

# Advancement on Spain's household deleveraging process

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**Reducing household debt levels is one of the major challenges for the Spanish economy. Nevertheless, the deleveraging process has been accelerating in recent months, underpinned by progress on the housing market correction and improved financial stability.**

*High private sector debt levels associated to asset price bubbles and related lending booms have made household deleveraging a common and painful consequence of financial crises in many countries. As recently pointed out by the IMF and the European Commission, deleveraging remains one of the major challenges for the Spanish economy over the next few years. In this context, this article provides an analysis of the recent evolution and prospects of household debt and financial savings rates in Spain. Spain's private sector debt levels have increased rapidly in recent years compared to the majority of its European peers, and its financial savings rate has been negative until 2012, due to the large incurrence of liabilities. Nevertheless, our analysis reveals that although the debt reduction effort may still take some years, deleveraging seems to be accelerating recently. Funcas' estimates for 2013 point to a continued acceleration in the deleveraging effort, permitting Spanish families to progressively increase financial savings and their net financial wealth.*

## The trade-off between private sector deleveraging and growth

During times of economic expansion, macroeconomic analysts follow the evolution of a country's private sector savings rate as an advanced indicator for investment and economic growth. However, during financial crises, households' and firms' savings tend to be considerably limited by high levels of private sector debt. This debt is frequently associated to asset price bubbles and lending booms, as is the case of the current financial crisis in many

countries. In this article, we analyse the Spanish case, paying particular attention to household debt and financial savings.

In its latest staff report on the situation of the Spanish economy<sup>3</sup> as of August 2013, the International Monetary Fund (IMF) points to deleveraging as one of the main remaining challenges for the Spanish economy over the coming years. The IMF highlights that recovery from a financial crisis is typically weaker than a normal recovery and this is due to the sacrifices that stem from fiscal consolidation and private

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<sup>3</sup> Staff Report for the 2013 Article IV consultation, prepared by a staff team of the IMF, following discussions that ended on June 19<sup>th</sup>, 2013, with the officials of Spain on economic developments and policies.

sector deleveraging efforts. As for the Spanish private sector, the report mentions that firms are deleveraging by cutting employment and investment “in the face of costly financing and weak demand prospects” and this trend is helping many firms to become net lenders to the rest of the economy. In the case of households, although their level of debt is relatively lower than that of firms, the effort is probably tougher as most of the debt is long-term (mortgages) and the real estate assets that serve as collateral for such debt have lost significant value.

Overall, the IMF estimates that even if it is a necessary adjustment, deleveraging may create some pressures that –along with financial distress– could generate a negative macro-financial feedback loop that leaves not only private, but also public debt “at elevated levels for the foreseeable future.”

Similar concerns have been expressed in a recent report by the European Commission (EC), in particular by the directorate of Economic and Financial Affairs<sup>4</sup>. The Commission observes that deleveraging processes in the private sector are

a common feature in several EU countries, which, “although necessary, represent a source of concern in terms of implications for economic activity.” The report offers some statistical estimates comparing the current levels of household and non-financial corporations’ debt with a benchmark based on “pre-crisis” levels. The analysis suggests that deleveraging pressures could be highest in Cyprus, Portugal “and, although to a lesser extent, Spain, where both credit supply and demand risks are high.”

One of the main consequences of households’ deleveraging –as we will show in this article for the Spanish case– is a decrease in housing investment and in consumption. In the abovementioned EC report, the simulation of a deleveraging shock in a dynamic general equilibrium model also shows significant negative effects on unemployment, “notably when the economy is characterized by significant real and nominal wage rigidities.”

As shown in Table 1, the magnitude of private sector debt in Spain has become sizeable. In 2005, total private sector debt in the form of securities other than shares and loans was

Table 1

### The magnitude of the leverage: Private sector debt in Spain

| Private sector debt in the form of securities other than shares and loans (billion euros) |         |         |         |         |         |         |         |         |         |
|---|---------|---------|---------|---------|---------|---------|---------|---------|---------|
|   | 2005    | 2006    | 2007    | 2008    | 2009    | 2010    | 2011    | 2012    | 2013Q1  |
| Non-financial corporations  | 951.5   | 1,191.3 | 1,385.3 | 1,474.7 | 1,461.1 | 1,494.8 | 1,470.0 | 1,365.0 | 1,322.5 |
| Households  | 653.4   | 780.7   | 876.6   | 913.4   | 906.1   | 901.7   | 874.3   | 837.2   | 822.8   |
| Private sector - Total  | 1,604.9 | 1,972.0 | 2,261.9 | 2,388.1 | 2,367.2 | 2,396.5 | 2,344.3 | 2,202.2 | 2,145.3 |
| Private sector debt in the form of securities other than shares and loans (% GDP)         |         |         |         |         |         |         |         |         |         |
|   | 2005    | 2006    | 2007    | 2008    | 2009    | 2010    | 2011    | 2012    | 2013Q1  |
| Non-financial corporations  | 104.3   | 120.9   | 131.5   | 135.6   | 139.4   | 142.5   | 138.2   | 130.1   | 126.4   |
| Households  | 71.9    | 79.2    | 83.2    | 84.0    | 86.5    | 86.0    | 82.2    | 79.8    | 78.6    |
| Private sector - Total  | 176.2   | 200.1   | 214.7   | 219.6   | 225.9   | 228.5   | 220.4   | 209.9   | 205.0   |

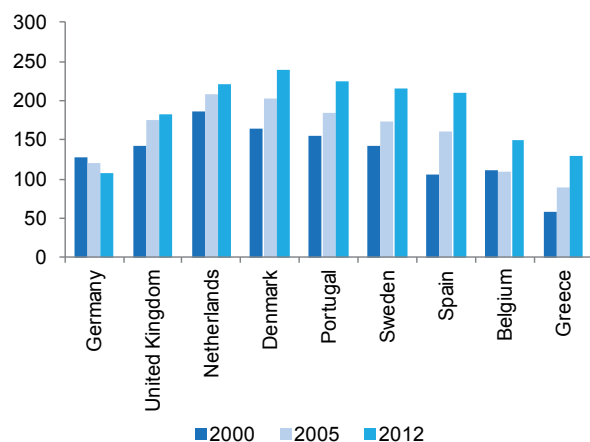
Source: Bank of Spain and own elaboration.

<sup>4</sup> In particular, the report entitled “Indebtedness, Deleveraging Dynamics and Macroeconomic Adjustment” by Carlos Cuerpo, Inês Drumond, Julia Lendvai, Peter Pontuch and Rafal Raciborski. (European Economy. Economic Papers. 477. April 2013. Brussels).

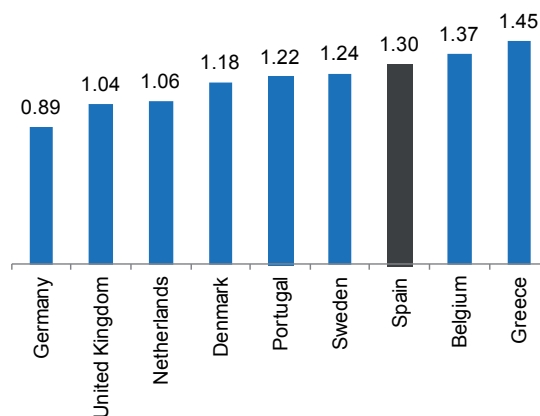
Exhibit 1

**Private sector debt: Comparison across EU countries**

**Private sector debt/GDP (%)**



**Private sector debt 2012 / Private sector debt 2005**



Source: Eurostat and own elaboration.

1,604.9 billion euros. This figure rapidly grew to 2,396.5 billion euros in 2010 and its reduction has only occurred in the last two years as it stands at 2,145.3 billion euros as of 2013Q1. In the case of households, debt has increased from 653.4 to 913.4 billion euros between 2005 and 2008, falling thereafter to 822.8 billion euros in 2013Q1. In the case of non-financial firms, debt increased from 951.5 to 1,494.8 billion euros between 2005 and 2010, as deleveraging has only occurred from 2010 onwards with the outstanding debt being 1,322.5 billion euros in 2013Q1.

In terms of GDP, total debt of Spanish households was 71.9% in 2005. It reached a peak in 2009 (86.5%) and fell to 78.6% in 2013Q1. In the case of non-financial corporations, the debt-to-GDP ratio rose from 104.3% in 2005 to 142.5% in 2010 and it fell to 126.4% by 2013Q1.

Using Eurostat data (Exhibit 1) we find that the private debt-to-GDP ratio in Spain in 2012 (210%) was of a similar magnitude to that of other countries such as Denmark (238%), Netherlands (221%), Portugal (224%) or Sweden (215%).

However, as shown in the right chart in Exhibit 1, the net increase in the debt of the private sector from 2005 to 2012 has been really fast in Spain. The debt to GDP ratio in 2012 was 1.30 times larger than in 2005, greater only in Greece (1.45) and Belgium (1.37).

Overall, the magnitude of private sector debt in Spain is considerable. However, the acceleration path of this debt is perhaps even more significant and reducing it has become a big challenge, as we will show later on in this article.

**Spain's household financial savings rate**

Concentrating on Spanish households, we wonder to what extent the increase in debt levels in the years before the crisis (and even during the initial years of the crisis) has affected the savings rate of Spanish households. The flow of financial assets and liabilities in the hands of Spanish families (labelled as "net acquisition of financial assets" and "net incurrence of financial liabilities", respectively) is shown in Table 2.

Table 2

**Financial transactions account: Spanish households (billion euros)**

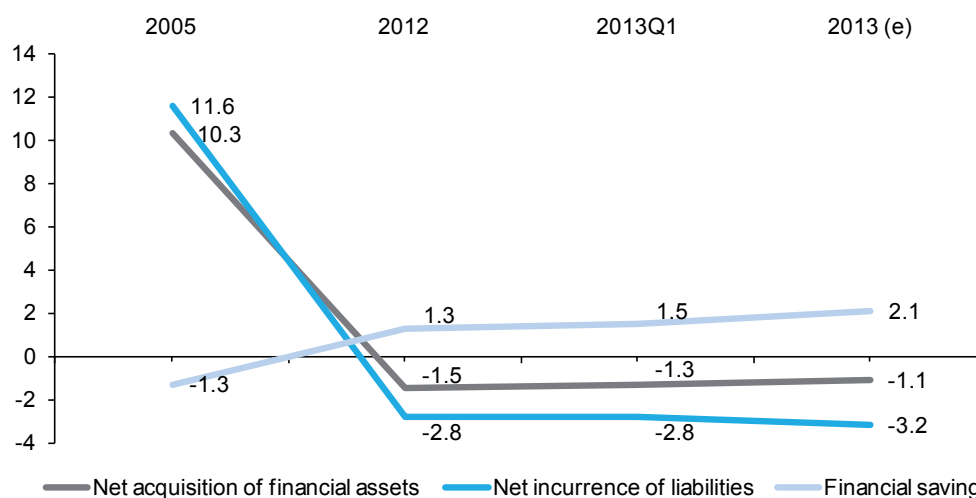
|   | 2005  | 2012  | 2013Q1 |
|---|-------|-------|--------|
| Net acquisition of financial assets     | 93.2  | -16.2 | 2.4    |
| Currency and deposits                   | 50.1  | 2.9   | 6.8    |
| Securities other than shares            | 1.8   | -14.1 | -12.6  |
| Shares and other equity                 | 17.5  | 5.9   | 5.5    |
| Insurance technical reserves            | 17.1  | -1.2  | 4.8    |
| Other accounts receivable               | 6.6   | -9.7  | -2.2   |
| Net incurrence of financial liabilities | 105.1 | -29.5 | -5.7   |
| Loans                                   | 111.8 | -35.1 | -12.9  |
| Other accounts payable                  | -6.7  | 5.7   | 7.2    |

Source: Bank of Spain and own elaboration.

There are two main trends in the financial transactions account of Spanish households. First, the net acquisition of financial assets declined considerably between 2005 (93.2 billion euros) and 2012 (-16.2 billion euros). The decrease is due to both a reduction in the acquisition of

financial assets as well as to a reduction in the market value of these assets. The most recent data, as of 2013Q1, show that the improvement in market conditions is permitting Spanish families to increase the value of their net acquisition of financial assets, which was 2.4 billion euros in the

Exhibit 2

**Households' financial savings over GDP (%)**

Source: Bank of Spain and own elaboration.

first quarter of this year. The second trend refers to the net incurrence of financial liabilities. In 2005 alone, Spanish households increased the flow of debt represented by loans and other liabilities by 105.1 billion euros. In 2012, the situation was completely different as a negative flow of 29.5 billion euros was registered. This deleveraging effort continued in 2013Q1 with a negative incurrence of liabilities (net reduction of debt) of 5.7 billion euros, only during that quarter

The financial savings rate is computed as the difference between the net acquisition of financial assets and the net incurrence of liabilities, as a percentage of GDP. As shown in Exhibit 2, this rate was negative in 2005 (-1.3% of GDP) due to a large incurrence of liabilities (11.6%) as compared to assets (10.3%). Both components of financial savings fell considerably thereafter and from 2012 onwards we observe a significantly larger fall in liabilities, which permitted the savings rate to increase to 1.3%. Funcas estimates that in 2013 the deleveraging effort will continue to accelerate, permitting households to increase their financial savings rate to 2.1% by the end of the year.

## Household debt: The role of mortgages

Among the determinants of the increase in household debt, the real estate bubble and the related growth in mortgages and other loans are the most important drivers. In this sense, the way the deleveraging process is conducted is strongly linked to the developments in mortgage markets. At first glance, the reduction of mortgage debt could be undertaken by means of the sale of the underlying asset (the house), or devoting other resources to make early payments on these loans. Both alternatives do not seem to be available to most Spanish households given the recent evolution of unemployment, wages, savings and rent expectations. In such situations,

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other solutions, such as personal liquidation and bankruptcy laws and/or loan payment facilities and renegotiations, are also useful in reducing the pressure of mortgage debt. Some of these solutions are discussed in the conclusions of this article<sup>5</sup>.

Along with reductions in the stock of debt, deleveraging also requires an adjustment of lending flows. This is clearly happening in Spain, as shown in Exhibit 3, which shows the annual change in the effective flow of financing to Spanish families. The annual change was 20.88% in 2005 and has been progressively reduced to 4.4% in 2008, turning negative from 2010 onwards. During 2012 and 2013, this reduction in the financing flows has accelerated and in the first half of 2013, the annual change in financing to households has

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*The reduction in financing to Spanish families represents a paradigm of the deleveraging trade-off, as correcting the existing debt imbalances has a cost in terms of investment and consumption.*

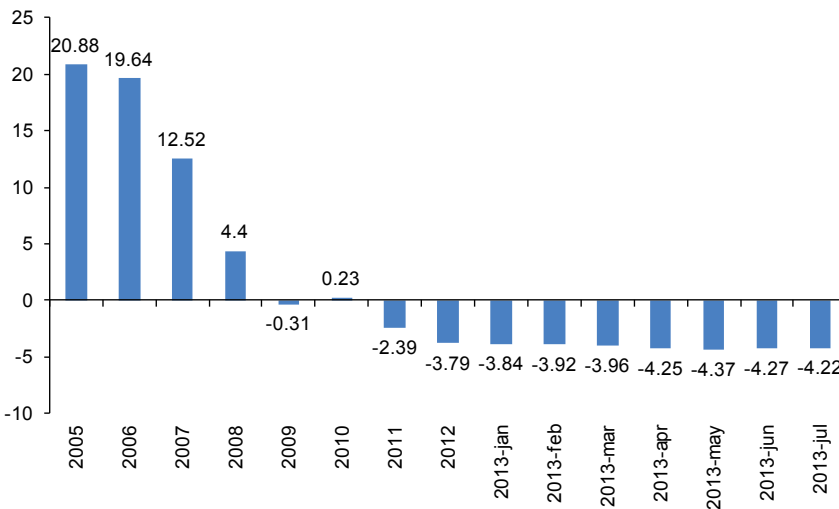
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been around -4%. This reduction in financing to Spanish families represents a paradigm of the deleveraging trade-off, as correcting the existing debt imbalances has a cost in terms of investment and consumption. In any event, the trend shown

<sup>5</sup> A detailed review of current initiatives to face the socio-economic problems related to mortgage defaults are summarized in the volume 2, number 2 issue of *Spanish Economic and Financial Outlook* (SEFO) entitled "An assessment of the Spanish mortgage framework: Issues, policy options, and implications": <http://www.funcas.es/publicaciones/Sumario.aspx?IdRef=20006>

Exhibit 3

**Financing of households (annual change in the effective flow of loans)**



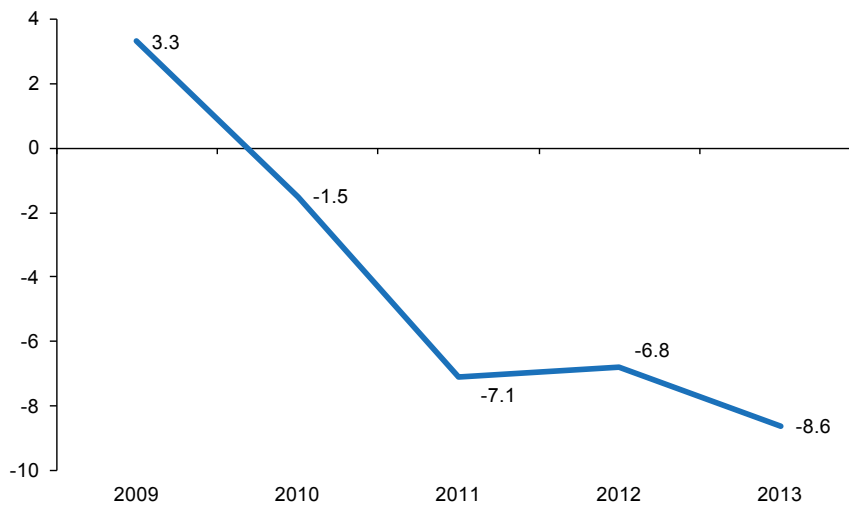
Source: Bank of Spain and own elaboration.

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in Exhibit 3 reveals that even if deleveraging will probably take years to reach a more sustainable level, it seems to have accelerated in recent months.

Exhibit 4

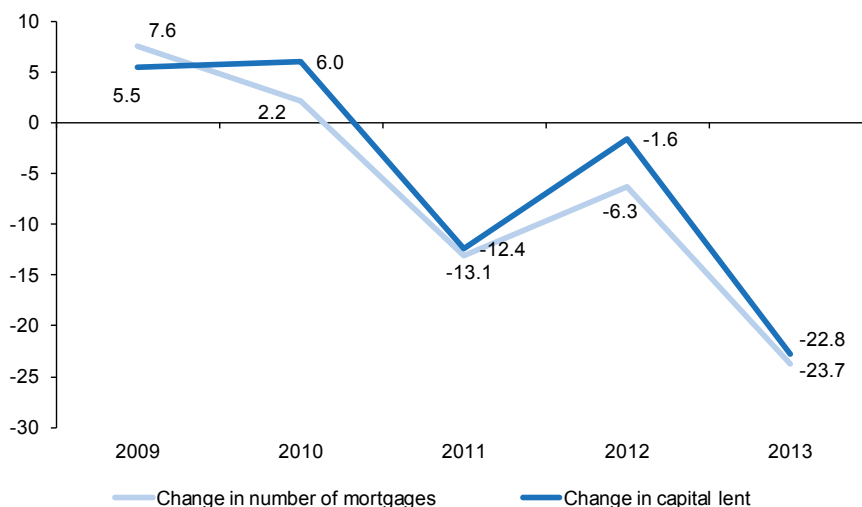
**Evolution of the monthly rate of the number of property transactions (Variation in June as compared to May of the same year, %)**



Source: National Statistics Office (INE) and own elaboration.

Exhibit 5

**Monthly change in mortgages constituted in Spain**  
(Variation in June as compared to May of the same year, %)



Source: National Statistics Office (INE) and own elaboration.

The other alternatives to speed up the reduction of mortgage debt would be the sale of the house that serves as collateral or the early redemption of (at least part of) the loan. Both possibilities are limited by the macroeconomic conditions and also because part of the adjustment in the real estate market is still to be completed. Such adjustment negatively affects the real wealth of households but it permits an increase in the number of housing transactions, reactivates and stabilizes the housing market and, overall, accelerates deleveraging by means of asset disposals (house sales). However, as shown in Exhibit 4 –based on the most recent data as of June 2013– the number of property transactions is not rising but decreasing at an ever-increasing pace, suggesting that the adjustment in the housing market is yet to be finished.

The same conclusion applies when analysing the monthly change in mortgages constituted. The most recent figure as of June 2013 shows, for example, a reduction in the number of these contracts by 23.7%

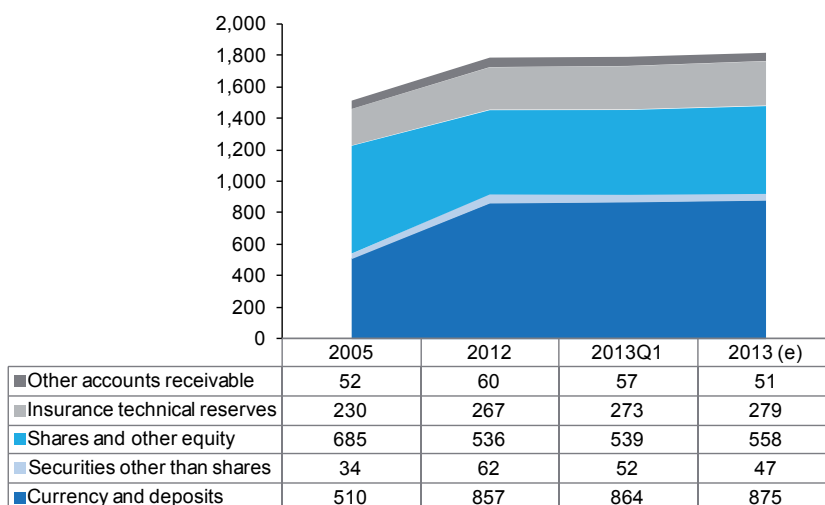
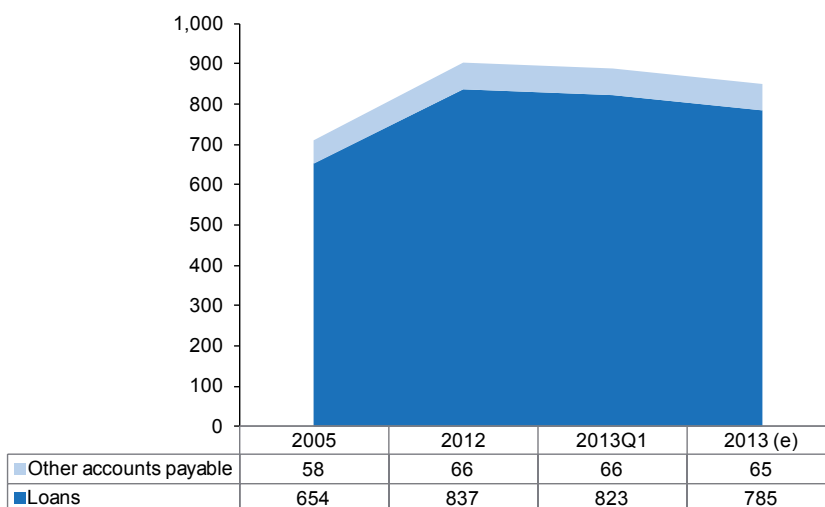
just from May to June 2013. Similarly, the capital lent in new mortgage contracts has declined by 22.8% during the same monthly period.

**Financial wealth of Spanish households**

Along with financial flows, the evolution of the financial wealth of Spanish families (the stock values) is a very relevant indicator of the capacity of these households to reduce their debt. This is because reducing leverage is more feasible when the value of assets is increasing and more resources can be devoted to debt service payments.

The evolution of the structure of the balance sheet of Spanish families in recent years, as well as Funcas' projections for 2013, are shown in Exhibit 6. We observe that the asset side has grown at a slow pace in recent years both due to the difficulties of Spaniards to acquire new financial

## Exhibit 6

**Financial balance sheet of Spanish households (2005, 2012, 2013Q1, and projections for 2013, billion euros)****Assets****Liabilities**

Source: Bank of Spain and own elaboration.

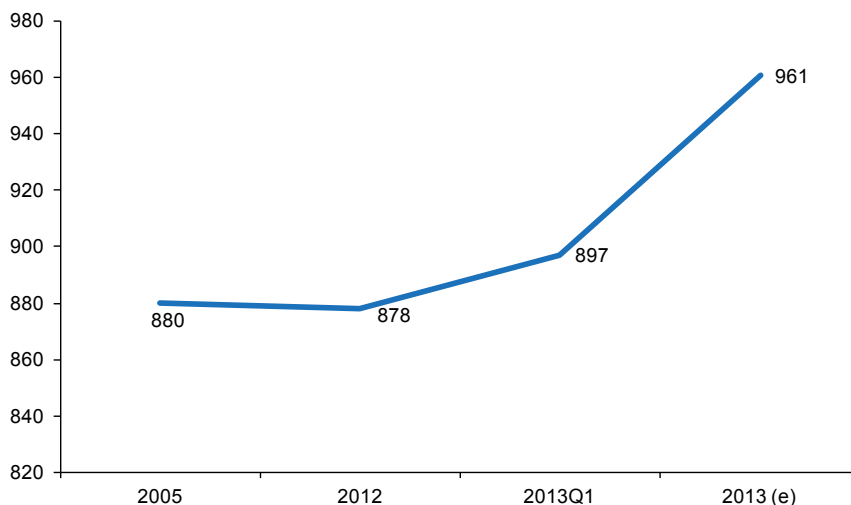
assets and as a result of the decrease in the value of some of these assets (in particular, those whose performance is linked to stock markets, such as shares). In any event, total outstanding financial assets were 1,591 billion euros in 2005,

1,781 billion euros in 2012 and 1,786 billion euros in 2013Q1. Funcas estimates for 2013 that total assets will rise to 1,811 billion euros by the end of the year. The liability side, however, has been considerably reduced, and the fall has been



Exhibit 7

**Net financial assets of Spanish households (2005, 2012, 2013Q1, and projections for 2013, billion euros)**



Source: Bank of Spain and own elaboration.

particularly significant in the last two years. Total loans were 837 billion euros in 2012 and as of 2013Q1, they were 823 billion euros. Funcas' projection is that loans will decline to 785 billion euros by the end of 2013.

The difference between the assets and liabilities in the hands of Spanish families is referred to as "net financial assets" or "households' financial wealth". This figure is shown in Exhibit 7. There is some positive news as the recent acceleration of the deleveraging process, as well as the relatively improved performance of the stock market, has permitted Spaniards to increase their net financial assets to 897 billion euros in 2013Q1. Funcas estimates that household financial wealth will stand at 961 billion euros by the end of 2013,

*Funcas estimates that household financial wealth will stand at 961 billion euros by the end of 2013, which represents a 9.4% increase with respect to 2012.*

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**Conclusions**

From 2005 to 2008, Spaniards increased their financial debt by 260 billion euros. From 2009 to 2012, this debt has been reduced by 90 billion euros, suggesting that a long deleveraging process still lies ahead. This is a common feature in financial crises, in particular when countries are severely hit by real estate bubbles, as has been the case in Spain.

Even if the deleveraging process may still take a few years to be completed, we observe that there has been a relative acceleration in the process in recent months, given progress on corrections in the housing market and the progressive restoration of financial stability.

The reason why the deleveraging process will necessarily take years, is that some of the standard solutions to reduce household debt –such as the

early redemption of loans or house sales— are currently not available in a country which suffers high unemployment and a decrease in the value of real estate assets. Even if house purchase transactions eventually increase, there will be a necessary welfare loss, as the mortgage debt linked to the house will be, in many cases, larger than the sale value of the house, a problem which is commonly known as “negative equity”.

crises —such as imposing haircuts on mortgage contracts— are not necessary and would be harmful to financial stability.

Given this situation, government efforts, in line with, *inter alia*, IMF recommendations, should be focused on making the deleveraging process as efficient as possible. This should involve legal measures such as facilitating personal bankruptcy laws —which have been relatively absent in Spain as compared to other EU jurisdictions— and also social measures to alleviate some negative consequences, which are inevitable to a large extent during the correction of current imbalances, such as foreclosures and evictions.

As noted by the IMF in its latest assessment of the Spanish economy as of August 2013, there are some positive policy actions being currently developed in Spain, such as “debt relief mechanisms, which are envisaged for natural persons subject to bankruptcy proceedings. Additional measures, and in particular the establishment of a special personal insolvency regime to provide a fresh start for debtors, have to be carefully balanced against their impact on the objectives of the policy strategy; i.e. preserving and reinforcing financial stability, and keeping the strong payment culture currently existing in Spain. It is also important to analyze the overall efficiency of those measures from a macroeconomic point of view.”

Overall, a progressive economic recovery, as well as a necessary (though painful) deleveraging should drive Spanish families to rebalance their debt to equilibrium levels more suitable to the reactivation of internal demand and achievement of larger economic growth rates in the country. In this context, other more drastic resolution mechanisms adopted in previous international