

# How Do We Fix This Mess?

The Economic Price of Having It All  
and the Route to Lasting Prosperity

*Also by Robert Peston*

Brown's Britain  
Who Runs Britain?

# ROBERT PESTON

and LAURENCE KNIGHT

## How Do We Fix This Mess?

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and the Route to Lasting Prosperity

  
HODDER &  
STOUGHTON

First published in Great Britain in 2012 by Hodder & Stoughton  
An Hachette UK company

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A CIP catalogue record for this title is available from the British Library

Hardback ISBN 978 1 444 75709 5  
Trade Paperback ISBN 978 1 444 75710 1  
Ebook ISBN 978 1 444 75711 8

Typeset by Hewan Text UK Ltd, Edinburgh  
Printed and bound in the UK by Clays Ltd, St Ives plc

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Hodder & Stoughton Ltd  
338 Euston Road  
London NW1 3BH

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To Max, Simon and Siân,  
without whom nothing would be possible



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# **INTRODUCTION**

## **I SAT JUST BEHIND THE DRIVING SEAT AS WE HEADED FOR THE SWAMP**

How do we fix this mess? I don't know. But don't stop reading now. Perhaps if we have a clearer understanding of what went wrong, we'll have a better idea of what needs to be done. This book is a map, of sorts. It tries to explain how years of steady and rising prosperity became a dangerous boom, and how that boom became the worst bust we have experienced since at least the 1930s. Sometimes we will fly to 40,000 feet so that we can make out the shape of the bigger fault lines in the global economy. And on other occasions we will be right in the middle of the jungle, observing how bankers, regulators, politicians – and, oh yes, most of us – were by turns greedy, gullible, lazy and short-sighted, and how we wilfully refused to see how our improving living standards were not being earned in a sustainable way.

You may fear the narrative will be gloomy. But I hope you will be proved wrong, because our plight is far from hopeless. You may become furious – with those you trusted to prevent our big banks from taking reckless risks, and with yourself, for your own

collusion in the mother of all borrowing binges. The basic story is a simple one. For years, maybe as many as thirty years, we in most of the rich West failed to respond properly to the challenge of globalisation, to the increasing competition from the emerging economies of China, India and Brazil, among others. We did not work harder and smarter. Instead we borrowed – from the likes of China, even though Chinese people are still much poorer than us – to finance the lifestyles we thought we deserved. And now, as a nation, as a group of nations, we have to pay back much of the debt, which inevitably makes us feel poorer, and will continue to do so for years to come.

Quite how we became so indebted is not such a simple tale. It involves a series of crackpot ideas that were held as almost divine truths by those we mistakenly trusted to run the global economy. It was taken on trust that:

- 1) A world in which some countries were permanently borrowing and others were always generating surpluses would naturally return to equilibrium and balance without a crisis;
- 2) It was at best pointless or at worst damaging to economic prosperity for regulators or governments to intervene in markets to prevent fast rises in lending (to households, or businesses, or banks) or sharp increases in asset prices (such as house prices);
- 3) Bankers would follow the spirit of highly complicated global rules designed in a staid, provincial Swiss town in order to strengthen their respective banks, rather than ruthlessly manipulating these rules to hide the risks they were taking;

- 4) New financial products, which almost no one understood, must be making the global economy safer rather than threatening to blow it up;
- 5) Allowing the highly remunerated salesmen and traders of investments banks and the managers of retail banks to live and work together in giant conglomerates would not create a dangerous, bonus-obsessed gambling culture in banks that are essential to our financial wellbeing.

That said, if you are looking for a slick manifesto of sure-fire reforms that will put us back on the path to unimaginable riches, then you should probably stop reading now. It is not in my nature to be quite so prescriptive and didactic. Sorry. What I am going to give you, I hope, is an analysis of the flaws in the running of the worldwide financial system and the global economy, which may suggest to you the sort of mending that needs to be done. The clean-up will take years. And there is no quick fix, so you need to brace yourself for perhaps a decade of economic stagnation. As it happens, I don't think that is reason to weep. We are a very rich country. And we can be a perfectly happy country if we learn how to make the most of what we have got rather than obsessing about how to have more and more.

This epic has the alternative title 'Globalisation gone Wonky'. Its stars – accident-prone, benighted antiheroes in many cases – include the bankers, the central bankers, the financial regulators, the finance ministers and the Chinese (all 1.3bn of them). There is a main plot – of Britain, America and much of the rich West living beyond its means till the credit-worthiness of their economies was undermined. And then there is a subplot, of much of the eurozone living beyond its

means till the credit-worthiness of many of its economies was undermined. Perhaps that sounds repetitive, but I don't think it will be. Because although the plight of Greece and Spain and the other weaker eurozone economies has much in common with the plight of the UK and the US – banks that lent far too much and hid the risks they were taking; property prices that spiralled out of control; governments that failed to spot when tax revenues would be ephemeral because they stemmed from a bubble – it is the crisis in the eurozone that has the potential to wreak maximum havoc.

The journey of the past twenty years and the next ten, through changing terrain, is simply hair-raising. We have allowed others, our governments and the so-called authorities, to take us from boom to bust. So perhaps it is time for us to stop being passengers and become drivers – or at least to try to influence the drivers. But to determine the direction of travel requires a more detailed understanding of how we arrived here, in this place that few of us like. My claim to be your cartographer is simply that, for more than six years at the BBC and over twenty years before that on national newspapers, I have had the privilege of sitting close to the driving seat, where I provided live commentary on where we were heading. And I confess, during much of the journey, I had little idea we had taken such a wrong turning. That said, at the moment that we were heading straight for the swamp, I succeeded in spotting the looming disaster and shouted out a warning: I was largely ignored and was even asked to shut up. Now I have written this book, partly to help myself understand how and why I failed to identify the scale of the looming calamity till we were careering down the mountain with lousy brakes and an unresponsive steering wheel.

In trying to capture the peaks, troughs, plains and bogs of the financial and economic landscape, I have had invaluable help from Laurence Knight, a former investment banker (and no, I have never asked him whether he has repented) and BBC colleague. He has been the best kind of collaborator: resourceful, imaginative and challenging. But for the avoidance of doubt, if you hate the analysis or spot howling errors, they are all my fault. I would also like to thank the BBC just for being the BBC: more than ever, it is a privilege to work for a news organisation which is sincerely and wholly committed to trying to understand and explain the world in an unbiased way.

This book explains my sense of how we have got to where we are. It will chart the economic and business landscape we currently inhabit. And it will attempt to plot the paths we might take from here: those that would lead to maintained or even perhaps modestly improved prosperity and a better life; and those that could lead us to penury and social strife. However, as you have probably guessed, I am not going to pretend that there is a road to Shangri-La, where we will suddenly all find ourselves becoming richer and richer again. We tried that road in the late 1990s and early years of this century, and it was the road to ruin. What we have to recognise in Britain, much of Western Europe and the US is that we are already very wealthy societies, and our capacity to become relatively wealthier – when we face such competition from the vibrant economies of the developing world – is limited. Our mission, should we choose to accept it, is to work more intelligently and industriously to preserve what we've got, and find ways to build a happier society by sharing the spoils in a manner perceived to be fairer. It is pragmatism, not socialism, to worry that vast and widening gaps between rich and poor

are unsustainable when most people are struggling to maintain their living standards.

For what it is worth, I am reasonably confident that we will eventually arrive in a place where we run our economies in a more sustainable way – for a while. That said, the lesson of history is that at precisely the moment when we believe we've solved the mystery of how to manage our economies safely, the next financial crisis will rise up in front of us and biff us on the noggin. Boom and bust will be with us forever. It was our foolish conviction that the smooth road to sunny uplands would go on forever which got us into such trouble. A more realistic ambition to set ourselves would be to steer the economy in a way that tempers the extremes of bonanza and recession.

But before we can do that, we need to revisit the quite astonishing mess that has been made of Western economies, in part by the lethal flaws in global finance. If there is a simple message of this book it is that we all need to acquire knowledge of the workings of the financial system that underpins our prosperity – and then we have to use that knowledge by telling our governments what we want from that system. Lazily trusting a financial priesthood – the bankers, the central bankers, the regulators – to manage it all for us has been the route to penury.

# CHAPTER 1

## BANKERS GAMBLERD WITH OUR MONEY: THEY WON, WE LOST

If I know anything much about the nitty-gritty of banking and finance, that is as much down to luck as design. Like more young people than we probably care to acknowledge, I had absolutely no idea what I wanted to do when I finished university in 1982. A failure of imagination led me first to Brussels, to study what was then called the European Economic Community for a few months, and then into the City. My knowledge of political and administrative French was poor, so for weeks I attended lectures where I thought I was learning about the Haddock Committees, until someone explained the concept of ‘ad hoc’ to me. And initially I was at least as bemused by the language of the stockbrokers I subsequently joined (backwardations, contangos, and so on). But as it turned out, both my brief undistinguished spell at l’Université libre de Bruxelles and a year at Williams de Broë Hill Chaplin, as apprentice to the benevolent, harrumphing Major Diggle, turned out to be pretty useful – though I did both largely because I thought I ought to be doing something, anything.

Major Diggle was a good person, bemused – I always assumed – by the comprehensive-school educated young

person he had hired to sell stocks and shares to continental investors. For him, stockbroking appeared to be about travelling to Paris, staying in the majestic George V Hotel, drinking champagne cocktails fairly early in the day, and speaking French with an impeccable English accent to assorted French bankers and insurers who could apparently be persuaded to deal with the firm. Those were the days when banking and broking were much more about who you knew rather than what you knew. It was the end of the era of the amateur gentleman stockbroker, who was about to be made history by the lethal professionalism of the invading hordes of American bankers from the Goldman Sachs and Morgan Stanleys.

But some things never change. And I suppose the most important lesson I learned from working in the City – albeit briefly – is that when money is the sole stock in trade, and making money is the be all and end all, a big part of the day job involves getting around the rules that limit the amount of money you can make. To be clear, I am not talking about criminality here. But I did witness systematic breaches of the spirit of regulations, even if the letter was followed. I saw this in the way that brokers used special trading desks to effectively charge clients twice for a single transaction. I also witnessed a blind eye being systematically turned towards anonymous clients dealing through Swiss bank accounts who seemed to be profiting from inside information (these mysterious clients would buy or sell shares the day before announcements were made that would affect the price of those shares). Insider trading had only recently become illegal. But back then the practice of profiting from confidential information was ingrained in parts of the City and – sad to say – among an older generation of journalists too. As it happens, Swiss



banking secrecy made it impossible to be sure who was behind the questionable trading I noted at the time. But I knew of one stockbroking firm where after the always shrewd share-trading orders came in from Switzerland, the partners placed their own copycat orders: they profited from someone else's alleged illegality. Rather than asking the Swiss bank to take its ethically challenged business elsewhere, this broking firm joined the party. Which is why I emerged from my stint as a broker not wholly convinced by the City's fervent claim that minimal regulation and self-regulation was best for the British economy. Simply trusting those rewarded with bonuses and shares of their firm's profits to only do what is right and proper looked naïve to me.

That said, I didn't storm out of the City in high dudgeon, repelled by its moral ambivalence. I just became bored, very quickly. Having sold a pile of grotesquely over-valued shares, about which I knew very little at all, to a young Frenchman with bad skin at a huge insurance company ('*Pardonnez-moi, cher monsieur!*'), I felt a little embarrassed and nonplussed. If that was the job, I couldn't imagine doing it for years and years, however remunerative it would be. There had been more satisfaction as a fourteen-year-old selling cauliflowers and avocados to what would now be called North London MILFs when I worked at Edmonds the Greengrocer in Park Road, Crouch End. It was time to escape.

At last came my lucky break. A friend of a friend from university, Lucy Kellaway, was working on a weekly financial paper called the *Investors Chronicle*, which was owned by the same big company, Pearson, which owned the *Financial Times*. Today Lucy Kellaway is a sort of Alexander Pope of modern British business mores, cruelly funny about the pretensions

and self-regard of corporate leaders. Back then she wrote two-hundred-word analyses of whether ICI shares were going up or down – and had just been recruited by the *FT*. There was a job going, Lucy said. And peculiarly, the then Editor, Gillian O'Connor, was persuaded that my time at Williams de Broë was relevant experience. This was the eureka moment for me. I'd found my vocation (although it almost killed me until the heavy-drinking culture of journalism and the City was supplanted by the abstinence of the invading American bankers and financiers).

At the *IC*, I had two responsibilities: retailing and banking. Both industries were to define the UK in the subsequent thirty years, but I regarded retailing as a fun beat and banking as an awful chore. Little did I know how fortunate I was that O'Connor had made me the banking reporter. This was the moment I acquired the expertise (what little I have) that differentiated me from most business and other journalists and helped me to generate a whole string of scoops in subsequent years. Memo to budding journalists: when you're given what seems like the job from hell, it may turn out to be the making of you.

A related piece of good fortune was that I became the understudy and bag carrier for the doyenne of banking journalists, the late Margaret Reid, the *IC*'s banking editor. This redoubtable woman – who had written the definitive account of the crisis of the UK's smaller banks in the early to mid 1970s, what's known as the Secondary Banking Crisis – forced me to learn how banks work. I had studied a bit of economics at Oxford, but that told me precisely nothing about the financial system that underpins wealth creation. So it was only in this, my first journalism job, that I became aware of why banks need capital to protect themselves against losses, the meaning

and importance of concepts like liquidity, and the devastating things that can happen when banks lose the confidence of their creditors. It felt like learning a dead language, a load of arcane, technical stuff far removed from our everyday lives. It was misery. But in fact it was a code-breaker or key to understanding stuff that really does matter to all of us: without this education I would have been unable to see the dangerous risks that banks were taking in 2005, 2006 and 2007, why the closure of a series of financial markets in August 2007 would be so devastating to our livelihoods, and why it was inevitable that the government would bail out some of our biggest banks in 2008.

Most business journalists spend their entire careers focussing their attentions primarily on stock markets, and the big companies whose shares are traded on those stock markets. Newspapers have historically been about who is up and who is down on the famous FTSE 100 index and what Tony Benn is fond of calling Mr Dow Jones. That reflects the prejudices of newspaper editors, who in the past rarely knew much about business and the economy and couldn't have cared less (these days at least they know they're supposed to think that business matters). There was almost nothing in newspapers about bond markets, markets in complicated financial products called derivatives, foreign exchange markets, commodity markets and the assorted other markets which had grown to be bigger than stock markets and probably more important to our prosperity. Also, few journalists took an interest in debt markets and the way that banks operate. For years all this borrowing and lending was thought of as the equivalent of a sewage system or an electricity grid – necessary, but dull. It was much more exciting and fun to tell the story of which famous companies were expanding, which

were enjoying growth in profits, which were in serious schtuck. And nor was it just the media that was ill-equipped to keep a watchful eye on the largest part of the financial economy, the part hidden below the waterline. You would have been hard-pressed to find an MP or minister taking a proper interest in all this. We were collectively complacent, leaving it to the financial priesthood, the class of regulators and central bankers, to keep an eye on the lethal hazards lurking in the financial ocean and to steer our ships away from the icebergs. But if journalists and politicians were ignorant, the regulators were, as we shall see, naïve and complacent. Thanks to Ms Reid, I at least had one functioning financial eye in my head, and so went on to become banking correspondent at the *Independent* in 1987 and banking editor of the *Financial Times* in 1992.

That said, over the succeeding years, the financial industry grew and mutated at breakneck speed. All sorts of abstruse and impenetrable new products and markets developed, where transactions worth trillions of dollars in aggregate took place. So even after working for a decade on what's probably the world's leading business and finance newspaper, the *Financial Times*, I didn't understand enough about the riskiness of much of what was happening on markets till the die was cast. The scales probably fell from my eyes in the spring of 2007, when I was on a mission for the BBC's *Today* programme, to shine a light for its four million listeners on some of the darkling corners of finance. I was shoving a microphone into the faces of bankers, asking them to explain collateralised debt obligations (CDOs) and credit derivatives, otherwise known as credit default swaps (CDSs). A sort of financial sausage, CDOs are tradable debt fabricated out of lots of other bits of tradable debt. They are

investments manufactured out of the offcuts and offal of other investments, which when minced together are supposedly non-toxic. CDSs are a bit easier to explain: they are insurance against the risk that a loan to a business or a government will go bad, insurance against a default by the borrower (and, sorry to say, they could also be insurance against a CDO going bad).

I bowled up to the Canary Wharf trading floor of one of the world's biggest investment banks, Morgan Stanley. This was where it conducted its business in what it called 'leveraged credit'. Now 'leverage' means debt. And 'credit' means 'debt'. So 'leveraged credit' means debt that has become even more indebted – a concept that would have stretched the paradox-manufacturing powers of Lewis Carroll. It was the place where debt was traded in its most reconstituted and remanufactured form, as CDOs, CDSs and other investment artifices, such as Collateralised Loan Obligations, which are made out of the debt of highly leveraged or indebted companies; Collateralised Mortgage Obligations, made out of you-know-what; and so on. There were electronic screens, hundreds of them, for as far as the eye could see. The vast open-plan space, with its serried rows of desks and twinkling computers, was like the flight deck of the Death Star, thronged by brilliant young people whose purpose was to make and flog this leveraged credit stuff. Now the first thing that stunned me was the revelation that – at the time – this trading floor was generating more revenue for Morgan Stanley than its traditional and historic business trading in shares. That was extraordinary: if you had asked most people back then who had heard anything at all about Morgan Stanley (a small subset of the population in any case) how they thought Morgan Stanley made its money, they would have said from selling shares and perhaps

bonds to investors. Most would not have said that Morgan Stanley – or Goldman Sachs, or Lehman, or Barclays Capital, or Merrill Lynch – generated billions of dollars of revenues from creating and trading collateralised debt obligations and credit default swaps.

There was a second revelatory moment for me on the Morgan Stanley trading floor. I asked the chap with the title of ‘Head of Leveraged Credit Trading’ to explain to me in language his grandma or grandpa could understand exactly what he did for a living, and what a CDS and CDO actually are. Ten minutes later, the face of his public relations minder had become ashen, and it became clear that his grandparents would have had no problem understanding what their grandchild did for a living – so long as they happened to be in charge of a huge hedge fund. But if like me they just had a passable working knowledge of business and finance, they might as well have been listening to someone speaking Ancient Sumerian or pure gobbledegook. I only had the faintest idea what he had just said. And it occurred to me that if I didn’t understand what was actually happening on this trading floor, what risks were being created, it was highly likely that the directors on the board of Morgan Stanley didn’t understand the risks their firm was taking. I don’t say that because Morgan Stanley’s board was filled with ignorant or stupid individuals. In fact, Morgan Stanley had more genuine financial experts on its board than was the case at Royal Bank of Scotland, for example. It’s just that those who tended to be on the boards of these big global banks were either financial specialists who were too old ever to have worked at the coalface in the huge, young leveraged credit industries or were the great and the good of the business world, whose practical experience was a million miles from

CDOs and CDSs. Too many of those on bank boards were like me: excessively trusting that their general knowledge of business and finance would allow them to get a proper handle on what their firms were doing. These banks had acquired huge exposure, in various ways, to leveraged credit, without those at the top understanding what this meant. They had stocked up – innocently in most cases – on products that in the wrong hands and in the wrong quantities could and would turn out to be lethal. I didn't know the scale of the gamble they had taken, but this was for me a 'Houston, we have a problem' moment: it was when I began to fear that the banks had been taking big uncalculated risks.

### **False optimism**

If I didn't properly understand CDOs and CDSs till it was too late – till they had infected more or less every part of the financial system – I was in a better position than most journalists, having had a privileged ringside seat on a revolution in banking and markets that started in the mid 1980s.

When I first became a banking journalist, our banks were run by solid unflashy men (all men) who had left school at sixteen or eighteen, joined the banks as trainees and acquired knowledge, experience and qualifications when working. Banking, like accountancy, engineering or even journalism, was to a large extent a craft skill. You learned on the job and there was no great advantage in being a graduate. In part, that was because much of banking was simpler in those days: it was much more domestic than today and about knowing customers well enough to prevent too much being lent to those who would struggle to repay it. Of course, banks still made big mistakes. For example, Lloyds was almost bankrupted in the 1980s by losses on its huge loans

in Latin America. The late Sir Brian Pitman, the long-serving chief executive of Lloyds, once told me that his bank would have gone bust if it had been forced to tell shareholders and creditors how much of its lending in the region it would never get back – which would have been the case under the disclosure rules that now apply. And it is widely thought that National Westminster Bank was in dire straits in the mid 1970s, due to its exposure to the so-called secondary or smaller banks. Both banks were kept alive by a culture back then of institutionalised secrecy, actively promoted by the Bank of England. As for Barclays, it suffered horrendous losses on commercial property loans in the early 1990s. Another of the pillars of British banking, Midland, came close to being destroyed by the reckless takeover of an American bank, Crocker, in the 1980s – and was eventually swallowed up by HSBC (which was a Hong Kong bank run by Scots).

What's striking about all these banking crises and accidents is that – although they were serious – no one argued at the time that their demise would bankrupt the British economy. And yet in 2008, the UK was looking at economic Armageddon when HBOS and Royal Bank of Scotland both went to the brink of collapse and had to be rescued by taxpayers. What happened between the late 1980s and 2008 to make the life or death of the bigger banks the life or death of the economy?

There were a series of important and unhealthy changes:

- 1) Banks became much bigger and took much greater risks relative to their capital, which is the reserves they hold as a buffer to absorb losses and protect depositors from those losses;



- 2) Banks reduced the amount of cash and liquid assets (assets that can easily be sold and turned into cash) they held – which is another kind of buffer for their business – in this case one that allows them to repay creditors as and when creditors panic and want their money back;
- 3) Banks became much more connected to each other and dependent on each other, by lending to each other much more – which meant if one bank became sick, there would be contagion to many banks;
- 4) Banks became more complicated and more international as businesses, making it much harder for directors, shareholders, creditors and regulators to understand the risks they were really taking – which meant, first, that those stewards, owners, lenders and referees didn't stop the banks from taking dangerous risks; and second, they panicked when things went wrong because they couldn't assess the scale of the problem;
- 5) Banks copied each other, by making very similar investments and loans – so when those investments and loans went bad, there was an epidemic of big banks becoming sick.

Now banks and bankers behaved in this reckless way, not because of some terrible conspiracy to bankrupt us all, but because – perhaps wilfully, perhaps innocently – they did not believe they were behaving recklessly. They believed technological and financial innovation was making their world safer. Sophisticated IT programmes were written that in theory made it easier for all organisations to keep tabs on operations

all over the world and supposedly allowed banks to have a better grasp of the risks they were running. Bankers were convinced that they could lend and invest much more, at much lower risk, than in the past, because they thought (wrongly) that a revolution in computing power and financial analysis gave them a better understanding of their activities than their predecessors.

And it was not just the bankers who believed there had been some kind of evolutionary leap to create the all-seeing super-banker. Regulators, central bankers, investors, and politicians were also convinced that progress had created a safer financial system.

Here, for example, is what the IMF said in 2007, which most would say is after the financial crisis had actually begun, about the health of Wall Street:

Core commercial and investment banks are in a sound financial position, and systemic risks appear low. Profitability and capital adequacy of the banking system are high by international standards . . . Despite a recent uptick following subprime difficulties, market measures of default risk have remained benign.

The UK's regulatory authority, the Financial Services Authority, shared this complacency. In June 2007, its director of wholesale firms, Thomas Huertas, said this to me in a BBC interview (to be clear, Mr Huertas' view was that of the FSA as a whole):

The major institutions are very well capitalised. They show very very strong earnings. Anywhere short of a major depression, the firms are much much better placed than

they have been to withstand economic shocks. We do encourage the firms and the firms are responding to do stress testing to prepare for the worst. So in our view firms are in fact taking steps to prepare for the proverbial rainy day.

Another statement by the IMF, made in 2007, best captures why the experts paid to protect us from the excesses of the financial sector were so misguided:

Although complacency would be misplaced, it would appear that innovation has supported financial system soundness. New risk transfer markets have facilitated the dispersion of credit risk from a core where moral hazard is concentrated to a periphery where market discipline is the chief restraint on risk-taking. The conduit mechanism, in turn, has facilitated broader credit extension, with the important qualitative nuance that much of the recent credit growth has reflected lending to new, previously excluded borrowers, as opposed to ‘more money thrown at the same people’. Although cycles of excess and panic have not disappeared, the subprime boom-bust being but the latest example, markets have shown that they can and do self-correct.

It is worth translating this, because more or less everything that went wrong is captured here. The IMF was saying that innovation meant debt was being traded much more and risks were being dispersed: the risks weren’t concentrated in the banking system as much as they had previously been; they were shared with all sorts of other investors. What’s more, this innovation had created all sorts of new credit, much of it going

to individuals and businesses which hitherto had either been unable to borrow or could only borrow at prohibitive cost. So banking innovation was socially progressive – it was giving poor people the opportunity to buy homes and accumulate assets, for example. And at the core of the IMF view was an ideological conviction that markets had stopped and would stop too much being lent in a reckless way; markets ‘can and do self-correct’, as the IMF put it.

Arguably it was this blind faith in the rationality of markets that was at the heart of all our subsequent economic troubles. That is not to say that a market-based system, as opposed to a communist system, hasn’t turned out over the past fifty odd years to be the least-worst system for organising an economy. The triumph of capitalism in China, if not the triumph of democracy there, tells you that markets have much going for them. So what follows should not be seen as some kind of rallying cry for the nationalisation of everything and for all important economic decisions to be taken by civil servants and politicians. It wasn’t an accident that the Soviet Bloc fell apart and market-based capitalism spread like wildfire from East Germany to Eastern Siberia. The command economy of the old USSR crumbled in large part because the gap between the living standards of the West and the East was becoming too large for Soviet citizens to tolerate. But if a market-based economy is generally preferable to a system in which all decisions on production and wages are taken by a central bureaucracy, that does not mean leaving markets unchecked and unregulated will inevitably generate sustainable improvements in prosperity and spoils distributed in the fairest way.

To be clear, the flaws in markets are not the great discovery of our age. The Wall Street Crash and the Great Depression of the 1930s were examples of boom and bust

caused by wild euphoria on markets. So too was the Dutch tulip mania of the 1630s or the British railway bust of the 1840s. Markets are no more than collections of people buying and selling; they are social constructions. And people, as we all know, are prone to bouts of herd-like and manic behaviour, to euphoria and self-delusion. We're all prone to believe, after a period of stability and prosperity, that stability and prosperity are the norm. So in the 1990s and early parts of the new millennium, as the UK, US and much of Europe seemed to become richer year after year without any major accidents, we perhaps began to think that an economic life without significant setbacks, a recession-free economy, would be with us forever. Think about your own case or that of your parents. If they had seen house prices going up without a pause for a decade, it was rational to believe, surely, that they would continue going up for another decade or longer. Which is why many people in the UK, the US, Spain and Ireland borrowed far too much in the years before the crash of 2007–8 in order to get on the housing ladder or move up the housing ladder.

And there was an identical process going on in the banking industry. Banks were taking bigger and bigger risks, lending more, investing more, because assets had been rising in value for years, and fewer and fewer borrowers were reneging on their debts. If Gordon Brown believed it was the end of boom and bust, he wasn't alone. And for banks there was a second source of false corroboration for the seductive notion that they were no longer prone to normal downturns. They were all using new complicated financial models – run by computers – called Value at Risk models, to assess how much they could lose at any instant if there were a sudden fall in markets (or indeed a sudden rise – because banks are

constantly and continuously placing bets that some asset prices will rise and some will fall). But the problem is that the information fed into these models was of recent vintage. The data captured movements in markets that had taken place in the previous ten years or so, when things had been pretty stable. But the data did not include the equivalent of a 1929 crash or the infamous drop from £20,000 (in today's money) to a penny in the price of a tulip almost four centuries ago. The banks' computer models for minimising risk were built on the assumption that the very worst that had happened in the past would not and could not happen again. That made these early-warning and protective systems quite close to useless – because the banks were not guarding themselves against the extreme risks that had transpired in the past and did indeed happen again. Worse than that, every year that passed with comparatively little bad stuff happening in markets, the more data was fed into these models showing that big swings in prices were unlikely to happen. That had the perverse consequence of encouraging bankers to double up on their bets just as the cycle in rising asset prices was reaching its inflated peak. In other words, a system designed to limit risk-taking had the effect of encouraging dangerous risk-taking.

For me, the fatuousness of these models was best shown by remarks made to the *Financial Times* on 13 August 2007 by David Viniar, the chief financial officer of the world's most powerful investment bank, Goldman Sachs, a few days after what most people see as the start of the credit crunch – the moment a whole series of important financial markets, used by banks to raise hundreds of billions of dollars, simply stopped functioning properly. Mr Viniar said: 'We are seeing things that were 25-standard deviation moves, several days

in a row.’ What he was saying, in impenetrable banker-speak, is that what had been happening in wholesale markets was unexpected. The world was not behaving in the way it was supposed to, as per the assumptions and data fed into the banks’ Value at Risk models. On the basis of Goldman’s risk assessment, precisely how unlikely was the market malfunction that had just happened? Andrew Haldane, the director in charge of financial stability at the Bank of England, tried to translate Mr Viniar’s jargon into language we can understand:

To provide some context, assuming a normal distribution, a 7.26-sigma daily loss would be expected to occur once every 13.7 billion or so years. That is roughly the estimated age of the universe. A 25-sigma event would be expected to occur once every 6 times 10 to the power of 124 lives of the universe. That is quite a lot of human histories. When I tried to calculate the probability of a 25-sigma event occurring on several successive days, the lights visibly dimmed over London and, in a scene reminiscent of that *Little Britain* sketch, the computer said: ‘No.’ Suffice to say, time is very unlikely to tell whether Mr Viniar’s empirical observation proves correct.

(Andy Haldane, ‘Why Banks Failed the Stress Test’, 13 February 2009)

To put it another way, Goldman’s risk model assumed that the closure of asset-backed commercial paper and asset-backed bond markets – which *had* taken place – could not have taken place in the lifetime of the universe, or indeed many many lifetimes of the universe. Which shows not that something unbelievably improbable had transpired, but that

bankers had been putting too low a probability on market shocks that had happened before and would happen again. Before we move on, for those of you who like jargon, the bankers – and regulators, which sanctioned investment banks' use of these flawed systems for controlling risks – were ignoring what statisticians call a fat-tail in the distribution of possible outcomes and managing risks on the basis that outcomes would be normal.

That said, and this is an important point, many bankers knowingly took risks that were dangerous – although as individuals they never thought these risks could collectively bring the financial system close to collapse. The huge pay incentives to gamble were described to me by an investment banker:

Some clients wanted to invest in developing countries like Russia and Brazil. We lent them additional money to increase the size of their bets. This put us at risk: if the market collapsed, wiping out all the clients' money, we could also stand to make a loss on what we'd lent them. Market collapses were not uncommon in Russia and Brazil; we were very conscious of this risk – more so than our clients. Yet my trader still argued with the banks' internal accountants that the risks involved were small. That's because his bonus depended on how much profit the accountants were willing to recognise. Of course, in 2008 every one of those trades blew up. Yet nobody blamed him for failing to foresee such a massive market meltdown. And even if they had, he had cashed in his bonuses long before.

(Interview with the author, August 2012)



The big point, I think, is this one. Calamities in markets, that wreck or come close to wrecking entire economies, happen periodically. Depending on what you classify as such a trauma, you would probably argue that over the past hundred years there have been two or three massive financial crises in the UK (a near collapse of the UK banking system just before the First World War, the Secondary Banking Crisis of the 1970s and the 2007–8 debacle) plus two or three other lesser ones (including the popping of the dot-com bubble in 2000 and Black Monday on stock markets in 1987). You will notice that the more serious events are those where banks are at the heart of the problem, and the reason for that will soon become clear. But what is striking is the human propensity to forget about previous crises and to assume that a new crisis-free era has arrived. Here is the central paradox of financial history: we know that there will be harmful banking crises every fifty years or so, and lesser market shocks every twenty or thirty years; but we also know that as years go by without such a shock bankers and investors will become unshakeably convinced that there won't be a crisis in their lifetimes, and will begin to take ever more dangerous risks. The challenge for regulators and politicians, in trying to reduce the incidence and severity of future crises, is somehow or other to ground the optimism of those who make important decisions on markets in a more realistic view of history and the future.

Perhaps the most shocking indictment of regulators' and bankers' article of faith that markets will self-correct is what happened to the price of credit derivatives on the debt of big banks and financial firms in the run-up to the 2007 market meltdown. The price of insuring the debt of banks like Royal Bank of Scotland and Lehman Brothers against the possibility of default – against the likelihood they wouldn't repay their

debts – became cheaper and cheaper just as these banks were taking bigger and bigger risks. It is worth thinking about this for a second: the more that the banks lent, the more that they recklessly provided credit, the cheaper it was for their creditors to insure against the risk that it would all go horribly wrong. Markets did not self-correct; they self-harmed.

### **Credit where credit's (not) due**

Here is the rotten heart of the iteration of global financial capitalism that has evolved: banks' over-confident creation of masses of new credit was reinforced by the export of vast capital surpluses being generated by the producing countries of China, Japan, the oil-rich Gulf states and Germany (see chapter 4). Bankers and investors became more and more irrationally exuberant (to steal Alan Greenspan's resonant phrase) and certain that a new golden age of ever-rising prosperity had arrived. They magnified the indebtedness of the consuming countries, like the UK and US, by lending more and more to households, to businesses and to governments. It is important to point out that these trends – the credit creation by banks and flood of cash from the producing nations – were lethally interconnected: they mutually reinforced each other.

On the one hand, all that money sloshing from China into loans to the US government, for example, meant that what the US government had to pay to borrow was kept low. And when the cost of borrowing for the US government fell, so too did the cost of borrowing for US banks (a fall in interest rates paid by the debtor perceived as most likely to always pay its debts, the government, cuts the cost of borrowing for most other debtors, including banks; lenders and investors who want to earn a higher rate of interest, a higher yield, than what the government pays are forced to lend to riskier borrowers,

such as banks). Or to put it another way, the massive flow of funds from the producing nations to the consuming nations meant that interest rates in the consuming nations were suppressed. And with banks able to borrow cheaply, they were prepared to charge lower interest rates to households and businesses. In fact it was so hard for banks to get a decent return from lending to households and businesses with strong finances, they started to look more kindly on borrowers who would have been seen traditionally as too risky, such as people on very low incomes, or even without jobs, looking to buy a home, or businesses bought by private-equity funds with massive amounts of debt.

For better or worse – probably worse – this was also a golden age of financial innovation. Some of this innovation and new ‘financial technology’ persuaded banks that there had been a meaningful reduction in the risks of making so-called subprime loans to house buyers and of extending credit to companies that were borrowing mind-boggling sums (companies that were labelled as ‘highly leveraged’). The innovations included the notorious collateralised debt obligations and collateralised loan obligations. There was also the growth of what is known as shadow banking, the creation of new institutions called conduits and structured investment vehicles (SIVs), that did a lot of lending outside the conventional banking system (although still connected to the banking system) in a manner that turned out to be insidious. There was a great global credit-creating loop, where money poured in from the likes of China to the US (for example) and was then turned into even more money by Western banks, which fuelled spending and investing within the US on Chinese-made products, which further amplified the flow of money from China to America. And as

the surge of money from the producing countries to the consuming ones became broader and deeper, so there became a shortage of safe places to invest that money – which provided an incentive for investors to take greater risks and for bankers to hide and disguise the true risks of the financial products (such as CDOs) that they were selling to investors. In this cheap money world, anyone prepared to pay a slightly higher interest rate – such as poor people desperate to own a home in the US, or property developers in Ireland and Spain, or the Greek government – found they could borrow undreamed-of sums.

One way to see all this is as China, Germany, Japan and the oil-rich Gulf states providing the fuel or stimulants for a lending binge by the banks. Think of it perhaps as an enormous global party. China, Germany, Japan and Saudi Arabia brought the booze to the party, though they consumed very little of it themselves. Some of the booze was drunk by Western banks. But then the Western banks found a clever way to adulterate and increase the quantity of the booze without reducing its potency. For a while they thought they were manufacturing vats of finest quality claret, when in fact it was the kind of toxic stuff that makes you go blind. Everyone – the bankers, consumers, businesses and governments, in the US, the UK, Greece, Ireland, Spain, Portugal and so on – got legless. So they failed to notice that they were beginning to dance dangerously close to a wide-open window on the fiftieth floor of a massive tower block. What made the party all the more dangerous is that the putative grown-ups, the central bankers and regulators, convinced themselves it was all good clean fun. For example, when the chairman of America's Federal Reserve, Alan Greenspan, cut interest rates after the dot-com crash and after 9/11 in the early years of the new century, he

spurred lenders and investors to take even greater and crazier risks in the quest for profits, or what has become characterised as ‘the search for yield’. By cutting interest rates too much as the party was getting started, Greenspan and other central banks encouraged investors and creditors to lend more and more to those who would find it impossible to repay what they owe.

### **A lending hand**

One of the most important points to understand here is that when banks are in a mood to lend, they can create almost unlimited amounts of money – and can really give a boost to economic activity. And the corollary is also true – that when banks are feeling anxious and worried about whether households and businesses are financially overstretched, they can suck money out of the economy and force it into recession. Think of it like this: when a bank lends to a company or household, the company or household will put the cash into another bank, which then has the cash available to lend to someone else, who then deposits the money into another bank, which can then make another loan, and so on. Now the authorities – or rather central banks which sit at the heart of national banking systems – have some modest ability to increase or decrease the ability of commercial banks to create loans and money in this way. A central bank can insist that commercial banks only lend out a proportion of their deposits, that they always keep some percentage of their deposits as reserves at the central bank. The Chinese central bank, the People’s Bank of China, for example, tries to retain control over lending by Chinese banks by varying the reserves they are obliged to hold. By contrast, the Bank of England abandoned the use of these reserve requirements, because it did

not believe they were very effective – and it now influences money creation in other ways. What matters is that in today's global almost-borderless financial system, banks have enormous power to increase or shrink the amount of credit and money in an economy.

That said, because banks are lending other people's money, not their own, and are not supposed to take crazy risks with that money, there are what is known as prudential constraints on how much banks can lend. And these prudential constraints – the amount of capital and liquidity (or cash) that banks have to hold – do have a powerful impact on banks' capacity to create credit. Before we explore this interplay between the regulation of banks and how much they lend, it is important to consider why banks matter so much to all of us. Now in all the barrage of negative publicity about banks in recent years, it is easy to forget that they are really important institutions fulfilling a number of vital social and economic functions. In fact, given that it is hard to find commercial entities which perform quite such a useful role, banks have had to work very hard to become quite as unpopular as they have recently become (in spite of the stigma attached to usury or money-lending throughout history, in twentieth century Britain the bank manager was usually a pillar of the community). Perhaps their most valuable role is that they take the surplus cash that many of us have at various times and they then lend it to those who lack the savings for the things they wish to buy, such as a house, or a pair of shoes, or a new production line. A world without banks would be a world in which it would be much harder for businesses to invest and create jobs, and those born poor would have to save for decades before they could even think about buying a home. Banks, when managed sensibly and carefully, make us richer by helping employment-creating

businesses expand, and can promote social mobility by providing opportunities to borrow for those who aren't born wealthy.

There are limits to the social utility of banks. For example, because banks are never supposed to put our savings at risk in a serious way, they have a powerful incentive not to lend to those least likely to pay it back, even though these are often businesses and individuals who most need the money. Or to put it more crudely, banks typically don't lend to really poor households. And they rarely lend to young entrepreneurial businesses, since these are the businesses that most often go bust quite quickly, even if a few of them turn into a Google or Facebook. In spite of these shortcomings, it is pretty hard to argue that we would be better off if there were no banks. If we can't live with banks, as some would say, we probably can't live without them.

Now the primary requirement of banks, which is to keep our savings safe, is not as easy as it may sound. Because when banks lend our money, even to borrowers who seem as sound as a pound, there is scope for all sorts of accidents that can prevent those borrowers from repaying what they owe – to the detriment of the banks and their depositors. For example, a couple in seemingly good jobs who have borrowed to buy a house can suddenly find that one or both of them have lost their jobs, making it difficult for them to keep up payments on a bank loan. Or a solid profitable business can lose a couple of big regular orders that would undermine its ability to make interest payments. So the lesson of history, which many banks forgot, is that it is reckless not to keep a big pot of rainy day money, which is there to protect depositors from losses when debtors do not repay all they owe. This rainy day money is called capital.

Here is the thing: because banks are entrusted with our precious savings, not any old business can be a bank; only institutions that have been vetted and approved by an official regulator, in the UK's case the Financial Services Authority – which at the time of writing is due to be broken up into two new regulatory bodies – are licensed to take deposits, and all senior bankers are also vetted and approved by regulators. These regulators also determine how much capital and liquidity banks have to hold, to minimise the danger of losses made by the banks impairing the value of our savings.

I am going to get pedagogic on you now – because part of why the banks and our economy got into such a mess in 2007–8 was the design and implementation of rules about how much capital banks have to hold. What I need to explain is how there is a tension between the interests of depositors and those of top bankers when it comes to setting the quantity of capital held by banks. Or to put it another way, you and I as savers would want our banks to hold loads of capital; but those running banks have a strong personal financial incentive to minimise how much capital is in their banks.

Regulators set capital adequacy requirements for banks – a ratio of how much capital they have to hold in relation to the loans and investments they make, which are collectively known as banks' assets. If, for example, banks are forced by regulators to hold capital equal to 10% of their assets, then a bank with £1m of capital can make £10m of loans. But if this minimum capital ratio is set much lower, at 2%, then the bank with £1m of capital would be allowed to make £50m of loans. Now I have been talking blithely about 'capital' without saying what it is or where it comes from. Well it is money provided by the owners of the bank, the shareholders. And although it can



be lost, if debtors don't repay what they owe, it can also be increased, when the bank makes profits.

Let's go back to our example of the bank with £1m of capital making £10m of loans and investments, which we'll call Pesto Bank. To finance its £10m of lending and investing, Pesto Bank has borrowed £10m from depositors and other creditors. Now let's assume Pesto Bank is paying 2% on average to borrow, and is charging 7% on average to its debtors. The spread or difference between its cost of funds and what it receives in interest is 5%. That means it is generating a gross profit of 5% on its £10m of loans, or £500,000. As it happens, Pesto Bank is a New Age bank, where its employees don't receive massive bonuses. The total cost of running the bank, in wages, electricity, and so on, is just £350,000. That means there is £150,000 left over for the owners, the shareholders, the providers of that £1m of capital. They'll take out £75,000 as their reward in a dividend, and £75,000 will be left in the bank. Here is the important thing: that £75,000 reinvested in the bank's reserves would allow the bank to borrow a further £750,000 to lend a further £750,000 (remember that the bank has to retain a capital adequacy ratio of 10%, in this example). And if you're wondering why those shareholders deserve to receive that £75,000 dividend, remember it only takes one of Pesto Bank's customers to go bust, and to be unable to repay a £1m loan, for the shareholders to lose every penny of the £1m of capital they have put into the bank.

Now let us take a look at what would happen to Pesto Bank if it were allowed to lend £50m for every £1m of its capital – that is if its minimum capital ratio were reduced from 10% to 2%. If Pesto Bank is still borrowing at 2% and lending at 7%, Pesto Bank would make a gross profit of £2.5m – or five

times greater than it was making with a capital ratio of 10%. In order to make those extra loans and manage the additional deposits it has taken in, Pesto Bank has had to hire a few more people. So its overheads have also gone up five-fold to £1.75m. And because the bank has done so well, I as the chief executive have demanded that I receive a bonus of £250,000. But even after all those extra costs and my bonus, there is still £500,000 left over for the owners, or more than three times what was earned for them when the bank was forced to hold much more capital relative to its loans and investments. Their dividend this time will be a handsome £200,000, representing a 20% return on their investment, compared with 7.5% in the previous example. And £300,000 will be retained in the bank – which can then underpin a further £15m of borrowing and lending by Pesto Bank.

What I hope you will have noticed is that the bank with a smaller amount of capital relative to loans and investments generates massively bigger profits, which allows it to pay vastly bigger bonuses to its senior executives and directors, and to distribute much bigger dividends to shareholders. Surely therefore we would want banks to have lower capital ratios. That is certainly what many bankers would argue. But think for a second about the relative risks for depositors. When Pesto Bank lends fifty times its capital, only 2% of its loans have to go bad for all that capital to be wiped out, whereas when the bank lends ten times its capital, a full 10% of loans would have to be lost for shareholders to lose everything. So there is a much greater danger that depositors will not be able to get all their money back, when a bank has a 2% capital ratio and lends fifty times its capital than when a bank has a 10% capital ratio and lends ten times its capital.

To put it another way, you would probably want to be a top

executive and shareholder in Pesto Bank Mark 2, because the bonuses and dividends would be bigger, for as long as Pesto Bank Mark 2 doesn't go bust. But you would probably want to be a depositor in Pesto Bank Mark 1, because your money would be safer. As I am sure you have gathered by now, banks with less capital relative to their loans and investments are much more prone to falling over, everything else being equal.

The process of a bank borrowing and lending more relative to its capital is called 'increasing its leverage' or 'leveraging up'. And the reverse process, of cutting the volume of loans made relative to capital, is called deleveraging. Typically banks took on much more leverage in the years before the 2007–8 crash and have deleveraged since. For the rest of us, leveraging up is normally associated, while it's happening, with fairly lively economic activity, pretty strong growth in GDP or output, whereas deleveraging is frequently the cause of a slump or recession. The reason should be obvious: when banks are increasing their leverage, they are lending more and more, so there is much more money available to finance investment by businesses and spending by households. Since the crash, we have lived through a period of sustained deleveraging. The Credit Crunch of 2007–8, which precipitated the recession of 2008–9, was a period of sharp deleveraging. And since then, banks have continued to deleverage, though at a slower pace, which is one important reason why the economy remains so weak.

Now, as we have seen, when a bank increases leverage, the risk of that bank becoming insolvent increases: the bank would have less capital relative to its loans to absorb losses if the loans were to go bad; and when a bank's capital has been wiped out by losses, the bank would be bust, because the bank would be unable to repay its depositors and would therefore

have failed in its primary responsibility (to keep depositors' money safe). So it is important that banks have sufficiently large stocks of capital to absorb any losses that may be coming their way. But sound banks need more than just adequate reserves of capital to cope with whatever accidents may befall their debtors. They also need to retain large stocks of what are known as liquid assets – assets that are cash or can easily be turned into cash – just in case there is a sudden surge in depositors asking for their money back.

The flip side of banks' social utility, their ability to turn savings into loans to business and households, is that they are inherently unstable. The way to think of it is like this: there is no bank in the world that could repay all its depositors at once, if they all asked for their money back at precisely the same moment. The reason, in the jargon, is that banks borrow short and lend long. Or to put that into English, banks borrow from individuals, businesses and assorted institutions that can normally ask for their money back at a moment's notice; but they lend this money out for a few months, a few years or even a few decades. What is known as banks' 'maturity-transformation' function is an inescapable flaw in their design. So it would be a very foolish and reckless bank that lent out every single penny of the money it took in from depositors. Every bank keeps some money in cash or in the form of tradable assets, such as bonds that can easily be sold for cash, so that when a depositor asks for his or her money, the bank can provide the money.

Imagine what would happen if a few depositors went to a bank and were told that they couldn't get their money back. The rumour would spread like wildfire that the bank had run out of cash – and every depositor in that bank would start to fear that their respective savings were not safe. They would all

clamour to be repaid. At that juncture, it would be curtains for the bank, even if its balance sheet was still showing that it had reserves, so that in a technical sense it was still solvent. With depositors screaming for cash, the bank would be forced to sell all its assets to raise the needed funds. And in any fire sale of this sort, assets would be sold for a knockdown price, or for less than their official value in a bank's books. For example, if a bank had provided a billion pounds of mortgages with depositors' cash, it might well in those emergency circumstances sell those mortgages to another bank for £800m, to raise cash. But in selling for £800m, the bank would be incurring losses of £200m – which could well wipe out its capital, and turn it from a solvent bank into an insolvent bank. When there is a run on a bank, when a bank suffers a liquidity crisis, there is a very big danger that it will soon become insolvent.

In other words, a well-run bank will make sure it holds enough cash and liquid assets to meet not only the requirements for cash of its depositors on a normal day, but also quite a bit more – just in case there is a surge of withdrawals. As you will have gathered, the perception that a bank is not safe is as imperilling to its survival as the reality. And once a bank proves itself unable to return the savings of its depositors, the game is up: all depositors will scream for their money, and the bank will collapse. But just as with capital, those who run banks have a powerful incentive to minimise the amount of cash they hold: cash is dead money; it is not earning interest, so the more cash held by a bank, the smaller its profits, and the smaller the bonuses and dividends it pays. That is why regulators are supposed to force banks to hold a minimum amount of cash and liquid resources – although, as we will soon find out, this is something that regulators completely forgot to do in the boom years.

**The new banking**

In later chapters we will look at how Northern Rock, Royal Bank of Scotland and HBOS were all taken to the brink of collapse by reckless lending and a failure to maintain adequate capital and liquidity – and you might feel you will be able to make a judgement about whether it was profit-hungry executives and shareholders who were more at fault, or complacent and naïve regulators. For now, let us look at the big trends for all British, European and US banks. The first thing to note is that the leverage of banks has been rising steadily for more than 100 years. In the United States, for example, banks would typically hold capital equivalent to around half of their loans and investments in the 1840s. Later, in 1880, a typical US bank had capital equivalent to around a quarter of all its loans and investments, whereas the equivalent ratio for British banks was not far off 20%. But more than a century on, by mid 2008, Royal Bank of Scotland held capital capable of absorbing losses around a tenth of that, or only 2.2% of gross loans and investments, while Northern Rock's capital-to-assets ratio in 2007 was just 1.7%. To put this another way, a century ago a bank would go bust if a quarter of its loans went bad; in the latest financial crisis, one of the biggest banks in the world, RBS, was no longer viable if it could not get back 2% of what it was owed; and in the case of Northern Rock, if it lost just one in every £60 of its loans, it was kaput. On average, by the time of the 2008 banking crisis, British banks had capital equivalent to less than 3% of their loans and investments, a fall of more than three-quarters through the course of the twentieth century, and US banks held only a bit more capital. And the particularly sharp nosedive in the amount of capital held by banks, in their capital ratios, occurred in the decade before the crash, after drifting down in a more gentle way over the previous ninety years.

For a better understanding of why this matters, let us take a look at what happened in the late 1920s and 1930s, when the British economy contracted a little more deeply than in the recession we've just endured (although in that earlier malaise the recovery came earlier and was much stronger). What is striking is that back then, lots of small banks were going bust all over the US, but not a single bank of any significance collapsed in Britain. Now in some ways the British banking industry in the 1930s looked remarkably similar to how it looks today, with just a handful of big deposit-takers dominating the industry. So why were British banks more robust in the 1930s than in 2008, when two giant banks, RBS and HBOS, two medium-sized banks, Northern Rock and Bradford & Bingley, and a host of tiddling building societies and British offshoots of Icelandic banks had to be rescued and broken up – at enormous cost to taxpayers and all our wealth?

In 1930 the British banking industry was dominated by five big banks. These were Barclays, Lloyds, Midland, National Provincial and Westminster. In 1970, National Provincial and Westminster merged to form NatWest, which was itself acquired by Royal Bank of Scotland in 2000. Midland was bought by HSBC in 1992 and trades as HSBC today. So the Big Four banks today – HSBC, Lloyds, Royal Bank of Scotland and Barclays – are more or less equivalent to the Big Five in 1930. That said, in 2008 in the UK there was also HBOS, to take the number of serious players to five; and a recent acquisition spree by Spain's Santander in the UK means there is still a Big Five, even after the controversial takeover of HBOS by Lloyds. There seems to be something about the size and structure of the British economy that gives sustenance to a quintet of very large banks, but no more than that (although

Nationwide and the soon-to-be enlarged Co-operative Bank are trying to test the theory that five is the only number when it comes to big players in British banking). Anyway the important point is that in some ways the structure of the British banking industry has been remarkably unchanging over many decades. That said, look beneath the bonnets of the banks and we get a different view. In the case of Midland Bank in June 1930, for example, it had £28m of capital and reserves backing £315m of loans and investments, so its gross ratio of capital to assets was 9%. Midland back then was holding four times the capital relative to the risks it was running of, for example, Royal Bank of Scotland, before the acute phase of RBS's crisis. Midland and its peers were also much stronger than modern banks in a number of other ways. Back in 1930, Midland had made loans of £214m, which means it had lent out just 56% of the £379m it had taken in from depositors and its other creditors. In contrast, modern big banks like RBS and HBOS, at the height of the boom, actually lent out more than they had taken from ordinary customers in the form of dependable deposits. RBS, HBOS and Northern Rock had become dangerously reliant on raising money from the kind of investors and banks which would stop lending to them or would demand their money back at any whisper of trouble ahead (and we will look at quite why that was such a lethal error later in our story). What is more, Midland held cash equivalent to 10% of its current-account and deposit liabilities, and a further 9.4% in very liquid form. In total, it had 'cash items' equivalent to 21% of deposits. Or to put it another way, it was much better placed to cope with a panicky withdrawal of funds by customers than today's banks – many of which barely had any cash at all.

Other figures – from the Bank of England – show how



vulnerable our banks became. From 1968 to 2008, banks' holdings of sterling cash, plus British government bonds, plus money they could call in at any time, plus their balances at the Bank of England, plus other high quality tradable bills, fell from 30% of their loans and investments to about 0.5%. Or to put it another way, over forty years they went from having enough pounds to be able to withstand the mother of all bank runs to a position where a request from just a few of their bigger creditors for their money back – such as those who manage billions of pounds of investors' cash in Boston, Massachusetts or Singapore or Geneva – could force them to seek emergency loans from the Bank of England. Here is another way of seeing how British banks became much less stable. In 2000, bank loans provided by British banks were all financed by regular deposits from customers. This was a good thing because savers like you and me only once in a blue moon decide en masse to move our money (the run in 2007 at Northern Rock was pretty close to being unique). So British banks that financed their loans with their customers' deposits were not massively at risk of running out of cash in a hurry. But that source of strength vanished very fast. By 2006, a quarter of all the loans and investments made by British banks were financed by selling bonds to big investors and borrowing from financial institutions. By 2008, there was a £900bn gap between the money lent by British banks and the money they had taken in from depositors. That £900bn was all obtained on wholesale markets, from financial institutions – including other banks – and big investors. Which was a desperate mistake because much of that £900bn could have been – and was – demanded back in 2007 and 2008, as fears increased that a number of big banks all over the world were facing losses and might not be able to pay their debts. This funding gap was the

reason why Royal Bank of Scotland and HBOS went from being walking wounded in the summer of 2008 to being almost at death's door in the autumn: their creditors had the right to demand to be repaid in a hurry, and they exercised that right.

There is another relevant lesson from early twentieth century history. In 1930, the big banks published monthly balance sheets: they provided important information about their financial health more regularly than banks do today. However, they kept an element of mystique about how strong they really were. All the banks had 'hidden' reserves – contingency funds and property that was deliberately undervalued – which they shrouded in mystery. This created the useful and true perception that the banks were stronger than could be seen from the accounts they put into the public domain. Now we live in an age where we demand transparency from all our important institutions. Governments and regulators have forced almost all banks everywhere in the world to abandon the use of hidden reserves, and Britain's big commercial banks put all their capital on display from 1970 onwards. But there is a great paradox here: transparency has not delivered greater confidence in the robustness of banks. Today there is more mistrust of banks' balance sheets: a fear that banks are hiding their liabilities and losses; a concern that banks are covering up toxic waste. There are lots of reasons for this mistrust: the greater complexity of financial products, whose underlying value few really understand; the huge global spread of banks' operations; and horribly complicated regulations that allow banks to set aside much less capital as loss-absorbing protection for some kinds of loans that are deemed to be less risky, and which offer the potential for abuse and for obscuring real risks (these are the complicated Basel Rules, which are going to play a big role in

our story). This incapacity of banks' creditors to confidently evaluate banks' health and strength was a major cause of why, in 2007, they stopped lending to banks – and why the global financial system seized up in a devastating way.

We did not learn anything new in the banking crisis of 2007 and 2008 about how to keep banks strong and depositors' money safe. The basics of sound banking are broadly unchanging. But bankers, investors and regulators for years forgot the basics. And to recap, these are the basics:

- 1) Banks need enough capital to absorb possible losses;
- 2) They must retain sufficient cash to meet whatever requests for money they may face from depositors;
- 3) They should not lend more than the funds they have borrowed from reliable or dependable sources, which in normal circumstances means they should not lend much more than the deposits they take from customers;
- 4) If they are borrowing substantial sums from professional investors for a fixed term or maturity, they should not lend that money for longer than the relevant fixed term or maturity (to avoid the danger that they won't be able to repay those investors when the loans fall due);
- 5) They should avoid, where possible, becoming such complicated businesses that no human can possibly understand the risks they are running.

Our biggest banks ignored these cardinal rules in the years before the great crash. And our regulators failed to enforce

these rules properly. You may be asking yourself why on earth bankers took such foolhardy risks. Well you can probably work out the answer from my discussion of what happened at Pesto Bank when it lent far more relative to its capital: in the good years, before it all went horribly wrong, throwing caution and prudence to the wind generated massive profits and dividends for shareholders and enormous bonuses for banking executives. You may recall that when Pesto Bank became more leveraged, it made far bigger profits, and was therefore able to deliver fabulous rewards to its top bankers. And when Britain's banks borrowed and lent vastly more relative to their capital resources, there was a sharp rise in their profits in relation to their capital, or what is known as return on equity. The Bank of England has estimated that this return on equity went from an average of between 5% and 10%, which is where it had been for more than forty years until the 1960s, to 12.5% in the 1980s, to 23% in the decade before the 2008 disaster. And the Bank of England's analysis shows that most of that recent increase in the return on equity, the profitability of banks, did not come from banks becoming smarter or more efficient in a sustainable way. Banks had not transformed their productivity by designing massively better current accounts or stupendously clever services of various sorts. All they had done was what Pesto Bank did in our example: they lent massively more relative to their capital. They had increased their leverage and they were taking much greater risks (although they succeeded for a while in hiding how much extra risk they were taking, by 'gaming' or exploiting those rules set by regulators, the Basel Rules on capital adequacy).

### **Risk and remuneration**

For a good number of years, there were wonderful rewards for bank bosses from all this extra risk their organisations were taking. Here is how Andy Haldane of the Bank of England puts it:

In 1989, the CEOs of the seven largest banks in the United States earned on average \$2.8 million. That was almost 100 times the median US household income. By 2007, at the height of the boom, CEO compensation among the largest US banks had risen almost tenfold to \$26 million. That was over 500 times the median US household income. Those are high returns by any measure.

(Wincott Annual Memorial Lecture,  
Westminster, London, 24 October 2011)

As for Britain, let us look at the pay of two individuals who – in the 1990s and in the past decade – were probably regarded as the stars of their industry: the late Sir Brian Pitman of Lloyds and the once knighted and now de-knighted Fred Goodwin of Royal Bank of Scotland (for a period after RBS's takeover of NatWest in 2000, Goodwin was feted as the star manager of his industry, reputedly doing to RBS what Sir Terry Leahy had done to Tesco). In 1995, Sir Brian attracted a bit of media attention because his remuneration – that's salary plus a performance-related element – increased an unusually sharp 28% to £571,383. This was considered high compared to what the bosses of the UK's biggest banks had been receiving in the years from 1990, which tended to be in the range of £250,000 to £400,000 (in 1991, the boss of NatWest, Tom Frost, received between £250,000 and £295,000). Over ten years later, in 2006, Sir

Fred received just under £4m in pay. And in Sir Fred's case, that would have been a frustrating year for him: he could have earned considerably more if the bank had hit its target for growing earnings per share (profits divided by the number of shares in issue). Over at Barclays in the same year, the then Chief Executive, John Varley, earned £2.5m, whereas Bob Diamond – who succeeded Varley at the top of Barclays and at the time ran Barclays Capital, the investment banking arm of the group – made £10.7m. At both Barclays and Royal Bank, some hundreds of bankers below board level earned as much or more than either Sir Fred or Mr Varley (with the number of these highly paid bankers being greater at Barclays, because of the size of its investment bank).

The pay of the top bankers went up between ten- and twenty-fold from 1990 to 2006. By way of comparison, average gross pay for an employee in the UK went from £13,760 in 1990 to £24,134 in 2006 (equivalent to  $\frac{1}{166}$  of what Sir Fred took home); average gross pay did not even double. In the 2007–8 tax year, financial services were responsible for 45% of all bonuses paid in the country, a total of £19bn or around 1.4% of GDP, even though the sector only accounted for 3.7% of Britain's workforce. In fact, the official data understates City rewards at the top end, because the vast majority of people classified as working in financial services – those who sit behind tills or in call centres – are not paid large bonuses. The big money is distributed to a few thousand traders, analysts, managers and sales people at the investment banks, while the biggest money went to hedge fund and private-equity superstars. At the height of the credit boom, even a relatively junior employee of an investment bank could be earning hundreds of thousands of pounds. Of course,

bonuses have shrunk since the financial crisis, but the fall has been in a slow ratchet: in 2009 – the year of the global recession – they still stood at roughly the same level they had been in 2006. By 2011, according to research by the Centre for Economics and Business Research, the aggregate of bonuses paid in the City – the total bonus pool – was £4.4bn, compared with £11.6bn at the 2007 peak. Meaningful numbers of individual bankers still earn £10m each or more, and thousands earn six-figure sums.

Were the bankers worth the massive inflation in their rewards? Well, at the time, the increase in their profits seemed to justify their soaring remuneration. But we now know that these rises in profits were not only unsustainable but were being made in a highly dangerous way, as the banks lent more and more relative to their protective capital. And even though the profitability of almost all big banks has shrivelled since 2008, the rewards for those who run those banks remain very large. Last year, the package of the boss of Royal Bank of Scotland, Stephen Hester, was worth up to £7.1m, including long-term incentives – although following a public outcry in January 2012 he waived an entitlement to a bonus of just under £1m (and we will not know till 2014 how much he will actually receive from those longer-term incentives). And in 2012, Hester's total remuneration package, again including long-term incentives, had a maximum value of £8.2m. To be clear, Hester was not responsible for the disaster at RBS. He was brought in to fix it. But some have argued that his pay is outrageous given that Royal Bank of Scotland is more than 80% owned by taxpayers: RBS is in effect part of the public sector (and is viewed by the Office of National Statistics as formally part of the public sector), and rewards on that scale would be enough

to pay the wages bill of two or three large schools. Meanwhile at Barclays, the ‘realisable’ remuneration of the then Chief Executive, Bob Diamond – that is his pay, bonuses, contribution to his pension pot and shares that have become his from past incentive schemes – was £21m in 2011 (according to the consultants Manifest and MM&K; when Diamond quit Barclays, he gave up his entitlement to most of this). That package is somewhat greater than what was ever awarded to his predecessor, John Varley, even though the profits Barclays earns on its capital have fallen sharply in the past few years and its share price is a quarter of where it was five years ago. And at the so-called universal banks, such as Barclays, Royal Bank of Scotland and HSBC, some investment bankers – both traders and senior managers – still earn many millions of pounds each, more than their ultimate bosses, the banks’ chief executives. In early 2011, the Chairman of Royal Bank of Scotland, Sir Philip Hampton, conceded to me that a significant proportion of investment bankers are overpaid:

There is, if I can use the expression, a sort of gangmaster cultural phenomenon in this, that you recruit top people who really do make a difference, who really do move markets and get business and are really high achievers. But they do tend to associate themselves with people who aren’t such stars, but they want them around and they trust them, sometimes they move with them and there is a team associated with it. And the disparities [in pay] between the top stars in the team and some of the journeymen players, if you like, is probably not as marked as it should be.

*(Britain’s Banks: Too Big to Save?,  
BBC1, 18 January 2011)*



There is another point about the rewards for executives at Barclays and at other big banks. Whether or not they are state owned – and Barclays has not been semi-nationalised like RBS and Lloyds – when mega banks get into difficulties, they are always bailed out and rescued by taxpayers, because the dangers to the British economy of letting such banks collapse are simply too great. No prime minister or Chancellor of the Exchequer would ever allow Barclays to go bust in a chaotic way, because the economy would seize up (the process of moving money around would be thrown into confusion, the flow of credit to businesses would be disrupted, households' savings would be jeopardised, and so on). And because banks receive a degree of protection from taxpayers and the state that is not available to other businesses, there is a powerful argument that bankers such as Mr Diamond should not be rewarded on the same scale as those who run businesses that can go bust. Now if a way could ever be found that would allow Barclays and its ilk to go bust and not be rescued by the state – and the Treasury is implementing reforms that go some way in this direction – then perhaps there would be no legitimate public interest in how and how much Mr Diamond is paid. But if taxpayers are at risk of picking up the tab when bank bosses mismanage their institutions, there is a question as to why they are paid on the same scale as successful entrepreneurs, who receive no protection from the state and who put their livelihoods on the line for their businesses.

In 2008 when it all went wrong for banks and for the economies of Britain and America, bank bosses and traders lost some of their accumulated wealth, if it was held in bank shares. And their pay fell a bit, although not remotely in proportion to what happened to the value of their banks. Nor did they hand back the vast bonuses and rewards they had pocketed in

previous years, even though we now know those bonuses came from profits generated in a way that came close to bankrupting us all. As for the allegedly sophisticated institutions that lent to banks, they weren't forced to endure write-offs of their loans to banks. That said, the share prices of banks collapsed, heaping big losses on pension funds, hedge funds, individual investors and other shareholders. But these shareholders had their losses capped at whatever price they paid for the shares. So those mainly responsible for the banking crisis suffered limited pain – in stark contrast to the impact on the rest of us. In Britain, taxpayers, the state, came to the rescue with unprecedented financial support for banks, in the form of loans, investment and guarantees, worth £1.2 trillion at the peak or 83% of the value of annual economic output. We don't yet know how much of that £1.2 trillion will be permanently lost, but it will certainly run to tens of billions of pounds. And even this massive bailout was unable to prevent pretty much every British citizen paying a further price, during an economic contraction worse even than that of the 1930s, as pay for most employees stagnated, hundreds of thousands of people lost their jobs, and many more feared for their employment. There is also the cost for all of us in the income we are still losing and will lose for many years to come as the British economy performs well below its potential.

Today our economies in the West remain in the doldrums and banks are perceived to be providing too little support to our economic rehabilitation: having lent too much before the crash, they are now criticised for lending too little. Also the banks continue to benefit from precious state help, especially taxpayers' promises to all big banks that they will never be allowed to die. What has happened to bankers' remuneration, their pay? Well it has been reformed, so that bonuses are no

longer paid in single enormous lumps but are broken up into smaller amounts given in stages over several years – in the hope that if the deals that generated the bonuses go bad, some of the bonuses can be clawed back. Even so, bankers can still earn more in a year than most people earn in several lifetimes.