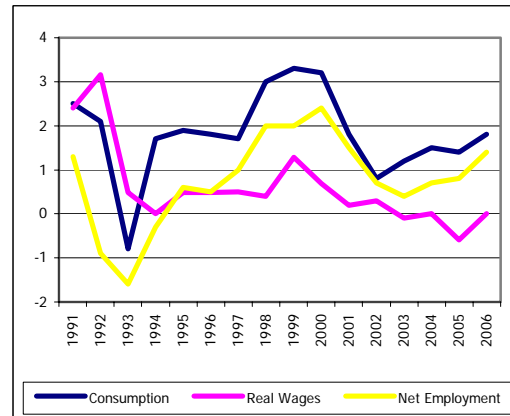
Source: ECB

The recent trend in private consumption in the Euro-zone has been favourable and should tend to remain strong throughout 2007. Private consumption grew by 1.8% in 2006, the highest growth rate in the last five years.

Apart from expectations, which improved further over the first two months of the year (ESI consumer confidence index), private consumption also depends, on the one hand, on growth in net employment and real wages and, on the other hand, on the wealth effect, which reflects movements in real estate and share prices.

Net employment and real wages are the variables that most influence consumption, particularly the former which has elasticity of 1.1.

Figure 6: Private Consumption, Net Employment and Real Wages (annual growth rates)



Source: ECB

Net employment increased by 1.4% in 2006, practically doubling the rise recorded in the last four years. Real wages, while weak, improved in 2006 in relation to the previous year and could rise further in 2007 due to greater tension in the labour market, where the unemployment rate, as mentioned previously, stands at an all-time low (7.4%) below the estimated NAIRU (7.5%).

All the above together with a positive wealth effect in 2007 should further strengthen private consumption.

Apart from what has already been said about private consumption, we will also analyse the effect of an ageing population and income inequality and whether or not Ricardian Neutrality exists.

a) The Effect of Ageing on Private Consumption:

In line with the life cycle theory, workers save during their working life to spend when they are retired. Therefore, during the change from a young population to an old population, overall savings are expected to be

greater during the first few years and to tend to decrease in aged societies. In fact, total savings are positively correlated to the proportion of young workers over the total and to pension coverage.⁹

Aged populations increase their consumption of services related to health and demand less consumer durable goods.

b) The Effect of Inequality and Distortion in Income Distribution on Private Consumption:

1. Polarisation of the demand for goods and services: luxury goods for the richest and goods imported from emerging nations and on discount for the poorest
2. Decrease in total private consumption: high income earners tend to consume less while low income earners tend to consume more. Growing inequality would generate a growing aggregate savings rate and a problem of insufficient effective demand. In this sense, governments should, on the one hand, make sure that imports taking advantage of lower wages are sold at highly competitive prices to favour retail competition and on the other hand, offer tax benefits that force companies to distribute profits in every way possible: workers are given part of the profit or free shares in the company.

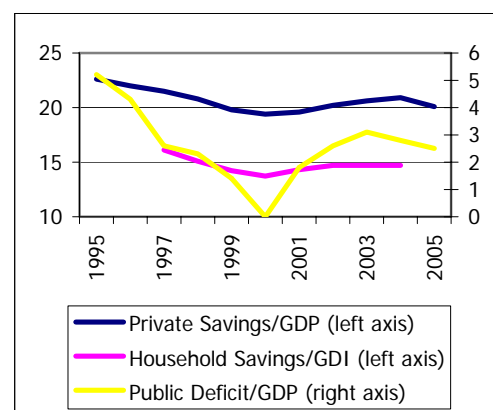
⁹ OECD WP n° 420 march 2005. "The impact of ageing on demand, factors, markets and growth." J. Oliveira and others.

c) Ricardian Neutrality:

Household savings and the economy in general moved in more less the same direction as the deficit in terms of the protocol for excessive deficit over the period 1995-2005. That is, if private savings increase, government savings decrease and vice-versa. However, in absolute terms, the increases and decreases in household private savings have been smaller than in government savings. Hence, in the Euro-zone we could be faced, in overall terms, with the presence of a certain degree of Ricardian Neutrality.

If we spoke about some countries in the Euro-zone in particular, such as France or Germany and took longer periods of time into consideration – from 1980 – it is as if this neutrality had disappeared. In the case of Germany, this is the result of ageing and the increase in corporate savings, while in France it is due to monetary policy, the wealth effect and an increase in loans.¹⁰

Figure 2.7: Public Deficit, Private Savings and Household Savings as a % of GDP



Source: ECB and Eurostat

¹⁰ Why has Ricardian neutrality disappeared?
Patrick Artus. Economic Research N° 2004-255. 8TH September 2004. CDC-Ixis.

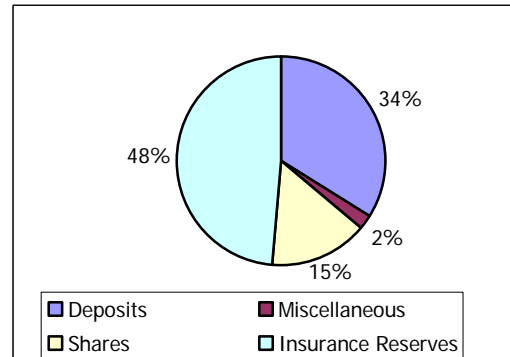
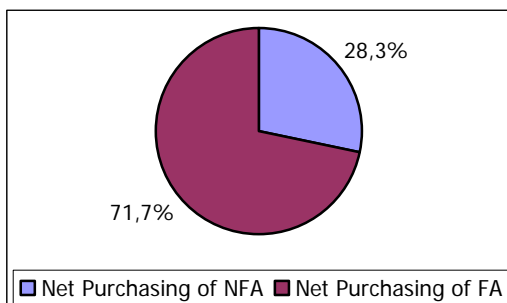
Savings and Wealth:

In a general scenario of excess savings in the economy from emerging nations and with significant consequences in relation to the historically low nominal and real interest rates, an excessively flat interest rate curve and low inflation rates, the savings rate in the Euro-zone has dropped by 2.5 points since 1995, but still maintains a much higher rate than in the United States. Savings represent 20.1% of GDP (2005) and in the individual case of households, 14.7% of gross disposable income (2004).

Considering the savings that households have made overall throughout the period dating from 1999 to 2004, most were invested in financial assets (71.7%) rather than non-financial assets (28.3%).

The most popular financial assets among households are technical insurance reserves (48%) and deposits (34%). The latter have recorded the most vigorous growth in recent years together with non share financial assets.

Figure 8: Structure of Household Savings: Financial and Non Financial Assets; Structure of Savings in Financial Assets

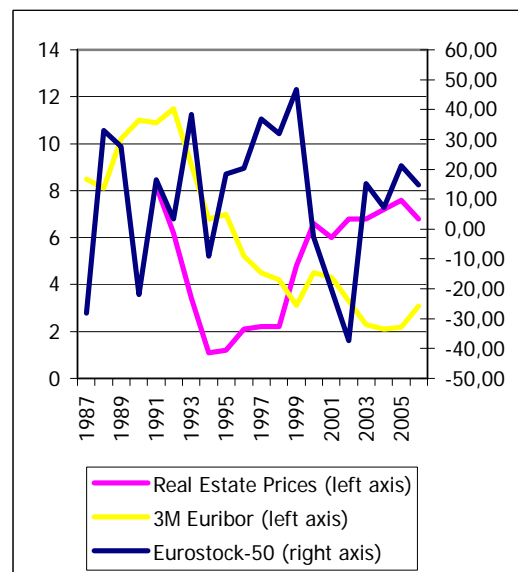


Source: ECB

On investing savings in assets over recent years, their price has accumulated increases. Real estate prices have risen by 66.4% and shares by 22.8% (Eurostock-50).

The relationship between the euribor and real estate prices is negative and highly correlated (-0.80); that is, decreases in the money rate result in further rises in real estate prices and vice-versa.

Figure 9: Real Estate Prices, Eurostock-50 and 3M Euribor (%)



Source: ECB and Reuters

The change in household wealth, caused by the increase in real estate and share prices, has a positive but

very small effect on private consumption in the Euro-zone – wealth effect.

In theory, the wealth effect entails a feeling of being wealthier or poorer as a result of an increase or decrease in propensity to consume. Notwithstanding, it is possible that for those considering buying a house, an increase in housing prices means a decrease in their present consumption in order to be able to meet higher payments. As a result, the strength of the wealth effect is uncertain.¹¹

Moreover, consumers (particularly in the Netherlands) are increasingly using the upturn in the price of real estate assets, as is the case in the United States, to borrow more money –second mortgage – in order to raise the level of consumption, as consumption loans are more expensive than mortgage loans. Obviously, the effect on private consumption will depend on how the financial system works.

Table 2: Housing Prices -.Accumulative Increase and Last Year

	1997-2006	2005-2006
Germany	-1,00%	-0,8%
Belgium	118,00%	11,8%
France	127,00%	12,5%
Spain	173,00%	10,8%
The Netherlands	97,00%	6,2%
Ireland	252,00%	14,2%
Italy	88,00%	6,6%

Source: The Economist

Household Borrowing and Housing:

Loans granted to households in the Euro-zone represent 23.8% of total

loans, which is a three-point increase in share with respect to 2001. The increase in household loans accelerated over the period 2002-2006, recording increases of 9.4% and 8.2% in 2005 and 2006 respectively. Most household loans were for buying a house (70.9%). Mortgage loans have risen on average by an annual 9.4%.

Household borrowing accounts for 23.1% of total debt in the Euro-zone. Over the 1999-2004 period (one quarter), this share has increase by nearly four percentage points.

The household debt burden measured as the outstanding amount of debt in relation to gross disposable income has also risen strongly since 1996, from 60.1% to approximately 90% in 2006. Euro-zone households' share of debt, however, is considerably less than in the United States (130%) and the United Kingdom (160%).

Households mainly resort to bank loans as a source of financing (85%). In some countries such as the Netherlands, Austria and Belgium, more than 25% of loans are granted by insurance companies.¹²

Finally, mortgage loan characteristics vary depending on the Euro-zone country. In Spain and Italy, mortgages mainly have variable interest rates (95% and 85% respectively), while in Germany and France mortgage interest rates are generally fixed (85% and 65% respectively).

Valencia, March 28 2007
Nicolás Jannone

¹¹ WP 279 "House Prices and Economic Activity". N. Girouard and S. Blöndal. OECD. Economic Department.

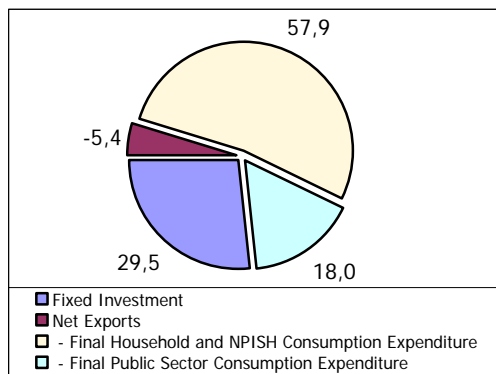
¹² "El endeudamiento de los hogares españoles." Ana del Río. Working Paper 0228 at Servicio de Estudios, Banco de España.

3.-Spain

Private Consumption and GDP

Final consumption represents approximately 76% of GDP (Figure 1). Private consumption (households and Non-Profit Institutions Serving All Households – hereafter referred to as NPISH) accounts for more than three quarters of final consumption. As a result, household consumption is a vital element in overall GDP growth in Spain.

Figure 1: Percentage Structure of GDP (mp) and Demand Components in 2005



Source: own elaboration with data from INE and Banco de España

Apart from consumption expenditure, household spending also includes residential investment.¹³ This monograph is going to analyse the main determinants of household spending in the long term, paying particular attention to their consumption decisions.

Table 1: Final Household Consumption Expenditure by Market Sector

	2000	2005
Food	14.3	14.1
Alcoholic Beverages and Tobacco	3.0	2.9
Clothing and Footwear	6.2	5.5
Utilities and housing	15.3	16.2
Household Items	5.8	5.2
Health	3.3	3.5
Transport	12.4	11.6
Communications	2.4	2.6
Culture and Recreation	9.1	9.1
Education	1.6	1.5
Hotels and Restaurant	18.1	18.9
Miscellaneous	8.6	8.9
Total FHCE (in Spain)	100	100
(at current prices)	(397,750)	(544,459)

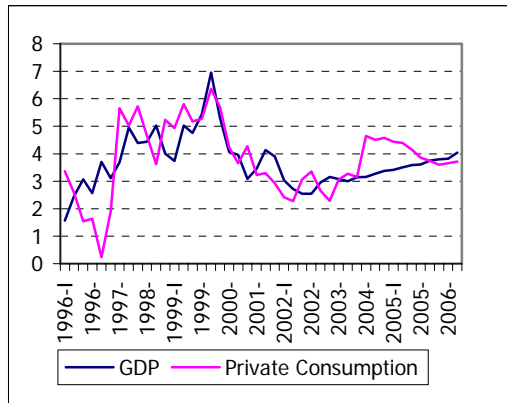
Source: own elaboration with data from INE

Table shows the structure of final household consumption expenditure. The most and increasingly important groups of items are hotels and restaurants and utilities and housing (house, water electricity and other fuels), while food, beverages and tobacco, clothing and footwear and household items (furniture, textile products and electrical appliances, etc) are becoming less important.

Figure 2 shows how private consumption has played a vital role in upholding the current growth cycle in Spain since 1997, as well as in the upturn in economic activity over the past three years.

¹³ Investment also includes private productive investment undertaken by businesses and public sector investment

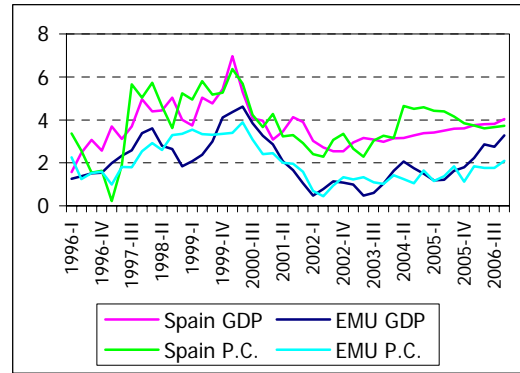
Figure 2: GDP and Private Consumption Annual Growth Rates (seasonally adjusted data)



Source: own elaboration with data from INE and Banco de España

Figure 3 once again underlines the enormous importance of private consumption in the aggregate output of various countries. Since 2001, private consumption in Spain has increased at a considerably higher rate than in the EMU as a whole and is largely responsible for both the growth gap in recent years, the minimal impact that the slump at the beginning of the current decade had on the Spanish economy and even the firm upturn since 1993 during which time Spain has chalked up 13 consecutive years of remarkable growth. As indicated in the report on households in November 2004, the slump in household consumption dragged GDP down with it in the recession in 1992/93. During the current period of growth, private consumption has grown, generally, at a rate of close to 3%. Meanwhile, the slowdown in private consumption in the Euro-zone cut back GDP from the beginning of 2000.

Figure 3: GDP and Private Consumption Annual Growth Rates in Spain and the EMU (seasonally adjusted data)



Source: own elaboration with data from INE and Banco de España

For all the reasons described above, it is worth analysing the determinants of growth in household consumption in more detail.

Household Spending Determinants

Long term household spending determinants include the following:

- Disposable income (real wages, labour market developments)
- Consumer confidence
- Household wealth
- Real interest rates

a) Disposable Income

Household disposable income has a positive effect on household consumption, providing it is channelled to consumption or saving.

Table 2: Net Disposable Income for Households and NPISH (net HDI) in 2000 and 2005

	2000		2005	
	€Mn	%	€Mn	%
RESOURCES				
Net HDI	397,958		543,953	
Pension Plan				
Adjustments	1,445		893	
Total resources	399,403		544,846	
USES				
Final Consumption	375,999	94.1	524,065	96.2
Net Savings	23,404	5.9	20,781	3.8
Total uses	399,403		544,846	

Source: own elaboration with data from INE

As can be appreciated in Table 2, the best part of household income is used for consumption in the present, while a small proportion is saved. Furthermore, the information contained in this table suggests a certain trend towards an upturn in consumption propensity.¹⁴ Now that we have indicated the strong correlation between income and consumption, the next step should be to examine what the main components of household disposable income are in more detail. Table 3 presents the sources of household income according Spanish National Accounts elaborated by INE.

¹⁴ 2005 data must be taken cautiously, as they are only estimates of the National Accounts. However, preliminary data for 2004 also indicates a slight increase in consumption propensity.

Table 3: Net Household Disposable Income Components in 2000 and 2005

	2000		2005	
	€Mn	%	€Mn	%
Wages	312020	58.6	425592	57.9
Capital Gains	28293	5.3	33215	4.5
NOS/mixed income	100771	18.9	152035	20.7
Social benefits	83241	15.6	115991	15.8
Other current transfers	7823	1.5	8659	1.2
Total resources	532148		735492	
Social security contributions	90251		128623	
Income and property tax	43939		62916	
Total uses	134190		191539	
Total net HDI	397958		543953	

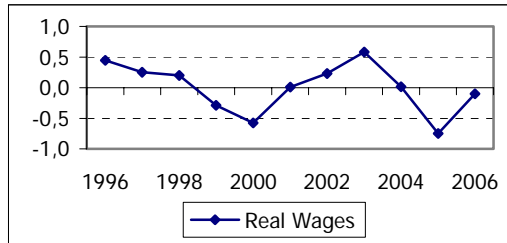
Source: own elaboration with data from INE

Approximately 58% of income comes from wages, although this percentage has dropped slightly in recent years.¹⁵ Capital gains (interest, property income, dividends...) have also become less important in relative terms. In contrast, the Net Operating Surplus (NOS in the table above) and mixed income have witnessed a significant increase in their share of total resources. Finally, social benefits and other current transfers jointly contributed 17% to 17.1% to total resources. As regards uses, two thirds are accounted for by social security contributions and the remaining third by direct taxation.

Therefore, disposable income is mainly determined by wages. The primary elements that affect disposable income include wage and labour market developments.

¹⁵ In line with the relative decrease as a percentage of GDP at factor cost, in favour of the net operating surplus, as pointed out in the November 2006 report.

Figure 4: Real Wages (gap between annual wage growth and the annual inflation rate - annual averages)



Source: own elaboration with data from Banco de España

In the first place, nominal wage growth was similar to inflation over the period dating from 1996 to 2006 (see Figure 4). However, real wages display a downward trend. In this sense, real household income either remained unchanged or even decreased. But throughout this period, private consumption grew on average by an annual 3.5% to 4%. The answer to this apparent contradiction between frozen wage income per worker and strong growth in private consumption is a highly dynamic labour market, undoubtedly benefiting from slow wage growth itself (among other factors).

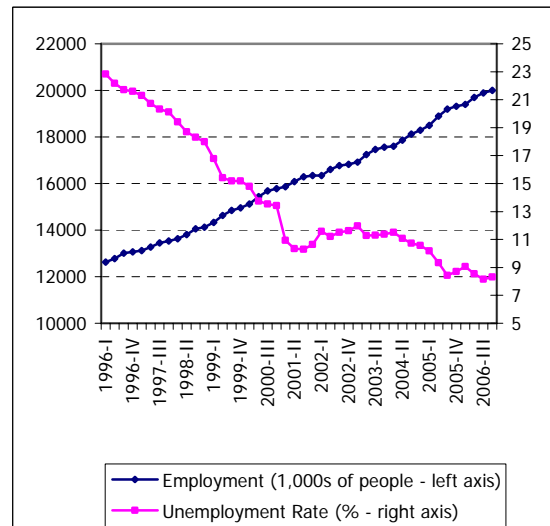
In the second place, the labour market in Spain has enjoyed remarkable growth, becoming the main driving force behind private consumption and, hence, the economy. Figure 5 displays the extraordinary and sustained growth in employment, together with a considerable decrease in the unemployment rate to all-time lows in a context in which the labour force is growing faster and faster as a result of immigrants arriving and women joining the labour market. The number of people in employment according to the LFS has risen by more than seven million since the beginning of 1996.

Figure 6 further emphasizes the previous idea of the strong dynamism

in the labour market and also provides complementary information in order to assess the effect of developments in the labour market on household consumption.

On the one hand, the number of people unemployed has dropped most significantly among the spouses of the head of the family and was even more significant among other possibly potential income earners. Household income is therefore expected to have increased over these years, not because each individual is being paid more (in real terms), but because there are more income earners in the family unit. As a result, we would expect an upturn in consumption.

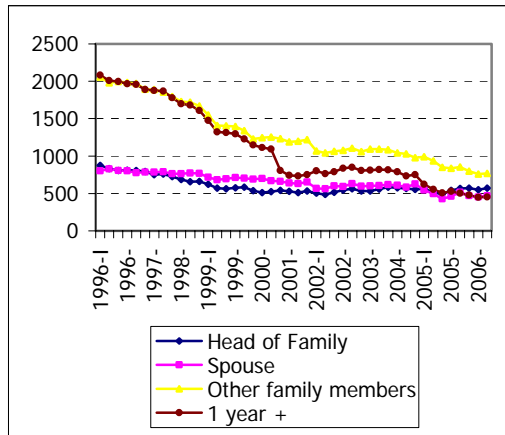
Figure 5: Employment and Unemployment Rate, LFS



Source: own elaboration with data from INE

Furthermore, another important issue that Figure 6 highlights is the decrease in the risk of remaining unemployed for a long period of time, as the number of long term unemployed in Spain has dropped drastically over this period. This will probably improve people's outlook, thus boosting consumption.

Figure 6: Other Labour Market Indicators, LFS (1,000s of people)



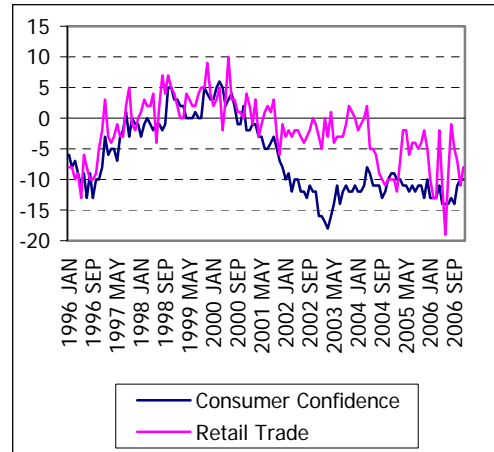
Source: own elaboration with data from INE

b) Consumer Confidence

As indicated above, consumer confidence also affects their decision making. Figure 6 indicates a clear improvement in consumers' outlook for the labour market, at least regarding the probability of getting a job or recovering if it had been lost (without taking into account the quality of such jobs, in terms of stability and training/post suitability).

Figure 7 provides information on the outlook for consumption based on consumer confidence surveys. When Figure 7 is compared to the growth in private consumption (Figure 2), we can see how confidence indicators reflect the upturn in private consumption and economic growth in the second half of the 1990s quite accurately. However, the consumer confidence indicator collapsed over the period from 2000 to the beginning of 2003, only recovering slightly in recent months. This contrasts with strong private consumption that has grown at an annual average rate of around 3.7% over the period dating from 2000-2006.

Figure 7: Consumer Confidence and Retail Trade Indicators (Net % of affirmative and negative responses)

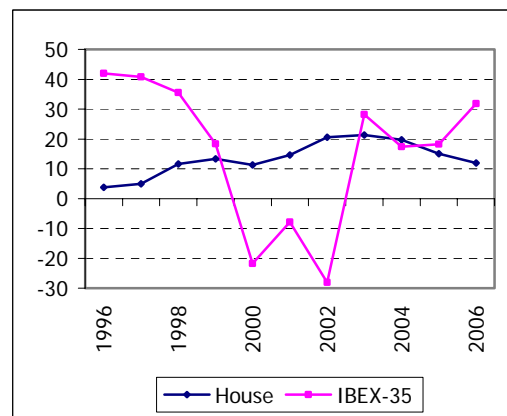


Source: own elaboration with data from Banco de España

c) Household Wealth

As mentioned previously, the level and growth in household wealth can also affect consumer decision making. As household wealth gains value, permanent income increases thus pushing up consumption propensity. Household wealth is made up of real assets (mainly houses, although property and facilities are also included) and financial assets.

Figure 8: Annual Yield of Housing (rent plus change in price) and Alternative Investments (IBEX-35)

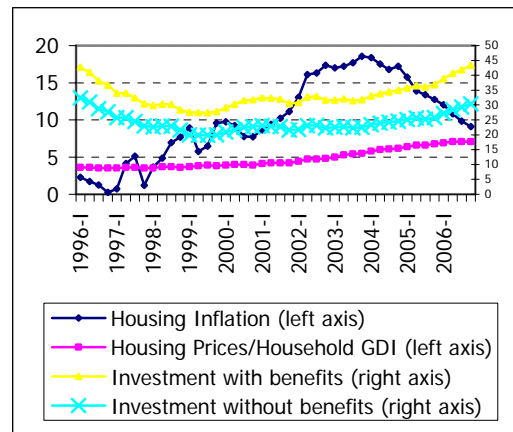


Source: own elaboration with data from Banco de España

Figure 8 shows how housing in Spain has been a highly profitable and secure investment over the period under study. Despite the slowdown in recent years, capital gains of more than 10% per annum are still being recorded and the year-on-year price of a house has dropped by slightly less than 10% over the second half of 2006 (see Figure 9). As regards financial assets, a great deal of volatility can be observed over the period, despite the IBEX 35 averaging a rise of 15.9%. The economic crisis in 2000, which had a much more marked effect on other Euro-zone countries than Spain, did however have a clear impact on the Spanish stock market. Nevertheless, it is worth highlighting that over the rest of the period, the financial assets listed on the IBEX 35 were remarkably profitable. In contrast, bearing in mind the historically low interest rates in force, less risky financial assets have offered very low yields in recent years and have not really been an alternative to real estate investment.

One significant aspect is that the stock market crisis at the beginning of the 21st century and the final sprint in housing prices coincided (see Figures 8 and 9), which more than likely helped to increase people's preference for much less risky real assets instead of financial assets. This situation was also favoured by low interest rates and large tax benefits for buying a new house (see Figure 9).

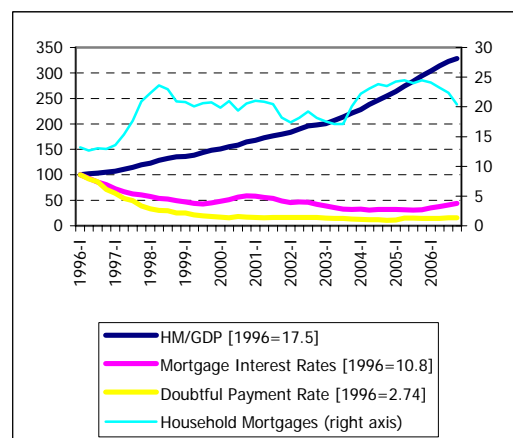
Figure 9: Annual Housing Inflation Rate and Tax Benefits (%)



Source: own elaboration with data from Banco de España

The only risk stemming from this scenario is that most of the mortgages were granted at variable interest rates. However, in the first half of this decade, interest rates continued to drop and the doubtful payment ratio reached historically low figures (see Figure 10). As a result, mortgages have risen uninterruptedly, trebling the proportion of such loans as a percentage of GDP beyond 57.4%.

Figure 10: Annual Mortgage Growth, HM/GDP Index, Mortgage Interest Rates and Doubtful Payment Rate



Source: own elaboration with data from Banco de España. Note: HM: Household Mortgages

The strong rise in household wealth (both financial and particularly real estate wealth) seems to have contributed to the high and stable growth rate witnessed by household consumption, particularly over the last two years when monetary conditions turned less expansive, a move that affected mortgages with variable interest rates (that is, more than 90% of the total), while also pushing up household borrowing to significant heights.

d) Real Interest Rates

Real interest rates are a determinant of long term expenditure. Between 1996 and the beginning of 2006, real interest rates display a downward trend. Furthermore, real interest rates have remained below 1% since March 1999 and were even negative over a great deal of this period. Bearing this in mind, households increasingly resorted to borrowing in order to finance other investments offering higher yields, such as real estate investment and even short term consumption. As a result, low real interest rates in Spain have also boosted household expenditure.

Notwithstanding, as interest rates go up and inflation and housing prices moderate, this situation can be expected to revert. Moreover, higher interest rates also raises the servicing of past debt, thus negatively affecting consumption.

Figure 11: Real Interest Rates (reference rate minus inflation rate)



Source: own elaboration with data from the ECB

Summary: Will Private Consumption Remain Buoyant?

In order to tackle this question, it is worth briefly reviewing the main driving forces behind private consumption in recent years.

In the first place, regarding disposable income, the consumption received the largest boost from a strong labour market due to new income being created and the favourable effect this had on worker confidence. Real wages do not seem to have played a significant role over this period.

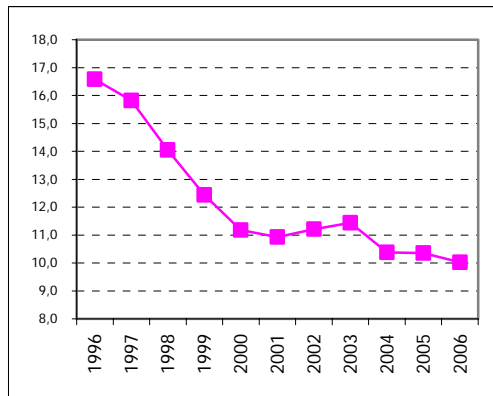
In the second place, the strong revaluation of both share and real estate assets (and the low risk the latter entail) has fuelled consumption while also probably curbing the adverse effects of increasing household borrowing.

In the third place, the extraordinarily low real interest rates (even negative over the first five years of the 21st century), boosted consumer spending.

The main consequence of the situation described above is the decrease in Spain's savings rate (Table 2 and Figure 12) and the growing overall debt (Figure 13), both mortgage and current consumption loans. As a result, total household borrowing approaches 85%

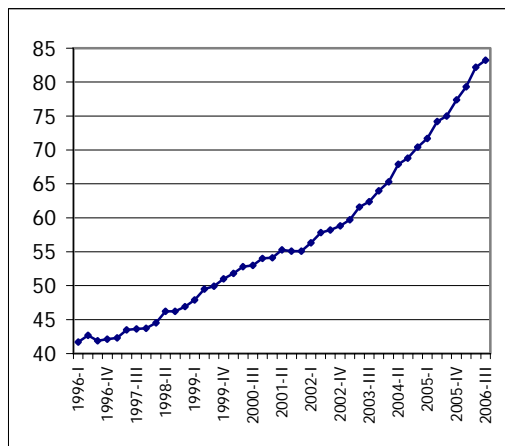
of GDP, higher than the level observed in Euro-zone countries.

Figure 12: Gross Household Savings Rate (% of Household Disposable Income)



Source: own elaboration with data from the OECD - Economic Outlook 80 database

Figure 13: Household Borrowing and NPISH (% of GDP)



Source: own elaboration with data from Banco de España

The outlook in the short to medium term is for a steady slowdown in the wealth revaluation rate, particularly that related to real estate. Parallel to this, we expect reference interest rates to rise (by around 50bp in 2007) as a result of monetary policy becoming progressively tougher. In addition to this, as higher nominal interest rates combine with more moderate inflation, real interest rates will also increase. In a country deep in debt, most of which

is subject to variable interest rates, private consumption can be expected to slow down to a certain extent in 2007.

The main factor in Spain that could help to maintain consumption buoyant with identical economic growth is for the labour market to remain strong, creating 500,000 new jobs a year (full-time equivalent). On the other hand, if the recovery in other Euro-zone countries in a different situation to Spain is confirmed the ECB may not raise interest rates much more, thus reducing the impact of tougher monetary policy on Spanish households.

Silviano Esteve
23rd of March 2007

4. France & Germany

Average Propensity to Consume and Savings Rate

We are going to begin our analysis of household economies by examining how important private consumption is in terms of GDP. That is, our analysis will initially focus on the value of the average propensity to consume. Generally speaking, the average propensity to consume ranges from 60% to 70% of GDP, depending on the country. In the case of Germany, as can be appreciated in the table below, the average propensity to consume is quite low, although it has risen slightly in the last few years of the sample period. In any case, these figures confirm that one of the basic characteristics of the German economy is a low value in this variable.

A face-value analysis would link this variable to how developed a country is. In this sense, the average propensity to consume would tend to be lower in the most developed countries. This perspective links the high level of development in Germany to the low average value of propensity to consume. In any case, this type of analysis is not very rigorous, as in the case of the United States, with a propensity to consume approaching 70% suggests quite the opposite.

Table 1: GDP Shares in Germany

	2001	2002	2003	2004	2005	2006
P.C.	0.56	0.55	0.55	0.59	0.59	0.58
G.S.	0.19	0.20	0.20	0.19	0.19	0.18
F.I.	0.21	0.20	0.20	0.17	0.17	0.18
F.T.	0.03	0.03	0.05	0.05	0.05	0.05

Source: DESTATIS. Provisional data

P.C. = Private Consumption
G.S. = Government Spending
F.I. = Fixed Investment
F.T. = Foreign Trade

As regards the French economy, the average propensity to consume is also very low, even more so than in Germany. Furthermore, there appears to be a faint upward trend from the beginning to the end of the period. The fact that the French economy also has a low propensity to consume appears to reinforce the theory that we are dealing with a highly developed country in which the high average level of income damages consumption and encourages saving.

Table 2: GDP Shares in France

	2000	2001	2002	2003	2004	2005
P.C.	0.54	0.55	0.55	0.55	0.55	0.56
G.S.	0.23	0.23	0.23	0.24	0.24	0.24
F.I.	0.19	0.19	0.19	0.19	0.19	0.20
F.T.	0.01	0.01	0.01	0.02	0.00	-0.01

Source: INSEE.

The consequence of trend we have observed in private consumption is, logically, high savings rates. Therefore, as can be appreciated in the table below, French and German savings rates are remarkably higher than in the United States, which, as is well known, has very low savings rates which a tending markedly downwards. As a result, the French and German savings rates in 2004 were 11.8 and 10.5 respectively, while the US savings rate stood at a meagre 1.8. The high savings rates in France and Germany appears to confirm the theory that we are dealing with two countries with a high level of development that favours saving.

In any case, the data below does make it possible to draw some further conclusions. It is striking that the German savings rate was considerably higher than the French up to 1992, when the situation was inverted and the French rate overtook the German rate. This occurred as a result of an

overall upward trend in the French savings rate throughout the period and a downward trend in the case of Germany. While nothing clearly indicates this, the reunification of Germany in 1991 may have had an influence on this trend. Note that the savings rate for West Germany must have been, at the time of the reunification, much higher than in East Germany, so the reunification must have reduced the overall savings rate as can be clearly appreciated in the data. Therefore, the overall savings rate in Germany must be the average of a much higher rate than in France in West Germany, and a lower rate in East Germany. In any case, the greatest difference between the French and German overall savings rates occurred at the end of the 1990s, since when both have tended to converge thanks to an increase in the German rate.

Table 3: Net Savings Rates

	France	Germany	USA
1986	8.1	12.8	8.2
1987	6.4	12.9	7.0
1988	8.0	13.2	7.3
1989	8.3	12.7	7.1
1990	9.3	13.9	7.0
1991	10.8	12.9	7.3
1992	11.7	12.7	7.7
1993	12.9	12.1	5.8
1994	11.7	11.4	4.8
1995	12.7	11.0	4.6
1996	11.2	10.5	4.0
1997	12.2	10.1	3.6
1998	11.9	10.1	4.3
1999	11.5	9.5	2.4
2000	11.4	9.2	2.3
2001	12.2	9.4	1.8
2002	13.3	9.9	2.4
2003	12.4	10.3	2.1
2004	11.8	10.5	1.8

Source: OECD

6.2. Population Structure

When analysing the economic behaviour of the population, i.e. the consumption and savings trends,

examining the age structure of the population is essential, in light of how important it is when analysing all life cycle issues.

The table below displays this structure by age groups for the German population and on analysing it we can see that the main characteristic that stands out is that the German population is aged, as cohorts aged 45 or over represent 45% of the total population. Moreover, the trend evidences that the German population is ageing further. Initially, an increase in the average age of the population should coincide with an increase in consumption and a decrease in savings rates, according to the life cycle model. The problem is that this is one of the implications that has been most rejected by data in practically all developed nations, which leads one to believe that the ageing process in the German population could possibly be followed by a subsequent increase in the savings rate. In any case, this possible increase in the savings rate would not be enough to avoid the crisis in the social welfare state as a result of this ageing process.

Finally, the marital structure of the population is also indicative of a modern society in which married couples are a minority. One final figure of interest is that in 2005, the legal foreign population represented 8.84% of the total, which indicates that Germany is a multicultural society open to external influence.

Table 4: Age and Marital Structure of the German Population

	2001	2002	2003	2004	2005
By age group:					
Under 6	0.06	0.06	0.05	0.05	0.05
6-15	0.10	0.09	0.09	0.09	0.09
15-25	0.11	0.12	0.12	0.12	0.12
25-45	0.30	0.30	0.30	0.29	0.29
45-65	0.26	0.26	0.26	0.26	0.26
Over 65	0.17	0.17	0.18	0.19	0.19
By marital status:					
Single	0.40	0.41	0.41	0.41	0.41
Married	0.46	0.46	0.45	0.45	0.44
Divorced/ separated	0.14	0.14	0.14	0.14	0.14

Source: DESTATIS.

The age structure of the French population is very similar to that in Germany. That is, the French population is also aged and the average age displays a clearly upward trend. In fact, this ageing process can be clearly observed over the sample period of only seven years. In this case, the observations that can be made are similar to the comments on the German population: the possible increase in the savings rate will not be enough to offset the crisis in the social welfare state.

Table 5: Population by Age Group in France

	2000	2006	2007p
By age group:			
Under 20	25.6	24.8	24.7
20-59	53.8	54.3	54.0
Over 60	20.6	20.9	21.3
Over 75	7.2	8.2	8.4
	2000	2005	2006p
Divorced/ Separated			
Men	5.7	6.5	6.9
Women	7.2	8.1	8.4

Source: INSEE

Finally, in 1999 the legal foreign population in France represented 5.6% of the total population, which while not being a small number of people, is not as large a proportion of the total population as in other EMU countries.

6.3. Household Typology

The German society is also seen to be modern when examining household structure. As can be appreciated in the table below, the best part of German households have one or two members. The trend towards reducing the average size of the household is characteristic in advanced countries, but at the same time, this gives rise to societies that are less inclined to consume.

Table 6: German Household Structure

	2000	2001	2002	2003	2004	2005
1	0.36	0.37	0.37	0.37	0.37	0.38
2	0.33	0.34	0.34	0.34	0.34	0.34
3	0.15	0.14	0.14	0.14	0.14	0.14
4	0.12	0.11	0.11	0.11	0.11	0.11
5+	0.04	0.04	0.04	0.04	0.04	0.04

Source: DESTATIS.

The structure of French households also displays the characteristics of a modern society, as in the case of Germany, albeit to a much lesser extent, as can be appreciated in the data in the table below. The mode of French household distribution is in a three-member family, which was not the case in Germany. As mentioned above in the case of Germany, household structure affects household expenditure and savings, making this an important variable when it comes to assessing consumption and/or savings in a given country.

Table 7: French Household Structure

	1990	1999	2003
1 member	0.27	0.31	0.29
Single parent	0.07	0.07	0.07
2 members	0.24	0.25	0.28
3 members	0.36	0.31	0.32
4 or more members	0.06	0.05	0.03

Source: INSEE

Wealth and Borrowing

Two last variables that are useful when studying German households are wealth and borrowing. The table below

provides the trends observed in these variables. Net financial wealth is slightly greater than GDP and displays a faintly upward trend throughout the years of the sample. This trend is due to the increase in financial assets while financial liabilities have remained constant or decreased. Basically, the trend in liabilities can be explained by the increase in loans, most of which are long term. According to the data, Germany's debt ratio has remained constant throughout the period. This was to be expected in a country where housing prices have not risen as is the case, for example, in Spain or the United States. Non financial wealth in terms of GDP has remained constant throughout the period, while an increase is observed in wealth in the form of consumer durable goods.

Table 8: German Household Wealth and Borrowing

	2001	2002	2003	2004
Fin Wealth	1.04	1.00	1.09	1.13
Fin. Assets	1.76	1.72	1.82	1.84
Fin. Liabilities	0.72	0.72	0.72	0.71
Loans	0.72	0.72	0.72	0.71
LT Loans	0.67	0.67	0.67	0.66
Non Fin Wealth	0.22	0.22	0.22	
Cons. Durables	0.04	0.05	0.05	

Source: OECD

Note: Figures are fractions of GDP

Non Fin Wealth: Non financial assets*100

Cons. Durables: Consumer Durable Goods*100

In the case of the French economy, net financial wealth displays a clear upward trend throughout the period, rising from a ratio of 1.18 to 1.28. This increase is the result of an upturn in financial assets that outpaced financial liabilities, which, in contrast to the German case, also rose over this period. The increase in financial liabilities is entirely due to the increase in loans, most of which are long term. These figures therefore indicate an increase in the debt ratio in France over the years under study.

As regards non financial wealth, and in contrast to the situation in Germany, a significant increase has been witnessed. This increase is also visible in items for which data is available, such as housing and property wealth.

Table 9: French Household Wealth and Borrowing

	2001	2002	2003	2004	2005
FinW	1.18	1.16	1.20	1.20	1.28
FinA	1.67	1.64	1.70	1.72	1.84
FinL	0.49	0.48	0.50	0.52	0.56
Loans	0.37	0.38	0.39	0.41	0.44
LT Loans	0.35	0.36	0.37	0.39	0.42
NonFinW	2.26	2.45	2.72	3.08	3.45
Housing	1.30	1.32	1.36	1.39	1.46
Property	0.75	0.92	1.14	1.47	1.78

Source: OECD

Note: Figures are a fraction of GDP

FinW: net financial wealth

FinA: financial assets

FinL: financial liabilities

NonFinW: non financial assets

Antonio Cutanda
Valencia, March 20 2007

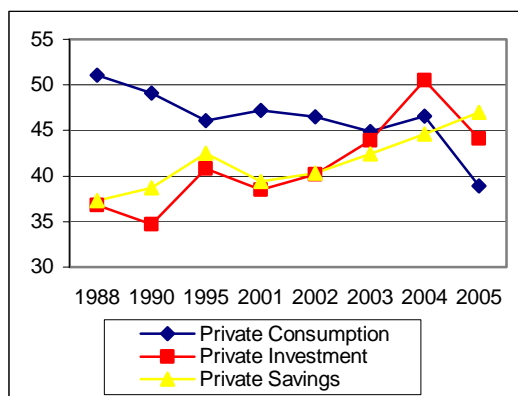
5. - China

One of the main objectives of the 11th Five-Year Plan is to rebalance the economy. As mentioned in previous reports, the spectacular growth in recent years has been based not only on foreign trade, but also on private investment. Investment has been mainly boosted by the high level of household saving, which is at the same time due to:

- 1) Prevention: in view of health care, education and employment precariousness
- 2) Underdeveloped financial markets

A higher rate of savings works to the detriment of household consumption. Consumption as a percentage of GDP has dropped from 50% to 39% (see Figure 1 below).

Figure 1: Private Consumption, Savings and Investment



Source: Asian Development Bank

Income

Shanghai and Beijing were ranked 59th and 65th respectively in the world in terms of wages according to a study carried out by Swiss bank UBS. The same study also ranked the two Chinese cities 58th and 65th in terms of purchasing power. UBS says that

despite the rapid economic growth in China, the cost of living in Shanghai and Beijing remains relatively low due to the fact that the yuan has been able to resist upward pressure.

Net income per capita reveals a large difference between the urban and rural population. Net income in rural areas amounted to 3,587 yuan in 2006, up by 7.4% with respect to the previous year, while city dweller income totalled 11,759 yuan, a 10.4% rise. This has pushed up income tax collection by 17.1% with respect to 2005.

There is still an enormous gap between the rich and the poor in China. The richest 10% of households own more than 40% of private goods while the poorest 10% share less than 2% of the country's wealth. More specifically, the Gini Index, considered the primary measurement of income inequality, has reached 0.4996 (1 is the maximum level of inequality), a figure that according to sociologists already entails the risk of social conflicts.

Consumption and Saving

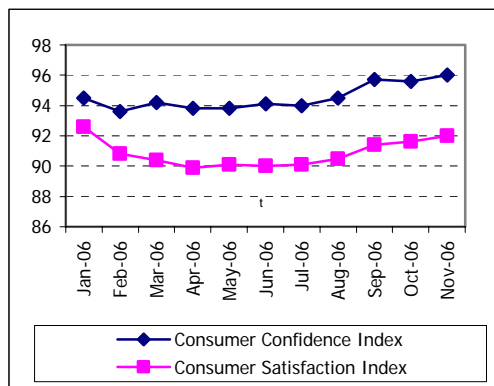
The Chinese spend very little on cultural products, barely a quarter of the amount spent by other countries with a similar level of development. In contrast, the Chinese are buying increasingly more sports articles as a result of the growth in the popularity of sports as a result of Beijing being the host of the next Olympic Games (2008).

High income earners in China are changing their consumption habits. They are beginning to handle currency accounts, credit cards, they are playing golf, travelling, buying houses and eating out.

Furthermore, trends are changing as a result of the so-called “single person’s economy”, caused by the single marital situation of the middle class¹⁶. One survey revealed that 30.3% of single women considered buying a house a priority and 30% spent most of their income on clothes and cosmetics. Other customs have created the “sharing” phenomenon, involving people who share expenses such as housing and transport, due to the high cost and pressure of the current life style. Generally speaking, this phenomenon affects university students and young office workers.

An upward trend is observed in both consumer confidence and satisfaction since halfway through 2006.

Figure 2: Consumer Confidence



Source: National Bureau of Statistics of China

However, savings remain high due to the lack of public aid in health, housing and education. Domestic consumption in 2006 represented only 37% of GDP (compared to 70% in the USA). Personal savings in bank accounts amounted to a record 1.7 billion dollars.

In order to solve this situation, the State Council passed a five-year plan

¹⁶ At the beginning of the 21st century, there were more than one million single people in Shanghai

for the development of China’s public health system. More specifically, a basic medical network for all residents in cities and rural areas is planned for 2010. The key question, as we saw in the OCEI November 2006 report, is who is considered a resident when it comes to the basic rights to health, education, housing...?

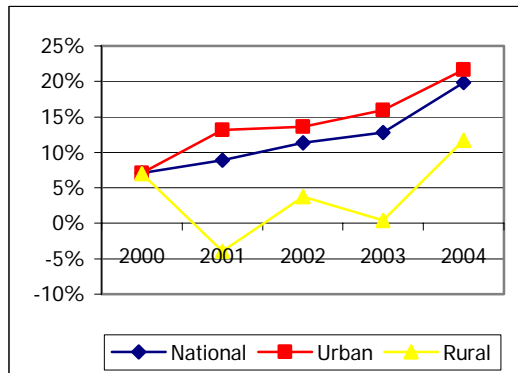
Real Estate and Financial Wealth

China has not been exempt from the issue of real estate speculation. In 1998, the government proposed the construction of three types of house depending on people’s income: residential dwellings for the upper class, lower priced houses for the middle class and flats to be rented by workers with low wages. However, the real situation is quite different. The lack of houses at a reasonable price has brought about widespread protests. Property developers have taken advantage of the preferential treatment they had been dispensed to build luxury houses that most Chinese people cannot afford.

This resulted in the Ministries of Construction and Land and Resources creating a joint plan to reduce the illegal occupation of land, the illegal transfer of projects and speculation in land use. These steps were aimed at guaranteeing a sufficient supply of housing.

Real estate investment has risen markedly in recent years (Figure 3). In 2006, real estate operations totalled 9 billion dollars, of which 60% were undertaken by foreigners. Even still, the Chinese government has taken steps to restrict the purchase of real estate by foreigners, but without much success.

Figure 3: Residential Investment



Source: National Bureau Statistics

However, the government recently reported that illegal land use practices were continuing. The percentage of land set aside for building projects in cities that has been bought irregularly range from 60% to 90% depending on the city. The central government has called on local authorities to investigate such irregularities, in order to control the real estate sector and curb soaring prices, under the threat of withdrawing their powers in land reclassification and sale.

The measures passed at the end of last year and in force for this five-year period are:

- 70% of construction will go towards building flats smaller than 90m²
- Between 20% and 30% of the price of flats must be paid in cash
- Tax penalties have been imposed on those who sell flats in which they have not lived for more than five years since the date of purchase.

The average price of houses built in Chinese cities rose by an annual 6.1% in January 2007. This upward trend in prices is related to a large number of adults who generate an enormous demand in the sector. The Chinese government has taken a series of steps

to control real estate prices, including an increase in the tax levied on urban land use and the reestablishment of taxes on raw material developers.

However, from 2015 onwards an abrupt change is expected to take place, because the number of middle-aged people who will be looking for a house for their families will decrease, following the application of the family planning policy.

M^a Luisa Martí Selva

Rosa Puertas Medina

Valencia, March 26 2007

6. - Mexico

Consumption and Savings

While private consumption represented 62% of final demand in 1990, in 2005 this figure had dropped to 52%. However, private consumption has become a loyal ally of growth this year.

When foreign trade, which is highly dependent on developments in US industry, shows signs of weakness, the only thing Mexico can do is back its domestic sector.

Domestic consumption has been satisfactory over the past three years, recording annual growth rates of between 4% and 5%. However, the question that is worth asking is what is behind this growth.

The latest figure released by the *Asociación Nacional de Tiendas de Autoservicio y Departamentales* (ANTAD)¹⁷ indicates that the real increase in sales with respect to the same month the previous year, taking all shops into account (including those recently opened) was 6.9%. We must also remember that January 2007 had one Sunday less than January 2006.

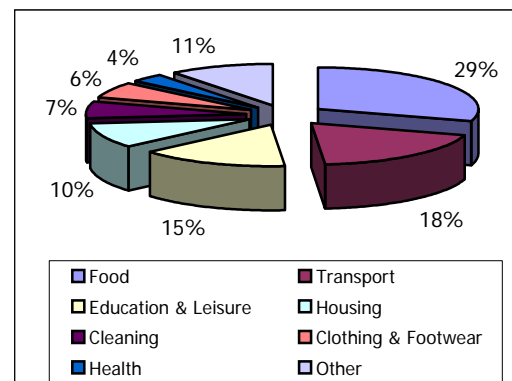
The reason for the growth in domestic consumption could lie in real wage increases, a higher level of employment, lower real interest rates or a larger number of loans. For this reason, it is interesting to analyse how each of these important domestic economic variables has performed.

It is also useful to indicate what Mexican households spend their money on. According to the *Encuesta Nacional de Ingreso Gasto de los Hogares* (National Survey of Household Income

and Expenditure in English) for 2005, almost a third of total expenditure, as can be appreciated in Figure 6 goes towards food.

If we add food and transport spending together, they account for practically half of total expenditure. Education and recreation, with 14.8% and housing with 9.8% also figure prominently.

Figure 6: Distribution of Mexican Household Spending



Source: own elaboration with data from INEGI

No Significant Changes in Real Wages

In Mexico, developments in the minimum wage set the scene for wage fixing in practically all sectors of the economy.

This important reference point has not risen significantly. For example, if we take the minimum wage approved by the *Comisión Nacional de los Salarios Mínimos (CNSM)*¹⁸, nominal increases of 3.9% were observed in both 2005 and 2006. The minimum wage for 2007 has risen by 3%.

¹⁷ National Association of Self Service Shops and Department Stores in English

¹⁸ National Commission of Minimum Wages in English

Table 3: Minimum Wage in Mexico by Region 2004-2007 (in Pesos)

Year	A	B	C	Average
2004	45.24	43.73	42.11	43.69
2005	46.80	45.35	44.05	45.40
2006	48.67	47.16	45.81	47.21
2007	50.57	49.00	47.60	49.05

Source: own elaboration with data from CNSM

Comparing wage increases against inflation data, prices recorded rises of 5.19% in 2004, 3.33% in 2005 and 4.05% last year. If we analyse the increase in the minimum wage taking into account the inflation recorded the previous year, a decrease in real wages is observed.

As regards the nominal wage received by those working in the formal sector of the economy, a real annual adjusted increase of 2% was observed in January 2007, while workers in the manufacturing industry received a real increase of only 0.5% in November 2006 with respect to the same month the previous year. The loss of purchasing power over the last six years has been estimated at almost as much as 1%.

As a result, we do not believe wages are responsible for the growth in domestic consumption.

Employment

Faced with the need to create around 1,300,000 jobs a year in order to merely cover the demand stemming from the increase in the economically active population, the number of net jobs created in recent years is meagre.

Over the past three years, 591,000 jobs on average have been created, which is a lot less than the labour force demands.

Table 4: Net Job Creation in the Formal Sector

Year	Jobs in 1,000s
2004	318.6
2005	576.6
2006	879.5
2007	117.7*

*The 2007 figure refers to the first two months of the year

Source: elaborated with data from STPS

It must also be taken into account that employment in the informal sector of the economy is growing to the point of almost equalling the formal sector, as discussed in previous reports.

The workers in the informal sector have less chances of being granted loans that commercial banks may offer at a given moment.

For this reason, we do not believe that employment can entirely explain the growth in domestic demand either.

Family Remittances

The remittances sent to relations by Mexican workers in the United States have become the second largest source of foreign currency, behind oil.

The surge in domestic consumption can be partly explained by family remittances, which have risen markedly over the last two years.

In 2006, remittances totalling 2,353 million dollars entered the country, which represents a 15% increase with respect to the previous year. In 2005, remittance inflows rose by 20.5%. The figure could reach 26,000 million dollars this year according to estimates. Remittances support domestic consumption, combat poverty and boost investment.

Interest Rates

Interest rates have displayed a downward trend over the past two years. In 2006, the 28-day Cetes Rate was lower than in 2005, recording averages of 7.19% and 9.19% respectively.

However, should inflationary pressure continue, the central bank will more than likely decide to raise the bank funds rate, which current stands at 7.02%.

The latest press statement made by the Bank of Mexico and released on February 23 portrayed a much tougher stance on indicating that if core inflation did not drop in March in annual and monthly terms, steps would be taken to tighten up monetary policy.

The fact that inflation remains above the target rate is also worthy of mention. The Bank of Mexico now estimates this situation will last until the third quarter of this year. The bank had previously forecast that supply disturbances would maintain inflation at around 4% or 5%, but only during the first half of this year.

Should the fund rate rise on March 23, it will more than likely reach 7.25%, which will push up the Cetes rate and interest rates in general. The central bank will have to assess a higher level of rates, which could spark a slowdown in the economy.

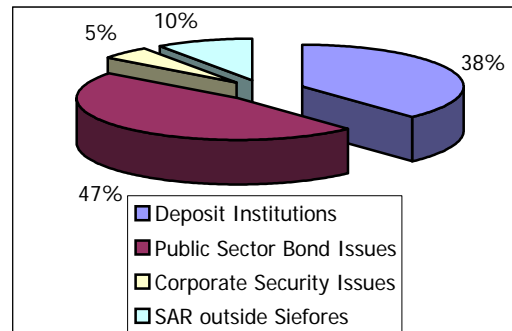
Financial Savings

Financial savings in Mexico are measured by savings made in bank and non bank financial instruments, expressed by the broad monetary aggregate M4a, less the notes and coins in the hands of the population.

The broad monetary aggregate M4a includes not only the private savings reported by the M4, but also public sector savings, made up of savings by the Federal government and public companies and organisms, state and local governments, the Federal District government and public works trusteeships.

Another way of calculating it is to add the savings in deposit institutions (commercial banks and development banks being the main components), public sector bond issues, private sector security issues and the Retirement Savings System (SAR in Spanish) outside Siefos.

Figure 7: Financial Savings

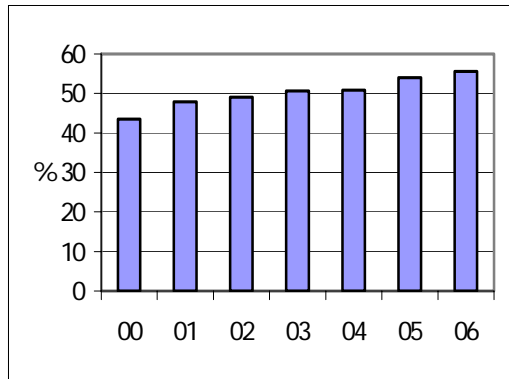


Source: Banco de Mexico

Total financial savings at the end of 2006 amounted to 5,091 billion pesos. Public sector bond issues accounted for nearly half of this total. The second largest share of financial savings is held by deposit institutions, made up mainly by commercial and development banks.

Financial savings measured as a percentage of GDP have risen over the period 2000-2006 by around 10 percentage points, according to Bancomer estimates, from 43% to 54%. This is mainly due to the fact that obligatory savings through the Retirement Savings System have increased considerably.

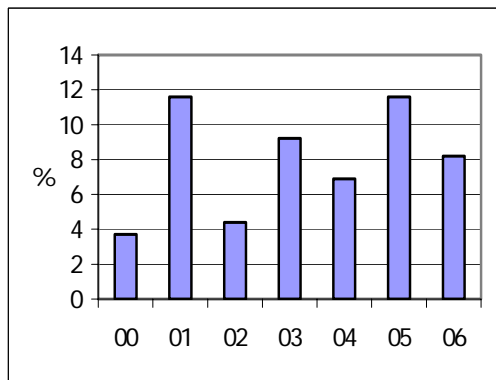
Figure 8: Total Financial Savings as a % of GDP



Source: Banco de Mexico

Financial savings had grown by 8.2% at the end of 2006, less than in 2005 when an 11.6% growth rate was observed. The rise in financial savings has been irregular in recent years, the best being 2001 and 2005 with rates of slightly over 10%, while in 2000 for example, the increase amounted to only 3.7%.

Figure 9: Real Growth in Financial Savings



Source: Banco de Mexico

Commercial Banks

On searching for the reason behind the evolution of financial savings among its components, commercial banks are found to exercise a great influence on representing approximately a third of the total.

Commercial bank fund capturing, after dropping severely in real terms in 2000 (-14%) and again in 2002 (-5.5%), has recovered with positive real growth rates over the ensuing years.

However, one of its components, namely term deposits, has recorded negative real growth rates since October 2005, which has affected the otherwise favourable trend in overall fund capturing.

The 8.2% increase in financial savings recorded in 2006 was due to a 6.6 point contribution from the public sector, that is, this sector was responsible for 80% of the rise.

At the end of 2006, multiple banking, which includes all commercial banks that carry out financial intermediation in order to make a profit, recorded profits totalling 66,749 million pesos, 34% more than in 2005 and mainly due to the wide financial spread and commission.

Development Bank

The Mexican Development Bank only contributed 5.5% of total financial savings in the country in 2006. In Mexico, the development bank is made up of six large banks: the National Financial; National Bank of Foreign Trade (Bancomext in Spanish); National Bank of Public Works (Banobras in Spanish); Federal Mortgage Society; National Bank of the Army, Air force and Navy, Bank of National Savings and Financial Services.

As regards the assets in this banking system, at the end of 2006, the National Financial held 41% of total assets, followed by Banobras with 22% and Bancomext with 19%.

The development bank recorded profit of 3,298 million pesos in 2006

according to information from the National Banking and Securities Commission (CNBV in Spanish), a 239% increase with respect to the previous year when a profit of 972 million pesos was made.

The 2007-2012 Strategic Plan for the Development Bank was released recently in which companies, housing, infrastructure and rural areas will receive financing in an attempt to achieve the objective of increasing its loans from the current 3.9% of GDP to 5% by 2012.

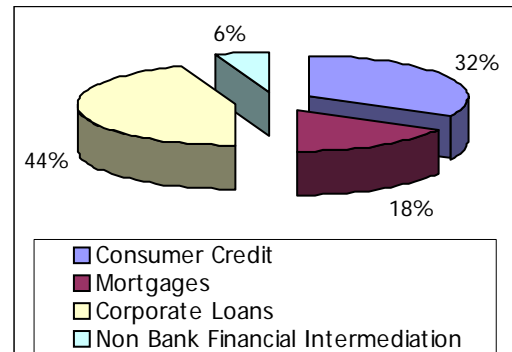
Financing and Borrowing

After the crisis in 1995, commercial bank practically stopped granting loans to the private sector. It was not until 2004 when a recovery was observed. At present loans are increasing moderately. Currently, commercial bank loans to the private sector account for approximately a fifth of total loans.

At the end of 1995, as a result of the economic crisis the country was suffering, commercial bank loans to the private sector recorded a decrease of 41%. Negative growth rates were recorded until 1999.

After hitting rock bottom, a slight recovery was observed in 2000 with a positive growth rate of 3.4%. However, it is not until 2004 when a strong upturn is observed with a 26% rise followed by a 27% increase the following year.

Figure 10: Commercial Bank Loans to the Non Bank Private Sector (2006)



Source: Banco de Mexico

At the end of 2006, loans granted by commercial banks to the non bank private sector rose in real terms by an annual 28.4%. Corporate loans grew by 21%, consumer credit by 36% and mortgages by 46%.

Empirical studies have demonstrated that economic growth and corporate loans are closely related. GDP rose by 2.8% in 2005 and by the end of the year, corporate loans had increased by 6.1%. In 2006 the economy grew by two percentage points more and corporate loans shot up by 21%.

Regarding GDP, Bancomer estimates indicate that at the end of the third quarter of 2006, commercial bank corporate loans represented 5% of GDP, consumer loans 3.7%, mortgages 2.1% and non bank financial intermediation the remaining 0.6%.

Figure 11: Commercial Bank Loans in 2006 over GDP (%)



Source: Banco de Mexico

At the end of the third quarter of 2006, according to the balances, bank financing (including the development banks, commercial banks and both current and outstanding and restructured loan portfolios) accounts for 42% of the total while non bank financing (including financing from abroad, from national non bank financial intermediaries, suppliers, domestic debt issues and those awarded by Infonavit) accounts for the remaining 58%.

As a percentage of GDP, bank and non bank financing were estimated to be the equivalent of 28.7% of GDP at the end of the third quarter of 2006, with bank financing estimated at 12% and non bank financing at 16.7%.

Commercial bank loans to the non bank private sector amounted to 1,136 billion pesos at the end of 2006. Companies received 44% of these loans, consumers 32%, 18% went towards mortgages and the remaining 6% to non bank financial intermediaries.

Outstanding Consumer Loan Portfolio, a highly worrying issue

Bankers are playing down the marked rise in outstanding consumer loans in recent years, as they believe it is a risk they must take in order to cover low income earning segments of the population.

At the end of 2006 and according to information from the National Bank and Securities Commission, the commercial bank outstanding loan portfolio has grown by 26.6%.

By type of loan, the largest increase within the outstanding loan portfolio was recorded by consumer loans, which have risen by 98.5%.

Within consumer loans, outstanding credit card debt rose by 104% at the end of 2006. Outstanding loans for consumer durable goods rose by 39% while other consumer loans that have been defaulted rose by 244%.

It is worth indicating that credit card debt represents 60% of the total consumer loan portfolio. Credit cards are also responsible for 49.5% of the net commissions charged by commercial banks.

The fact that outstanding consumer loans have increased so markedly over the past year should be taken as clear warning. In January this year, the portfolio recorded a 105% annual increase and totalled 17.2 billion pesos (approximately 1,565 million dollars).

If we compare this figure to the entire banking system's total outstanding loan portfolio, it already represents 60%, whereas one year ago it was almost have that at 32%.

Commercial banks have granted credit cards indiscriminately, offering them in the main meeting places, such as public squares and shopping centres, as if they were cheap merchandise, with minimal requisites and in some cases none at all.

At present there are 20 million credit cards and 40 million debit cards, which give us a total of 60 million, when Mexico has a labour force of only 43 million people.

The policy of offering cards has led the card owners themselves to be precisely the main debtors, rising over the past year by around 100% and representing 73% of total consumer loans.

The second largest group in terms of outstanding loans are those related to housing, which increase in January

2007 by an annual 14.6%. Outstanding credit card loans and mortgages represent around three quarters of the total between them.

As regards the outstanding loan portfolio of the development banks, at the end of 2006 it amounted to 7,804 million pesos, dropping by 7.4% with respect to 2005.

The largest share of this portfolio corresponds to trade, with 51.4% of the total, followed by financial institutions which are responsible for 43.7%.

It has taken the Mexican banking system some time to overcome the consequences of the crisis in 1995. And while the outstanding loan portfolio certainly did not cause it, it was one of the aspects that most aggravated the situation, causing many small savers to lose the best part of the wealth.

Outlook

Family remittances, dropping interest rates and more consumer loans on offer are mainly responsible for boosting domestic consumption. However, it is worth finding out consumers' opinion for the forthcoming months.

One indicator that can provide information regarding future developments in domestic consumption is the Consumer Confidence Index elaborated by INEGI.

The latest data, corresponding to February this year, indicate a 4.2% decrease in the level of confidence in relation to the same month the previous year and a 0.7% decrease with respect to the previous month.

The decrease is due to slump in the economic situation of household

members as well as their outlook for the situation of the economy over the next 12 months. Similarly, consumers considered that the current situation of the country is worse than 12 months ago and that the possibility of buying household appliances has also decreased. Only the prospect of an improvement in the economy over the next 12 months recorded an increase.

It is also interesting to see the results of the latest survey carried out by the Bank of Mexico for February on the confidence of private sector experts in economics. After interviewing the consultants, the confidence index scored 111, practically identical to the figure recorded the previous month, 113.

Likewise, they indicated that structural reform was still required in taxes, the labour market and the energy sector in order to attract more investment both from the private sector and from abroad.

The survey also pointed out that specialists agree that the lack of structural changes, weakness in foreign markets and domestic problems related to public insecurity are the elements that could slow down growth over the next few months.

In macroeconomic terms, the oil issue is a concern as it is the mainstay of the national economy. PEMEX has registered a strong decrease in output over recent years, which is already affecting the amount of exports and the companies' liabilities have also increased considerably.

President Calderón recently indicated that oil production in Mexico could only be guaranteed for the next 10 years, as there are only 9.3 years of tested production left. As a result, the country

has a real chance of becoming a net importer of oil.

Héctor Ruiz Ramírez
Toluca, Mexico. 22 March 2007