The smile of the Cheshire cat: central bank independence after the crisis

Deborah Mabbett (Birkbeck) and Waltraud Schelkle (LSE)

Abstract
Before the financial crisis, central bank independence (CBI) was equated with monetary dominance, meaning that central banks could control monetary conditions to achieve their macroeconomic goals. The primary threat was seen as fiscal dominance, whereby the central bank is forced to monetise government debt. The crisis has highlighted that financial dominance can arise, whereby the central bank is forced to monetise private debt to stabilise the financial system. We argue that the monetary dominance view is untenable even in normal times, and propose instead that the central bank has to be seen as part of a system of macrostabilization. Independence arises from jurisdictional autonomy, which gives well-defined powers over specified instruments. A challenge to CBI raised by the financial crisis is that the boundaries of jurisdiction established in normal times need to be crossed to resolve systemic problems. Comparing the Fed, the Bank of England and the ECB, we find different combinations of support, loneliness, and vulnerability to fiscal or financial dominance. The monetary dominance account means that CBI becomes a smile without a cat in a financial crisis; our account shows that cats with bodies as well as smiles need cooperation within a system of governance to avoid recurrent crises and resolve them when they occur.

1 Introduction: Interpreting central bank independence after the crisis

The financial crisis has cast new light on central banking. Once the stable and conservative pillar of a policy consensus on the anti-inflationary route to macroeconomic stability, central banks have engaged in radical measures since the crisis. In response to the freezing of wholesale financial markets, central banks slashed interest rates to zero and expanded the money supply by lending to banks long-term and purchasing assets on an unprecedented scale. After the first financial phase of the crisis, bond market panic spread in Europe, threatening to bring down sovereign debtors and banks holding their bonds. Scholars argued that this diabolic loop of financial and fiscal fragility could be avoided only if the European Central Bank (ECB) came to the rescue and bought government bonds (De Grauwe 2011). Outside the euro area, other central banks had done this. But this also provoked criticisms that they were monetising debt to bail out governments (Meltzer 2014, Issing 2011). This was exactly what central bank independence (CBI) was meant to prevent.

* Deborah Mabbett, Dept of Politics, Birkbeck, University of London, d.mabbett@bbk.ac.uk; Waltraud Schelkle, European Institute, London School of Economics and Political Science, w.schelkle@lse.ac.uk
The reasons for unease about central bank purchases of government bonds can be traced back to the monetarist analysis of fiscal versus monetary dominance in macroeconomic policy by Sargent and Wallace (1981). In their influential analysis, central banks are independent if they can operate monetary policy to achieve their inflation target, irrespective of what this means for the cost of government debt (and, in a world with ‘imperfect’ labour markets, for the unemployment required to discipline wage setters). This situation of monetary dominance contrasts with fiscal dominance, whereby the central bank is forced to monetise government debt.

The financial crisis has shown that the private financial sector can push the central bank into the same corner as could the government, with systemically important banks forcing the central bank to monetise debt. This is no surprise to political economists and financial historians (eg Kindleberger 1996, Eichengreen and Bordo 2002). Not only do both banks and governments repeatedly accumulate unsustainable levels of debt, but also default is an option of limited viability for ‘too big (or too many) to fail’ banks as well as governments. Historically, bank failures have been prevented by central banks acting as the lender of last resort (Grossmann and Rockoff 2015). By giving banks time to recover, the provision of liquidity averts the risk of mass insolvency. Modern central banks were forged in crises, protecting financial institutions and sovereign actors from the cumulative consequences of their actions (Broz 1998).

The term ‘financial dominance’ has now entered the lexicon of economists, as a second threat to monetary dominance alongside fiscal dominance. Financial dominance refers to situations where fiscal and monetary authorities’ choice of policies is constrained by the requirement to stabilise the financial system. In the first instance, this means that the use of lender of last resort facilities is overextended, as we outline below. More generally, it means that interest rates are kept lower than macroeconomic stability warrants.

The interdependence of government bond markets with banking systems can render the threats of fiscal and financial dominance difficult to distinguish empirically. Yet they have completely different implications for CBI. If fiscal dominance is the threat, then constraints on government (fiscal rules) will preserve CBI. If financial dominance is the threat, the central bank needs not a constrained but a supportive government. It may need taxpayer-funded indemnities to cover the risks it takes in buying bonds, and fiscal resources and political backing to allow it to force banks into resolution instead of sustaining them with cheap funds. It also needs regulatory policies to restrain the risks accumulating in the financial sector, including ‘macroprudential’ tools. Ideally, from a central bank’s point of view, this is done by the government giving it extended regulatory powers.

In this paper, we argue that to equate CBI with monetary dominance is to interpret the policy powers of central banks with the categories of a bygone era. It is questionable whether monetary dominance was ever an adequate characterisation, even for pre-crisis monetary policy. Central banks always relied on other actors – fiscal authorities, banks, wage setters – to ensure that price stabilising policies could be implemented. We advance a different account of CBI that centres on the idea of jurisdictional autonomy, meaning
that the central bank has well-defined powers over specified instruments. This definition encompasses as a special case Meltzer’s (2014) definition, that an independent central bank follows rules. In this case, the assignment of powers matters because it means that powers are always exercised in specified ways. We argue that independence is consistent with the exercise of policy discretion by the central bank, so long as the bank’s decisions do not exactly emulate those that would be made if its powers were vested elsewhere in the government. If that was the case, the formal institutional status of the central bank would not matter and independence would have no ‘bite’.

A key challenge to CBI raised by the financial crisis is that the boundaries of jurisdiction established in normal times need to be crossed to resolve systemic problems. When the solvency of financial institutions is at issue, central banks need other arms of government to intervene and recapitalise or resolve failed banks. When the borderline between illiquidity and insolvency is not clear (as is often the case), other agencies may have incentives to force the central bank to enlarge its role. Conversely, the central bank may need executive and legislative support to increase its capacity to conduct effective policy responses. Meltzer (2014: 5) argues that ‘in a major crisis, independence vanishes’, and it is true that different parts of the system of economic governance may suspend their concern with protecting their jurisdictional boundaries in the interests of cooperation. However, the question of re-establishing and redefining these boundaries rather quickly reappeared as the first wave of the crisis passed.

In this paper, we trace how the boundaries of jurisdiction of three major central banks have evolved since the financial crisis. The three differ markedly in their relationship to political executives and legislatures. The Bank of England (BoE) faces a powerful executive and minimally disruptive legislature, and has only a short recent history of legal independence, obtained under the Labour government in 1997. Established assessments rate it as not highly independent (Cukierman 1992: Tables 19.3 and 19.4; Dincer and Eichengreen 2013: Table 8). The Federal Reserve Bank of the U.S. (the Fed) has historically been able to defy the President with Congressional support, or to cooperate with the President while having to answer for its actions in an often-hostile Congress. Thus, in the space between executive and legislature, it finds a degree of independence from both, but it scores as only moderately independent on standard accounts. The European Central Bank (ECB) is the most distant from government(s). Its legal prohibition on financing governments means that it receives high ratings in standard indicators of CBI generally and regarding the monetisation of government debt specifically.

In the next section, we describe the standard indicators more fully and show that they assume the special case of jurisdictional autonomy sustained by monetary dominance. One consequence is that they do not detect changes in CBI since the crisis (Dincer and Eichengreen 2013). Without monetary dominance, the standard indicators are like the smile of a Cheshire cat, with no body behind it.¹ In our view, there is still substance to the idea of CBI, but jurisdictional autonomy is a more relevant construction given that monetary dominance cannot be sustained. We look for stability and predictability in the

¹ See the end of ch.VI (‘Pig and Pepper’) in Lewis Carroll’s Alice in Wonderland.
allocation of tasks between fiscal and monetary authorities, and for the capacity of the system of government to create new regulatory powers and clearly assign them to appropriate agencies. The analysis of independence as jurisdictional autonomy permits that the shape of CBI can change in response to changing conditions, while at the same time envisaging that policy-makers are constrained by jurisdictional boundaries (Lohmann 2003: 96).

In sections 3, 4 and 5 we examine how central bank jurisdiction has evolved in three areas. Section 3 discusses how policies to stabilise the financial sector were implemented in the first phase of the crisis. The key question is whether central banks were forced to support the financial sector through general monetary operations, or whether they were able to obtain the support from other parts of government needed to require recapitalisation or closure of weak institutions. Section 4 looks for signs of fiscal dominance in central banks’ bond-buying programmes. We show that, when governments support central banks in addressing solvency problems in the financial sector, there is a flip side: government support in recapitalising banks may raise pressure on the central bank to buy government bonds. Section 5 turns to consider the allocation of macroprudential regulatory powers. Here we see that a fragmented system of government may help central banks to preserve their existing jurisdiction, but it may obstruct the enlargement of that jurisdiction through the creation of new powers. The conclusion summarises by proposing alternatives to the standard indicators that take account of the threat to CBI posed by financial markets as well as by governments.

2 Independence within a system of macrostabilization

Under its famous title of ‘some unpleasant monetarist arithmetic’, Sargent and Wallace (1981) raised doubts that even a monetarist central bank could control inflation. It can do so only if the government agrees to a coordination scheme of_monetary dominance_, in which the central bank ‘independently sets monetary policy by, for example, announcing growth rates for base money for the current period and all future periods.’ (Sargent and Wallace 1981: 1) This is in contrast to _fiscal dominance_ under which sets the terms for the size of its budget and to what extent it will be financed by bond issues and seignorage (Sargent and Wallace 1981: 2). But there is an asymmetry: the government can always force the central bank into inflationary finance while the central bank cannot stop the government issuing more bonds than stable inflation warrants. This asymmetry originates in the constraint of financial stability. If the financial markets will not take up government bonds, the central bank has Hobson’s choice: it can monetize the excess bonds or it can let the government default on the bonds that the financial system holds. Sargent and Wallace do not consider the latter option; since this would undermine the central bank’s own ability to maintain monetary stability.

Thus monetary dominance enjoyed by independent central banks requires an appropriate fiscal policy. Governments allowed and even promoted the idea that the monetary authority was dominant in a setting where inflationary finance had become unnecessary and potentially self-defeating. The internationalisation of financial markets greatly increased the capacity of the markets to absorb government bonds. In developed countries, inflationary finance was no longer needed. It might be assumed that a
prohibition on central bank purchases of government bonds would increase the government’s cost of finance, but instead governments found that, because they gained credibility by adopting this prohibition, they actually reduced their cost of finance.

Monetary dominance also required supportive labour market institutions. The fashion for promoting the independence of inflation targeting central banks arose out of an era of stagflation, when governments lost faith in the capacity of Keynesian demand management policies to reduce unemployment. But the embrace of inflation targeting was always conditional on unemployment outcomes that were not so disastrous as to make monetary policy politically salient and cause politicians to challenge the central bank’s strategy. The wage bargaining system determines how costly CBI is for fiscal authorities, politically because they inherently care about unemployment and fiscally because unemployment reduces tax revenues. Central bankers themselves recognised this, and often became advocates of supply-side labour market policies. Less often recognised was that coordinating arrangements in the labour market could promote the effectiveness of inflation targeting. Hall and Franzese (1998: 507-508) stressed that it cannot be simply assumed that rational expectations make everybody hear monetary signals clearly and uniformly: they showed that centralised wage bargaining could be a vital transmission mechanism (see also Iversen 1999).

Financial markets played only a facilitative role in the inflation targeting model, constituting a receptive and unproblematic transmission mechanism for monetary policy. Central banks target inflation by adjusting a short term policy interest rate; the resulting changes in all interest rates affect borrowing and lending decisions in the real economy and thus stimulate or restrain aggregate demand. Financial markets transmit the policy rate into the term structure of interest rates or yield curve. Since long-term interest rates should be arbitraged into equality with the sequence of short-term interest rates, the yield curve will incorporate the expected policy stance of the CB. Indeed Krippner (2007) has described how, in the heyday of this type of monetary policy, the Fed had only to announce its policy intentions for the yield curve to shift, without waiting for the change in the policy rate. This was the basis for the claim that all central banks need is credibility for their price stability targets, best served by the absence of government interference.

With compliant fiscal authorities, ‘flexible’ labour markets, and responsive financial markets, the supporting legs of monetary dominance were in place. As it turned out, the weakest leg was the financial sector. The stable policy environment of the ‘Great Moderation’ proved to be conducive to rampant financial innovation and leveraging, which fed housing and stock market bubbles. Central banks were aware of these stresses but reluctant to use interest rate policy against them (Borio and Lowe 2002: 18-19; Hannoun 2012: 9). They interpreted their inflation target as the ‘flow’ rate of inflation: increases in the prices of consumable goods and services. Inflation in asset prices was not a target.

However, high leverage created a tacit bias in monetary policy towards supporting the financial sector with low interest rates. Central banks have always had to take note of the possibility that unexpected changes in interest rates will put some financial institutions in
difficulty. For example, the ‘Volcker shock’ in 1979 contributed to the Savings and Loan crisis in the US, as many of those lenders were left exposed when interest rates rose. Volcker was bold enough to go ahead in any case, but Hannoun (2012: 9-11) argues that by the 2000s a clear bias towards low interest rates was evident in advanced economies. For all the talk of financial innovation and sophistication, the asset price boom of the 2000s was basically built on leverage, and the robustness of the financial system declined. When the Fed moved to increase rates slightly in 2006, the bubble burst, transmitting stress through the international financial system, from subprime mortgage markets in the US to global interbank money markets and into bond markets in Europe. Overexposed households found themselves unable to service their debt, and highly leveraged banks became insolvent as assets were downvalued, wiping out their small capital bases.

Commentators have summarised the imperative for the central bank to protect the financial system with the term ‘financial dominance’. Hannoun (2012: 9-11) sees financial dominance when central banks give asymmetric assurances to buy assets when their prices fall (excessively, in a bust) but not to sell assets when prices rise (excessively, in a boom). This asymmetry was sufficiently evident in the US in the early 2000s to earn a label: the ‘Greenspan put’ described the one-way bet offered to the financial sector by the Fed. Hannoun, Deputy General Manager at the BIS, thus sees central banks’ choices in the run-up to a crisis as the root cause of financial dominance; a kind of opportunism by monetary authorities left to their own devices. A different, but complementary, analysis is offered by Brunnermeier (2013), who characterizes financial dominance as arising in a crisis situation in which banks are unable or unwilling to absorb losses. They are unable to absorb losses if market panic erodes their capital base. They can be deemed unwilling when they engage in opportunistic strategies to make themselves vulnerable, for instance by paying out to employees or shareholders instead of building capital buffers. Either way, central banks are then forced to bail out the entire financial system, regardless of how valuable and deserving its elements are.

Financial dominance can be seen as the outcome of the pre-crisis policy consensus that central banks should keep the macroeconomy on its growth trajectory with as little involvement as possible from fiscal authorities (Schelkle and Hassel 2013). While Hannoun implies that the courage to raise interest rates is what is needed to escape financial dominance, the current consensus is that central banks need other policy instruments than the interest rate to prevent asset price bubbles developing. Such instruments include ample funds to manage bank failures (freeing the central bank from having to support banks at any price), and regulatory powers to restrain banks from becoming excessively leveraged and holding the central bank hostage in the way that Brunnermeier and Sannikov describe.

Implications for characterising and measuring central bank independence
Established measures of CBI focus only on the threat of fiscal dominance. The pioneering work of Cukierman (1992) sought to ascertain (the absence of) fiscal dominance by assembling indicators about the central bank’s obligations to finance the government.

---

2 And able to withstand the political fallout – see Tsebelis (1995) and Goodhart (2014) for accounts.
These included, for example, specific limits on lending, decisions about the terms of loans to the government, and the access of local or state as well as central governments to central bank lending. In the absence of legal limits on lending to the government, both the Fed and the Bank of England have low scores on summary measures of independence (ranging from 0.17-0.23 for the BoE and 0.12-0.18 for the Fed, out of a possible 1), while the ECB appears highly independent (0.81-0.85) (Dincer and Eichengreen 2013 Table 8 (figures for 2010)).

Cukierman recognised the limitations of legal rules and looked for other indicators of *de facto* independence. His indicators of the central bank’s role in policy formation included not only its monetary policy powers, but also its influence over the formulation of the government’s budget (Cukierman 1992: Table 19.1). This indicator recognises the close relationship between monetary and fiscal policy, but it also blurs the meaning of independence, substituting a conception of independence as influence for independence as autonomy. Maxfield’s (1994) critique highlighted this: she pointed out that ‘a central bank may be formally independent but nevertheless unable to carry out effective anti-inflationary policies because it is not influential in the formulation and implementation of policy by other government agencies.’ (Maxfield 1994: 558) Maxfield goes further than we do in discarding the idea of independence in favour of indicators of central bank authority within the system of government. We suggest instead that the central bank can be independent in the sense of having clear jurisdiction, while also relying on support from other institutions of government.

Another set of indicators in Cukierman’s analysis equate independence with the weight given to price stability in the objectives of the central bank. This may be indicated by an explicit inflation target. This approach to independence assumes monetary dominance: the central bank can choose its desired inflation rate without worrying about financial stability. All that are needed are the right incentives, such as an appropriate performance contract for the governor (Walsh 1995). Clearly, this approach to measuring independence cannot survive the conditions that central banks face in the aftermath of the financial crisis.

Finally, one of the most ‘successful’ indicators of CBI, in terms of predicting inflation performance, is the tenure of the central bank governor. The indicator is problematic because an acquiescent governor may hold office for a long time. However, Cukierman (1992: 385) argues that, above a threshold, high turnover does indicate that the governor is unable to implement long-term policies and prevent opportunistic monetary policies. This emphasis on the authority of the governor is consistent with Rogoff’s (1985) much-cited argument that a conservative central bank governor would provide the credibility needed for monetary stability. However, as with inflation targeting, these indicators can only be given Rogoff’s interpretation if there is monetary dominance.

Dincer and Eichengreen supplement the long-established measures of independence with an index of transparency, which slightly outperforms independence as a predictor of inflation. There are several different – and not entirely consistent – explanations of why transparency matters. One, put forward by Crowe and Meade (2007) is that transparency
is an indicator of de facto independence. Central banks acting autonomously will not be troubled by requirements to account for their decisions, whereas a central bank that is covertly influenced is likely to hide this behind a reluctance to report on its policy objectives, economic forecasts, decision-making processes and policy actions.

Dincer and Eichengreen (2013: 2) embrace a rather different analysis, whereby transparency is ‘a key element of accountability in an era of central bank independence’. The discussion below suggests that this claim is too broad to be meaningful. In place of transparency we have to think about how scrutiny of the central bank is framed: what information is selected and highlighted, while the ‘public’ comprise a range of audiences in different venues. A striking feature of our comparison of three central banks is how different the frames and venues are. The ECB’s bond purchasing programmes have been challenged in court, whereas parliamentary and congressional scrutiny is more important for the BoE and the Fed. While parliamentary committees have enquired into the BoE’s purchases of government bonds, Congress has been more concerned about the effect of private sector interventions on Fed profits. We regard this variety as supporting our approach to independence as jurisdictional autonomy, where different jurisdictional boundaries are salient at different times to different audiences.

There are no indicators in established accounts of the central bank’s capacity to draw on fiscal support to combat financial dominance. Indeed, there is a converse tendency to see a powerful financial sector as a positive factor in central bank independence. Cukierman saw broad and well-developed financial markets as contributing to central bank independence because he assumed that the main regulatory powers would be held by the central bank. Thus, ‘[t]he larger the financial sector, the wider is the span of authority of the CB and the areas in which it is the main or even sole representative of the public sector.’ (1992: 394) We agree with Cukierman that the vesting of regulatory powers in the central bank is important; however, we do not share his assumption that the central bank has, and monopolises, such powers. That is an empirical question which we take up below.

The body of research inspired by Cukierman’s work goes far beyond the formal legal analysis of CBI, yet the indicators that were developed proved incapable of detecting the changes that have occurred since the financial crisis. We should not expect high profile losses or reversals of independence, as the high profile is exactly what makes such reversals unlikely to happen (Lohmann 2003: 101). We suggest that the most likely threats to independence come from low-profile erosion of the powers and capacities of the central bank. With hindsight, it seems that stripping central banks of most supervisory powers, as it was the trend before the crisis, eroded their capacities, even though this was in line with the expert consensus and was thought to improve central banks’ ability to focus on price stability (Goodhart and Schoenmaker 1995: 545-6). Erosion may also arise, as we see in the following sections, when the central bank is pressured to act as lender of last resort beyond the bounds of providing liquidity.

It is also important to note that independence can be undermined by ‘drift’: by nondecisions on the part of government. The lack of international coordination on
fighting regulatory venue shopping, or instruments targeting specific sectors such as derivatives trading and mortgages, can be seen as examples of drift. Central banks have little agenda-setting power; they have to resolve situations that arise within their area of jurisdiction. Legislatures and political executives do have agenda-setting powers: they can fail to address emerging economic issues. Thus CBI may be jeopardized by executive and legislative inactivity and conservatism. One implication is that, while fiscal profligacy is a threat to CBI, so also is excessive government protection of its budgetary, regulatory and political resources, which can leave the central bank single-handedly having to resolve pressing economic problems.

3 Central bank-government interactions: dealing with illiquid or insolvent banks

The financial crisis started with a liquidity crunch, as uncertainty about the soundness of counterparts led to a freeze in interbank lending. Central banks intervened to provide liquidity, in accordance with their function as lenders of last resort (LOLR). Concerns about the extent and appropriateness of such interventions that have been aired ever since modern central banks were created. The willingness of the central bank to extend liquidity in an emergency may engender moral hazard, in the form of excessive leverage, on the part of banks. Furthermore, concern to prevent a contagious loss of confidence may lead central banks to lend to institutions that are not merely illiquid, but actually insolvent. Bagehot’s edict that central banks should ‘discount freely’ in a crisis, but at a high interest rate and against good collateral, addressed these concerns. The high interest rate penalised over-extension by banks, while the insistence on good collateral ensured that they were solvent.

As in previous financial crises (Grossmann and Rockoff 2015), only the first part of Bagehot’s edict was honoured when central banks opened their discount windows wide in 2007-8. There were no penalty interest rates on borrowing from the central bank, out of concern to ensure that the liquidity crunch did not lead to a macroeconomic contraction, and the quality of collateral accepted declined markedly. In this section, we examine whether these actions were evidence that central banks were forced to overextend LOLR operations because of failures of other parts of government to recapitalise or resolve distressed banks. This would constitute a loss of independence due to drift, with central banks forced to extend their jurisdiction by undertaking quasi-fiscal support operations.

To anticipate, we find some signs of extended jurisdiction on the part of both the Fed and the ECB, and we show that this can be traced to drift, with governments failing to act. However, we have to acknowledge that the boundaries of jurisdiction are never clearly defined. Not only are the lines between illiquidity and insolvency hard to draw in a financial crisis where there are sharp falls in asset prices, but also the height of a crisis is a bad time to liquidate a bank, creating a strong incentive to keep banks trading until markets stabilise (Goodhart 1987: 87). As Grossman and Rockoff (2015) document, there are numerous examples throughout history when central banks have organised a support operation for a distressed bank that has later been followed by closure of the bank after the markets have settled.
Aside from (non)compliance with Bagehot’s rules, another indicator that a central bank is having to extend its activity into quasi-fiscal territory is when it arranges special facilities for a single bank, instead of providing general liquidity support to all institutions. Again, this indicator is ambiguous. Capie (quoted in Grossman and Rockoff 2015: 30) uses the image of ‘a discount window that is of frosted glass and is raised just a few inches’ so that ‘[t]he central banker does not know, nor does he care, who is on the other side of the window. He simply discounts good quality paper or lends on the basis of good collateral.’ Even if this prescription is followed, some banks may use central bank facilities much more heavily than others. Furthermore, if interest rates are kept low, even insolvent banks may be able to rebuild their balance sheets using general liquidity facilities, turning a profit by on-lending cheap central bank funds. The following discussion acknowledges these issues, but also shows that a comparative assessment of the pressures to overextend the LOLR function is possible.

The Bank of England

We begin with the handling of the failure of Northern Rock in the UK, which was one of the first signal events of the financial crisis, with a run on the bank occurring in September 2007. Northern Rock got into difficulties because it had funded rapid growth in its mortgage book (which was basically sound) with short-term borrowing on the money markets. When these froze in August 2007, the bank ran into difficulties. Discussions between the regulator (the Financial Services Authority (FSA)), the government and the BoE revolved around arranging a takeover by a larger retail bank. When this could not be arranged, the BoE established a support facility, guaranteed by the government, and the bank was nationalised. For our purposes, a key feature was the BoE’s refusal to support Northern Rock through the provision of liquidity without simultaneously beginning a process to resolve its underlying problems.

In the post-mortem conducted by a parliamentary select committee, the question of whether the BoE could have kept the Rock out of trouble by providing lender of last resort facilities was discussed. Critics of the BoE argued that it had been unduly reluctant to provide liquidity support to the financial system in September 2007, when the Fed and the ECB had both intervened extensively. The Governor, Mervyn King, argued that lending at longer maturities, removing penalty rates and/or increasing the range of collateral accepted at the Bank’s discount window created a risk of moral hazard. ‘T]he markets would ..take it as a signal that the central bank would always rescue them should they take excessive risk and get into difficulties.’ (House of Commons Treasury Committee 2008: 39). The Governor had to reverse his stand in October, and many experts have criticised his position. With hindsight, we can see it as a stand against the automatic accommodation of the financial sector, i.e. as resistance to financial dominance. For their part, ECB officials defended their accommodating actions to the Commons Committee as ‘rectifying a generalised lack of confidence’ in which moral hazard arguments were not the highest priority; in any case, individual banks were not bailed out (House of Commons Treasury Committee 2008: 40).
Critics differed on the question of whether the availability of general liquidity operations would have been adequate to save the Rock. Its own management, some representatives of the FSA, and the British Bankers Association spokesperson thought it might have been, but Governor King was dismissive, along with other experts, who pointed out that there would have had to have been a ‘vast’ injection of funds (House of Commons Treasury Committee 2008: 45). There was further disagreement about whether a standing facility should have been made available to Northern Rock specifically, with one critic invoking the ‘frosted window’ argument against giving ‘liquidity support to an individual institution if the rest of the market is in good order’ (Wood, quoted in House of Commons Treasury Committee 2008: 47).

As takeover possibilities failed to materialise, the Treasury authorised a support facility for Northern Rock. When news of this measure leaked out, the run on the Rock ensued. This was somewhat paradoxical, as a run should normally precede the announcement of support; instead, the announcement served as a signal of the extent of the bank’s difficulties (Shin 2009). The run was stopped by the announcement of full deposit guarantees by the government, replacing the existing deposit insurance scheme which provided full insurance only to a limit of £2000. Northern Rock was nationalised in 2008, and restructured in 2010; the ‘good’ bank was sold in 2012.

Many commentators take the view that the BoE did not come out of the Northern Rock crisis well, but the implications for an assessment of independence are mixed. The BoE’s decision to desist from providing either general liquidity support or special measures indicates its resistance to financial dominance. But the BoE could not act autonomously to address the problems at Northern Rock: it needed the support of the government. The government, for its part, refrained from publicly criticising or pressuring the BoE to provide more general liquidity support, although the Bank was later called to account before a committee of the legislature. The BoE’s position would have been more comfortable had there been a more comprehensive deposit insurance scheme to begin with, as this might have prevented the run on the Rock. Thus we can see how supportive institutions with fiscal backing facilitate CBI.

The Federal Reserve

Very active liquidity operations by the Federal Reserve mitigated the effects of the wholesale market freeze into 2008 in the US. However, this did not ameliorate concern about the value of derivative instruments linked to subprime mortgages. In March 2008, the investment bank Bear Stearns failed, principally due to overexposure to low quality mortgage backed securities (MBSs). It was taken over by JP Morgan, aided by a large loan ($29b) from the New York Fed. The loan was backed by Bear Stearns assets but provided no recourse to JP Morgan: thus the Fed took a substantial risk that could have led to losses (but, in the end, did not). There was a vigorous debate at the time about whether Bear Stearns was insolvent or merely illiquid. The Treasury gave its approval to the Fed’s actions, but did not offer an indemnity for losses. The Fed was immediately called to account in the Senate for its actions, with both the Finance Committee and the Banking Committee seeking details of the deal. In April, Chairman Bernanke insisted on
the quality of assets backing the loan and rejected congressional concerns that taxpayers were ‘on the hook’ for the rescue. The subsequent Fed rescue of AIG raised similar issues, but the Treasury took on the main task of dealing with bank bad assets with the introduction of the Troubled Assets Relief Program (TARP).

The Fed also pioneered several lending facilities to provide liquidity to the markets. These entailed some credit risk which was only partially indemnified by the Treasury. For example, the Term Securities Lending Facility (TSLF) allowed institutions to swap MBSs for Treasury securities. The Fed accumulated some $1trillion in exposure in this facility, but the Treasury only guaranteed $100b, or 10% of this amount. Other funds and interventions also had only partial, or even no Treasury indemnity attached. Buiter (2009) was very critical of the lack of full Treasury indemnification. He argued that the taking on of losses by the Fed as a use of taxpayers’ money, which the federal government should be accountable for. He also suggested that the desire to protect itself against losses could influence the Fed’s future monetary policy: in other words, that there could be financial dominance. Other critics have focused on the question of whether the Fed exceeded its LOLR powers by lending to insolvent institutions (Gilbert et al 2012), which would also be an indicator of financial dominance.

While the Treasury endorsed and supported the Fed’s policies, it was left politically exposed by the opposition of members of Congress to the President’s recovery program. Since Congress could (and initially did) refuse to appropriate the fiscal funds and regulatory powers needed for TARP, the Fed relied on its own resources to a greater extent than the Bank of England, which did not face the same political opposition. However, lack of fiscal support did not leave the Fed totally exposed to financial dominance, because of its own substantial resources. The Fed is fortunate in having access to high levels of seignorage because of the global acceptability of the US dollar. This means that it is able to take on risks without provoking a flight from the currency. It took these risks in extensive targeted lending programmes that went well beyond opening the discount window wider. Grossman and Rockoff (2015: 43) suggest that Governor Bernanke was motivated, not only by the aim of preventing the money supply from shrinking, but also by a desire to maintain intermediary lending institutions with established borrower relationships, and even to funnel credit direct to borrowers when intermediation failed (thus the Fed lent directly to General Motors and Chrysler, for example). Arguably, these measures show that the Fed could work around financial system failures, and was therefore less subject to financial dominance than its accommodative measures might at first suggest.

A bill introduced into the US Senate in 2015, the ‘Bailout Prevention Act’, attempts to limit the Fed’s jurisdiction to emergency lending in accordance with Bagehot’s rules, and prevent it from extending its jurisdiction into financial rescues. It would require the interest rate on emergency lending to be at least 5% above the Treasury rate, while the Fed and other supervisors would have to conduct and make public an assessment of borrowers’ solvency. Programmes would have to be ‘broad-based’, defined as having at

---

least five borrowers eligible to participate. Commenting on the proposals, Ben Bernanke argued that they would create such stigma for borrowers that the Fed’s emergency powers would be rendered ineffective (Bernanke 2015). However, he also indicated that the Fed welcomed changes made by the Dodd-Frank Act that created enhanced powers for the Federal Deposit Insurance Corporation and the Fed to put systemically important institutions into receivership, remarking that ‘[a]s Fed chairman, I was delighted to see my institution taken out of the business of bailing out failing behemoths.’ In the terms that we outlined above, the Fed’s independence was eroded because it was forced to enlarge its jurisdiction while also losing autonomy by becoming involved in the disposition of quasi-fiscal resources.

The ECB

The euro area was established with bank supervision devolved to the member state level, and lender of last resort functions also remained with national central banks (NCBs). However, the general provision of liquidity to the euro system is the task of the ECB. When liquidity dried up in late 2007, the ECB stepped in actively. It enjoyed the advantage over the Fed and the BoE that the provision of liquidity to banks was already part of its regular operations, so it did not have to introduce new facilities. The ECB ‘fine-tuned’ its operations by accepting collateral of lower quality and offering extended terms on loans, whereas the Fed and the BoE had to innovate and ‘mimic the possibilities for central bank intermediation and refinancing offered by the ECB’s regular operations’ (Lenza et al 2010: 307).

Furthermore, in accordance with the ‘frosted glass’ metaphor of the discount window, the ECB could handle the general liquidity crisis ‘without the need of detailed supervisory information on individual institutions’ (Pisani-Ferry and Sapir 2010: 351). However, this changed as the crisis unfolded and cast the solvency of some banks in doubt. A number of banks were rescued by their national authorities, but the failure of two systemically-important banks with cross-border operations, Fortis and Dexia, showed how financial integration in the euro area had run ahead of arrangements to cooperate in the supervision of banks and, as the crisis unfolded, share the costs of recapitalising or resolving them.

The ECB accommodated the increased signs of financial stress in the euro area by introducing ‘full allotment’ in October 2008. Instead of banks bidding for liquidity in a variable rate tender, full allotment meant that ‘banks could be sure that their bids for liquidity would be satisfied in full at the rate set by the ECB’ (Pisani-Ferry and Sapir 2010: 356). It also lowered the required rating on bonds accepted as collateral. Subsequently, in 2011-12, low-interest long-term funds were made available to banks for on-lending through Long-Term Refinancing Operations (LTRO).

There are several indicators that the ECB supported banks which were not merely illiquid but insolvent. The ECB decides which securities and counterparties are eligible to use at its discount window. Sovereign debt can become ineligible collateral if it is deemed too risky, and banks can be denied access if their capital base is too weak (Whelan 2014: 6). Without access to the ECB’s discount window, Emergency Liquidity Assistance (ELA) is
available to banks, and at times it has been used heavily, notably by Greek and Irish banks. Access is normally operated by national central banks although any lending above €2b has to be approved by the Governing Council with a 2/3 majority (ECB 2014). The ECB periodically indicated its concern that ‘addicted banks’ were over-reliant on ELA and pressured national authorities to address the underlying problems. Since the affected governments did not have the fiscal resources to recapitalise banks without assistance, this meant pressuring them to apply for loans to support bank restructuring. In the case of Ireland, Governor Trichet threatened the Irish finance minister that the ECB would withdraw ELA access from Irish banks if the government did not apply for an EU/IMF loan (Whelan 2014: 7).

There is some ambiguity about how banks use ECB liquidity facilities when they are on the path to government-supervised winding-down and closure. Eurostat accounting rules state that banks which do not maintain viable trading activities, such as ‘defeasance structures’ or ‘bad banks’, are part of general government, which means that they cannot borrow from the ECB. However, some of these entities are classified by the ECB or national central banks as Monetary Financial Institutions (MFI): they do have access to the ECB and cannot be part of general government. When central banks stick to their MFI classification, Eurostat has to give way. Entities on Eurostat’s list of bad banks which maintained their MFI classification included KA Finanz in Austria and the Irish Bank Resolution Corporation (Eurostat 2012: 4). By giving these banks access to central bank funding, the ECB in effect made loans to insolvent banks to support their orderly winding-down.

Arguably, the ECB’s support for insolvent banks went far beyond these specific measures. The LTRO could be seen as a massive back-door bank recapitalisation scheme, whereby banks received long-term funds at a mere 1% interest, which they could on-lend at a substantial margin (Schelkle 2012: 30). As Pill (2013: 26) puts it: ‘Faced with dysfunctional financial markets and lacking a fiscal counterparty, the ECB has been progressively drawn into using its fiscal capacity proactively.’ Unlike the BoE, the ECB had no single government counterpart which it could hold responsible. Unlike the Fed, it could not draw on its own resources and close ties with leading financial institutions to engage in restructuring on its own account. In summary, we can see several signs of enlarged jurisdiction arising from national governments’ unwillingness to recapitalise their banks.

4 Redrawing jurisdictional boundaries with unconventional measures

The previous section discussed the three central banks’ initial responses to the crisis, focusing on how they exercised their LoLR functions when a significant number of financial institutions was presumably insolvent. As the immediate liquidity crisis passed, the BoE and the Fed moved to try to engineer a monetary stimulus, and they used the unconventional instrument of quantitative easing (QE) in the process. The ECB also endeavoured to boost bank lending and repair the damage the crisis had done to the monetary policy transmission mechanism, but it faced a more pressing problem in the
form of a government bond crisis. This section looks at the political reception accorded to
the three central banks as they transgressed the conventional boundaries of monetary
policy. It examines whether the three central banks were subject to pressure to widen
their policy jurisdiction from opportunistic governments, and whether and how
jurisdictional boundaries were upheld by governments, legislatures and courts.

The Bank of England
The BoE presents, as it were, the most conventional case of unconventional policy. As
interest rates approached zero, bond purchases went beyond regular open market
operations. Under QE, the Bank purchased long-term government bonds in an effort to
shift long term interest rates down. This immediately raised the question of whether the
UK was seeing ‘fiscal dominance’, with bond purchases motivated not by the monetary
policy objective of price stability, but by the government’s financing requirements.

In normal times, a slide towards fiscal dominance would be monitored by the financial
markets and would probably produce a rise in expected inflation and a slide in the
exchange rate. With deflation much more the live threat after the crisis, this mechanism
for policing the activities of the central bank was quiescent. The government, for its part,
can be expected to welcome fiscal dominance and to do its best not to draw attention to it.
This left the task of scrutiny to the expert community, which was provided with venues
for airing its concerns by parliamentary committees. While the legislature in the UK is
aligned with the executive and can be expected to share its political goals, the upper
house comprises non-elected members with an orientation towards upholding institutions
of governance and policing executive overreach. In the lower house, committees often
also seek to demonstrate independence from government by upholding probity in public
life.

Both Lords and Commons committees investigated whether the BoE was maintaining its
purchases of gilts in order to achieve its desired monetary conditions, or whether the
purchases were intended to support the government bond market and finance the
government deficit. In the House of Commons, the Treasury Select Committee has
repeatedly enquired about possible debt management issues in undertaking an exit from
QE. The BoE’s Executive Director of Markets, Paul Fisher, and the Chief Executive of
the Debt Management Office, Robert Stheeman, came before the Committee and insisted
that debt management and monetary policy were independent and that consultation
between the Debt Management Office and the Bank was concerned with operational
issues only, not the overall conduct of monetary policy.

Two issues emerged that cast doubt on this claim. First, it was evident that the UK
Treasury had utilised the favourable conditions created by the bond purchase programme
(specifically, low long-term interest rates) to lengthen the maturity of its debt
considerably (Hannoun 2012: 15). Since the aim of QE was to reduce long-term interest
rates, the issue of new long-term government debt undermined the policy: the two arms
of monetary policy and debt management pulled in different directions.
Second, discussion of the sequence for reversing exceptionally lax monetary policies suggested that the Bank was constrained by bond market concerns. The Governor, Mark Carney, made it clear that QE would not be reversed before the policy interest rate increased, and possibly not for some time after. In the Lords, Carney was asked about the effects of unwinding (disposing of) the Bank’s gilt holdings ‘on the Bank Rate, the term structure of interest rates, funding the government deficit through new issues, and more generally on the economy’ (House of Lords 2013: 21) He insisted that ‘the first move in tightening monetary policy would be to tighten conventional monetary policy.’ (House of Lords 2013: 22). He was pressed about the logic of this sequence by former chancellor Lord Lawson, who argued: ‘Most people see quantitative easing as a rather exceptional measure [...]. The expectation is that [...] you would first of all start to unwind the exceptional measures before you started to put up interest rates.’ Carney’s answer was that the financial markets would be more unsettled by the unwinding of QE than by a rise in interest rates. The policy reversal would be ‘harder for the market to understand’ and there would be ‘associated debt management issues’ (House of Lords 2013: 23-25).

These responses hardly quelled the suspicion that policy was being shaped by government debt management concerns, and that the exit from bond buying was being postponed because of its possible effect on government bond prices. Fears of the market reaction to signs that the Bank would cease its programme of government bond purchases, and even reverse it by selling bonds, imposed constraints on the Bank’s freedom of action. The risk for the Bank was that too strong a signal of monetary tightening would induce a government bond crisis. The BoE insisted that government debt purchases were made in order to achieve the desired monetary conditions and not to provide cheap finance for the government, but it was hard to avoid noticing the fiscal effects as the scale of purchases was so large.

Fiscal dominance was not manifest, in that the BoE was not forced under protest to buy bonds. But this could just mean that the Bank was acquiescent rather than independent. Our interpretation is that fiscal accommodation was the price the BoE paid for avoiding financial dominance. As the previous section documented, it was supported by the government in recapitalising banks, but this greatly raised the level of government debt and increased the deficit. The Bank then stepped up and accommodated the government’s financing requirements. By supporting government bond prices, this in turn prevented bank assets from diminishing further. This did not go unnoticed, but nor did influential actors have incentives to sanction the BoE for its accommodating stance.

*The Federal Reserve*

The Fed purchased a substantial amount of government debt in the crisis. For Meltzer (2014: 6-7), the expansion of base money accompanying these purchases is sufficient evidence that the Fed is no longer independent. Others have been more circumspect. By contrast with the UK, there was no threat of a government bond crisis in the absence of accommodating action by the Fed. US government bonds continued to be taken up readily at low yields in international financial markets. In that sense, there was no fiscal dominance: the programme was not designed to help the government fund its debt;
instead, the Fed defended its policy as a macroeconomic measure intended to stimulate the economy and lower the unemployment rate.

The same tension between debt management and monetary policy objectives that arose in the UK can be identified in the US. Meaning and Zhu (2012) examined the Fed’s Maturity Extension Program (MEP) whereby it sells short-term and buys long-term Treasury bills in an effort to reduce long-term interest rates. Studies suggest that the operation had some effect, but Meaning and Zhu (2012: 28-29) note that the Treasury had undermined it somewhat by increasing its issuance of long-dated bills. They comment that ‘[s]overeign debt managers and monetary policymakers do not share the same goals’ and suggest that the Treasury took advantage of the MEP to push up the average maturity of Treasury bills.

In Congress, the Fed was much more vigorously held to account for its purchases of private bonds than public debt. In normal times, the Fed has a ‘Treasuries only’ policy. Its purchases of other securities were clearly exceptional, and it had to justify them to Congress as being due to ‘unusual and exigent circumstances’\(^4\). There were several possible objections to the policy. First, whereas Treasuries are regarded as risk-free assets, the Fed could have realized significant losses on its holdings of other assets. Second, securities purchases could bail out firms that were uncompetitive and should be allowed to fail, distorting the normal operation of financial markets. Third, decisions about why some securities were chosen for support and not others were open to questions about why some sectors or firms were benefitting from access to public resources (Reis 2013: 16-17).

All these objections were made in Congress. There was a particular focus on the possibility of losses. The rescues of Bear Stearns and AIG were highly controversial. In both cases, risk-free assets backed by the US government were exchanged for risky private financial assets. In the Bear Stearns rescue, a letter from the Treasury noted that losses were possible and confirmed that these could reduce the net earnings of the Fed, which are transferred to the Treasury general fund. Fiscal risks were also evident in the much larger rescue of AIG, which was ‘criticized immediately by some prominent members of Congress as a questionable commitment of taxpayer funds.’ (Goodfriend 2011: 7). Congress was particularly agitated that the AIG rescue involved bailing out foreign banks on a grand scale (Broz 2013). Critics initiated an ‘Audit the Fed’ bill, and in 2011, the Fed was forced by Court order to release previously confidential information about all banks that benefitted from its bailout programmes.

One interpretation of congressional criticisms was that Fed policy provided an occasion for members to play out their political contest with the executive arm of government. If the Fed had been fully indemnified for its interventions, as the BoE was, it would have dropped out of the contest and the Treasury would have faced Congress in a direct budgetary confrontation. Instead, Congress found that the Fed was able to exercise quasi-fiscal powers. Arguably, congressional scrutiny could provide a defence for the Fed against Treasury pressure in how it used those powers. At the very least, it had the effect

of forcing the two institutions to establish new conventions governing their relationship. The Treasury and the Fed issued a Joint Statement in March 2009 on ‘The Role of the Federal Reserve in Preserving Financial and Monetary Stability’. This statement emphasised that the Fed’s quasi-fiscal powers should not be used for redistributive purposes. The two institutions agreed ‘that government decisions to allocate credit are the province of the fiscal authorities’, and ‘that the Fed should improve financial conditions broadly and not aim to allocate credit narrowly’ (Goodfriend 2011: 14).

Another reason why congressional fixation on the budgetary impact of Fed measures has not proved constraining is that unconventional measures have proved very profitable, with transfers to the Treasury running at some $80b per year, compared with $20-30b before the financial crisis. For commentators who equate independence with budgetary autonomy, this means that the Fed is as independent as ever (Dudley 2013).

The ECB
As explained in section 3, the ECB has, since its foundation, conducted its monetary policy primarily through refinancing arrangements with banks, rather than through open market operations, ie the sale and purchase of government securities. Lenza et al (2010: 307) point to the institutional legacy which made it relatively easy for the ECB to extend its bank lending in the crisis: Before the crisis, the weekly refinancing volume of the ECB was more than 10 times as high as that of the Fed (in the order of €300bn in contrast to $30bn). The ECB dealt with a large number of counterparties (up to 2000 banks) whereas the Fed dealt with only about 20 primary dealers. Finally, the ECB accepted a great variety of assets as collateral while the Fed accepted only a limited set, mainly consisting of government debt. These measures were largely uncontroversial, despite the substantial exposure of the ECB’s balance sheet they entailed.

Political controversy centered on the government securities that appeared on the ECB’s balance sheet, even when they were still at a modest scale. In the eyes of prominent members of the ECB’s board, as well as numerous external critics, any government bond purchases by the CB are steps on a slippery slope to fiscal dominance. The then President of the Bundesbank, Axel Weber, and the ECB’s chief economist, Jürgen Stark, voted against plans to buy government bonds in the secondary market in the aftermath of the Greek rescue programme in May 2010. They both eventually resigned in the course of 2011 and it is an open secret that they did so because they disagreed with the incremental adoption of unconventional measures, such as the Securities Market Programme. The German critics on the ECB’s Board encouraged and fed into a continuous public debate in Germany about the ECB’s crisis management. Legal challenges to the European Stability Mechanism and the Fiscal Compact were brought, although they failed in the German Constitutional Court. The subsequent programme of Outright Monetary Transactions (OMT) also came under a judicial cloud, although it was merely announced at the height of the crisis in summer 2012 and never implemented. These challenges are a strong signal of contestation over the ECB’s jurisdiction in stabilising government bond markets.
The approach taken by Governors of the ECB (first Trichet, then Draghi) has been to fend off accusations of fiscal dominance by insisting that governments exercise budget restraint as a condition of financial support. One element was to demand reforms to strengthen the enforcement of the Stability and Growth Pact (SGP) which commits member states to restrain their fiscal deficits and debt levels. Another was to directly influence the governments of struggling member states by attaching conditions to lending programmes. The ECB has insisted that countries whose sovereign bond prices are being supported by ECB intervention must have an EU lending programme in place. This enables the ECB to participate in developing lending programme conditionality as part of the ‘troika’ (the IMF, the ECB and the Commission). It thereby has a direct mechanism for influencing the fiscal policy of the hapless member state.

The ECB also tried to impose conditionality within the Securities Market Programme, which was the bond-buying programme started in the aftermath of the first Greek rescue programme. There was no formal channel for doing so, but Trichet and his successor jointly signed letters to the Italian and Spanish prime ministers in 2011 outlining the measures they expected those governments to take in return for SMP support (Bastasin 2012: 310-21). This was not a successful gambit: the letter to Berlusconi was made public and caused some embarrassment, without any obvious payoff in Italian fiscal policy. When the ECB then eased off on buying Italian bonds, rates rose again to unsustainably high levels and precipitated Berlusconi’s downfall (Whelan 2012).

These political conflicts show that there is no stable allocation of jurisdiction that enables the ECB to buy government bonds to pursue monetary and financial stability objectives, while leaving authority over fiscal policy to governments. This has put the ECB in a very difficult political position, yet the alternative of not buying government bonds appears equally untenable because of the close relationship between bank financing and government financing. Many banks in the euro area have been recapitalised, but this has damaged the fiscal position of the respective governments. This contributed to reluctance in the financial markets to take up some national government bonds. When bonds trade at lower prices (higher yields), their value on bank balance sheets falls, pushing banks towards insolvency. When banks hold high concentrations of their own government’s bonds, the result is a ‘diabolic loop’: bank assets are devalued, recapitalisation by the home government is needed, the fiscal position deteriorates, the markets respond and bank assets are devalued further. The loop can only be broken if the ECB buys these government bonds.

The bitter irony is that these controversies force the ECB to succumb to financial dominance and fiscal dominance at the same time. The LTRO can be seen as a back-door method for financing governments, as many of the least robust banks in southern Europe have taken on substantial amounts of home country sovereign debt. Thus ‘the ECB’s provision of unlimited liquidity to banks located in the Eurozone periphery became similar to financing governments.’ (Reichlin 2013: 136). The prospect that a struggling government would have to default and exit creates ‘redenomination risk’. The threat of a country’s exit from the euro area is highly damaging to the monetary policy transmission mechanism, as it is a major factor in the divergences between market interest rates and
the ECB’s policy rate that have emerged in the euro area (ECB 2013; ECB 2014 p.67). Countries with high sovereign debt interest rates also suffered from a high market rate premium, and therefore experience tight monetary conditions. Lowering the policy rate does not alleviate this problem. Thus the transmission mechanism for monetary policy was damaged by financial fragmentation arising from fiscal risks. As a result, the ECB moved strenuously to counter ‘unfounded fears of currency redenomination’ (Draghi in European Parliament 2014).

In 2015, the ECB launched a QE programme, supposedly adopting the same unconventional measures as the other two central banks, although restricted to government debt purchases in secondary markets only. The ECB draws a line between government financing and monetary policy by insisting that it buys government bonds in secondary markets according to the ECB capital share of each member state, not according to the needs of overindebted governments (ECB 2015: para 6). But it resorted to this pro-rata QE after some members of the Governing Board protested against the apparent bailing-out of governments. Pro-rata purchasing may turn out to be a convention that stabilises the boundary between monetary policy and fiscal support in that it uphold the notion of a single market in euro-denominated bonds. But the need to buy German and Dutch bonds as well reduces the effectiveness of the programme. In any case, the ECB cannot withdraw its exceptional provision of liquidity as long as the markets remain nervous about the risk of bank failure and/or sovereign debt risk, each becoming cause and consequence of the other.

5 Extending the jurisdiction with prudential powers

In this section, we describe the debates that surrounded the assignment of macroprudential regulatory powers to the three central banks. Before the crisis, a consensus had formed that regulation for financial stability should be the task of a separate agency, lest the central bank be drawn into conducting monetary policy to protect financial institutions (Goodhart and Schoenmaker 1995). The crisis showed that financial dominance arises anyway, and that regulation oriented to the ‘micro’ stability of individual institutions may fail to detect the emergence of aggregate systemic pressures. Furthermore, these pressures could not be addressed with the single instrument of interest rate policy. This is how Fed Governor Bernanke (2011), put it. ‘Monetary policy is too blunt a tool to be routinely used to address possible financial imbalances; instead, monetary policy should remain focused on macroeconomic objectives, while more-targeted microprudential and macroprudential tools should be used to address developing risks to financial stability, such as excessive credit growth.’

Our three central banks faced different obstacles to acquiring the regulatory powers that they now believed they needed. For the ECB, a central problem was how to allocate regulatory responsibilities between the national and supranational levels. Participating governments resisted assigning more powers to the supranational level. For the Fed, legislation had to pass through Congress. Not only had Congress been critical of the Fed’s performance in addressing the crisis, but also its legislative processes are notoriously susceptible to lobbying of individual congressmen by interest groups. While a
majority in Congress accepted that more regulation of the financial sector was needed, there was plenty of scope to assign regulatory powers to other agencies rather than the Fed.

**Bank of England**

The BoE had the easiest time obtaining additional powers. Party unity means that laws proposed by the executive pass readily through the legislature, with limited opportunities for interest group lobbyists to pick off individual MPs. The financial regulatory landscape was populated with fewer agencies, and the government evidently decided that the blame for the Northern Rock debacle should be placed at the door of the FSA, not the BoE. Nonetheless, the regulatory structure created in the wake of the financial crisis suggests that some degree of overlapping jurisdiction is unavoidable. A Financial Policy Committee (FPC) has been established within the BoE. It is chaired by the Governor and includes the chief executives of the two financial regulators: the Prudential Regulatory Authority (PRA) which is located inside the BoE, and the Financial Conduct Authority (FCA), which has a consumer protection remit and is outside the BoE. The FPC has some direct powers, including setting countercyclical and sectoral capital requirements, but it also operates by making recommendations to other regulators, the Treasury, and private industry associations (Kohn 2014). As Kohn notes, recommendations for changes in regulation are subject to the usual procedural requirements of public notice and opportunities for comment, a far cry from operating monetary policy by the ‘invisible hand’ of transmission through financial markets (Krippner 2007).

The grant of macroprudential powers will have a positive effect on independence if it enables the BoE to reach its policy goals. *Prima facie*, more powers should enhance autonomy and reduce the Bank’s dependence on other agencies. However, this has to be weighed against the enlargement of jurisdiction which regulatory powers bring, which introduces more scope for conflict with arms of government. This has become evident in the regulation of the home mortgage market. Since the financial crisis, UK banks have adopted lower loan-to-value (LTV) ratios, following a fall in house prices (ie value) that left some households with negative equity and banks with a significant portfolio of non-performing mortgage loans. While lower LTV ratios increase financial robustness, they have the implication that buyers who do not have their own resources for a deposit are shut out of the housing market. This resulted in a political campaign to assist first-time home buyers, and the government introduced in 2013 a ‘Help to Buy’ scheme which allowed first-time buyers and movers to acquire a housing property for their own use. This scheme appeared, on introduction, to stimulate the housing market and contribute to the asset price inflation that the BoE was seeking to prevent.

A political argument ensued in which the opposition Labour Party argued that, without reform of the Help to Buy scheme, the Bank could be pushed into raising interest rates, a ‘blunt instrument’ that would harm the wider economy. In response, the Chancellor called on BoE officials to ‘use the tools I’ve given them’ to cool the market (FT May 14 2014). But new affordability tests for bank creditors established by the PRA received a

---

critical public reception on the grounds that they were unduly demanding and intrusive. For his part, the Governor of the BoE challenged the rationale of the Help to Buy scheme and suggested that the housing market’s ‘deep problem’ was a lack of supply, which the instruments of the central bank could not address (FT May 21 2014). In short, the expansion of regulatory powers cannot be enough to prevent house price inflation, while the Bank’s jurisdiction over regulatory policy is more contested than over monetary policy.

**Federal Reserve Bank**
The direct powers of the FPC, and its close relationship to the PRA, can be contrasted with the powers accorded to the Financial Stability Oversight Council (FSOC) in the US. The fragmented regulatory structure in the US has not been reformed; instead, FSOC has been ‘grafted’ on top of the existing agencies. Kohn (2014) attributes this to ‘resistance of the agencies and of the various Congressional committees having jurisdiction over the agencies’. FSOC’s membership includes the heads of no fewer than eight relevant regulatory agencies. Each agency has its own legal remit and recommendations from FSOC cannot circumvent or override each agency’s procedural requirements.

FSOC is chaired by the Secretary to the Treasury, not the Governor of the Fed. Nonetheless, the Fed has been given important new macroprudential powers, albeit powers confined to systemically important financial institutions (SIFIs), leaving many smaller banks outside its scope. Goodhart (2014) traces the political struggles involved in expanding the powers of the Fed. She argues that ‘[i]n the regulatory realm, the Fed’s activities are closer to ordinary agency politics’ than in the area of monetary policy, where the Fed enjoys monopoly powers and domination of the intellectual debate.

**European Central Bank**
In the Euro area, a European Systemic Risk Board (ESRB) was created in 2010. It is the European counterpart of the international Financial Stability Board, and exercises similar ‘soft law’ powers to formulate guidance and recommendations. Subsequently, a Single Supervisory Mechanism (SSM) has been developed for systemically important banks, and new macroprudential instruments adopted. The ECB has been given an extended role in financial regulation as a result. Macro-prudential instruments have been created with the Capital Requirements Directive (CRD IV) and the Capital Requirements Regulation (CRR). The ECB as the operator of the Single Supervisory Mechanism will be responsible for applying these instruments (Angeloni 2014: 75-76). Other instruments are assigned to national authorities: while the ECB disposes of capital buffers, a liquidity coverage ratio and exposure limits, the instruments for reining in housing bubbles, such as LTV and loan-to-income (LTI) ratios, remain under the full authority of national authorities.

A sensible case can be made for this division of labour: house prices are local and drive national or even regional financial cycles, and they are significant for other policy concerns than price stability. Hence, national political authorities will be and should be involved in their control (Schoenmaker 2012). But the application of euro area instruments may be at cross-purposes with the national application, each one trying to
negate the other, as Angeloni (2014: 80) from the ECB explains: ‘[A]ssume that for the fear of jeopardising a nascent, fragile recovery, national supervisors are overly lenient despite signs of overheating in the domestic real estate market. But, if a credit-fuelled bubble emerged, it would have detrimental consequences on financial and macroeconomic stability [...]. Faced with this scenario, a “centralised” macro-supervisor would likely tighten the instruments at its disposal, e.g. by increasing countercyclical capital buffers. In turn, the local supervisor, which still may aim to ease access to credit at home, can react by softening the tools under its control, triggering a further tightening at a central level.’ There is also a scenario in which national authorities may use macro-prudential measures at their disposal too tightly, namely to protect the domestic economy against the instability of short-term lending (Angeloni 2014: 81). This would segment financial integration by directly influencing the level and direction of credit supply and thus affect the transmission mechanism of the ECB’s monetary policy. Either way, the assignment of macro-prudential competences to different levels will ensure that the ECB cannot act autonomously in this area.

6 How much central bank independence and why

In the standard analysis of CBI, the ranking of our three central banks sees the ECB as the most independent while the Fed and the BoE rank fairly low. It is evident that this ex ante assessment misses the problem of financial dominance. The BoE demonstrated an ability to resist financial dominance in the Northern Rock saga which forced the Treasury to step in; this ability has subsequently been strengthened by the grant of extensive macroprudential powers. The other central banks did not enjoy the same backing from the fiscal authorities. The Fed had to take risks on its own balance sheet in restructuring Bear Stearns, while the ECB had to maintain general lending operations that support some moribund banks for a protracted time, even though these are a drag on the financial system as a whole. The macroprudential powers that these two central banks have acquired are more contested, although only time can tell whether the ECB’s sharing of macroprudential responsibilities is a source of strength or weakness.

We argued that Sargent and Wallace (1981) were right to predict that independence in the sense of a refusal to finance governments is unsustainable, even with legal prohibitions in place. However, we have resisted leaping to the opposite conclusion, that CBI is a chimera. Instead, we have advanced a concept of independence within an interdependent system and shown its operation in three different settings. Cooperation between the central bank and the government was highest in the case of the BoE, presumably because the UK is a highly centralized political system with a comparatively tame parliament. At the height of crisis, there was mutual respect for each other’s jurisdiction, united in defying financial dominance. The effort was noticeable in the small breaches, such as the Treasury’s opportunistic lengthening of the maturity structure of bond issues at a time when the BoE was buying a good chunk of each issue in its QE programme. The test of its independence will be its ability to uphold the prudential requirements of macroeconomic stability against governments with political interests in creating the optimism that goes with a housing price bubble.
The Fed also had a cooperative relationship with the executive arm of government in the crisis, but it was constrained by executive-legislative tensions. The effect was that it had to commit its own resources to the task of financial restructuring to a much greater extent than the BoE. This mattered less to the Fed’s ability to avoid financial dominance than it would to a lesser central bank lacking the Fed’s resources to steer and organise financial markets without the support of the government. Ultimately, the close watch of Congress can also work to the Fed’s advantage in that it gives it the opportunity to remind the executive of its role. However, congressional hostility has constrained the grant of regulatory powers to the Fed.

Finally, our analysis of the ECB suggests that financing the government ultimately cannot be avoided if default threatens. Moreover, elaborate institutional safeguards of independence have undesirable consequences in a financial crisis, when the central bank needs the support of government(s). Divisions between governments do not help the ECB, as those governments which do not need monetary finance resist the creation of arrangements that could break the diabolic loop of weakening fiscal outturns and weakening bank balance sheets. The absence of a parliamentary counterpart meant that opposition was expressed inside the ECB Governing Council, turning central bankers into representatives of their member states. In the end, the ECB bought government bonds on a large scale, although not directly from issuing governments. While its QE programme simulated the existence of a composite Euro bond in financial markets, the ECB also pressed governments to take out loans under strict conditionality and participated in the Troika in order to counter the appearance of fiscal dominance. It succeeded instead in jeopardising its reputation and legitimacy, by overreaching the boundaries of its jurisdiction as a monetary authority.

The contrast between the ECB on the one hand and the BoE and the Fed on the other reveals the paradox that the supposedly most independent central bank of the three has become the most harassed and politicized of them all. As the late Padoa-Schioppa, one of the intellectual progenitors of the ECB, noted before the crisis, ‘[i]t would be unfortunate if independence were to be confused with loneliness’ (Padoa-Schioppa 2004: 180). While political opportunism may lead governments to hold their central banks in an over-warm embrace, some governments in the euro area gain political credit from isolating the ECB. Their intense concern to prevent the pooling of fiscal resources leaves the ECB having to sustain banks with cheap finance. Thus an ostentatious preoccupation with preventing fiscal dominance may perpetuate financial dominance.

An implication of our concept of CBI is that we need indicators that capture how the system of macroeconomic stabilization can be saved from financial dominance. These indicators would show the strength of complementary institutions, notably macroprudential powers of the central bank as well as deposit insurance and resolution funds for insolvent banks. These latter institutions would ideally be largely financed by levies on the financial sector, but, in systemic crises, both deposit insurance and resolution funds must be underwritten by governments. The lesson for Europeans is that independence as monetary dominance belongs with Alice in Wonderland: cats with bodies as well as smiles need cooperation within a system of governance.
References


Eurostat (2012), Eurostat supplementary table for the financial crisis, Background note (April), Luxembourg: Eurostat.


