



DIRECTORATE GENERAL FOR INTERNAL POLICIES
POLICY DEPARTMENT A: ECONOMIC AND SCIENTIFIC POLICY

The ECB's Collateral Policy and Its Future as Lender of Last Resort

NOTE

Abstract

The ECB has a comprehensive risk assessment framework based on the requirement that banks must submit collateral from a list of eligible assets in order to obtain a standard loan from the Eurosystem. This framework has been adjusted in recent years to allow lower quality assets to be used as collateral. However, the average haircut applied to collateral by the Eurosystem has increased substantially in recent years so the ECB has taken increased precautionary actions in line with this increased risk. The ECB's treatment of sovereign debt, however, is overly generous and should be revised. Beyond normal lending operations covered by eligible collateral, the experience of the Eurosystem's provision of Emergency Liquidity Assistance in recent years has not been a positive one. I propose that the ECB should be required to approve each and every ELA programme and that the risk associated with this lending should be shared among the Eurosystem central banks.

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EXECUTIVE SUMMARY

- While money creation by central banks may appear costless, there are both indirect and opportunity costs when central banks make loans to banks. Excessive money creation can trigger inflation while a bank defaulting on a loan from the central bank results in a loss relative to the case where the money was used to purchase a risk-free asset.
- For these reasons, the ECB has had a comprehensive risk assessment framework based on the requirement that banks must submit collateral from a list of eligible assets in order to obtain a standard loan from the Eurosystem.
- The Eurosystem's collateral framework has been adjusted in recent years to allow lower quality assets to be used as collateral and the riskiness of the collateral underlying the ECB's loans has increased substantially. However, the average haircut applied to collateral by the Eurosystem has increased substantially in recent years, moving from about 3 percent in 2008 to about 14 percent in 2013. In this sense, the ECB has taken increased precautionary actions in line with the increased risk.
- The small haircuts applied to lower-rated European sovereign debt in the Eurosystem's collateral framework combine with the regulatory treatment of sovereign debt in the EU's Capital Requirements Directive to strongly incentivise banks to invest in sovereign bonds at the expense of other assets. A better approach would be for both the ECB and EU to treat sovereign bonds in a similar manner to other marketable assets.
- One of the key complexities of collateral policy is how to deal with banks that seek loans but do not have any more eligible collateral. This has taken place in the Eurosystem under Emergency Liquidity Assistance (ELA) programmes.
- The experience of the Eurosystem's provision of ELA in recent years has not been a positive one. Numerous controversies have arisen and there are serious questions about how ELA programmes in Ireland, Cyprus and Greece have been started and how they were restricted.
- With the ECB taking over as a supervisor for all European banks, most of the previous arguments for the current system of ELA provision no longer hold.
- I propose that the ECB should be required to approve each and every ELA programme and that the risk associated with this lending should be shared among the Eurosystem central banks.
- As an independent regulator, the ECB should also be in a position to assess whether the liquidity problems for a bank applying for ELA reflect temporary problems or deeper structural issues.
- This should help with speeding up the process of restructuring problem banks, via recapitalisation or bail-in. A speedier response of this sort would help to avoid a repeat of long-term ELA programmes in which Eurosystem funding is used to allow private creditors to gradually get their money safely out of insolvent banks.

1. INTRODUCTION

The ability of a central bank to create money is a hugely significant power and it is important that it be used wisely. While the act of money creation may appear to be essentially costless, there are important indirect and opportunity costs that must be considered.

Large amounts of money creation can, under some conditions, create inflation, thus passing on indirect costs to the public. Even in the absence of an impact on inflation, it is important to consider the risk that is taken on by a central bank when creating money to purchase assets: If an asset purchase goes badly, there is an opportunity cost arising from the fact that the central bank could have purchased a different asset that could have generated positive returns which could then have been remitted back to central governments. In particular, the provision of credit to weak banks that are then unable to repay the loans provides a potentially unfair publicly-funded boost to the creditors of these banks.

For these reasons, it is important that central banks consider carefully the risks involved when purchasing assets or making loans to banks. Since its inception, the ECB has had a comprehensive risk assessment framework based on the requirement that banks must submit collateral from a list of eligible assets in order to obtain a standard loan from the Eurosystem. If a bank defaults on a loan provided by a national central bank (NCB), this collateral is then taken by the NCB. If the acquired collateral fails to cover the value of the original loan, the agreed procedure is that the losses incurred will be shared across all of the members of the Eurosystem.

The Eurosystem has always had a broad collateral framework, incorporating a large amount of assets of different types. The framework involves a risk assessment of each eligible asset with a "haircut" set so that, for example, if an asset has a 10 percent haircut, a bank that pledges a face value of €100 million of this asset as collateral will be entitled to a loan of €90 million.

The broad collateral framework adopted by the Eurosystem has always been an important strength of its operational approach. In particular, the ECB was in a better position in late 2008, during the early stages of the global financial crisis, to supply the liquidity required by the financial system than other central banks such as the Federal Reserve, which needed to design new programmes to allow for a broader pledging of collateral.

In this paper, I will provide a brief discussion of developments in the ECB's collateral framework and then focus in particular on two key issues.

Section 2 briefly describes some recent changes to the ECB's collateral framework and provides some quick comparisons of this framework with those used by other central banks. I describe how the additional risk taken on by the ECB in recent years has been matched by more caution in the application of haircuts. In addition, the ECB's framework appears to be more rigorous in dealing with risk than other central banks.

Section 3 discusses whether the ECB's collateral framework has an impact on the market valuation of various assets. I argue that, in general, it would be best for the ECB's haircuts to have a closer relationship with market assessments of risk than they currently do. More specifically, the ECB's collateral framework combines with aspects of the EU's regulatory approach for bank capital to provide distorted incentives for banks to hold sovereign debt.

Finally, Section 4 discusses the Eurosystem's role as a lender of last resort. There have been a number of important incidents in recent years in which banks have sought loans from the Eurosystem over and above the amount they could obtain using their eligible

collateral and have been granted credit via various Emergency Liquidity Assistance (ELA) programmes that are officially provided only by NCBs, with all risk incurred by the issuing central bank. That said, the ECB Governing Council can stop any ELA programme that it deems to be inconsistent with its monetary policy goals via a two-thirds majority vote.

The rules for the provision of credit via ELA, and the conditions required for agreement from the ECB Governing Council are not at all clear. Indeed they appear to be completely ad hoc, with decisions or threats to end ELA programmes producing a number of controversies in recent years. In this important sense, the Eurosystem does not really have a comprehensive collateral policy because when the most difficult cases occur, its standard rule-book goes out the window. Section 4 thus highlights a number of deficiencies in the Eurosystem's current approach to ELA and provides detailed illustrations of how ELA programmes were implemented in three countries.

Section 5 argues that now is a good time for this current approach to ELA to come to an end. With the ECB assuming the role of single supervisor of the euro area's banks, it is appropriate now that there also be a shared approach to the emergency provision of credit to banks. This new approach should focus on making this provision temporary and addressing the structural problems with the banks involved as quickly as possible.

2. CHANGES TO THE EUROSISTEM'S COLLATERAL RULES

One of the important challenges facing the countries involved in EMU related to putting together an operational framework for monetary policy in the euro area. The various central banks that became the components of the Eurosystem dealt with a very wide range of credit institutions and had significant differences in their collateral frameworks. One of the successes of EMU has been the creation of a single coherent eligible collateral framework featuring a large list of both marketable and non-marketable assets that meet a common set of euro-area-wide criteria.

This large list of eligible collateral meant that the Eurosystem was well-positioned to deal with the stresses in private funding markets that began in 2007 and intensified in 2008 without having to radically alter its operational framework. One important substantive change that the ECB made to its monetary policy framework was its switch to a "full allotment" policy in October 2008. To facilitate this policy and other subsequent monetary policy measures such as Long Term Refinancing Operations (LTROs), ensuring they were not undermined a shortage of collateral, the ECB has made a number of technical changes to its collateral framework in recent years.

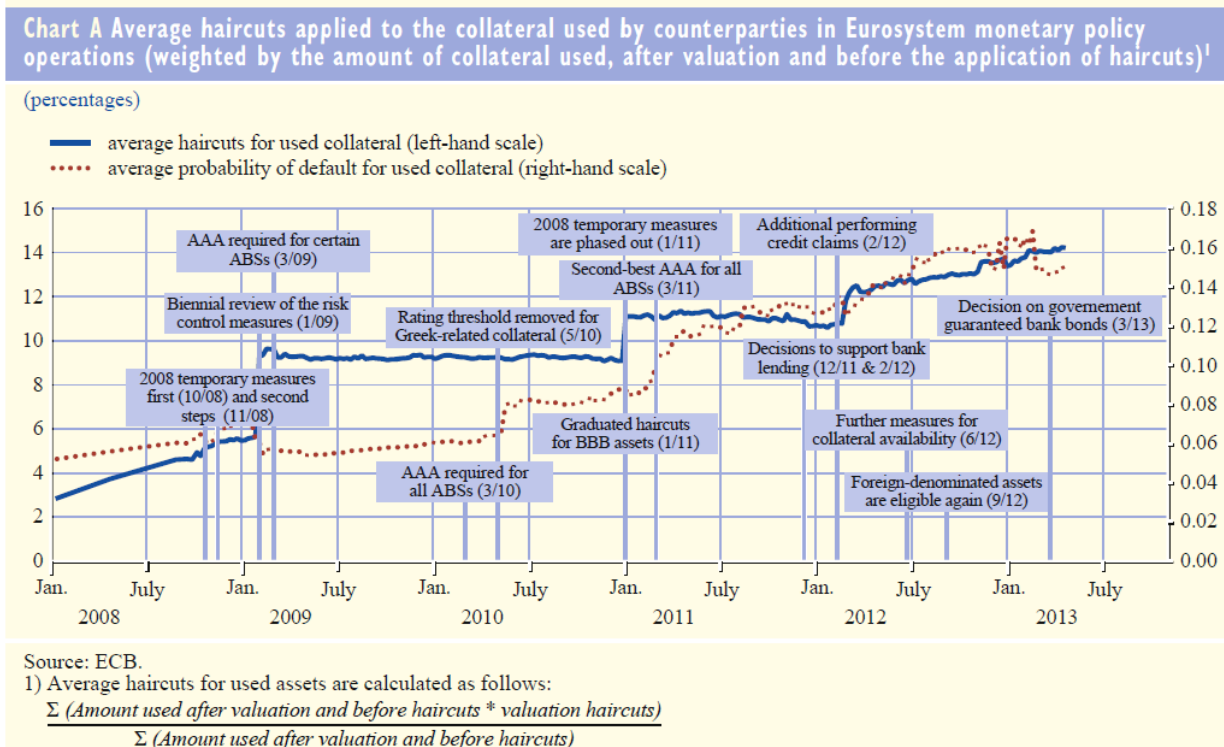
The number of specific changes is too long to list here – ECB (2013) contains a detailed description – but a few are worth noting. The credit threshold required for most assets to qualify as eligible collateral has been lowered from A- to BBB-. Various adjustments have been made to make it easier for asset-backed securities (ABS) to become eligible and new criteria were drawn up to allow NCBs to accept nonmarketable bank loans (additional credit claims) as collateral.

This loosening of standards associated with eligible collateral has met with criticism from various commentators who have focused on the increasing risk associated with the Eurosystem's balance sheet. However, I do not share these concerns, for a number of reasons.

First, while there is little doubt that the riskiness of the collateral underlying the ECB's loans has increased substantially and that this increase largely reflects the conscious decisions of the Governing Council to accept riskier assets, it is also the case that the risk control framework has been adapted to deal with this development. In particular, Figure 1 shows a chart taken from ECB (2013) illustrating how the average haircut applied to collateral by the Eurosystem has increased substantially in recent years, moving from about 3 percent in 2008 to about 14 percent in 2013. In this sense, the ECB has taken increased precautionary actions in line with the increased risk.

Second, some of the concerns expressed about the newer lower quality assets fail to reflect the protective measures that the ECB has taken. For example, while the ECB is now allowing unmarketable bank loans to be used as collateral, the haircuts applied to these lower quality "additional credit claims" are considerable. They range from 17 percent for loans with a maturity of under one year to 65 percent for certain loans with a maturity of over 10 years.¹ In relation to ABS, the ECB has taken a number of steps to improve the transparency of these assets, establishing loan-by-loan information requirements for ABSs as an eligibility criterion.

¹ These haircuts can be found at https://www.ecb.europa.eu/press/pr/date/2013/html/pr130718_annex.pdf?3f96783ce223aba713f129ad1d7a8367

Figure 1: Average Haircuts Have Increased in Recent Years**Source: ECB (2013)**

Third, international comparisons suggest that the Eurosystem is generally more aggressive in its risk control measures than other major central banks. Figure 2 presents a table from ECB (2014) illustrating how various central banks apply haircuts to different assets. It shows that the ECB makes a greater distinction between the riskiness of assets when applying haircuts than the other central banks. In addition, its average haircuts are generally higher, most notably for lower-rated assets.

While arguments for protecting central banks against losses via higher average haircuts (or even haircuts that rise during recessions) may exist, it is also important that borrowing from central banks not be done on terms that are seen as highly unattractive, particularly during financial downturns. This could lead to borrowing from the central bank being seen as something only undertaken by banks in serious trouble. During financial crisis, it can be important that banks that borrow from the central bank do not suffer reputational damage as this can lead to banks choosing to forego the option of central bank borrowing. This can lead to banks focusing more aggressively on deleveraging efforts that have negative knock-on effects on financial markets and the wider economy.

These arguments suggest a potential trade-off between the narrow goal of having the central bank avoid losses and its wider goals of maintaining macroeconomic and financial stability.

Figure 2: ECB Haircuts Are Relatively High
Source ECB (2014)

Table 7 Overview of haircuts applied by selected central banks											
Debt instruments issued by	Maturity	Eurosystem ¹⁾			Bank of England (BoE) ²⁾	Federal Reserve System ³⁾		Sveriges Riksbank ⁴⁾	Bank of Japan (BoJ)		Swiss National Bank (SNB)
		AAA TO A-	BBB+ TO BBB-	No distinction by rating ²⁾	U.S. denominated	Foreign denominated	No distinction by rating is made ²⁾	JGBs	Foreign		
• Central Governments	<1y	0.5	5.5	0.5	1.0-3.0	8.0	3.0	1.0-2.0	3.0	0.0	
• Central banks	1-5 yrs	1.5-2.5	6.5-7.5	1.5-2.0	1.0-3.0	8.0	3.0-4.0	1.0-2.0	3.0		
	5-10 yrs	3.0-4.0	8.0-9.0	3.0	3.0-5.0	10.0	5.0-6.0	3.0-4.0	5.0		
	>10 yrs	5.5	10.5	4.5-7.5	4.0-6.0	11.0	7.0	3.0-10.0	5.0-8.0		
• Local and regional governments	<1y	1.0	6.0	0.5-3.0	2.0	8.0	3.0	2.0-3.0		0.0	
	1-5 yrs	2.5-3.5	10.5-15.5	1.5-6.0	2.0	8.0	3.0-5.0	2.0-3.0			
• Agencies	5-10 yrs	4.5-5.5	18.0-19.5	3.0-8.0	4.0	10.0	7.0-10.0	4.0-5.0			
• Supranationals											
• Credit institutions (jumbo covered bonds)	>10 yrs	7.5	20.0	4.5-15.0	5.0-10.0	11.0-13.0	15.0	4.0-8.0			
• Credit institutions (covered bank bonds)	<1y	1.5	8.0	3.0-30.0	3.0-5.0	9.0	3.0	3.0-4.0		0.0	
	1-5 yrs	3.0-5.0	18.0-25.5	5.0-33.0	3.0-5.0	9.0	3.0-5.0	3.0			
• Nonfinancial corporations and other issuers	5-10 yrs	6.5-8.5	28.0-29.0	8.0-35.0	5.0-7.0	11.0	7.0-10.0	5.0			
	>10 yrs	11.0	29.5	10.0-42.0	6.0-8.0	12.0	15.0	5.0-8.0			
• Credit institutions (unsecured)	<1y	6.5	15.0	N/A	3.0-5.0	9.0	8.5	3.0-4.0		0.0	
	1-5 yrs	8.5-11.0	27.5-36.5		3.0-5.0	9.0	8.5-11.0	3.0			
• Financial corporations other than credit institutions	5-10 yrs	12.5-14.0	38.5-39.0		5.0-7.0	11.0	15.0-20.0	5.0			
	>10 yrs	17.0	39.5		6.0-8.0	12.0	35.0	5.0-10.0			
• Asset-backed securities	<1y	16.0	Not eligible	12.0-15.0	2.0-11.0		Not eligible	3.0		Not eligible	
	1-5 yrs			17.0-18.0	2.0-11.0			3.0			
	5-10 yrs			20.0	5.0-16.0			5.0			
	>10 yrs			22.0-27.0	8.0-18.0			5.0-8.0			

1) The Eurosystem haircuts have been updated (1 Oct 2013), but the haircuts of September 2013 have been kept for comparative reasons.
2) A haircut add-on is applied to allow for currency volatility when securities are non-sterling denominated.
3) Federal Reserve System haircuts apply to a “duration buckets” instead of “maturity buckets”. The stated margins apply to collateral pledged for discount window or payment system risk purposes. Other margins apply for other Federal Reserve System programmes.
4) A haircut for foreign exchange risk will be made if a security is issued in a currency other than Swedish krona.

3. MARKET IMPLICATIONS OF COLLATERAL RULES

While the primary purpose of central bank collateral rules is to avoid unnecessary risk to the public in monetary policy operations, it is important for central bankers to keep in mind that these rules can have implications for how various assets are priced in financial markets.

Eligibility for use as collateral with a central bank is a positive property for an asset to possess. It means that the asset can be easily used to obtain short-term funding that can address liquidity needs or purchase other assets. Moreover, unlike private repo markets, where terms and conditions tend to be unstable over time, the terms of central bank repo operations tend to be stable and predictable. These features can allow an asset that is itself illiquid, or perhaps only traded in illiquid markets, to be priced by financial markets closer to other assets that are innately more liquid.

Because a central bank's decision to allow an asset to be eligible collateral can confer a benefit on the issuer of the asset, there are strong arguments for having a collateral framework that is broad in nature, rather than one that provides a publicly-sanctioned benefit to a small number of issuers. In this sense, the ECB's broad approach is consistent with fairness and transparency.

That said, even with a broad collateral list, the *terms* on which the central bank chooses to provide credit can bestow special benefits on certain kinds of assets. In particular, relative to other assets, the ECB's treatment of sovereign bonds via low haircuts has consistently been more generous relative to market evaluations of risk. Low haircuts play a role in boosting bank demand for sovereign bonds because every euro spent on these bonds can translate into a larger amount of central bank funding. Alternatively, for any given amount of central bank funding, the use of assets that have lower haircuts results in the bank having a smaller "encumbrance" problem, meaning less of its assets will end up going to the Eurosystem in a wind-up situation and more going to creditors. A bank that is perceived as having a problem with encumbrance may end up having to pay more for market funding because creditors view themselves as being at greater risk.

Further boosting the demand from banks for sovereign bonds is the European Union's treatment of such bonds as risk-free in its Capital Requirements Directive. The ECB's operational procedures allow banks to operate a profitable carry trade in which balance sheets can be expanded with low interest ECB funding on the liability side and higher-yielding sovereign debt on the asset side. The CRD regulations allow this trade to be performed without increasing risk-weighted-assets, so it has no impact on the bank's riskiness as measured by its headline capital ratios.

Prior to the sovereign debt crisis, it was argued by Buiter and Sibert (2006) and others that the additional demand for European sovereign debt generated by the ECB's procedures and the EU's regulatory treatment were responsible for financial markets effectively pricing all European sovereign debt as though it was risk-free, despite substantial differences in underlying debt positions.

During the crisis, the fear of widespread default became the dominant factor influencing prices for sovereign debt in the euro area and large risk spreads on sovereign bonds emerged. However, with the ECB's Outright Monetary Transactions (OMT) programme having reduced fears of sovereign defaults, it seems likely that the operational and regulatory factors noted here are again acting to cause a compression of sovereign bond yields.

While these developments may be welcomed by taxpayers who are relieved to be paying lower interest on their public debt, there may be an important hidden cost, which is that

European banks are now funnelling larger amounts of depositor funds towards governments rather than households or businesses. Thus, these rules may be indirectly exacerbating the ongoing credit crunch in the euro area.

My preference would be for the ECB and EU to revise their implicit policies of encouraging European banks to purchase sovereign debt. These features weaken the policy frameworks of which they are a part (risk control in the case of the ECB's collateral framework and sound micro-prudential regulation on the part of the CRD) and strengthen the well-known vicious circle between banks and sovereigns. In their place, it would be better to have a framework in which both central bank haircuts and regulatory risk weights are closer aligned with market risk.

This may appear to be a relatively hard-line stance that ignores the ECB's role in maintaining financial stability. Two specific issues arise here.

First, if banks become less enthusiastic about purchasing European sovereign bonds, we may be more likely to see sovereign debt crises involving self-fulfilling expectations about default. The ECB's OMT programme is effectively a sovereign lender of last resort programme in which it is willing to lend to governments that it views as solvent provided they co-operate with a programme of measures designed to restore market confidence. I support the OMT programme as a necessary part of the euro area's policy architecture. Indeed, I believe it is best to remove policies that artificially boost the market for sovereign bonds so that, with an unbiased market view available, the ECB can implement OMT if it believes that market evaluations of sovereign risk are misplaced or causing financial stability problems.

Second, a stricter approach to haircuts for poorly-rated sovereign bonds raises the possibility that banks may run out of eligible collateral and this, in turn, raises the possibility of bank runs and financial system instability. This question – how to deal with banks that have run out of eligible collateral – is the subject of the final section of this paper.

4. THE ECB'S EXPERIENCE WITH ELA

In modern times, monetary policy is seen as the principal task of central banks and discussions about collateral policy generally relate to the conduct of regular open market operations designed to regulate the supply and cost of liquidity. However, in earlier times, the principal task of central banks was their role as a lender of last resort in times of crisis.

Indeed, perhaps the most famous discussion of collateral is Walter Bagehot's discussion of lender of last resort policy in *Lombard Street* (1873) – a discussion summarised by former Bank of England Deputy Governor Paul Tucker (2009) as

to avert panic, central banks should lend early and freely (i.e. without limit), to solvent firms, against good collateral, and at "high rates".

Tucker's speech noted that Bagehot was concerned that

the Bank of England should acknowledge its role in stemming panics, and set out its principles for doing so: "The Bank has never laid down any clear or sound policy on the subject."

Somewhat incredibly, this is exactly the situation the European Central Bank is in today. It has no clear or sound policy on how to stem panics. The reason for this is that despite its clear (though adjustable) policies on eligible collateral for monetary policy operations, the ECB has no clear procedures for dealing with banks that have used all of their eligible collateral but that still wish to borrow from the Eurosystem. This position is unsatisfactory and has been very damaging to the reputation of the ECB.

In this section, I briefly outline what is known about the Eurosystem's ELA procedures and then discuss three examples of where ELA has been used.

4.1. The Eurosystem's ELA Procedures

Banks can still receive credit from the Eurosystem using non-eligible collateral. These loans are called Emergency Liquidity Assistance (ELA). Despite the existence of numerous ELA programmes in the Eurosystem since 2008, the ECB Governing Council has been extremely tight-lipped in its discussions of these programmes. Only in October 2013 did the Governing Council provide an official description of how ELA programmes work and this description is quite terse.²

Based on this description and other sources, my understanding is that ELA programmes operate as follows.

- ELA is not a Eurosystem programme. It can be issued by any NCB without consulting the ECB Governing Council.
- However, procedures exist that require any NCB issuing ELA to inform the ECB within two business days after the operation is carried out and provide detailed information on the nature of the lending, including the collateral pledged.
- The ECB Governing Council can decide, via a two-thirds majority vote that ELA operations interfere with the objectives and tasks of the Eurosystem. After such a vote, the Governing Council can order the NCB to restrict its ELA programme.

² This document can be found at

https://www.ecb.europa.eu/pub/pdf/other/201402_elaprocedures.en.pdf?e716d1d560392b10142724f50c6bf66a

- Unlike regular Eurosystem liquidity-providing operations, all risk associated with ELA falls on the central bank that grants the loans.

These rules are pretty vague. They don't describe the circumstances under which the ECB considers ELA to be appropriate nor do they make clear the criteria by which the ECB arrives at a decision that an ELA programme "interferes with the objectives and tasks of the Eurosystem." In general, vague rules lead to confusion and controversy and this is exactly what has happened in recent years.

4.2. Three Examples of ELA Programmes

Here, I briefly discuss three examples of Eurosystem ELA programmes from recent years. In each case, arbitrary (or at least secret) criteria have been used to decide on when such programmes can be allowed or curtailed.

Ireland

From the beginning of Ireland's banking crisis in late 2008, it was clear that Anglo Irish Bank, which had specialised in commercial property lending, was in serious trouble. The bank was nationalised in early 2009 and was suffering from substantial deposit withdrawals when the Central Bank of Ireland agreed in March 2009 to provide it with €11.5 billion in ELA. As the sovereign debt crisis intensified through 2010, the pace of deposit withdrawals from Anglo Irish intensified and its ELA borrowings moved up sharply. See Figure 3 for a graph of regular Eurosystem lending as well as ELA to the six Irish banks that had been provided with a near-blanket liability guarantee by the Irish government in September 2008.

Over the course of 2010, the other main Irish banks also came under pressure from deposit outflows. The September 2008 guarantee had been put in place for two years and the covered banks had issued a large amount of bonds that matured prior to September 2010. As September 2010 came and went, they failed to find new sources of private sector funding. Thus, these banks increased their reliance on ECB funding and eventually also applied for ELA.³

ECB officials had spent much of 2010 publicly discussing their plans to implement an "exit strategy" from their fixed-rate full allotment policy. The developments at Ireland's banks were clearly working against this plan. In September 2010, ECB officials including Jean-Claude Trichet began making public statements about their unhappiness with (unnamed) "addict banks" that were reliant on Eurosystem funding.⁴

Based on the recent release of letters by the ECB, we know now that Jean-Claude Trichet sent a letter to Ireland's Finance minister, Brian Lenihan, on October 15, 2010 which warned⁵

I would like to re-emphasize that the current large provision of liquidity by the Eurosystem and the Central Bank of Ireland to entities such as Anglo Irish Bank should not be taken for granted as a long-term solution. Given these principles, the

³ See Whelan (2014) for a more detailed discussion of Ireland's banking crisis.

⁴ See for example, the Financial Times article from September 13, 2010 "Fears grow over banks addicted to ECB funding"

<http://www.ft.com/intl/cms/s/0/580109dc-bf43-11df-a789-00144feab49a.html>

⁵ This letter is available at https://www.ecb.europa.eu/press/shared/pdf/2010-10-15_Letter_ECB_President_to_IE_FinMin.pdf?05f2367e74897b4aa2641f31d639d1c3

Governing Council cannot commit to maintaining the size of its funding to these institutions on a permanent basis.

By November 2010, total Eurosystem funding for the Irish banks had reached about €140 billion which was around 85% of Irish GDP and almost a quarter of total Eurosystem lending. At this point, the ECB played a crucial role in Ireland's application for a bailout from the EU and IMF. Jean-Claude Trichet sent a letter to Brian Lenihan threatening to cut off ELA funding unless the Irish government submitted a formal request to the EU for an adjustment programme.⁶ The specific wording of this part of the letter was as follows.

It is the position of the Governing Council that it is only if we receive in writing a commitment from the Irish government vis-a-vis the Eurosystem on the four following points that we can authorise further provisions of ELA to Irish financial institutions:

- 1) The Irish government shall send a request for financial support to the Eurogroup;*
- 2) The request shall include the commitment to undertake decisive actions in the areas of fiscal consolidation, structural reforms and financial sector restructuring, in agreement with the European Commission, the International Monetary Fund and the ECB;*
- 3) The plan for the restructuring of the Irish financial sector shall include the provision of the necessary capital to those Irish banks needing it and will be funded by the financial resources provided at the European and international level to the Irish government as well as by financial means currently available to the Irish government, including existing cash reserves of the Irish government;*
- 4) The repayment of the funds provided in the form of ELA shall be fully guaranteed by the Irish government, which would ensure the payment of immediate compensation to the Central Bank of Ireland in the event of missed payments on the side of the recipient institutions.*

Ireland applied for financial assistance and its EU-IMF bailout programme began in late 2010. Deposits continued to flow out of the Irish banking system for a number of months and ELA actually increased significantly over those months, from €43 billion in November 2010 to €68 billion in February 2012. However, the banking system began to stabilise after the release of official stress tests and a large recapitalisation. Ireland's ELA programme ended in February 2013 when Anglo's successor organisation, the Irish Bank Resolution Corporation was put into liquidation.

The ECB's actions in relation to its interactions with the Irish banking system raise many questions.

- Given the size of the emerging solvency problem at Anglo Irish Bank in Spring 2010, why did the Governing Council approve such a large initial ELA programme?
- If the ECB were relying on the Irish state's backing for Anglo as reassurance that the bank's solvency would be maintained, at what point did doubts about the state's ability to provide this assistance emerge?
- If the solvency of the Irish banks was required for continuing ELA programmes, why did the ECB not limit itself to a demand for recapitalisation of these banks? Almost certainly, the Irish government would have had to apply for an official programme

⁶ The November letter from Trichet to Lenihan is available at https://www.ecb.europa.eu/press/shared/pdf/2010-11-19_Letter_ECB_President_to%20IE_FinMin.pdf?83824135ba733b6091e930d3a25314c9

to meet this demand. But why not let the government make this decision instead of insisting on “decisive actions in the areas of fiscal consolidation, structural reforms”? Where in the ECB’s mandate is its right to demand fiscal consolidation and structural reforms as a condition to supply funding to individual banks?

Mario Draghi deserves credit for releasing these letters. However, the ECB’s response to the release has completely avoided the important questions about ELA programmes that the letters raise.

Cyprus

If anything, the ECB’s role in providing and subsequently restricting ELA to banks in Cyprus is even more murky and problematic.

While the situation with Cyprus’s two largest banks became known to the wider European public in March 2013, it was clear to closer observers from early 2012 that these banks were in severe difficulties. Due to ill-advised purchases of Greek government bonds, poorly-timed expansions into the Greek market and a weakening Cypriot economy, both Bank of Cyprus (BoC) and Laiki Bank were effectively insolvent from early 2011 onwards.

The restructuring of Greek sovereign bonds sharply reduced Laiki’s stock of assets that could be used as collateral for regular Eurosystem monetary policy operations. In October 2011, Laiki applied to the Central Bank of Cyprus (CBC) for emergency liquidity assistance (ELA) which is a form of central bank funding on non-standard terms. By November 2011, Laiki had €2.5 billion in ELA funding from the CBC and the amount of this funding increased significantly over the first seven months of 2012.

Because no other bank in Cyprus appears to have been receiving ELA at the time, we can track the evolution of Laiki’s ELA in late 2011 and 2012 using publicly-available information on the CBC’s balance sheet. This balance sheet recorded ELA under the heading “Other Assets” until April 2013 when it began recording it under “Other Claims”. (There have been some small other items recorded under these entries but they are tiny relative to the ELA funding.)

In February 2012, the European Banking Authority (EBA) communicated that Laiki needed a recapitalisation of €1.97 billion while BoC required €1.56 billion. The government of Cyprus was effectively shut out of the sovereign bond market at this point and against a background of a worsening economy, it was not possible for BoC and Laiki to raise the private investment required to meet the EBA’s core equity requirements by June 2012.

In May 2012, the government of Cyprus agreed to underwrite a €1.8 billion capital raising exercise for Laiki. On June 25, 2012, Fitch became the final ratings agency to downgrade Cyprus to below investment-grade. On the same day, the government of Cyprus submitted an application for financial assistance from the Eurozone’s bailout funds. Two days later, BoC requested state aid of €500 million to allow it to meet its EBA core equity requirements.

During the period following the application for financial assistance and the final agreement on this assistance in March 2013, the capital position of the Cypriot banks continued to worsen. BoC booked new provisions for bad loans of €2.3 billion in 2012 and by the end of the year, the bank was insolvent with core equity of minus €407 million. The EBA assessed Laiki’s accounts again in June 2012 and found an additional capital shortfall of €1.1 billion. Laiki did not publish year-end accounts for 2012 but their final published results for the first

nine months of the year showed an additional €1.67 billion in losses, again leaving the bank on the brink of balance sheet insolvency.

As information circulated on Laiki's capital shortfall and its failure to obtain any private equity, deposit outflows increased, particularly at its Greek branches. The CBC's "Other Claims" series shows an increase from €3.9 billion in April 2012 to €5.9 billion in May 2012 and €8.2 billion in June 2012. (See Figure 4 for a graph of lending from the Central Bank of Cyprus).

The increase in ELA in May 2012 reflected deposit outflows. The June increase, however, also reflected decisions by the ECB that further reduced Laiki's ability to take part in normal Eurosystem operations. Its Greek covered bonds were downgraded and deemed ineligible as collateral while Fitch's downgrade of Cypriot government bonds led to these bonds also being taken off the ECB's collateral list. As a result of these decisions, regular Eurosystem lending by the CBC declined by €1 billion in June 2012.

In July 2012, the ECB removed Laiki from its list of eligible counterparties due to concerns about its solvency, a decision that it can take on the basis of the rules governing its risk control framework. By the end of July 2012, Laiki had no regular Eurosystem funding and its ELA was about €9.6 billion. This seems to have been about as much ELA as the Eurosystem was willing to lend the bank. The former Governor of the CBC, Panicos Demetriades, has explained that "after the Eurogroup of 21 January 2013, Laiki Bank's ability to raise emergency liquidity reached a plateau due to the reduction in the value of its available collateral."⁷

After a long period of delay, which included an election in February 2013, a financial assistance package for Cyprus was agreed in March under extremely stressed circumstances.

At a meeting of the Eurogroup of finance ministers that ended in the early hours of March 16, the ECB's representative Jörg Asmussen stated that the Governing Council was unwilling to continue authorising ELA to Cypriot banks unless these banks were restored to solvency by the end of March via writing down the value of customer deposits. It had been established by this point that the euro area member states and the IMF were only willing to provide €10 billion in funding which meant there was not enough money available to finance Cyprus's fiscal deficits and sovereign bond rollovers and also recapitalise its banks.

The final deal that was agreed with the Cypriot government required that the large amounts of ELA provided to the insolvent banks and deposits at Greek branches of the Cypriot banks be repaid in full: These requirements greatly increased the size of the "haircut" for depositors with the Cypriot banks. Laiki Bank was wound down and the large amount of ELA owed by Laiki was transferred to BoC.

While the deposit write-downs restored BoC to solvency, the ECB then placed hard limits on the amount of Eurosystem funding for this bank. This refusal to provide further funding for the bank has been a key factor in the continued extension of capital controls that are preventing people from transferring their money out of banks in Cyprus to elsewhere in the EU. These controls violate the principle of free movement of capital that is intended to be a pillar of the single European market.

The ECB's decisions in relation to the Cypriot banks raise a number of questions

- Did the ECB realise that Laiki was heading towards being highly insolvent when it provided it with ELA in late 2011?

⁷ Introductory statement before the Investigation Committee on the Economy, 13 August 2013. http://www.centralbank.gov.cy/nqcontent.cfm?a_id=12928&lang=en

- As the ECB provided more funds to Laiki in 2012, were they assuming the Cypriot government would provide the money that would restore the bank to solvency? In the end, the government did not have the capacity to do this.
- On what grounds did the ECB delay its demand for a recapitalisation of the Cypriot banks until after the 2013 election?
- At what point did ECB and the European authorities decide that the recapitalisation in Cyprus should take place via deposit write-downs?
- Why did the wind-down of Laiki bank not see the Central Bank of Cyprus take the underlying collateral that had been pledged? In other words, why was Laiki's ELA transferred to be the responsibility of another bank?
- Did the ECB play a role in the decision to limit deposit write-downs to customers in Cyprus while leaving depositors in Greece protected?
- Given that Bank of Cyprus is now solvent, why does the ECB continue to place limits on its ELA funding, limits that have the repercussion of keeping international capital controls in place?

It is to be hoped that, as with the Irish case, the ECB will also release documents that will explain its actions in Cyprus. I suspect, however, we may be waiting a long time for such a release.

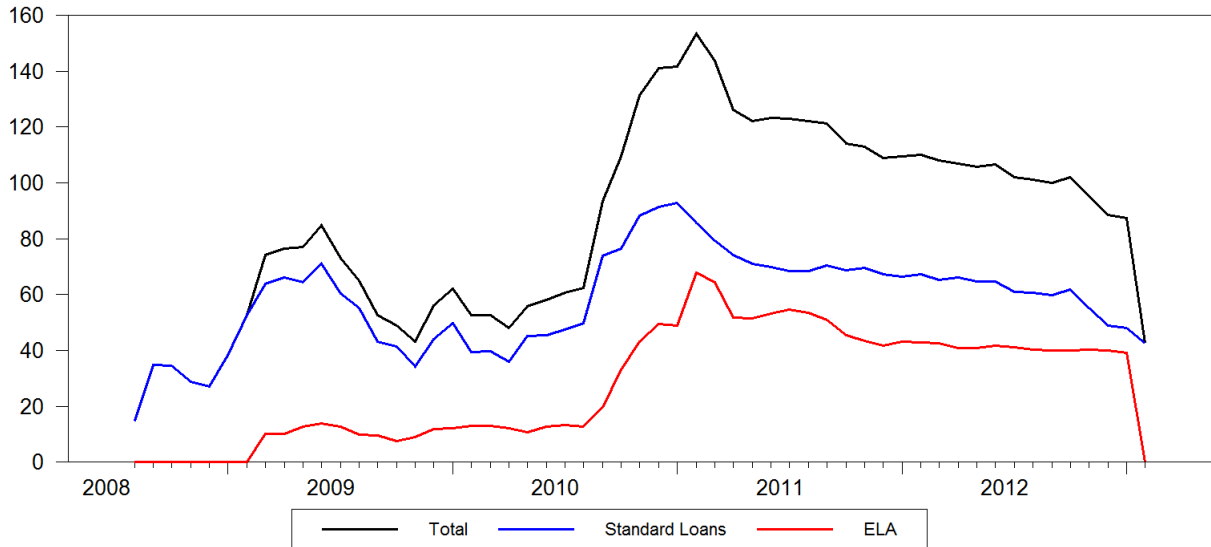
Greece

A consistent theme of the Greek debt crisis was the ECB's regular threats (either implicit or explicit) to withdraw funding from the Greek banking system and thus trigger a full-scale banking crisis. Greek government bonds were regularly withdrawn and then added again to the eligible collateral list and while they were withdrawn, the Greek banks relied on Emergency Liquidity Assistance from the Bank of Greece.

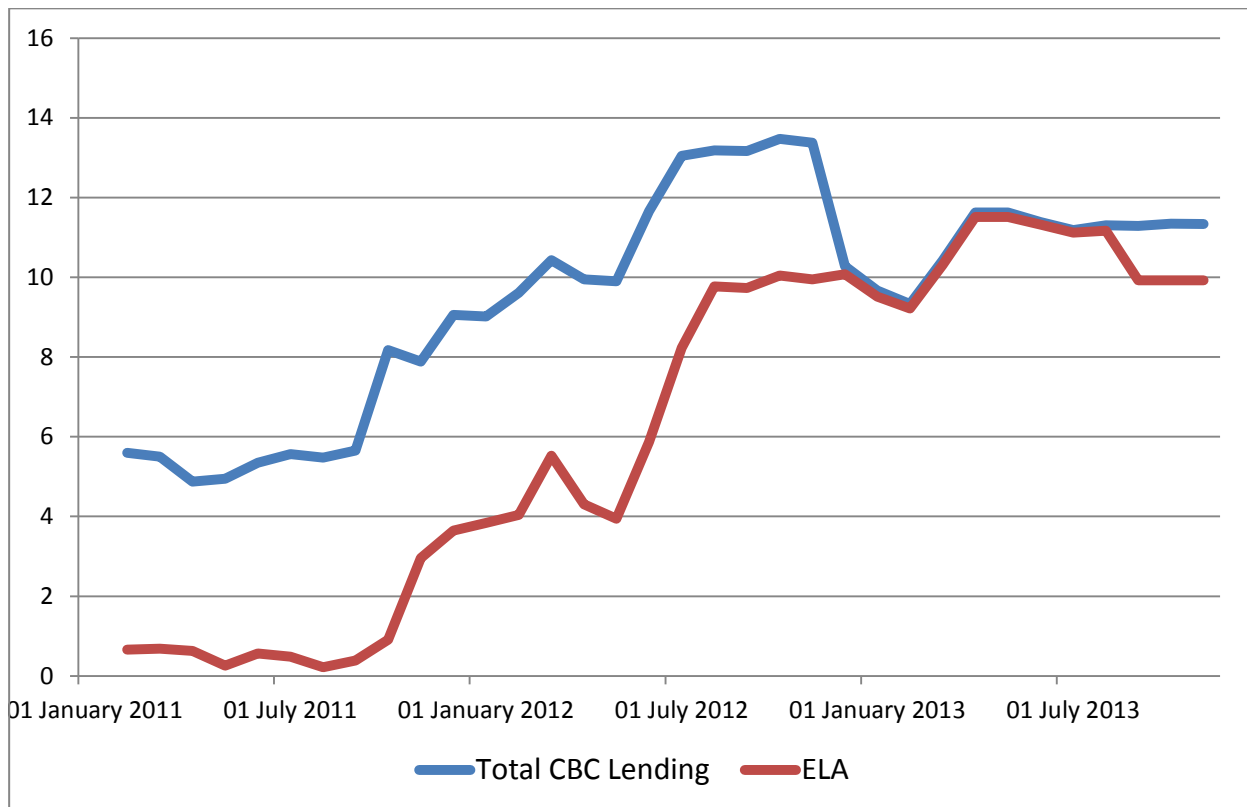
These ELA programmes were constantly reviewed by the ECB Governing Council and could be cancelled at short notice if the Council decided. It was this power to threaten the Greek banking system (rather than legal issues relating to monetary financing) that lay behind the ECB's ability to carry through on its refusal to participate in the debt restructuring that took place in 2012.

**Figure 3: Central Bank Lending to Irish Banks from 2010 to February 2013
(Billions of Euro) Source: Central Bank of Ireland**

Note: The chart relates to the six banks guaranteed by the Irish government in 2008.



**Figure 4: Lending by Central Bank of Cyprus from 2011 to October 2013
(Billions of Euro) Source: Central Bank of Cyprus**



5. THE EUROSISTEM'S FUTURE AS A LENDER OF LAST RESORT: A PROPOSAL

Central banks were put on this earth to be lenders of last resort. Dealing with complex situations in which banks are running out of liquidity and may or may not be solvent should be a core part of every central bank's tasks. The ECB, however, does not seem ready to undertake this role in a coherent and comprehensive manner.

Consider this recent ECB statement in response to New York Times story that revealed leaked minutes of the ECB's discussion of the Cypriot banking situation.⁸

The ECB neither provides nor approves emergency liquidity assistance. It is the national central bank, in this case the Central Bank of Cyprus, that provides ELA to an institution that it judges to be solvent at its own risks and under its own terms and conditions. The ECB can object on monetary policy grounds; in order to do so at least two thirds of the Governing Council must see the provision of emergency liquidity as interfering with the tasks and objectives of euro area monetary policy.

So the ECB's official line is that it doesn't provide or approve ELA but also that it sort of does. This is a recipe for the kinds of incoherent policy that we have seen in recent years.

Now is a very good time to develop a completely new approach for the ECB as lender of last resort. The ECB has taken over as the supervisor of the euro area's banks. This removes most of the previous arguments that were in place for the current system of ELA provision. Previously, banks were overseen by national supervisors. As such, it could be argued that those banks that got into trouble and required ELA were the responsibility of national central banks and that the risk associated with lending to these banks should be borne at a national level.

This point no longer holds. Once all of the euro area's banks have complied with the capital raising requirements from the comprehensive assessment, then they will all have an official diagnosis of good health from the ECB. If further problems arise, they should be considered the joint responsibility of all central banks in the Eurosystem.

For this reasons, I believe it is time to change the system in which lending against eligible collateral is a Eurosystem concern while ELA is a national concern. The ECB should be required to approve each and every ELA programme and have the risk shared among the Eurosystem. As an independent regulator, the ECB should also be in a position to assess whether the liquidity problems for a bank applying for ELA reflect temporary problems or else reflect deeper structural issues (it is usually the latter). This should help with speeding up the process of restructuring problem banks, via recapitalisation or bail-in. A speedier response of this sort would help to avoid a repeat of long-term ELA programmes in which Eurosystem funding is used to allow private creditors to gradually get their money safely out of insolvent banks.

Of course, this proposal will mean the ECB will have to take on more explicit responsibility for dealing with financial instability. But the two-thirds majority voting on ELA at Governing Council has already meant that the ECB is effectively taking on this responsibility already.

One complication with this proposal is that many of the NCBs have been given a financial stability responsibility to provide emergency lending to banks that is enshrined in national law. I would argue that the ECB should establish a protocol that all ELA programmes are centrally approved and subsequently request amendments to national central bank legislation if this is required.

⁸ The ECB statement can be found at http://www.ecb.europa.eu/press/pr/date/2014/html/pr141017_1.en.html

REFERENCES

- Buiter, Willem and Anne Sibert (2006). "How the Eurosystem's open-market operations weaken financial market discipline (and what to do about it)," in *Fiscal Policy and the Road to the Euro*, National Bank of Poland, Warsaw.
- European Central Bank (2013). "The Eurosystem Collateral Framework throughout the Crisis", *ECB Monthly Bulletin*, July.
- European Central Bank (2014). Collateral eligibility and Availability: Follow-up to the report on "Collateral eligibility requirements – a comparative study across specific frameworks". July.
- Tucker, Paul (2009). "The repertoire of official sector interventions in the financial system – last resort lending, market-making, and capital." Remarks at the Bank of Japan 2009 International Conference "Financial System and Monetary Policy: Implementation", Bank of Japan, Tokyo, 27-28 May 2009. Available at <http://www.bis.org/review/r090608c.pdf>
- Whelan, Karl (2014). "Ireland's Economic Crisis: The Good, the Bad and the Ugly, » *Journal of Macroeconomics*, Volume 39, Part B, pages 424-440.