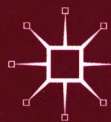


MACROPRUDENTIAL POLICY

TAMING THE WILD GYRATIONS OF CREDIT
FLOWS, DEBT STOCKS AND ASSET PRICES

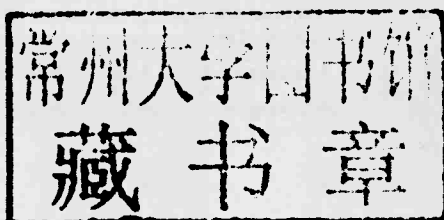
RICHARD BARWELL



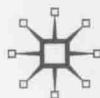
Macroprudential Policy

**Taming the wild gyrations of credit flows,
debt stocks and asset prices**

Richard Barwell



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Macroprudential Policy

For Katharine, Layla and David

Introduction

This book is about the policy regime that is being put in place in most jurisdictions in one form or another to prevent a recurrence of the crisis that has engulfed the global economy since 2007. Macroprudential policy is the missing piece in the policy jigsaw that, it is hoped, will prevent another build-up of a risk within the financial system and the wider economy that can wreak such devastation when the bubble finally bursts. Charles Prince (former Chairman of Citigroup) famously observed (cited in Nakamoto and Wighton, 2007) as the liquidity cycle was about to bite the hand that fed it:

When the music stops, in terms of liquidity, things will be complicated.
But as long as the music is still playing, you've got to get up and dance.
We're still dancing.

The role of the macroprudential policymaker is to act as party pooper next time around, to turn the music down when the party starts getting out of hand. The case for macroprudential policy may seem self-evident at the time of writing – there is a broad consensus that something must be done. But memories fade with time and at some point questions will be asked about what exactly policymakers are trying to achieve, and whether their interventions and intrusions are justified by an objective cost–benefit analysis.

The objective of this book is to explain what macroprudential policy is about. A good deal has been said in the years since the financial system collapsed about the virtues of macroprudential policy, but most of it has been fairly abstract. If you, the reader, come away from this book with a clearer understanding of why this new regime has been created, the goals that policymakers are trying to achieve, the instruments that they use, and the difficulties they will face in wielding them, then the book will have achieved its objective.

The subject of macroprudential policy is relatively new. Pre-crisis, the term was on the very fringes of the policy debate. With the exception of a small number of academics and central bank researchers (a great many

of whom worked in one institution, the Bank for International Settlements (BIS)) who worried about financial instability in the boom years, very few had even heard of the term; since the bust, macroprudential has become a buzz-word (Galati and Moessner, 2011). However, more than enough has been written already to fill this book many times over, and many of the subjects covered here in passing are worthy of books in their own right. We will deliberately skim over the surface of issues, seeking to provide context and relevance to the bigger picture. References to more comprehensive discussion of a particular issue will be provided as we go along for the reader who wants to delve more deeply into a particular subject.

This book is arranged in two halves. The first half, which accounts for the lion's share of the book, is devoted to practicalities: the justification for the new regime, the institutions of macroprudential policy, the instruments at policymakers' disposal and how policy will be implemented in practice. This book is primarily focused on events in the United Kingdom, reflecting the interest, experience and expertise of the author, but we will touch on the wider global debate and reform agenda as we move on.

At the time of writing, the policy framework is starting to slowly take shape: we know who is nominally responsible for the execution of policy and we have a clear idea about the tools which will be used. Unfortunately, the all-important goal of policy remains abstract. Primary responsibility for the conduct of macroprudential policy in the United Kingdom will fall to the Financial Policy Committee (FPC), a group of central bankers and outside experts, based at the Bank of England (BoE). The FPC will have access to three instruments (at least to begin with), all of which operate through the capital structure of banks. However, the remits of the new microprudential bodies – the Prudential Regulation Authority (PRA) and the Financial Conduct Authority (FCA) – gives them a stake in the macroprudential debate at least in theory; it remains to be seen whether they will have the appetite to use the instruments at their disposal to pursue macroprudential goals in practice. There has been a major rewrite of the objectives of macroprudential policy, which at the time of the writing has settled on the modest goal of safeguarding the resilience of the financial system. Bold plans to smooth the credit cycle appear to have been jettisoned, but the thorny issue of managing the contradiction between supporting the flow of core financial services to households and companies and making the system more resilient has yet to be fully resolved. And the goal of 'safeguarding resilience' remains frustratingly vague and opaque – it is unclear what specific events the FPC is trying to avoid, and what is the socially optimal tolerance to the probability of their occurrence – and it is difficult to see how the regime will function without greater clarity about what policymakers are expected to achieve.

For the sake of the reader who wants to gain an understanding of these issues without getting bogged down in technical details, the economic issues that underpin the macroprudential agenda have been held back to the second part of the book. That is not to downplay their importance – it simply does not make sense to put in place a new policy regime without first having a clear understanding of the market failures that justify it.

As the title of this book suggests, the interplay between credit flows, debt stocks and asset prices lies at the heart of the analysis of financial instability, and yet conventional macroeconomics has relatively little to say about these dynamics. In truth, very little is known about how the financial system behaves in practice, unless we are willing to make strong assumptions about behaviour and the structure of markets. Unfortunately, those assumptions effectively rule out a lot of the behaviours we are interested in. In the second part of this book we explore the limitations of these assumptions and then turn to review what economics has to say about some of these real-world features that may give rise to instability at the macro level – or, in the jargon, the market failures that justify action. Each chapter provides little more than a literature review, and in many cases a set of reviews, with the intention of drawing out key insights from the frontier and providing a point of entry for the interested reader.

There is no Grand Unified Theory that can synthesize these insights into a framework fit for policy analysis – nor is one likely to arrive in the near future. That makes the business of setting policy much more complicated than, say, in the monetary policy sphere where there is a well-developed body of theory. Macroprudential policymakers will not only have to execute their responsibilities with only a limited understanding of how the network that they are trying to control behaves. This is on top of the fact that policy-makers will have an opaque and abstract objective to work with. But this is not an excuse for inaction: the costs of systemic financial crisis have been laid bare for all to see. As Claudio Borio of the BIS wryly observed, ‘we are all macroprudentialists now’.

Key Recommendations

In the process of writing this book I have tried to come up with a short list of key recommendations for actions that I think need to be taken to maximize the chance that the new macroprudential regime is a success.

1) The target needs to be made much more concrete – what is the macroprudential equivalent of 2 per cent CPI inflation?

As things stand, the target of macroprudential policy is too vague. The Financial Policy Committee (FPC) will be tasked with protecting and enhancing the resilience of the UK financial system, and subject to achieving that primary objective the FPC should seek to support the government's wider objectives. But in order to set policy the members of the FPC will need to know what target level of financial sector resilience they should be aiming for – what is the optimal frequency or severity of crises? If, as most people believe, there is a trade-off between the resilience of the financial system and the terms on which it provides core services, the FPC will require some guidance on the socially optimal location on that trade-off. Some may bridle at the supposedly spurious precision but policy will have no anchor without a clear reference point of a formal target for some clearly defined variable. Individual members of the FPC could profoundly disagree over the stance of policy because they interpret the objective in different ways – one seeks to reduce the probability of a systemic crisis to a once in century event, the other to a once in a millennium event – and that could lead to chaos. The phrase 'UK financial system' is also ambiguous – is it code for the major banks and building societies or, far more likely, does it encompass a much wider range of institutions and markets, and if so how? Reference to protecting and enhancing the resilience of the provision of core financial services such as credit, let alone the efficient provision, is notable by its absence in the objective of the FPC, although it is indirectly implied by the goal of enhancing the resilience of the system that provides those services. Some thought needs to be given to whether that is desirable given

that much of the public debate about macroprudential policy presupposes that the FPC is there to stabilize mortgage credit and property prices.

2) The macroprudential loss function needs to be fleshed out

The loss function describes how policymakers evaluate different outcomes and therefore informs the optimal policy response in a given situation. It describes how changes in variables of interest are perceived to affect welfare. There is a broad consensus over what should feature in the loss function for monetary policy – deviations of output from its natural level and inflation from its target – because it is believed that there is no long-run trade-off between output and inflation. With macroprudential policy life is more complicated: equity as well as efficiency considerations could come into play – that is, policymakers may care about the distribution of national income as well as the level. More concretely, the financial system provides a range of core services to households and companies and policymakers will need to put a value on variation in the terms on which each of these services are provided, and perhaps on the variation in provision across different members of the household and corporate population. To give a specific example, would the FPC be concerned by a sharp contraction in the provision of unsecured credit to low income households?

3) Scaling the learning curve – the case for a UK OFR

When the Bank of England was granted operational independence for the conduct of monetary policy a good deal was known about the theory and practice of monetary policy. The contrast with macroprudential policy is stark: very little is known about how the financial system behaves in practice, how to measure let alone monitor systemic risk in real-time or how macroprudential interventions will influence system dynamics. The authorities need to correct that situation as soon as possible if a series of potentially painful policy mistakes are to be avoided which could in theory damage the credibility of the policy regime. An Office of Financial Research (OFR) has been established in the United States to support the macroprudential agenda by improving the information set on which policy decisions will be made and more importantly by conducting and sponsoring research on financial stability. Resources are obviously tight within government but there is surely a case for reallocating resources towards improving the state of knowledge in this area. The creation of a UK OFR, which could gather together experts from a number of fields and backgrounds, seems an efficient way to organize this process.

4) Preliminary view required: passive or active?

Unfortunately, policymakers do not have the luxury of being able to wait until any investment in research into the causes and correction of financial instability pays dividends. Decisions will have to be made in the meantime, and that will force policymakers to come to a preliminary view on two key questions: whether they will be able to adequately identify risk in real time, and whether interventions to raise resilience will have a material detrimental impact on the real economy (the slope of the long-run resilience output trade-off). If the answer to both questions is ‘no’, then the policymaker might reasonably conclude that the safest course of action is to raise steady state capital buffers substantially to make the system more resilient, and then leave well alone. If the answer to both questions is ‘yes’, then the policymaker might reasonably run with much lower levels of regulatory capital but respond aggressively to evidence of rising risks. If the answer to the first question is ‘no’ but the second is ‘yes’ then the policymaker faces a dilemma. Either way, the policymaker needs to come to a preliminary view about the answer to these questions, because that will then guide the big picture strategy in the earlier years of the regime.

5) Managing macroprudential overlap and contradictions

As things stand there are numerous policymaking bodies which will have a stake in UK macroprudential policy. The lead actor on the stage is supposed to be the FPC housed at the Bank of England, but the new microprudential regulator (the PRA) has the remit and the tools to encroach into the macroprudential domain, as does the new conduct regulator (the FCA) to a lesser extent. The Governor of the Bank has suggested that the Monetary Policy Committee (MPC) might decide to use monetary policy to lean against financial imbalances in a future boom and the senior executive of the Bank of England retains control over the Bank’s balance sheet which can be used to achieve macroprudential ends. Although overlap is better than underlap it would make sense for all policymakers to have a clear idea about who is responsible for what. That rationalization of responsibilities should definitely involve a reassessment of the ownership of different policy levers, and perhaps the adoption of some new tools. In particular, that process could – and I believe should – lead to a reallocation of responsibilities towards the FPC. For example, it is not clear why the FPC should not be calling the shots when it comes to putting the Bank of England’s balance sheet to work in pursuit of financial stability goals. There will also be inevitable tensions between the pursuit of the separate policy agendas, between micro and macroprudential regulation, between monetary policy and macroprudential regulation, even between regulation and fiscal policy.

These tensions are not insurmountable but they need to be thought through to ensure the efficient execution of these distinct policy briefs.

6) Communication is key

As with monetary policy, much, if not most, of the impact of macroprudential policy decisions will depend on how the private sector interprets those announcements – what they imply about the future stance of policy and the likely evolution of the financial system. But unlike monetary policy, very little is known about what macroprudential policy is outside a narrow circle of policymakers and academics, and still less is known about the precise objectives of policymakers and how they will go about achieving them. As a result it will be incumbent on macroprudential policymakers to undertake an extensive communication exercise, educating markets about the objectives and implementation of the regime. And communication is a double-edged sword: policymakers will need to be vigilant that market participants do not act on the basis that effective micro- and macroprudential regulation has consigned financial instability to the dustbin of history – a belief which might lead to imprudent behaviour, sowing the seeds of a future crisis. Clearly there is a limit to how much information can be communicated when so much is still in flux – including the precise objective, the nature of the loss function, the division of labour between policymakers and our understanding of the system – and when there are risks that market participants may misunderstand the message. But enough is known to begin the communication process in earnest.

Acknowledgements

This book would not have been possible without the advice and support of many people. As always, all errors and omissions are my responsibility, and mine alone; but I cannot claim sole credit for the ideas expressed here. I have had numerous discussions with colleagues and friends over a number of years that have shaped my views on this subject.

I must begin with Riccardo Rebonato, without whom this book would never have seen the light of day. Quite apart from his words of wisdom and encouragement, Riccardo suggested the idea of writing this book in the first place and kindly put me in touch with the publisher. Likewise, special thanks are due to my former boss, Jacques Cailloux, for giving me the green light to proceed. But none of this would have been possible without Jacques and David Simmonds indulging my interest in macroprudential policy and allowing me to publish research on this subject when I joined RBS. Macroprudential policy is not an obvious topic for an investment bank economist to write about, certainly not back in 2010 when I started working on it, and I am eternally grateful for their unwavering support.

During my time at RBS I have benefited from discussions on this subject with a number of past and present employees of the firm: Gareth Anderson, Jeremy Broughton, Jacques Cailloux, Xinying Chen, Moorad Choudhry, Prateek Datta, Jan Dubsky, Kevin Gaynor, Jeroen Krens, Nick Matthews, Peter Nielsen, Silvio Peruzzo, Riccardo Rebonato and David Simmonds.

My interest in macroprudential policy began during my time at the Bank of England (which I will frequently refer to as 'the Bank' during the course of this book), when I left the familiar surroundings of the Monetary Analysis (MA) directorate to work in Andy Haldane's Systemic Risk Assessment Division in the turbulent times of spring 2008. Over the following two years I had the opportunity to experience first-hand, and I hope to contribute to in some small way, the birth of the Old Lady's formal interest in macroprudential policy, although the Financial Stability (FS) wing of the Bank had long been engaged in the task of monitoring and modelling systemic risk.

During my time at the Bank I benefited from discussions around issues relating to macroprudential policy with a number of people, including: Piergiorgio Alessandri, Marnoch Aston, Sarah Breeden, Simon Brennan, Rohan Churm, Paul Collazos, Geoff Coppins, Paul Doran, Iain de Weymarn, Bruno Eklund, Sir John Gieve, Mick Grady, David Gregory, Andy Haldane, Simon Hall, Lee Hemphill, Florence Hubert, Nigel Jenkinson, Sujit Kapadia, Sandhya Kavar, Iryna Kaminska, Vasileios Madouros, Lavan Mahadeva, Roland Meeks, Colin Miles, Gareth Murphy, Ben Nelson, Mette Nielsen, Adrian Penalver, Silvia Pezzini, Vicky Saporta, Jochen Schanz, Rachel Shaw, Alan Sheppard, Gabriel Sterne, James Talbot, Nick Vause, Mark Walsh and Lewis Webber. More generally, I owe a huge debt to the Old Lady: most of what I know about macroeconomics I learned whilst I was at the Bank, working with an enthusiastic and talented team of economists. I hope the analysis in this book does them justice.

A few members of Bank staff deserve a special mention: Oliver Burrows, Andrew Mason and above all Niki Anderson with whom I have discussed these issues at length; and David Aikman and Jack McKeown who made the same transition as I did from MA to FS within the Bank and at roughly the same time, and with whom I have enjoyed many enjoyable discussions about economic policy in both arenas.

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Part I

**The Practice of
Macroprudential Policy**