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Summary of the international symposium organised by the Banque de France “What is the appropriate regulatory response to global imbalances?” 4 March 2011

William R. White

Chairman

Economic and Development Review Committee, OECD

The Banque de France’s international symposium devoted to the topic “Regulation in the face of global imbalances” was held in Paris on 4 March 2011.¹

Taking this general topic as their starting point, the speakers and participants addressed the lessons that can be learnt from the crisis in the areas of the international monetary and financial system and economic and financial coordination. These topics, as was underlined by Christian Noyer in his introduction, also form part of the agenda of France’s G20 presidency.

This sixth symposium brought together representatives from advanced and emerging countries, central banks and international organisations, academia and the public and private sectors.

The symposium made it possible to take stock of the areas of agreement and disagreement halfway through France’s G20 presidency, but also to set out original analysis and new ideas. William White wound up the symposium with concluding remarks that are published here.

Keywords: global imbalances, economic policy coordination, international monetary system, financial regulation, macro-prudential policy

JEL codes: F32, F34, F42, F55, G18, E58

¹ <http://www.banque-france.fr/gb/publications/seminaires/International-Symposium-of-the-Banque-de-France-Regulation-in-the-face-of-global-imbalances.htm>

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I want to thank the Governor of the Bank of France for the invitation to make the concluding remarks at this prestigious conference. I consider it an honor. A number of years ago my BIS colleague, Andrew Crockett, was said to have given a brilliant summing up at a conference at the Bank of Japan. When I asked him how he did it, he joked in replying that "it was easier when you told people what they should have said, rather than what they did actually say". Today I will do mostly the latter, but I will not be able to resist doing some of the former as well. This is not to say that I think I fully understand what has precipitated the current crisis and where it might be leading us.² Rather the words of Keynes, written in 1931, seem to me to be still relevant today.³ "We are in a colossal muddle. We have blundered in the operation of a delicate machine, the workings of which we do not understand." At the least, this conference provides us with the opportunity to rethink some of the things that we used to believe we understood.



My comments today will be linear, in the sense that I will summarise the discussion of the topics in the successive sessions. In contrast, many participants made comments that were actually more relevant to other sessions than their own. This is not a criticism. This attests to the fact that, in the real world, virtually all variables are endogenous. The complexity of the economy, viewed as a system of highly interdependent real and financial variables, also helps explain the current limitations of our understanding.⁴

Session I: what imbalances after the crisis?

I interpret this question as asking: what is the problem? Logically, an answer to this question must be provided before we move on to suggestions for policy solutions. The question clearly assumes that "imbalances" of some kind are the essence of the problem, which is in fact a huge analytical leap. Today Lorenzo Bini Smaghi, Kiyohiko G. Nishimura and Kenneth Rogoff have

² On this see White (2010b).

³ Keynes (J.M.) (1931).

⁴ Buchanan (2002) provides some very useful insights into the properties which seem to characterise all complex systems. First, the frequency of costly systemic crises varies inversely with (the power of) the costs of the crisis. Second, the inherent importance of the triggering event bears no relationship to the magnitude of the resulting crisis. Third, prediction of the timing of crises is impossible.

reminded us that the macromodels commonly in use at universities, central banks, and international financial institutions, in fact, contain no imbalances of any significant importance. The question which motivates this session implicitly says those models must change, and change fundamentally.

Accepting that imbalances are an issue, should we worry only about external imbalances (global trade imbalances) or are domestic imbalances also a source of concern. In their comments today, Olivier Blanchard, Jacob A. Frenkel, Nouriel Roubini and Axel Weber all supported the view that external imbalances have their roots in domestic imbalances. Moreover, Pierre-Olivier Gourinchas and Olivier Blanchard also noted that, to the degree external imbalances were a separate issue, the problem had as much to do with disruptive capital flows (leading to gross international exposures) as with trade imbalances (leading to net international exposures). In sum, there are many strands to the problem of imbalances.

Turning to the nature of these domestic imbalances, Jacob A. Frenkel and others noted a wide variety of them. Financial imbalances would include overvalued assets and overleveraged financial institutions. Real imbalances would include abnormally low household saving rates in many countries, and an abnormally high fixed investment rate in China. These in turn would lead to imbalances in the structure of production; that is, industries (like construction in many countries) that would have grown too large relative to underlying demand.

The general impression created throughout the day, supported by a growing academic literature, is that these imbalances have their roots in excessive credit creation, ultimately made possible by a fiat monetary system. On the one hand, we have growing support for these propositions from economic history.⁵ There is a rapidly expanding literature on previous economic crises of significant magnitude. On the other hand, we can also have recourse to the history of economic thought.⁶ It is the case that many pre-War business cycle theorists suggested that credit driven forces were ultimately responsible for major economic disturbances.

How do these imbalances create problems? Jacob A. Frenkel put it most succinctly; "they threaten sustainable growth". Essentially, the credit driven boom turns to bust, with the latter generally being more severe if the financial system itself has been weakened in the process.⁷ Further, there is growing evidence that the level of potential output might also be significantly affected by such crises.⁸ Finally, it is worth noting that the high cost of crises arises

⁵ See Reinhart and Rogoff (2009); also Schularick and Taylor (2009) and the *World Economic Outlook* (2009).

⁶ For an overview of this literature, see Laidler (1999), Von Mises and Hayek (the "Austrians") played a prominent role in such thinking as did Robbins and Dennis Robertson in the United Kingdom.

⁷ See Reinhart and Reinhart (2010) and the comments by White (2010c).

⁸ Cerra and Saxena (2008).

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from the interactions of real and financial imbalances in both the boom and bust phases. In this current crisis, the tensions first emerged on the financial side and then spread to the real side. Historically, however, the opposite pattern of contagion has been seen equally frequently.⁹ This has a profound implication; namely, that financial stability is important, but is not a sufficient condition to ensure against very bad macroeconomic outcomes.¹⁰

The final question raised in this session had to do with the current status of the problems posed by imbalances. A few participants seemed relatively optimistic that imbalances were no longer a threat, and that the global growth we are now seeing is sustainable. Others, including Jacob A. Frenkel and Nouriel Roubini, were much more skeptical. Both effectively stated that all of the imbalances observed in 2007, when the crisis began, are still in evidence today. Indeed, there were suggestions that policy reactions to the crisis might well have worsened the underlying problems we still have to face. Nouriel Roubini described Keynesian policies to strengthen demand as being akin to "kicking the can down the road one more time". It was also noted that our traditional arsenal of macroeconomics weapons has been largely depleted. Real interest rates are at zero or even negative; central bank balance sheets have expanded enormously; and the sovereign debts of many countries are now so large as to preclude any further stimulus, even if the economy should turn down again.

Session 2: the challenge of surveillance and coordination

This session was directed to the issue of crisis prevention. How can we prevent what we are currently experiencing from happening again? In principle, this is a very different topic from managing a crisis with a view to an effective exit. In practice, however, as Jacob A. Frenkel and Nouriel Roubini both implied, there is a significant link in that some policies designed to moderate a current crisis will raise the expected loss of future crises. For example, encouraging the accumulation of more debt in a downturn (whether private or public) raises both the probability of a future crisis and the costs of a future crisis should it occur.

Much of the session was directed to four sets of problems faced by those charged with crisis prevention. Elsewhere I have called these challenges the acceptance problem, the identification problem, the will to act problem and the coordination problem. With respect to each, the participants indicated that significant progress had been made but that, nevertheless, much still remained to do.

⁹ Reinhart and Rogoff (2009) contend that around half of the severe downturns they document began on the real side of the economy. This includes the Great Depression in the United States, which began in 1929 and was then seriously aggravated by the banking sector collapse in 1931.

¹⁰ In effect, neither price stability nor financial stability is sufficient to ensure the avoidance of bad macroeconomic outcomes. On the former, see White (2006).

The *acceptance* problem has to do with the authorities having the right analytical framework. Do they recognise that price stability and financial stability, while desirable, are not sufficient to avert serious macroeconomic problems arising from the evolution of the credit cycle? Put otherwise, is the spectrum of imbalances, used as indicators of prospective problems, wide enough to capture all the emerging dangers. As noted above, some policymakers seem more inclined to accept these propositions about imbalances than do others.

By way of example, consider three of the world's most important central banks.¹¹ The Federal Reserve conducts monetary policy almost solely on the basis of one pillar; the capacity gap. In this framework, imbalances play no role. In contrast, the Bank of Japan has two "perspectives". They look, not only at the capacity gap, but also at all the credit driven forces responsible for their last crisis. Finally, the European Central Bank seems to me to sit uneasily between the other two. Their second "pillar" appears to have been evolving, from a monetary indicator of future inflation, into becoming a credit indicator of future imbalances. Where this process of evolution now stands, however, I am not quite sure.

The *identification* problem has to do with the need to establish (to a degree of certainty sufficient to justify a policy response) whether problems are in fact building up. In this regard, a number of commentators indicated that significant progress has been made. Charles Goodhart noted, concerning aspects of Basel III, that they constituted a material advance on Basel II. Olli Rehn gave a frank account of how and why the European official community had failed to see the crisis coming. Importantly, he also laid out clearly how they intended to learn from these experiences in order to improve their surveillance capacities. Finally, by way of progress, I would note that there is a promising and growing body of research into indicators of future economic and financial crises.¹²

Yet significant problems remain. Lorenzo Bini Smaghi reflected on the fact that stress tests of financial institutions, and also estimates of the fiscal soundness of governments, can both be very misleading. During the boom, such indicators look highly satisfactory but the bust changes perceptions drastically. Think of banks and governments in both Spain and Ireland, pre and post-crisis. Choongsoo Kim also spoke of other problems making it difficult to identify impending problems in the financial sector. Among these he referred to complexity, opacity, constant innovation and the tendency of lenders to hide problems through making new loans to "evergreen" old ones.

Choongsoo Kim also made specific references to the difficulties inherent in identifying systemic vulnerabilities. These arise from interdependencies

¹¹ For a fuller consideration, see White (2010a).

¹² See Borio and Drehmann (2009) and Barrel et al. (2010).

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and shared shocks, both of which are hard to monitor and evaluate.¹³ Against this background, it is perhaps not surprising that the measures proposed to deal with systemic risk under Basel III are seriously incomplete to date. Indeed, they look very much like simple "add ons" to what are essentially traditional microeconomic measures.¹⁴

The *will to act* problem has to do with forbearance, even after potentially dangerous problems have been identified. Indeed Charles Goodhart was so convinced of its importance that he contended that the countercyclical capital requirements associated with Basel III were useless; they would never be triggered by the domestic authorities. Why might the official sector forbear? One domestic reason mentioned by Charles Goodhart is that a tightening of policy during the boom, when many people are profiting greatly, will be hugely unpopular. There are also international reasons for forbearance. Tightening regulation in country A will immediately be attacked as giving an advantage to country B. As for tightening monetary policy, José De Gregorio noted that this would raise the real exchange rate and lower competitiveness. At the least, this would be inconvenient for many. Others suggested (discussed further below) that such tightening might in fact be ineffective if it attracted large enough capital inflows from abroad.

Faced with all of these incentives to forbear, Charles Goodhart concluded that macroprudential regulation should be guided by rules as much as by discretion.¹⁵ He also suggested that regulators in the future be required to justify publicly any decision *not* to follow rules agreed beforehand.¹⁶

Finally, effective surveillance faces the *coordination* problem. I will cover the domestic aspects of this in the next section. Here, I will focus only on comments made concerning international coordination. Many participants noted how much progress had been made to date. In his introductory comments, Governor Christian Noyer provided an excellent overview of this. As well, Mario Draghi emphasised the important contributions made by the Financial Stability Board (FSB), and Choongsoo Kim underlined the significant achievements of the G20 process. Closely related, Choongsoo Kim also noted how internationally coordinated interest rate cuts and currency swaps had helped limit the damage at the height of the crisis itself.

Nevertheless, many participants stressed how much was left to be done. Mario Draghi laid out the work program which the FSB intended to undertake. Rather more fundamentally, Olivier Blanchard and Martin Wolf pointed out

¹³ Choongsoo Kim made the broader point that economic interdependencies and shocks can also have social and political origins and vice-versa. Consider the effects on oil prices of recent political events in the Middle East and North Africa, and the fact that these events were in part triggered by rising food prices, themselves a product of rising demand. In short, the endogeneities extend well beyond the economic sphere.

¹⁴ On this see Hellwig (2010).

¹⁵ This is consistent with Brunnermeier et al. (2009).

¹⁶ Suggestions of this sort can also be found in various Annual Reports of the BIS.

how the lack of a shared analytical model (what is the problem?) could get in the way of coordinated solutions. Mario Draghi, Jacques de Larosière and Choongsoo Kim all noted the unwillingness of countries to forego sovereign objectives in the absence of a clear and present crisis. Finally Franklin Allen stressed the unwillingness of the advanced countries to restructure the International Financial Architecture to reflect adequately the increased economic power of newly emerging market economies. This impeded international cooperation because many emerging countries do not trust institutions, like the International Monetary Fund (IMF), which they felt to be directed by others.

Session 3: the role of central banks and lessons learned from the crisis

Deciding what central banks should do to help prevent crises depends on what one believes is the underlying problem to be confronted. To use a distinction made by Janet Yellen,¹⁷ is it a problem with “monetary” roots or with “financial” roots or both? Put another way, are crises likely to be endemic in the monetary system we have, or are they primarily due to a failure of regulation? If the former, the problem is a macroeconomic one touching both the financial system and the real economy. Evidently, to the extent this is true, central banks will have a more fundamental role to play.

An important question raised was whether central banks should alter policy rates to “lean against the wind” of credit growth when it was judged to be excessive? Jean-Pierre Landau, Charles Goodhart and Athanasios Orphanides all seemed to answer no. In his presentation, Olivier Jeanne even referred to this conclusion as being “part of the post crisis consensus”. Rather, these participants all seem to give priority to the use of macroprudential instruments in such circumstances.

I have questioned such conclusions elsewhere¹⁸ and would do so again today. The basic argument from theory has been presented just above. The argument from practice is that macroprudential instruments to curb credit excesses, while certainly useful, will eventually prove insufficient if the profit incentive for avoidance is big enough.¹⁹ Probably, use of both monetary and macroprudential instruments will be required in the end. However, in what order and in what relative degree, evidently remain subjects to be debated.

¹⁷ Of course, this distinction has deep roots in the academic literature. See Padoa-Schioppa (2010).

¹⁸ White (2009).

¹⁹ If, in Wicksell's terms, the gap between the natural rate of interest and the financial rate is big enough, then both macroprudential instruments and capital controls will suffer from significant leakages.

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Lorenzo Bini Smaghi and Athanasios Orphanides raised another important issue; how should central banks respond to supply side shocks.²⁰ This is closely related to the question of whether "price stability is enough" to guide the conduct of central banks. I argued at the last Bank of France seminar²¹ that the low inflation observed in advanced market economies (AMEs) prior to 2007 was in large part due to strong productivity growth in previously state-managed economies. In effect these developments were acting to produce a "good" deflation rather than an "ugly" one.²² Nevertheless, central banks around the world resisted these price trends through unusually easy monetary policies, thus contributing materially to the problem of imbalances which still haunts us. There is an early literature on this which deserves much more attention than it has received.²³

A final issue was the role that should be assigned to central banks in the activation and management of macroprudential instruments. Most commentators seem to feel central banks should have an important role, though for different reasons. Jean-Pierre Landau noticed that monetary instruments and macroprudential instruments are not independent in that both will affect spending. Thus, some cooperation (or even coordination) in use will be required. Athanasios Orphanides agreed, suggesting that central bankers have more of a macroeconomic orientation than regulators. Moreover, they currently have a significant degree of instrument independence from political influence. This will help in dealing with the "will to act" problem.²⁴ Olivier Jeanne, however, made a counterargument. He worried that central banks might still be prone to "capture", not by government, but by the financial sector.

Session 4: towards which international monetary system?

Martin Wolf (the moderator of the session) pointed out that the International Monetary System (IMS) we have is wildly different from the one favored by the consensus after the fall of Bretton Woods. What we were supposed to get was floating exchange rates, domestic monetary policy anchored on some nominal target, and essentially no role for foreign exchange reserves. What we got instead was "fear of floating", monetary policies seriously circumscribed by international considerations, and an unprecedented accumulation of foreign exchange reserves.

²⁰ The specific shock referred to by Lorenzo Bini Smaghi was a decline in the level of potential in advanced market economies (AMEs), somehow fostered by faster growth in the emerging market economies (EMEs). He then went on to conclude that this could provide a justification for tighter monetary policies in AMEs than otherwise.

²¹ White (2008).

²² See Borio and Filardo (2004).

²³ Selgin (1999) surveys this literature. See also Beckworth (2008). Haberler (1986) contends that this was the fundamental insight that allowed Hayek, almost alone, to predict the Great Depression in the United States.

²⁴ Paul Volker has made this point as well. See Volker (2011).

These extraordinary divergences would, in themselves, attest to the importance of the topic of this Session. Moreover, as a complementary justification, there was the recurrent suggestion throughout the day that the external and domestic imbalances referred to above could not have grown so large had the IMS imposed more discipline on both debtors and creditors. Franklin Allen and Pierre-Olivier Gourinchas perhaps put the most emphasis on this international dimension, but Jacob A. Frenkel, Christian Noyer, Axel Weber and Janet Yellen also saw it as an important contributor in the buildup to the crisis.

To be more specific about the process, I would contend that investment was very weak in the AMEs in the two decades preceding the crisis.²⁵ Moreover, even as aggregate demand weakened, globalisation was leading to an effective increase in global supply. Central banks in the AMEs responded with very easy monetary policies (not least the Federal Reserve). Confronted with upward pressure on their exchange rates, many emerging market economies (EMEs) (not least China) responded with equally easy monetary policies and massive exchange rate intervention. With the reserves subsequently reinvested in AMEs, there was a truly global expansion in credit –with all of the side effects noted about.

As in earlier sessions, the discussion focused less on how to extricate ourselves from current difficulties than on reform of the IMS looking forward.²⁶ In this regard, a number of participants noted two awkward facts that any significant reform would have to take into account.

The first awkward fact, alluded to by both Jacques de Larosière and Lorenzo Bini Smaghi, is that uncovered interest parity (UIP) does not hold except over very long time periods. This has a number of important implications, noted in particular by José De Gregorio and Xiaolian Hu. International capital flows cannot be thought of as necessarily welfare enhancing because they can lead to costly booms and busts. Moreover, the severity of such crises is likely to be greatest in EMEs. Further, floating exchange rates in such circumstances are likely to become uncomfortably volatile. Finally, monetary tightening might in some cases be counter-productive if capital inflows lead to an easing of credit conditions. In response to such a market failure, Michel Camdessus, José De Gregorio, Xiaolian Hu and Jacob A. Frenkel all asked whether this might provide some justification for the use of capital controls. If so, Michel Camdessus added that we also needed internationally agreed criteria for when capital controls could be applied.

The second awkward fact was referred to by Jacob A. Frenkel, Pierre-Olivier Gourinchas, Olivier Jeanne and Nouriel Roubini; the time for reform might be running out. While the US dollar had retained its safe haven

²⁵ For a fuller analysis, see White (2008).

²⁶ France will chair the G20 in 2011 and the French government has indicated it will pursue this theme vigorously.

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status throughout the crisis, concerns were increasing as to its future status. The United States had uncontained levels of deficits and debt, at all levels of government, and the Federal Reserve was also buying an unprecedented proportion of their sovereign debt. Olivier Jeanne raised the possibility of an emerging "peso" problem and the associated possibility of a sudden, sharp increase in risk premia. He said he knew of no historical example where a central bank had forced its government to default by refusing to buy its bonds.

What positive suggestions for reform could be made? Franklin Allen, who emphasised the role of international factors in the current crisis, suggested a variety of measures to help convince countries that they need not build up high levels of foreign exchange reserves for precautionary reasons. Not least, he supported an international safety net, based on the IMF. Somewhat surprisingly, Choongsoo Kim questioned the approach by noting that many countries had accumulated reserves for competitive rather than for precautionary reasons.

Xiaolian Hu raised the question of the appropriate role to be played by the issuers of the international reserve currency. She felt the United States must be appropriately mindful of the international implications of its domestic policies. If the United States failed to do so, it would be more appropriate to replace the dollar with a new currency (like the special drawing right –SDR) under the governance of an international rather than a domestic body. In response, Martin Wolf, Jacques de Larosière, Kiyohiko G. Nishimura and Janet Yellen all noted that the blame for imbalances did not lie totally with the debtors. Both the Gold Standard and Bretton Woods had failed, in large part because those amassing reserves had failed to respond appropriately.

Against this background, Minister Christine Lagarde then made a number of practical suggestions as to how the functioning of the IMS might be improved, rather than altered radically. The aim of the G20, under Chairman Nicolas Sarkozy, should be to "turn a jungle into a park". While there was no time for any detailed analysis of her proposals, there seemed to be general agreement with the proposition made initially by Martin Wolf in his opening statement. Namely, that the core requirement is to impose some form of international discipline on both the United States as debtor (exempted for now by its reserve currency status) and on China and others (exempted for now by being creditors).

Both Olivier Blanchard and Jacques de Larosière suggested greater efforts to convince creditors that international cooperation was in their own best interests over the longer term. Olivier Blanchard focused on domestic reforms (reducing "distortions") that would not only ease international tensions but also raise domestic living standards. Jacques de Larosière (and William White from the floor) made the traditional and most powerful argument for cooperation; namely, when debtors cannot pay, creditors

don't get paid. Jean-Claude Trichet expressed the view that this logic would eventually prevail. However, others seem skeptical that it would do so in time to prevent a further stage of the crisis from unfolding. In the corridors, fears of protectionism and of a possible dollar crisis seemed equally shared.

While most of the conference had to do with future reforms, there were many passing references to how we might unwind existing imbalances in an orderly way. Most of these suggestions focused on international trade imbalances. The recommendations made were quite traditional; namely, deficit countries must increase saving rates while creditor countries must decrease them. Movements in nominal exchange rates would then also be desirable to provide incentives for appropriate resource reallocations between the tradable and non-tradable sectors. Indeed, giving that many creditor EMEs are already producing at full capacity, lowering their national saving rate without nominal exchange rate appreciation would seem an invitation to increased inflation. A number of commentators also noted the important role that financial reforms could play in supporting global rebalancing.

As already noted in the discussion of Sessions 2 and 3, a number of participants feared another significant downturn going forward. Not only did underlying imbalances remain large, but there were also good reasons to doubt the effectiveness of traditional stimulative macroeconomic policies. This raised the issue of what else might be done to facilitate exit from the crisis? Kenneth Rogoff had broached this issue early in the day by noting that there had been an excessive use of debt instruments in the lead up to the crisis. If many of those who issued debt, had instead issued equities (or some other instrument with a state-contingent payout), then there would have been a more generalised sharing of risks. This would have helped avoid the disruptive effects of bankruptcy, in the face of unbearable debt service commitments, that we now have to deal with.

Kenneth Rogoff's suggestion leads naturally to the next question. Given that there has been an excessive reliance on debt, should it now be made easier to reduce existing debt levels than is currently the case. Jacob A. Frenkel, Olivier Jeanne, Kenneth Rogoff and Nouriel Roubini all felt this issue should now be squarely on the table. Households that cannot pay imply still more banks that cannot pay. And more banks that cannot pay imply still more sovereigns that cannot pay. There seemed general support for the view that we need to find better ways to reduce excessive debt burdens while preserving as much value as possible.

Finally, it was noted that debt service burdens can also be alleviated by a faster rate of economic growth. Over the years, the OECD has suggested a wide variety of structural reforms²⁷ that could make a material contribution to increasing factor inputs and also the rate of growth of total factor productivity. With time, new opportunities for profit provided by such reforms would also lead to higher aggregate demand as both investment and labour incomes rose. Evidently, in the current environment of household and financial sector deleveraging, the benefits of structural reform will emerge only slowly. This should not, however, dissuade governments from taking the beneficial actions required.

27 See in particular the regular publication "Going for growth" OECD (2010).

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The relationship between capital flows and financial development: a review of the literature

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As international financial integration has progressed, the developed economies have tended to be net importers of capital. This phenomenon, which accelerated in the first half of the 2000s, may be partially explained by the relatively higher level of financial development in the advanced economies. Understood as the capacity of an institutional framework to reduce the informational frictions and transaction costs weighing on contract formation, financial development could also help to explain the composition of the external asset portfolios of different countries. However, the difficulty of measuring “financial development” makes these theoretical suppositions difficult to verify empirically.

Looking at the relationship from the other side, we see that the capital account liberalisation does, in effect, tend to speed up financial development. Unlike the predictions of theories based on political economy, the empirical studies show that simultaneous trade liberalisation is not a necessary pre-requisite for this positive effect. Moreover, the capital account liberalisation in developing countries does not systematically trigger a narrowing of the gap with advanced nations in terms of financial development. Since freedom of capital movement leads to flows of capital from developing countries towards advanced countries, we may consider that the latter enjoy relatively greater wealth accumulation which allows them to overcome the frictions hindering financial relations. If this is true, then the capital account liberalisation could theoretically entrench the gaps between countries in terms of financial development.

Key words: capital flows, international financial integration, financial development

JEL codes: F21, F36, G29

Since 2009, there has been a net capital outflow of capital from advanced countries. However, over a longer period, the reverse phenomenon was observed. In fact, since the beginning of the eighties, the advanced countries, and primarily the United States, were the main net importers of capital at a global level.

Besides the direction of the capital flows defying the standard economic theory, the processes of capital account liberalisation and international financial integration have been accompanied by increasingly substantial current account imbalances. The relative differential in terms of financial system development between emerging countries and advanced countries has often been cited as a possible cause for these phenomena.

This study reviews the literature on the relationship between capital flows and financial development. Can the fact that the advanced countries were net importers of capital for so long be attributed to their higher level of financial development? Conversely, we may also ask whether capital flows have an impact on the financial development of net capital importing countries. Does the capital account liberalisation have a beneficial impact on financial development? Or do internal frictions on financial markets need to be eliminated before a capital account is opened in order to avoid a sub-optimal allocation of financial flows? If so, capital controls might seem temporarily justified.

I | The limits of neo-classical theory: financial development as a determinant of capital movements

According to neo-classical theory, developing countries tend to be net importers of capital in the long run.

Schematically, the level of a country's production, over a given period, is positively dependent on the quantity of work used and the stock of available capital. At long-term equilibrium, the neo-classical growth model postulates that the interest rate is equal to the marginal productivity of capital. A priori, "poor" countries produce with a higher labour/capital ratio. According to the law of diminishing returns, under autarchy, the marginal productivity of capital (and therefore its return) is higher in a developing country than in an advanced economy.

In the neo-classical model, as countries gradually liberalise financial flows, capital should flow from advanced countries towards developing countries, until the additional investment in capital in these countries equalises the marginal returns on capital between countries and makes the

labour/capital ratios converge. During the convergence process, we should therefore observe current account deficits in the emerging countries, financed by the net inflows of capital from advanced economies.

However, for most of the past 30 years, the opposite has been true with net capital flowing into the advanced economies.

Lucas (1990) showed that the mechanism described by neo-classical theory did not correspond to the observed data. The Lucas “paradox” is based on the observation that, over the long term, financial flows tend to flow towards the rich countries, despite the fact that the advanced countries theoretically have a lower productivity of capital than the poor countries. Originating mainly from the emerging economies in Asia and directed principally towards the United States, the transfer of private capital towards the advanced economies accelerated in the first half of the 2000s (Prasad, Rajan and Subramanian, 2007; Mendoza, Quadrini and Rios-Rull, 2009).

A counter-intuitive relationship between the level of productivity and the direction of international capital flows has also been corroborated within the group of developing countries (i.e. excluding advanced countries from the picture). Labelled “capital allocation puzzle”, this phenomenon has been empirically observed, for example, by Gourinchas and Jeanne (2009) who find that capital tends to flow towards the emerging countries with relatively weaker growth of total factor productivity (for example, South Korea) than towards the less advanced developing countries where the growth of total factor productivity is theoretically stronger (for example, Madagascar).

So, why, in net terms, are developing countries acting as lenders to the advanced economies?

Apart from differences in the type of capital utilised (low productivity human capital and the predominance of land as a factor of production in the least advanced countries),¹ the existence of market frictions could explain the fact that the majority of the capital in the developing countries is financed by domestic investments.² In particular, Lucas (1990) suggests a political risk: with the coercive power of the old colonies no longer at play after decolonisation, contract enforcement in developing countries has been weakened.³

Gertler and Rogoff (1990) and Reinhart and Rogoff (2004) propose another variant of political risk: excessive public debt, past episodes of default and bad sovereign debt ratings limit the access of domestic

¹ *The law of diminishing returns implicitly assumes homogenous production factor quality. However, for a given stock, the structural characteristics of different countries can “impair” the quality of the capital, reducing its productivity and the attractiveness of developing countries.*

² *For example, Aizenman, Pinto and Radziwill (2004) show that most of the capital stock in developing countries is self-financed.*

³ *Regarding the question of the relationship between the legal framework and financial development, see La Porta, López de Silanes, Shleifer and Vishny (1997).*

companies to international capital markets, even when they are in good health. The capital therefore remains in the rich countries, even if the theoretical opportunities for investment are far from exhausted in the poorer countries.

In a framework of uncertainty and asymmetries of information, the model developed by Mendoza *et al.* (2009) explicitly associates financial development with the degree of contract enforceability. The financial development of a country is defined as the capacity of its institutional framework to facilitate verification of the actions of resident financial intermediaries, which in turn facilitates the execution of contracts. A priori, a better legal framework should allow resident agents in advanced economies (the United States for example) better disciplinary control over the intermediaries managing their savings. In less transparent environments, such as those which often characterise developing countries (China for example), the agents with a lending capacity are exposed to a relatively higher level of moral hazard risk by the local financial intermediaries. A higher degree of uncertainty encourages the residents of developing countries to make additional precautionary savings.

According to Mendoza *et al.*, financial under-development makes it difficult for local residents to protect their future consumption from the risk that their national financial intermediaries will misallocate part of the investment income without the lenders knowing. For a given level of domestic investment, capital outflows from developing countries can be explained by a surplus supply of savings resulting from the incompleteness of their domestic financial markets. The idea of a precautionary savings, explaining the current account surpluses of countries with weaker levels of financial development, is also advanced by Hubbard (2006) and Prasad, Rajan and Subramanian (2006).

In addition to the net external position, the heterogeneity of the level of financial development can also affect the composition of asset portfolios across different countries.

For example, the proportion of Foreign Direct Investment (FDI) in financial inflows is a priori higher in countries with a low level of financial development. Hausmann and Fernandez-Arias (2000) advance this idea arguing from the asset supply standpoint (i.e. demand for financing). In the same way that companies are created to internalise market transaction costs,⁴ FDI tends to predominate where debt markets are inadequate or non-existent. Indeed this observation helps us to understand the abundant flows of FDI to the large countries of Latin America during the 1990s. Given the opportunity cost of arranging financing on shallow domestic financial

⁴ Cf. Williamson (1985).

markets, local companies chose to sell substantial capital stakes to foreign investors with access to less volatile sources of financing, originating from advanced economies.

Mendoza *et al.* (2009) argue from the standpoint of the demand for assets. The difficulty of verifying the correct execution of financial commitments prompts lenders in developing countries to seek non-contingent contracts, i.e. assets generating an income that does not depend on the profitability of the project financed.⁵ This explains, for example, why the external asset portfolios of emerging Asian countries are mainly composed of lower-risk debt instruments (notably dollar deposits and Treasury bonds). On the other hand, residents of the advanced economies can afford to hold contingent contracts, such as equities, requiring a higher degree of market completeness and paying a risk premium. Indeed Mendoza *et al.* observe that – concurrent with international financial integration and up until 2005 – the United States cumulated long external positions in relatively high-risk and high-yield assets (FDI and portfolio investments), financing their current account deficit with debt instruments.

However the supposition that differences in the level of financial development of countries have influenced the direction of capital flows seems difficult to corroborate empirically.

Hausmann and Fernandez-Arias (2000) analysed the impact of financial development (measured by outstanding loans to the private sector and by country risk) on the volume and composition of average inflows in nearly all of the countries between 1996 and 1998. This analysis brought to light two results: the total volume of capital inflows is positively related to the country's degree of financial development; however FDI flows towards countries with the least developed capital markets, corroborating the notion that foreign direct investment tends to substitute incomplete markets.

In the panel analysis conducted by Gruber and Kamin (2009), the quantity variables traditionally used to measure financial development⁶ (ratios over GDP of loans, market capitalisation, bond market capitalisation, total volume of stock market transactions, etc.) often appear weakly significant. Between 1997 and 2006, this type of variable cannot explain either the current account surpluses in emerging countries or the current account deficit in the United States. Alternatively, the degree of financial development can be represented by price variables: higher average yields-to-maturities reflecting a priori a lower level of financial

⁵ In Mendoza *et al.*'s model, the execution of contracts depends on financial intermediaries resident in the countries from which the capital originates and via which the domestic lenders invest abroad. Implicitly, the model represents these intermediaries as investment funds that, unlike banks, do not transform the nature of the contracts. It is therefore more expensive in developing countries than in advanced countries to verify that the income paid by the intermediaries who place savings abroad corresponds to the return on the projects financed.

⁶ On the proxy variables capable of representing financial development, cf. Beck, Demirgüç-Kunt and Levine (2000).

development. However, this measure does not explain the magnitude of the US current account deficit compared with that of other advanced economies with equivalent levels of financial development.

To what extent can the incapacity of the standard neo-classical theory to predict long-term capital movements be explained by different levels of financial development? Ultimately, the results suggest that there is only a fragile⁷ relationship between observed balance of payments imbalances and different levels of financial development in different countries. Nevertheless, we note that the empirical measures generally used (such as private sector credit ratios or stock market capitalisation) do not necessarily represent financial development as it is defined in the theoretical models (i.e. the capacity of the domestic institutional framework to attenuate various types of informational frictions and to facilitate the execution of financial contracts).

2| The long-term effect of capital inflows on financial development: a controversial question

Empirical studies tend to show that foreign capital is attracted to developing countries with relatively low growth and low potential return on investment rates (Gourinchas and Jeanne, 2009), with the level of financial development being one factor possibly explaining this “paradox”. This does however beg the question of the causality in this negative correlation between capital inflows and economic growth. Is it possible that the availability of external capital actually hinders the growth of developing countries?

A review of the studies on the subject by Kose, Prasad, Rogoff and Wei (2006) revealed the difficulty of highlighting a positive effect from international financial integration on economic growth. Prasad, Rajan and Subramanian (2006) show that the developing countries which relied the most on external capital are those with the weakest long-term growth rates (again contradicting the standard theory), whereas the advanced economies that received the most capital grew even faster. In fact, the impact of opening the capital account on economic development appears to depend on the quality of the country's institutional framework (Klein, 2005). More precisely, Klein and Olivei (1999) suggest that the effect on growth of foreign capital inflows tends to be positive in the industrialised countries because opening the capital account contributes to enhancing the depth of their domestic financial markets.

7 According to Gruber and Kamini (2009), emerging countries' recurrent external surpluses in the 2000s can largely be explained by precautionary savings by emerging Asian markets after the 1997-98 crisis and the increase in oil revenues received by oil exporting countries.

In what ways can opening the capital account favour a country's financial development?

The question of the impact of capital account liberalisation on financial development is part of the debate on the appropriate sequence for liberalisation policies. McKinnon (1991) argues that the opening should be sequential, i.e. first commercial, then financial. By contrast, Rajan and Zingales (2003) suggest that only simultaneous opening to commercial trade and to international financial flows can lead to internal financial development. This hypothesis is founded on the observation that between 1913 and 1999, financial development was not a linear process. Countries following fairly similar economic development patterns can have very different paces of financial development, by whichever indicator it is measured.⁸

The process of external openness is essentially a “political economy” issue, and is often determined by governments yielding to the pressures of various interest groups (O'Rourke and Williamson, 1999). Rajan and Zingales distinguish two local interest groups: the financial and the industrial incumbents. Generally, the benefits for new opportunities, created by international trade on the one hand and capital openness on the other hand, do not offset the economic rents (monopolistic, informational, etc.) that the two interest groups derive from an economy that is closed on both counts.

Blocking the entry of merchandise and inflows of capital prevents the establishment of foreign financial intermediaries whose sources of financing are generally external. This allows local groups to operate without competition. In such a closed environment, industrial groups can reinvest their monopolistic profits and have a limited need for funds, which can be satisfied by local financial intermediaries. The latter establish opaque financial relations with their clients, often via unofficial agreements based on guarantees and the reputation of local companies and generally benefiting from funds that are “subsidised” by various financial repression mechanisms (e.g. ceilings on lending and borrowing rates in exchange for government directed credit policies).

The removal of barriers to external capital movements generally has the effect of imposing macro-prudential constraints on the government, which is forced to abandon financial repression and directed credit policies.⁹ In effect, for the best interests of both groups to converge, the capital account liberalisation must be accompanied by trade liberalisation.

⁸ Rajan and Zingales (2003) use financial development indicators for both the banking sector (private sector deposit and credit ratios) and for the capital markets (equity issuance, market capitalisation ratios on capital formation, number of listed companies).

⁹ Kaminski and Schmukler (2002) present a very complete chronology of the sequence of financial liberalisation and capital account liberalisation in a large number of advanced and developing economies. The end of financial repression seems to exacerbate credit cycles in the period immediately following reforms, but in the longer run it enhances the institutional framework (transparency, contract enforcement, etc.).

External competition increases the financial requirements of the industrial group, which no longer has access to its former economic rents and is forced to intensify its investments to defend its market share. No longer having access to “subsidised” government funds brokered by the domestic financial sector, the major local companies are prompted to raise external capital at market rates. To offset the loss of a segment of its clientele, the local financial group re-focuses its business towards a category of “non-established” young enterprises, usually smaller, less well-known and lower capitalised. No longer able to rely on guarantees and long-term relations, the local financial groups perceive the interest of improving the transparency of the institutional framework and its capacity to enforce financial contracts, thereby contributing to the financial development of the country concerned. This process effectively forces national financial intermediaries to improve their skills (risk assessment, monitoring, etc.) and they gradually find profitable investment opportunities abroad, which makes them increasingly disposed to accepting competition from new players on their domestic market (Rajan and Zingales, 2003).

The empirical work of Chinn and Ito (2006) on more than a hundred advanced and developing countries between 1980 and 2000 confirms Klein's supposition: the removal of capital movement restrictions contributes to a deepening of the stock market as long as a minimum level of development of the institutional and legal framework has been reached. Moreover, trade liberalisation would appear to be a pre-requisite condition for the capital account liberalisation, thus conforming McKinnon's conclusions (1991). Lastly, development of the banking sector precedes that of the stock market.

Covering a similar period (1980-2003) and 42 developing countries, the results of the study by Baltagi, Demetriades and Hook Law (2009) only partially corroborate the hypotheses of Rajan and Zingales: whether conducted simultaneously or sequentially, trade liberalisation and the lifting of capital movement restrictions have positive effects on financial development (in terms of bank lending and market capitalisation).

The phenomenon described by the Lucas paradox tends to be self-reinforcing when the level of financial development is not completely exogenous to the accumulation of wealth. Goldsmith (1969), McKinnon (1973) and Levine (2005) argue that there is a positive correlation between financial development and economic development. On this basis, Gertler and Rogoff (1990) and Boyd and Smith (1997) suggest that the increase in a country's wealth contributes to mitigating agency problems resulting from asymmetries of information between national borrowers and lenders.

To understand this idea, we can think of the wealth of a country as its stock of productive capital. In advanced economies, where production is

relatively capital intensive, companies have a higher average level of net wealth than companies operating in developing countries. Consequently, the higher value of the guarantees offered by agents seeking financing mitigates the information asymmetries and thereby reduces the counterparty risk for lenders (Matsuyama, 2005). In addition, companies in advanced countries may rely more heavily on internal financing (own funds), which allows national and foreign lenders to overcome costly state verification¹⁰ and reduce the number of borrowers likely to be rationed (Boyd and Smith, 1997).

The initial stock of capital therefore eases domestic financing constraints. In a context of international financial integration, private agents in advanced economies (with a relatively larger capital stock) have a comparative advantage in attracting external capital to finance their investments. Additional investment further raises the capital stock in these countries, and hence their level of financial development in what may be described as a virtuous circle.

If the dynamics suggested by Boyd and Smith (1997), Gertler and Rogoff (1990) and Matsuyama (2005) were verified, it would have two consequences:

- Poor countries would be less able to increase the efficiency of their financial systems. That would encourage the residents of rich countries to give preference to internal investments rather than exhausting the investment opportunities in developing countries. In spite of international financial integration, a positive correlation between savings and domestic investment (such as that observed by Feldstein and Horioka, 1980)¹¹ would then appear likely.
- The capital account liberalisation in developing countries¹² would amplify differences in terms of financial development, investment and economic growth. Freedom of international capital allocation would thus contribute to sustaining the financial, and hence economic, under-development of countries with lower capital stocks.

Further empirical research is needed to support these theoretical suppositions the implications of which, in terms of economic policies, may be controversial: the conclusions advanced by Boyd and Smith (1997) could notably justify the implementation by less advanced countries, of measures favouring FDI or which hinder inflows of capital having a more

¹⁰ Initially advanced by Townsend (1979) and Myers and Majluf (1984), costly state verification tends to increase companies' external financing constraints (their borrowing capacity as opposed to recourse to shareholder equity or cash flow). Costly state verification may be thought of as fixed audit costs incurred in valuing a company in the event of bankruptcy leading creditors to take control.

¹¹ Although later empirical studies tend to support the results obtained by Feldstein and Horioka (1980), they show a reduction in this correlation, particularly between OECD countries and above all within the euro area (Blanchard and Giavazzi, 2002).

¹² On proxies for measuring financial liberalisation, see for example Chinn and Ito (2007) and Lane and Milesi-Ferretti (2007).

volatile impact on the capital and net wealth of national companies, such as portfolio investments. According to this idea, a selective capital inflow policy favouring FDI would be desirable to promote the convergence of the capital/labour ratio and of the level of financial development towards those of industrialised countries. Otherwise, market mechanisms alone could trigger processes in which domestic investment dynamics, the accumulation of capital and financial development in advanced economies are mutually self-reinforcing, thereby widening the wealth gap between advanced and emerging countries.

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Households' savings and portfolio choices: micro and macroeconomic approaches

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The financial crisis provided a reminder of the crucial role that household savings and investment behaviour plays in financial balances. Additionally, investments and long-term strategic asset allocation are of prime importance to countries faced with population ageing. The international conference organised by the Banque de France in March 2011 took stock of household portfolio trends in Europe and the United States. Special attention was paid to the effects of the financial crisis, its consequences and the long-term challenges facing regulators, central banks, institutional and financial investors, and households themselves.

The papers presented show the impact of the crisis varied across countries, as well as within populations. The average loss of net wealth between 2007 and 2009 was huge, particularly in the United States, and principally affected the wealthiest households. Furthermore, certain households saw gains in their net worth over the same period. Wealth losses seem mainly to have reflected changes in asset prices, as household made few portfolio shifts.

The speakers at the conference also highlighted the crucial role of housing assets in household saving behaviour and in the transmission of asset price shocks.

Moreover, a number of studies focused on long-term financing. The role of the predictability of financial asset returns in long-term strategic asset allocation was addressed. Lastly, given the growth in savings invested in financial assets as a result of the increase in living standards, the development of financial innovation and the increase in individual responsibilities regarding long-term financing needs (pensions, healthcare, dependency, etc.), it seems essential for governments, as well as financial market players, to implement financial education policies and conduct public information campaigns.

Keywords: Portfolio choices, savings, housing, pensions.

JEL codes: E21, F36, G11, G22.

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On 24 and 25 March 2011 the Banque de France organised a conference entitled "Households' savings and portfolio choices: micro and macroeconomic approaches". The aim of the event was to give an overview of the savings behaviour of households by comparing the viewpoints of experts from central banks, academic researchers and institutional and financial investors.

As Christian Pfister (Banque de France) noted in his opening speech, the financial crisis has emphasised the risks to financial stability that may be associated with the composition of household net wealth (debt levels, housing, proportion of risky assets, etc.). But beyond financial stability issues, understanding the portfolio behaviour of households is essential for the conduct of monetary policy. For example, central banks need to assess the impact of changes in financial and housing wealth on savings and consumption, understand the changes in the formation of agents' expectations, and address the consequences of population ageing on long-term strategic asset allocation.

To answer these questions, assess the risks and define appropriate economic measures, we need to use complementary approaches, based on macroeconomic data on the one hand and individual data collected from households on the other, as Thomas Piketty from Paris School of Economics pointed out. The Federal Reserve System (Fed), for example, regularly conducts a survey on the wealth of US households and their savings and consumption behaviour (Survey of Consumer Finance). The Eurosystem is currently conducting the Household Finance and Consumption Survey (HFCS), a wide-ranging survey on the savings behaviour of European households, with initial results for the euro area as a whole expected for the end of 2012.

The originality of the conference lay in the wide variety of approaches presented: each of the three sessions examined from a micro and macroeconomic perspective trends in household wealth, the role of expectations in asset allocation choices, and pension-related matters. Three lectures were given by eminent experts: Arthur Kennickell (Fed) on the financial situation of US households, Annamaria Lusardi (NBER and Dartmouth College) on the role of financial literacy, and Luis Viceira (Harvard Business School) on the portfolio choices of high net-worth households. Two round tables were also held, the first on the impact of the financial crisis, providing an opportunity to compare the viewpoints of experts from financial institutions (banks and insurance firms) and institutional investors; and the second addressing the issue of the long-term financing needs of households (pensions, healthcare, dependency). The conference thus provided a forum to explore matters of direct interest to central banks, institutional and financial investors, general government and, more broadly, a large number of households. This article outlines the

main lessons drawn from the conference: the determinants of financial and housing portfolios, the effects of the crisis, and the issues linked to the long-term financing needs of households.

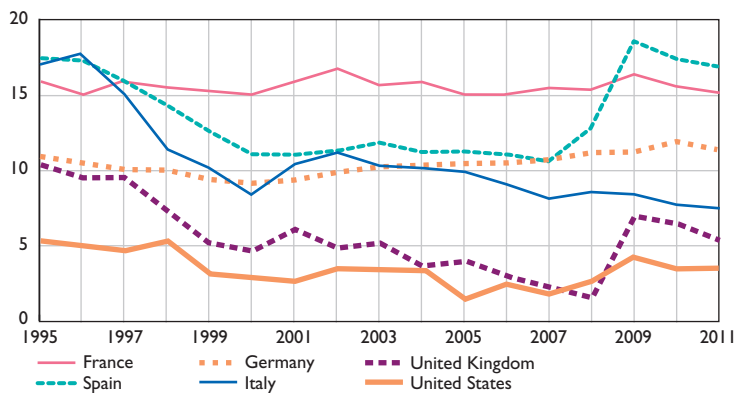
I | What do we know about household savings behaviour?

Household savings and portfolio choices play a key role in financing the economy worldwide. There are however major disparities across countries in terms of savings rates, the amount, and the composition of household wealth. France, for example, has one of the highest savings rates in Europe (15%). As a comparison, US households save less than 5% of their disposable income (Chart 1). On the other hand, only 20% of French households directly or indirectly owned equities in 2009,¹ against 50% of US households.² The housing component of wealth varies considerably: 58% of households own their main residence in France, compared to 68% in the United States and 83% in Spain.

Luis Viceira³ underscored the difficulties that economists face in explaining these asset allocations. He gave a list of the questions that still remain unanswered by research. Michael Scharnagl (Bundesbank)⁴ and Vladimir Borgey (Banque de France)⁵ gave an overview of the

Chart 1 Changes in savings rates in Europe and the United States since 1995

(as a %)



Source: OECD.

1 Source: 2009 Wealth Survey (INSEE).

2 The proportion of households owning equities is even lower in Germany (17%), Italy (15%) and Spain (14%).

3 Viceira (2011): "Investment decisions of high net worth households"

4 Ramb and Scharnagl (2011): "Households' portfolio structure in Germany"

5 Avouyi-Dovi, Borgey, Pfister and Sédillot (2011): "An empirical analysis of portfolio choice in France"

long-term financial portfolio dynamics in Germany and France. Lastly, Olympia Bover (Banco de España)⁶ addressed the housing component of wealth in her analysis of the determinants of housing purchasing decisions in Spain.

||| Unsolved puzzles

As an introduction to his paper, Luis Viceira stressed that better knowledge of agents' portfolio behaviour must be based on an in-depth description of behaviour patterns and from normative research aiming to provide an understanding of household portfolio choices (see Campbell, 2006)⁷. When considering these two aspects together, it emerges that household behaviour differs from the predictions of "standard" theoretical models (lifecycle hypothesis, portfolio choice theory, etc.). One of the best-known examples of this divergence is the equity premium puzzle: while models show that household portfolios should be perfectly diversified and include a share —however small— of risky assets, we observe heterogeneous and often low equity ownership rates across countries.

To solve these "puzzles", the recent theoretical literature has developed along two lines.

- Furthering our knowledge of individual behaviour by highlighting certain cognitive biases. Behavioural finance has attempted to include psychological aspects that are absent from the standard models.
- The idea that faced with the complexity of the economic environment, individuals make mistakes and are not able to make decisions in line with their preferences. This complexity stems from the difficulty of planning long-term investment sequences and from financial market imperfections. The latter may be the result of many factors: the illiquid nature of certain assets, credit constraints, the complexity of financial products or tax systems, etc.

These two explanations are not mutually exclusive, and there are interactions between behavioural psychology and changes in the economic environment.

⁶ Bover (2011): "Housing purchases and the dynamics of housing wealth".

⁷ Campbell (2006): "Household finance", *Journal of Finance*, Vol. LXI, No. 4, pp. 1553-1604.

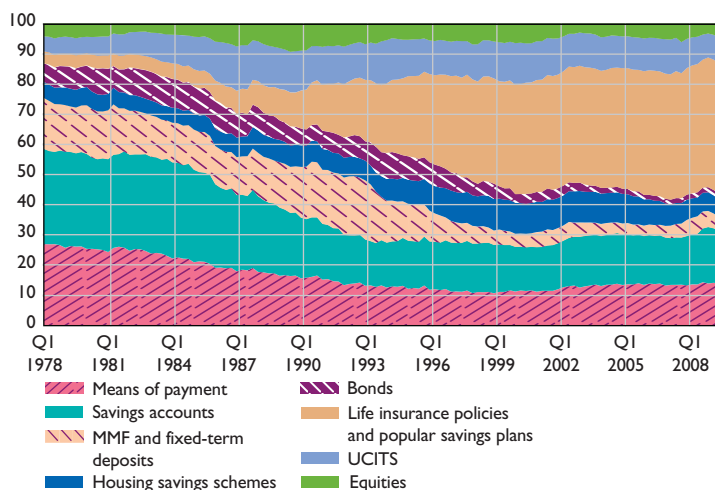
I|2 Changes in household financial wealth: the example of France and Germany

In descriptive terms, it appears that the structure of portfolios has changed over the long term. In particular, the share of life insurance policies and pension funds in French household portfolios has grown sharply over recent decades (Chart 2). Similar trends have been observed in Germany.

This shift can be explained by several determinants of households' choices: yield differentials between assets, taxation, the liquidity of assets, etc. It may also reflect adjustments related to financial innovation over the period (development of new savings products, etc.) or structural changes such as population ageing. This observation was the starting point for the papers presented by Michael Scharnagl and Vladimir Borgy, based respectively on German data (1959-2009) and French data (1978-2009). Both their studies use a common methodology, the FAIDS model.⁸ In particular, this model makes it possible to identify the complementarity or, conversely, the substitutability between different financial assets and to take account of macroeconomic factors in a unified, coherent framework. In both countries the results highlight the significant influence of demographic developments

Chart 2 Changes in the structure of households' financial portfolios in France (1978-2009)

(as a %)



Source: *Avouyi-Dovi, Borgy, Pfister and Sédillot (2011)*.

⁸ This model has its origins in the Almost Ideal Demand System (AIDS) proposed by Deaton and Muellbauer (1980), adapted to financial asset demand systems notably by Barr and Cuthbertson (1991).
Barr and Cuthbertson (1991): "Neo-classical consumer demand theory and the demand for money", *Economic Journal*, 101 (407), pp.855-876.
Deaton and Muellbauer (1980): "An almost ideal demand system", *American Economic Review*, Vol. 70 (3), pp. 312-326.

on portfolio structures. With the French data for example, we observe that the growth in the proportion of people aged over 65 has had a negative impact on ownership of risky assets (equity owned directly or via UCITS, mainly) and has benefited bond and life insurance investments. This is in line with academic literature: an ageing population should increase the proportion of risk-free liquid holdings and reduce the share of risky assets.

The discussion by Jérôme Glachant (University of Évry-Val d'Essonne) focused on the modelling choices adopted in the two studies. In particular, he recalled the main differences between the FAIDS model and the expected utility hypothesis, which is more widespread in the literature.

I | 3 The role of housing

As Jean-Paul Redouin, first Deputy Governor of the Banque de France pointed out, changes in the housing component of wealth is a key area of study for central banks: this component generally represents a large share of household wealth (more than 50% in France) and the changes in prices in this sector is an essential component of financial balances.

Housing has very different characteristics from those of financial assets. It is specific in that it is both a durable consumer good (satisfying present and future housing needs) and a capital good (contributing to portfolio diversification but also to portfolio risk). The low liquidity of this asset and its durability also give it a particular status in the household portfolio. Furthermore, households' housing purchases are most often financed by bank loans and usually require a downpayment. Lastly, the role of housing as collateral in loan transactions seems to have been decisive in the way the crisis unfolded in the United States (see Duca, Muellbauer and Murphy, 2010).⁹ For households, property plays a major role in asset allocation choices.

It thus covers the whole spectrum of motives for saving:

- precautionary motive, because homeownership protects against the uncertainty of rent developments;
- retirement motive, as it provides a dwelling for old age and, if sold, helps finance post-retirement consumption;
- bequest motive, because it is an asset that can be passed on to offspring and constitutes the bulk of many inheritances.

⁹ Duca, Muellbauer and Murphy (2010): "Housing markets and the financial crisis of 2007-2009: Lessons for the future", *Journal of Financial Stability*, Vol. 6(4), pp. 203-217.

An analysis of the determinants of housing purchases in Spain was presented by Olympia Bover. She based her study on a survey carried out by the Banco de España on Spanish households since 2002.¹⁰ It aims to identify the determinants of the property purchase prices, and those of the year in which these purchases took place. What makes the study original is that it looks at property transactions themselves, rather than housing stock or house prices. The results highlight the impact of expected future housing returns on the decision by households to purchase dwellings. Expectations mainly influence the amounts invested (property investments are larger when households expect a rise in future returns) but they do not appear to change the purchase date. The conclusions are similar irrespective of the nature of the property acquisition: main residence, second home, or buy-to-let.

Anne Laferrère (INSEE) outlined the specific features of the Spanish property market: more than 80% of households own their main residence, and second homes represent a large proportion of housing stock (around one-third). She underscored the close match between these factual elements and the econometric model used in the paper. The main suggestion concerned the measurement of expectations: more disaggregated measures at the individual level (taking account, in particular, of the impact of individuals' education on the formation of their expectations) would be useful to confirm the results achieved.

2| Impact of the crisis on household savings: initial findings

The conference provided an initial opportunity to take stock of the impact of the crisis on household wealth and public policies to protect savers and regulate the markets.

The lecture given by Arthur Kennickell¹¹ and chaired by Thomas Piketty revealed the contrasting effects of the crisis within the US population. The diagnosis of the behaviour of US households was supplemented by an analysis of the portfolios of high net-worth households, presented by Luis Viceira.¹² Frédérique Savignac (Banque de France)¹³ presented a study on the impact of changes in housing and financial asset prices on household consumption in France. A round table chaired by Edouard Vieillefond (Autorité des marchés financiers –AMF) started with a lecture by Annamaria Lusardi on her work on the financial literacy of households,

¹⁰ This survey (*Encuesta financiera de las familias, EFF*) is integrated into the Eurosystem's Household finance and consumption survey (see Insert 1).

¹¹ Kennickell (2011): "Tossed and turned: distributional shifts in the United States 2007-2009".

¹² Viceira (2011): "Investment decisions of high net worth households".

¹³ Arrondel, Savignac and Tracol (2011): "Wealth effects on consumption plans: French households in the crisis".

after which Olivier Garnier (Société Générale), Philippe Trainar (SCOR) and Benjamin Dubertret (Caisse des dépôts et consignations) described their experience of asset management against the backdrop of the recent financial crisis.

2 | I Contrasting effects in the US population

The first results of the 2009 Survey of Consumer Finances (SCF) conducted by the Fed (Box 1) were presented by Arthur Kennickell. He recalled that, in the United States, net household wealth diminished by 20% on average between 2007 and 2009.

The data collected on households indicate that this drop affected all levels of wealth. However, they also revealed that this average effect masks major disparities within the US population. While the majority of households (62.5%) suffered heavy losses, others (around 36.8%) recorded gains. In 2009, the median losses (respectively gains) were calculated at 41.5% of household net wealth in 2007 (respectively 32.8%). The households that saw their net wealth rise over the period include owners of corporate assets (CEOs) whose businesses were in high-growth sectors. The overall drop in net wealth essentially stems from the losses incurred by those households that were among the wealthiest 1% of the population. These households, which owned one-third of the overall net wealth (in both 2007 and 2009), saw an average drop in their net worth from USD 9 million to USD 6.9 million between these two dates. These losses account for half of the overall drop in total net household wealth. Arthur Kennickell also stressed that equity ownership rates¹⁴ varied little between 2007 and 2009. More than half of all households did not reallocate assets within their portfolio. Debt levels were constant (around two-thirds of US households have one or more loans) and the homeownership rate was stable (ranging from 50% for the least wealthy half to 100% among the wealthiest 1% of households). An analysis of the Fed survey shows that the changes to the wealth structure between 2007 and 2009 were mainly due to the changes in asset prices. Lastly, US households reported that they were generally more cautious in 2009: the majority of them said they wanted to increase their precautionary savings and restrict their risk-taking.

¹⁴ This is the percentage of households in the US population that own a particular asset.

Box I**Analysing households' savings and portfolio choices using individual data**

Two key characteristics of wealth should be considered when analysing the savings behaviour of households. First, the distribution of overall wealth is concentrated in certain households: the wealthiest 1% own one-third of overall wealth in the United States, while this proportion is approximately one-quarter in France. Second, the range of housing, financial and corporate assets, as well as debt, varies across households: the trends observed at macroeconomic level may thus be the result of the situation of certain subpopulations, as was the case of certain indebted US households during the financial crisis. To understand these phenomena, individual data collected from households via representative surveys are required. The conference provided an opportunity to raise the methodological questions related to the collection of these data. Arthur Kennickell (Fed), who discussed his experience in this area using the American Survey of Consumer Finances. Michael Ehrmann (European Central Bank –ECB), gave details of the survey currently underway in the Eurosystem, the Household Finance and Consumption Survey.

The Fed survey: Survey of Consumer Finances (SCF)

Every three years since 1983, the Fed has conducted a survey on the wealth of US households (housing, financial, corporate and pensions) and their level of debt. After the crisis, the households surveyed in 2007 were contacted once again in 2009 in order to allow a more in-depth assessment of the changes in their finances.

The Eurosystem survey: Household Finance and Consumption Survey (HFCS)

A harmonised household wealth survey was launched in 2008 in euro area member countries. The purpose of the survey is to analyse the savings behaviour of households, their portfolio choices, their indebtedness, their pensions, etc. These data will allow international comparisons and the construction of aggregated indicators for the area as a whole. In the future, they will be made available to researchers.

The survey is based on existing ones in other countries: the SHIW (Survey on household income and wealth) by the Banca d'Italia, the EFF (Encuesta financiera de las familias) by the Banco de España, and the Wealth Survey by INSEE, with which the Banque de France was associated for the 2009 edition.

Detailed information is available on the ECB website:
http://www.ecb.int/home/html/researcher_hfcn.en.html

Luis Viceira threw further light on the portfolio choices of the wealthiest US households. As mentioned previously, to understand overall changes in wealth structure it is important to analyse the high net-worth categories of the population. Luis Viceira used individual data supplied by a company specialising in high net-worth asset management (the average net worth of the households considered was USD 13 million). These households present certain characteristics that may have specific effects on their portfolio behaviour: financial assets account for the majority (between 60% and 80%) of their wealth. Their portfolios are highly diversified with all types of financial assets included and a very wide variety of products. One of the main findings of the analysis of these portfolios over the period 2000-2009 is their great stability. The average portfolio composition is: 30% fixed-income securities (bonds), 50% listed shares, 10% hedge funds, and 10% venture capital and risk capital funds. This stability suggests that tax reasons come into play: this breakdown does not appear to change with shifts over time. However, one notable change was observed at the end of 2008, with a significant drop, to 20%, in the share of equities in financial assets. This reflects the price trends on the financial markets; households do not seem to have reallocated their assets during the crisis.

2 | 2 In France, limited wealth effects on consumption but more pessimistic expectations

With the recent financial crisis, households in France had to cope with greater uncertainty surrounding changes in property and financial asset prices. Indeed, house prices fell by 7% in 2008 after rising regularly over the previous decade (50% in 10 years). At the same time, the financial markets experienced a spectacular drop starting from December 2007 (-40% in 2008).

The study presented by Frédérique Savignac addresses the impact of these asset price changes on household consumption behaviour. The lifecycle hypothesis postulates that households smooth their consumption throughout their lifecycle thanks to their savings. In the event of unexpected shocks to their wealth, they can revise their consumption plans. Although this question has often been addressed using aggregated data (see Chauvin and Damette, 2010),¹⁵ this study was the first in France to be conducted using individual data. In the first part, the authors consider the 2009 INSEE Wealth Survey (Box 1) to assess the quantitative impact of wealth on consumption. A limited but significant impact is found: each extra euro of wealth adds 0.3 cent to annual consumption. This assessment is consistent with previous studies using macroeconomic data. The use of

¹⁵ Chauvin and Damette (2010): "Wealth effects: the French case", Working document of the Banque de France, No. 276.

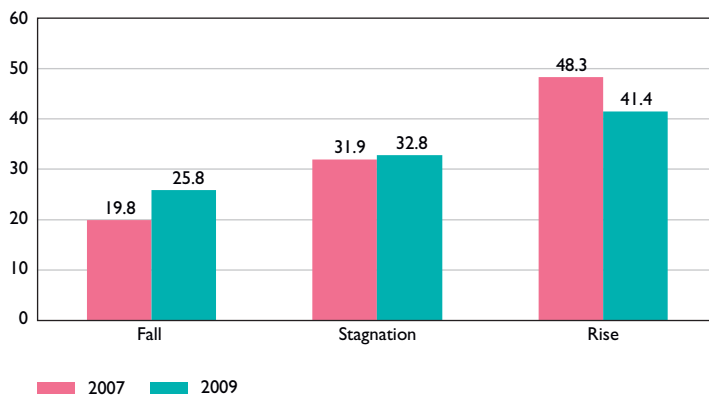
individual data also allows us to identify wealth effects that differ according to the composition of household portfolios: financial wealth only plays a significant role in the consumption of equity owners, and these households are the most sensitive to financial market developments.

In the second part the authors use the PATER survey¹⁶ which gives, in particular, direct information on the expectations of the households

Chart 3 Trends in household expectations in France between 2007 and 2009

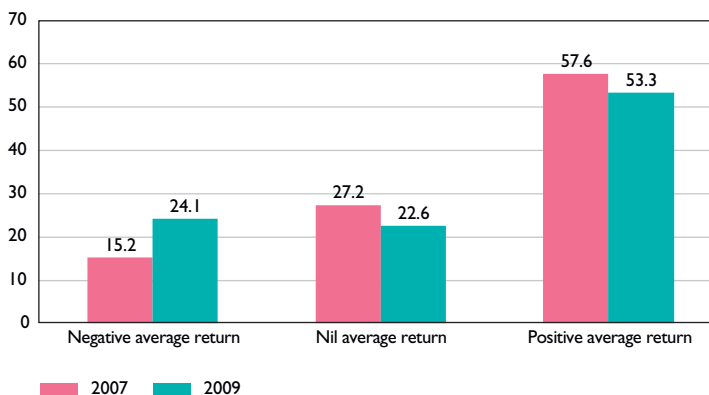
(as a %)

Expected changes in household income over the next 5 years



Interpretation: In 2007, 19.8% of households on average thought their income would fall over the next 5 years.

Expected stock market returns over the next 5 years



Interpretation: In 2007, 15.2% of households thought the stock market would fall over the next 5 years.

Source: Arrondel, Savignac, Tracol (2011).

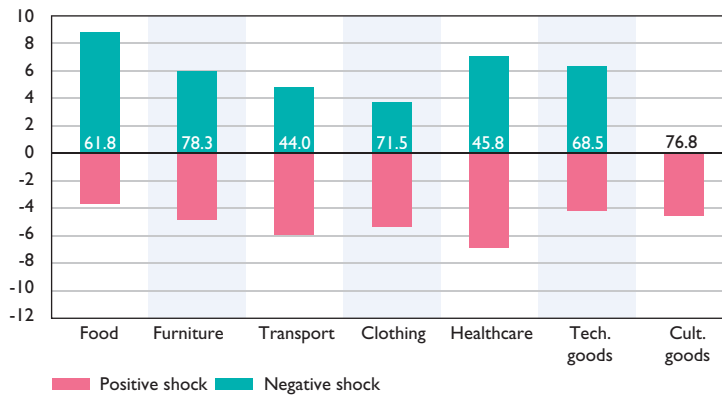
¹⁶ PATER standing for Préférences et Patrimoines face au temps et au risque, first wave conducted by the INSEE as a supplementary module in the Wealth Survey, then a survey renewed at the initiative of Luc Arrondel (Banque de France and CNRS-PSE) and André Masson (CNRS-EHESS), by the TNS Sofres institute, in the form of a postal questionnaire. The 2009 edition comprises a sample of 3,783 representative households.

surveyed in 2007 and 2009. Their results suggest that households became more pessimistic after the crisis, about both the financial markets and their own income (Chart 3). A further analysis of wealth effects using qualitative data from the PATER Survey confirms the results of the Wealth Survey and also shows that household expectations partly explain their consumption behaviour. Lastly, the authors highlight the fact that these wealth effects do not affect all expenditures uniformly (Chart 4).

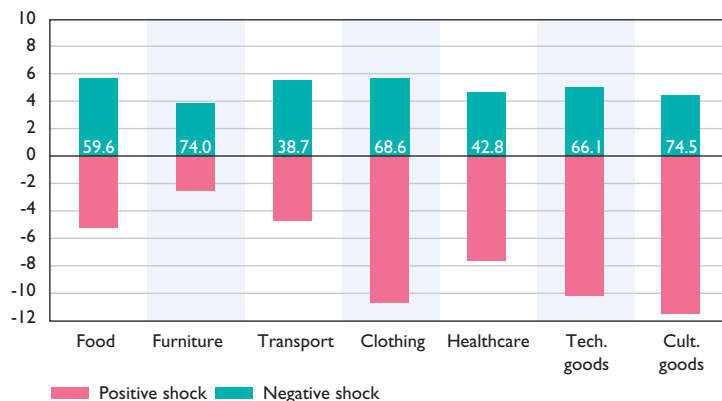
Chart 4 Impact of wealth gains/losses on the likelihood of reducing household expenditure

(in % points)

Housing wealth effect



Financial wealth effect



Interpretation: 61.8% of households whose housing wealth did not change over the previous two years reduced their food consumption during the crisis. Where their housing wealth was subject to a negative shock, this likelihood was 8.9 percentage points higher. Conversely, where their housing wealth was subject to a positive shock, this likelihood was 3.7 percentage points lower. Estimate: Econometric results of a simultaneous Probit model.

Source: Arrondel, Savignac, Tracol (2011).

Jirka Slacaleck (ECB) stressed the complementarity of these results with previous studies conducted with aggregated data. The discussion did however raise the issue of the limitations posed by the cross-sectional nature of the survey used for quantitative assessments, as this does not allow the changes in each household's wealth to be tracked over time.

2|3 What public policies after the crisis?

The difficulties that households face in a complex economic and financial environment have led governments to promote financial literacy via educational programs and information centres. The aim is to inform households so that they are able to make the correct decisions vis-à-vis their situation. In France, this drive is mainly conducted by the Institute for the Financial Education of the Public (IEFP) as well as by the Prudential Supervisory Authority (ACP) and the Financial Markets Authority (AMF), who have set up a joint public information service for questions relating to insurance, banking services and products, the stock market and investments.¹⁷ In the academic world, studies to assess financial literacy are being developed to assist in the implementation of public policies.

Annamaria Lusardi presented the key conclusions of her work on these subjects.¹⁸ Over the last ten years she has contributed to creating international surveys assessing the impact of financial knowledge on the choices made by households as regards savings, investments and debt. Similar information (Box 2) is for instance available for many countries. In most cases (United States, Japan, New Zealand, etc.) only 30% of the population seems able to answer simple questions about interest rates, inflation and risk diversification. Germany is an exception: more than half of German households answered all questions correctly, and they appear to be particularly conscious of inflation-related issues. Annamaria Lusardi stressed the need to raise public awareness in a context where individual responsibilities (in terms of saving for retirement, for example) need to be developed. As well as the information campaigns for which financial institutions are responsible, she recommends implementing educational programmes into the school curriculum and training sessions in the professional sphere.

Faced with financial stability risks and problems, institutional and financial investors have had to adapt their risk assessments and investments. At the same time, new studies are being carried out on how to regulate market activities and market players, in particular banks and insurance companies. These aspects were discussed at the round table devoted to the views of private and institutional players on the consequences of the crisis.

¹⁷ This is the 'Assurance Banque Épargne Info Service', see the website <http://www.abe-infoservice.fr/index.html>.

¹⁸ Lusardi (2011): "The role of financial literacy".

Philippe Trainar examined the multiple sources of risk and the difficulties encountered by professionals to understand them. Indeed, the events that may influence financial balances at different horizons are highly varied: political unrest and military conflict in certain regions of the world, a slowdown in the economy, risks of a pandemic, risks associated with climate change, technological risks linked to the emergence of nanotechnologies, etc.

Box 2**Financial knowledge of households**

From a methodological point of view, the idea behind the empirical studies on financial literacy is to use simple questions in representative surveys in order to identify the knowledge that households have of three key concepts: interest rates, inflation, and risk diversification. The questions most commonly asked in these surveys are illustrated below by those of Annamaria Lusardi:

Interest rates

Suppose you had USD 100 in a savings account and the interest rate was 2% per year. After five years, how much do you think you would have in the account if you left the money to grow?

- a) more than 102 dollars
- b) exactly 102 dollars
- c) less than 102 dollars
- d) don't know
- e) did not reply

Inflation

"Imagine that the interest rate on your savings account was 1% per year and inflation was 2% per year. After one year, with the money in this account, would you be able to buy..."

- a) more than today
- b) exactly the same as today
- c) less than today
- d) don't know
- e) did not reply

Diversification

Do you think the following statement is true or false? "Buying a single company stock usually provides a safer return than a stock mutual fund."

- a) true
- b) false
- c) don't know
- d) did not reply

He stressed the expertise of insurers, who are confronted on a daily basis with the assessment of tail risks (events that are highly unlikely to happen but with consequences that could be major, such as disasters).

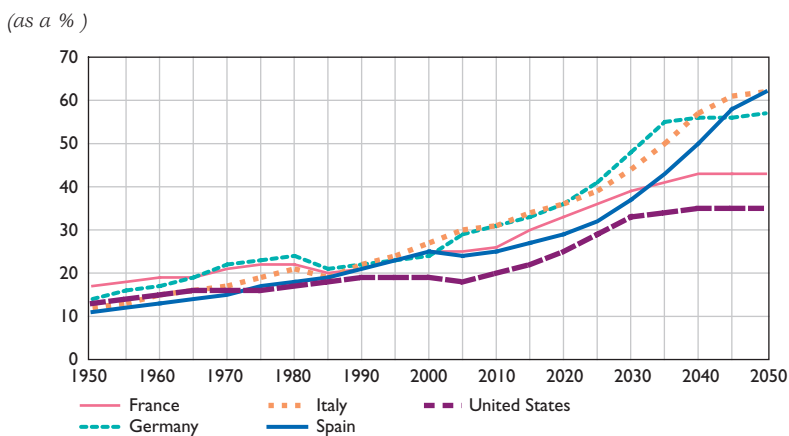
Olivier Garnier focused his presentation on the consequences of the new prudential rules for banks, insurance companies and households. Intended to enhance financial stability, these measures could however have a negative impact on the ability of financial intermediaries to absorb market risk and liquidity risk.

Issues related to regulated savings management in times of crisis were addressed by Benjamin Dubertret. More specifically, he presented the 'Savings Fund' that centralises regulated savings deposits (*'A' Passbook, Sustainable Development Passbook and People's Passbook*) and is responsible for financing social housing in France. During the financial crisis, the Savings Fund was also used to meet the borrowing requirements of the banking system, SMEs and local authorities.

3| Long-term investments

With population ageing and the arrival at retirement age of the baby boom generation, the old age dependency ratio, measured here as the ratio of individuals aged over 64 to those aged between 15 and 64, is set to increase (Chart 5).

Chart 5 Changes in the old age dependency ratio in Europe and the USA up to 2050



Source: United Nations, *World population prospects: the 2010 revision*.

In this context long-term investments and their strategic allocation are key to portfolio managers and households. More specifically, regarding long-term asset management, the question arises as to whether returns can be predicted. The technical difficulties in this area were illustrated by Michael Rockinger (HEC Lausanne)¹⁹ and Massimo Guidolin (Manchester Business School).²⁰

Additionally, the reforms put in place by many States have led to a reduction in the pension wealth of workers, who may be required to bolster their savings. Tullio Jappelli (University of Naples)²¹ analysed the impact of uncertain future pension levels on the investment decisions of households.

Lastly, the final round table chaired by Christian Durand (Banque de France) examined the macrofinancial challenges raised by the recent reforms in pensions, healthcare and dependency. This round table brought together André Masson (CNRS-EHESS), Jean-Michel Charpin (General Inspectorate of Finances), Luis Viceira, Didier Davydoff (European Savings Institute) and Edward Whitehouse (OECD).

3 | I Are the returns on financial assets predictable?

Using US data, studies have shown that certain financial variables could be used to predict the future asset returns. Michael Rockinger presented new results for ten European countries. The estimates made from a portfolio composed of one riskless asset and one risky asset show that with the exception of Italy, the dividend-price ratio of assets and inflation both play a significant role in the dynamics of financial asset returns.

He also stressed the impact of the uncertainty associated with the estimate of the model used. Intuitively, the existence of parameter uncertainty in statistical models should lead portfolio managers to allocate assets more prudently. Alain Monfort (Crest, Banque de France and University of Maastricht) reviewed a number of technical points in the study. In particular, he stressed the fact that certain variables are very persistent. There is consequently a high risk of bias in the proposed estimate.

Massimo Guidolin suggests improving return predictability by including higher statistical moments than those usually analysed for optimal portfolio allocation, and by using regime-switching models. Indeed, traditional modelling based on the works of Markowitz (1952)²² draws on an analysis

19 Jondeau and Rockinger (2011): "Portfolio allocation for European markets with predictability and parameter uncertainty".

20 Guidolin and Nicodano (2011): "The economic value of timing higher order co-moments in bull and bear markets".

21 Guiso, Jappelli and Padula (2011): "How risky is pension wealth?".

22 Markowitz (1952): "Portfolio Selection", *The Journal of Finance*, Vol. 7, No. 1, pp. 77-91.

of returns and risk (i.e. the means and variances of yield distributions). However, if investors are concerned by other characteristics of the distributions, for example their asymmetry, this framework may seem too restrictive.²³ Furthermore, the modelling of regime switching allows us to include different statistical properties of asset returns (mean and variance, most notably) according to the state of the financial market.²⁴ All in all, inclusion of these technical sophistications improves the return predictability and consequently the performance of the portfolios analysed.

Imen Ghattassi (Banque de France) stressed the importance of this question for determining the best long-term household portfolio allocation. She emphasized the interest of the technical sophistications proposed in the paper. In her view, applications of this type of model to portfolio management are possible, provided that the range of assets is broadened, most notably by including securities that are less risky than equities.

3|2 Do households take into account the risks associated with their future pensions?

For households and in particular young people, there are numerous uncertainty factors associated with pensions and they depend on income developments during their working life, as well as macroeconomic conditions, fiscal and legislative changes (for example the extension of contribution periods), etc. Future pensions may be a source of uncertainty that influences current saving and investment decisions.

This issue was the focus of a talk given by Tullio Jappelli who presented the results of studies using Italian data. They consisted of a twofold assessment of pension uncertainty: i) a statistical simulation of future replacement rates, and ii) an evaluation based on data collected directly from households on their perception of their expected pension levels. The results show that while households generally expect replacement rates to be in line with the legislative provisions, some of them make mistakes and expect these rates to be significantly different from them. Moreover, the pension uncertainty is highest among the younger generations and among the self-employed. Lastly, this uncertainty seems to affect certain investment decisions, in particular those related to pension and complementary health funds: the households that invest in these financial products are those that face the greatest uncertainty regarding their pensions.

23 This means that asset returns are not necessarily normally distributed, and taking into account moments higher than second order. The representative investor then maximises an expected utility function of his final wealth (i.e. at the investment horizon) which not only takes account of the mean and the variance but also of the skewness and the kurtosis of the distribution of financial asset returns.

24 Technically, the persistence of these regimes leads to persistence in financial asset returns, and thus predictability.

In his talk, Didier Blanchet (INSEE) stressed the value of these assessments that take account of both macroeconomic and individual data. He made technical suggestions and observed that given the uncertainty of the replacement rates, the results suggest that households tend to invest in risky financial assets. Any macrofinancial implications stemming from this observation could provide food for thought for public policy and pension reforms.

3|3 Macrofinancial implications of social reform

In his introduction to the final round table, Christian Durand recalled the long-term challenges to financial balances posed by demographic change. He stressed that the social reforms underway in many countries tended to encourage individual saving, either for retirement or to finance healthcare expenditure. These trends increase the need to develop the financial literacy of households, as well as to track their debt levels. They are also likely to have direct implications for the financial markets and for the emergence of new financial products. They are thus key issues for regulators and central banks.

André Masson gave a summary of the works presented in order to open discussions on the role of the different agents faced with these social reforms. He emphasised the specific roles that could be played by each of the participants (households, governments and markets) involved in financing intergenerational economic ties. In so doing he described three types of society, according to the relative importance of the players involved in national intergenerational solidarity between generations, and therefore, schematically, three categories of reform to deal with population ageing: more private insurance for the “free agent” model of liberal theories; reinforcement of public institutions for the “equal citizenship” model of social democratic theories; and increased aid for families in the “multi-faceted solidarity” model of conservative theories.

Jean-Michel Charpin focused his presentation on France. The demographic issues in France are quite similar to those of most OECD countries. Indeed, the country's population structure is the result of phenomena that are widespread in Europe: a post-war baby boom, and life expectancy growing faster for women than for men. He also pointed out that France enjoys a higher fertility rate than the European average. While the proportion of households over 60 will grow over the next fifteen years, the impact of ageing on public expenditure will become significant between 2035 and 2065, a period in which the population aged over 60 will stabilise but the baby boomers will be very elderly. He discussed the recent OECD report²⁵ and discussed

²⁵ OECD (2011): “Pensions at a glance 2011: retirement-income systems in OECD and G20 countries”.

the retirement age estimates through to 2050. Jean-Michel Charpin recalled the ambitious funding reforms put in place in France. He also stressed the high savings rates among French households. In his view, the priority is to define suitable products to finance old age. He ended his presentation by stating that a simplification of the tax system and the abolition of tax incentives for saving are prerequisites for creating such effective products.

The presentation by Luis Viceira considered the issues associated with pension funds and developments in defined-benefit regimes. Here, the amount and frequency of contributions that the household is able to make have a decisive impact on the accumulation profile of its savings throughout the lifecycle. Furthermore, in their long-term investments, individuals have to make complex investment decisions.²⁶ In this perspective, Luis Viceira observed that financial intermediaries have a key role to play.

Didier Davydoff gave an overview of savings in Europe (Chart 1). He highlighted the fact that in Europe, savings rates seem to be linked more to household borrowing behaviour than to precautionary savings or to pension concerns.

This seems to be particularly the case in Spain, where the increase in savings rates after the crisis reflects a trend towards reduction in household deleveraging.

Edward Whitehouse addressed the main conclusions of the OECD report on pensions in Europe (see Note 25). He defended the idea that, in the coming years, individual savings should complement public pension schemes and the retirement age should be pushed back in order to —at least partially— offset the rise in life expectancy.

Lastly, discussions touched on the importance of housing assets in household saving behaviour and on the need to find solutions to make such assets more liquid, most notably with a view to financing old age in a population that is living longer.

²⁶ This question was analysed in depth by John Campbell and Luis Viceira in their reference work "Strategic asset allocation: portfolio choice for long-term investors", Oxford, 2002.

National financial accounts in 2010: recovery in lending and ongoing rise in debt ratio

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In 2010, the borrowing requirements of general government and non-financial corporations again largely exceeded the lending capacity of households. This imbalance was partly offset by net capital inflows, mainly in the form of purchases by non-residents of securities issued by residents and, for the rest, by the lending capacity of the financial sector. The latter's contribution to the financing of the economy took the form of securities acquisitions and loans to residents. The flow of loans marked in effect an upswing, notably due to a recovery of lending to corporations and a sharp surge in mortgage credit. Against this background, the level of indebtedness of households, non-financial corporations and general government reached new highs. Regarding the formation of financial assets, deposits with credit institutions recovered strongly, while mutual funds experienced large outflows. Households continued to channel most of their savings into life insurance, with contracts in euros clearly predominating.

Keywords: Financial accounts, non-financial sectors, households, non-financial corporations, general government, insurance corporations and mutual funds, credit institutions, non-residents, financing and financial investment, debt, deposits, interbank refinancing, debt securities, loans, equities, mutual funds shares, life insurance, Treasury bills, housing savings schemes (PELs), euro-denominated contracts/unit-linked contracts.

JEL code: G00

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I | Households took out more loans and preferred low-risk investments¹

After rising strongly in 2009, household savings recorded a slight weakening in 2010 accompanied by an increase in investment expenditure, mainly on housing: these changes led to a slight fall in their lending capacity,

Table I Main items of the financial and non-financial accounts of households (a)

(EUR billions)

	2008	2009	2010
Gross savings (A)	198,0	211,4	208,3
Net capital transfers (B)	-2,6	-0,1	-0,1
Gross investment (C)	132,0	118,8	120,1
Net lending (+) or net borrowing (-) (financial savings) (D = A + B - C)	63,4	92,4	88,2
NB: Financial savings rate (as a % of gross disposable income)	4,9	7,1	6,6
Balance of claims (+) and debts (-) (E = G - F)	65,7	79,0	73,9
Net incurrence of liabilities (F)	64,6	38,4	61,6
Loans from financial institutions	64,6	38,4	61,6
<i>o/w loans for house purchases</i>	56,4	27,8	59,1
Note: Debt ratio (as a % of gross disposable income)	73,5	75,7	78,8
Net acquisitions of financial assets (G = H + I)	130,2	117,5	135,5
Main investments (H)	107,5	104,2	112,8
Currency	4,3	3,1	3,0
Overnight deposits	-2,6	19,2	17,3
Overnight investment ("A" and "blue" passbook savings accounts, youth passbook accounts, people's passbook savings accounts, etc.)	47,6	13,0	14,9
Term investment (term accounts)	16,4	-19,1	-0,7
Contractual saving schemes (PEL and PEP)	-25,0	4,8	6,2
Life insurance investment	55,6	76,9	77,3
Debt securities	3,5	1,7	-0,7
<i>o/w with a maturity of over 1 year</i>	4,6	5,7	-0,9
Mutual fund shares	3,3	-16,2	-16,5
<i>money market funds</i>	9,1	-12,3	-14,2
<i>non-money market funds</i>	-5,8	-3,8	-2,3
Shares	4,4	20,8	12,0
<i>o/w quoted shares</i>	-4,0	3,7	-2,3
Other investments (net) (I)	22,8	13,3	22,8

(a) Individuals, sole traders and non-profit institutions serving households.

Sources: National accounts, base 2005, INSEE and Banque de France.

Data at 13 May 2011.

¹ For more information on household savings behaviour in 2010 see the detailed article in this Bulletin.

Box

Financial accounts switched to base year 2005

In 2010, the complete sequence of national accounts (ranging from production accounts to financial balance sheets, and including the income balance and financial accounts) was switched from base year 2000 to base year 2005. This major methodological change has made it possible, on the one hand, to clarify or redefine the scope of the institutional sectors and operations, and, on the other hand, to incorporate new sources of information. Thus, compared with the last set of base year 2000 accounts, most of the time series have been revised, often from their starting point.

With regard to the institutional sectors, the “financial auxiliaries” sector was redefined with a view to improving the compliance of French national accounts with the requirements of the European System of Accounts (ESA 95) with regard to the classification of entities by sector. As a result, the contours of the “insurance companies” and “non-financial corporations” sectors were slightly affected. In the case of general government, the Social Security Debt Redemption Fund and the Pensions Reserve Fund (CADES and FRR) have been reclassified as social security funds, while previously they were included among the various central government bodies.

For transactions in financial assets, estimates of the market value of outward and inward foreign direct investment in unquoted shares were aligned with those of the balance of payments. Similarly, the breakdown of debt securities is now being done according to their original maturity (short and long-term) according to ESA 95, while for the base year 2000, it was performed in line with the legal status of the securities (marketable debt securities and bonds).

Improvements have also been made to the financial accounts by using new sources of information. Notably, they concern the accounts of credit institutions (using the new SURFI unified reporting system), insurance companies (higher-quality contributions by the Insurance Supervisory Authority, now integrated into Prudential Supervisory Authority) and the holding of quoted securities by households and non-financial corporations (Protide survey).

to EUR 88.2 billion, compared with EUR 92.4 billion in 2009 (Table 1). The financial savings rate, i.e. the lending capacity of households as a percentage of their gross disposable income, or the portion of savings not allocated to the purchase of a new home or to major maintenance work, fell quite significantly (to 6.6% from 7.1%).² The fall did not result from investment flows, which, after declining in 2009, recovered well (EUR 112.8 billion compared with EUR 104.2 billion), but from a strong rebound in debt flows (EUR 61.6 billion as opposed to EUR 38.4 billion in 2009).

² For further details see « Les comptes de la Nation en 2011 : la croissance repart » Insee Première, No. 1349, May 2011, accessible on the Insee website at the following address: <http://www.insee.fr/fr/ffc/ipweb/ip1349/ip1349.pdf>

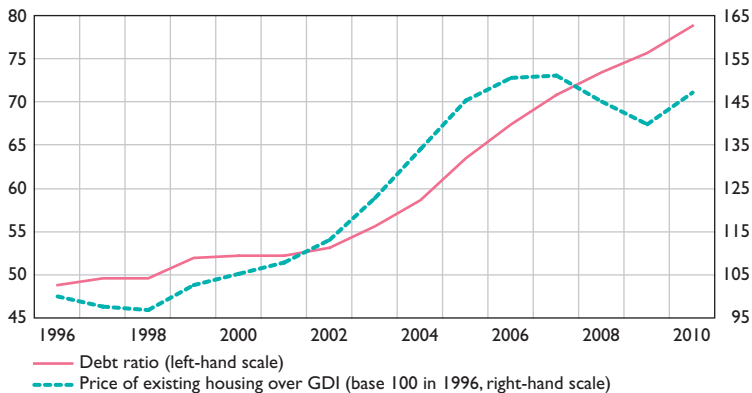
The additional resources borrowed by households consisted mainly of loans for house purchase. Against a background of very attractive financing conditions resulting from the maintenance of money market rates and bond yields at historically low levels, but also from the prospect of changes in tax incentives in favour of housing at the turn of the year,³ net flows of housing loans more than doubled (EUR 59.1 billion compared with EUR 27.8 billion in 2009). The level of indebtedness of households, which has soared over the past ten years mainly due to the prices of existing housing stock rising faster than disposable income, therefore continued to increase: at end-2010, the ratio of debt to gross disposable income reached an unprecedented 78.8%, compared with 75.7% at end-2009 (Chart 1).⁴

In 2010, households chose financial investments similar to those in 2009. They favoured low-risk products and notably continued to make considerable investments in life insurance contracts – essentially euro-denominated – and to add to their deposits, both overnight and passbook savings accounts. At the same time, they sold debt securities and reduced their holdings of mutual fund shares/units.

The investment flows into overnight deposits and passbook savings accounts remained substantial and amounted to EUR 32.2 billion, as in 2009. Their scale is explained particularly by the low yields on certain alternative investments, notably money market funds, and by the very

Chart 1 Household debt ratio and ratio of price of existing housing over gross disposable income

(as a % of GDI)



Sources: Banque de France.

³ Termination as from 1 January 2011 of the Pass-Foncier plan and of the income tax credit on mortgage interest payments on loans taken out after 31 December 2010, lowering of the tax reductions relating to the Scellier and Robien buy-to-let schemes.

⁴ For detailed quarterly developments download the Stat Info « Taux d'endettement des agents non financiers » (only in French) from the Banque de France website at the following address: <http://www.banque-france.fr/statistiques/titres/titres-endettement-anf.htm>.

attractive returns, considering their liquidity, on passbook savings accounts. In addition, time deposits almost stopped declining (EUR -0.7 billion compared with EUR -19.1 billion) and the balance of contractual savings inflows continued to recover (EUR 6.2 billion versus EUR 4.8 billion), as the return on housing savings plans, unchanged at 2.5% excluding the State premium since July 2003, became relatively attractive again.

By contrast, households achieved net sales of EUR 5.2 billion on their securities portfolios. They continued to make substantial reductions in their money market fund share assets (EUR -14.2 billion compared with EUR -12.3 billion in 2009) and also cut, but by smaller amounts, their holdings of shares in non-money market mutual funds. These divestments were largely explained by the prospect of a change in the tax framework applicable to investment funds (capital gains tax from the first euro from 1 January 2011) and the ongoing low yield of money market fund shares in 2010. With no major public issuance operations targeting households, such as the EDF bonds in 2009, purchases of debt securities were interrupted (EUR -0.7 billion compared with EUR 1.7 billion). The flow of direct investments in shares by households also fell sharply (EUR 12 billion compared with EUR 20.8 billion) against a backdrop of a slight fall in the stock market indices over the year.

Life insurance remained predominant in the flow of financial investments by households (EUR 77.3 billion compared with EUR 76.9 billion in 2009). Euro-denominated contracts continued to attract the bulk of the inflow (EUR 71.6 billion compared with EUR 76.8 billion), while a modest recovery took place in the case of unit-linked contracts (EUR 5.7 billion compared with EUR 0.1 billion).

2| Bank credits obtained by non-financial corporations replaced securities issuance

In 2010, the financing gap of non-financial corporations increased slightly (to EUR -25.4 billion from EUR -18.7 billion in 2009). Their savings rose from EUR 128.6 billion in 2009 to EUR 143.1 billion in 2010, supported by a rebound in reinvested earnings received from branches abroad, which contributed to the increase in the financial income balance (Table 2).⁵ This increase in resources was largely absorbed by a recovery in their fixed capital formation: as a result of improved economic conditions, investments started to recover, while destocking came to a standstill. Overall, net acquisitions of non-financial assets by non-financial corporations grew by EUR 18.5 billion (to EUR 181.9 billion from EUR 163.4 billion).

⁵ For further details download « Les comptes de la Nation en 2010 : la croissance repart » Insee Première, No.1349, May 2011, from the Insee website at the following address :<http://www.insee.fr/fr/ipweb/ip1349/ip1349.pdf>.

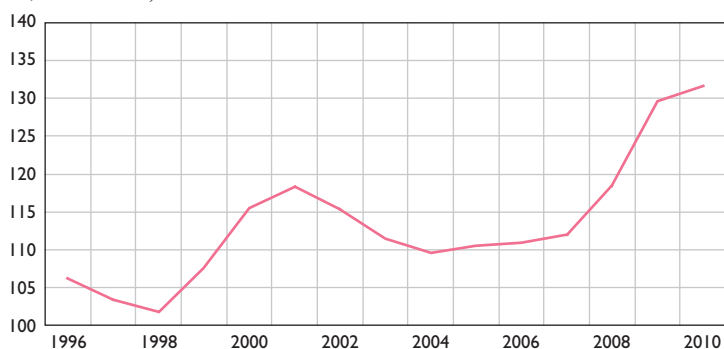
Table 2 Main items of the financial and non-financial accounts of non-financial corporations*(EUR billions)*

	2008	2009	2010
Savings (A)	139,5	128,6	143,1
Net capital transfers (B)	14,3	16,1	13,4
Investment and changes in inventories (C)	211,8	163,4	181,9
Investment	201,2	176,4	181,8
Changes in inventories	10,6	-13,0	0,1
Net lending (+) or net borrowing (-) (D = A + B - C)	-58,0	-18,7	-25,4
Balance of claims (+) and debts (-) (E = G - F)	-68,5	-25,9	-27,8
Net incurrence of liabilities (F)	189,3	146,5	142,3
Debt	97,9	35,4	31,6
Debt securities	22,4	50,7	25,7
– with a maturity of up to 1 year	7,9	-13,8	-2,1
– with a maturity of over 1 year	14,4	64,5	27,8
Loans from financial institutions	75,5	-15,3	5,9
– resident	65,9	-11,4	6,3
– non-resident	9,6	-3,9	-0,3
Shares and other equity	66,7	107,3	108,2
<i>o/w inward direct investment (equity capital and reinvested earnings)</i>	17,5	9,7	22,1
Inward direct investment (other capital)	24,7	3,8	2,5
Note: debt ratio (as a % of value added)	118,2	129,7	131,5
Net acquisitions of financial assets (G = H + I)	120,9	120,5	114,5
Main investments (H)	169,8	93,6	114,4
Cash investment (deposits, short-term debt securities and money market funds)	54,4	25,0	18,0
<i>o/w deposits with non-resident financial institutions</i>	3,9	6,4	-6,9
Long-term debt securities and non-money market funds	-16,5	-2,4	-3,3
Shares and other equity	101,4	43,5	78,1
<i>o/w outward direct investment (equity capital and reinvested earnings)</i>	60,7	32,0	33,7
Outward direct investment (other capital)	30,5	27,6	21,7
Other investments (net) (I)	48,9	26,9	0,1

Sources: National accounts, base 2005, INSEE and Banque de France.

Data at 13 May 2011.

Despite the higher borrowing requirements of non-financial corporations, their debt flows decreased slightly (to EUR 31.6 billion from EUR 35.4 billion in 2009). The flow of net issues of debt securities fell to EUR 25.7 billion compared with EUR 50.7 billion in 2009, while loans obtained from resident financial institutions started to recover (EUR 6.3 billion compared with EUR -11.4 billion), related to a pick-up in investments and a cessation of inventory drawdowns. The background was marked by the continuation of very favourable financing conditions: in December 2010, the average interest rate on new loans was close to 3%. Overall, the debt-to-added-value ratio of non-financial corporations continued to rise, albeit more moderately than in 2009, from 129.7% at end-2009 to 131.5% in 2010 (Chart 2). The debt ratio of non-financial

Chart 2 Debt ratio of non-financial corporations*(as a % of value added)*

corporations, which remains significantly smaller in France than that of other major European countries, nevertheless continued to rise, while it decreased slightly in the euro area as a whole.⁶

Non-financial corporations increased their main financial investments in 2010 (EUR 114.4 billion compared with EUR 93.6 billion). The net acquisition of shares rose from EUR 43.5 billion in 2009 to EUR 78.1 billion in 2010, particularly in the form of equity investments between resident non-financial corporations, while the flow of cash assets, deposits, short-term debt securities and money market funds continued to decline. For their cash asset investments, non-financial corporations preferred fixed-term investments and short-term debt securities over money market funds. At the same time, they continued to reduce their holdings of long-term debt securities and non-money market fund shares/units. Net flows of foreign direct investment into France and French investment flows overseas in the form of loans and other intra-group cash asset flows resulted in a net capital outflow of EUR 19.2 billion, down slightly from 2009 (EUR 23.8 billion): resident non-financial corporations still gave more funds to their foreign subsidiaries than they received from their non-resident parent companies. Finally, acquisitions of foreign equity by French companies went up slightly (to EUR 33.7 billion from EUR 32 billion), while non-residents' investments in shares of French non-financial corporations, for their part, increased substantially (to EUR 22.1 billion from EUR 9.7 billion).

⁶ For further details, see the Stat Info « Taux d'endettement des agents non financiers – Comparaisons internationales » accessible on the Banque de France website at the following address: <http://www.banque-france.fr/fr/statistiques/titres/titres-endettement-anf-internationales.htm>.

3| General government deficit fell slightly but its debt continued to rise rapidly

In 2010, government borrowing⁷ amounted to EUR 136.9 billion, slightly down from EUR 143.1 billion in 2009 (Table 3). By bringing together the State, various central government bodies and local authorities, a marked reduction was achieved in the borrowing requirements of this group, which fell from EUR 127.9 billion in 2009 to EUR 114.1 billion in 2010. However, the financing needs for social security funds widened quite considerably, from EUR 15.8 billion to EUR 22.8 billion.⁸

The main source of general government financing, net issues of debt securities, decreased sharply in 2010 (from EUR 150 billion in 2009 to EUR 104.9 billion). The *Société de prise de participations de l'État* (SPPE)⁹ repaid EUR 3.5 billion of loans taken on to finance the subscription of super-subordinated securities issued by a number of banking institutions within the framework of support for financing the economy implemented in October 2008. The rest came from the flow of net bank lending, which remained close to its 2009 level, and by deposits collected by the Treasury. These deposits rose strongly – from EUR 0.7 billion in 2009 to EUR 18.6 billion in 2010 – notably as a result of the implementation procedures of the “large government bond issue”. The amounts corresponding to the funds allocated for future investment in innovative areas that cannot be directly used by the beneficiary organisations (“non-consumable” appropriations) are actually deposited in correspondent accounts with the Treasury. The increase in credit take-up relates, for its part, mainly to social security funds and, to a lesser extent, to local government, whose respective liabilities mainly consist of long-term bank loans.

By comparison, general government very slightly reduced its investment flows (EUR 5 billion compared with EUR 7 billion in 2009). The relative stability of the latter resulted from offsetting opposite developments. On the one hand, deposits and loans fell from EUR 17 billion in 2009 to EUR 1.5 billion in 2010: the contraction in the government's cash position and the repayments of a fraction of the credit granted previously to the automotive sector (EUR 2.2 billion) and a portion of the equity holdings of the SPPE in the banks (EUR 3.5 billion) exceed the loans recently granted to Greece (EUR 4.4 billion). On the other hand, the recovery in net purchases of debt securities more than offset the net sales of investment fund shares.

⁷ General government: sector of national accounting which includes central government, miscellaneous central government agencies, local authorities and social security bodies.

⁸ For further details see « Les comptes nationaux des administrations publiques » année 2010 – Insee Première, No. 1348, May 2011, accessible at the following address: <http://www.insee.fr/fr/ffc/ipweb/ip1348/ip1348.pdf>.

⁹ Entity created in October 2008 classified under ‘miscellaneous central government agencies.’

Table 3 Investment and financing of general government

(EUR billions)

	2008	2009	2010
Net lending (+) or net borrowing (-) (A – B + C)	-64,6	-143,1	-136,9
Net acquisitions of financial assets	48,2	7,0	5,0
Deposits and loans	18,9	17,0	1,5
Securities purchased	29,2	-10,0	3,5
Debt securities	24,1	-19,2	10,5
Shares	5,7	-2,0	-5,5
Mutual fund shares	-0,5	11,2	-1,5
Net incurrence of liabilities (B)	111,1	169,3	138,9
Deposits	-1,4	0,7	18,6
Bank loans	3,0	18,7	15,5
Debt securities issued	109,5	150,0	104,9
Other financial assets (net) (a) (C)	-1,7	19,2	-3,0
Gross government debt (as defined by Maastricht)	1,318,6	1,492,7	1,591,2
(as a % of GDP)	(68,2)	(79,0)	(82,3)
Gross government debt (as defined in the national accounts)	1,412,3	1,578,7	1,717,3
(as a % of GDP)	(73,1)	(83,6)	(88,4)
Outstanding debt securities	1,208,2	1,359,1	1,473,1
Outstanding loans and deposits	204,2	219,6	234,6

(a) Other financial operations not included in the table.

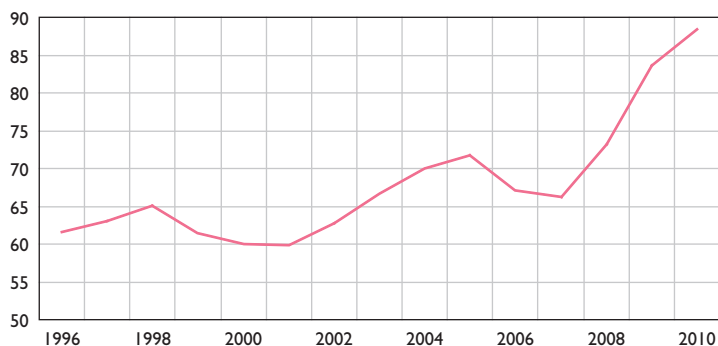
Sources: National accounts, base 2005, INSEE and Banque de France.

Data at 13 May 2011.

Overall, general government gross financial debt – which differs notably from the debt as defined in the Maastricht Treaty in that securities are reported at market value and debt data are not consolidated between units of the sector – reached EUR 1,717.3 billion at end-2010 (compared with EUR 1,578.7 billion in 2009), or 88.4 % of GDP (Chart 3).

Chart 3 Debt ratio of general government

(as a % of GDP)



This increase was essentially due to a sharp rise in the market value of negotiable public debt resulting from the decline in yields for government and comparable securities.

4| Money market funds responded to substantial withdrawals by adjusting their portfolios

Money market funds recorded an outflow in 2010 amounting to an unprecedented EUR 84.1 billion, compared with EUR -2.4 billion in 2009 (Table 4). This phenomenon is largely due to the continued weakness of the return on fund management products, a direct consequence of keeping money market rates at historically low levels. The money market funds thus suffered more in 2010 from the competition from intermediated savings products offered by credit institutions (in particular, passbook savings accounts and time deposits).

For their part, the different categories of non-money market mutual funds (shares, bonds, mixed and other funds) all benefited from net inflows which totaled EUR 11.9 billion. This flow nevertheless fell sharply compared with 2009 (EUR 37 billion): improved financial market performance enabled the non-money market mutual funds to offer their subscribers a positive performance, which nonetheless was not enough to revive the inflow.

Table 4 Investment and financing of mutual funds

(EUR billions)

	2008	2009	2010
Net acquisitions of financial assets (A)	-25,2	35,0	-76,7
Deposits and loans	23,6	-14,8	-6,1
Securities purchased	-48,8	49,8	-70,6
Debt securities	-43,4	31,2	-48,8
Shares	11,6	26,0	2,2
Mutual fund shares	-17,0	-7,5	-24,0
Net incurrence of liabilities (B)	-11,2	30,4	-68,0
Deposits and loans	-12,6	-4,2	4,2
Securities issued	1,4	34,6	-72,2
Money market fund shares	52,4	-2,4	-84,1
Non-money market fund shares	-51,0	37,0	11,9
Other financial assets (net) (a) (C)	7,0	-7,3	2,6
Balance of claims (+) and debts (-) (A - B + C)	-7,1	-2,7	-6,1

(a) Other financial operations not included in the table.

Source: National accounts, base 2005, Banque de France.

Data at 13 May 2011.

Overall, the net buy-backs of investment fund shares amounted to EUR 72.2 billion in 2010. In return, the investment funds reduced their securities holdings by EUR 70.6 billion, compared with net purchases of EUR 49.8 billion in 2009. This reduction mainly concerned debt securities and, in a more limited way, investment fund shares. However, the latter remained net buyers of shares, but for an amount considerably less than in the previous year (EUR 2.2 billion compared with EUR 26 billion).

5| Boosted by ongoing strong inflows, insurance companies invested substantially in debt securities

In 2010, insurance companies continued to obtain major resources by the inflows of life insurance contracts and property and casualty contracts. The flow of technical reserves reached EUR 88 billion, the same as in 2009. In addition to these reserves, insurance companies increased their use of loans subscribed from financial institutions to the tune of EUR 10.1 billion, after repayments in 2009 (Table 5). They reduced, on the other hand, their issuance of shares and their recourse to the issuance of debt securities remained negligible. Overall, their resources amounted to EUR 99.2 billion at end-2010, compared with EUR 88.1 billion in 2009.

Table 5 Investment and financing of insurance companies

(EUR billions)

	2008	2009	2010
Net acquisitions of financial assets (A)	86,3	84,3	85,7
Deposits and loans	5,6	1,4	0,3
Securities purchased	80,7	82,9	85,4
Debt securities	52,4	60,3	105,8
Shares	10,6	15,6	-4,1
Money market fund shares	7,5	-5,1	-4,4
Non-money market fund shares	10,2	12,2	-11,9
Net incurrence of liabilities (B)	46,7	88,1	99,2
Bank loans	-4,2	-5,6	10,1
Technical reserves	46,4	88,8	88,0
Life insurance and pension funds	55,7	77,3	77,7
Property and casualty insurance	-9,2	11,5	10,3
Securities issued	4,5	5,0	1,0
Debt securities	2,2	0,9	0,4
Shares	2,3	4,1	0,7
Other financial assets (net) (a) (C)	-6,4	15,5	2,7
Balance of claims (+) and debts (-) (A - B + C)	33,1	11,7	-10,8

(a) Other financial operations not included in the table.

Source: National accounts, base 2005, Banque de France .

Data at 13 May 2011.

At the same time, the global flow of investments in the securities of insurance companies rose slightly (to EUR 85.4 billion from EUR 82.9 billion in 2009). This rise conceals however a mixed picture, depending on the type of securities. The insurance companies substantially increased their investments in debt securities but undertook net sales of equities and reduced their money and non-money market fund holdings. These reductions in investment fund shares occurred against a background still marked by the relative weakness of the subscription flows of unit-linked life insurance policies, most of the inflow still being in euro-denominated contracts.

6| Credit institutions provided more loans to and collected more deposits from non-financial sectors

The net flows of loans from credit institutions and various financial institutions¹⁰ to resident non-financial sectors rose considerably, boosted by the sharp increase in the origination of housing loans to households, notably at the end of the year, from EUR 45.8 billion in 2009 to EUR 83.3 billion in 2010 (Table 6). By comparison, the flow of deposits from the non-financial sectors more than doubled (to EUR 73.8 billion from EUR 33.8 billion), while nonetheless remaining below the flow of loans granted. This recovered in bank and savings deposits could be interpreted, at least in part, as a sign of the credit institutions' desire to improve their liquidity position by increasing their clients' deposits in the context of the future implementation of Basel III.

The flow of securities issued by banks also recovered substantially (EUR 77.7 billion compared with EUR 35.4 billion in 2009): their net issuance of debt securities rose sharply and clearly exceeded the decline in their collection of own funds. As regards their assets, the banks made net purchases of securities for EUR 72.6 billion, favouring, as in 2009, the net acquisition of equities (EUR 62.6 billion). After the sell-offs of their debt securities holdings and, to a lesser extent, of investment fund shares in 2009, the credit institutions again became net buyers of these instruments in 2010. Against this background, the surplus of net issuance of securities over their acquisitions fell dramatically (to EUR 5.2 billion from EUR 90.2 billion).

Overall, and in contrast with 2009, the resources of the credit institutions in the form of deposits collected and securities issued on the one hand and

¹⁰ Miscellaneous financial institutions: sub-sector of national accounting made up of financial intermediaries other than monetary financial institutions and insurance companies (for example, investment firms and securitisation structures).

Table 6 Investment and financing of credit institutions and miscellaneous financial institutions

(EUR billions)

	2008	2009	2010
Net acquisitions of financial assets (A)	266,3	-9,0	155,9
Loans to the resident non-financial sectors	133,5	45,8	83,3
Securities purchased	132,9	-54,8	72,6
Debt securities	138,9	-93,4	8,8
Shares	23,7	52,6	62,6
Mutual fund shares	-29,7	-14,0	1,2
Net incurrence of liabilities (B)	219,4	69,1	151,5
Deposits of the resident non-financial sector	61,0	33,8	73,8
Securities issued	158,4	35,4	77,7
Debt securities	141,2	14,6	73,7
Shares	17,1	20,8	4,1
Net refinancing from the Banque de France (C = D - E)	95,8	-34,2	-69,6
Refinancing (a) (D)	112,9	-64,0	-86,0
Deposits (b) (E)	17,1	-29,8	-16,4
Other net resources (F = G + H)	-79,2	-89,4	13,5
Net refinancing from financial institutions (other than the central bank) (G)	-53,0	-92,4	-38,2
o/w non-resident financial institutions	-104,1	-81,7	-22,5
Other net financing (H)	-26,2	3,0	51,8
Balance of claims (+) and debts (-) (A-B-C-D)	30,4	45,4	60,4

(a) Monetary policy lending in euro and foreign currency.

(b) Current account of banks subject to reserve requirements.

Source: National accounts, base 2005, Banque de France.

Data at 13 May 2011.

the flow of assets on the other hand were roughly in balance in 2010. An ongoing normalisation of the interbank market enabled the institutions to reduce again their outstanding operations with the Banque de France, both as regards their liabilities (EUR 86 billion) and the holdings of deposits on its books (EUR 16.4 billion). At the same time, they continued to lend more to non-resident financial institutions than they borrowed from them, but the amounts were considerably lower than in 2009: the balance of these operations amounted to EUR 22.5 billion compared with EUR 81.7 billion in 2009.

7| Non-residents remained net purchasers of French securities¹¹

Non-residents sharply reduced their net purchases of French securities in 2010. The decrease in inward portfolio investment, affecting the different

¹¹ For further details, see the 2010 Balance of Payments Annual Report (June 2011), at the following address: <http://www.banque-france.fr/fr/statistiques/economie/economie-balance/presentation-rapport-annuel.htm>

types of securities, was particularly striking for debt securities. It was noticeably the case for Treasury notes and bonds, purchases of which amounted to EUR 46.8 billion, compared with EUR 149.9 billion in 2009. In addition, net purchases of equities (including direct investments) by non-residents, as well as those of investment fund shares, also declined significantly.

By comparison, net acquisitions of foreign securities (including in the framework of direct investment) by residents again went down. However, developments varied depending on the instrument. Residents were net sellers of debt instruments issued by non-residents for a considerable amount, reduced sales of investment fund shares and slightly reduced their net acquisitions of foreign equity.

Overall, non-residents remained net purchasers of French securities in 2010 for an amount lower than in 2009. In return, the rest of the world recorded net inflows from residents in the form of deposits or loans, with an amount that was also sharply down on 2009.

Household savings behaviour in 2010

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In 2010, households' savings rate declined in France, like in the rest of the euro area, after having posted a significant rise since the start of the financial crisis. The fears generated by the crisis having subsided, consumption picked up and, correlatively, savings eased somewhat.

In France, the decline in the overall savings rate is attributable to the fall in the financial savings rate, the residential investment rate having, on the contrary, slightly increased after declining sharply in 2009. Housing loans posted a marked recovery in 2010. This resulted in a rise in household debt, which, mechanically, led to a decrease in households' financial savings rate and their overall savings rate.

As regards financial investments, households continued to be relatively prudent. Investments in bank deposits picked up significantly, while net subscriptions of life insurance investments declined throughout the year, although households continued to channel the bulk of their financial savings into this savings product. At the same time, the expected reform of prudential rules concerning bank liquidity (Basel III) is likely to encourage financial intermediaries to increasingly steer clients' investments towards bank balance sheets, resulting in a shift in the structure of French households' portfolios.

Key words: Savings, financial savings, savings rate, French households, investments, deposits, home savings plans, "A" passbook, equities, mutual fund shares/units, life insurance, debt securities, real estate, investment, inflation, consumption

JEL codes: E21, E22, E31, E41, E50

I | A generalised fall in households' savings rate

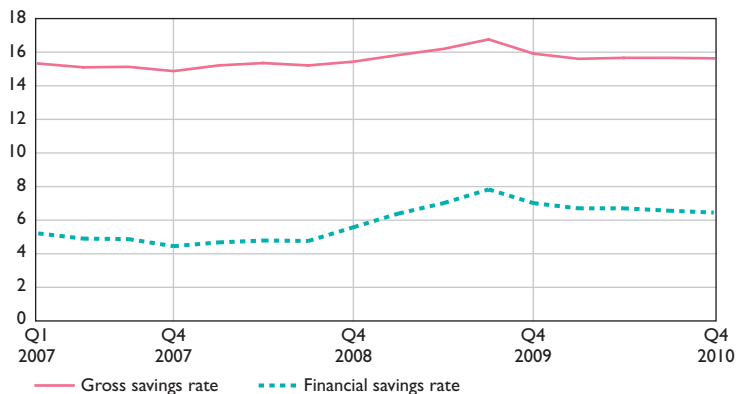
I | I Consumption remains robust despite the rise in inflation in France and the euro area

While the savings rate of French households¹ had increased markedly since the start of the financial crisis in autumn 2007, to reach 16.7% of their gross disposable income (GDI) in the third quarter of 2009, it steadily declined throughout 2010, to stand at 15.6% at the end of the year. Savings were channeled into residential investments and financial investments. The breakdown of the savings rate shows that the decrease recorded in 2010 mainly concerns financial savings:² over the year, financial savings dropped by 1.4 GDI point to stand at 6.5% at end-2010 (Chart 1).

The fall in the savings rate in 2010 can largely be attributed to the revival in consumption, which offsets the great moderation of the previous year: in 2009, households' final consumption expenditure had dropped by 0.6% despite the 1.3% increase in purchasing power, which resulted in equivalent proportions from a rise in nominal income (+0.7%) and a fall in final consumption prices (-0.6%). In 2010, while the rise in the purchasing power of gross disposable income was stemmed by the increase, albeit still moderate, in inflation (+1.2% for final consumption prices), households' final consumption expenditure rose by 2.6% in value terms, that is at a much faster pace than income (+2.0%). The particular savings efforts that had originated in the concerns surrounding the financial crisis decreased somewhat in 2010, reflecting an easing of these fears.

Chart 1 French households' savings rate

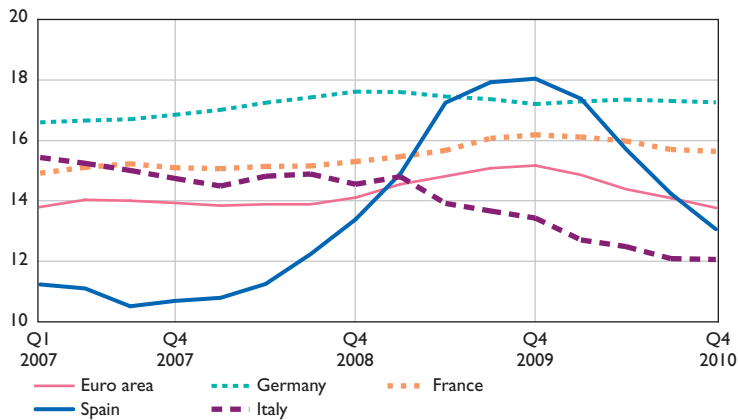
(as a % of gross disposable income)



Sources: Banque de France, INSEE.

¹ Households and non-profit institutions serving households.

² In national accounts, households' financial savings are measured as the net flow of all of their financial investments minus their net debt flow.

Chart 2 Households' savings rate in the euro area*(as a % of gross disposable income)*

Sources: Eurostat, INSEE.

The savings rate³ recorded similar developments on average in the euro area: after peaking at 15.2% in the last quarter of 2009 – a ten-year high – it declined steadily in 2010 to stand at 13.8% at year-end. From the perspective of the euro area as a whole, this fall in the savings rate seems mainly due to the erosion in real income (-0.1% in the fourth quarter of 2010), which itself is the result of a rise in inflation. However, this development is far from homogeneous across countries. The savings rate declined sharply in Spain (13.1% in December 2010, after 18% one year earlier) and quite significantly in Italy (12.1% in December 2010, after 13.4% at end-2009), but hardly varied in Germany, where it remained throughout the year close to its level of end-2009, i.e. 17.3% (Chart 2).

I | 2 Housing investment increases with the revival of the real estate market

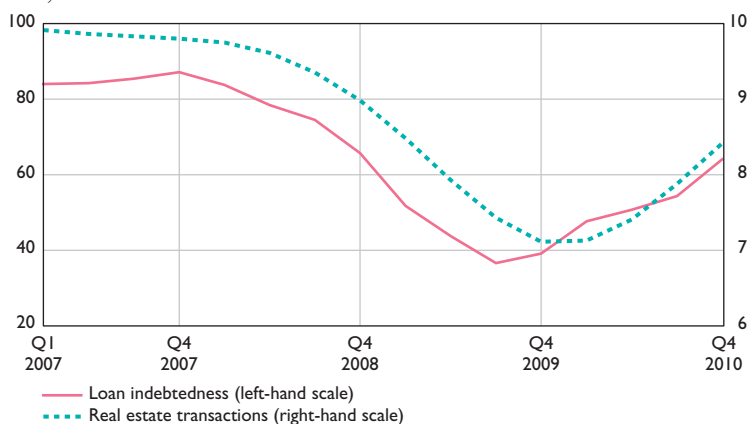
In addition to reducing their financial savings rate, French households cut back their “investment rate” from 9.2% in 2009 to 9.0% of GDI in 2010. Their housing investment continued to decline in real terms in 2010, albeit to a lesser extent than in 2009 (-1.5%, after -9.3%).

However, in the national accounts, housing investment, which measures net acquisitions of new housing as well as major maintenance work and costs related to the transfer of ownership, does not take account of real estate transactions on the market for existing dwellings. Yet these picked up significantly in 2010, at the same time as prices for existing dwellings.

³ The savings rate is calculated as the ratio of the gross savings flow cumulated over four rolling quarters over households' gross disposable income.

Chart 3 Net flows of long-term debt and transactions on the market for existing housing

(data cumulated over four rolling quarters, debt in EUR billions; real estate transactions in thousands)



Sources: Banque de France, CGEDD after Tax Department and notaries' databases.

This recovery in activity was underpinned by very attractive financing conditions resulting from historically low bond and money market yields, but also by the easing of lending conditions, as observed in the bank lending surveys conducted by the Banque de France, in particular in the third quarter of 2010.⁴ The net annual flow of households' housing loans, which, by construction, reduces that of their financial savings, rose significantly, from EUR 29 billion in 2009 to EUR 59 billion in 2010 (Chart 3).

2| A recovery in household investment in bank savings products

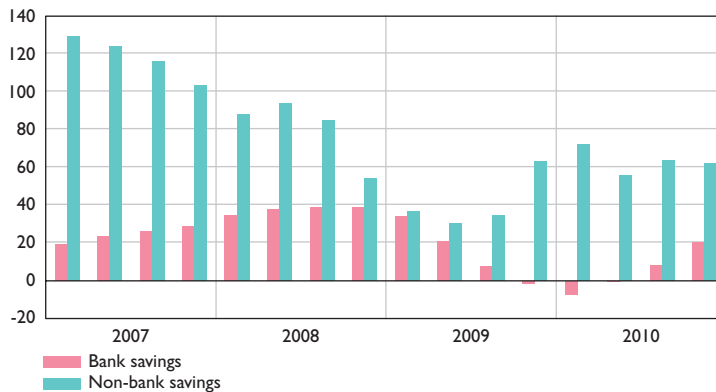
In 2010, households invested to a greater extent in products that could very rapidly be converted into liquidity, in particular overnight investments (passbook savings accounts). This appetite for this type of product partly reflects a precautionary motive and appears coherent with households' wish to maintain a certain level of consumption despite the uncertainties that are likely to impact their purchasing power. More generally, households channeled their financial savings into products managed by the banking system, irrespective of their degree of liquidity.⁵ This arbitrage occurred to the detriment of life insurance, but also money market and

⁴ See results of the quarterly bank lending survey for France, December 2010: <http://www.banque-france.fr/fr/statistiques/telechar/titres/2010-12-france-stat-info-enquete-trimestrielle-apres-des-banques-sur-la-distribution-du-credit.pdf>

⁵ Liquidity is the characteristic of an asset that may be bought or sold at any time without any capital loss. Two variables are to be taken into account for measuring the liquidity of an asset: the maturity (agreed or not) and the possible capital loss. Degrees of liquidity are established between assets, money being by definition the most liquid.

Chart 4 Household savings

(cumulated net flows over four quarters, in EUR billions)



Source: Banque de France.

non-money market fund shares/units and direct investments in debt securities and equities, which are generally held for a longer period than bank savings products, with the exception of money market fund shares/units. While net annual flows of non-bank savings remained largely positive, boosted in particular by still relatively large subscriptions of life insurance – investments, those of bank savings turned positive in the second half of 2010, offsetting the withdrawals that had been recorded from the third quarter of 2009 to the first half of 2010 (Chart 4).

2 | A return to bank savings products

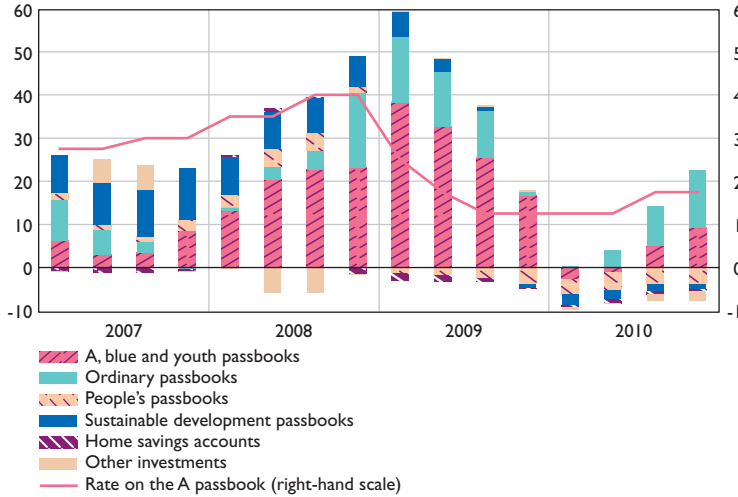
In line with the increase in inflation, the rate on the “A” passbook was raised to 1.75% in August 2010, after having been kept at 1.25% from July 2009 to July 2010. This led to a rise in deposits in the second half of 2010, with net cumulated flows turning positive, following the withdrawals recorded until early 2010 (Chart 5a). Prior to that, the “A” passbook had recorded very large inflows in early 2009 (EUR 21 billion in the first quarter) as a result of its widespread distribution.

The other regulated savings products (people’s passbook, sustainable development passbook, home savings account) did not benefit to the same extent as the “A” passbook from this rise in interest rates, although their yield is closely linked to that of this benchmark product in the field of regulated savings (Chart 5b).

Ordinary passbooks recorded the strongest increase in the second half of 2010 (Chart 5a). This acceleration in investment in taxed savings products seems

Chart 5a Households' overnight investments and interest rate on the A passbook

(cumulated net flows over four quarters, in EUR billions; rates in %)



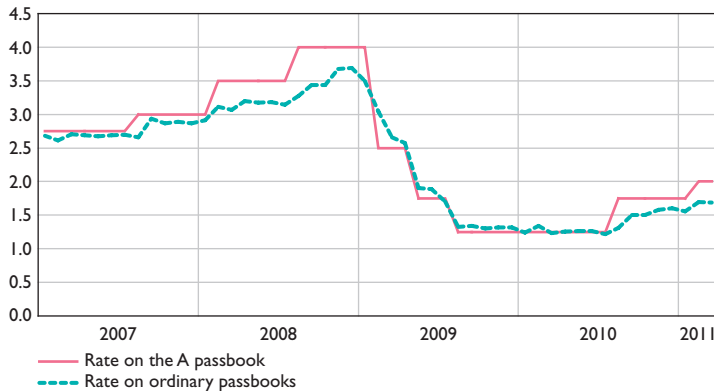
Source: Banque de France.

to be due to a supply effect, with banks making increased efforts to promote these products in anticipation of a rise in their liquidity needs as a result of the expected tightening of prudential regulations in this area (see Basel III).

Overall, after decreasing steadily throughout 2009 then contracting in the first half of 2010, net flows of overnight investments turned once again positive in the second half of 2010 (Chart 5a).

Chart 5b Interest rates on the A passbook and ordinary passbooks

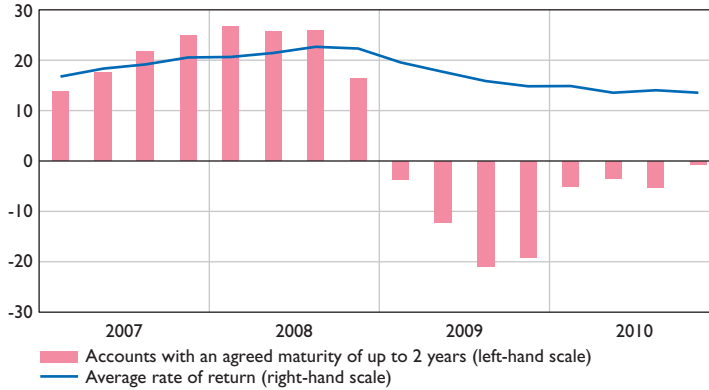
(as a %)



Source: Banque de France.

Chart 6a Investments with agreed maturity: flows and average rate of return

(cumulated net flows over four quarters, in EUR billions, rates in %)

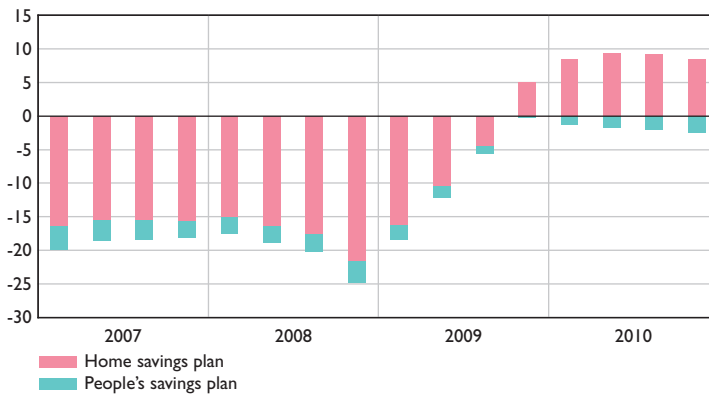


Source: Banque de France.

Banks seem to have managed to channel towards their balance sheet a greater share of household savings, which, as mentioned above, had been largely invested in life insurance over the past few years. In 2010, withdrawals on fixed-term accounts came to a halt and investments in contractual savings products, in particular home savings plans, picked up (Charts 6a and 6b). These plans, which offer an interest rate of 2.5% (not taking account of the government bonus),⁶ were in competition with the other long-term bank investments, which continued to record net outflows in 2010.

Chart 6b Households' investments in contractual savings

(cumulated net flows over four quarters, in EUR billions)



Source: Banque de France.

⁶ The interest rate on home savings plans stands at 2.5% (not taking account of the government bonus) since July 2003. For the plans opened after 1 March 2011, it is set according to a rule based on 2, 5, and 10-year swap rates according to a method defined by the French Bond Association. It is thus equal to 70% of the 5-year swap rate and 30% of the 10-year rate minus the 2-year rate. The new method for calculating the interest rate on home savings plans also sets a threshold rate of 2.5%. A government bonus of 1% is added to this rate if a home savings loan is taken out.

2|2 Savings invested outside the banking system decline

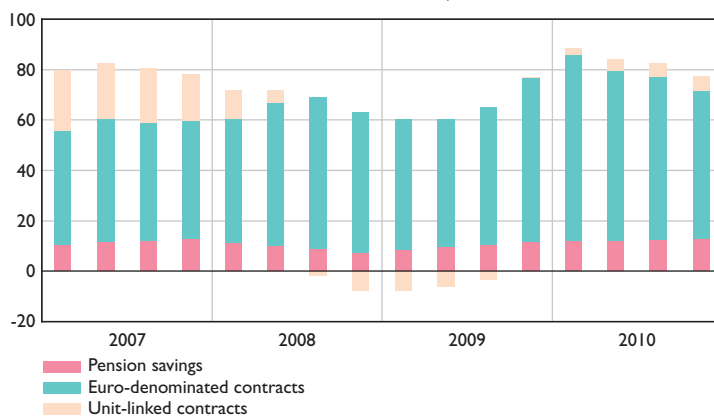
The gradual rebalancing of French households' financial investments towards instruments recorded on the liability side of banks' balance sheet did not significantly alter the structure of their financial wealth: net flows of long-term savings remained largely positive, due to the substantial net subscriptions of life insurance investments (Chart 7), which rose from EUR 76.9 billion in 2009 to EUR 77.3 billion in 2010.

Life insurance includes not only life insurance contracts but also death insurance contracts and most pension savings schemes. The new national accounts methodology now makes it possible to distinguish, among life insurance contracts, those subscribed as part of a professional pension savings scheme.⁷ It appears that the cumulated net flows of both unit-linked pension funds and life insurance contracts are still well below those of euro-denominated contracts.

Life insurance inflows declined steadily throughout the year. This decrease is partly due to the fact that insurance companies, which shall shortly be subject to the prudential rules set out in the European directive Solvency II, may have been inclined to channel part of their investments towards government securities that earn a lower rate of return than other listed securities. This may have

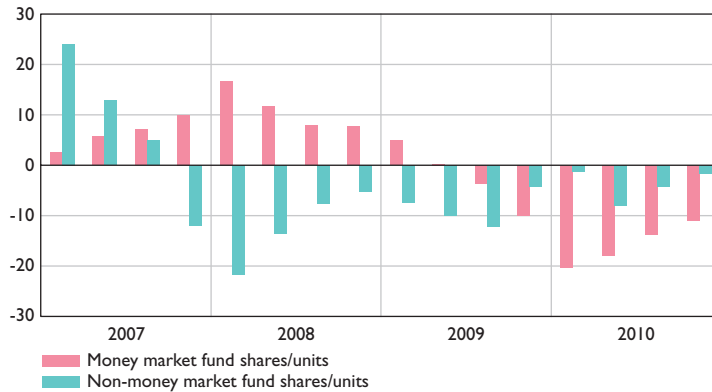
Chart 7 Net purchases/redemptions of life insurance policies

(cumulated net flows over four quarters, in EUR billions)



Source: Banque de France.

⁷ These include defined-benefit pension schemes (article 39 of the French General Tax Code), end-of-service benefit contracts, additional voluntary contributions under article L441 of the Insurance Code, company pension savings plans, contracts under codes 82 and 83 of the General Tax Code and Madelin contracts.

Chart 8 Net purchases/redemptions of mutual fund shares/units*(cumulated net flows over four quarters, in EUR billions)*

Source: Banque de France.

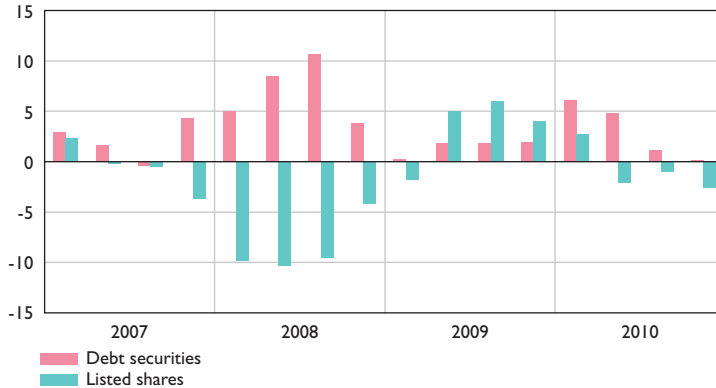
weighed on the rate of return on new euro-denominated life insurance contracts open for subscription. Furthermore, the announcements made concerning the possible revision of the taxation of life insurance may have, for a while, contributed to slowing new subscriptions in 2010.⁸

However, euro-denominated life insurance investments, which offer a guaranteed rate of return and low capital risk, are still a means for households of building up individual pension savings. In this respect, there could be a renewed interest for life insurance investments if long-term interest rates were to rise with the economic recovery.

Mutual fund shares/units accounted for a very small share of investment with non-bank financial intermediaries, compared to life insurance. Money market fund shares/units have recorded outflows since June 2009 and non-money market fund shares/units since end-2007 (Chart 8). Although the latter were less impacted by the low short-term interest rates, they nevertheless recorded slightly negative inflows for the whole of 2010.

The outstanding amounts of debt securities and equities directly held by French households' were relatively small compared to those of bank investments and life insurance investments (Chart 9). The withdrawals recorded on these asset classes in 2010 can no doubt be partly attributed to the turbulences on bond markets resulting from the tensions on different sovereign debt markets across Europe and stock market volatility.

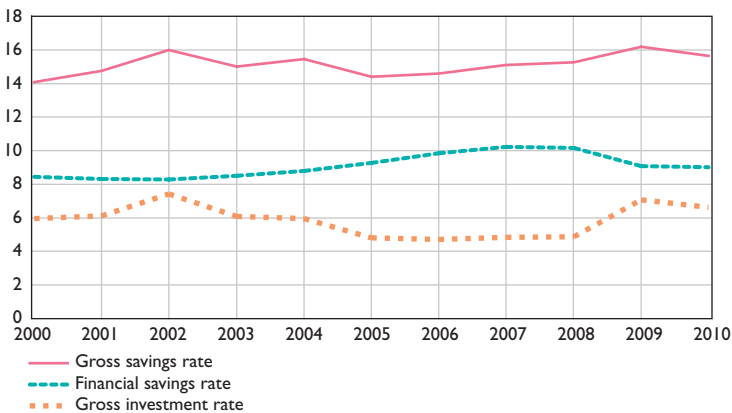
⁸ The provisions regarding wealth taxation introduced in the supplementary Budget Bill for 2011 adopted by the Council of Ministers on 11 May 2011 have not amended the tax regime of life insurance.

Chart 9 Net purchases/redemptions of debt securities and listed shares*(cumulated net flows over four quarters, in EUR billions)*

Source: Banque de France.

3| Main developments in French household savings over the past decade

In spite of the decrease recorded in 2010, the savings rate of French households is higher today than it was in the early 2000s. Over the 2000-2010 decade, it rose by 2 points of gross disposable income, while the financial savings rate only increased by 0.5 point (Chart 10). However, these developments did not occur synchronously. The savings rate climbed steadily from 2005 then picked up in 2008 during the financial crisis. On the other hand, the financial savings rate,

Chart 10 Gross savings, gross investment and households' financial savings*(as a % of gross disposable income)*

Sources: INSEE, Banque de France.

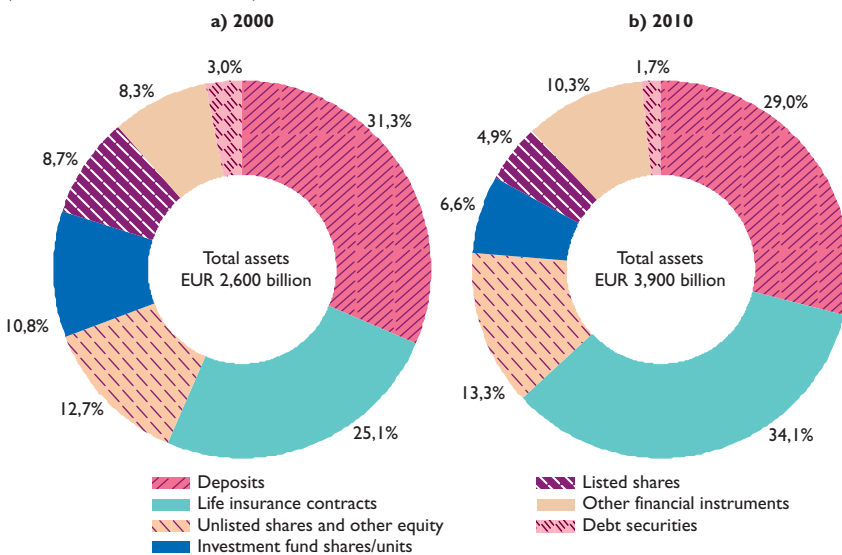
which had been steadily declining since 2002, increased over the whole period only on account of the sharp rise recorded in 2009, to stand at 7.2% of GDI. The growing gap between households' overall savings rate and their financial savings rate is attributable to the rise in their investment rate, with housing investment accounting for an increasing share of the total. Although this development, which started in the middle of the last decade, seems to have ended in 2009, it should be borne in mind that housing investment does not take into account transactions on the market for existing dwellings, which increased substantially in 2010 in both value and volume terms.

Before coming to an end with the financial crisis, the decrease in French households' financial savings rate during most of the last decade was accompanied by a change in the structure of their assets.

At the start of the 2000s, their outstanding deposits with banks constituted the most important component of their portfolio (31%), well ahead of life insurance, including pension savings (25%) (Chart 11a). Ten years later, these same life insurance investments had replaced bank deposits in households' financial wealth and represented more than one third (34%) in 2010 (Chart 11b). Overall, the share of the sum of bank deposits and life insurance in their portfolio increased (from 56.4% in 2000 to 63.1% in 2010) to the detriment of mutual fund shares/units, whose share dropped from 10.8% to 6.6% in 2010.

Chart 11 Breakdown by type of instrument of households' financial investment

(as a % of total outstanding)



Source: Banque de France.

Households' direct holdings of listed shares and debt securities recorded the most pronounced fall, receding to respectively 4.9% and 1.7% of their portfolio in 2010.

Thus, life insurance investments have accounted for a larger share of French households' financial wealth than bank deposits, albeit to a lesser extent in 2010. At the same time, their preference for savings held through financial intermediaries over direct holdings of securities has been confirmed. This trend could prevail in the coming years.

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(<http://search.banque-france.fr/index.php?rub=on&prof=>)

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Nota bene

Changes have been made to Tables 19, 21 and 23. In May 2011, the national financial accounts for France were rebased to 2005. This change of base year, which includes new sources of information and changes in nomenclature, has led to revisions to outstanding amounts and flows.

The data in this section are updated on a monthly basis on the Banque de France's website.

Table I
Industrial activity indicators – Monthly Business Survey – France

(NAF revision 2; seasonally-adjusted data)

	2011						
	Jan.	Feb.	March	April	May	June	July
Changes in production from the previous month (a)							
Total manufacturing	24	13	6	7	7	-12	5
Food products and beverages	21	13	10	10	0	12	5
Electrical, electronic and computer equipment and other machinery	27	8	11	-7	21	-12	0
Automotive industry	35	23	-18	1	5	-18	15
Other transport equipment	6	14	6	4	10	4	1
Other manufacturing	23	11	7	8	8	-16	5
Production forecasts (a)							
Total manufacturing	8	7	7	8	-4	-1	1
Food products and beverages	9	10	9	8	2	3	11
Electrical, electronic and computer equipment and other machinery	10	9	4	11	-9	3	2
Automotive industry	7	-10	1	6	-7	-5	1
Other transport equipment	21	22	15	15	14	16	15
Other manufacturing	8	9	9	11	-2	1	1
Changes in orders from the previous month (a)							
Total manufacturing	22	12	10	6	6	4	8
Foreign	18	13	11	7	8	6	9
Order books (a)							
Total manufacturing	24	22	22	17	19	15	12
Food products and beverages	8	8	11	9	8	10	4
Electrical, electronic and computer equipment and other machinery	22	23	20	10	15	11	11
Automotive industry	19	12	9	10	17	20	18
Other transport equipment	62	61	61	63	66	57	53
Other manufacturing	25	24	22	18	19	14	9
Inventories of finished goods (a)							
Total manufacturing	1	0	1	1	2	3	4
Food products and beverages	8	3	1	0	1	4	4
Electrical, electronic and computer equipment and other machinery	7	3	9	9	9	11	8
Automotive industry	-1	-4	0	3	2	-1	2
Other transport equipment	-1	0	0	2	-1	-3	3
Other manufacturing	-1	-1	-3	-1	1	2	5
Capacity utilisation rate (b)							
Total manufacturing	79.8	80.2	80.5	80.3	81.1	80.1	79.5
Staff levels (total manufacturing) (a)							
Changes from the previous month	6	3	3	2	1	1	0
Forecast for the coming month	2	3	2	2	1	1	1
Business sentiment indicator (c)							
	110	109	110	105	103	99	98

(a) Data given as a balance of opinions. Forecast series are adjusted for bias when it is statistically significant.

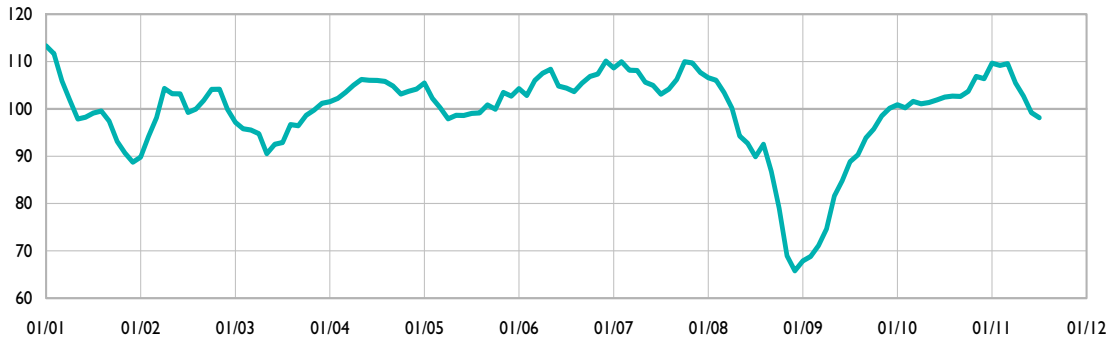
(b) Data given as a percentage.

(c) The indicator summarises industrial managers' sentiment regarding business conditions. The higher the indicator is, the more positive the assessment. The indicator is calculated using a principal component analysis of survey data smoothed over three months. By construction, the average is 100.

Table 2
Industrial activity indicators – Monthly Business Survey – France (NAF revision 2; seasonally-adjusted data)

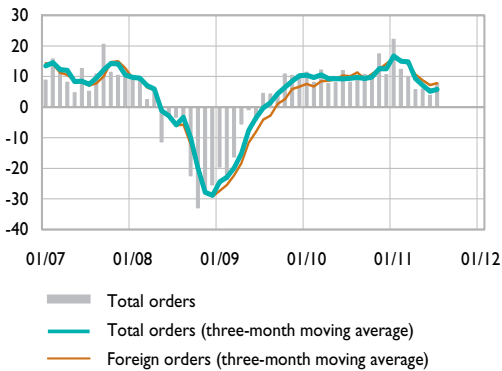
Business sentiment indicator

(100 = 1981 – last value)



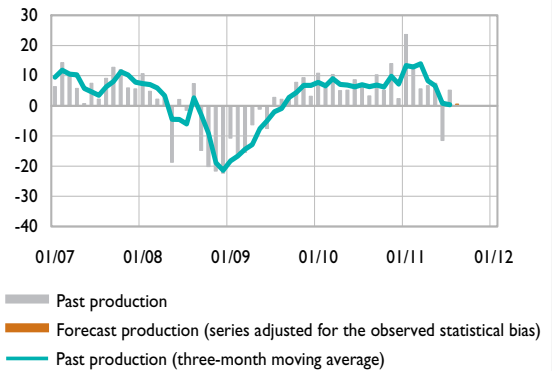
Orders (a)

(balance of opinions; monthly change)



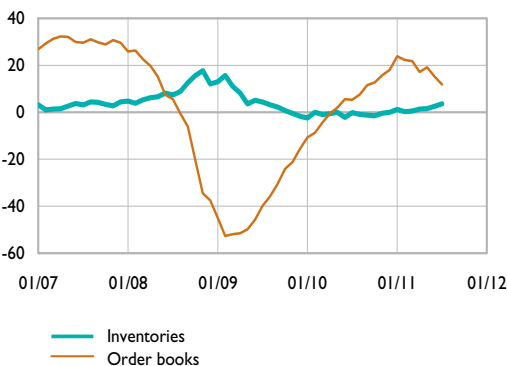
Production (a)

(balance of opinions; monthly change)



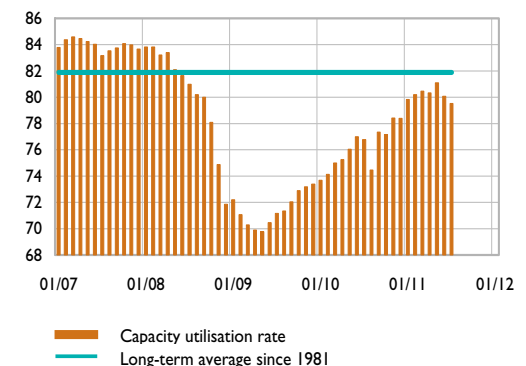
Inventories and order books (a)

(balance of opinions; compared to levels deemed normal)



Capacity utilisation rate (a)

(%)



(a) Manufacturing.
Source: Banque de France.

Table 3
Consumer price index

(annual % change)

	2010		2011						
	Nov.	Dec.	Jan.	Feb.	March	April	May	June	July
France	1.8	2.0	2.0	1.8	2.2	2.2	2.2	2.3	2.1
Germany	1.6	1.9	2.0	2.2	2.3	2.7	2.4	2.4	2.6
Italy	1.9	2.1	1.9	2.1	2.8	2.9	3.0	3.0	2.1
Euro area	1.9	2.2	2.3	2.4	2.7	2.8	2.7	2.7	2.5
United Kingdom	3.3	3.7	4.0	4.4	4.0	4.5	4.5	4.2	4.4
European Union	2.3	2.7	2.8	2.9	3.1	3.3	3.2	3.1	2.9
United States	1.1	1.5	1.6	2.1	2.7	3.2	3.6	3.6	3.6
Japan	-0.3	-0.4	-0.6	-0.5	-0.5	-0.5	-0.4	-0.4	na

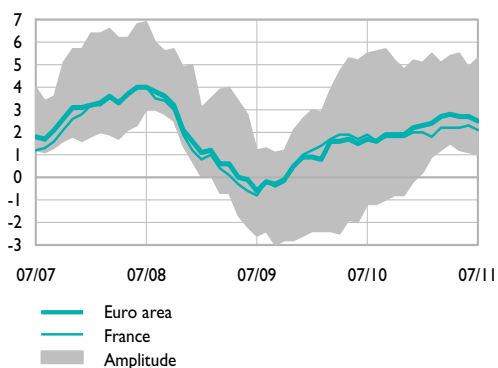
(annual average)

(seasonally-adjusted monthly % change)

	2008	2009	2010	2011					
				Feb.	March	April	May	June	July
France	3.2	0.1	1.7	0.1	0.4	0.2	0.0	0.1	0.0
Germany	2.8	0.2	1.2	0.3	0.3	0.3	0.0	0.1	0.2
Italy	3.5	0.8	1.6	0.3	0.5	0.1	0.2	0.1	-0.4
Euro area	3.3	0.3	1.6	0.1	0.6	0.4	0.0	0.0	0.0
United Kingdom	3.6	2.2	3.3	0.4	0.2	0.8	0.0	0.0	0.4
European Union	3.7	1.0	2.1	na	na	na	na	na	na
United States	3.8	-0.4	1.6	0.5	0.5	0.4	0.2	-0.2	0.5
Japan	1.4	-1.3	-0.7	0.2	-0.1	0.0	0.0	-0.2	na

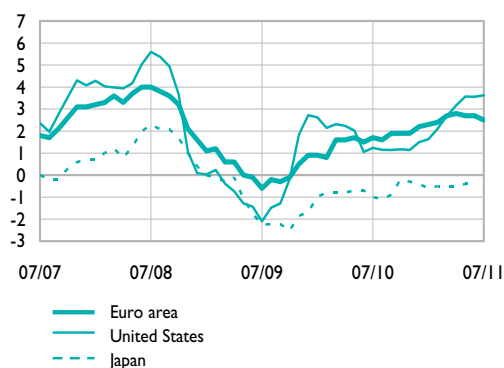
France and the euro area

(annual % change)



International comparisons

(annual % change)



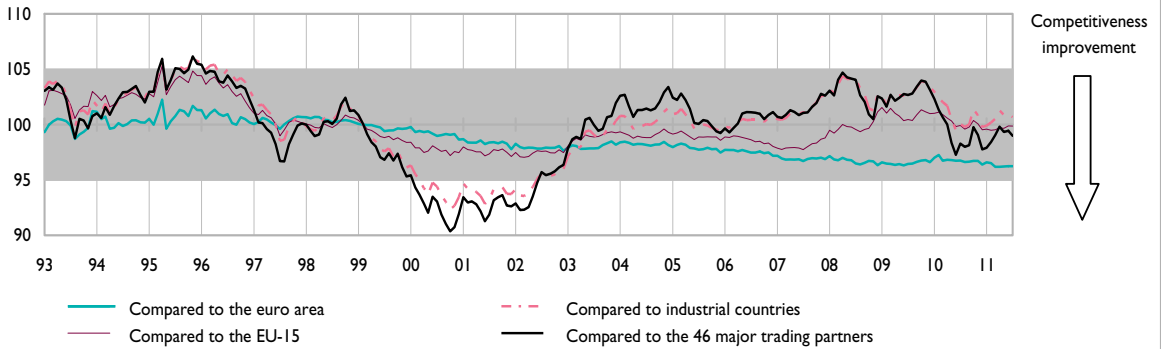
Harmonised indices except for the United States and Japan.

Amplitude = extreme values of the indices of harmonised prices observed in the euro area (changing composition).

Table 4
The competitiveness of France's economy

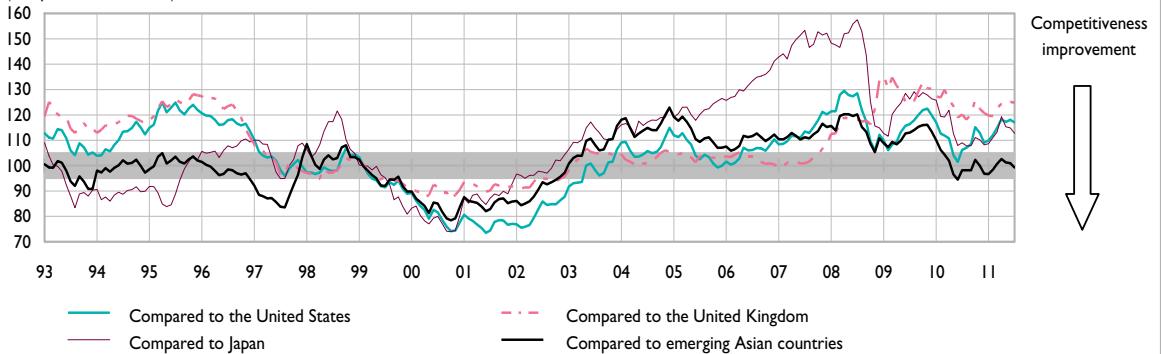
Indicators deflated by consumer prices

(1st quarter 1999 = 100)



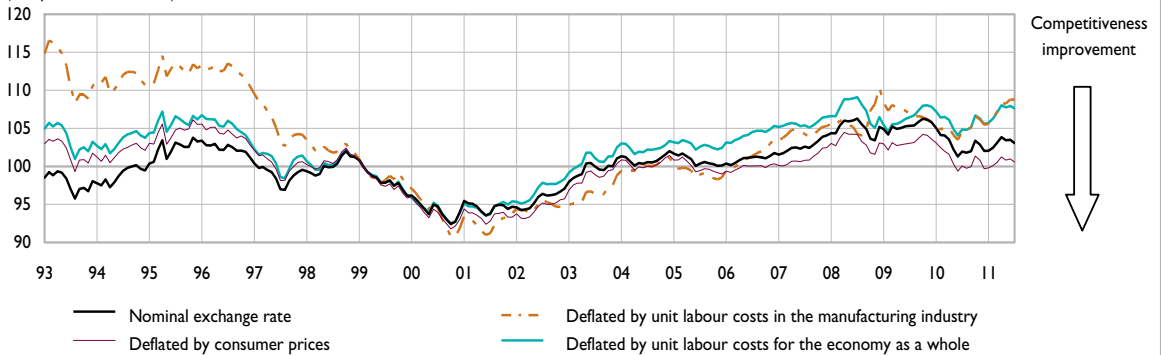
Indicators deflated by consumer prices

(1st quarter 1999 = 100)



Indicators of competitiveness compared to 24 OECD countries

(1st quarter 1999 = 100)



Grey area: change in competitiveness compared to long-term average less than 5%.

Sources: National data, Banque de France, ECB, IMF, OECD, Thomson Financial Datastream.

Table 5
Balance of payments – Main components (quarterly data) – France

(unadjusted data, EUR billions)

	2009	2010	2010				2011
			Q1	Q2	Q3	Q4	Q1
Current account	-28.4	-33.7	-1.8	-9.6	-6.4	-15.8	-10.9
Goods	-43.1	-53.7	-12.1	-12.9	-13.0	-15.7	-19.7
Services	10.2	10.0	0.6	4.5	6.6	-1.6	1.8
Income	31.6	36.5	13.7	5.3	8.7	8.8	10.7
Current transfers	-27.1	-26.5	-4.0	-6.4	-8.8	-7.3	-3.8
Capital account	0.3	0.0	0.2	0.0	-0.3	0.2	1.0
Financial account	41.1	18.2	-1.2	9.0	-0.9	11.3	-11.8
Direct investment	-49.6	-37.9	-15.0	-7.6	-7.2	-8.0	1.3
<i>French direct investment abroad</i>	<i>-74.1</i>	<i>-63.5</i>	<i>-22.1</i>	<i>-13.0</i>	<i>-19.5</i>	<i>-8.9</i>	<i>1.4</i>
<i>Foreign direct investment in France</i>	<i>24.5</i>	<i>25.6</i>	<i>7.1</i>	<i>5.4</i>	<i>12.3</i>	<i>0.9</i>	<i>-0.1</i>
Portfolio investment	251.1	119.9	32.6	107.8	-49.0	28.5	29.7
Assets	-77.4	23.2	-28.9	39.5	-20.1	32.7	-22.6
Liabilities	328.5	96.7	61.5	68.3	-28.9	-4.2	52.3
Financial derivatives	-16.9	34.3	8.2	10.6	10.4	5.1	2.2
Other investment	-147.4	-92.3	-25.2	-103.5	48.5	-12.0	-41.8
Reserve assets	3.9	-5.8	-1.7	1.7	-3.5	-2.2	-3.2
Net errors and omissions	-13.0	15.4	2.8	0.5	7.7	4.4	21.7

Current account balance

(unadjusted data, EUR billions)



Financial account balance

(unadjusted data, EUR billions)

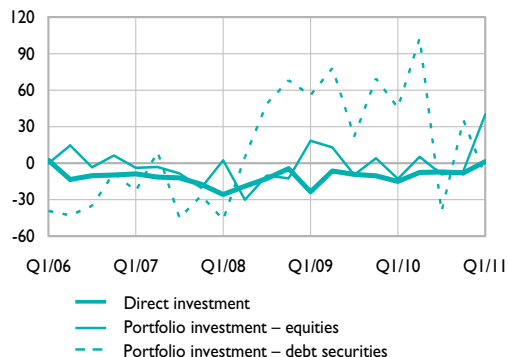


Table 6
Balance of payments – Current and capital accounts (quarterly data) – France

(unadjusted data, EUR billions)

	2009	2010	2010				2011
			Q1	Q2	Q3	Q4	
Current account	-28.4	-33.7	-1.8	-9.6	-6.4	-15.8	-10.9
Goods	-43.1	-53.7	-12.1	-12.9	-13.0	-15.7	-19.7
Exports	341.5	390.1	92.9	98.7	95.8	102.7	105.9
Imports	384.6	443.7	105.0	111.6	108.7	118.4	125.6
General merchandise	-43.6	-53.5	-12.0	-13.0	-13.0	-15.6	-19.1
Goods procured in ports by carriers	-1.4	-2.1	-0.4	-0.5	-0.5	-0.7	-0.6
Goods for processing and repairs on goods	1.9	1.9	0.4	0.5	0.5	0.5	0.1
Services	10.2	10.0	0.6	4.5	6.6	-1.6	1.8
Exports	103.7	109.9	22.4	29.6	33.1	24.7	25.4
Imports	93.5	99.8	21.9	25.1	26.5	26.3	23.5
Transportation	-0.7	0.1	-0.3	0.0	0.3	0.0	-0.6
Travel	8.0	6.1	0.3	2.5	5.2	-1.9	0.1
Communications services	0.6	0.5	0.1	0.2	0.1	0.0	0.1
Construction services	2.6	2.5	0.5	0.7	0.6	0.7	0.6
Insurance services	-0.8	-1.3	-0.2	0.0	-0.6	-0.4	-0.2
Financial services	0.6	0.4	0.1	0.2	0.1	0.0	0.3
Computer and information services	-0.4	-0.2	0.0	0.0	0.0	-0.1	-0.1
Royalties and license fees	3.2	3.7	0.9	0.8	0.9	1.0	1.3
Other business services	-1.8	-0.5	-0.6	0.4	0.2	-0.5	0.4
Personal, cultural and recreational services	-1.3	-1.3	-0.3	-0.3	-0.3	-0.3	-0.3
Government services	0.1	0.2	0.1	0.0	0.1	0.0	0.1
Income	31.6	36.5	13.7	5.3	8.7	8.8	10.7
Compensation of employees	9.6	9.9	2.5	2.5	2.5	2.5	2.5
Investment income	22.0	26.6	11.2	2.8	6.2	6.3	8.2
Direct investment	25.7	34.1	10.2	9.3	6.4	8.1	6.5
Portfolio investment	0.1	-5.1	1.7	-6.0	0.3	-1.1	2.0
Other investment	-3.7	-2.4	-0.7	-0.5	-0.5	-0.7	-0.3
Current transfers	-27.1	-26.5	-4.0	-6.4	-8.8	-7.3	-3.8
General government	-18.1	-18.0	-2.2	-4.5	-6.4	-5.0	-1.9
Other sectors	-9.0	-8.5	-1.8	-2.0	-2.4	-2.3	-1.9
of which workers' remittances	-2.1	-2.1	-0.5	-0.5	-0.6	-0.5	-0.4
Capital account	0.3	0.0	0.2	0.0	-0.3	0.2	1.0

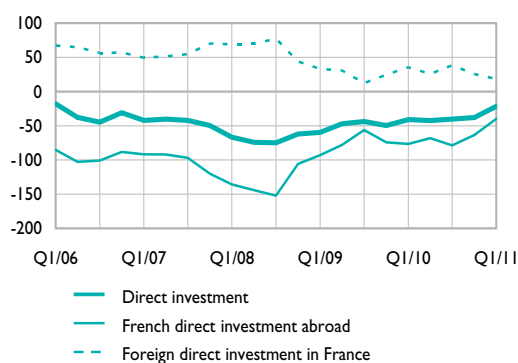
Table 7
Balance of payments – Financial flows (quarterly data) – France

(unadjusted data, EUR billions)

	2009	2010	2010				2011
			Q1	Q2	Q3	Q4	
Financial account	41.1	18.2	-1.2	9.0	-0.9	11.3	-11.8
Direct investment	-49.6	-37.9	-15.0	-7.6	-7.2	-8.0	1.3
French direct investment abroad	-74.1	-63.5	-22.1	-13.0	-19.5	-8.9	1.4
of which equity capital and reinvested earnings	-47.7	-44.4	-16.6	-10.2	-12.9	-4.7	0.4
Foreign direct investment in France	24.5	25.6	7.1	5.4	12.3	0.9	-0.1
of which equity capital and reinvested earnings	16.4	23.8	5.1	7.8	5.5	5.5	3.6
Portfolio investment	251.1	119.9	32.6	107.8	-49.0	28.5	29.7
Assets	-77.4	23.2	-28.9	39.5	-20.1	32.7	-22.6
Equity securities	-27.2	-17.0	-6.8	2.0	-0.1	-12.0	26.7
Bonds and notes	-11.6	-0.2	-24.8	13.8	-23.2	33.9	-41.1
Short-term debt securities	-38.6	40.4	2.7	23.7	3.2	10.8	-8.1
Liabilities	328.5	96.7	61.5	68.3	-28.9	-4.2	52.3
Equity securities	53.0	-6.3	-6.0	3.3	-9.1	5.5	13.4
Bonds and notes	199.2	99.5	63.2	53.7	-24.2	6.8	21.3
Short-term debt securities	76.3	3.5	4.3	11.3	4.4	-16.5	17.6
Financial derivatives	-16.9	34.3	8.2	10.6	10.4	5.1	2.2
Other investment	-147.4	-92.3	-25.2	-103.5	48.5	-12.0	-41.8
of which MFIs excl. Banque de France (net flows)	-75.8	-46.6	-16.8	-31.6	10.5	-8.7	-26.0
Reserve assets	3.9	-5.8	-1.7	1.7	-3.5	-2.2	-3.2
Net errors and omissions	-13.0	15.4	2.8	0.5	7.7	4.4	21.7

Direct investment account

(cumulated flows over 4 quarters)



Portfolio investment account

(cumulated flows over 4 quarters)

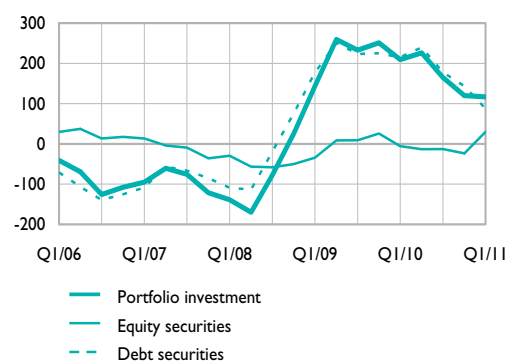


Table 8
Balance of payments – Geographical breakdown (quarterly data) – France

(unadjusted data, EUR billions)

	1st quarter 2011					
	EMU (a)	EU-27 excl. EMU (b)	USA	Japan	Switzerland	China
Current account	-5.7	1.3	-1.6	0.0	1.5	na
Receipts	79.6	30.3	9.6	2.7	6.9	4.2
Expenditure	85.3	29.0	11.2	2.7	5.4	na
Goods	-8.5	0.6	-1.4	-0.6	0.7	-6.0
Receipts	52.0	13.6	5.2	1.6	3.5	3.1
Expenditure	60.5	13.1	6.6	2.2	2.8	9.1
Services	0.6	0.5	0.0	0.1	0.1	0.2
Receipts	8.4	3.6	2.0	0.4	1.3	0.8
Expenditure	7.8	3.1	2.0	0.3	1.2	0.6
Income	2.9	0.1	-0.1	0.6	1.2	na
Receipts	18.6	4.6	2.3	0.7	1.9	0.2
Expenditure (c)	15.6	4.6	2.4	0.2	0.7	na
Current Transfers	-0.8	0.2	-0.1	0.0	-0.5	0.0
Financial account						
Direct investment	-1.9	-2.6	5.8	-0.3	2.4	-0.2
French direct investment abroad	0.5	-3.3	5.8	-0.3	1.4	-0.2
Foreign direct investment in France	-2.3	0.7	0.0	0.0	1.1	0.0
Portfolio investment – Assets (d)	-15.4	3.0	-6.1	0.4	0.2	-0.6
Equity securities	11.6	6.3	0.9	2.0	0.3	-0.4
Bonds and notes	-25.9	-4.0	-5.5	1.3	-0.5	0.0
Short-term debt securities	-1.2	0.7	-1.5	-2.8	0.4	-0.1
Other investment	-3.0	-22.1	-20.7	0.1	-2.2	-3.0
of which MFIs excluding Banque de France (net flows)	7.9	-3.9	-17.0	-1.3	-1.3	-3.2

(a) 17 Member States (including Estonia as of 1 January 2011).

(b) Denmark, United Kingdom, Sweden, European Institutions and New Member States (Czech Republic, Hungary, Latvia, Lithuania, Poland, Bulgaria, Romania).

(c) Geographical breakdown of portfolio investment income based on data compiled by the IMF (Coordinated Portfolio Investment Survey); data not available for China.

(d) The geographical breakdown is not available for liabilities.

Table 9
Balance of payments (monthly data) – France

(unadjusted data, EUR billions)

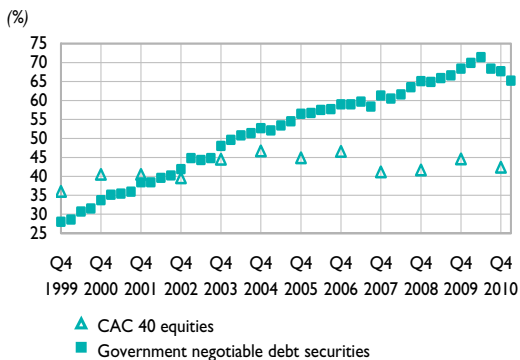
	2010	2011			12-month total	
		June	April	May	June	June
						2010
					June	June
Current account	-1.9	-3.1	-9.8	-5.6	-23.5	-51.7
Goods	-3.5	-6.3	-8.1	-5.6	-45.2	-68.3
Services	1.7	1.0	1.6	2.1	11.9	11.5
Income	1.7	4.2	-0.3	-0.2	35.4	31.9
Current transfers	-1.9	-1.9	-3.0	-2.0	-25.6	-26.9
Capital account	0.0	0.1	0.1	0.0	0.2	1.0
Financial account	8.2	16.7	33.7	17.9	37.7	66.9
Direct investment	-4.9	-17.7	-2.8	-6.2	-42.3	-40.6
<i>French direct investment abroad</i>	-8.5	-23.8	-5.6	-7.3	-68.1	-63.6
Equity capital	-2.8	-19.9	-0.3	-2.5	-27.7	-21.5
Reinvested earnings	-2.0	-2.1	-2.1	-2.1	-16.3	-24.7
Other capital	-3.7	-1.8	-3.2	-2.7	-24.1	-17.4
<i>Foreign direct investment in France</i>	3.6	6.0	2.9	1.1	25.8	23.0
Equity capital	2.7	0.8	0.4	1.2	12.9	8.2
Reinvested earnings	1.1	0.8	0.8	0.8	7.1	11.1
Other capital	-0.1	4.4	1.7	-0.9	5.8	3.8
Portfolio investment	61.8	6.3	12.5	69.8	226.2	97.8
Assets	28.0	-17.8	-17.9	41.9	-24.4	-3.8
Equity securities	8.6	-9.2	7.7	9.6	-46.8	22.5
Bonds and notes	15.4	-6.0	-11.3	9.9	-16.9	-37.6
Short-term debt securities	4.0	-2.7	-14.3	22.4	39.3	11.3
Liabilities	33.9	24.2	30.4	27.9	250.6	101.6
Equity securities	2.4	0.0	1.0	1.1	33.6	11.9
Bonds and notes	32.2	26.0	21.0	28.9	174.2	79.8
Short-term debt securities	-0.7	-1.8	8.3	-2.1	42.8	9.9
Financial derivatives	3.3	-4.6	3.0	2.5	13.5	18.6
Other investment	-52.6	29.1	24.3	-49.0	-158.3	-0.9
<i>of which MFIs excl. Banque de France (net flows)</i>	-17.1	27.0	11.8	-46.0	-97.5	-31.3
Reserve assets	0.6	3.5	-3.3	0.8	-1.5	-7.9
Net errors and omissions	-6.4	-13.6	-24.0	-12.3	-14.4	-16.2

Table 10
France's international investment position (direct investment measured at book value)

(EUR billions)

	2006	2007	2008	2009	2010	2011
	Dec.	Dec.	Dec.	Dec.	Dec.	Q1
Assets	4,041.2	4,533.5	4,414.1	4,673.2	5,061.7	5,093.9
French direct investment abroad	793.1	874.2	975.3	1,041.9	1,144.8	1,120.7
Equity capital and reinvested earnings	548.8	598.2	658.6	700.0	775.8	758.2
Other capital	244.3	276.0	316.7	341.9	369.0	362.5
Portfolio investment	1,851.0	2,014.1	1,857.4	2,056.3	2,099.7	2,100.1
(foreign securities held by residents)						
MFIs (resident security-holding sector)	755.0	743.2	730.7	731.3	655.6	661.9
Non-MFIs (resident security-holding sector)	1,095.9	1,270.9	1,126.7	1,325.0	1,444.1	1,438.2
Financial derivatives	159.2	241.0	234.0	273.5	324.5	355.6
Other investment	1,163.3	1,325.7	1,273.5	1,209.1	1,368.2	1,395.8
MFIs	945.6	1,094.7	1,058.6	990.3	1,123.2	1,129.1
Non-MFIs	217.7	231.0	214.9	218.8	245.0	266.7
Reserve assets	74.6	78.6	74.0	92.4	124.5	121.8
Liabilities	-4,188.3	-4,708.2	-4,633.3	-4,884.9	-5,216.8	-5,250.8
Foreign direct investment in France	-578.7	-649.1	-684.5	-690.7	-722.2	-718.9
Equity capital and reinvested earnings	-348.7	-386.2	-395.3	-394.2	-418.0	-421.6
Other capital	-230.0	-262.9	-289.2	-296.5	-304.2	-297.2
Portfolio investment	-1,963.0	-1,987.9	-1,872.5	-2,315.3	-2,450.1	-2,482.1
(French securities held by non-residents)						
MFIs (resident security-issuing sector)	-484.4	-505.4	-493.3	-554.5	-583.2	-599.7
Non-MFIs (resident security-issuing sector)	-1,478.6	-1,482.5	-1,379.2	-1,760.8	-1,866.9	-1,882.4
Financial derivatives	-188.9	-312.6	-289.3	-311.8	-397.2	-430.4
Other investment	-1,457.7	-1,758.7	-1,787.0	-1,567.0	-1,647.3	-1,619.5
MFIs	-1,245.0	-1,465.6	-1,345.2	-1,197.3	-1,298.6	-1,267.7
Non-MFIs	-212.7	-293.1	-441.7	-369.8	-348.6	-351.8
Net position	-147.1	-174.7	-219.2	-211.7	-155.1	-156.9

Non-resident holdings of CAC 40 equities and government negotiable debt securities



France's international investment position

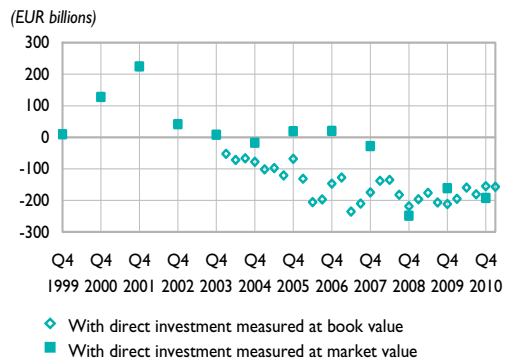
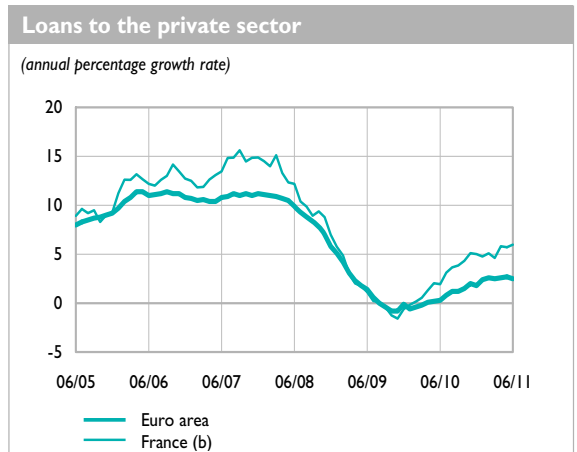
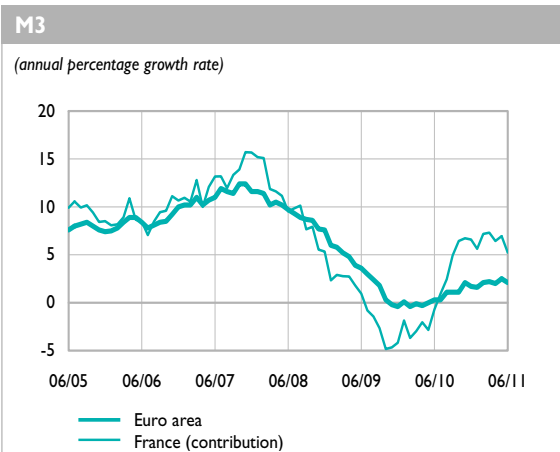
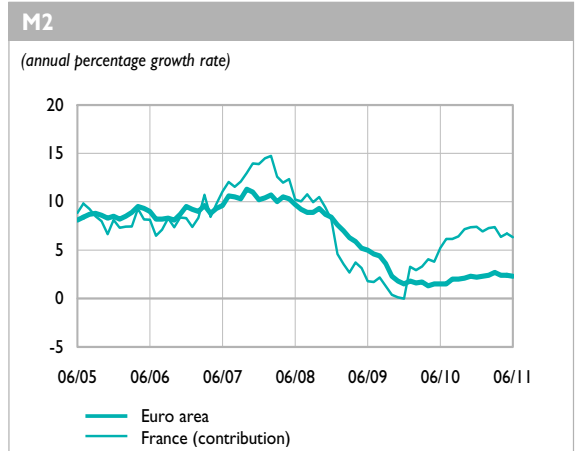
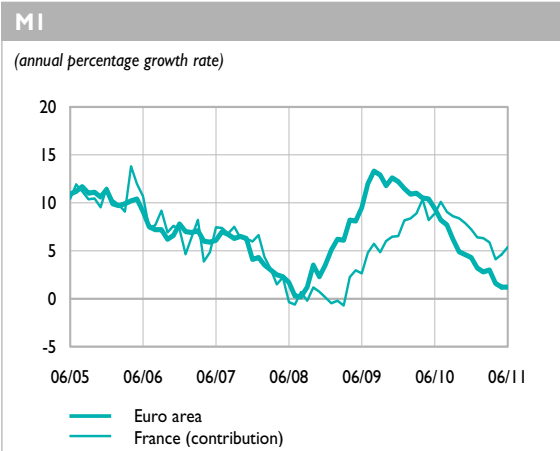


Table I
Main monetary and financial aggregates – France and the euro area

(annual percentage growth rate)

	2008	2009	2010	2010	2010	2011					
	Dec.	Dec.	Dec.	June	Dec.	Jan.	Feb.	March	April	May	June
M1											
Euro area (a)	3.5	12.2	4.3	9.4	4.3	3.2	2.8	3.0	1.6	1.2	1.2
France (contribution)	0.2	6.5	7.2	8.9	7.2	6.4	6.3	5.9	4.1	4.6	5.4
M2											
Euro area (a)	8.4	1.5	2.2	1.5	2.2	2.3	2.4	2.7	2.4	2.4	2.3
France (contribution)	8.1	0.0	7.4	5.2	7.4	6.9	7.3	7.4	6.4	6.7	6.3
M3											
Euro area (a)	7.6	-0.4	1.7	0.3	1.7	1.6	2.1	2.2	2.0	2.5	2.1
France (contribution)	5.3	-4.2	6.6	-0.7	6.6	5.6	7.2	7.3	6.4	6.9	5.2
Loans to the private sector											
Euro area (a)	5.8	-0.1	1.8	0.3	1.8	2.4	2.6	2.5	2.6	2.7	2.5
France (b)	7.0	-0.6	5.0	1.9	5.0	4.8	5.1	4.6	5.8	5.7	6.0



(a) Seasonal and calendar effect adjusted data.

(b) Loans extended by MFIs resident in France to euro area residents excluding MFIs and central government.

Sources: Banque de France, European Central Bank.

Produced 19 August 2011

Table 12
Balance sheet of the Banque de France

(outstanding amounts at the end of the period, EUR billions)

	2008	2009	2010	2010	2011			
	Dec.	Dec.	Dec.	June	March	April	May	June
Assets								
National territory	220.2	165.1	89.7	172.5	77.4	76.0	78.3	77.5
Loans	190.7	129.1	42.3	133.3	24.4	21.5	22.4	21.3
MFIs	190.6	129.0	42.1	133.2	24.2	21.4	22.2	21.1
Central government	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0
Private sector	0.2	0.1	0.2	0.1	0.2	0.2	0.2	0.2
Securities other than shares	29.5	35.9	47.4	39.2	53.1	54.5	55.9	56.2
MFIs	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0
Central government	29.5	35.9	47.4	39.2	53.1	54.5	55.9	56.2
Private sector	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0
Money market instruments	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0
Shares and other equity	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0
Other euro area countries	60.6	77.1	86.7	92.1	84.4	84.1	85.4	86.0
Rest of the world	110.7	96.3	99.1	91.1	103.6	100.9	109.8	111.5
Gold	49.8	60.0	82.6	79.2	78.9	81.4	83.8	81.7
Not broken down by geographical area (a)	115.8	111.7	127.1	121.4	127.2	132.4	130.4	124.7
Total	557.1	510.1	485.3	556.4	471.4	474.7	487.7	481.4
Liabilities								
National territory – Deposits	105.1	84.5	51.2	170.3	53.3	49.2	45.3	57.5
MFIs	94.3	64.9	49.3	119.9	52.3	48.5	44.3	56.7
Central government	10.3	18.0	1.5	49.9	0.5	0.3	0.5	0.4
Other sectors (overnight deposits)	0.5	1.6	0.4	0.5	0.4	0.4	0.4	0.5
Other euro area countries – Deposits	117.7	62.0	28.3	0.0	22.4	22.7	28.9	18.3
MFIs	117.7	62.0	28.3	0.0	22.4	22.7	28.9	18.3
Other sectors	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0
Rest of the world – Deposits	99.4	112.7	122.9	113.6	123.2	122.8	130.6	132.8
Not broken down by geographical area	234.9	250.9	282.9	272.5	272.6	280.1	283.0	272.7
Currency in circulation (b)	147.3	153.7	160.1	154.8	156.8	158.7	159.4	161.1
Debt securities issued	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0
Money market instruments	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0
Capital and reserves	58.6	70.6	97.6	78.7	92.4	95.8	98.2	95.9
Other	29.0	26.6	25.2	38.9	23.4	25.6	25.4	15.7
Total	557.1	510.1	485.3	556.4	471.4	474.7	487.7	481.4

(a) Including adjustments for the new accounting method for banknotes on the liability side of the Banque de France balance sheet since January 2002.

(b) Since January 2002, banknotes in circulation have been treated according to specific euro area accounting conventions. 8% of the total value of euro banknotes in circulation is allocated to the European Central Bank. The remaining 92% is broken down between the NCBs in proportion to their share in the paid-up capital of the ECB.

Table 13
Balance sheet of monetary financial institutions (MFIs) excluding the Banque de France

(outstanding amounts at the end of the period in EUR billions)

	2008	2009	2010	2010	2011			
	Dec.	Dec.	Dec.	June	March	April	May	June
Assets								
National territory	4,517.7	4,527.2	4,568.2	4,743.4	4,555.2	4,604.0	4,609.7	4,639.0
Loans	3,493.6	3,509.9	3,562.1	3,724.8	3,642.7	3,698.9	3,693.5	3,705.9
MFIs	1,480.2	1,486.5	1,413.9	1,631.6	1,457.8	1,497.8	1,489.5	1,495.4
General government	173.8	196.1	217.8	209.7	204.0	197.6	188.4	186.9
Private sector	1,839.6	1,827.4	1,930.4	1,883.5	1,980.9	2,003.5	2,015.6	2,023.6
Securities other than shares	636.2	622.6	613.6	629.7	546.2	537.6	546.4	565.5
MFIs ≤ 2 years	242.6	229.8	208.5	224.0	183.1	175.9	176.5	170.9
MFIs > 2 years	121.8	113.4	134.8	116.8	105.2	100.8	105.1	126.3
General government	149.7	159.7	152.1	162.9	137.0	139.1	137.6	146.9
Private sector	122.1	119.8	118.3	126.0	120.8	121.8	127.1	121.4
Money market fund shares/units	90.3	79.1	52.6	61.1	56.7	55.8	56.8	53.3
Shares and other equity	297.7	315.5	339.9	327.7	309.6	311.7	313.0	314.2
Other euro area countries	1,006.4	1,034.4	1,020.2	1,039.0	911.6	951.3	958.9	913.6
Rest of the world	926.0	848.2	962.9	949.5	955.1	970.9	1,017.5	955.5
Not broken down by geographical area	1,260.4	1,247.1	1,278.7	1,458.6	1,253.3	1,288.2	1,332.9	1,269.5
Total	7,710.6	7,656.7	7,830.1	8,190.5	7,675.3	7,814.4	7,919.0	7,777.6
Liabilities								
National territory – Deposits	3,043.5	3,099.0	3,035.3	3,251.6	3,124.1	3,174.4	3,167.7	3,214.8
MFIs	1,605.1	1,571.3	1,423.1	1,686.7	1,446.9	1,489.8	1,486.1	1,487.0
Central government	23.4	28.3	28.7	32.4	49.2	34.2	36.9	70.4
Other sectors	1,415.0	1,499.4	1,583.5	1,532.4	1,627.9	1,650.4	1,644.7	1,657.4
Overnight deposits	434.4	463.1	502.1	474.2	488.0	500.0	489.2	507.5
Deposits with agreed maturity ≤ 2 years	185.3	131.3	133.4	131.1	141.8	136.2	137.6	135.2
Deposits with agreed maturity > 2 years	260.9	362.4	377.0	372.2	419.3	424.3	426.9	431.0
Deposits redeemable at notice ≤ 3 months	486.0	501.1	518.8	502.0	532.2	537.7	538.6	538.0
Repos	48.5	41.5	52.3	53.0	46.6	52.2	52.3	45.7
Other euro area countries – Deposits	377.6	338.3	380.3	353.1	373.9	393.8	394.0	375.0
MFIs	277.6	229.3	220.6	219.4	227.1	238.5	231.0	230.0
Other sectors	100.1	109.0	159.7	133.6	146.8	155.3	163.0	145.0
Rest of the world – Deposits	985.3	880.9	968.9	948.3	898.5	945.2	1,002.0	910.9
Not broken down by geographical area	3,304.1	3,338.6	3,445.6	3,637.6	3,278.8	3,301.0	3,355.2	3,277.0
Debt securities issued ≤ 2 years	458.6	381.4	409.8	420.3	418.2	409.1	408.9	396.0
Debt securities issued > 2 years	689.3	715.2	754.9	749.5	779.9	780.4	785.7	807.3
Money market fund shares/units	483.3	479.2	394.3	428.1	387.8	389.8	394.1	371.3
Capital and reserves	416.1	454.7	476.7	466.7	483.5	483.5	483.8	491.5
Other	1,256.8	1,308.1	1,409.9	1,573.0	1,209.5	1,238.3	1,282.5	1,210.9
Total	7,710.6	7,656.7	7,830.1	8,190.5	7,675.3	7,814.4	7,919.0	7,777.6

NB: Since July 2003, financial transactions carried out by La Poste have been accounted for in the balance sheet of monetary financial institutions. This has resulted in an increase in the item "Shares and other equity" in Assets, and in "Overnight deposits" and "Capital and reserves" in Liabilities.

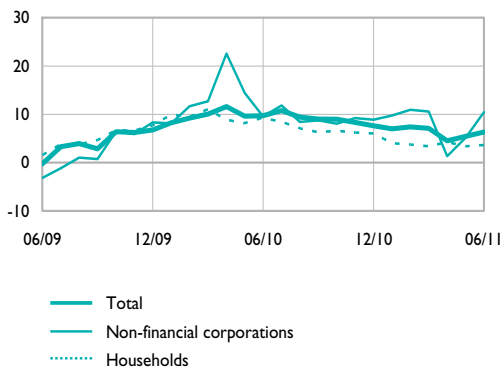
Table I4
Deposits – France

(outstanding amounts at the end of the period in EUR billions – % growth)

	2008	2009	2010	2010	2011			
	Dec.	Dec.	Dec.	June	March	April	May	June
Overnight deposits								
Total non-financial sectors (excluding central government)	447.8	481.1	516.3	477.1	494.4	500.6	493.9	513.6
Households and similar	243.7	262.4	278.4	270.5	273.7	283.0	274.6	282.7
Non-financial corporations	154.5	167.0	182.5	160.8	174.6	171.2	171.7	181.5
General government (excl. central government)	49.6	51.7	55.4	45.8	46.0	46.4	47.6	49.4
Other sectors	33.6	32.6	38.7	39.3	35.1	40.6	37.4	36.0
Total – Outstanding amounts	481.4	513.7	555.1	516.4	529.5	541.2	531.3	549.7
Total – Growth rate	-3.8	6.8	7.6	9.7	7.1	4.5	5.4	6.3
Passbook savings accounts								
"A" and "Blue" passbooks	164.4	183.4	193.5	185.8	200.8	202.6	203.3	203.6
Housing savings accounts	36.7	36.6	36.1	35.8	36.3	36.4	36.3	36.1
Sustainable development passbook accounts	70.2	69.1	68.0	68.2	68.7	69.0	68.8	68.5
People's savings passbooks	62.0	58.3	54.4	55.7	52.9	53.0	52.9	52.8
Youth passbooks	7.4	7.2	7.0	7.0	6.9	6.9	6.9	6.9
Taxable passbooks	145.4	146.5	159.8	149.5	166.7	169.8	170.5	170.1
Total – Outstanding amounts	486.0	501.1	518.8	502.0	532.2	537.7	538.6	538.0
Total – Growth rate	11.1	3.1	3.5	-0.2	5.8	6.1	6.6	6.7

Overnight deposits

(annual growth rate)



Passbook savings accounts

(annual growth rate)

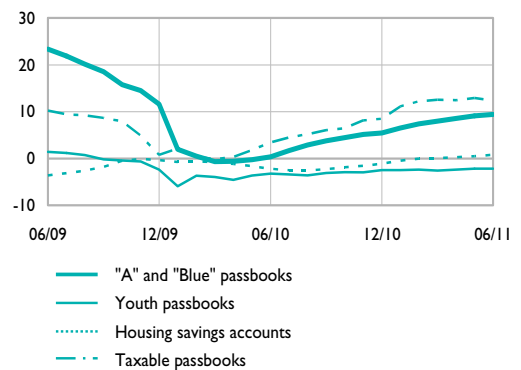


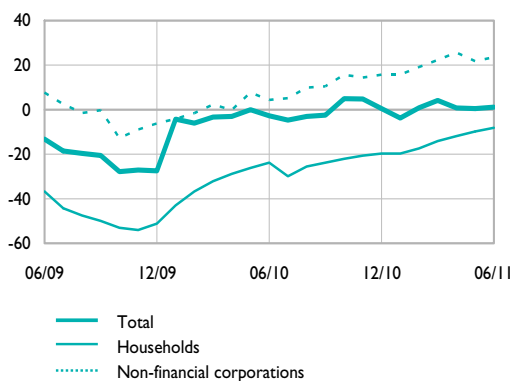
Table 15
Time deposits – France

(outstanding amounts at the end of the period in EUR billions – % growth)

	2008	2009	2010	2010	2011			
	Dec.	Dec.	Dec.	June	March	April	May	June
Deposits with agreed maturity up to two years								
Total non-financial sectors (excl. central government)	121.9	86.1	89.1	84.5	99.2	98.1	99.8	99.4
Households and similar	62.4	30.4	24.5	28.7	29.2	29.1	29.4	29.6
Non-financial corporations	58.8	55.1	63.9	55.2	69.1	68.1	69.4	68.9
General government (excl. central government)	0.8	0.6	0.7	0.7	0.9	0.9	1.0	1.0
Other sectors	63.4	45.1	44.2	46.5	42.6	38.1	37.8	35.7
Total – Outstanding amounts	185.3	131.3	133.4	131.1	141.8	136.2	137.6	135.2
Total – Growth rate	45.0	-27.4	0.5	-2.7	4.1	0.8	0.5	1.1
Deposits with agreed maturity of over two years								
Total non-financial sectors (excl. central government)	236.5	264.3	282.6	270.9	291.1	292.7	294.5	294.3
Households and similar	223.2	241.4	248.0	242.8	251.5	251.9	252.2	251.8
PEL	168.7	173.8	182.3	176.4	183.3	183.3	183.3	182.8
PEP	29.3	29.0	26.6	27.2	25.8	25.5	25.3	25.0
Other	25.1	38.6	39.1	39.3	42.4	43.1	43.6	43.9
Non-financial corporations	13.3	22.5	34.0	27.5	38.9	40.0	41.6	41.8
General government (excl. central government)	0.1	0.4	0.6	0.5	0.7	0.7	0.7	0.7
Other sectors	24.4	98.1	94.4	101.2	128.2	131.6	132.4	136.7
Total – Outstanding amounts	260.9	362.4	377.0	372.2	419.3	424.3	426.9	431.0
Total – Growth rate	-5.9	38.1	3.5	9.8	5.7	7.0	7.1	8.4

Deposits up to 2 years

(annual percentage growth rate)



Deposits over 2 years

(annual percentage growth rate)

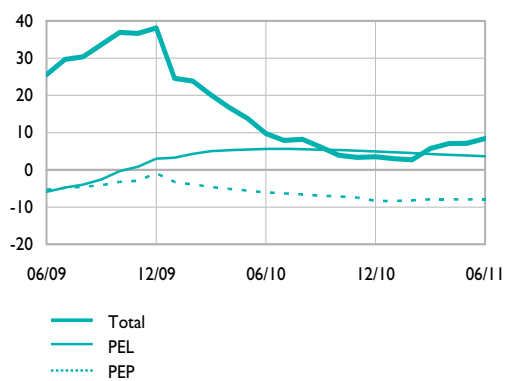
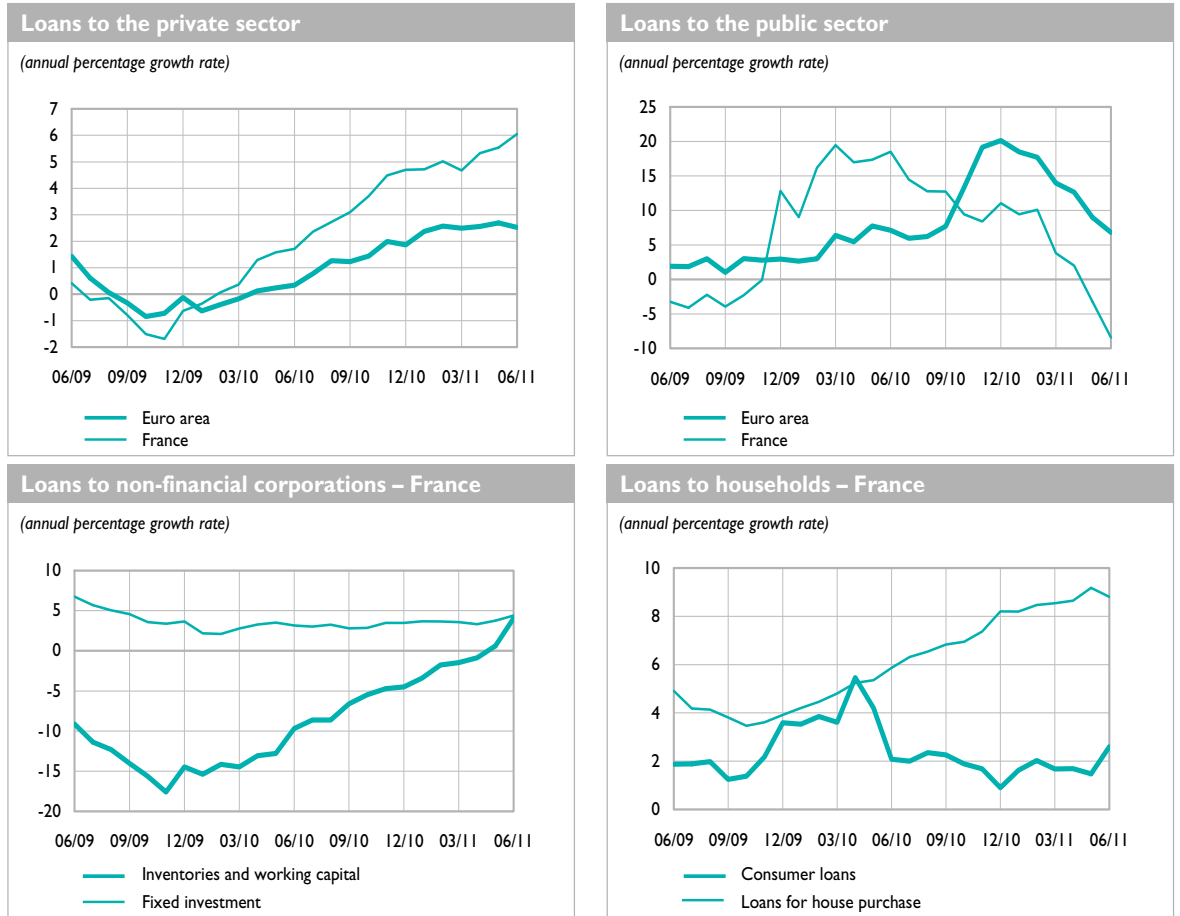


Table 16
Loans extended by credit institutions established in France to French residents – France

(outstanding amounts at the end of the period in EUR billions – % growth)

	2008	2009	2010	2010	2011				
	Dec.	Dec.	Dec.	June	Feb.	March	April	May	June
Loans from monetary financial institutions									
Private sector	1,839.8	1,827.5	1,930.6	1,883.7	1,971.7	1,981.1	2,003.6	2,015.8	2,023.8
General government	173.8	196.1	217.8	209.7	207.2	204.0	197.6	188.4	186.9
Total – Outstanding amounts	2,013.5	2,023.6	2,148.4	2,093.4	2,179.0	2,185.0	2,201.3	2,204.2	2,210.7
Private sector	6.2	-0.6	4.7	1.7	5.0	4.7	5.3	5.5	6.0
General government	3.1	12.8	11.0	18.5	10.1	3.8	2.0	-3.3	-8.4
Total – Growth rate	5.9	0.5	5.3	3.2	5.5	4.6	5.0	4.7	4.6
Loans from credit institutions to non-financial corporations									
Fixed investment	312.6	323.9	335.7	328.6	337.1	334.0	335.9	338.1	339.6
Inventories and working capital	216.2	184.5	177.9	178.9	178.0	183.3	187.2	187.7	193.3
Other lending	252.9	260.9	267.2	264.9	267.0	273.5	273.9	273.1	274.8
Total – Outstanding amounts	781.6	769.3	780.8	772.4	782.1	790.8	797.0	798.9	807.7
Total – Growth rate	9.5	-1.2	1.2	0.0	1.7	2.0	2.3	2.5	3.9
Loans from credit institutions to households									
Loans for house purchase	710.0	737.6	796.6	756.5	802.3	808.4	812.3	819.9	826.3
Consumer loans	145.5	152.9	154.7	152.5	153.8	148.8	149.2	150.2	151.0
Other lending	84.7	84.2	87.1	87.5	88.2	89.0	90.0	90.3	90.7
Total – Outstanding amounts	940.1	974.7	1,038.4	996.5	1,044.3	1,046.2	1,051.6	1,060.4	1,068.0
Total – Growth rate	7.3	4.0	6.6	5.0	6.9	6.8	7.0	7.5	7.5

Table 17
Loans from credit institutions broken down by counterpart and by financing purpose – France (a) and euro area



(a) Loans extended by credit institutions established in France to French residents.

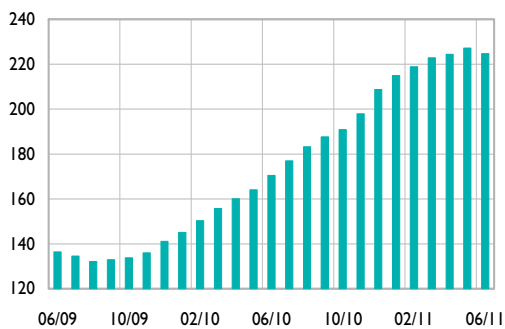
Table 18
New loans to residents – France

(excl. overdrafts, cumulative amounts over 12 months in EUR billions)

	2010			2011		
	April	May	June	April	May	June
Total – new loans	390.8	395.4	402.1	458.6	464.0	464.0
Loans to households	160.0	164.0	170.4	224.4	227.2	224.7
Consumer loans (excl. overdrafts)	52.6	52.7	53.0	50.3	50.4	49.6
Loans for house purchase with an IRFP ≤ 1 year (a)	13.0	13.5	14.5	18.3	18.4	17.9
Loans for house purchase with an IRFP > 1 year (a)	94.5	97.8	102.9	155.7	158.4	157.2
Loans to non-financial corporations	230.8	231.4	231.7	234.2	236.8	239.3
Loans with an IRFP ≤ 1 year (excl. overdrafts) (a)	151.0	151.0	151.2	156.0	158.0	160.9
Loans with an IRFP > 1 year (a)	79.8	80.5	80.5	78.3	78.9	78.4

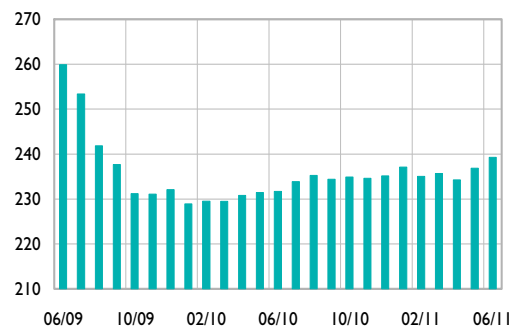
Loans to households

(EUR billions)



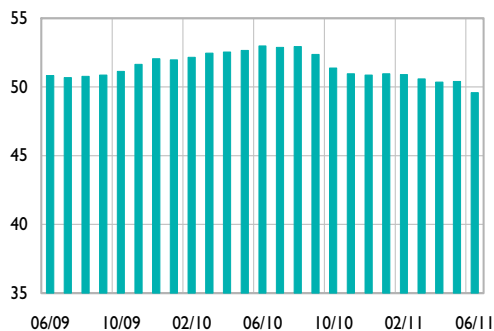
Loans to non-financial corporations

(EUR billions)



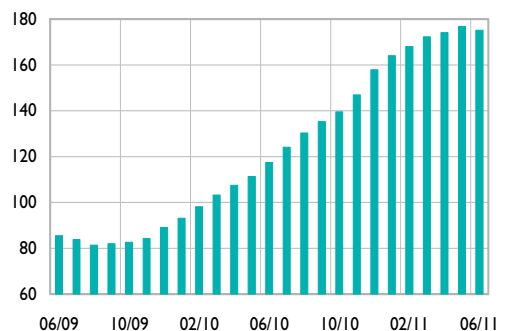
Consumer loans to households (excl. overdrafts)

(EUR billions)



Loans for house purchase

(EUR billions)



Data revised over the entire period.

(a) IRFP: initial rate fixation period i.e. the period for which the rate of a loan is fixed.

IRFP ≤ 1 year: loans for which the rate is adjusted at least once a year + fixed-rate loans with an initial maturity of up to 1 year.

IRFP > 1 year: loans for which the rate is adjusted less than once a year + fixed-rate loans with an initial maturity of over 1 year.

Table 19
Investment and financing – Insurance corporations and pension funds – Euro area and France

(EUR billions)

Euro area	Cumulated transaction flows over 4 quarters					Outstanding amounts	
	2010				2011	2011	
	Q1	Q2	Q3	Q4	Q1	March	
Financial assets							
Currency and deposits	-19.4	-4.0	-0.4	-17.7	-3.8	809.1	
<i>of which deposits included in M3 (a)</i>	-20.9	2.3	5.8	-9.7	-9.2	184.0	
Short-term debt securities	-28.6	-15.1	-3.3	3.4	1.7	42.8	
Long-term debt securities	120.9	139.1	160.7	154.0	129.5	2,598.9	
Loans	12.0	12.1	14.4	31.4	27.3	489.0	
Shares and other equity	179.5	126.1	92.6	44.1	29.7	2,387.6	
<i>of which quoted shares</i>	-74.0	-71.1	4.3	1.7	-0.4	435.3	
Remaining net assets	24.9	16.4	19.7	16.0	-5.6	245.4	
Financing							
Debt securities	3.1	4.5	1.6	0.3	0.1	31.1	
Loans	-11.3	-4.2	15.3	11.0	5.9	271.9	
Shares and other equity	-0.8	2.1	2.5	2.1	2.0	439.1	
Insurance technical reserves	274.6	266.1	259.2	240.5	210.1	5,945.8	
<i>Life insurance</i>	262.4	255.2	248.8	226.9	200.0	5,097.1	
<i>Non-life insurance</i>	12.2	10.9	10.4	13.6	10.1	848.7	
Net lending/net borrowing (B9B)	23.8	6.1	5.1	-22.7	-39.3		

(EUR billions)

France	Cumulated transaction flows over 4 quarters					Outstanding amounts	
	2010				2011	2011	
	Q1	Q2	Q3	Q4	Q1	March	
Financial assets							
Currency and deposits	-0.5	1.1	2.1	2.2	3.7	23.3	
Short-term debt securities	-15.6	-9.4	-0.8	6.2	3.7	20.5	
Long-term debt securities	97.7	74.5	91.2	97.5	86.6	1,090.8	
Loans	-1.1	-0.4	-3.9	-2.4	-2.2	34.6	
Shares and other equity	13.1	25.3	7.0	-18.7	-30.3	620.4	
<i>of which quoted shares</i>	6.0	6.0	5.2	-5.9	-1.5	83.7	
Remaining net assets	3.6	-1.0	2.0	0.1	1.1	8.4	
Financing							
Debt securities	0.5	1.0	1.4	0.6	1.1	7.5	
Loans	-8.2	-6.2	3.5	12.0	11.6	90.8	
Shares and other equity	3.6	2.7	1.3	0.3	0.0	101.2	
Insurance technical reserves	99.0	95.9	94.1	89.0	76.4	1,651.7	
<i>Life insurance and pension funds</i>	88.8	84.6	83.0	77.8	68.5	1,382.0	
<i>Non-life insurance</i>	10.1	11.3	11.1	11.2	7.9	269.6	
Net lending/net borrowing (B9B)	11.5	6.0	6.9	-7.2	-18.6		

(a) Deposits with agreed maturity up to 2 years and redeemable at notice up to 3 months of insurance corporations held with MFIs and central government.

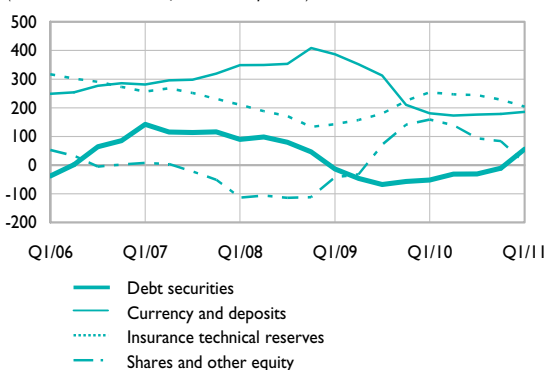
Table 20
Investment and financing – Households – Euro area

(EUR billions)

	Cumulated transaction flows over 4 quarters					Outstanding amounts
	2010				2011	2011
	Q1	Q2	Q3	Q4	Q1	March
Financial assets						
Currency and deposits	180.9	172.9	176.3	178.7	185.4	6,640.9
<i>of which deposits included in M3 (a)</i>	33.0	29.2	55.6	85.5	111.1	5,028.1
Short-term debt securities	-62.3	-47.4	-19.9	-10.6	12.1	58.7
Long-term debt securities	10.5	15.8	-10.8	0.2	44.0	1,374.1
Shares and other equity	159.0	139.5	93.8	84.2	7.8	4,566.8
Quoted shares	47.3	33.5	26.0	14.5	6.1	814.4
Unquoted shares and other equity	82.3	99.1	74.3	81.4	38.3	2,236.1
Mutual fund shares	29.5	6.9	-6.5	-11.6	-36.6	1,516.3
<i>of which money market fund shares</i>	-74.2	-72.7	-83.6	-50.3	-37.1	208.0
Insurance technical reserves	254.3	247.5	244.0	228.4	203.9	5,728.6
Remaining net assets	4.9	-0.6	22.1	14.0	19.0	-45.8
Financing						
Loans	135.3	143.8	142.5	150.0	147.0	6,083.5
<i>of which from euro area MFIs</i>	107.5	135.3	134.3	147.1	169.2	5,255.6
Revaluation of financial assets						
Shares and other equity	426.8	77.3	4.9	91.1	60.5	
Insurance technical reserves	266.6	172.3	114.8	77.1	-8.7	
Other flows	34.4	1.9	-7.8	-56.2	-89.1	
Change in net financial worth	1,139.9	635.5	474.9	457.0	287.8	

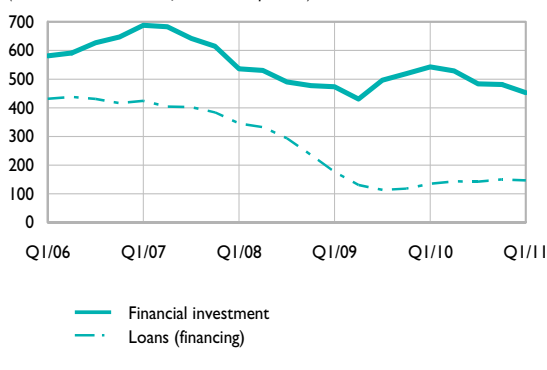
Investment flows

(EUR billions, cumulated flows over 4 quarters)



Investment and financing flows

(EUR billions, cumulated flows over 4 quarters)



(a) Deposits with agreed maturity up to 2 years and redeemable at notice up to 3 months of households held with MFIs and central government.

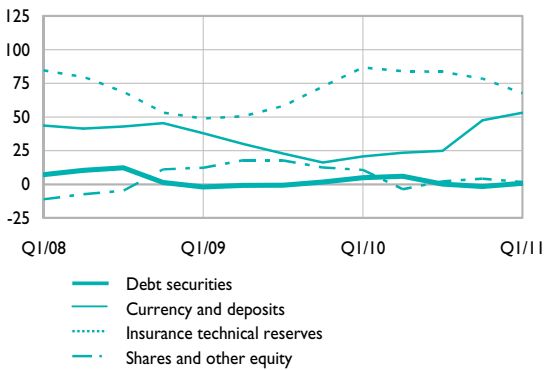
Table 21
Investment and financing – Households – France

(EUR billions)

	Cumulated transaction flows over 4 quarters					Outstanding amounts
	2010				2011	2011
	Q1	Q2	Q3	Q4	Q1	March
Financial assets						
Currency and deposits	20.7	23.4	24.9	47.6	53.1	1,168.6
Short-term debt securities	-1.7	0.5	0.1	-1.2	-0.7	1.9
Long-term debt securities	6.6	5.5	0.1	-0.5	1.5	62.0
Shares and other equity	10.6	-3.7	2.1	4.2	1.7	1,032.7
Quoted shares	9.3	6.1	4.6	1.9	-0.6	199.1
Unquoted shares and other equity	16.0	13.0	15.5	15.3	15.1	552.0
Mutual fund shares	-14.7	-22.7	-18.0	-12.9	-12.8	281.6
of which money market fund shares	-19.4	-20.7	-18.7	-12.5	-12.3	45.6
Insurance technical reserves	86.8	84.0	83.6	78.5	67.6	1,491.1
Remaining net assets	5.3	16.2	35.7	23.5	21.1	62.0
Financing						
Loans	46.5	48.9	53.1	61.5	63.3	1,074.3
Revaluation of financial assets						
Shares and other equity	190.4	101.7	59.3	63.6	41.5	
Insurance technical reserves	36.0	11.8	1.3	-2.9	-1.5	
Other flows	3.5	-1.5	1.6	-1.6	2.9	
Change in net financial worth	311.7	189.0	155.6	149.6	123.8	

Investment flows

(EUR billions, cumulated flows over 4 quarters)



Investment and financing flows

(EUR billions, cumulated flows over 4 quarters)

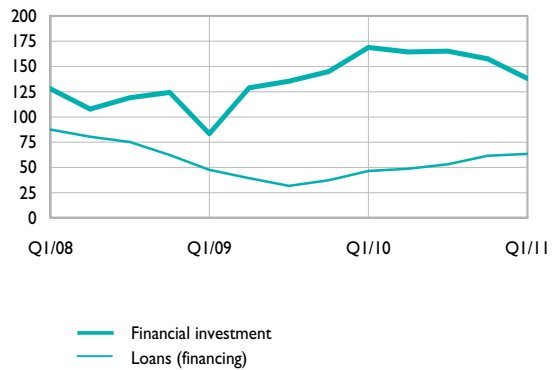


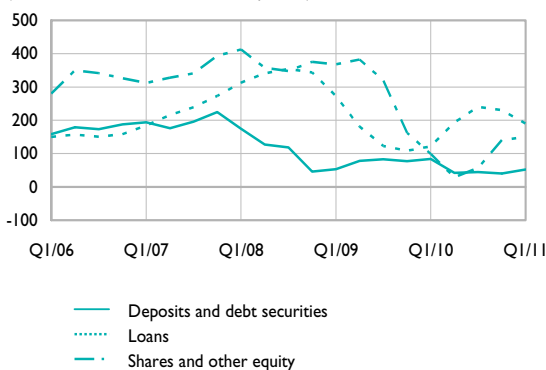
Table 22
Investment and financing – Non-financial corporations – Euro area

(EUR billions)

	Cumulated transaction flows over 4 quarters					Outstanding amounts
	2010				2011	2011
	Q1	Q2	Q3	Q4	Q1	March
Financial assets						
Currency and deposits	93.9	51.2	46.6	48.3	51.2	1,868.1
<i>of which deposits included in M3 (a)</i>	88.8	49.6	46.1	68.0	63.1	1,560.2
Debt securities	-9.9	-9.1	-2.2	-8.3	1.2	345.4
Loans	121.8	193.4	240.3	230.4	190.7	2,957.0
Shares and other equity	98.6	29.0	56.7	140.6	149.6	7,970.6
Insurance technical reserves	2.5	2.2	2.1	1.8	1.8	179.1
Remaining net assets	47.0	53.2	61.6	-8.2	1.3	-69.6
Financing						
Debt	113.3	126.6	229.6	214.3	227.3	9,637.8
Loans	8.4	42.0	159.6	147.5	184.8	8,451.0
<i>of which from euro area MFIs</i>	-114.6	-85.4	-29.8	-6.6	37.7	4,705.5
Debt securities	102.5	82.8	68.8	63.1	39.0	851.3
Pension fund reserves	2.4	1.8	1.1	3.7	3.4	335.5
Shares and other equity	240.1	204.5	204.6	245.2	254.2	13,410.8
Quoted shares	67.1	47.2	37.1	31.1	31.2	3,923.5
Unquoted shares and other equity	173.0	157.3	167.5	214.1	223.0	9,487.3
Net lending/net borrowing (B9B)	0.4	-11.0	-29.2	-54.8	-85.7	

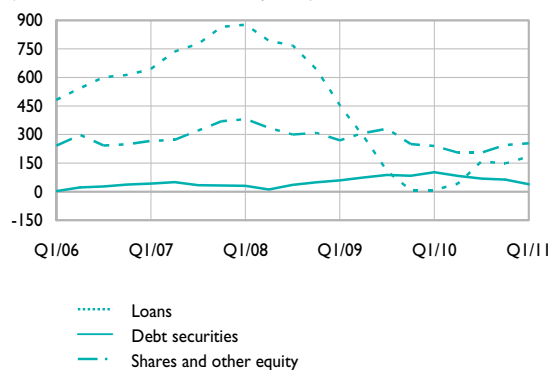
Investment flows

(EUR billions, cumulated flows over 4 quarters)



Financing flows

(EUR billions, cumulated flows over 4 quarters)



(a) Deposits with agreed maturity up to 2 years and redeemable at notice up to 3 months of non-financial corporations held with MFIs and central government.

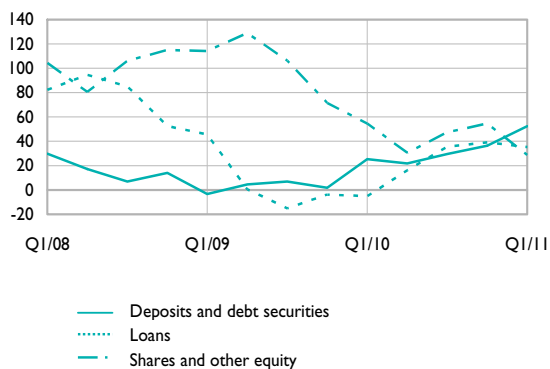
Table 23
Investment and financing – Non-financial corporations – France

(EUR billions)

	Cumulated transaction flows over 4 quarters					Outstanding amounts
	2010				2011	2011
	Q1	Q2	Q3	Q4	Q1	March
Financial assets						
Currency and deposits	29.1	23.5	26.3	34.8	53.2	358.8
Debt securities	-3.8	-1.8	3.2	1.5	-0.7	68.3
Loans	-5.1	16.2	35.6	39.1	35.4	793.7
Shares and other equity	54.6	30.6	47.4	54.7	28.6	2,806.4
Insurance technical reserves	-0.2	0.1	0.3	0.4	0.5	52.7
Remaining net assets	22.7	3.5	1.2	1.0	3.9	63.7
Financing						
Debt	13.5	17.3	44.2	47.1	48.3	2,027.0
Loans	-38.0	-18.8	14.3	21.4	28.0	1,629.7
Debt securities	51.5	36.1	29.8	25.7	20.3	397.3
Shares and other equity	109.7	103.0	103.5	108.3	100.8	4,300.7
Quoted shares	20.7	11.3	10.9	7.6	6.8	1,172.0
Unquoted shares and other equity	89.0	91.8	92.6	100.7	94.0	3,128.7
Net lending/net borrowing (B9B)	-25.9	-48.3	-33.7	-23.9	-28.3	

Investment flows

(EUR billions, cumulated flows over 4 quarters)



Financing flows

(EUR billions, cumulated flows over 4 quarters)

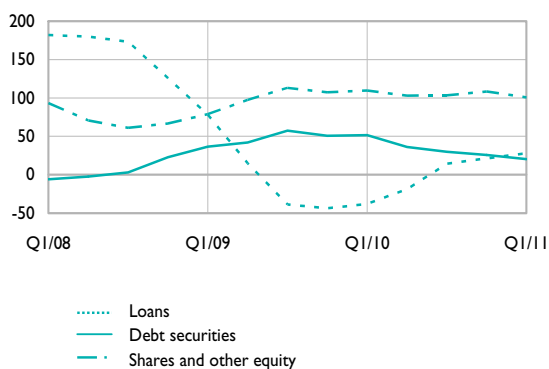


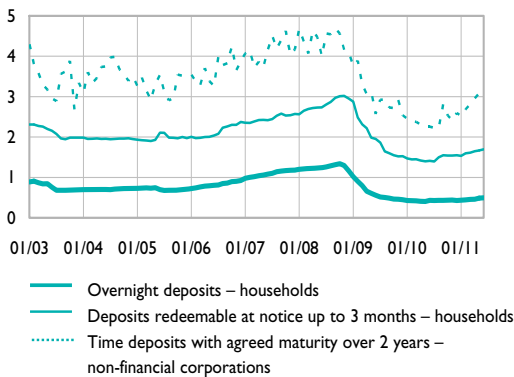
Table 24
Interest rates on deposits – France and the euro area

(average monthly rates – %)

	2009	2010	2010	2011				
	Dec.	Dec.	June	Feb.	March	April	May	June
Euro area								
Overnight deposits – households	0.45	0.43	0.43	0.44	0.45	0.46	0.49	0.49
Deposits redeemable at notice up to 3 months – households	1.53	1.55	1.41	1.60	1.61	1.65	1.67	1.70
Time deposits with agreed maturity over 2 years – non-financial corporations	2.54	2.60	2.26	2.69	2.81	2.95	3.08	2.93
France								
"A" passbooks (end of period)	1.25	1.75	1.25	2.00	2.00	2.00	2.00	2.00
Regulated savings deposits	1.28	1.78	1.28	2.00	2.00	2.00	2.00	2.00
Market rate savings deposits	1.37	1.66	1.31	1.76	1.73	1.79	1.76	1.81
Deposits with agreed maturity up to 2 years	2.39	2.18	2.06	2.16	2.24	2.27	2.32	2.35
Deposits with agreed maturity over 2 years	3.41	3.09	3.17	3.14	3.09	3.11	3.09	3.12

Euro area

(average monthly rates – %)



France

(average monthly rates – %)

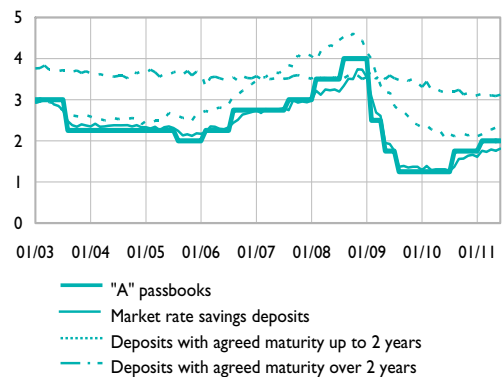


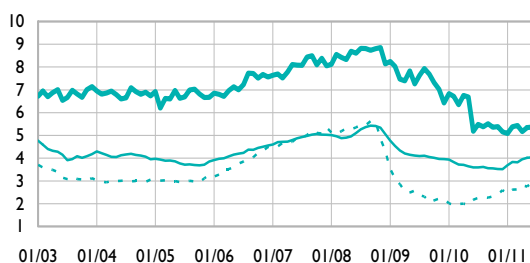
Table 25
Cost of credit – France and the euro area

(average monthly rate – %)

	2010						2011					
	July	Aug.	Sept.	Oct.	Nov.	Dec.	Jan.	Feb.	March	April	May	June
Euro area												
Consumer loans												
Floating rate and IRFP of up to 1 year (a)	5.48	5.38	5.52	5.36	5.39	5.16	5.09	5.38	5.44	5.17	5.35	5.36
Loans for house purchase												
Floating rate and IRFP of between 1 and 5 years	3.60	3.62	3.56	3.55	3.53	3.52	3.69	3.83	3.82	3.95	4.01	4.04
Non-financial corporations of over EUR 1 million												
IRFP of up to 1 year (a)	2.25	2.28	2.26	2.32	2.42	2.59	2.45	2.62	2.63	2.80	2.75	2.93
France												
Consumer loans	6.13	6.08	5.96	5.78	5.79	5.75	5.95	6.05	6.08	6.14	6.19	6.20
Loans for house purchase												
IRFP of up to 1 year (a)	3.17	3.12	3.04	3.04	3.02	3.02	3.07	3.21	3.34	3.43	3.61	3.64
IRFP of over 1 year (a)	3.60	3.54	3.52	3.45	3.44	3.41	3.50	3.57	3.68	3.74	3.82	3.89
Non-financial corporations												
IRFP of up to 1 year (a)	2.00	2.17	2.09	2.20	2.23	2.25	2.28	2.40	2.50	2.58	2.70	2.62
IRFP of over 1 year (a)	3.37	3.47	3.42	3.41	3.47	3.40	3.45	3.56	3.65	3.81	3.88	3.93

Euro area

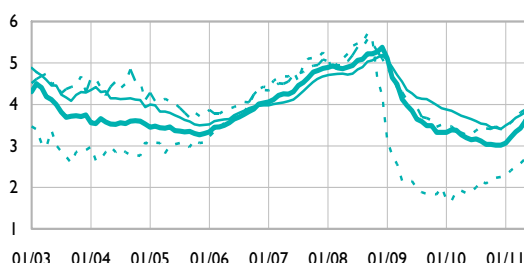
(percentage points)



— Consumer loans IRFP up to 1 year
- - - Housing loans IRFP of between 1 and 5 years
..... Non-financial corporations IRFP up to 1 year

France

(percentage points)



— Housing loans IRFP up to 1 year
- - - Housing loans IRFP over 1 year
..... Non-financial corporations IRFP up to 1 year
- . - . Non-financial corporations IRFP over 1 year

(a) IRFP: initial rate fixation period i.e. the period for which the rate of a loan is fixed.

IRFP ≤ 1 year: loans for which the rate is adjusted at least once a year + fixed-rate loans with an initial maturity of up to 1 year.

IRFP > 1 year: loans for which the rate is adjusted less than once a year + fixed-rate loans with an initial maturity of over 1 year.

Table 26
Cost of credit – France

(%)

	2010			2011	
	Q2	Q3	Q4	Q1	Q2
Households – Average overall effective interest rate					
Consumer loans					
Overdrafts, revolving loans and instalment plans of over EUR 1,524	14.45	14.49	14.75	14.65	na
Personal loans over EUR 1,524	6.46	6.11	5.83	6.02	na
Loans for house purchase					
Fixed-rate loans	4.57	4.20	4.13	4.21	4.48
Floating-rate loans	4.01	3.79	3.72	3.76	4.00
Usury ceilings in effect from the 1st day of the mentioned period	2010		2011		
	July	Oct.	Jan.	April	July
Households – Usury rate					
Consumer loans					
Overdrafts, revolving loans and instalment plans of over EUR 1,524	19.27	19.32	19.67	19.53	19.37
Personal loans over EUR 1,524	8.61	8.15	7.77	8.03	11.22
Loans for house purchase					
Fixed-rate loans	6.09	5.60	5.51	5.61	5.97
Floating-rate loans	5.35	5.05	4.96	5.01	5.33
	2010			2011	
	Q2	Q3	Q4	Q1	Q2
Business credit, loans to enterprises					
Discount					
up to EUR 15,245	1.75	2.01	2.64	2.85	3.07
EUR 15,245 to EUR 45,735	2.36	2.51	2.62	2.93	3.15
EUR 45,735 to EUR 76,225	2.56	2.57	2.58	2.80	2.99
EUR 76,225 to EUR 304,898	2.12	2.29	2.50	2.80	3.03
EUR 304,898 to EUR 1,524,490	1.97	2.05	2.21	2.32	2.48
over EUR 1,524,490	1.29	1.63	1.86	1.86	2.24
Overdrafts					
up to EUR 15,245	9.69	10.03	10.14	10.49	10.56
EUR 15,245 to EUR 45,735	6.78	7.45	7.47	7.71	7.82
EUR 45,735 to EUR 76,225	4.22	4.64	4.79	5.10	5.28
EUR 76,225 to EUR 304,898	2.83	3.09	2.87	3.14	3.37
EUR 304,898 to EUR 1,524,490	1.88	2.13	1.83	2.11	2.29
over EUR 1,524,490	1.38	1.73	1.37	1.69	1.89
Other short-term loans					
up to EUR 15,245	3.41	3.61	3.70	3.73	3.95
EUR 15,245 to EUR 45,735	3.25	3.32	3.45	3.48	3.72
EUR 45,735 to EUR 76,225	2.98	3.00	3.09	3.29	3.49
EUR 76,225 to EUR 304,898	2.39	2.47	2.67	2.69	2.91
EUR 304,898 to EUR 1,524,490	1.75	1.87	2.02	2.07	2.32
over EUR 1,524,490	1.49	1.69	1.74	1.82	2.05
Medium and long-term loans					
up to EUR 15,245	3.78	3.54	3.49	3.58	3.70
EUR 15,245 to EUR 45,735	3.52	3.40	3.41	3.47	3.57
EUR 45,735 to EUR 76,225	3.54	3.36	3.31	3.34	3.50
EUR 76,225 to EUR 304,898	3.58	3.33	3.38	3.39	3.65
EUR 304,898 to EUR 1,524,490	3.31	3.06	3.18	3.20	3.53
over EUR 1,524,490	2.73	2.64	2.69	2.80	3.10

Source: Banque de France.

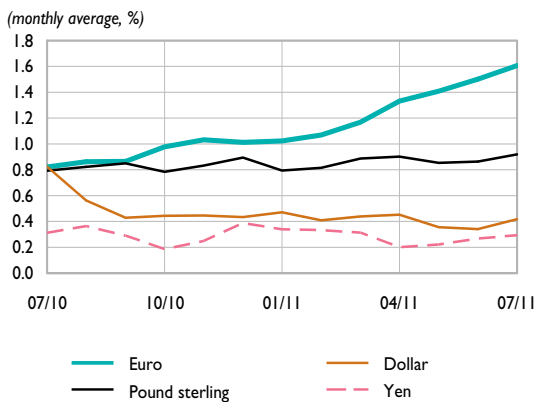
Produced 19 August 2011

Table 27
Interest rates

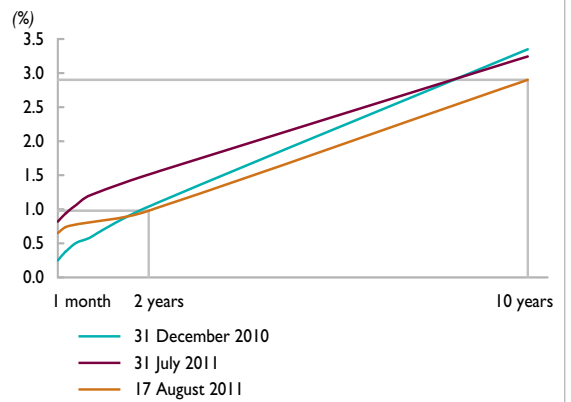
(%)

	Monthly average (a)										Key interest rates at 17/08/11	
	2010			2011								
	Oct.	Nov.	Dec.	Jan.	Feb.	March	April	May	June	July		
Short-term interbank interest rates												
Euro												1.50
Overnight	0.69	0.57	0.51	0.64	0.68	0.63	0.98	1.02	1.11	0.99		
3-month	0.98	1.03	1.01	1.02	1.07	1.17	1.33	1.41	1.50	1.61		
1-year	1.43	1.43	1.48	1.47	1.71	1.94	2.12	2.13	2.10	2.15		
Pound sterling												0.50
Overnight	0.56	0.53	0.52	0.52	0.53	0.53	0.55	0.54	0.56	0.56		
3-month	0.78	0.83	0.89	0.79	0.82	0.89	0.90	0.85	0.86	0.92		
1-year	1.48	1.50	1.72	1.56	1.63	1.65	1.59	1.53	1.53	1.54		
Dollar												0.25
Overnight	0.23	0.23	0.24	0.24	0.24	0.21	0.16	0.15	0.16	0.17		
3-month	0.44	0.45	0.43	0.47	0.41	0.44	0.45	0.36	0.34	0.42		
1-year	0.94	0.94	1.05	1.03	0.96	0.95	0.92	0.85	0.84	0.90		
Yen												0.10
Overnight	0.11	0.11	0.13	0.12	0.10	0.10	0.11	0.11	0.18	0.18		
3-month	0.19	0.25	0.39	0.34	0.33	0.31	0.20	0.22	0.27	0.29		
1-year	0.48	0.49	0.62	0.55	0.47	0.49	0.45	0.50	0.58	0.64		
10-year benchmark government bond yields												
France	2.72	3.00	3.34	3.44	3.60	3.61	3.69	3.49	3.43	3.40		
Germany	2.38	2.56	2.96	3.06	3.23	3.25	3.35	3.11	2.98	2.79		
Euro area	3.34	3.73	4.07	3.94	4.48	4.49	4.66	4.37	4.37	4.59		
United Kingdom	2.97	3.20	3.50	3.61	3.78	3.64	3.65	3.37	3.25	3.13		
United States	2.52	2.76	3.30	3.40	3.60	3.43	3.46	3.19	3.01	3.02		
Japan	0.89	1.05	1.19	1.22	1.29	1.25	1.27	1.15	1.14	1.12		

3-month interbank market rates



Yield curve for French government bonds



(a) Short-term: the interbank average of rates situated in the middle of the range between bid and ask rates. Quotes taken from Reuters, posted at 4.30pm for the euro and 11.30am for other currencies.
Benchmark bonds: rates posted by Reuters at 4.30pm.

Table 28
Banking system liquidity and refinancing operations – Euro area

(EUR billions, daily average for the reserve maintenance period from 15 June to 12 July 2011)

	Liquidity providing	Liquidity absorbing	Net contribution
Contribution to banking system liquidity			
(a) Eurosystem monetary policy operations	592.1	106.5	485.6
Main refinancing operations	146.0		146.0
Longer-term refinancing operations	311.6		311.6
Standing facilities	0.2	29.5	-29.3
Other	134.2	76.9	57.3
(b) Other factors affecting banking system liquidity	644.8	919.6	-274.8
Banknotes in circulation		846.2	-846.2
Government deposits with the Eurosystem		73.4	-73.4
Net foreign assets (including gold)	533.6		533.6
Other factors (net)	111.2		111.2
(c) Reserves maintained by credit institutions (a) + (b)			210.9
<i>including reserve requirements</i>			<i>207.7</i>

Net contribution to banking system liquidity

(EUR billions, daily average for the reserve maintenance period from 15 June to 12 July 2011)

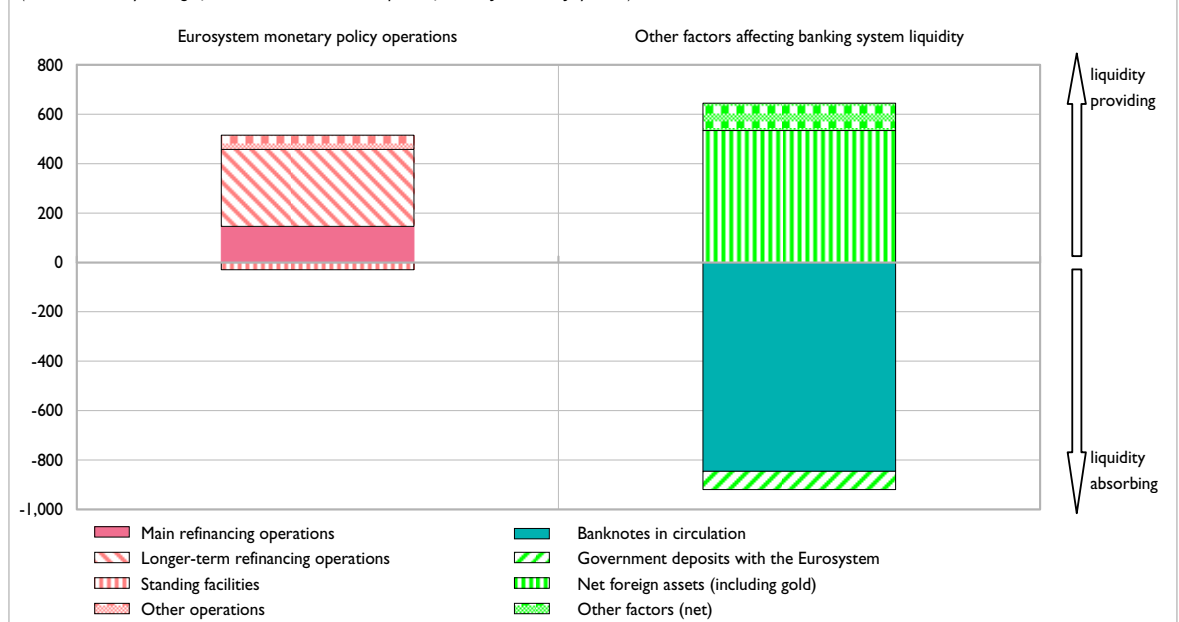


Table 29
Eurosystem key rates; minimum reserves

(%)

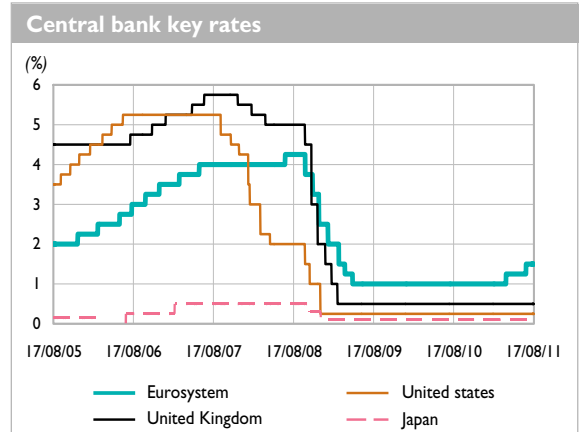
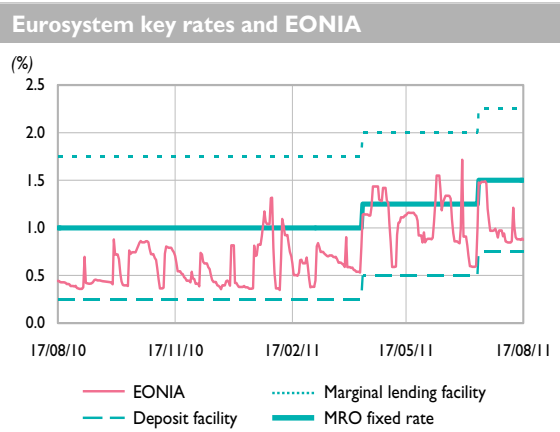
Key rates for the Eurosystem (latest changes)						
Main refinancing operations			Standing facilities			
Date of		Fixed rate	Date of		Deposit	Marginal lending
decision	settlement		decision	settlement		
07/05/2009	13/05/2009	1.00	07/05/2009	13/05/2009	0.25	1.75
07/04/2011	13/04/2011	1.25	07/04/2011	13/04/2011	0.50	2.00
07/07/2011	13/07/2011	1.50	07/07/2011	13/07/2011	0.75	2.25

(%)

Main refinancing operations				Longer-term refinancing operations		
		Marginal rate	Weighted average rate			Marginal rate
2011	13 July (a)	1.50	1.50	2011	26 May	1.25
	20 July	1.50	1.50		30 June	1.25
	27 July	1.50	1.50		13 July	1.50
	3 August	1.50	1.50		28 July	1.50
	10 August	1.50	1.50		10 August	1.50
	17 August	1.50	1.50		11 August	1.50

(EUR billions – rates as a %)

Minimum reserves (daily averages)								
Reserve maintenance period ending on	Required reserves		Current accounts		Excess reserves		Interest rate on minimum reserves	
	Euro area	France	Euro area	France	Euro area	France		
2011 8 February	212.29	41.72	213.57	41.94	1.28	0.22	1.00	
8 March	211.63	41.74	212.92	41.97	1.29	0.23	1.00	
12 April	209.32	41.03	210.46	41.18	1.14	0.15	1.00	
10 May	208.27	40.82	209.47	40.99	1.20	0.17	1.25	
14 June	206.93	40.28	208.96	40.43	2.03	0.15	1.25	
8 July	207.74	40.75	210.87	40.90	3.13	0.15	1.25	



(a) Fixed rate tender procedure.

Sources: European Central Bank, ESCB.

Produced 19 August 2011

Table 30
Negotiable debt securities – France

Certificates of deposit			
	EUR billions (a)		Number of issuers
	Issues	Stocks	
14/05/11 to 20/05/11	95.32	355.71	179
21/05/11 to 27/05/11	85.61	351.03	180
28/05/11 to 03/06/11	64.26	347.55	179
04/06/11 to 10/06/11	87.77	342.86	179
11/06/11 to 17/06/11	79.74	334.41	178
18/06/11 to 24/06/11	92.04	338.38	179
25/06/11 to 01/07/11	92.08	312.67	175
02/07/11 to 08/07/11	105.45	316.17	174
09/07/11 to 15/07/11	80.29	305.09	175
16/07/11 to 22/07/11	106.57	313.99	177
23/07/11 to 29/07/11	100.44	323.13	178
30/07/11 to 05/08/11	94.14	323.65	177
06/08/11 to 12/08/11	96.65	324.61	177

Commercial paper			
	EUR billions (a)		Number of issuers
	Issues	Stocks	
14/05/11 to 20/05/11	10.58	50.35	85
21/05/11 to 27/05/11	11.23	54.55	85
28/05/11 to 03/06/11	9.14	52.78	85
04/06/11 to 10/06/11	7.56	51.36	88
11/06/11 to 17/06/11	7.58	50.77	89
18/06/11 to 24/06/11	15.96	55.47	85
25/06/11 to 01/07/11	10.11	52.11	85
02/07/11 to 08/07/11	9.57	48.37	88
09/07/11 to 15/07/11	16.47	54.52	88
16/07/11 to 22/07/11	13.01	50.98	85
23/07/11 to 29/07/11	14.04	56.38	86
30/07/11 to 05/08/11	7.51	55.83	88
06/08/11 to 12/08/11	14.54	58.45	88

Negotiable medium-term notes			
	EUR billions (a)		Number of issuers
	Issues	Stocks	
14/05/11 to 20/05/11	0.11	66.69	123
21/05/11 to 27/05/11	0.15	66.61	124
28/05/11 to 03/06/11	0.12	66.50	124
04/06/11 to 10/06/11	0.22	66.57	124
11/06/11 to 17/06/11	0.22	66.44	124
18/06/11 to 24/06/11	0.07	66.30	124
25/06/11 to 01/07/11	0.36	66.32	124
02/07/11 to 08/07/11	0.21	66.39	125
09/07/11 to 15/07/11	0.31	65.39	125
16/07/11 to 22/07/11	0.85	65.99	125
23/07/11 to 29/07/11	1.53	67.29	125
30/07/11 to 05/08/11	0.02	67.09	125
06/08/11 to 12/08/11	0.26	66.46	125

(a) Issues in euro are cumulative over the reference period. Outstanding amounts are calculated from the cut-off date (the last day of the period under review).

Source: Banque de France.

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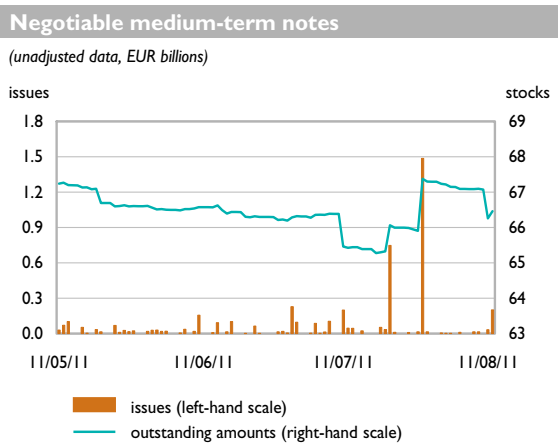
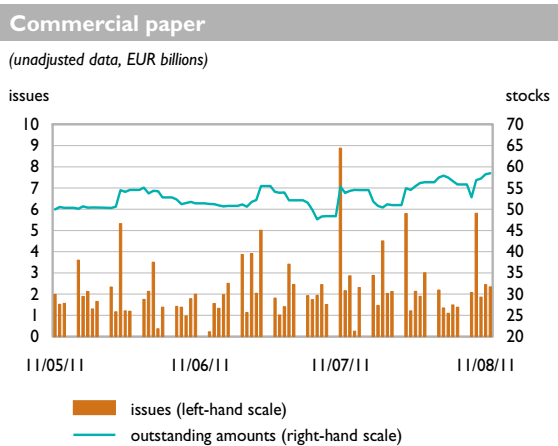
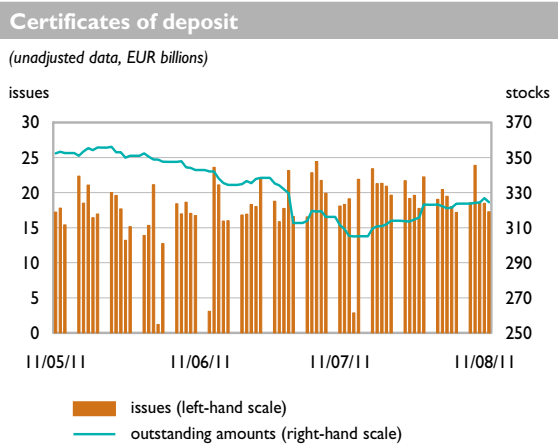
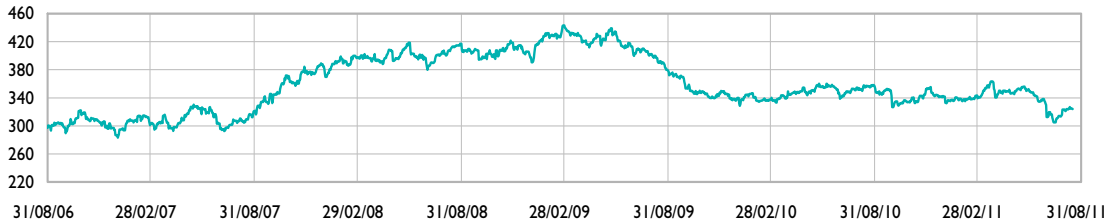


Table 3 I
Negotiable debt securities – France

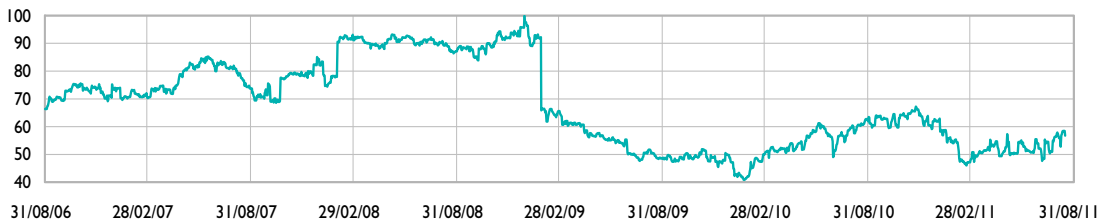
Certificates of deposit

(daily outstanding amounts in EUR billions)



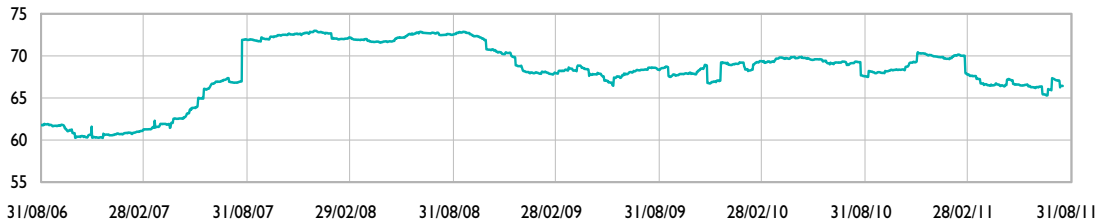
Commercial paper

(daily outstanding amounts in EUR billions)



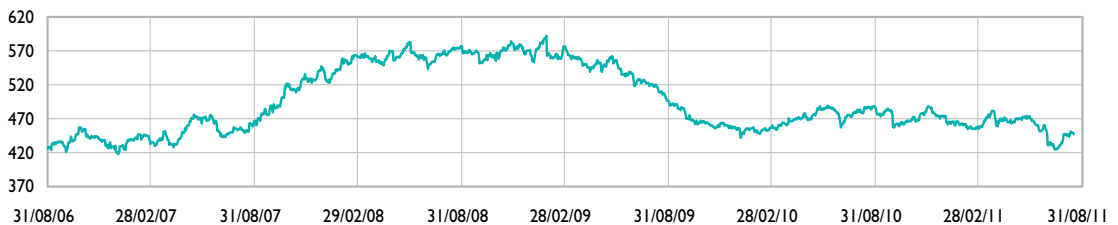
Negotiable medium-term notes

(daily outstanding amounts in EUR billions)



Negotiable debt securities, cumulated outstandings

(daily outstanding amounts in EUR billions)



Source: Banque de France.

Produced 19 August 2011

Table 32
Mutual fund shares/units – France

(EUR billions)

	2010		2011	2011
	Sept.	Dec.	March	June
Net assets of mutual fund shares/units by category				
Money-market funds	419.66	394.34	387.78	371.26
Bond mutual funds	205.59	203.48	200.99	
Equity mutual funds	258.75	278.93	278.20	
Mixed funds	262.95	264.34	263.00	
Funds of alternative funds	15.77	15.94	15.40	
Guaranteed-performance mutual funds	0.01	0.01	0.01	
Structured funds ("fonds à formule")	63.71	62.55	59.53	

Net assets of money-market funds

(EUR billions)

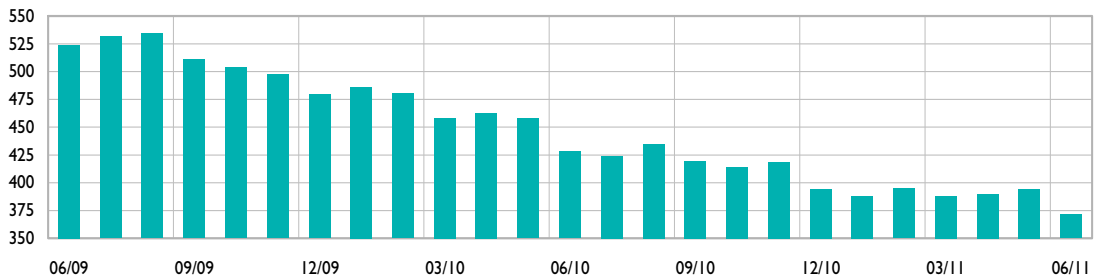


Table 33
Debt securities and quoted shares issued by French residents

(EUR billions)

	Outstanding amounts (a)		Net issues (b)			
	2010	2011	12-month total	2011		
	June (c)	June (c)		April (c)	May (c)	June (c)
Debt securities issued by French residents						
Total	3,086.1	3,255.8	200.8	4.1	21.9	30.6
Non-financial corporations	371.0	385.5	20.3	1.0	1.7	-0.3
Short-term (≤ 1 year)	19.2	21.7	2.5	0.9	0.9	0.5
Long-term (> 1 year)	351.8	363.9	17.8	0.1	0.8	-0.8
General government	1,341.9	1,465.5	129.0	6.9	15.7	18.9
Short-term (≤ 1 year)	235.4	235.7	2.5	-3.2	6.6	6.2
Long-term (> 1 year)	1,106.5	1,229.8	126.5	10.1	9.0	12.7
Monetary financial institutions	1,139.2	1,172.5	47.8	-4.3	3.5	13.2
Short-term (≤ 1 year)	315.4	284.0	-31.5	-12.6	-4.2	-1.6
Long-term (> 1 year)	823.8	888.5	79.2	8.3	7.7	14.7
Non-monetary financial institutions (d)	233.9	232.3	3.7	0.5	1.0	-1.2

(EUR billions)

	Outstanding amounts (e)		Net issues (b)			Gross issues (f)	Repurchases (f)
	2010	2011	12-month total	2011		12-month total	12-month total
	June	June		May	June		
French quoted shares							
Total	1,178.6	1,397.6	11.7	0.3	4.9	17.1	5.4
Non-financial corporations	1,013.4	1,200.2	9.0	0.3	4.1	14.3	5.3
Monetary financial institutions	118.9	141.9	2.3	-0.1	1.0	2.3	0.0
Non-monetary financial institutions	46.4	55.6	0.3	0.1	-0.1	0.4	0.0

(a) Nominal values for outstanding amounts of debt securities.

(b) Monthly data are seasonally adjusted. The 12-month total is unadjusted.

(c) Data possibly revised.

(d) Including units issued by SPVs.

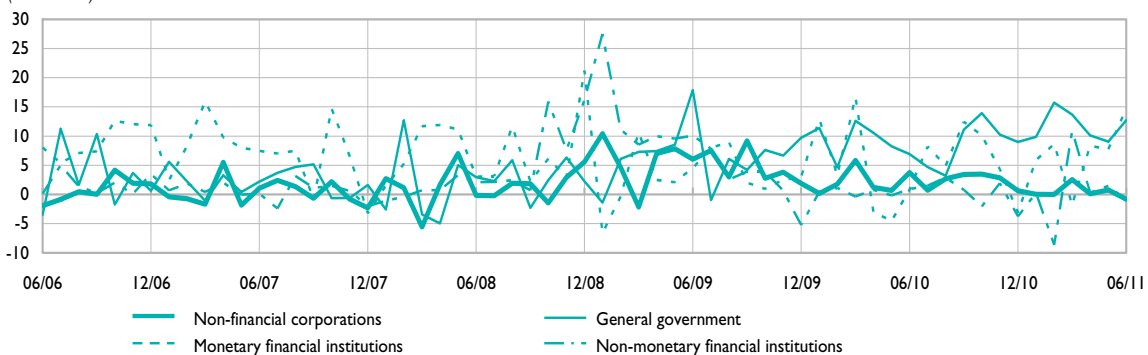
(e) Market values for outstanding amounts of quoted shares.

(f) Non-seasonally adjusted data.

Table 34
Debt securities and quoted shares issued by French residents, by sector

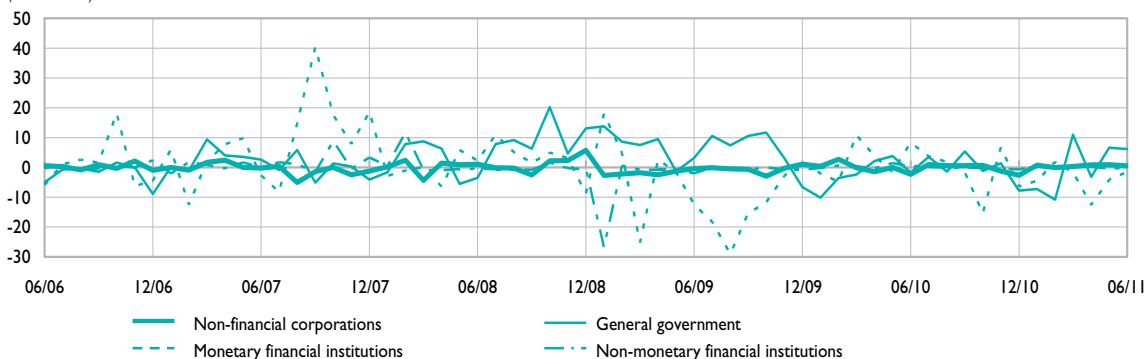
Net issues of long-term debt securities by French residents (seasonally adjusted)

(EUR billions)



Net issues of short-term debt securities by French residents (seasonally adjusted)

(EUR billions)



Net issues of quoted shares by French residents (seasonally adjusted)

(EUR billions)

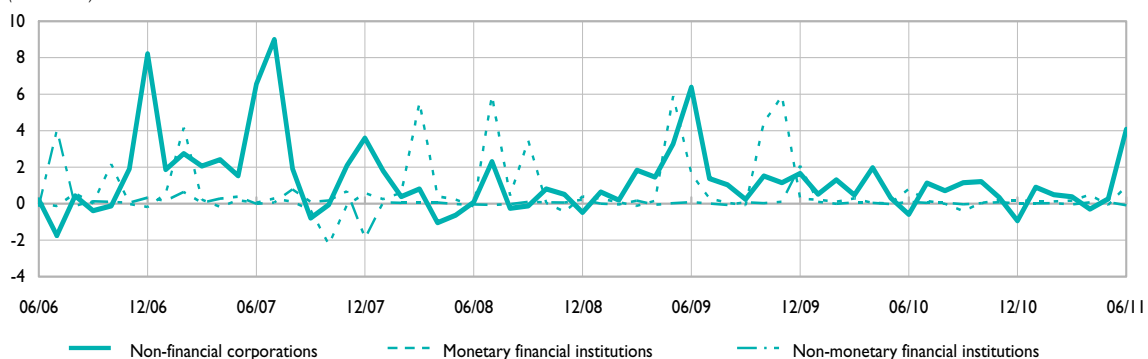


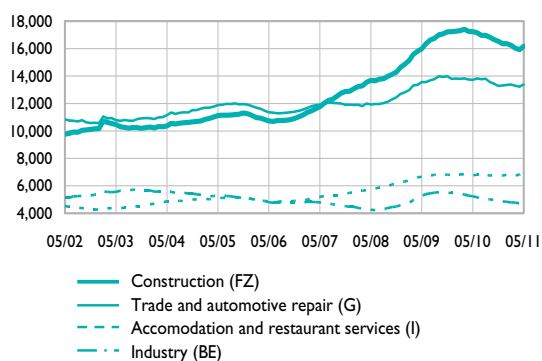
Table 35
Company failures by economic sector – France

(number of companies, unadjusted data, 12-month total)

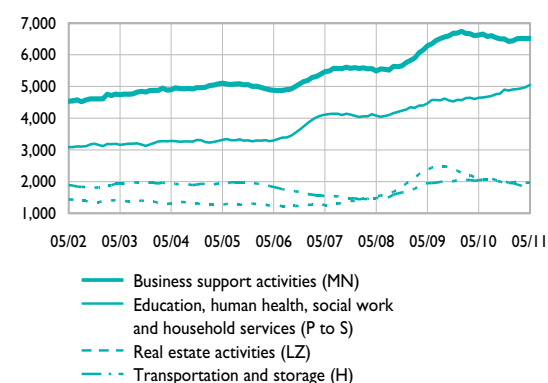
	2010								2011				
	May	June	July	Aug.	Sept.	Oct.	Nov.	Dec.	Jan.	Feb.	March	April	May
Agriculture, forestry and fishing (AZ)	1,363	1,359	1,357	1,355	1,358	1,339	1,330	1,306	1,259	1,248	1,255	1,265	1,254
Industry (BE)	5,243	5,171	5,078	5,070	5,021	4,990	4,960	4,865	4,845	4,800	4,788	4,713	4,783
Construction (FZ)	17,236	17,170	16,969	16,968	16,835	16,660	16,532	16,363	16,355	16,240	16,033	15,930	16,173
Trade and automotive repair (G)	13,727	13,824	13,772	13,803	13,573	13,446	13,276	13,313	13,351	13,380	13,290	13,231	13,387
Transportation and storage (H)	2,044	2,065	2,085	2,089	2,046	2,033	2,019	1,958	1,950	1,910	1,865	1,845	1,848
Accommodation and restaurant services (I)	6,770	6,817	6,813	6,800	6,758	6,780	6,810	6,750	6,807	6,868	6,770	6,809	6,972
Information and communication sector (JZ)	1,680	1,685	1,654	1,651	1,642	1,633	1,643	1,605	1,595	1,577	1,610	1,580	1,580
Financial and insurance activities (KZ)	1,093	1,104	1,109	1,104	1,085	1,068	1,057	1,066	1,064	1,080	1,095	1,089	1,112
Real estate activities (LZ)	2,104	2,068	2,072	2,069	2,032	1,997	1,961	1,971	1,970	2,000	1,975	1,958	1,971
Business support activities (MN)	6,627	6,656	6,577	6,605	6,542	6,501	6,505	6,423	6,441	6,509	6,518	6,511	6,516
Education, human health, social work and household services (P to S)	4,647	4,657	4,677	4,700	4,759	4,777	4,899	4,872	4,906	4,918	4,940	4,980	5,049
Sector unknown	104	104	106	105	99	99	93	93	93	91	88	90	96
Total sectors	62,638	62,680	62,269	62,319	61,750	61,323	61,085	60,585	60,636	60,621	60,227	60,001	60,741

Company failures – 12-month total

(number of companies – unadjusted data)



(number of companies – unadjusted data)



NB: The two-letter codes correspond to the aggregation level A10, and the one-letter codes to revised NAF sections 2 A21.

Table 36
Retail payment systems – France

(daily average in EUR millions, % share for the last month)

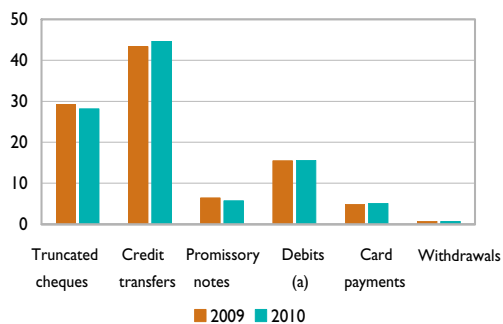
	2007	2008	2009	2010	2011			2011
					May	June	July	Share
Cheques	6,974	6,533	5,700	5,590	5,530	5,095	6,177	28.1
Credit transfers	7,904	8,413	8,473	8,865	9,375	9,504	10,194	46.3
of which SEPA credit transfers	–	29	95	683	2,285	2,456	2,760	12.5
Promissory notes	1,555	1,523	1,250	1,138	1,210	1,139	1,225	5.6
Direct debits	1,739	1,814	1,801	1,827	1,952	1,847	1,815	8.2
Interbank payment orders	150	147	143	133	128	63	70	0.3
Electronic payment orders	975	1,061	1,082	1,141	1,260	1,697	1,243	5.6
Card payments	864	921	957	1,009	1,077	1,059	1,139	5.2
ATM withdrawals	140	142	143	140	151	148	158	0.7
Total	20,300	20,554	19,550	19,844	20,683	20,550	22,021	100.0

(daily average in thousands of transactions, % share for the last month)

	2007	2008	2009	2010	2011			2011
					May	June	July	Share
Cheques	11,561	10,996	10,287	9,507	9,192	8,737	9,095	17.5
Credit transfers	7,344	7,425	7,527	7,356	7,294	7,471	7,585	14.6
of which SEPA credit transfers	–	13	38	270	1,278	1,473	1,605	3.1
Promissory notes	370	355	334	311	318	304	322	0.6
Direct debits	7,863	7,864	8,163	8,194	8,920	8,280	8,144	15.7
Interbank payment orders	458	425	394	364	321	261	287	0.6
Electronic payment orders	38	47	56	66	89	51	66	0.1
Card payments	18,146	19,219	20,542	21,505	23,000	22,507	23,920	46.0
ATM withdrawals	2,467	2,462	2,454	2,375	2,586	2,494	2,531	4.9
Total	48,248	48,794	49,757	49,677	51,719	50,105	51,951	100.0

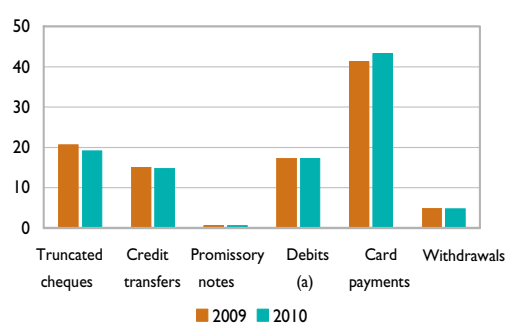
Market share developments
for main non-cash means of payment

(% of amounts exchanged)



Market share developments
for main non-cash means of payment

(% of volumes exchanged)



(a) Debits: direct debits, interbank payment orders and electronic payment orders.

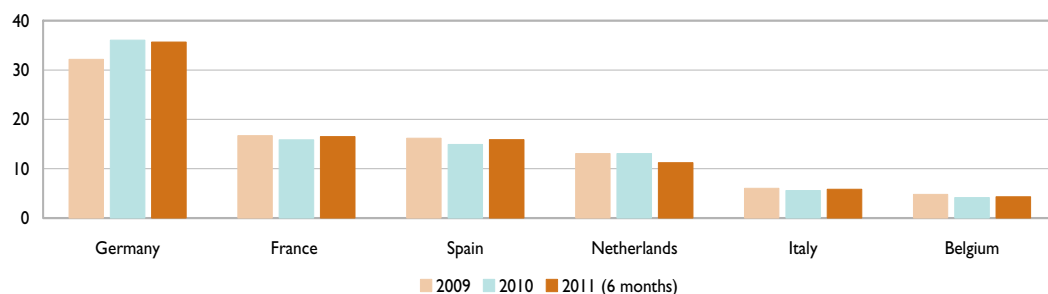
Table 37
Large-value payment systems – EU

(daily average in EUR billions, % share for the last month)

	2007	2008	2009	2010	2011			2011
					April	May	June	Share
France	569	398	367	365	389	392	383	16.6
Germany	711	972	707	829	824	773	858	37.1
Austria	35	59	28	27	27	28	26	1.1
Belgium	104	152	106	95	101	99	97	4.2
Cyprus	–	1	2	2	1	1	1	0.1
Spain	344	331	356	342	358	356	354	15.3
Finland	24	33	28	35	36	33	33	1.4
Greece	33	30	29	28	24	22	29	1.3
Ireland	29	32	30	30	22	17	15	0.7
Italy	165	221	133	129	134	126	129	5.6
Luxembourg	39	60	40	40	51	51	53	2.3
Malta	–	0	0	0	0	0	0	0.0
Netherlands (a)	121	264	287	300	264	265	250	10.8
Portugal	13	16	17	20	24	24	27	1.2
Slovakia	–	–	3	3	3	2	3	0.1
Slovenia	2	2	2	2	3	2	2	0.1
EPM-ECB	27	43	47	37	36	34	32	1.4
Total TARGET2 euro area (b)	2,217	2,614	2,182	2,283	2,297	2,227	2,292	99.3
Non-euro area	202	53	16	16	17	15	17	0.7
Total TARGET2 EU (b)	2,419	2,667	2,198	2,299	2,314	2,243	2,309	100.0
Euro1 (c)	228	287	255	241	246	241	238	

Market share of each financial centre in the TARGET2 system

(% of turnover)



The sum of the components may not be equal to the total (or to 100) due to rounding.
 Since January 2009, a new methodology for collecting and reporting statistics has been established on the TARGET2 data to improve data quality. This must be taken into account when comparing 2009 data with previous data.
 (a) Since 19 May 2008, the operations of the United Kingdom pass in transit by this country.
 (b) Variable composition according to the countries which participate in the systems of payment in euro.
 (c) Euro1 (EBA): clearing system of the Euro Banking Association. Euro1 data include retail payments recorded in STEP1.

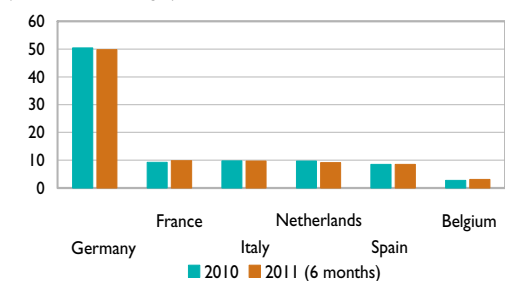
Table 38
Large-value payment systems – EU

(daily average in number of transactions, % share for the last month)

	2007	2008	2009	2010	2011			2011
					April	May	June	Share
France	19,192	25,992	29,773	31,850	36,815	35,208	34,149	9.9
Germany	164,187	181,625	174,695	173,218	187,492	174,226	171,654	49.6
Austria	15,222	14,199	6,539	5,266	6,629	6,276	6,051	1.7
Belgium	7,993	9,884	8,517	9,454	11,562	11,165	10,767	3.1
Cyprus	–	392	389	466	504	498	501	0.1
Spain	41,792	36,167	29,580	29,195	31,138	29,834	29,700	8.6
Finland	1,392	1,587	1,652	1,589	1,660	1,579	1,507	0.4
Greece	6,334	5,117	5,692	5,904	6,437	5,945	5,735	1.7
Ireland	5,334	5,139	4,824	4,961	4,968	4,405	4,353	1.3
Italy	45,111	36,491	33,943	33,649	35,396	34,788	34,198	9.9
Luxembourg	3,399	3,037	2,847	3,033	3,432	3,200	3,007	0.9
Malta	–	50	59	65	61	72	48	0.0
Netherlands (a)	27,685	37,745	36,930	33,304	34,411	32,215	31,112	9.0
Portugal	4,774	5,072	4,191	4,206	4,307	4,206	4,114	1.2
Slovakia	–	–	606	582	722	703	697	0.2
Slovenia	3,152	3,018	3,073	3,023	3,220	3,051	3,099	0.9
EPM-ECB	169	176	312	333	353	381	382	0.1
Total TARGET2 euro area (b)	345,738	365,690	343,621	340,099	369,108	347,751	341,075	98.6
Non-euro area	20,442	4,277	2,364	3,281	4,479	4,239	4,937	1.4
Total TARGET2 EU (b)	366,179	369,967	345,985	343,380	373,587	351,990	346,012	100.0
Euro1 (c)	211,217	250,766	227,674	230,124	256,088	241,201	236,388	

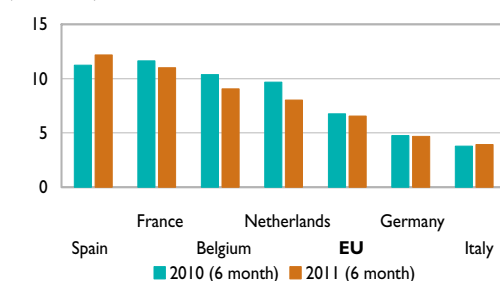
Market share of each financial centre in the TARGET2 system

(% of volumes exchanged)



Average transaction amount in the TARGET2 system

(EUR millions)



The sum of the components may not be equal to the total (or to 100) due to rounding.

Since January 2009, a new methodology for collecting and reporting statistics has been established on the TARGET2 data to improve data quality. This must be taken into account when comparing 2009 data with previous data.

(a) Since 19 May 2008, the operations of the United Kingdom pass in transit by this country.

(b) Variable composition according to the countries which participate in the systems of payment in euro.

(c) Euro1 (EBA): clearing system of the Euro Banking Association. Euro1 data include retail payments recorded in STEP1.

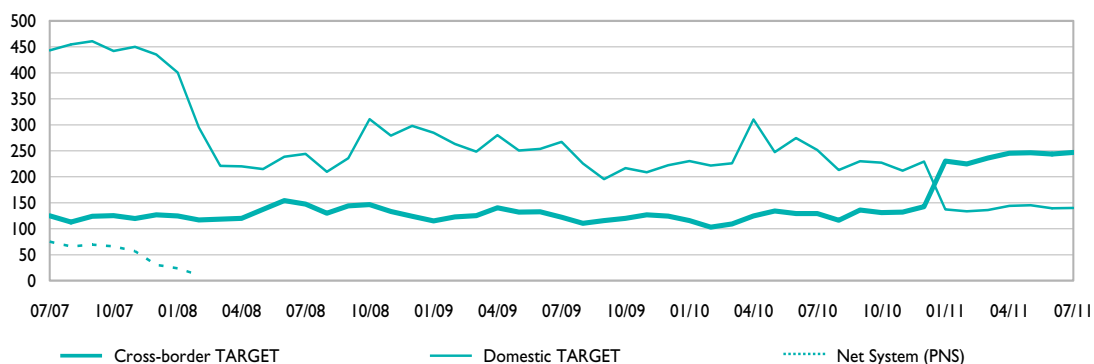
Table 39
Large-value payment systems – France

(daily average in EUR billions, % share for the last month)

	2007	2008	2009	2010	2011			2011
					May	June	July	Share
Collateral used in domestic TARGET (b)								
French negotiable securities	11.5	51.2	114.6	105.7	72.4	67.6	72.0	26.0
Private claims	18.6	79.9	129.0	149.8	138.2	139.7	139.0	50.2
Securities collateralised through CCBM	7.2	62.8	79.9	76.9	66.4	66.4	62.4	22.5
Other securities (c)	8.8	8.2	7.9	5.9	4.0	4.4	3.5	1.3
Total	46.1	202.1	331.3	338.3	281.0	278.1	276.9	100.0

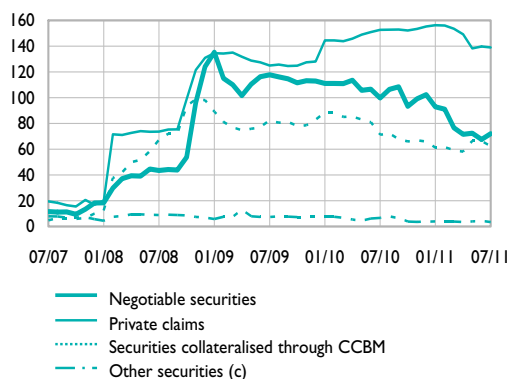
Monthly change in amounts exchanged in French payment systems (a)

(EUR billions, daily average)

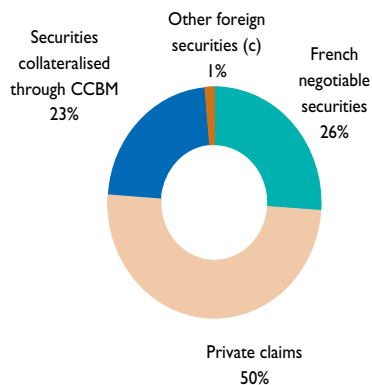


Monthly change in collateral (b)

(EUR billions, daily average)



Collateral used in July 2011 (b)



(a) Since 18 February 2008, TBF (the French component of TARGET) and PNS systems have been replaced by TARGET2-Banque de France, the single French large-value payment system.

(b) Until 15 February 2008, the indicated amounts corresponded to collateral used for intraday credit in TBF. Since the go-live of the "3G" system (Global management of collateral) and TARGET2-Banque de France on 18 February 2008, the amounts represent the collateral posted in a single pool of assets and that can be used for monetary policy and/or intraday credit operations.

(c) Other foreign securities submitted via links between securities settlement systems.

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