Policy efficacy in the crisis, exit strategies and the return of growth

E Philip Davis and Dilruba Karim
NIESR and Brunel University
June 2010
Introduction

- Main focus of the work is on central bank policies, although we also comment on certain structural and regulatory policies, and on macro/financial linkages in the UK.
- Presentation in four sections
  - (1) issues in the run up to the crisis
  - (2) policy efficacy in crisis itself
  - (3) exit strategies
  - (4) scope for return to growth, focusing on the housing market and the banking sector.
Policy in the run up to the crisis (1)

- Some suggestions the authorities should have “leant into the wind” during the credit and asset-price bubbles, to limit their amplitude and reduce UK economy’s vulnerability (Wadhwani (2008) argues Swedish Riksbank successful)
- Did monetary policy contribute to the crash in house prices via loose monetary policy, which drove them above equilibrium levels (by 30% according to NIESR)?
- Counterargument is that bubble was a consequence of misguided expectations of growing prosperity in the wider population, possibly also linked to loose fiscal policy, (Davis 2010)
Policy in the run up to the crisis (2)

- Major difficulty was in macroprudential policy, not acting on crisis risks pre August 2007, and to some extent underestimating them up to Lehmans failure

- Tucker (2008), “perhaps with hindsight, it is baffling that the authorities internationally contented themselves with issuing warnings”.

- Barrell et al (2010a) model depicted here relates crisis risk in OECD countries to unweighted capital adequacy ratio (LEV), liquidity of banks (LIQ), real house price growth (RHPG) and current balance/GDP (CBR)

**Table 7A: Equation estimated over 1980-2003**

<table>
<thead>
<tr>
<th>Variable</th>
<th>Coefficient</th>
<th>z-Statistic</th>
</tr>
</thead>
<tbody>
<tr>
<td>LEV(-1)</td>
<td>-0.48</td>
<td>-4.1</td>
</tr>
<tr>
<td>NLIQ(-1)</td>
<td>-0.097</td>
<td>-2.5</td>
</tr>
<tr>
<td>RHPG(-3)</td>
<td>0.08</td>
<td>2.1</td>
</tr>
<tr>
<td>CBR(-2)</td>
<td>-0.43</td>
<td>-2.9</td>
</tr>
</tbody>
</table>

**Table 7B: In-sample model performance based on correct calls**

<table>
<thead>
<tr>
<th></th>
<th>Dep=0</th>
<th>Dep=1</th>
<th>Total</th>
</tr>
</thead>
<tbody>
<tr>
<td>P(Dep=1)&lt;=C</td>
<td>209</td>
<td>3</td>
<td>212</td>
</tr>
<tr>
<td>P(Dep=1)&gt;C</td>
<td>73</td>
<td>9</td>
<td>82</td>
</tr>
<tr>
<td>Total</td>
<td>282</td>
<td>12</td>
<td>294</td>
</tr>
<tr>
<td>Correct</td>
<td>209</td>
<td>9</td>
<td>218</td>
</tr>
<tr>
<td>% Correct</td>
<td>74.11</td>
<td>75.00</td>
<td>74.15</td>
</tr>
<tr>
<td>% Incorrect</td>
<td>25.89</td>
<td>25.00</td>
<td>25.85</td>
</tr>
</tbody>
</table>
Policy in the run up to the crisis (3)

Probabilities of crisis based on the model (%) (bold figures above sample mean)

<table>
<thead>
<tr>
<th>Country</th>
<th>2004</th>
<th>2005</th>
<th>2006</th>
<th>2007</th>
<th>2008</th>
</tr>
</thead>
<tbody>
<tr>
<td>Belgium</td>
<td>0.3</td>
<td>0.8</td>
<td>1.5</td>
<td>3.1</td>
<td>4.3</td>
</tr>
<tr>
<td>Canada</td>
<td>1.4</td>
<td>2.1</td>
<td>1.5</td>
<td>1.9</td>
<td>2.3</td>
</tr>
<tr>
<td>Denmark</td>
<td>2.1</td>
<td>1.3</td>
<td>2.0</td>
<td>1.1</td>
<td>5.1</td>
</tr>
<tr>
<td>Finland</td>
<td>0.0</td>
<td>0.1</td>
<td>0.1</td>
<td>0.2</td>
<td>0.2</td>
</tr>
<tr>
<td>France</td>
<td>1.9</td>
<td>3.4</td>
<td>7.2</td>
<td>15.4</td>
<td>18.0</td>
</tr>
<tr>
<td>Germany</td>
<td>1.0</td>
<td>1.3</td>
<td>0.3</td>
<td>0.3</td>
<td>0.3</td>
</tr>
<tr>
<td>Italy</td>
<td>1.6</td>
<td>2.6</td>
<td>2.1</td>
<td>3.7</td>
<td>1.3</td>
</tr>
<tr>
<td>Japan</td>
<td>0.2</td>
<td>0.1</td>
<td>0.0</td>
<td>0.1</td>
<td>0.1</td>
</tr>
<tr>
<td>Netherlands</td>
<td>4.7</td>
<td>1.3</td>
<td>0.7</td>
<td>0.7</td>
<td>0.2</td>
</tr>
<tr>
<td>Norway</td>
<td>0.1</td>
<td>0.1</td>
<td>0.1</td>
<td>0.0</td>
<td>0.0</td>
</tr>
<tr>
<td>Sweden</td>
<td>0.5</td>
<td>0.1</td>
<td>0.3</td>
<td>0.3</td>
<td>0.2</td>
</tr>
<tr>
<td>Spain</td>
<td>3.3</td>
<td>6.6</td>
<td>23.2</td>
<td>53.1</td>
<td>63.7</td>
</tr>
<tr>
<td>UK</td>
<td>7.7</td>
<td>14.2</td>
<td>21.7</td>
<td>22.8</td>
<td>22.9</td>
</tr>
<tr>
<td>US</td>
<td>7.0</td>
<td>4.2</td>
<td>5.2</td>
<td>6.9</td>
<td>9.1</td>
</tr>
</tbody>
</table>

Rising UK risk well ahead of 2008...but not clear monetary policy alone could have offset unless via house prices – highlights need for complementary countercyclical macroprudential policy operating on capital and liquidity.
Easing policies during the crisis (1)

- Switch from pure inflation targeting was appropriate, but based on second break, realisation of the risk of crisis-driven recession possibly too late, with high interest rates in early 2008 to combat inflation deepening the recession.
- May link to underestimation of probability and impact of severe financial tensions on the economy, even in advance of the Lehmans.
- Policy of low interest rates since 2008 appropriate given size of output gap and financial tensions.
Easing policies during the crisis (2)

- Period up to Northern Rock marked by primary concern about moral hazard from \textit{liquidity support}, possibly linked to underestimation of macroprudential risk, and information flows from FSA to Bank.
- After, interbank market problems countered by massive provision of sterilised liquidity at longer maturities, reducing bank failure risk.
- Asset swaps via special liquidity scheme (SLS) and widening range of collateral via Long Term Repos; contained financial system stress by providing financing against illiquid securities (Tucker 2009) and prevented fire sale of illiquid ABS.
Easing policies during the crisis (3)

- Northern Rock episode showed difficulties of public relations handling for a retail bank in difficulties, as well as stigma problem of **Lender of Last Resort**
- Stigma problem after Northern Rock addressed via SLS and operational standing facilities
- Emergency lending in October 2008 kept confidential, also benefiting from a fiscal backup
- Lehmans exposed problem of global pools of liquidity for LCFIs
- Linking to liquidity policy, longer term and lower quality collateral pose challenges to traditional Bagehot doctrine – closer to Euro model
Easing policies during the crisis (4)

- Following Lehman's, need for further easing, initially by cutting rates close to zero.
- In such cases, four options to further increase monetary stimulus (Klyuev et al 2009):
  - Commit to maintaining low short rates, to prevent deflation and encourage recovery
  - Enhance liquidity provision beyond traditional liquidity and LOLR as set out above, sterilised
  - Buying long term government bonds unsterilised to affect the long rate and hence private borrowing rates, albeit not spreads (problem market risk)
  - Buying private sector assets with a view to directly improving credit market conditions, unsterilised (problem credit risk)
Easing policies during the crisis (4)

- **Quantitative easing** led Bank of England via OBS vehicle to purchase assets from non banks as well as banks (14% of GDP)

- Holds significant proportion of government bonds, complemented by bank deposits on liability side. Claim QE restrained long term interest rates of around 100 bp (Dale 2010).

- Contrast with US where more private assets were purchased – despite HMT guarantee. UK claim indirect stimulus to asset demand as non-banks bought equities and private bonds instead of gilts.

- In Eurozone (Reichlin 2010) QE considered to have operated through effect on money market spreads, in US Reis (2010) saw little effect on long rates.
Easing policies during the crisis (6)

- Did UK miss opportunity to influence more strongly spreads and credit availability to private sector? e.g. “directly improving market liquidity and lowering spreads” (Meier 2009). Little evidence banks on-lent reserves created.

- Barrell and Holland (2010) suggest impact could have been 1% instead of 0.5% in 2009 if ¼ devoted to “credit easing” as permitted, highlighting greater spread narrowing for BAA over Treasuries in US than UK and attributing this to credit easing.

- Counter argument (Miles 2010, Dale 2010) that UK corporate spreads have narrowed, yields lower, bond issuance high and LIBOR lower – also issue of counterfactual since this was global trend.
Exit strategies (1)

- Current market expectations are for gradual **renormalisation of short rates**
- Current inflationary pressures are partly temporary, e.g. due to rise in VAT, but underlying inflation pressures likely to rise in medium term, especially if fiscal policy not tightened sufficiently or output gap overestimated (OBR forecast suggests could be so)
- Need for balance with the risk of double dip recession
- For **liquidity provision**, successful closure of SLS shows natural wind-down of short term operations as interbank markets revive
Exit strategies (3)

- Doubtful can return to tradition of requiring high quality collateral at short maturities from sound institutions (Goodhart 2009) – hence need to consider pricing of “liquidity insurance” central bank provides – calibration of bank rescue fund?
- Broader issues:
  - Use of wholesale funding, which central bank liquidity replaced – are the banks’ strategies sufficiently adjusted?
  - Can securitisation recover – are further reforms needed?
  - Can banks be obliged to hold pools of liquidity in every host jurisdiction?
  - What is likely impact of FSA’s new liquidity regime – can it successfully oblige banks both to rebuild liquidity and reduce reliance on wholesale funding?
Exit strategies (4)

- Are current regulatory plans sufficient to prevent a recurrence of **bank support**, given expectations generated by rescue?
- Bias in crisis to large banks which “herded” (Haldane 2010) - impact of “Too Big To Fail” in UK from support rating differential – “banking pollution”
- UK sees need for structural measures. Set up Banking Commission to consider structural policy
- Could the new bank rescue fund reduce moral hazard – or does it potentially increase it?
- See also “reward of failure” for Lloyds in overruling competition authorities – need for further investigation
Exit strategies (6)

- Current expectations are for Bank to terminate the **quantitative easing** policy in early 2011.
- Will reduce banks’ reserves and may raise long rates somewhat - but impact on long rates likely to be dominated by perceptions of the plan for fiscal tightening – while new FSA liquidity policy will make banks natural “home” for excess gilts.
- Access to credit for small firms and households remains constrained despite ongoing QE – will its conclusion aggravate situation?
- Will Bank of England possibly hold some “excess” securities to maturity to avoid market risk and boost to yields?
In the **housing market**, despite house price falls, evidence house prices remain overvalued, and more correction may be observed.

Very slow growth in mortgage lending since Lehmans, as households rebuild balance sheets, spreads wider and loss of lending capacity due to loss of smaller lenders and securitisation - also possible further rise in unemployment.

Lower house prices give rise to negative wealth effect and collateral effect restricting consumption.

Hence housing market likely to be a brake on recovery.
Scope for return to growth (2)

- **Banking sector problems** transmit to other real activities in the economy as credit rationing make it harder for businesses to secure funding especially SMEs that find it hard to substitute bank with non-bank funding. These may impact on investment. Number of sources of ongoing difficulties:
  - (1) Ongoing uncertainty over reform of banking structure, limiting institutional size and activity
  - (2) UK banks exposures to commercial property - £250 billion and half of all lending to companies index 35% below peak, average LTVs over 100% - significant potential losses when rollover due, so possible second round of credit tightening and capital shortages
(3) Banks have been relying on short-term debt funding, preferring to substitute historically costly longer-maturity debt with cheaper central bank funding.

Short term difficulty as LIBOR spreads in the UK and US have become more positive since end-2009, reflecting Euro area fiscal concerns.

Long term problems with this strategy may emerge as considerable short-term debt is due to mature over the next five years and refinancing will be costlier, especially as emergency measures are unwound.
Scope for return to growth (4)

- (4) Global recognition of need for higher capital and liquidity – being discussed in various fora
- Barrell et al (2010b) suggest a rise of 4 pcp, and possibly more in the UK could be warranted. UK banks argue a sharp increase in capital adequacy will tighten credit and abort recovery
- Barrell et al (2009) suggests that a credit crunch will only arise if there is immediate application of higher capital requirements, given effect of capital “headroom” on corporate spreads. More gradual increase in capital requirements will have modest effect on GDP largely via cost of capital and impact on stock of capital
Conclusion

- In the run up to the crisis, key underlying issue is that macroprudential surveillance didn’t predict the depth of the crisis, and although some concerns were expressed, no policy action was taken (partly reflecting lack of macroprudential levers).

- During the crisis, interest rate easing may be been delayed unduly, while the quantitative easing policy could have been more effective had it focused on private sector assets, and the bank rescue strategies focused too little on the implications for competition.
Conclusions

• Exit strategies are still in the offing but it is essential they be well-designed to avoid risks of inflation and moral hazard on the one hand, and renewed recession and credit rationing on the other.

• Successful return to growth requires financial sector and economy to function well together, e.g. in respect of the housing market, investment and banking/financial market conditions, including impact of likely regulatory reforms.

• Some potential difficulties, including ongoing overvaluation of house prices, banks’ potential losses on commercial property and economic impact of regulatory tightening.