



1: Global Environment and Risks



Bank of England International Directorate

Global Environment and Risks September 2015

Summary of asset price movements since Jul FSR and Aug IR

| | Change since | | | Change since | |
|---------------------|-----------------------------|------------------------------|-----------------|-----------------------------|------------------------------|
| | IR (6 th Aug) | FSR (1 st Jul) | | IR (6 th Aug) | FSR (1 st Jul) |
| Shanghai composite | -23% | -36% | S&P 500 | -5.4% | -5.3% |
| MSCI EM equities | -10% | -17% | FTSE All share | -6.6% | -7.3% |
| RMB/USD | 3.16% | 3.19% | \$ERI | 1% | 4% |
| G20 (ex. China)/USD | -5% | -9% | VIX | 13pp | 12pp |
| Brent crude oil | 1% | -15% | UST 10 year | -8bp | -18bp |
| Industrial metals | -4% | -11% | Germany 10 year | 6bp | -9bp |
| EM HY spread | 82bp | 115bp | US HY spread | 53bp | 107bp |

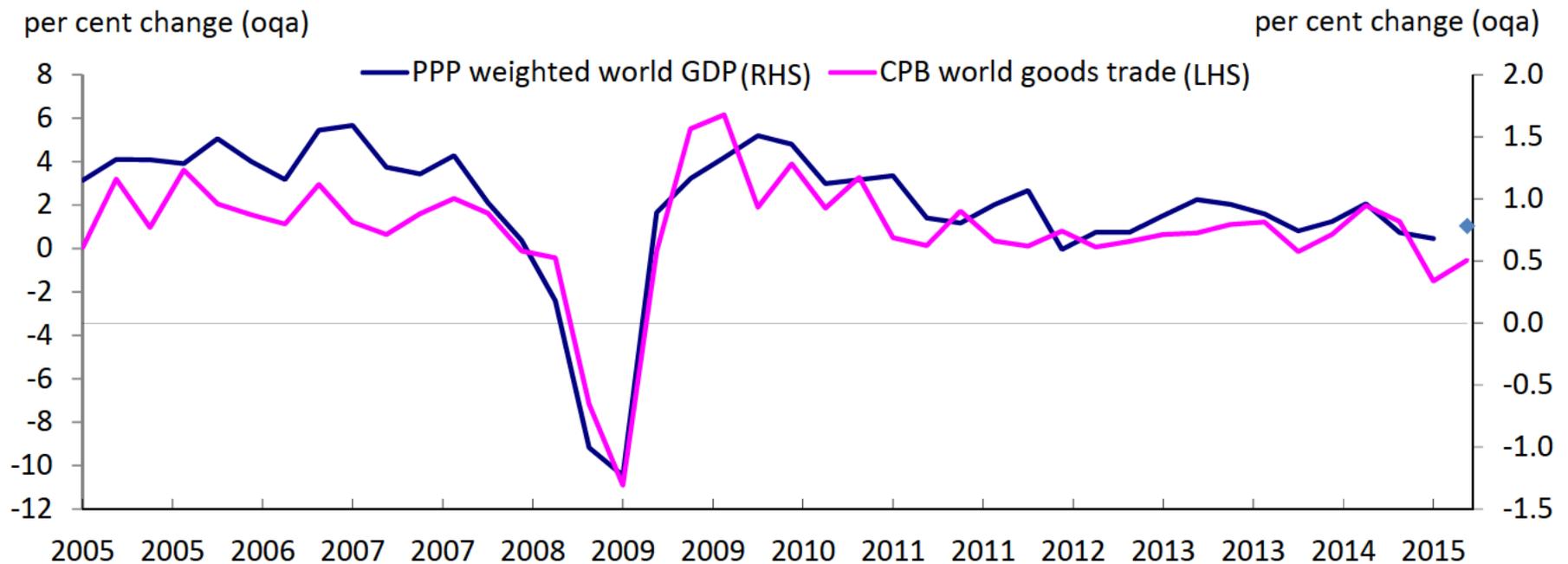
China road map

- **Developments in China and implications for...Global economy**
- ...Asset prices
- ...UK bank credit and funding conditions
- ...UK real economy
- ...Individual UK institutions
- ...UK inflation

This presentation

- Developments in China
- Spillover channels – commodities and EMEs
- US
- Euro area

World GDP and trade

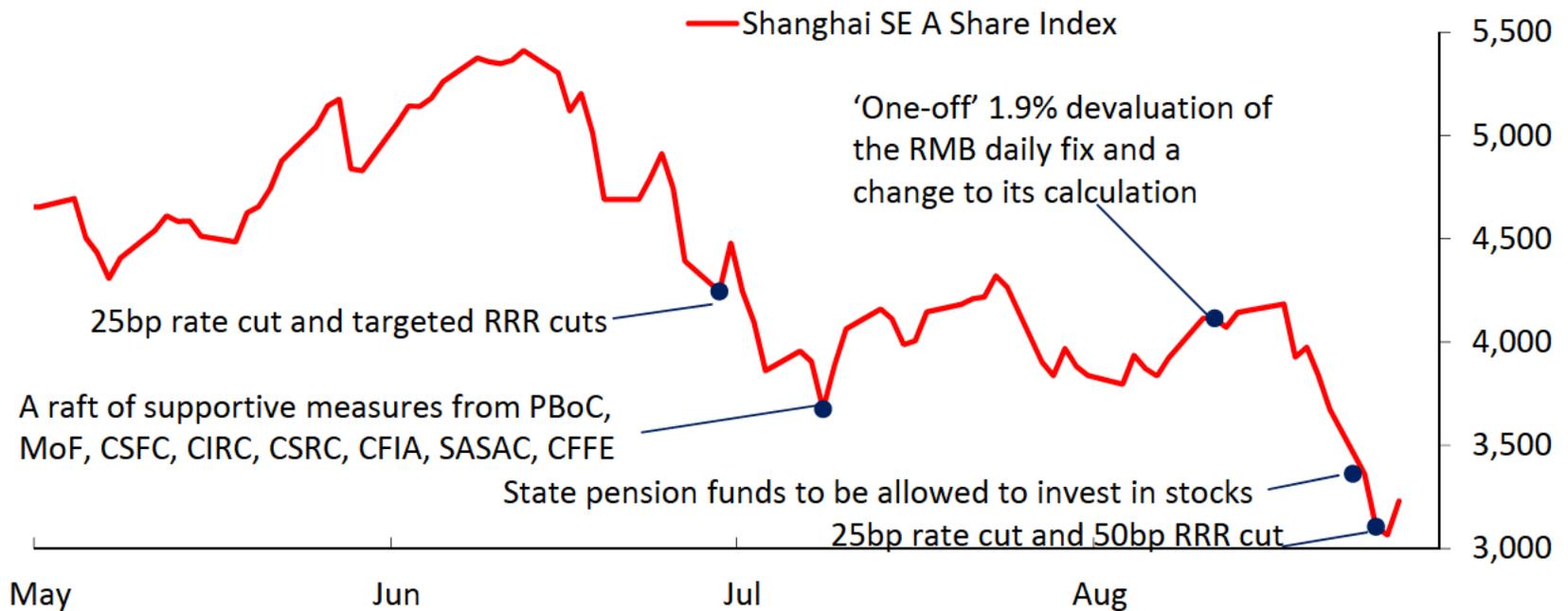


- World GDP growth looks to have steadied in Q2, but at below pre-crisis averages
- Trade has been weaker, although it picked up sharply in June (+2%)



China

Chinese equity prices



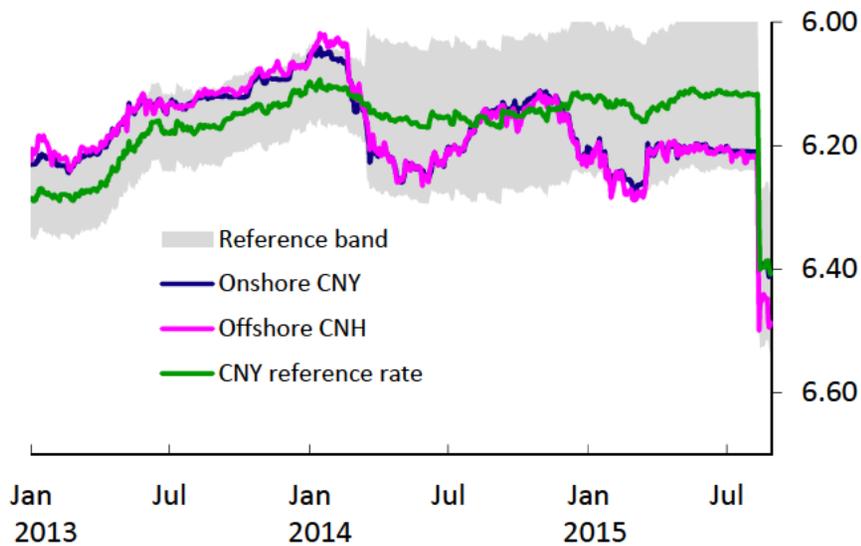
- Authorities still occasionally intervening. Direct macro effects and links to the financial system seem small. Questions remain as to what signal to take from the authorities interventions.

China faces a number of key challenges

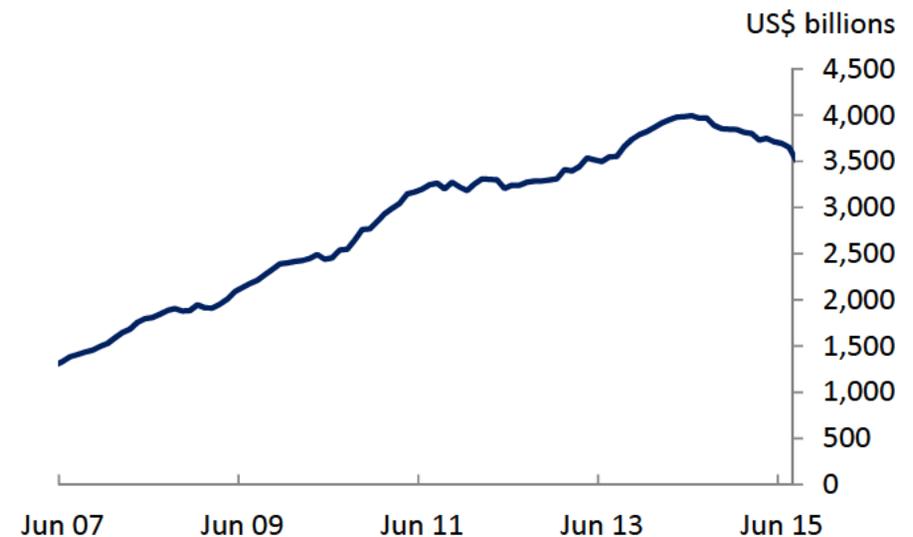
- **Trying to deleverage** while achieving growth and re-balancing objectives
 - Debt-to-GDP up 110pp since 2007 to 190%, still rising 10pp per annum
- **Highly interlinked financial system with large exposures to property**
 - Bank lending to real estate, construction and mortgages 30% of loans
 - Banks also exposed to large proportion of RMB 23tn of lending intermediated by non-banks.
- **In the process of opening up financially**
 - Further pressure to open up may come with any decision to include the RMB in the SDR basket

Change in Chinese FX strategy

RMB/USD exchange rate

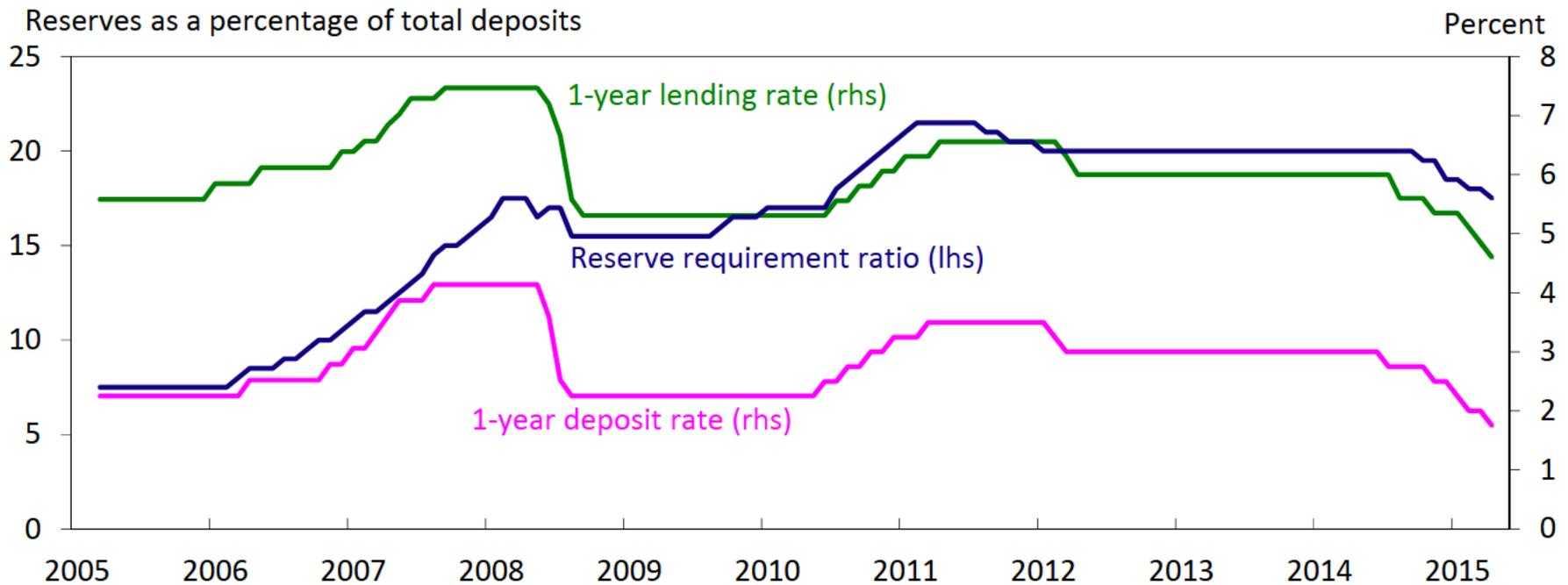


FX reserve position



- PBoC took unexpected steps to liberalise the RMB via their daily \$/CNY fixing, whereby the rate will now 'refer' to the previous day's closing price. 1.9% devaluation on the day.
- Heavily intervening intraday, with FX intervention in recent weeks estimated to have amounted to \$150bn

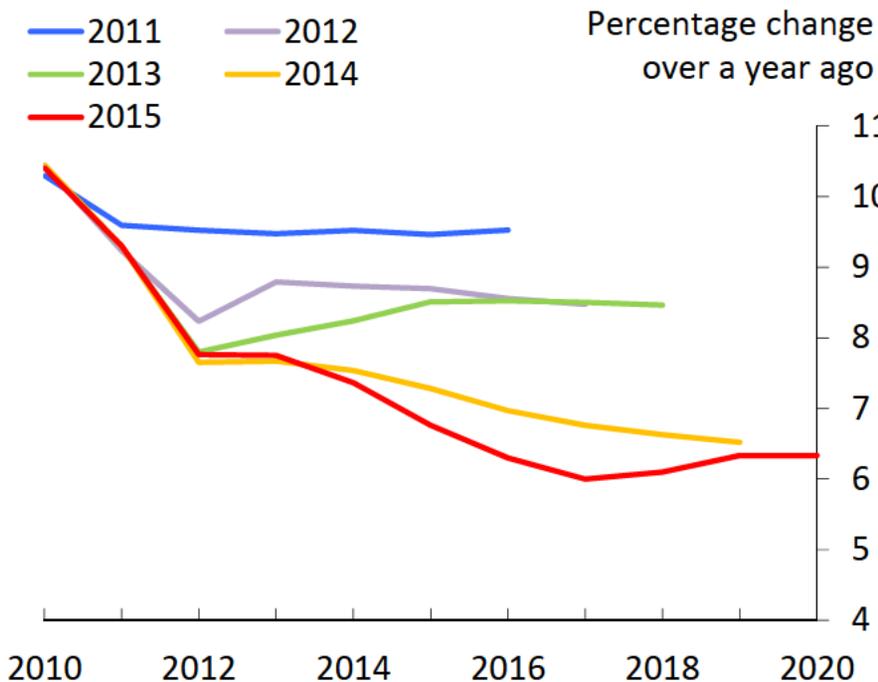
Chinese monetary policy



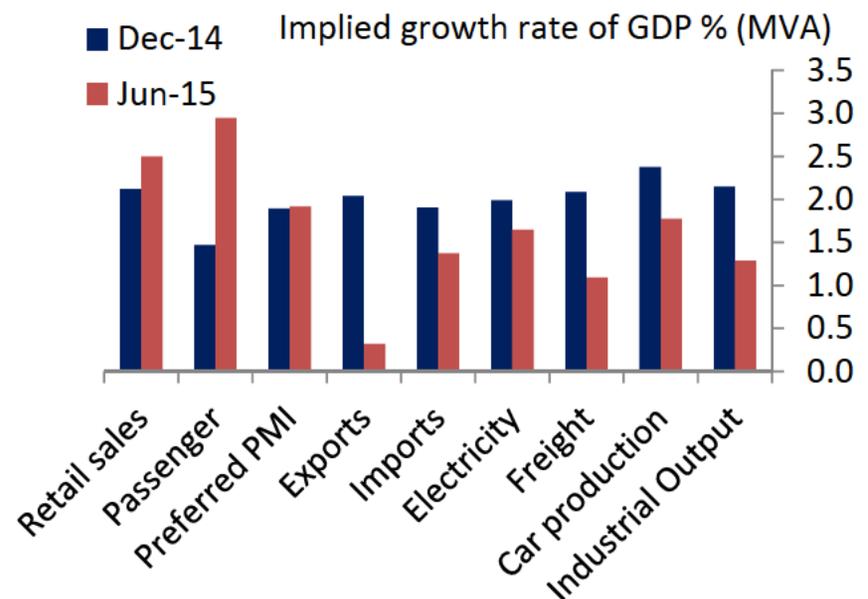
- Cuts to RRR and benchmark interest rates as much a response to capital flows as policy easing

Chinese economy slowing, but pace uncertain

IMF forecast revisions

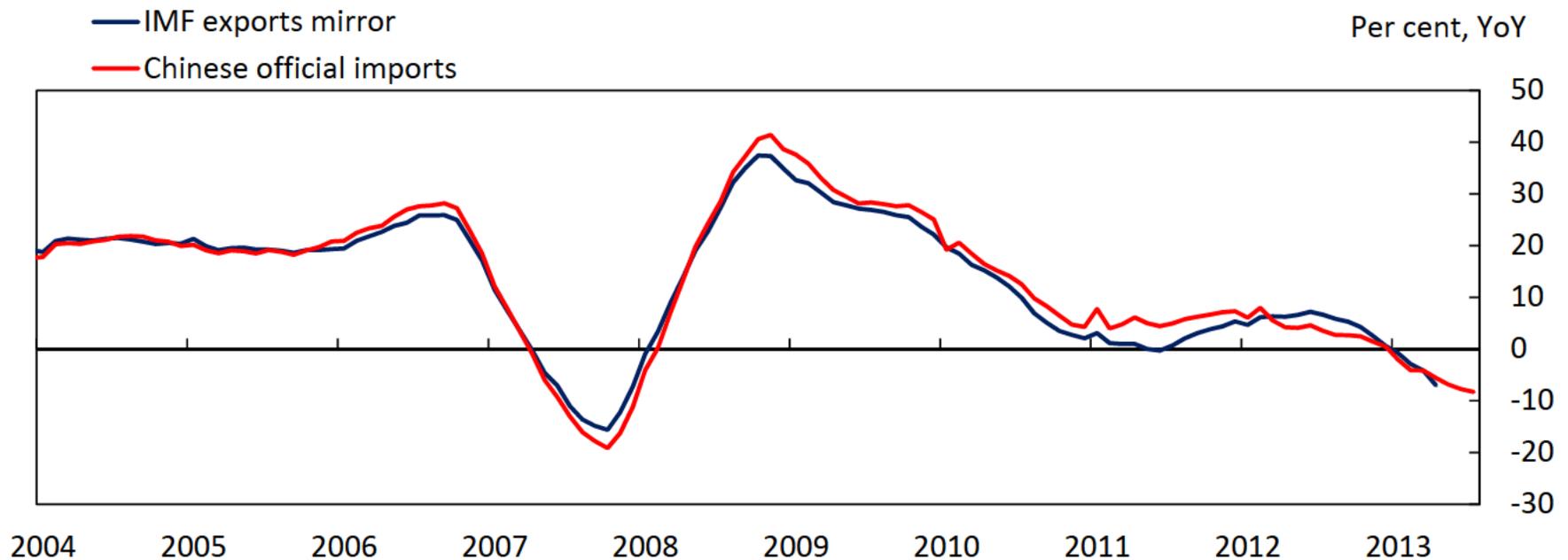


Activity indicators



- Indicators of industrial activity, in particular, have slowed, but mapping to overall activity is uncertain

China trade data and mirror trade chart



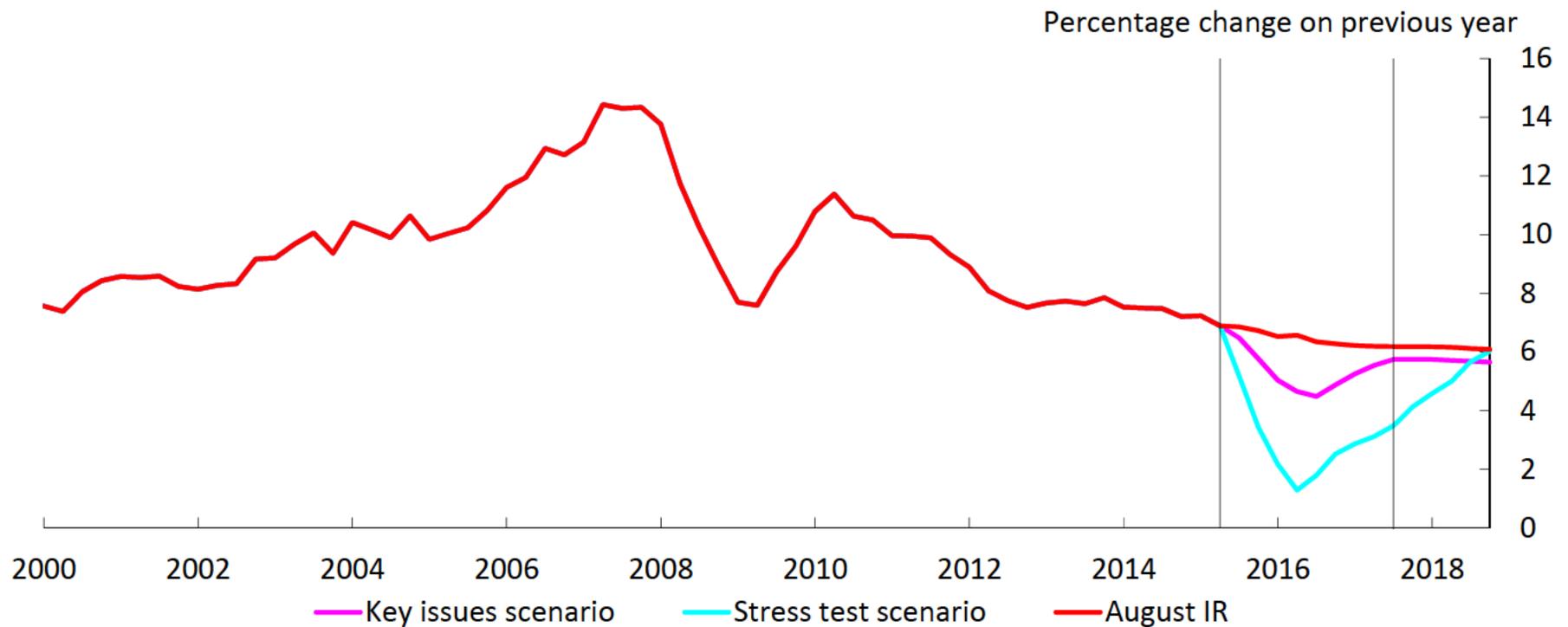
- “Mirror” trade data – using IMF non-seasonally adjusted exports – appears consistent with official Chinese imports data

Indicators to watch

| Indicator | Latest figure | Change since December | Next figure available |
|--------------------------------|-----------------------------|-----------------------|-----------------------|
| Industrial production | July '15: 6% yoy | -1.9pp | 13th Sept |
| NBS manufacturing PMI | July '15: 50.0 | -0.1 | 1st Sept |
| FAI: infrastructure | July '15: 19.4% yoy (12mma) | -1.6pp | 13th Sept |
| FAI: real estate | July '15: 3.6% yoy (12mma) | -4.9pp | 13th Sept |
| Property prices: 70 city index | July '15: 0.3% mom | +0.6pp | 18th Sept |
| Total social financing | July '15: 12.6% yoy | -3.5pp | 10th Sept |
| Retail sales | July '15: 17.2% yoy | +5.3pp | 13th Sept |
| Caixin Services PMI | July '15: 53.8 | +0.4 | 1st Sept |
| FX reserves | July '15: \$3.65 tn | -\$0.2 tn | Mid-Sept |

- Industrial indicators should be trending down slowly as part of rebalancing
- We will continue to monitor a wider range of high frequency indicators through our Nowcast e.g. electricity production, cement, freight, car production, trade etc

China GDP scenarios





Spillovers

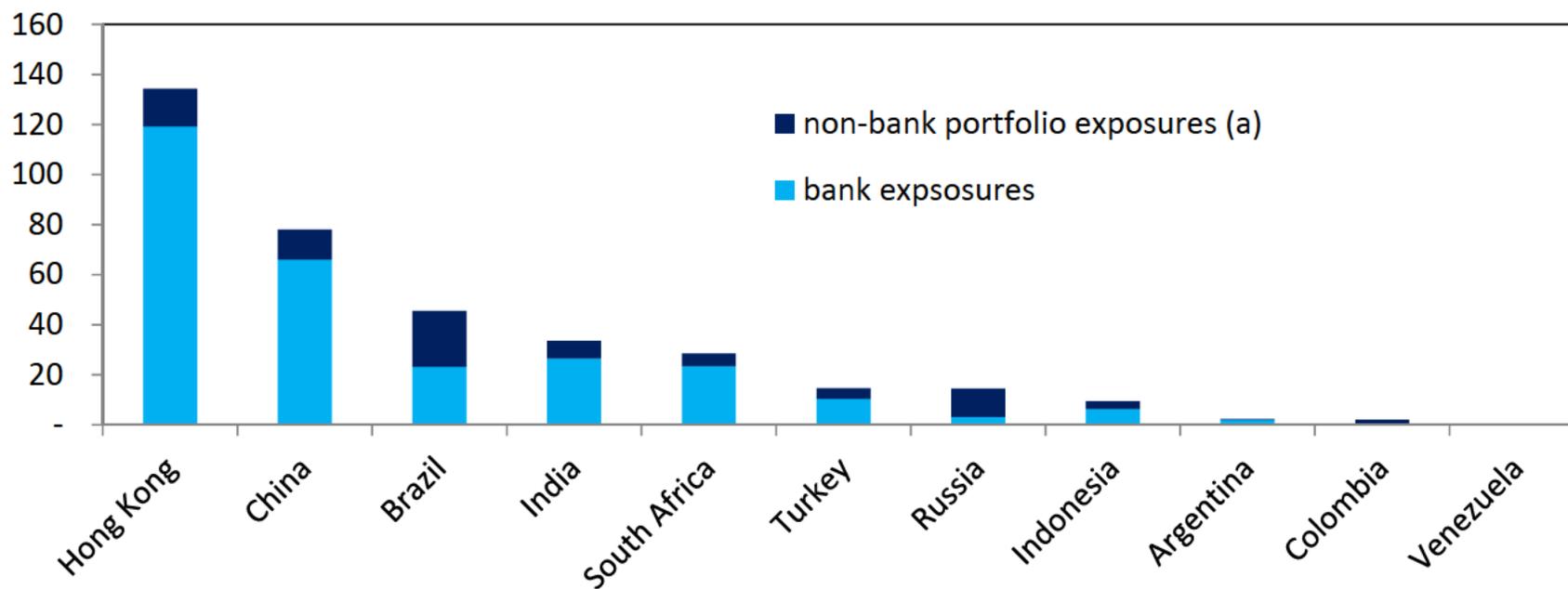
China's increasing connectivity

| | 1980-2012 | Latest | <i>Memo: EA</i> | <i>Memo: US</i> |
|---|-----------------------------|------------------------------|-----------------|-----------------|
| UK export share ^(a) | 1% | 4% | 40% | 18% |
| World import share ^(b) | 5% | 10% | 13% | 13% |
| Oil consumption (% world) ^(c) | 6% | 11% | 10% | 21% |
| UK-owned bank exposures ^(d) | \$70bn [\$270bn inc. HK] | \$200bn [\$530bn inc. HK] | \$720bn | \$960bn |
| External liabilities (% world GDP) ^(e) | 1% | 6% | 32% | 37% |

(a) Latest export shares use 2013 data; (b) World import shares as of 2014. China historical average from 1997-2012 due to data limitations; (c) Oil consumption as of 2015 Q1; (d) BIS consolidated bank exposures as of Q4 2014. China historical average from 2005-2012; (e) External liabilities as of 2014

UK direct exposures to vulnerable EMEs

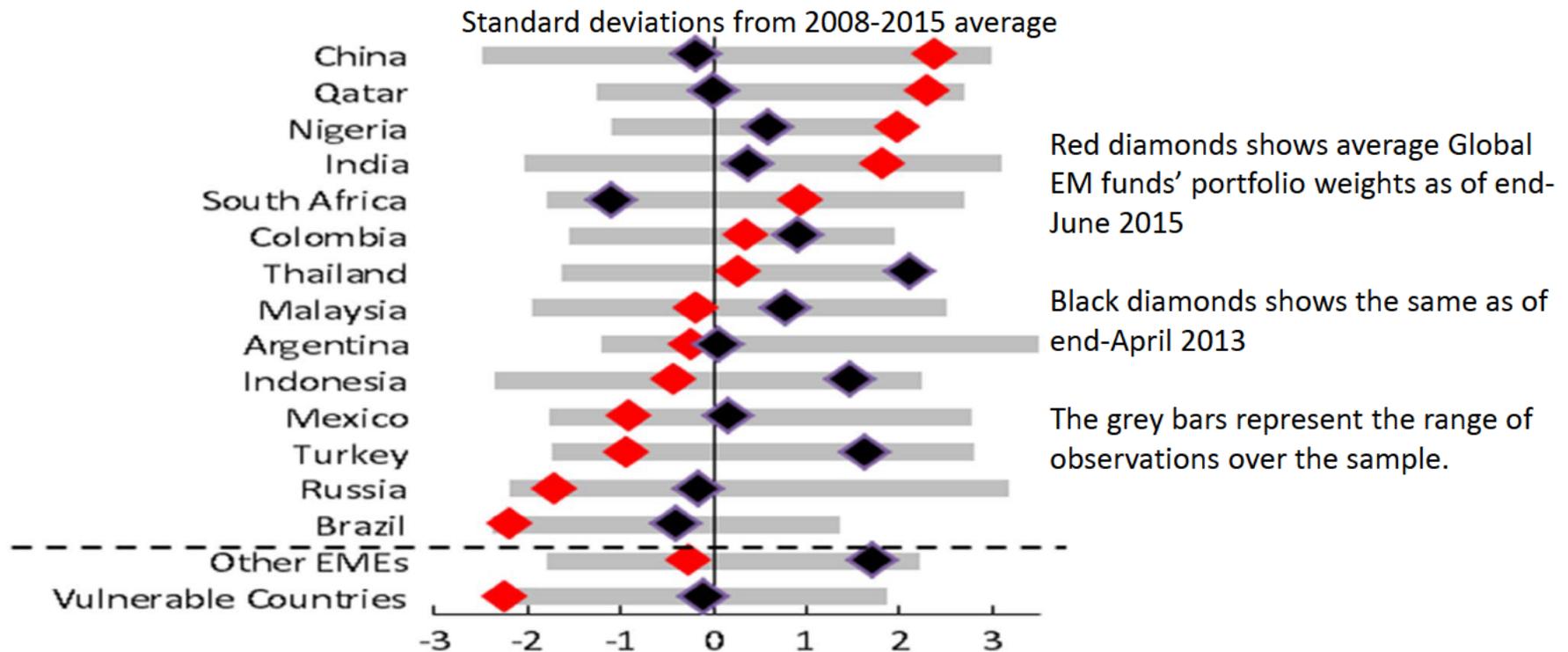
% of UK GDP



(a) Portfolio data not available for all countries. Bank exposures are an ownership basis; portfolio numbers are only available on residency basis.

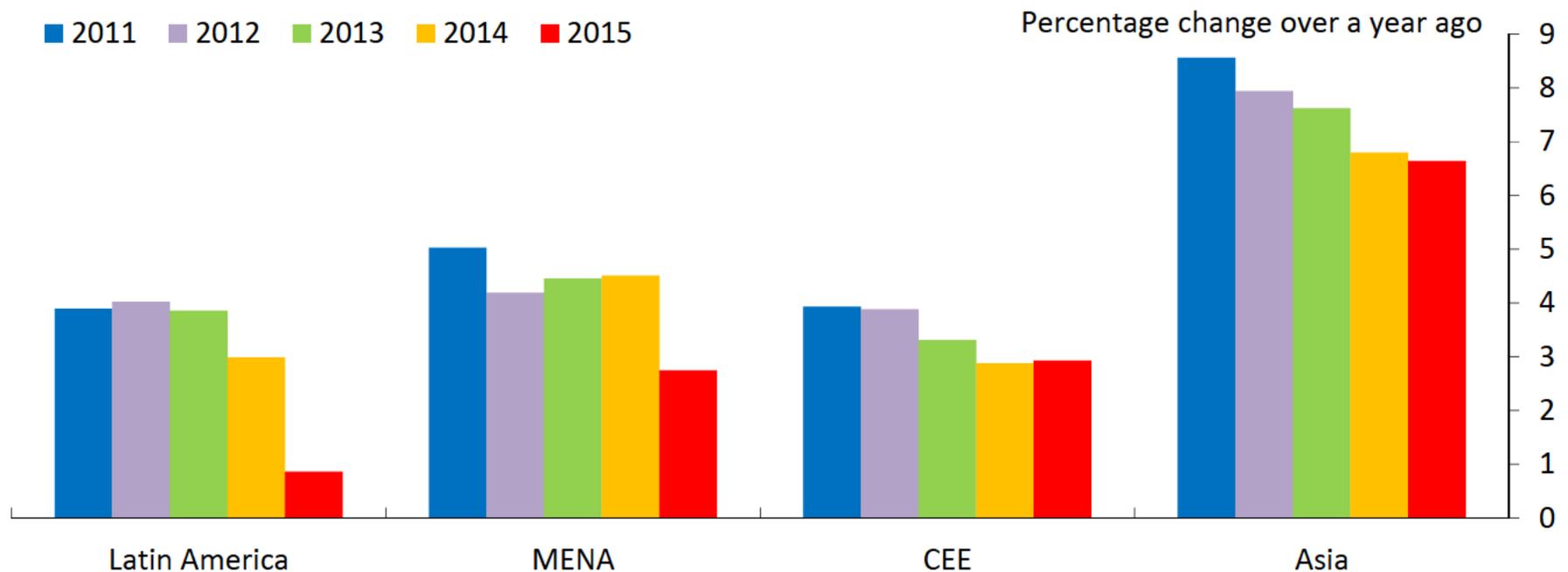
- UK financial system heavily exposed to China and Hong Kong.

Global equity funds' portfolio weights, relative to post-crisis averages



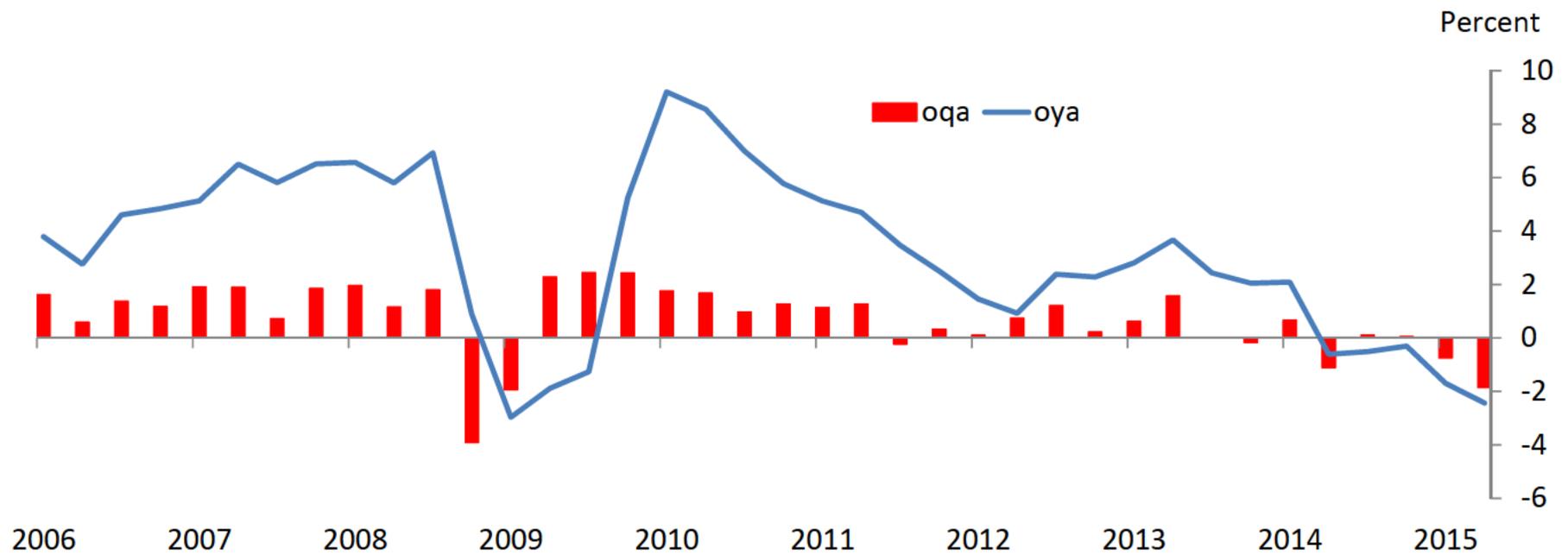
- Equity funds have been increasing exposure to China, relative to the pre “taper-tantrum” period.

Lower commodity prices and disparate domestic issues already driving slowing across EMEs



- Growth consistently revised down over past four years

Brazilian GDP growth

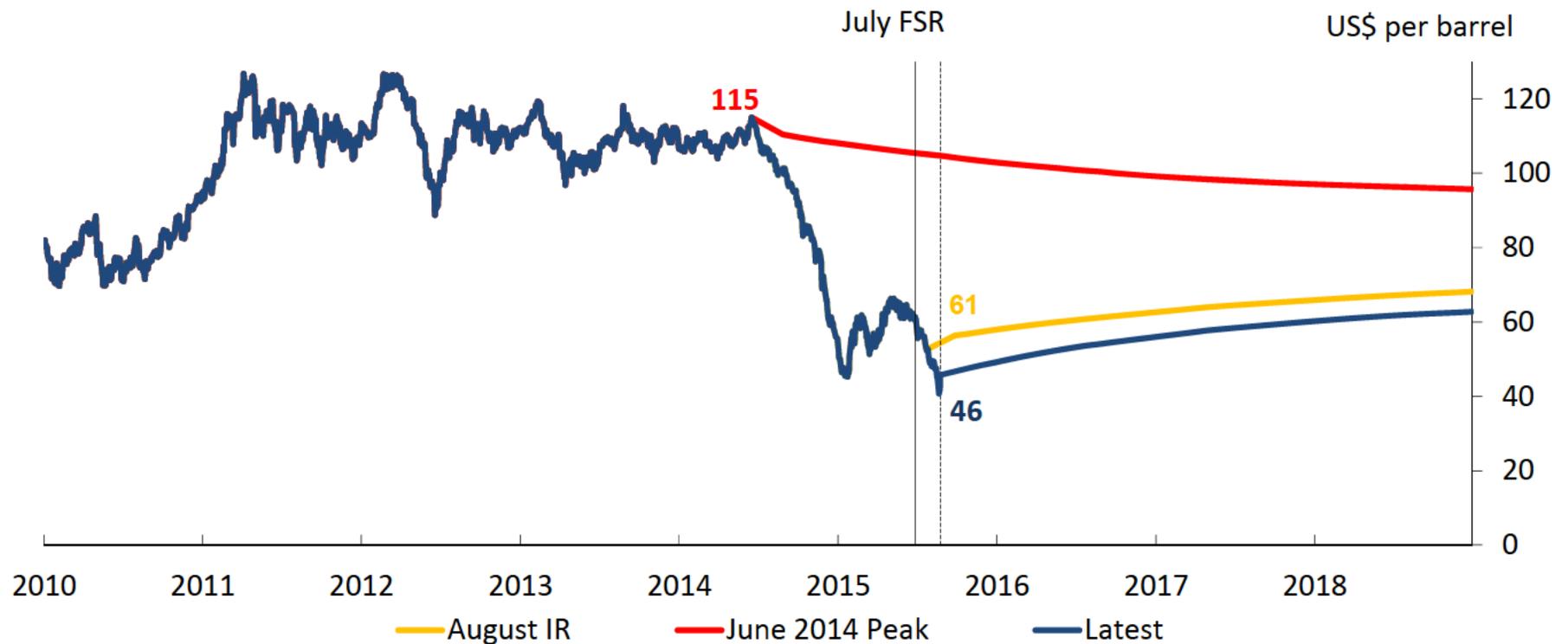


- Brazilian GDP fell by 1.9% in Q2

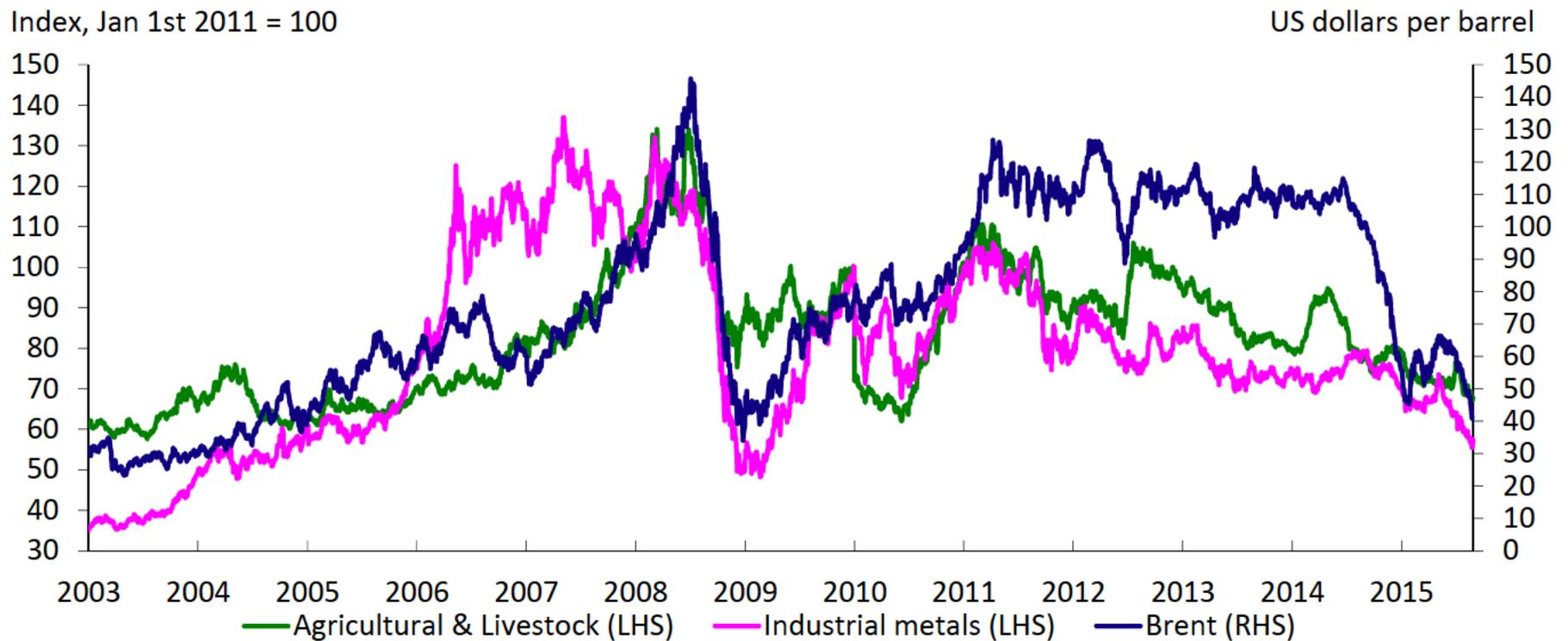
EMEs vulnerable to China, commodity prices and interest rate 'snapback'

| | World GDP PPP weight | External Resilience | Fiscal policy space | Monetary policy space | Market indicators | Macro & outlook | Private sector debt | Exports to China % GDP | Commodity Exports |
|--------------|----------------------|---------------------|---------------------|-----------------------|-------------------|-----------------|---------------------|------------------------|-------------------|
| Venezuela | 0.5% | Red | Red | Red | Red | Red | Red | Red | Red |
| Brazil | 2.9% | Red | Red | Red | Red | Red | Red | Green | Green |
| Argentina | 0.8% | Orange | Red | Red | Orange | Red | Orange | Green | Orange |
| Turkey | 1.4% | Orange | Orange | Red | Red | Orange | Orange | Green | Green |
| Colombia | 0.6% | Orange | Orange | Red | Red | Orange | Orange | Orange | Orange |
| Russia | 3.1% | Green | Orange | Red | Orange | Red | Orange | Orange | Red |
| Indonesia | 2.5% | Orange | Orange | Red | Red | Green | Red | Orange | Orange |
| Nigeria | 1% | Orange | Green | Red | Orange | Green | Orange | Orange | Red |
| Malaysia | 0.7% | Green | Red | Orange | Orange | Green | Orange | Red | Orange |
| Mexico | 2% | Green | Red | Orange | Green | Orange | Orange | Green | Green |
| Poland | 0.9% | Orange | Orange | Orange | Green | Green | Red | Green | Green |
| Thailand | 0.9% | Green | Orange | Orange | Orange | Orange | Red | Red | Green |
| South Africa | 0.6% | Orange | Orange | Green | Green | Orange | Red | Orange | Orange |
| India | 7.1% | Green | Red | Green | Green | Green | Orange | Green | Green |

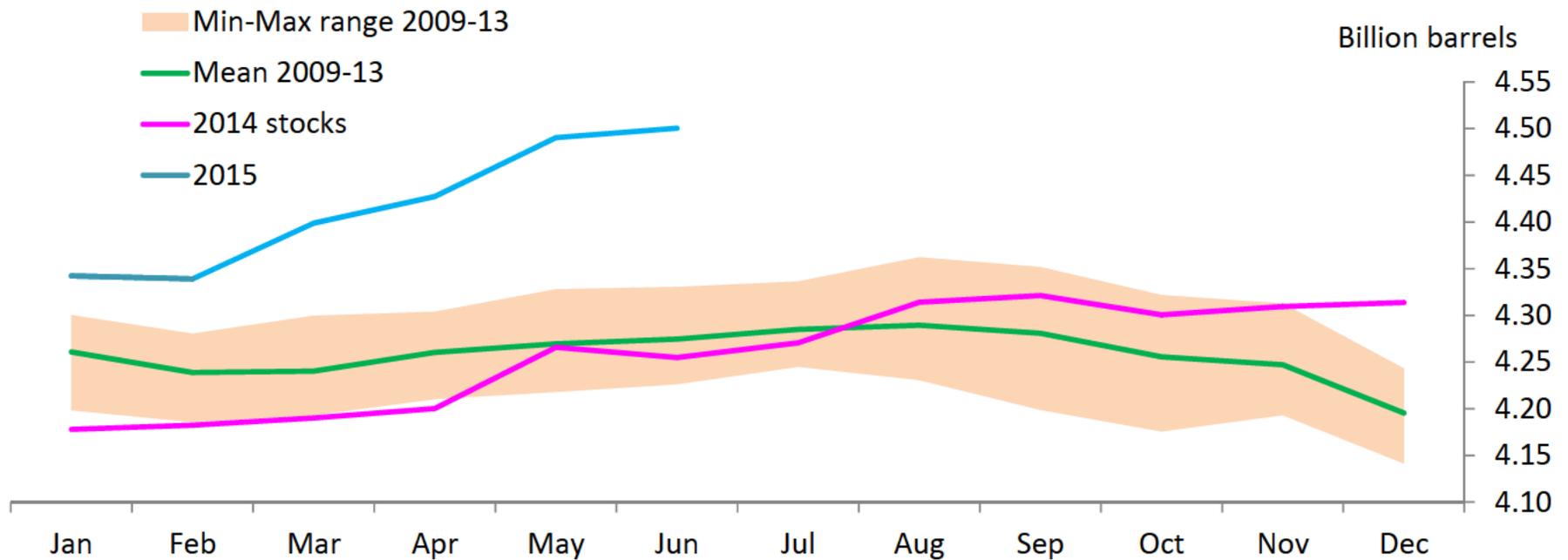
Oil prices and futures curves



Commodity prices

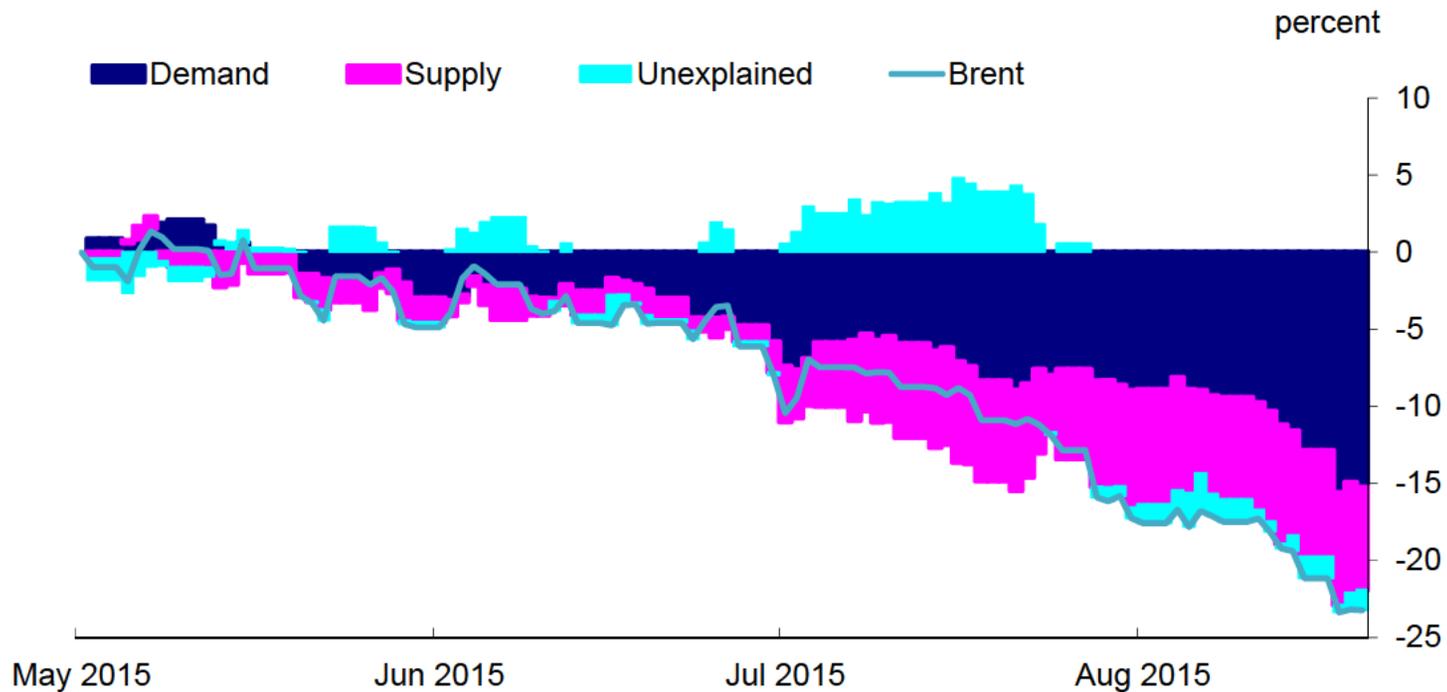


OECD inventories



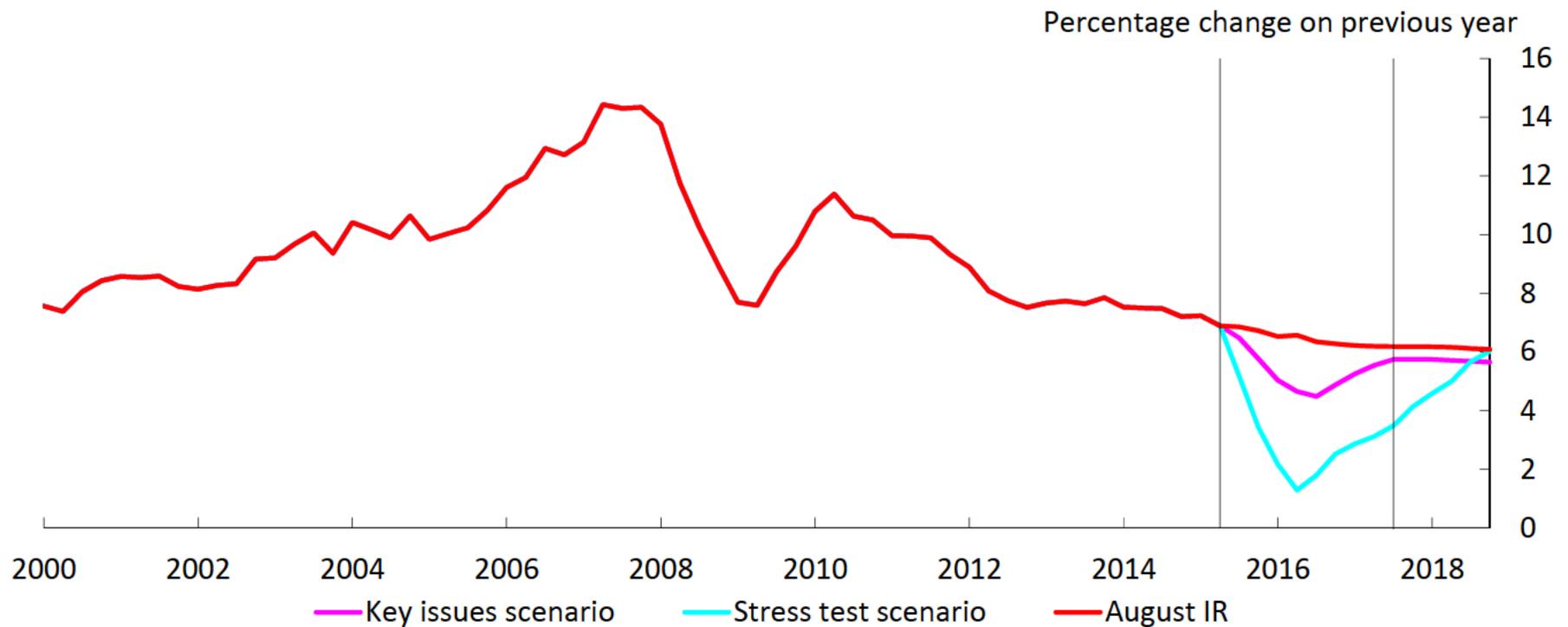
- OECD inventories built counter-seasonally in June, hitting another all time high.
- IEA estimate a 3mbpd supply overhang in Q2 will ease in H2 but remain large at around 1.5mbpd.

Decomposing news in oil prices since May IR

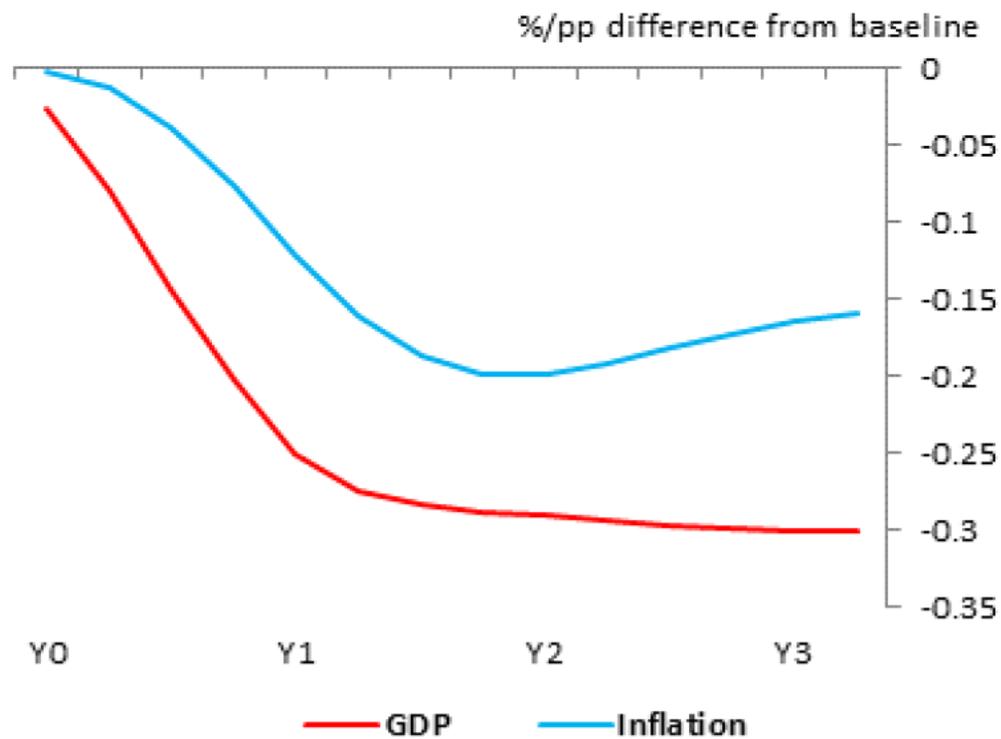


- MFAD's asset price approach suggests roughly 70% of the recent fall in oil prices is linked to news about demand

China GDP scenarios



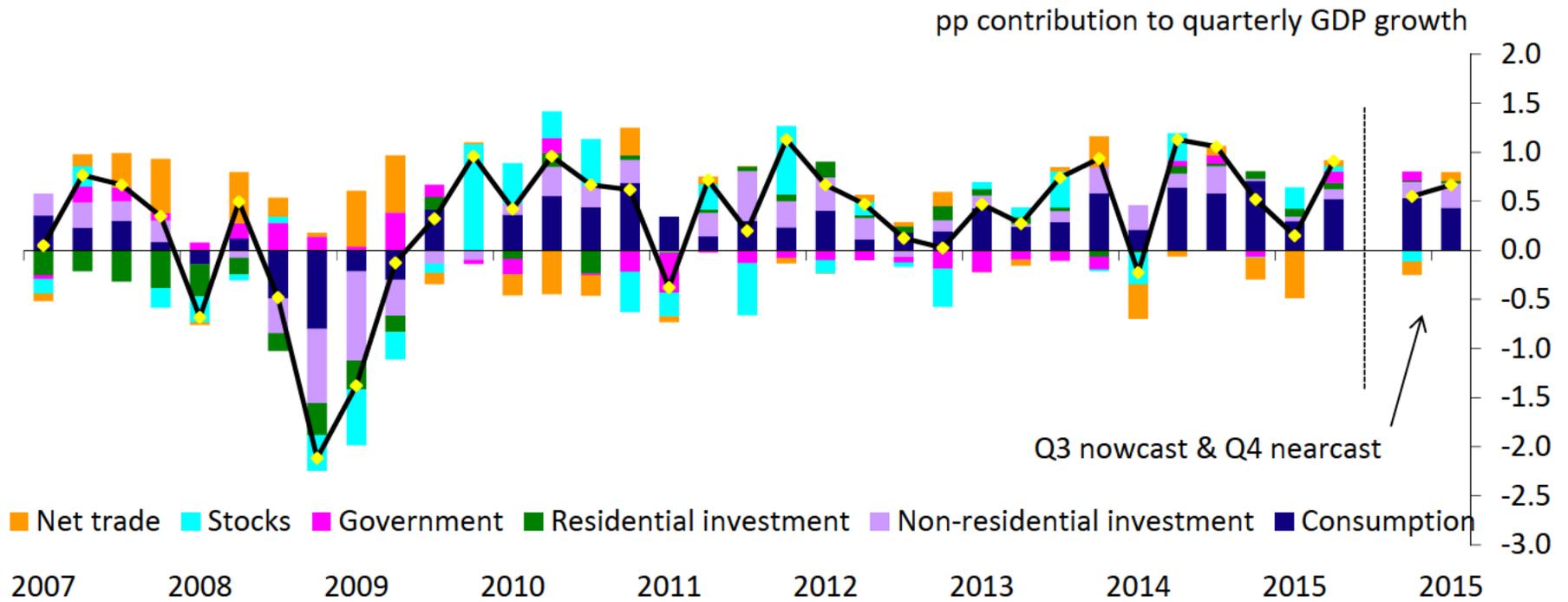
Impact on UK GDP of a 3% shock to China GDP





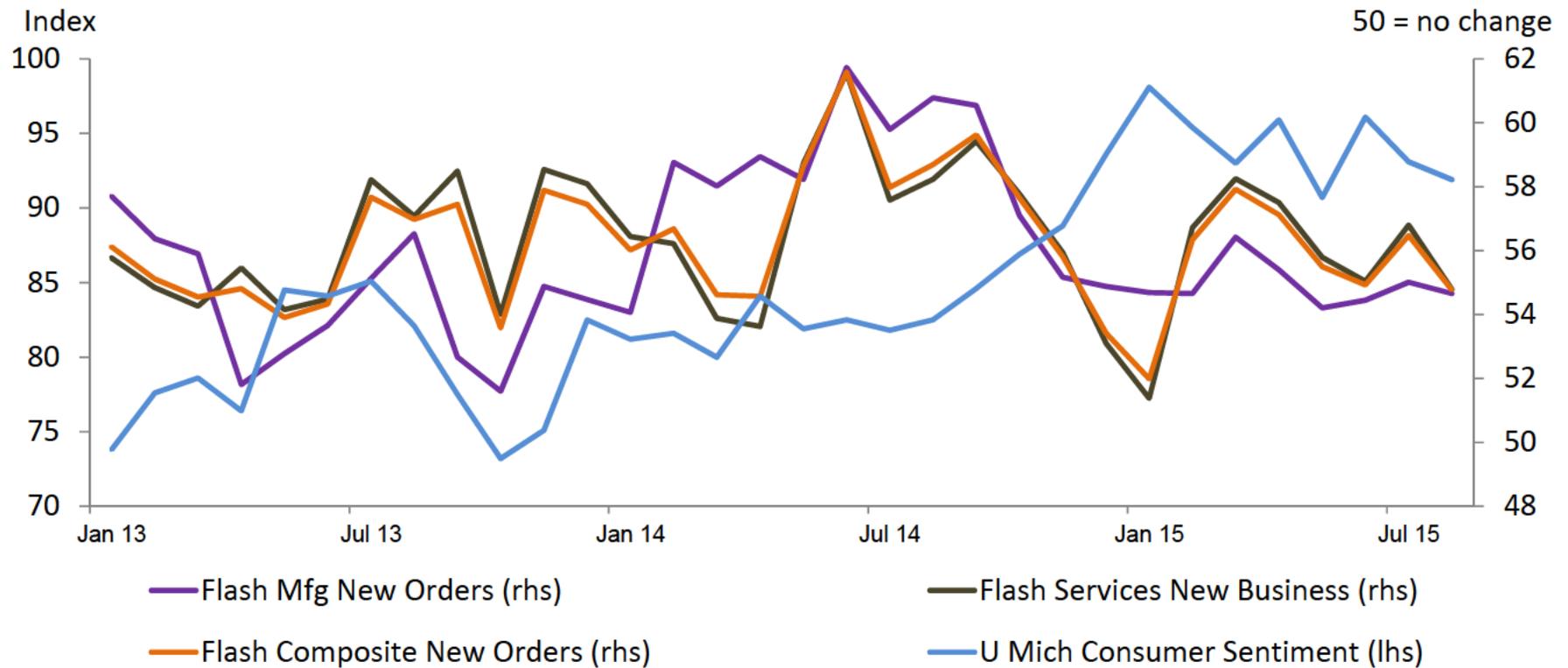
US

US GDP



- Growth in Q2 revised up by 0.2% to 0.9%
- Our Q3 Nearcast estimates growth of 0.6% qoq. Externals are between 0.5% and 0.6%.

US high-frequency indicators



Macro variables relevant to US tightening

| Start of tightening cycle | US Latest | Past Tightening Cycle Average* | Historical Average |
|---------------------------|-----------|--------------------------------|--------------------|
| Policy Rate | 0.25% | 1.00% | |
| GDP growth | 2.3% | 4.1% | 2.4% |
| Unemployment Rate | 5.3% | 5.5% | 6.1% |
| Employment growth | 2.1% | 2.0% | 1.1% |
| Core Inflation (PCE) | 1.3% | 1.9% | 2.0% |
| Wages** | 2.1% | 3.0% | 2.9% |

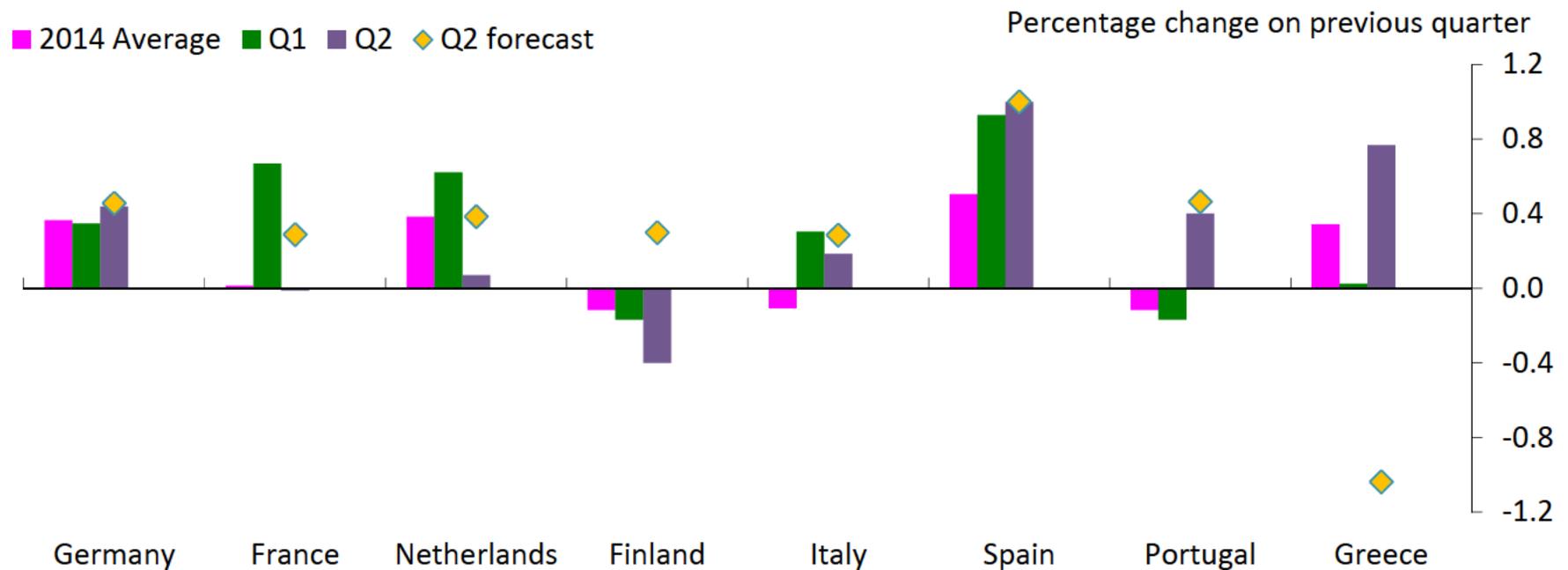
*Includes the Jun-04, Jun-99 and Feb-94 tightening cycles

**ECI (Wages & Salaries)



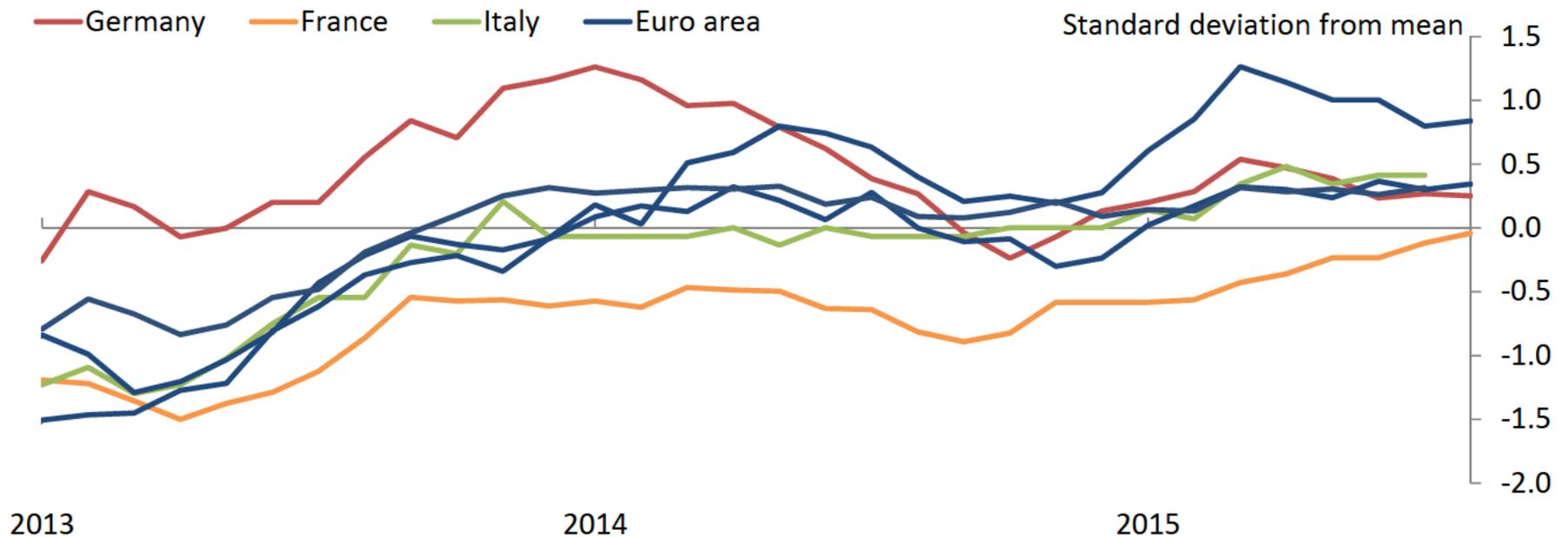
EA

EA GDP



- Euro-area GDP grew 0.3% in Q2, 0.1pp weaker than our expectation. The downside news was concentrated in France and Netherlands, with some temporary factors at play.

High frequency €A indicators



Includes surveys by: Markit (PMIs), European Commission, IFO, INSEE and ISTAT
Series are shown as standard deviations from their full sample mean (2000-2015)

- There is little sign of contagion from Greece, or China, in the high frequency surveys

ECB comments

“Developments in the world economy and in commodity markets have increased the downside risk of achieving the sustainable inflation path towards 2 percent”

“There should be no ambiguity on the willingness and ability of the Governing Council to act if needed.”

Main messages

- First-order shift in perceptions of Chinese policy effectiveness
- Already notable spillovers
- Unclear as yet how big any Chinese slowing might be
- Commodity price falls will cushion the blow
- US and EA broadly on track
- Greece problems on the back burner, but still bubbling



2: Financial Markets

Financial Markets

September 2015 FPC-MPC
joint briefing
Markets, MFAD and CMD



Summary

- Developed market policy and inflation expectations driven by China
 - Monetary policy rate expectations now more diffuse

Summary

- Developed market policy and inflation expectations driven by China
 - Monetary policy rate expectations now more diffuse
- Risky asset price volatility global in nature
 - Trigger was not higher expected interest rates...
 - ...but was against prevailing backdrop of low interest rate risks
 - ...and potentially characterised by evolution in market structure

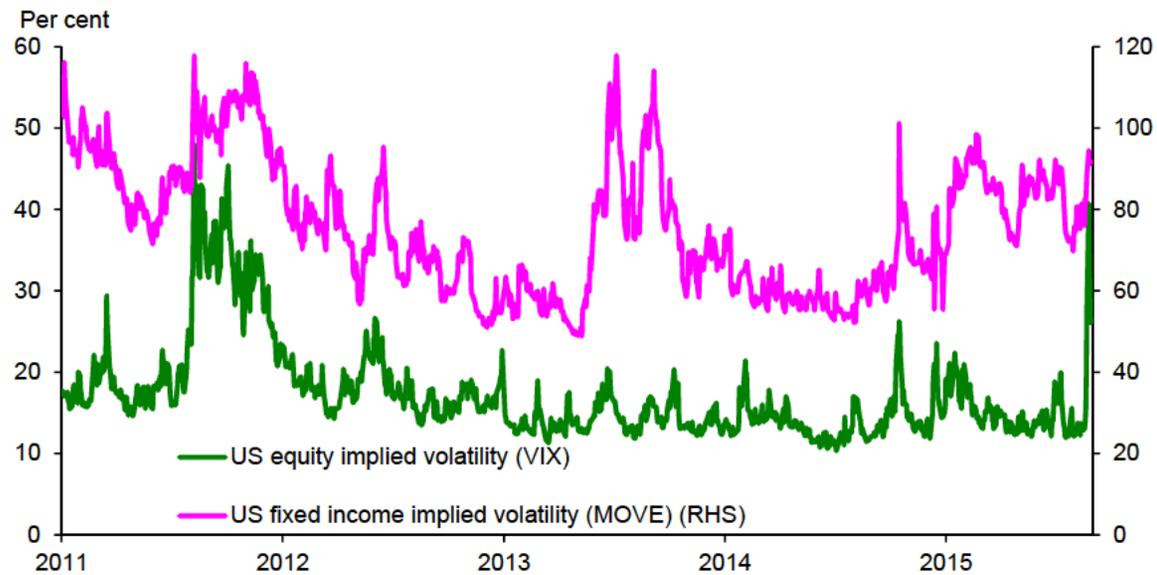
Markets Weekly, w/c 24 August, 

Correlations of global assets with Chinese equities

| | S&P 500 | 1yr forward OIS | |
|---------------|--------------|-----------------|--------------|
| | | UK | US |
| 2009 - May IR | 0.13 | 0.03 | 0.01 |
| Since May IR | 0.34 | 0.28 | 0.41 |
| Change | +0.21 | +0.26 | +0.40 |

- Global correlations with Chinese assets have increased markedly over recent months.

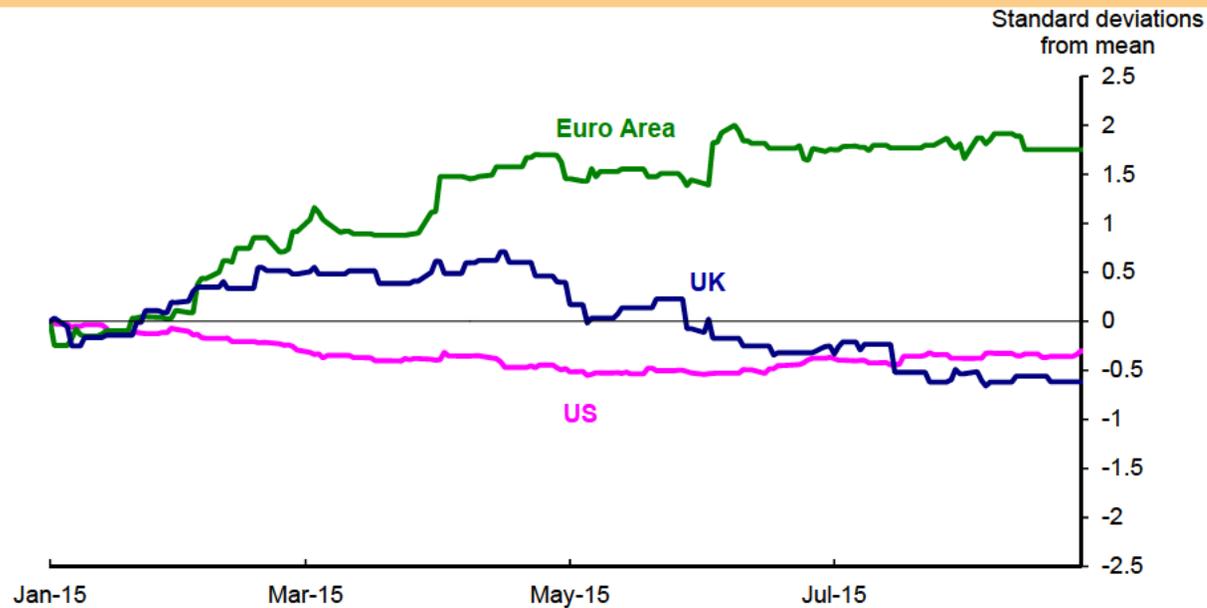
Implied volatility



- Higher implied volatility most striking in equity markets.

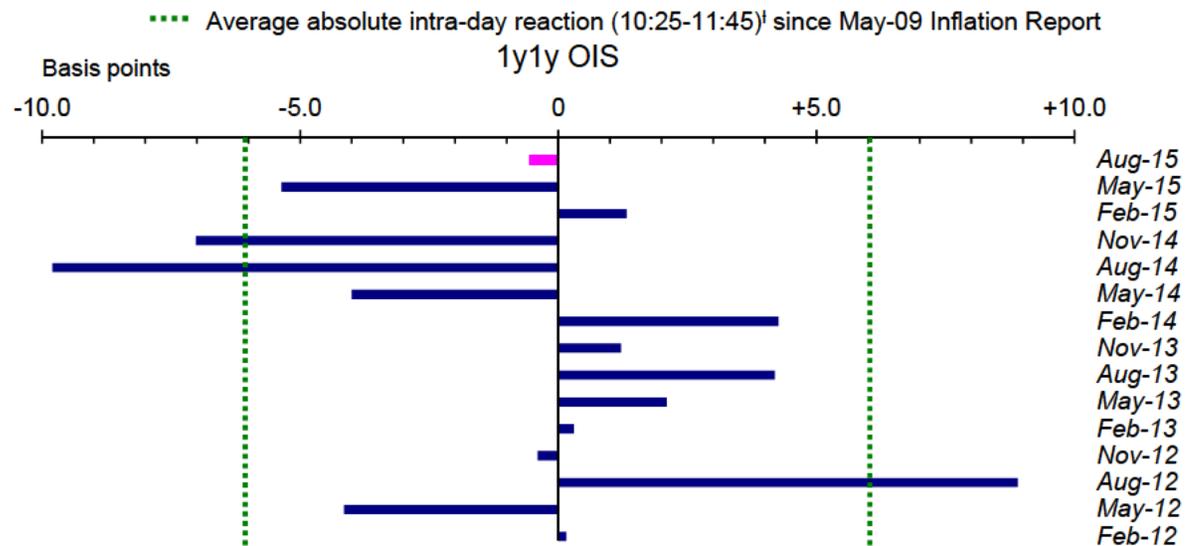
Monetary policy expectations

Cumulative Economic Surprise Indices



- Data has been broadly in line with expectations in the last quarter.

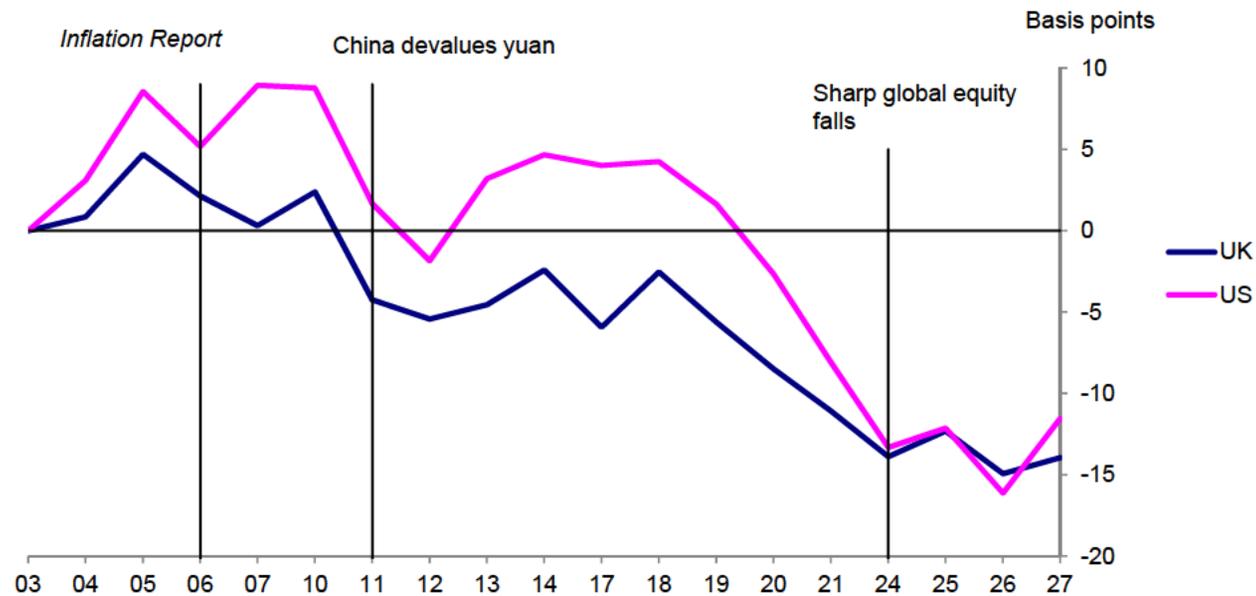
Market reactions to publication of *Inflation Reports*



[†] Except Aug-15 (11:55-13:45)

- *August Inflation Report / Minutes* broadly in line with expectations, fewer-than anticipated dissenting votes offsetting higher-than-expected growth and wage forecasts.

Cumulative change in August 2016 instantaneous forward rate



- Implied path of policy more responsive to global developments as the month progressed...
- ...leaving expectations for the start of policy tightening more diffuse

Policy expectations summary table

| | UK | | | US | |
|---------------------------------|-------------------|---------------------|-------------------------------|-------------------|---------------------|
| | Latest (26/08) | Last MPC (05/08) | Last FPC update (15/05) | Latest (26/08) | Last MPC (05/08) |
| Expected first rate rise* | Sep 2016 | May 2016 | July 2016 | March 2016 | Dec 2015 |

* - measured as the date when the instantaneous forward OIS curve crosses 75bps (UK) and 35bps (US).

Policy expectations summary table

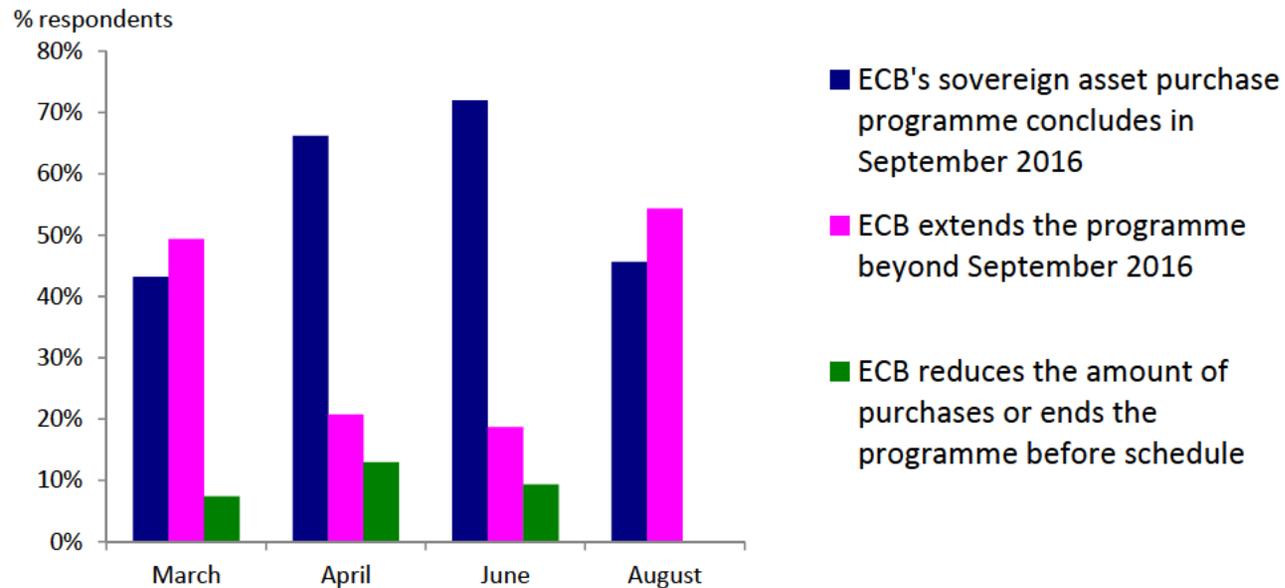
| | UK | | | US | |
|---------------------------------|-------------------|---------------------|-------------------------------|-------------------|---------------------|
| | Latest (26/08) | Last MPC (05/08) | Last FPC update (15/05) | Latest (26/08) | Last MPC (05/08) |
| Expected first rate rise* | Sep 2016 | May 2016 | July 2016 | March 2016 | Dec 2015 |
| Pace of tightening** | 10 bps/quarter | 11 bps/quarter | 8 bps/quarter | 15 bps/quarter | 17 bps/quarter |
| Medium- term rate*** | 2.0% | 2.1% | 1.9% | 2.4% | 2.5% |

* - measured as the date when the instantaneous forward OIS curve crosses 75bps (UK) and 35bps (US).

** - measured as the pace between 75bps and 175bps (UK) and between 35bps and 135bps (US).

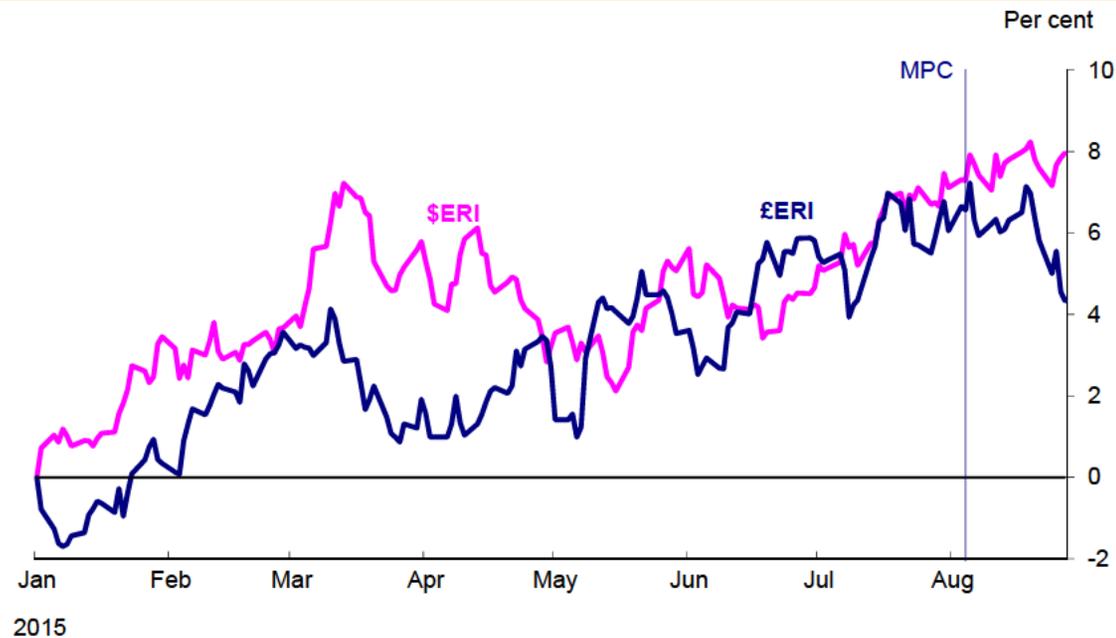
*** - measured by the instantaneous forward rate 5 years after the implied first rate rise.

Reuters poll of economists for ECB QE expectations



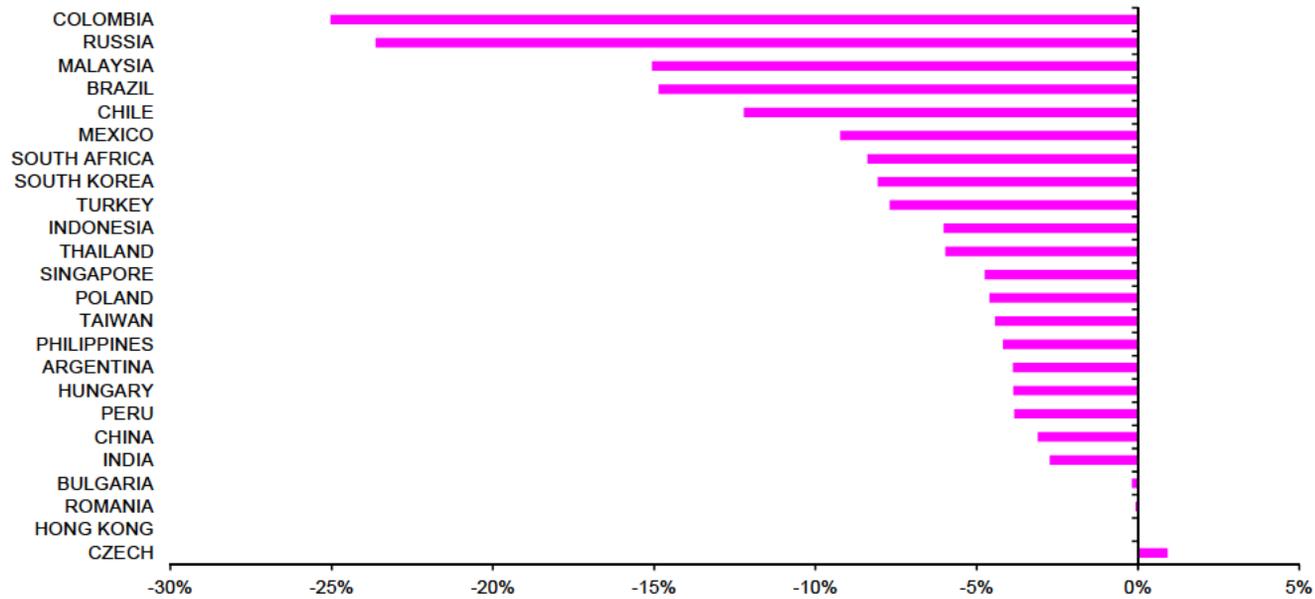
- More economists polled by Reuters now expect the ECB to extend its asset purchase programme or increase the pace of purchases.
- Also more speculation that BoJ will extend asset purchases this year

Cumulative change in Exchange Rate Indices



- Sterling down 2% on the month, consistent with moves in relative interest rates
- Dollar also weaker versus Euro, offset by appreciation versus emerging market currencies

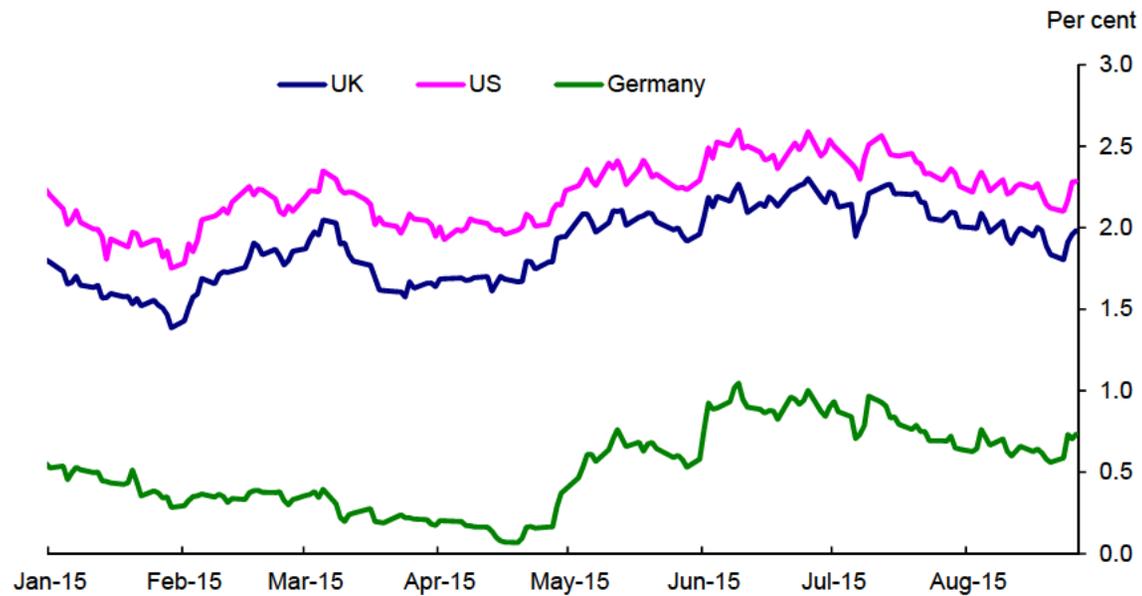
Emerging markets currencies vs US dollar since May IR



- Emerging markets currencies have fallen sharply against the dollar

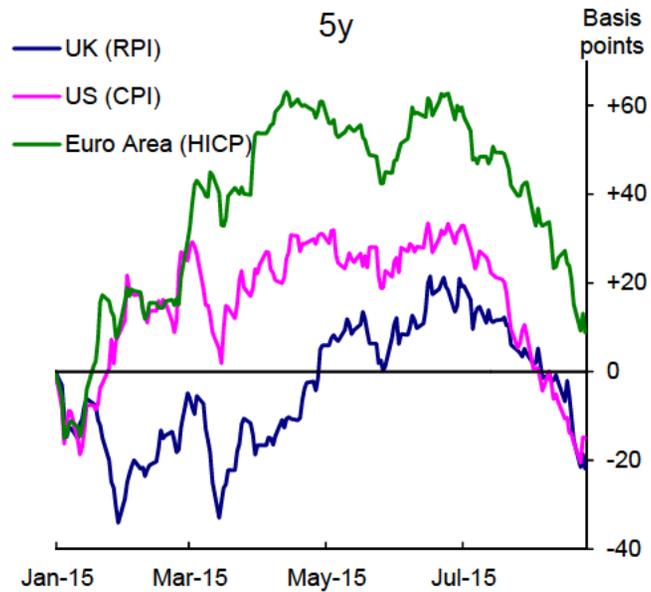
Long rates and breakevens

Core 10-year government bond yields



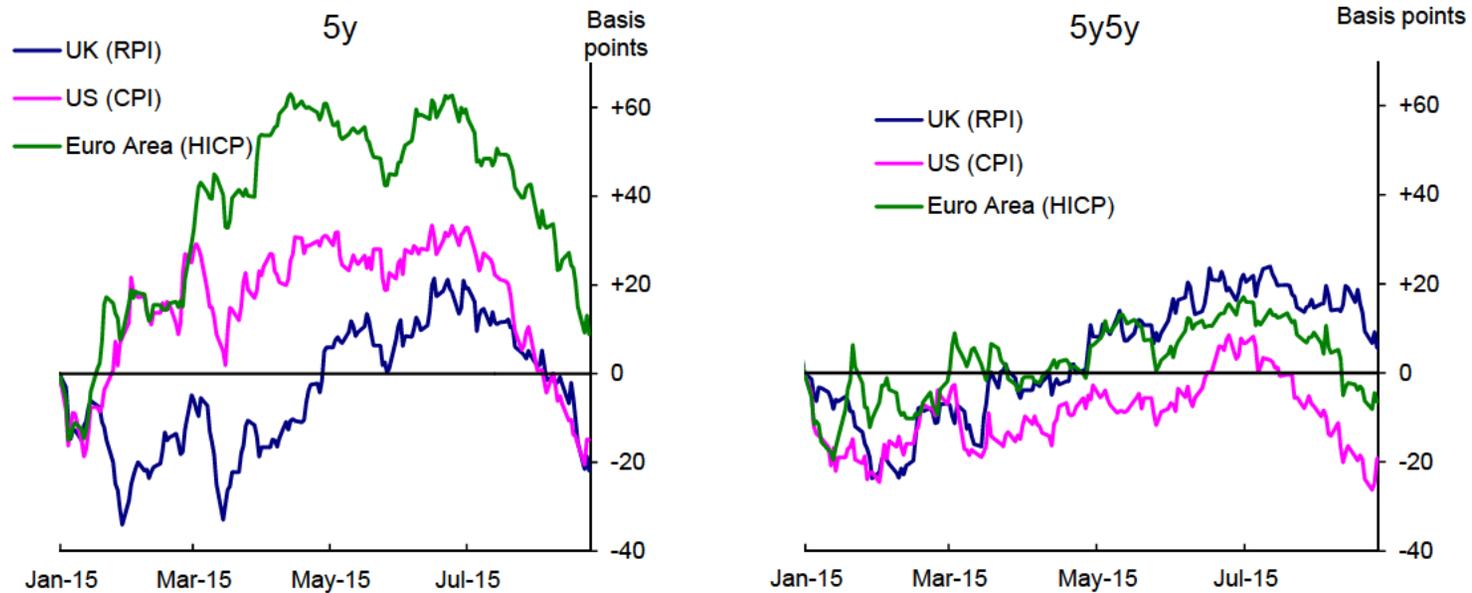
- 10 year bond yields have drifted lower by around 30bps over July and August

Cumulative change in inflation swap rates



- Sharply lower near-dated inflation expectations...

Cumulative change in inflation swap rates

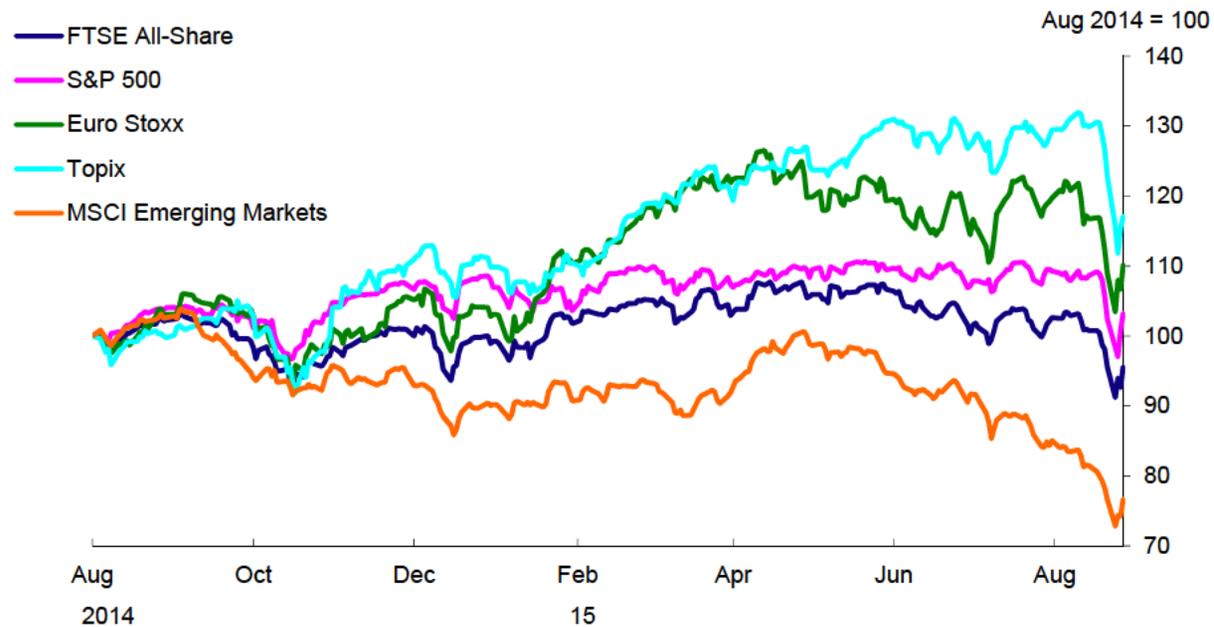


- Sharply lower near-dated inflation expectations...also reflected in forward measures in US & EA

- [Redacted]

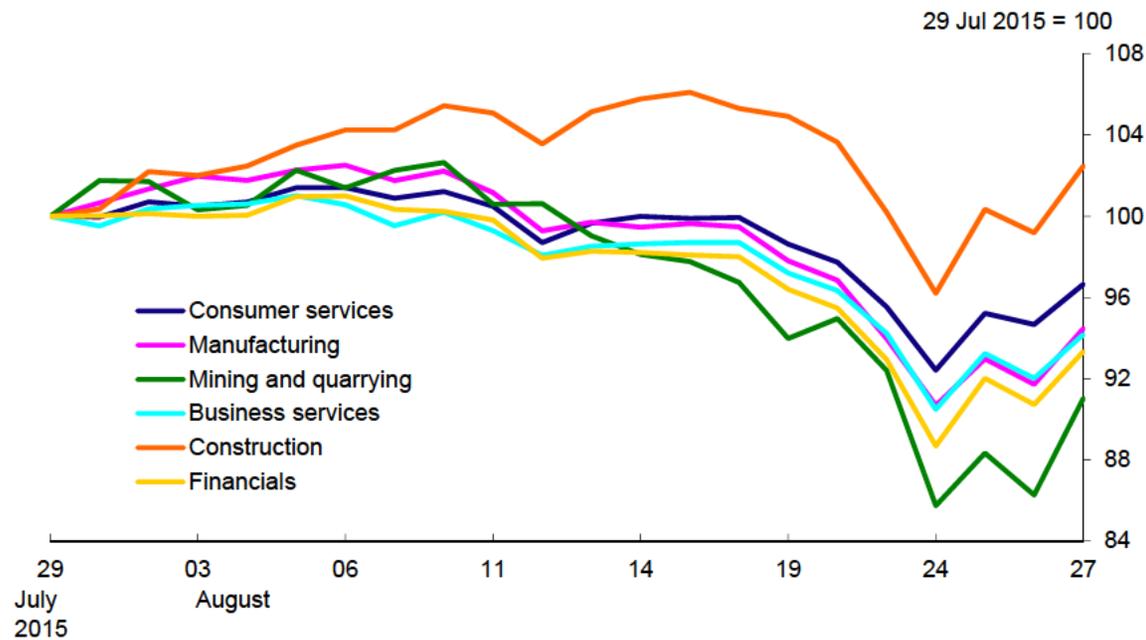
Spillovers to risky asset markets

International equity indices



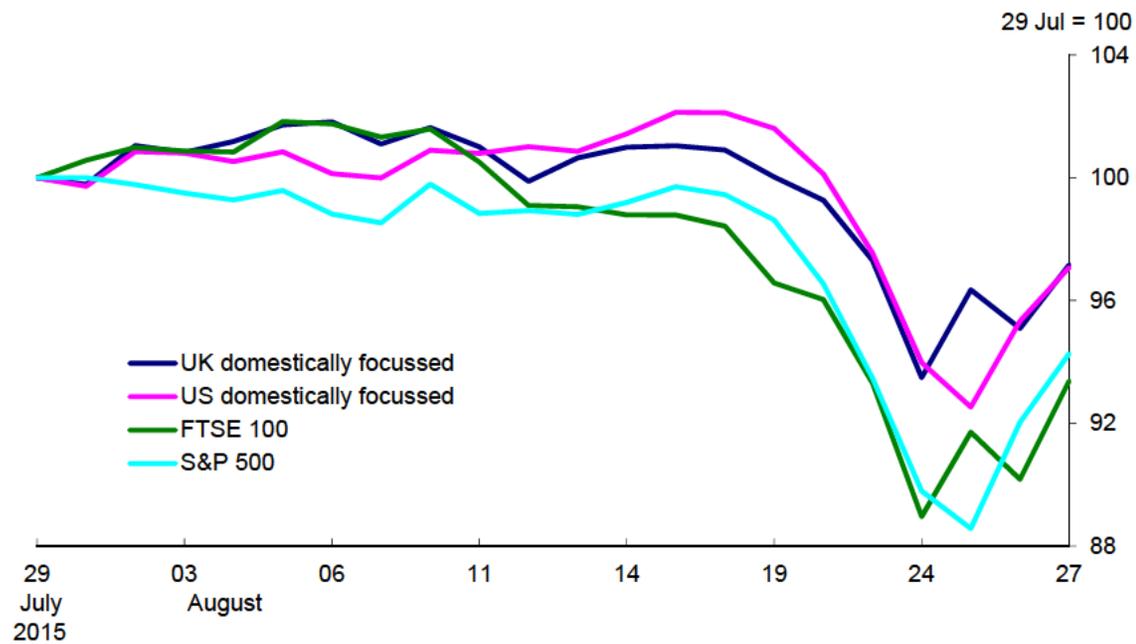
- Lower equity markets since FSR / MPC, even before last week's round trip in equity prices

Equity indices for sectors of the FTSE All-Share



- Largest falls were in internationally-exposed or commodity price-sensitive sectors

Domestically focussed and overall equity indices



- In developed markets, falls were less marked amongst domestically-focussed firms

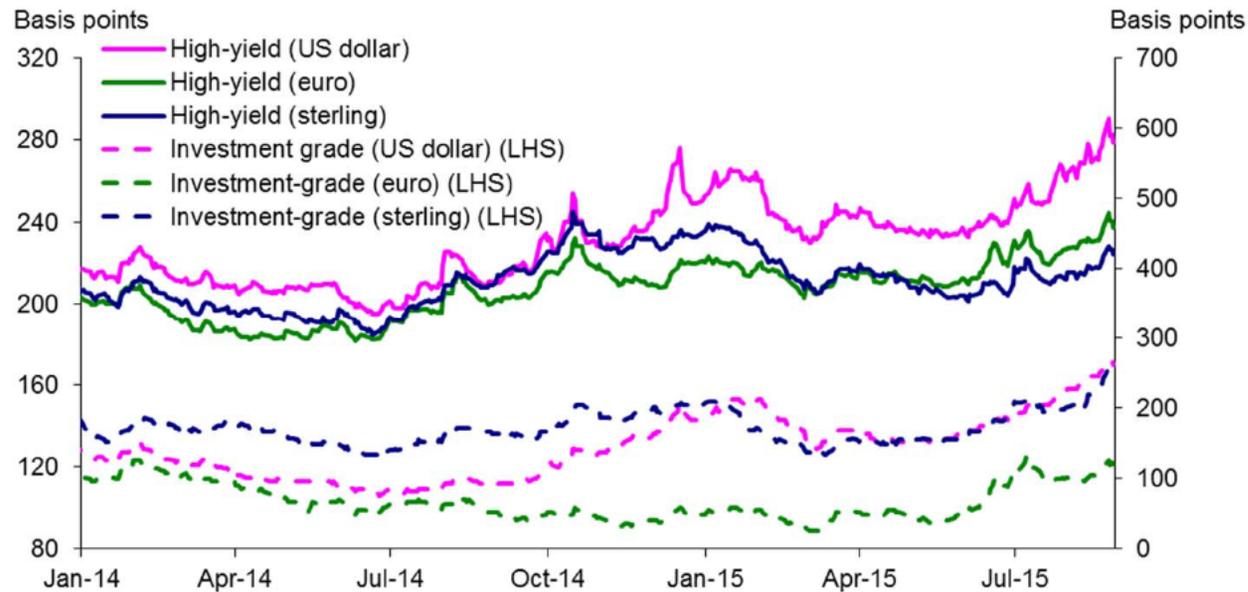
Last week's equity volatility

- Proximate trigger – no China stimulus; sharp falls in developed market indices
- One day outflows from equity mutual funds highest since 2007
- US equity 'circuit breakers' worked, but had other consequences
- Material losses for short-volatility strategies but banks apparently OK
- Higher volatility reduced market making; possible contagion effects



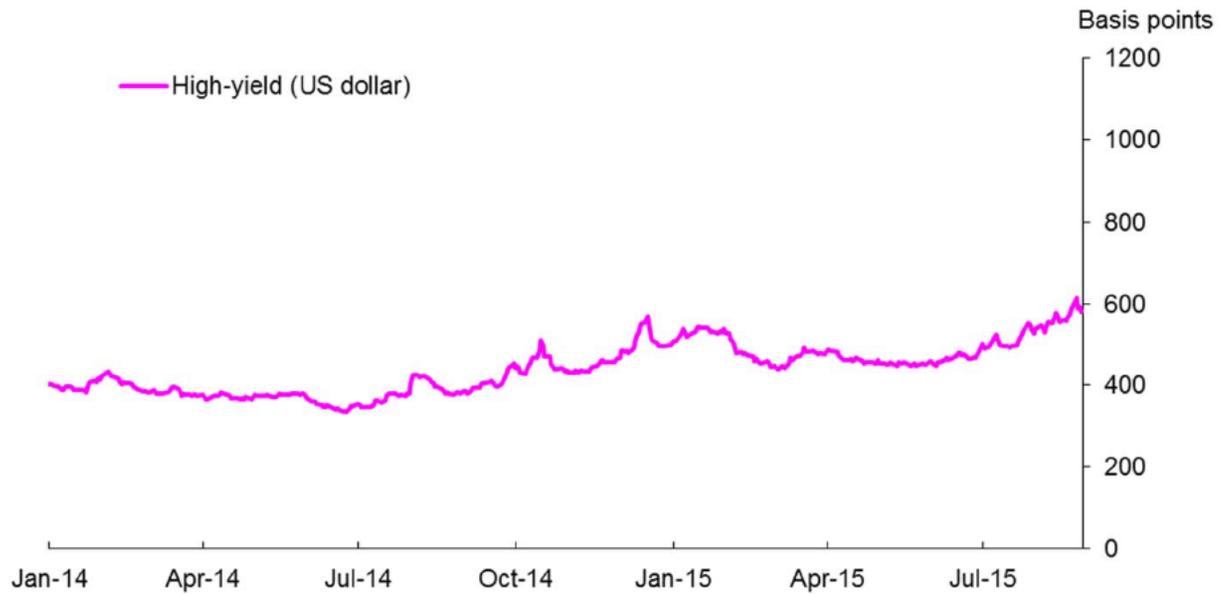
Corporate credit

International corporate bond spreads

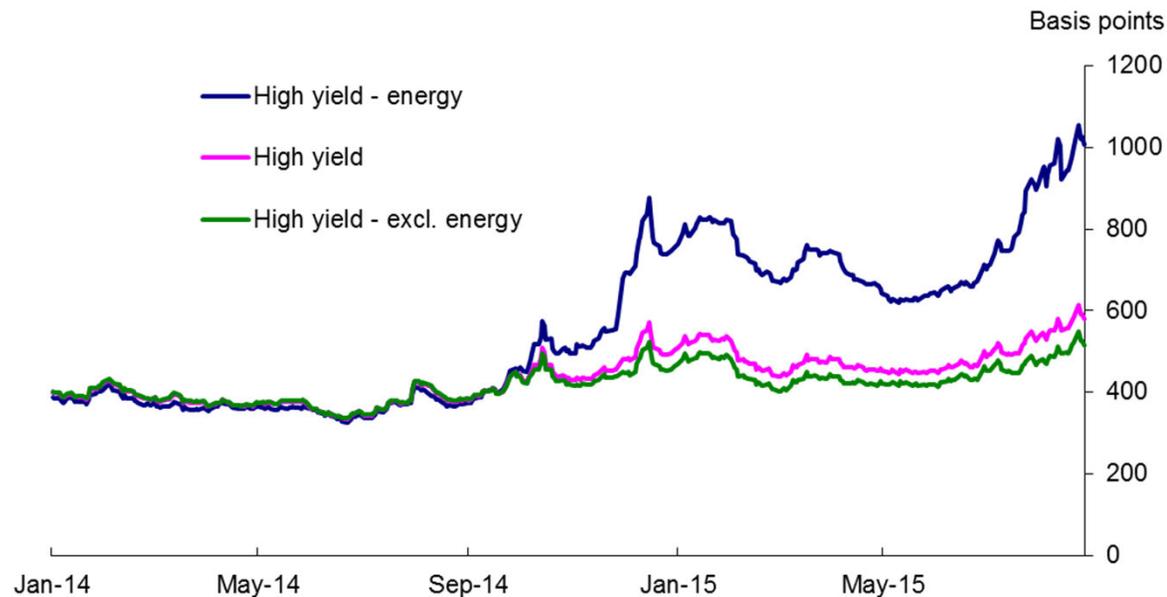


- US high yield credit stands out for the greatest widening in credit spreads
- Relevant to UK financial stability given common issuer and investor bases

US high yield corporate bond spreads

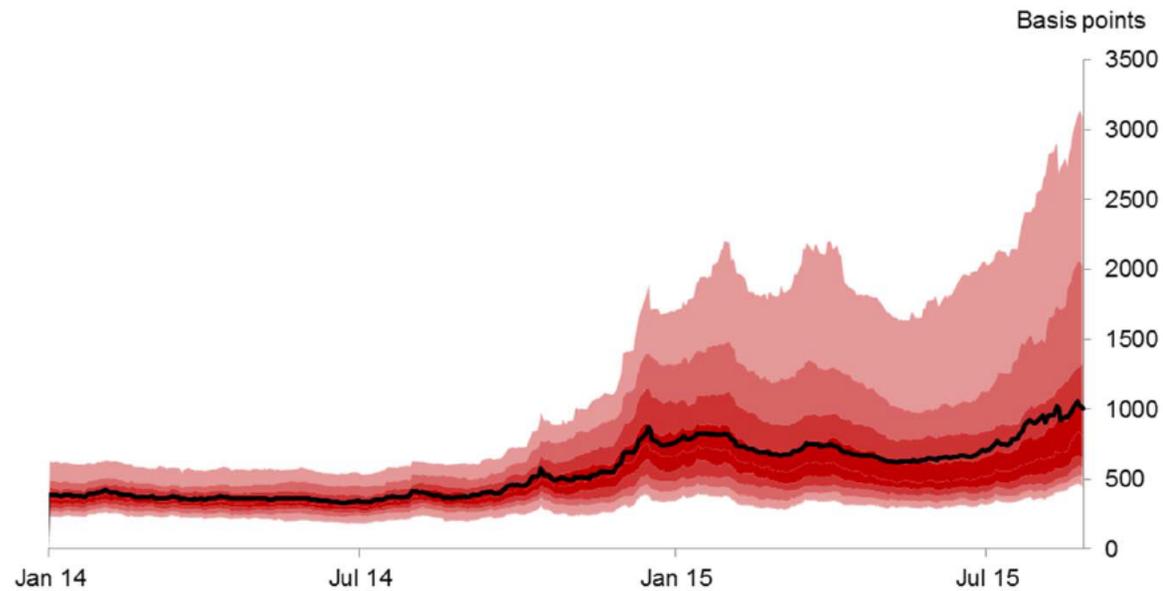


US high yield corporate bond spreads



- Most of the widening in US high yield bond spreads attributable to energy firms

Distribution of USD HY energy spreads (10th-90th percentiles)

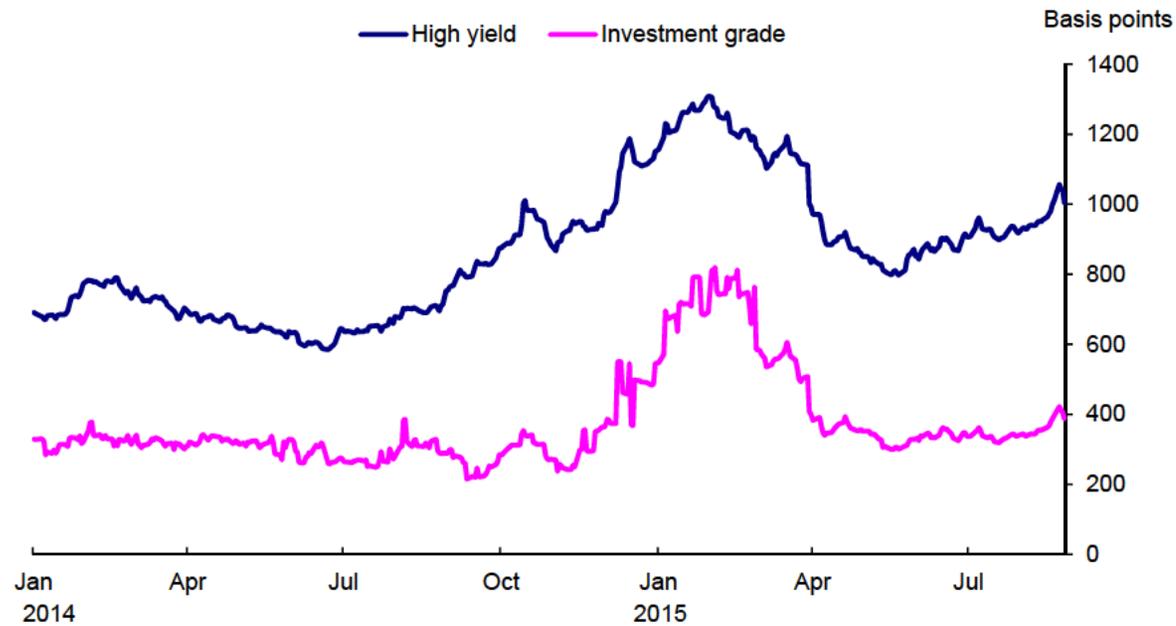


- Distribution of spreads within the energy index has widened significantly

Evidence on US high yield energy risks

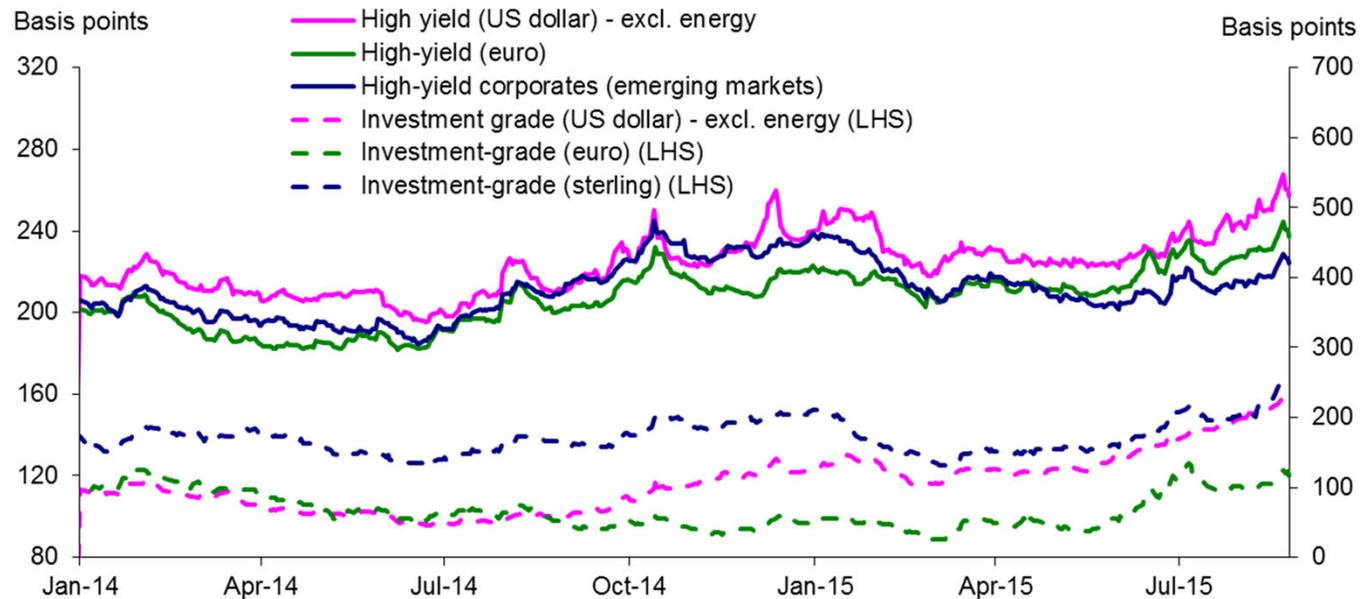
- Risks
 - Margin-pressured firms facing even lower oil prices with maturing loan facilities → higher probability of default
- Spill overs to broader high yield market
 - Common investor base between energy and non-energy → contagion to non-energy sector
 - MI indicates that actively managed bond mutual funds have reduced energy holdings
 - Some debt held by those better place to absorb losses
- But contagion risk remains

Emerging market corporate bond spreads



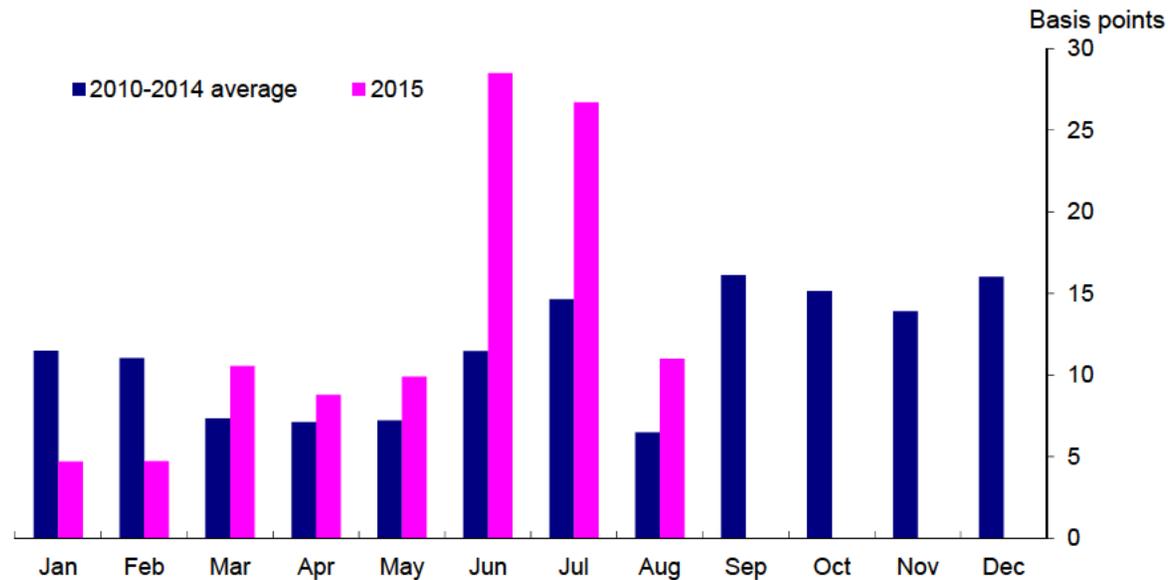
- Emerging market corporate bond spreads widened, but not to levels earlier this year

US dollar corporate bond spreads



- US corporate releveraging one of the factors behind higher corporate bond spreads generally
- Corporate and emerging market bond mutual funds vulnerable to outflows

Estimated euro-denominated corporate bond new issue premia



- Premium to issue new bonds over secondary market spreads an indicator of transmission from secondary market volatility to real economy.
- Premia rose around Greece events, but some signs of resilience since

Summary

- Developed market policy and inflation expectations driven by China
 - Monetary policy rate expectations now more diffuse
- Risky asset price volatility global in nature
 - Trigger was not higher expected interest rates...
 - ...but moves occurred against backdrop of low interest rate risks
 - ...and were potentially amplified by evolution in market structure



3: Credit Conditions

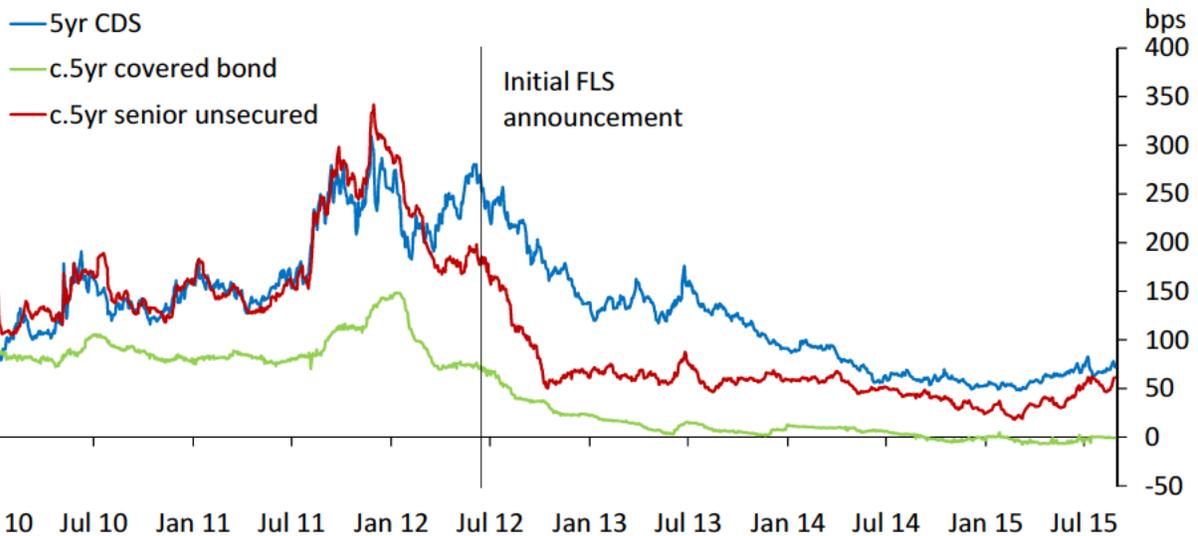
Credit Conditions September 2015

Agenda

- **Corporate credit conditions**
- **Unsecured credit conditions**

Bank funding spreads have picked up a little

Indicative measures of bank funding spreads

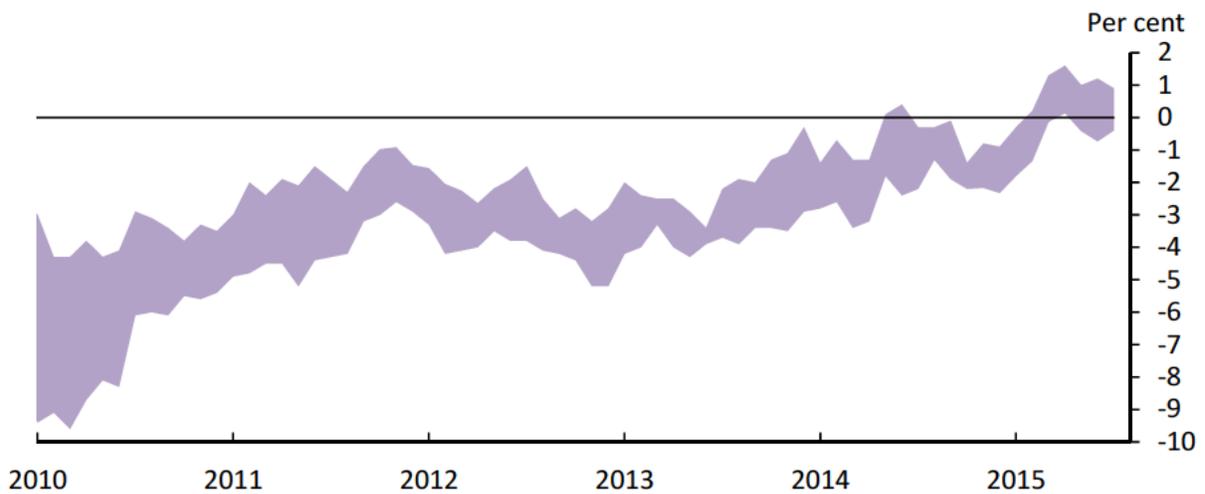


Agenda

- **Corporate credit conditions**
- Unsecured credit conditions

Lending growth has slowed a little

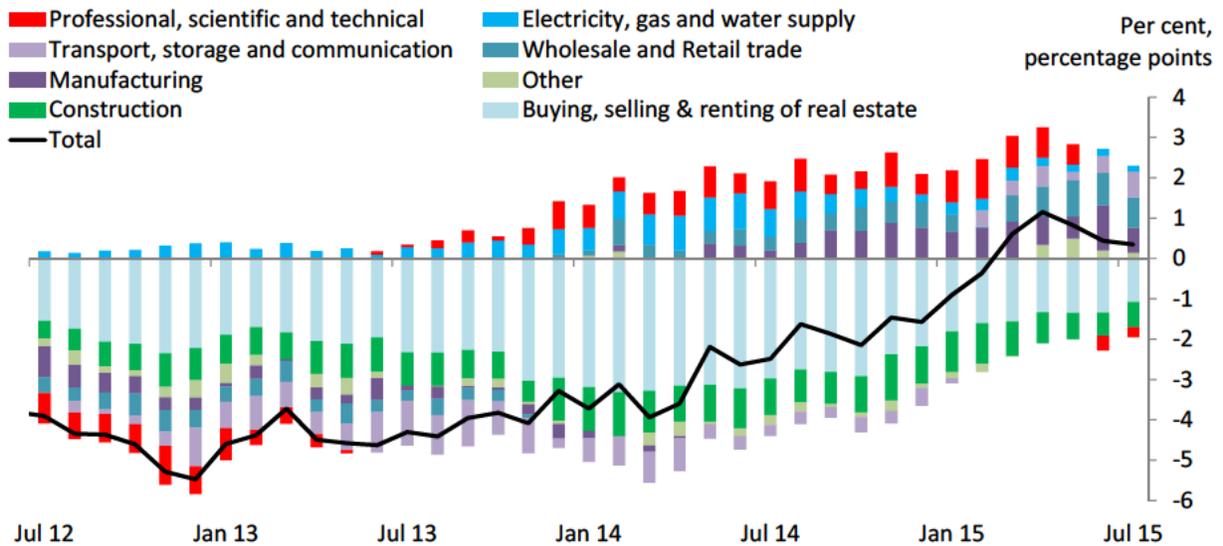
Swathe of measures of 12m growth in PNFC lending



The measures in the swathe are PNFC M4L (SA), sterling loans to PNFCs (SA), all currency loans to PNFCs (SA) and all currency loans to non-financial businesses (NSA).

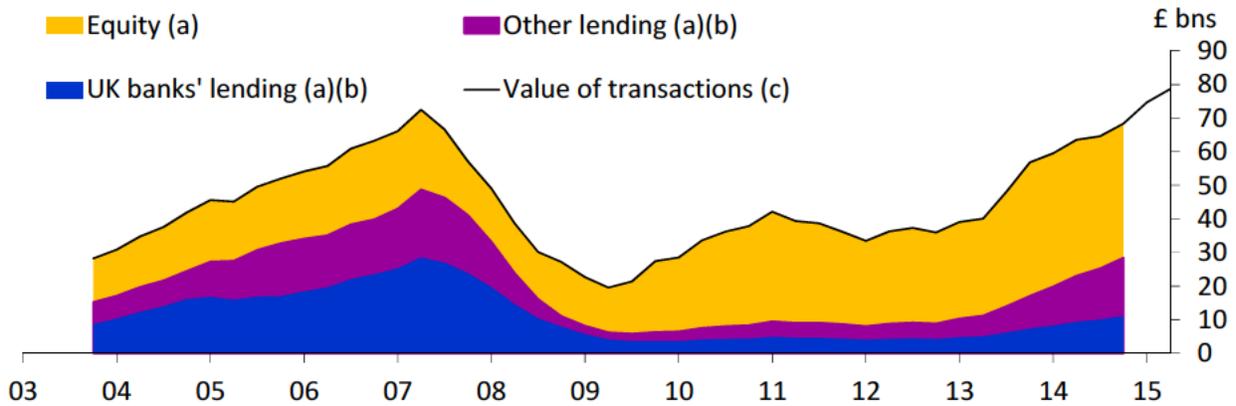
Property sectors deleveraging, but most others borrowing

Contributions to 12m growth in lending to businesses, by industry



Although CRE activity is picking up

Gross financing of CRE transactions



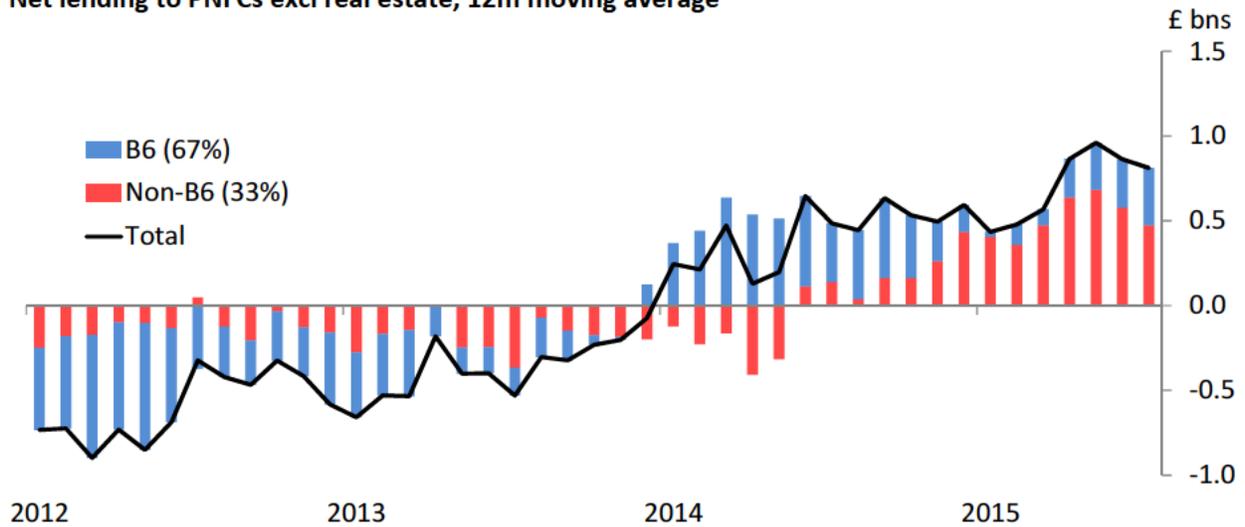
Source: CBRE, De Montfort University, The Property Archive and Bank calculations.

(a) Annual data, interpolated to match quarterly transactions data. (b) Excludes refinancing. (c) Four quarter moving sum of the value of transactions.

- Chinese investors have accounted for around £10bn of total gross investment over the past 5 years.

Non-B6 contributing strongly to corporate lending

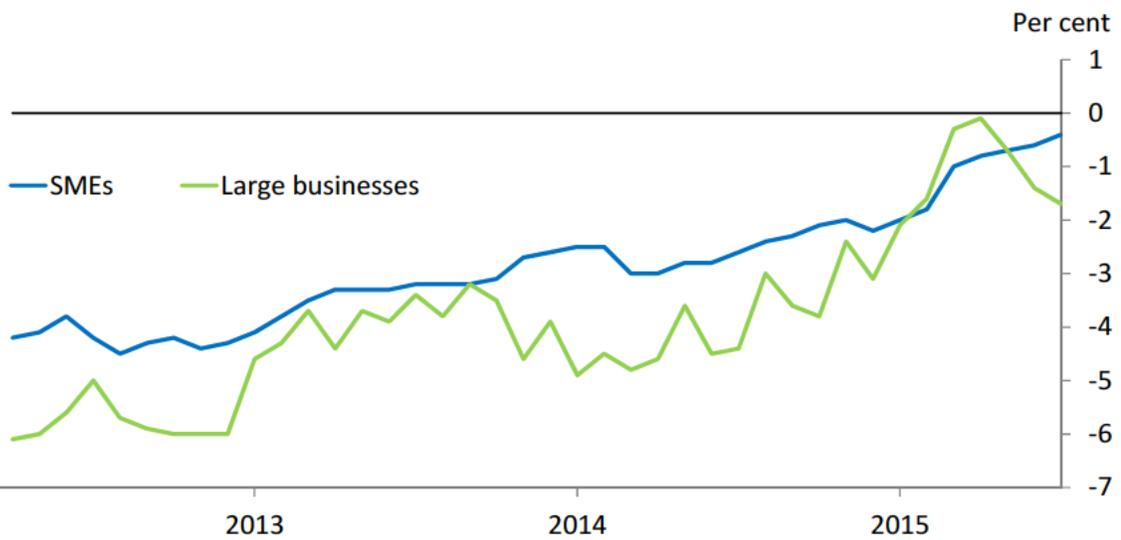
Net lending to PNFCs excl real estate, 12m moving average



Percentages in brackets show shares of the stock of non-real estate PNFC lending.

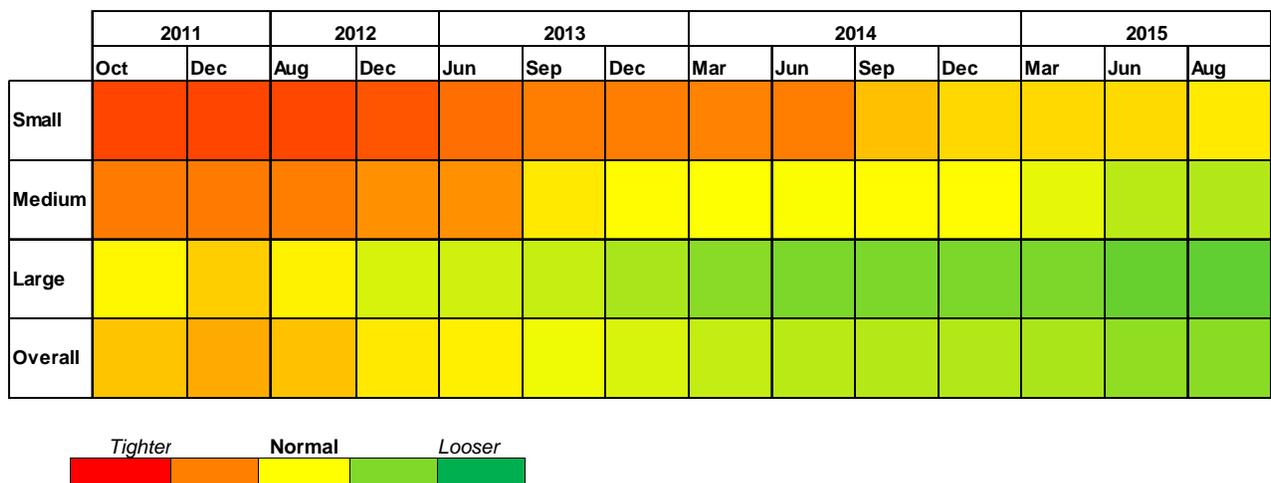
SME lending growth steadily increasing

Lending to non-financial businesses, 12m growth



Differences in credit conditions across firm sizes remain

Agents' heatmap of corporate credit availability



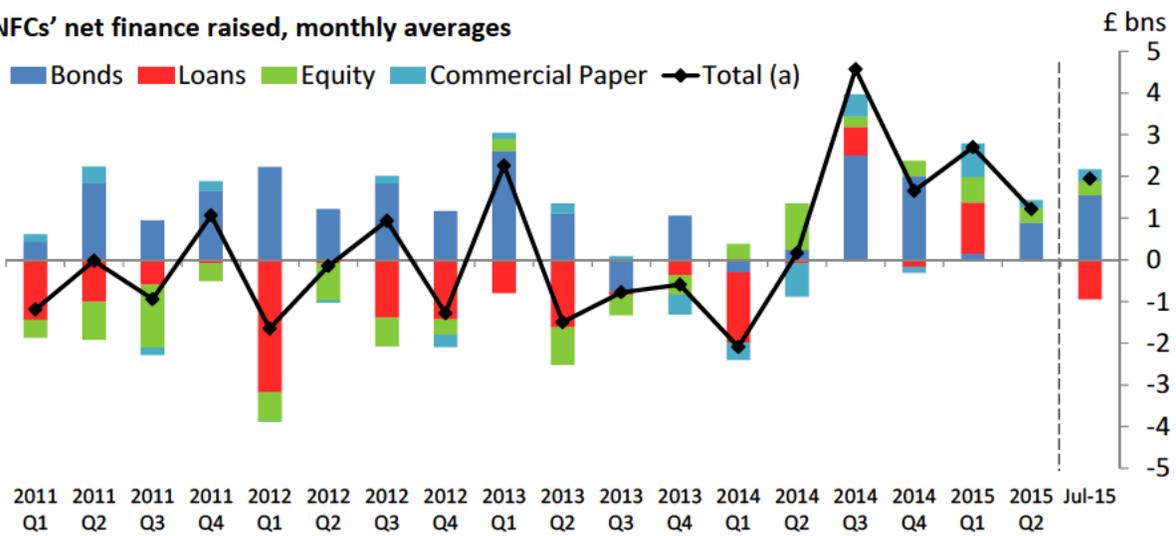
Credit facilities growing faster than lending

Cumulative flows in net lending to PNFCs excl real estate, NSA



Larger firms drawing funding from a variety of sources

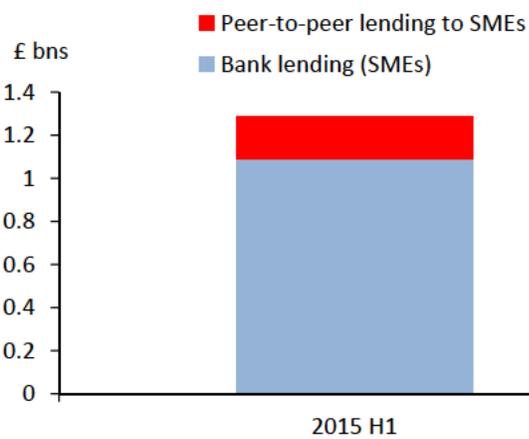
PNFCs' net finance raised, monthly averages



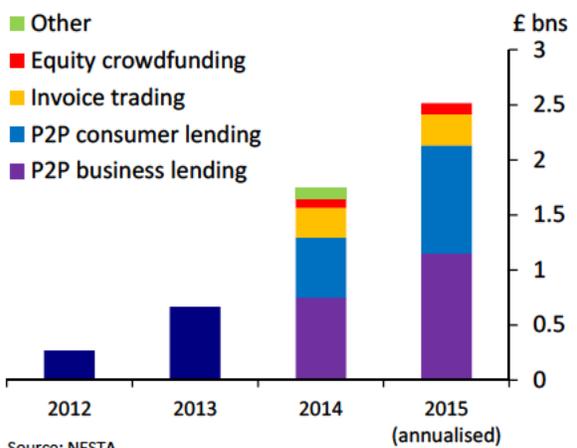
(a) Owing to the seasonal adjustment methodology, this series may not equal the sum of its components

Alternative finance market growing fast, but still small

Net lending to SMEs



Gross flows of alternative finance market by platform

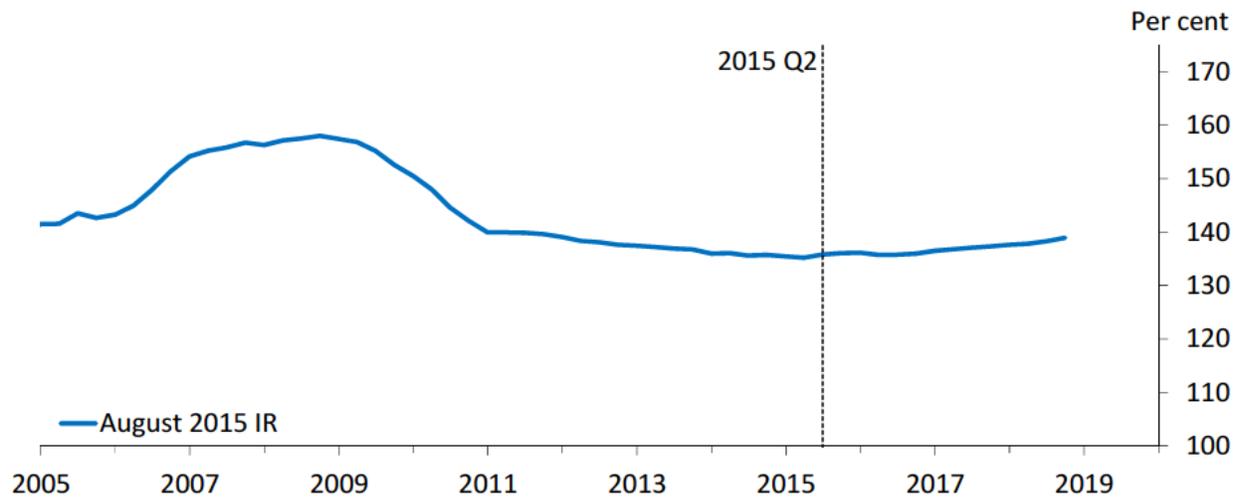


Summary – corporate credit conditions

- In most sectors, bank lending to companies has remained positive over the past few quarters.
- But other sources of finance continue to be important, particularly for larger companies.

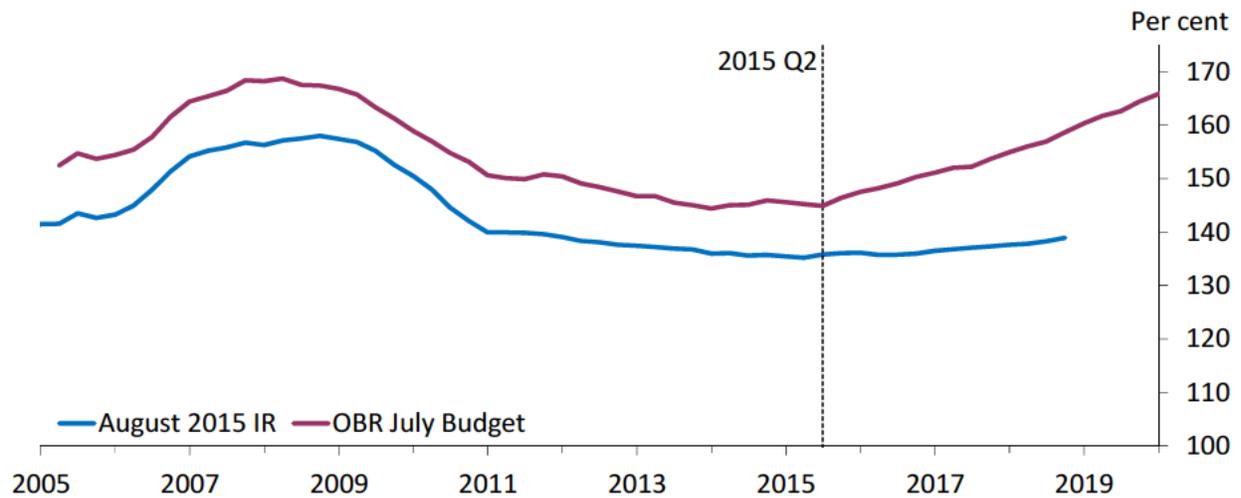
Household debt to income expected to remain broadly flat

Household debt to income



...but OBR expect it to increase

Household debt to income

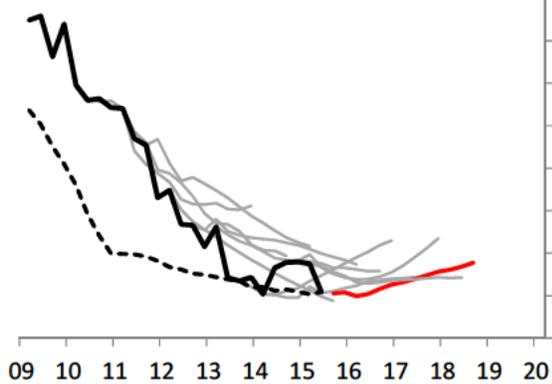


The OBR measure of household gross debt is defined as household total financial liabilities. The Bank's measure of household gross debt, as defined in the FPC core indicator, is total financial liabilities excluding pension scheme liabilities and financial derivatives and employee stock options.

Data have been more in line with Bank projections

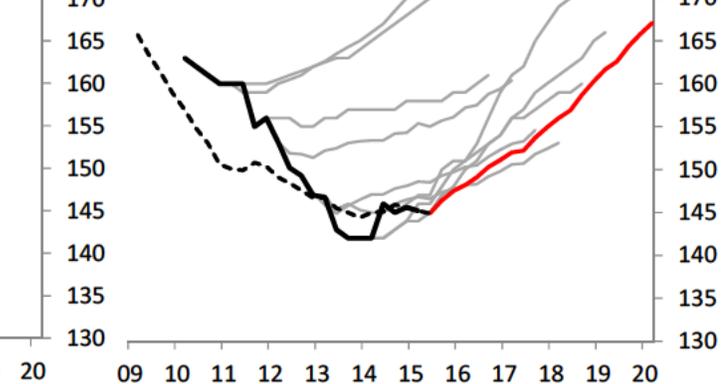
BOE debt to income forecasts

- August 15 IR
- Previous forecasts
- Realtime data
- - - Latest backdata



OBR debt to income forecasts

- July 15 OBR
- Previous forecasts
- OBR realtime data
- - - OBR latest backdata



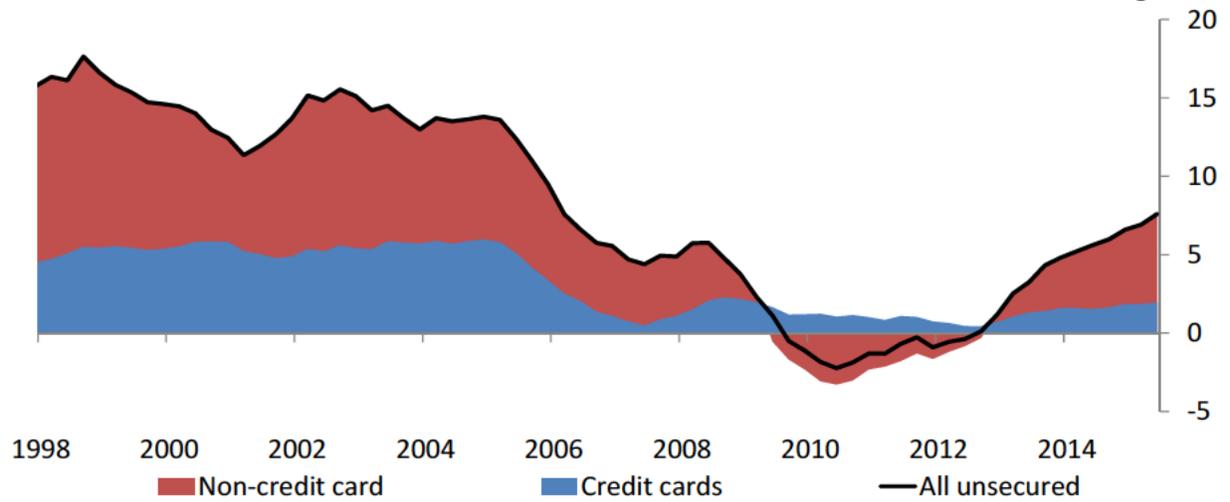
Agenda

- Corporate credit conditions
- **Unsecured credit conditions**

Non-credit card lending driving pickup

Unsecured lending

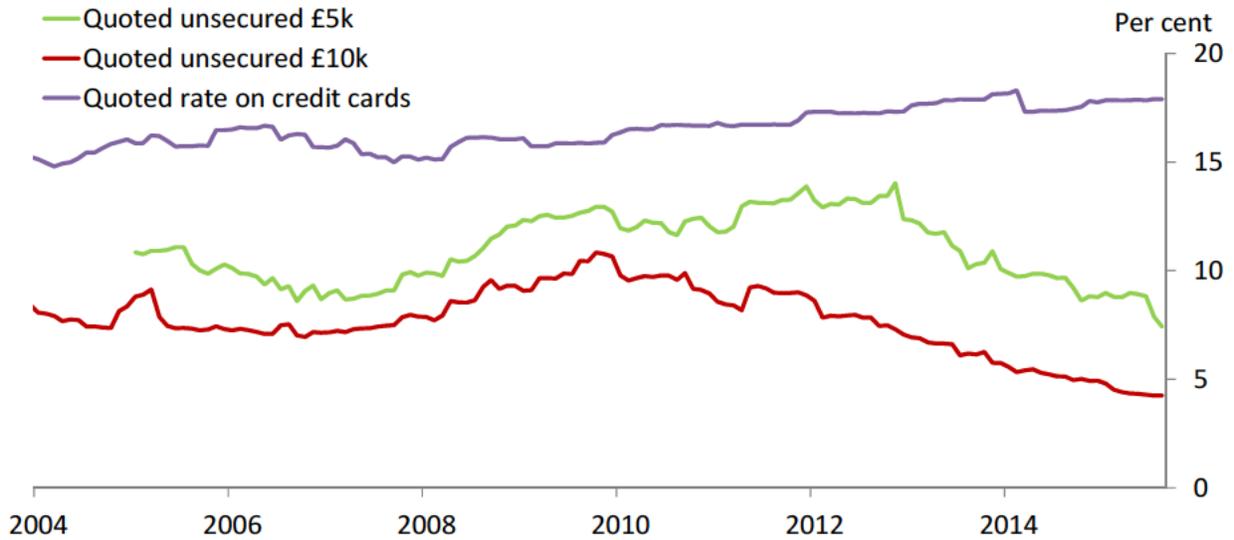
Contributions to 12m growth



Quoted rates on personal loans have fallen...

Unsecured lending rates

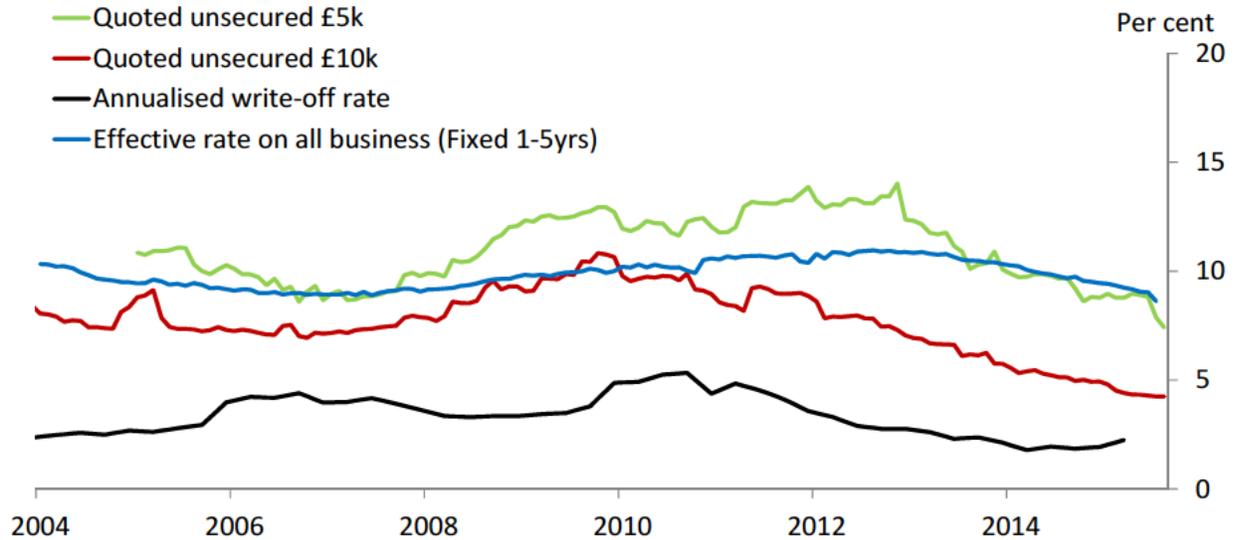
- Quoted unsecured £5k
- Quoted unsecured £10k
- Quoted rate on credit cards



...but average rates paid remain quite high

Unsecured lending rates

- Quoted unsecured £5k
- Quoted unsecured £10k
- Annualised write-off rate
- Effective rate on all business (Fixed 1-5yrs)



Credit Conditions

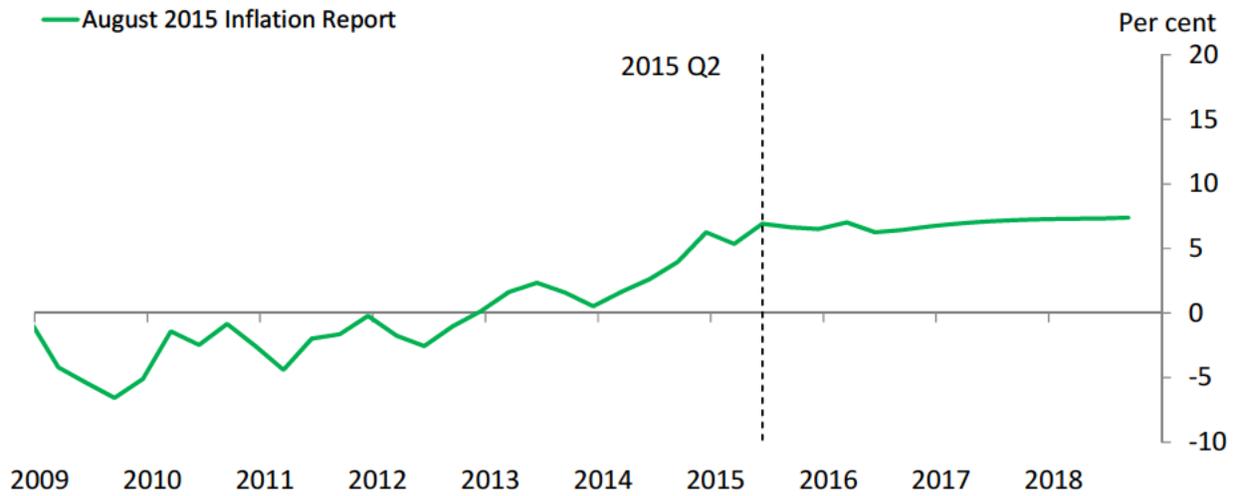
Slide 21

September 2015

Unsecured lending growth projected to continue

Annual growth of unsecured credit

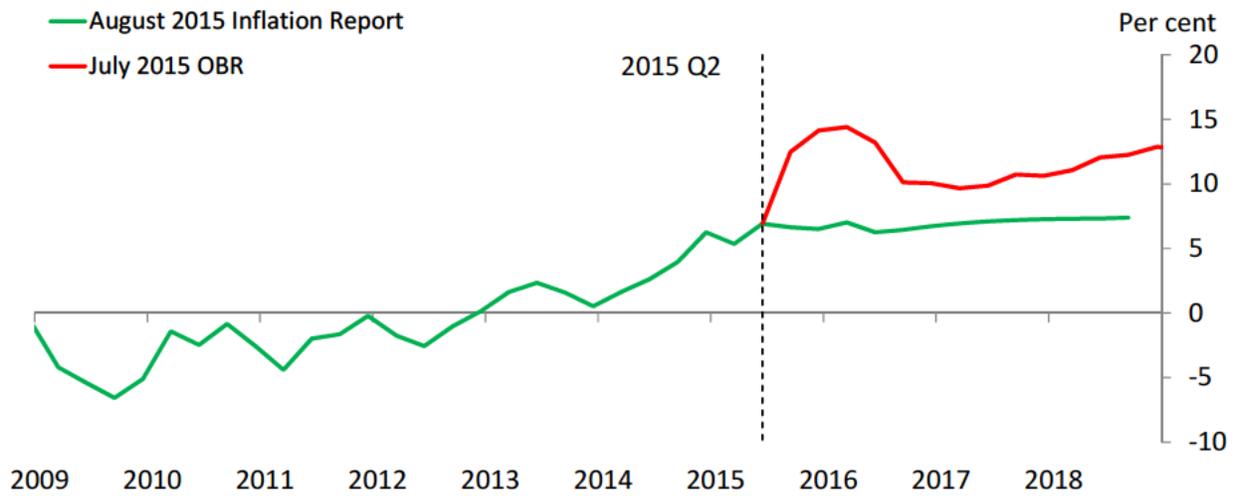
— August 2015 Inflation Report



The OBR is projecting a further pickup

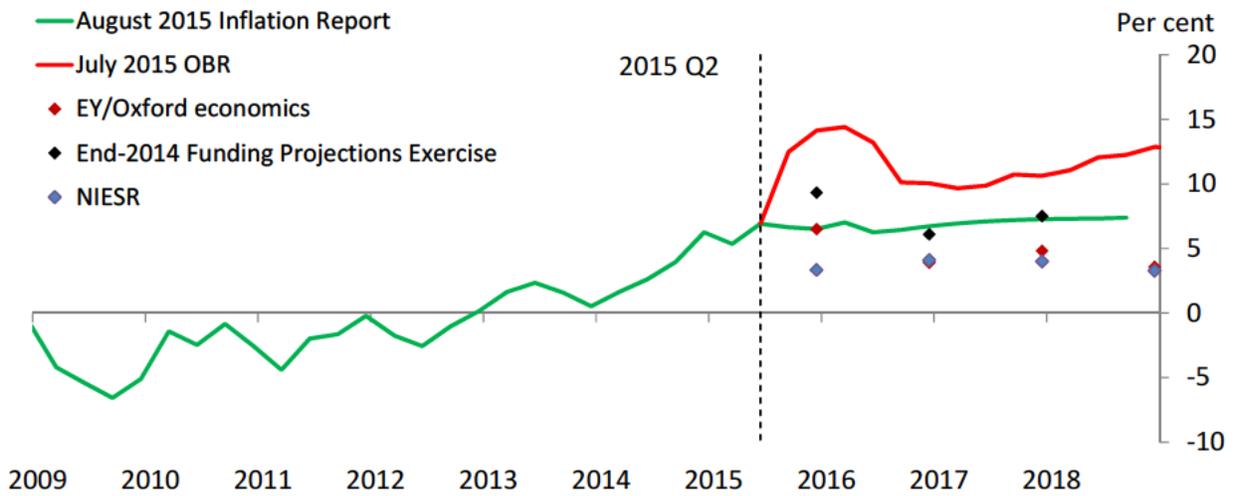
Annual growth of unsecured credit

- August 2015 Inflation Report
- July 2015 OBR



Others expect below pre-crisis average growth

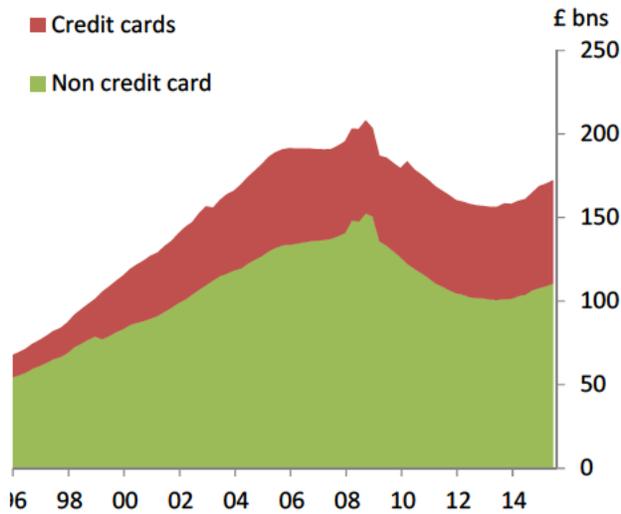
Annual growth of unsecured credit



Outstanding stock of consumer credit quite low

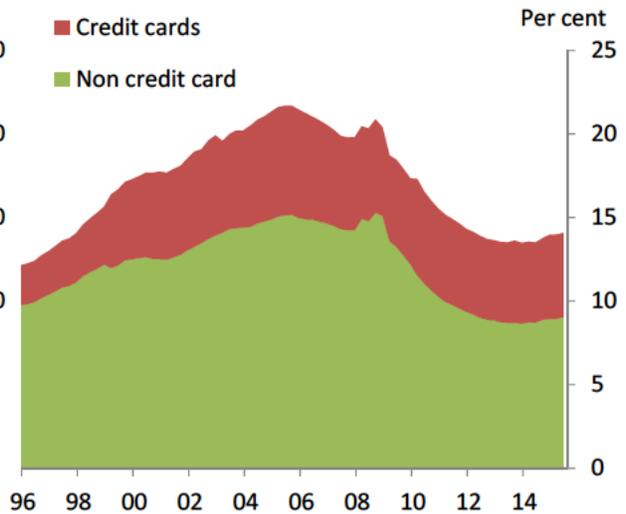
Stock of unsecured lending

- Credit cards
- Non credit card



Unsecured debt to income ratio

- Credit cards
- Non credit card



Market Intelligence

- Initial work for 2015 stress test suggests average credit quality of borrowers has increased.
- The data are also consistent with risk-based pricing of personal loans.
- There is more concern over easing in credit card terms, e.g. length of free balance transfer periods.
- But in general the risks from consumer credit portfolios remain small at present.

Summary

- In most sectors, bank lending to companies has remained positive over the past few quarters.
- But other sources of finance continue to be important, particularly for large companies.
- Unsecured credit growth has been solid and is expected to continue, but not to rise much further.
- Direct risks from consumer credit to financial stability remain limited, however.

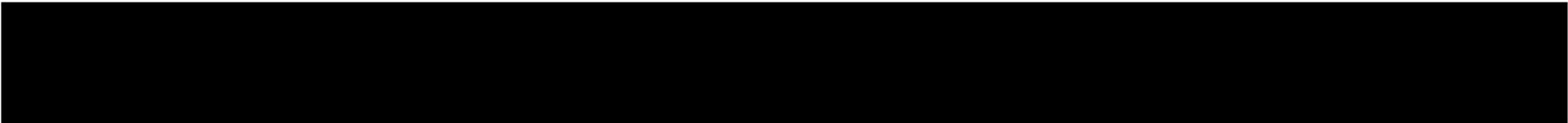


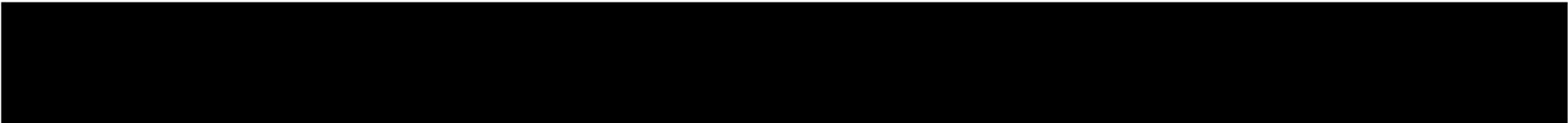
4: Domestic Real Economy



FSSR, MA, Agents, FCA



- 
- **Housing market**
 - Demand and output
- 



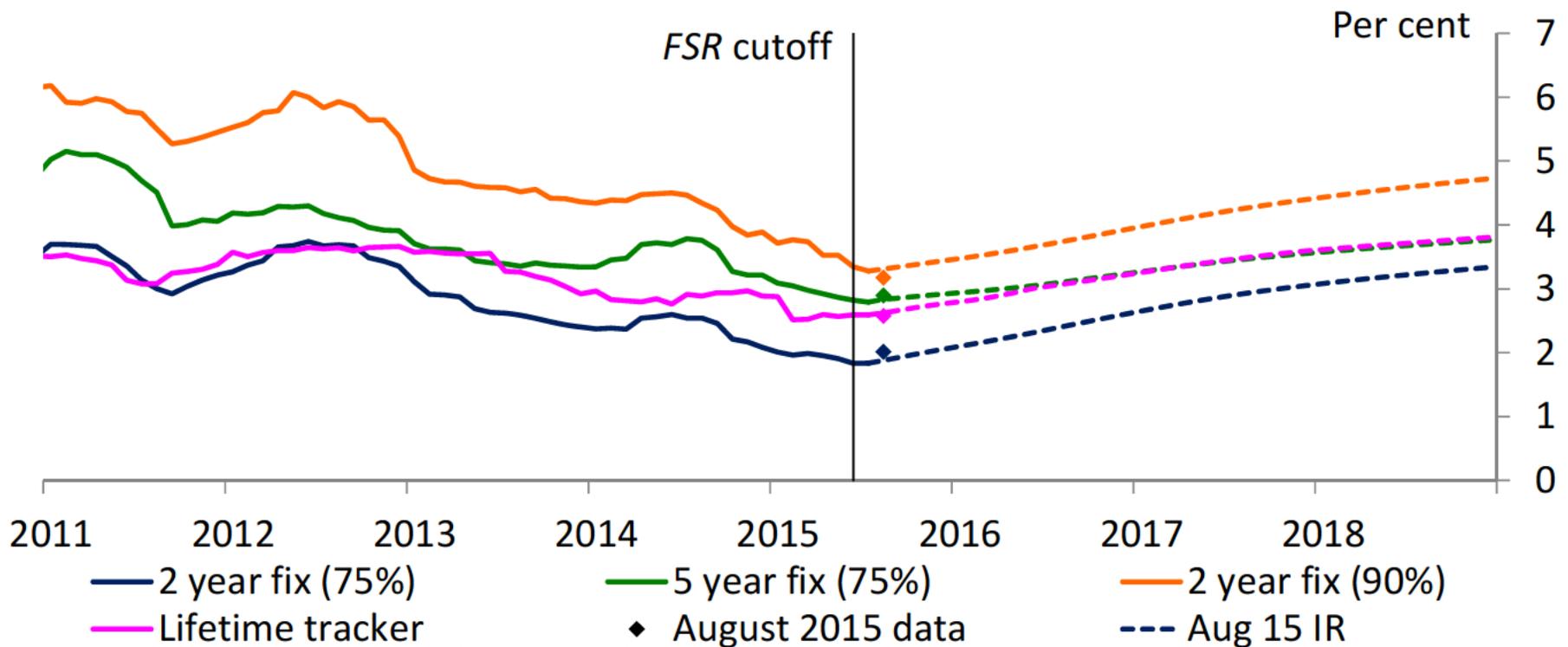
- **Housing market**

- **Activity and prices**

- Secured debt

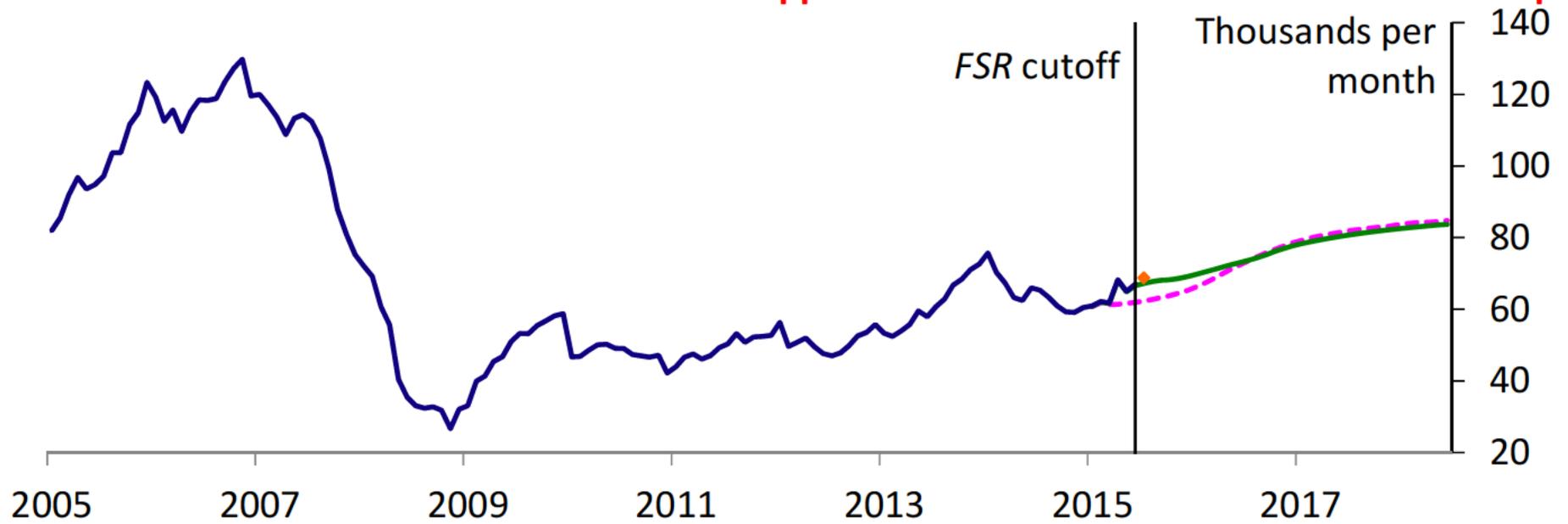
- Owner occupier and buy to let comparisons





- The spread between high and low LTV products has fallen to its lowest level since the start of the crisis.

Approvals data are Bank confidential until 1 Sept



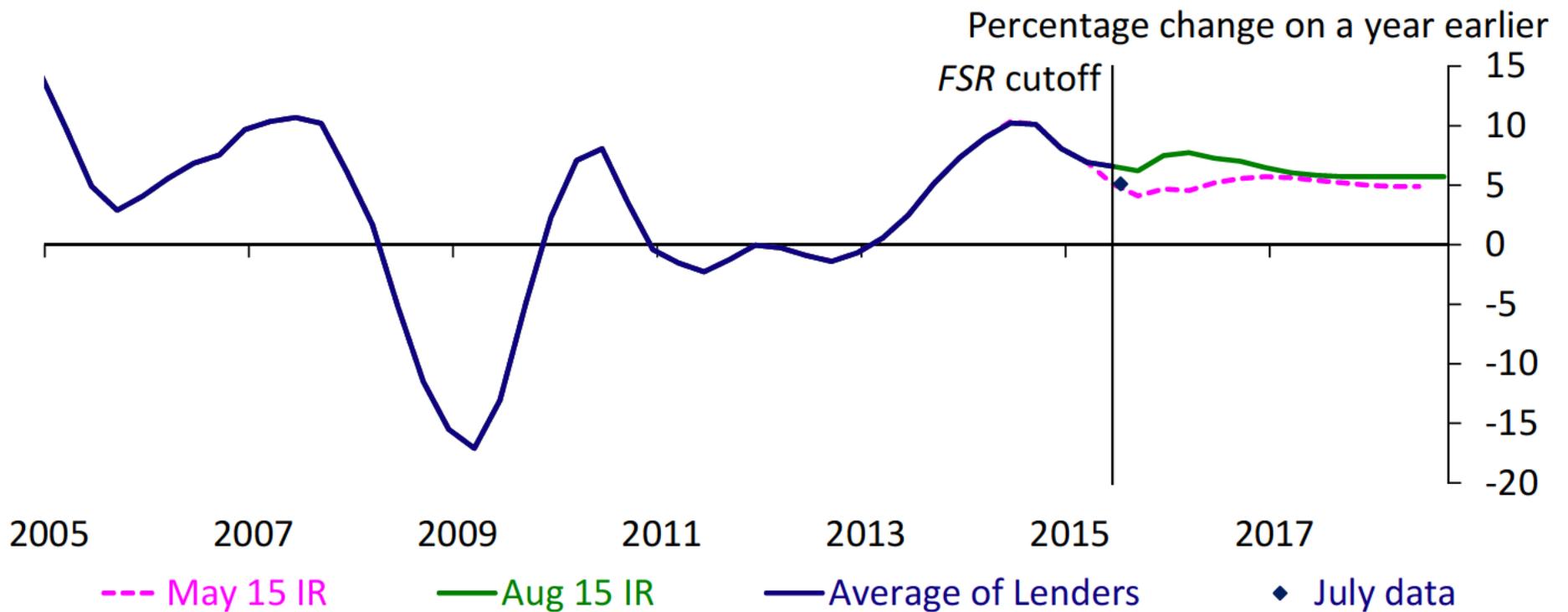
--- May 15 IR forecast

— Aug 15 IR forecast

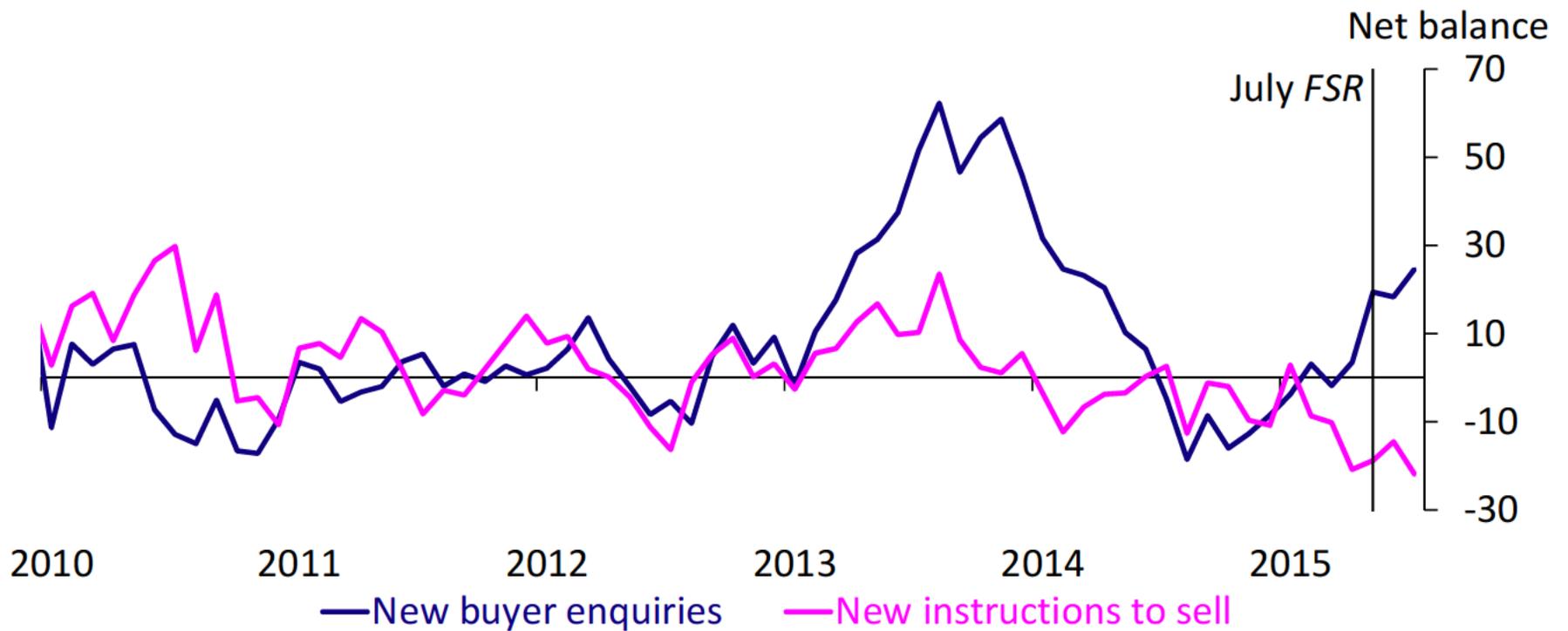
— Mortgage approvals for house purchase

◆ July data

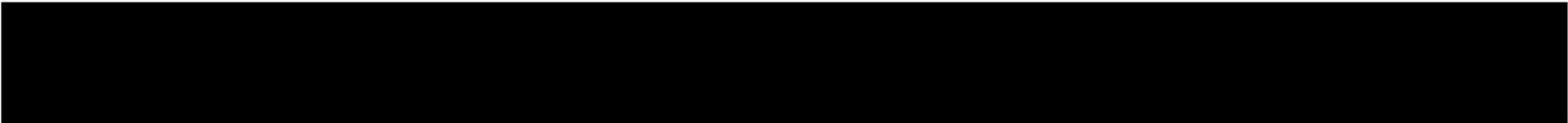
- There were 68,764 approvals in July: more than expected in the August IR and an increase on the month of 2.5%.

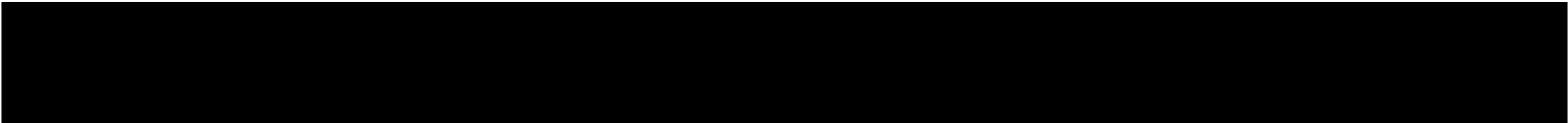


- The Nationwide index rose by only 0.3% in August, less than expected in the Aug IR.



- Housing demand has continued to increase faster than supply, suggesting that house prices will continue to rise.

- 
- **Stock shortages** are cited as a constraint by all estate agents, with a **reluctance of homeowners to put their homes on the market until they find a property to buy** cited as the most common explanation.
 - Modest pickup in **transactions** since May, but weaker than contacts expected.
 - Limited supply is leading to some price **inflation**, but the picture is patchy and weakest in higher price brackets.
 - **House builders** plan steady growth in build rates, buoyed by strong demand and improved availability of land.
 - **Intense competition in the mortgage market** has led to keen pricing and increased LTVs for customers who meet affordability criteria.
- 
- 



- **Outlook for the housing market**

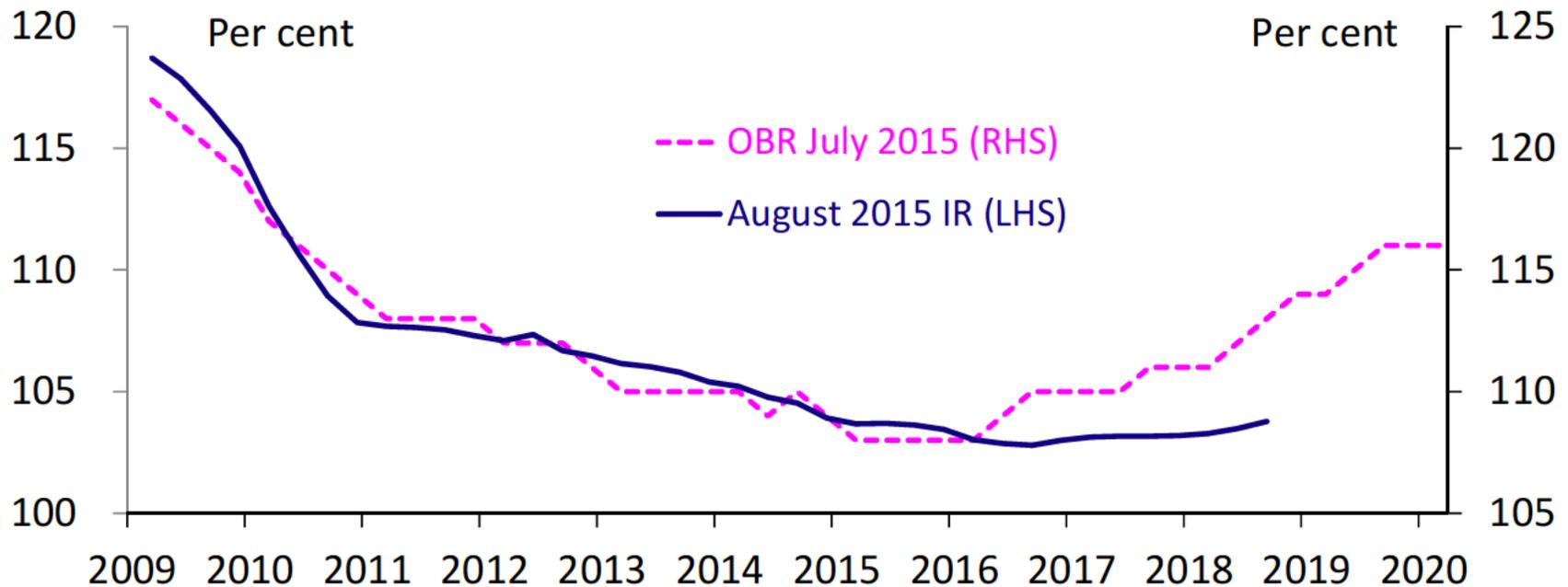
- **Activity and prices**

- August *IR* projections for gradual pickup in activity and prices broadly on track.

- Secured debt

- Owner occupier and buy to let comparisons

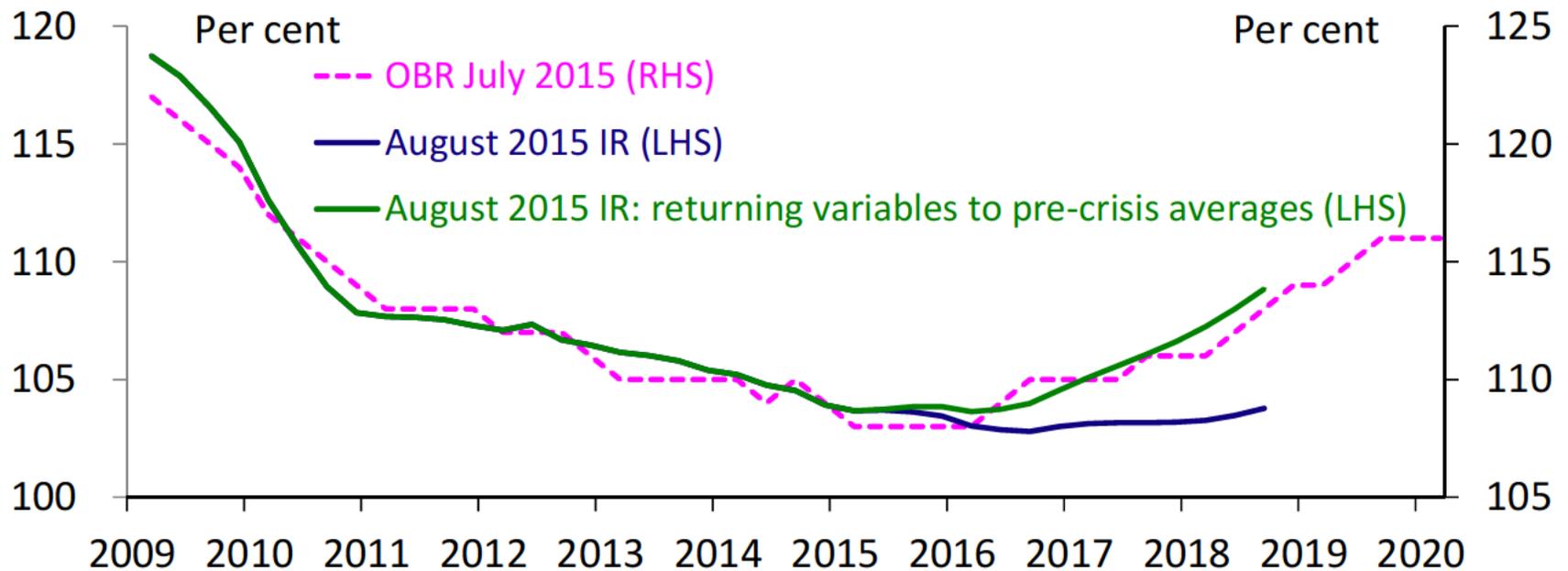




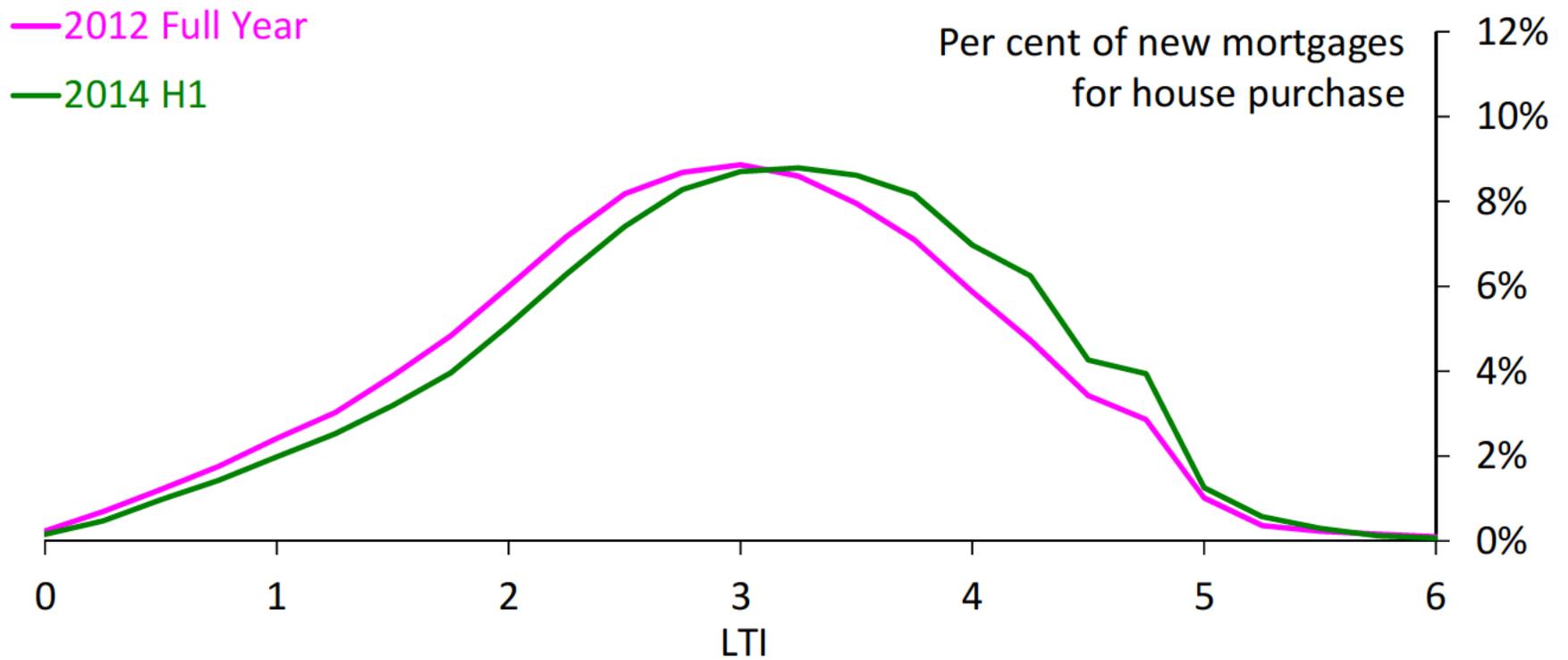
The OBR measure of household gross debt is defined as household total financial liabilities. The Bank's measure of household gross debt, as defined in the FPC core indicator, is total financial liabilities excluding pension scheme liabilities and financial derivatives and employee stock options.

- The OBR forecasts a stronger pickup in secured debt to income.

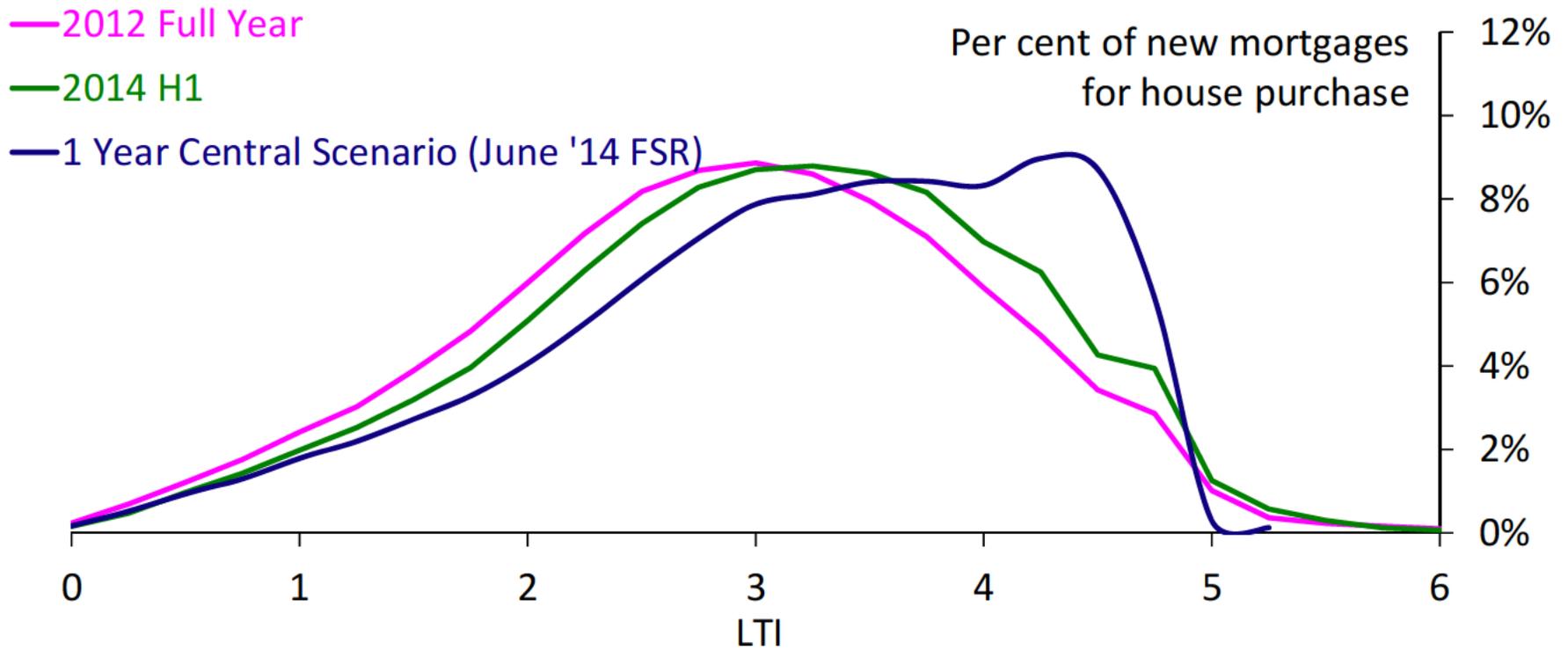
| Explanation | Economic rationale |
|---|---|
| Mortgage LTVs not expected to return to pre-crisis levels. | Re-pricing of risk of high LTV lending from pre-crisis. |
| Home-mover redemptions expected to be higher than pre-crisis. | Driven by a number of factors, including lower first-time buyer LTVs, more cash buyers and less equity release. |
| Other secured lending expected to be lower than pre-crisis. | Homeowners release less equity, due both to greater debt aversion, and reduced willingness of banks to lend for equity release. |



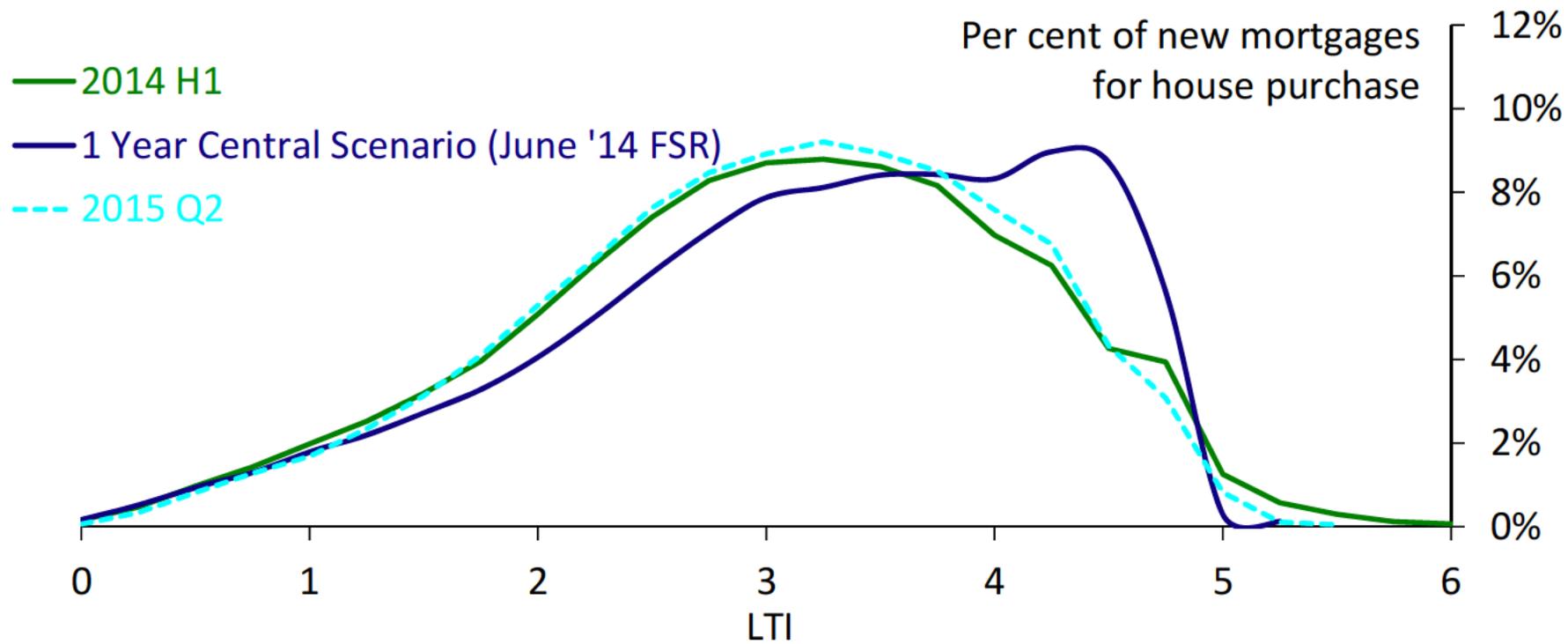
The OBR measure of household gross debt is defined as household total financial liabilities. The Bank's measure of household gross debt, as defined in the FPC core indicator, is total financial liabilities excluding pension scheme liabilities and financial derivatives and employee stock options.



Source: PSD and Bank calculations
 Data include loans to first-time buyers and homemovers.

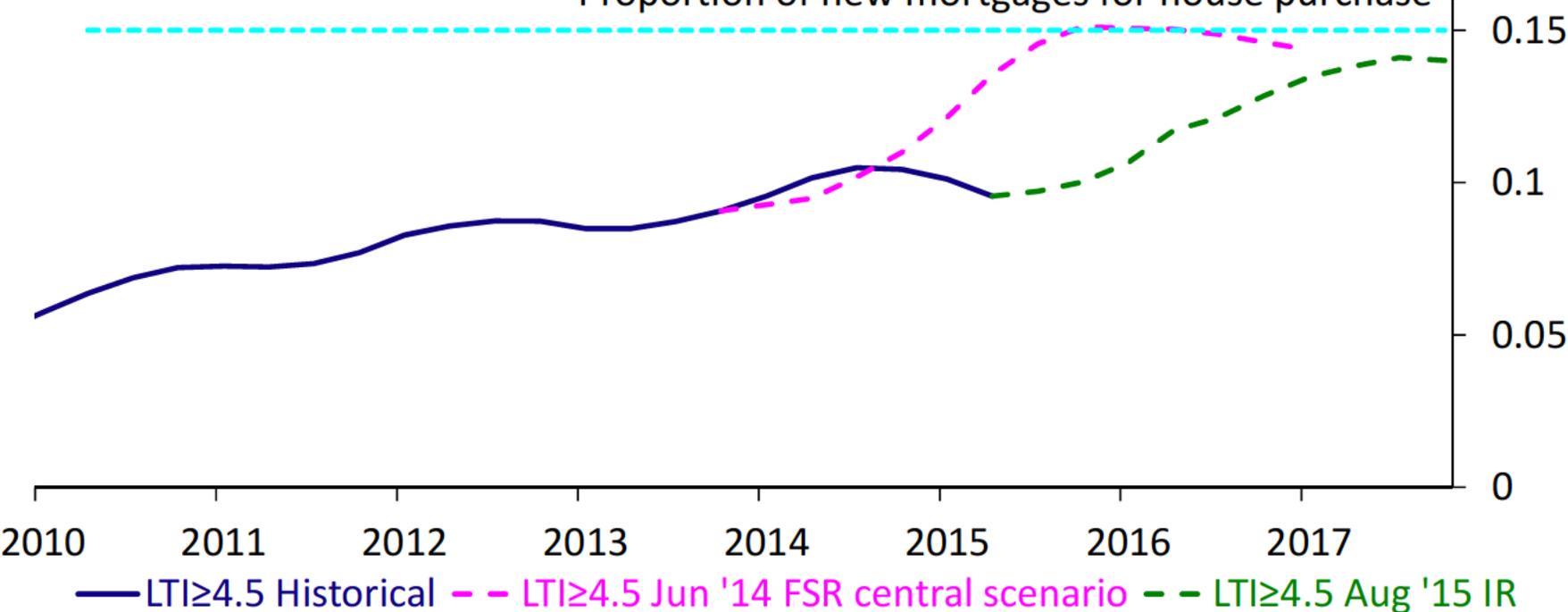


Source: PSD and Bank calculations
 Data include loans to first-time buyers and homemovers.

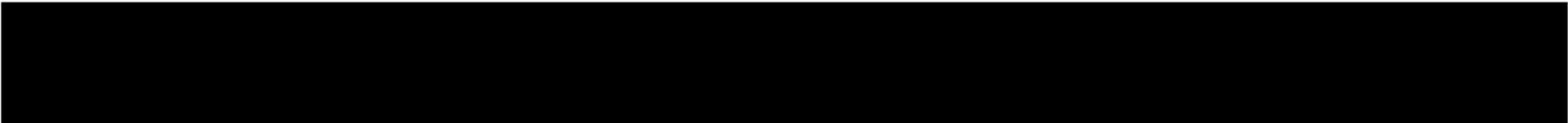


Source: PSD and Bank calculations
 Data include loans to first-time buyers and homemovers.

Proportion of new mortgages for house purchase



Source: PSD and Bank calculations
Four-quarter moving average. Data include only loans to first-time buyers and homemovers.



- **Outlook for the housing market**

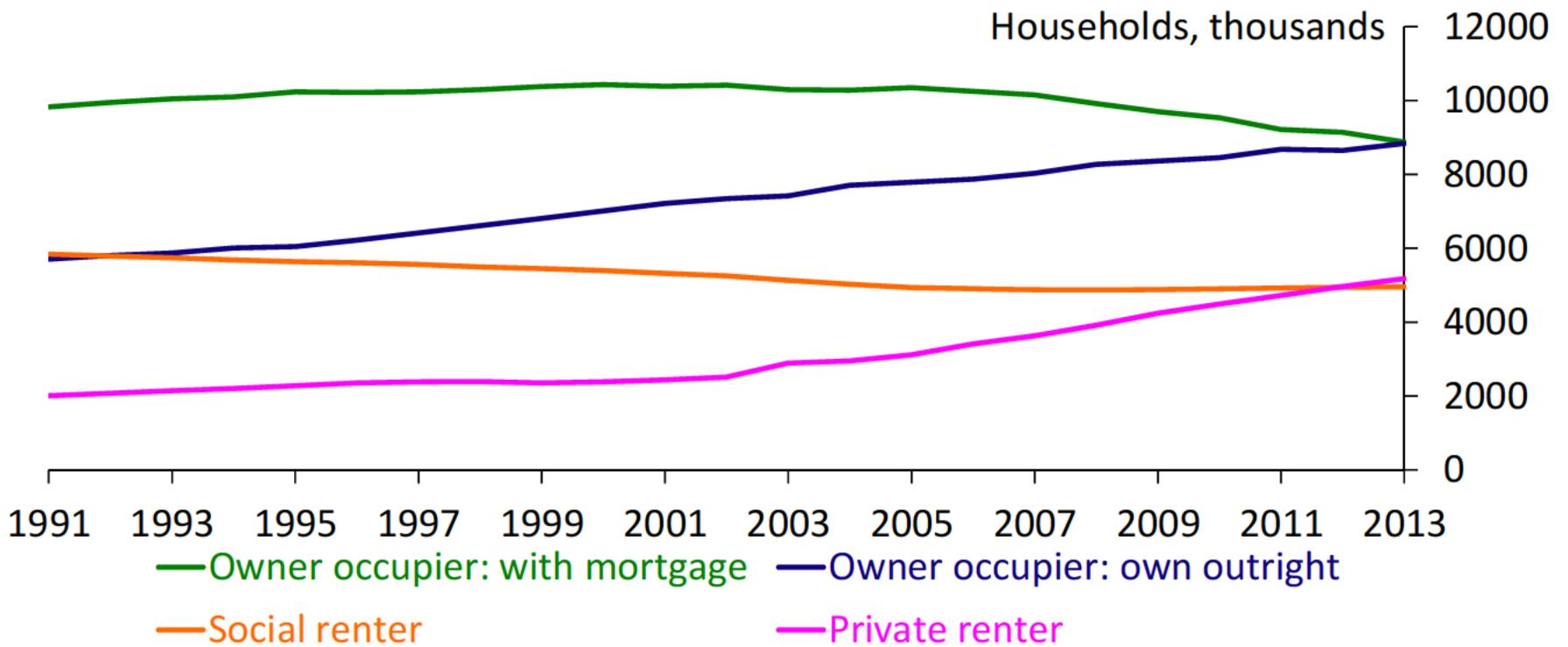
- Activity and prices

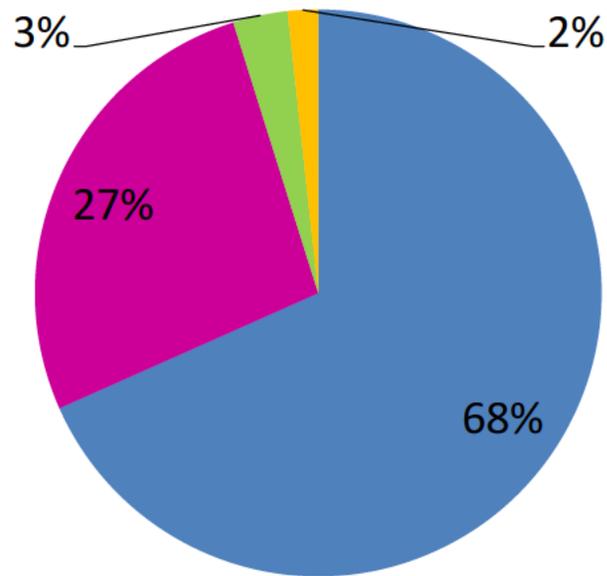
- **Secured debt**

- Secured debt to income expected to remain fairly flat.
Distribution of household LTIs has remained broadly constant
but some increase still expected over the forecast.

- Owner occupier and buy to let comparisons





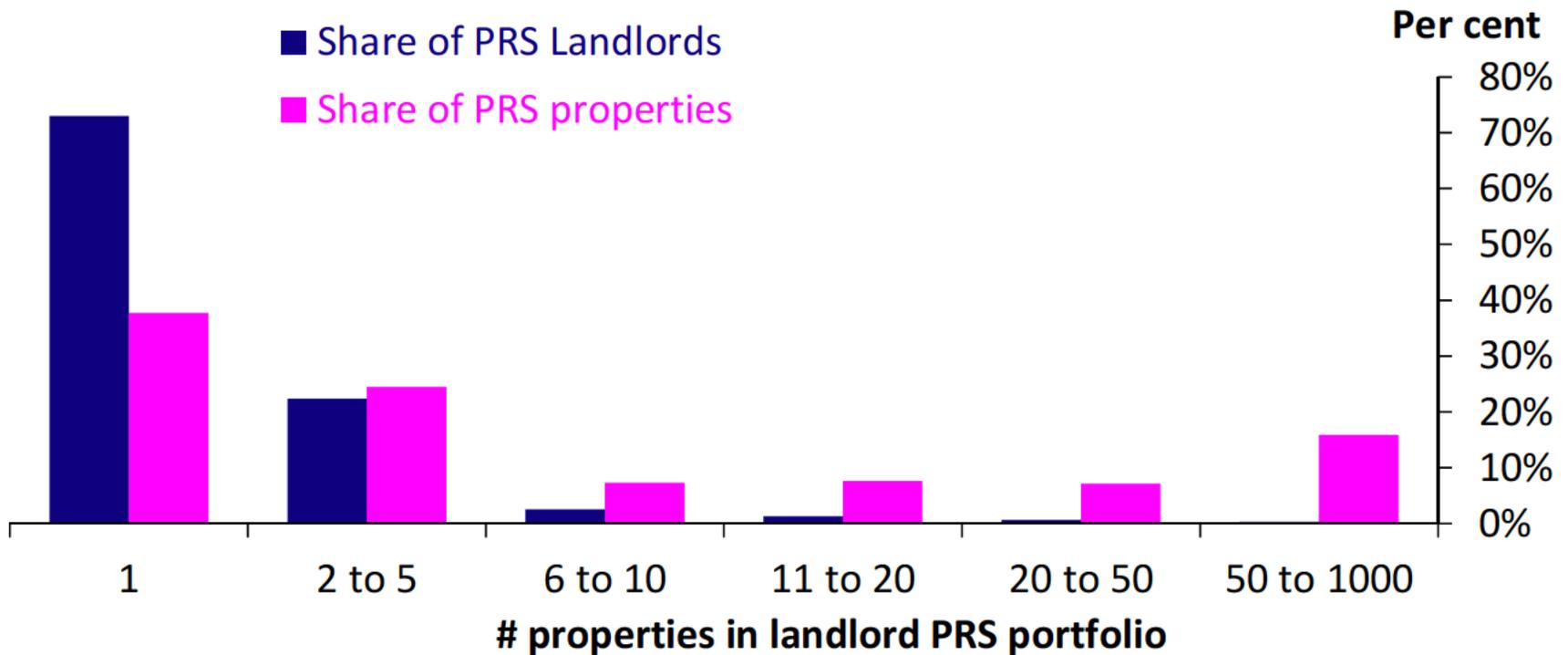


■ No BTL mortgage

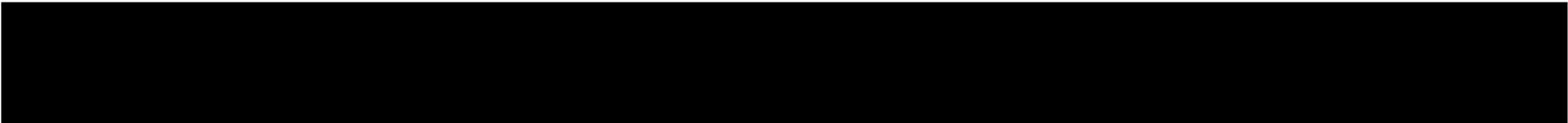
■ Mortgaged with PRA regulated group

■ Mortgaged with FCA-regulated group

■ Mortgaged with unregulated lender (estimate)



- Only a small proportion of landlords with less than 10 properties consider letting as their main business.



FPC Recommendation

Bank rate 3pp higher than at origination within 5 years.

Standard practice

More than 75% loans tested at stress rate of 7%.



Most loans tested at **ICR of 125** at **stress rate of 5%**

$$\text{Interest Cover Ratio (ICR)} = \frac{\text{Rental income}}{\text{Interest at stress rate}}$$

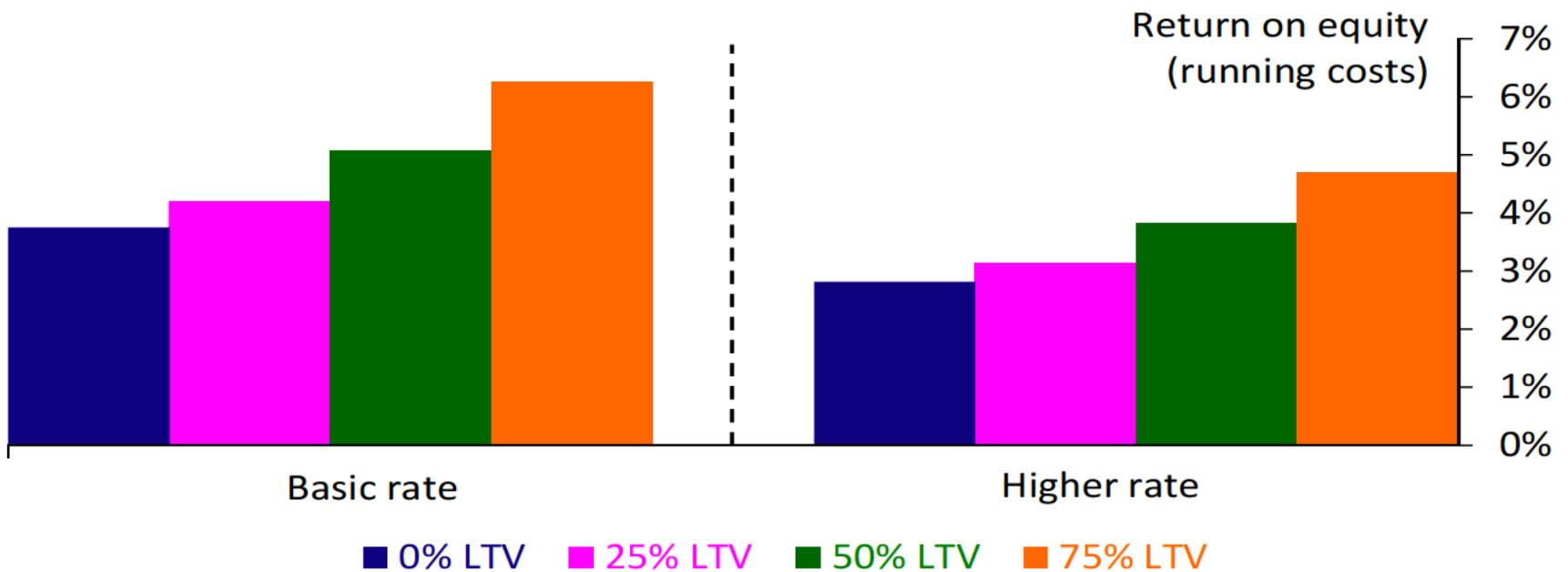
| Average rate | Q1 2014 | Q1 2015 |
|---------------|---------|---------|
| Initial gross | 3.7% | 3.3% |
| Stress rate | c.5% | c.5¼% |

- Stress rates close to reversion rates after initial rates end

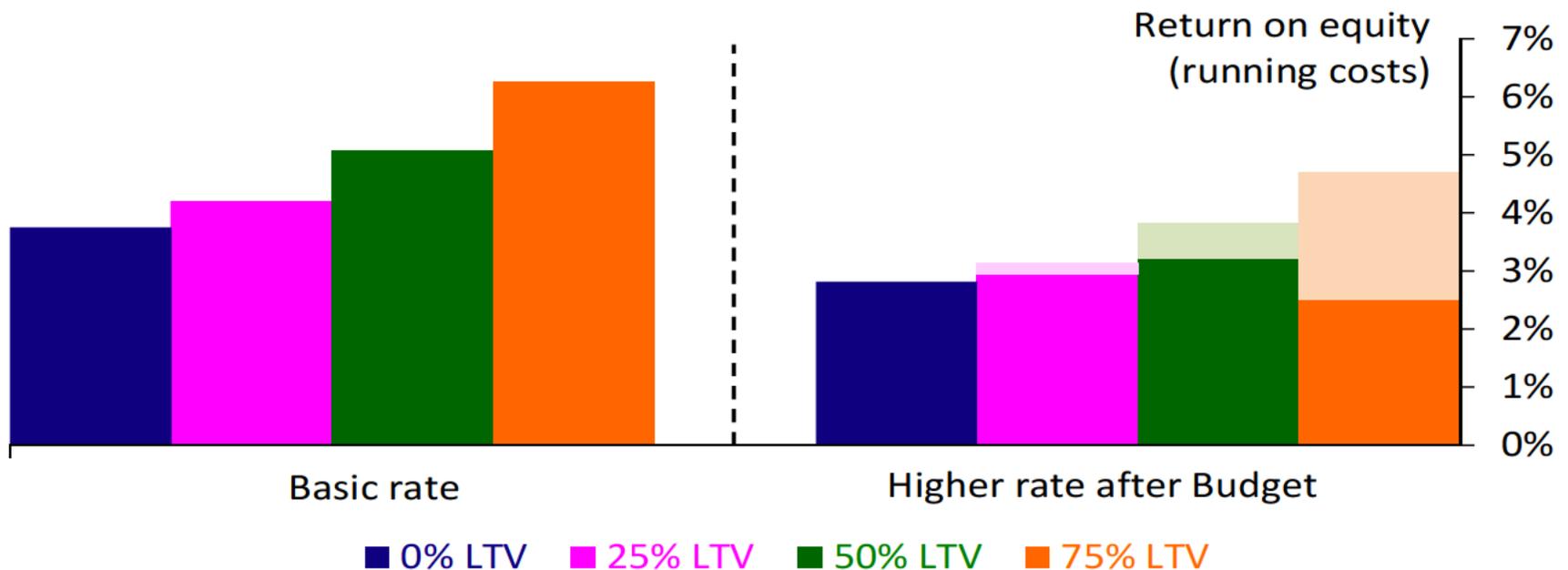


- In general **the BTL market remains conservative.**
 - But lenders across the market see BTL as a main driver of future growth;
 - Strong competition on price could lead to firms moving up the risk curve to satisfy these growth aspirations.
- Signs that a **minority of lenders** (including new entrants who may not fully understand the risks) are **starting to relax criteria**, for example:
 - Lending to the credit-impaired and non-owner occupiers;
 - Removing requirements such as minimum income and portfolio limits;
 - Launch of second charge BTL products.
- If other lenders follow there could be a ‘race to the bottom’ - as we saw pre-crisis in relation to sub-prime lending.

| Tax | Owner occupiers | Buy-to-Let |
|---|-----------------|-------------------------------|
| Stamp Duty | ✓ | ✓ |
| VAT (if new build) | ✗ | ✓ |
| Council tax | ✓ | ✓ |
| Tax on rental income (actual or imputed) | ✗ | ✓ |
| Capital gains tax | ✗ | ✓ |
| Finance tax relief (including interest payments) | ✗ | ✓ (restricted post Budget) |

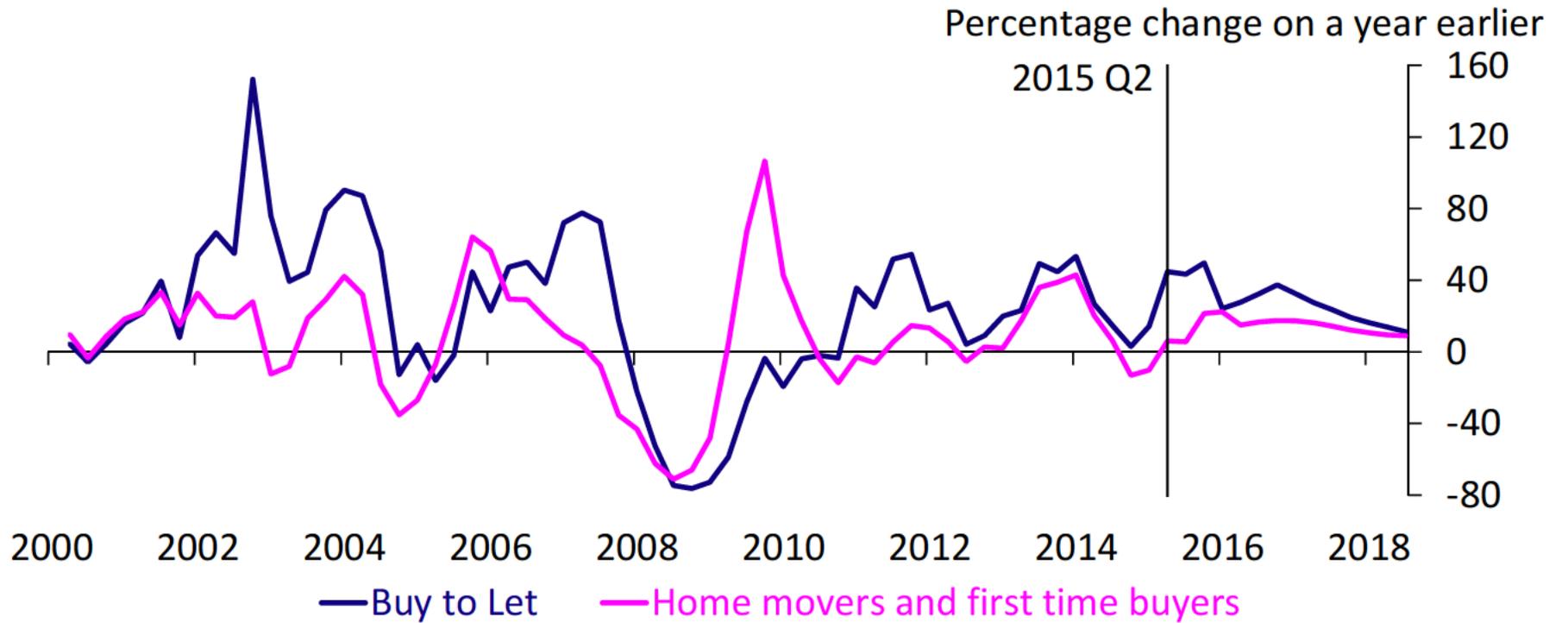


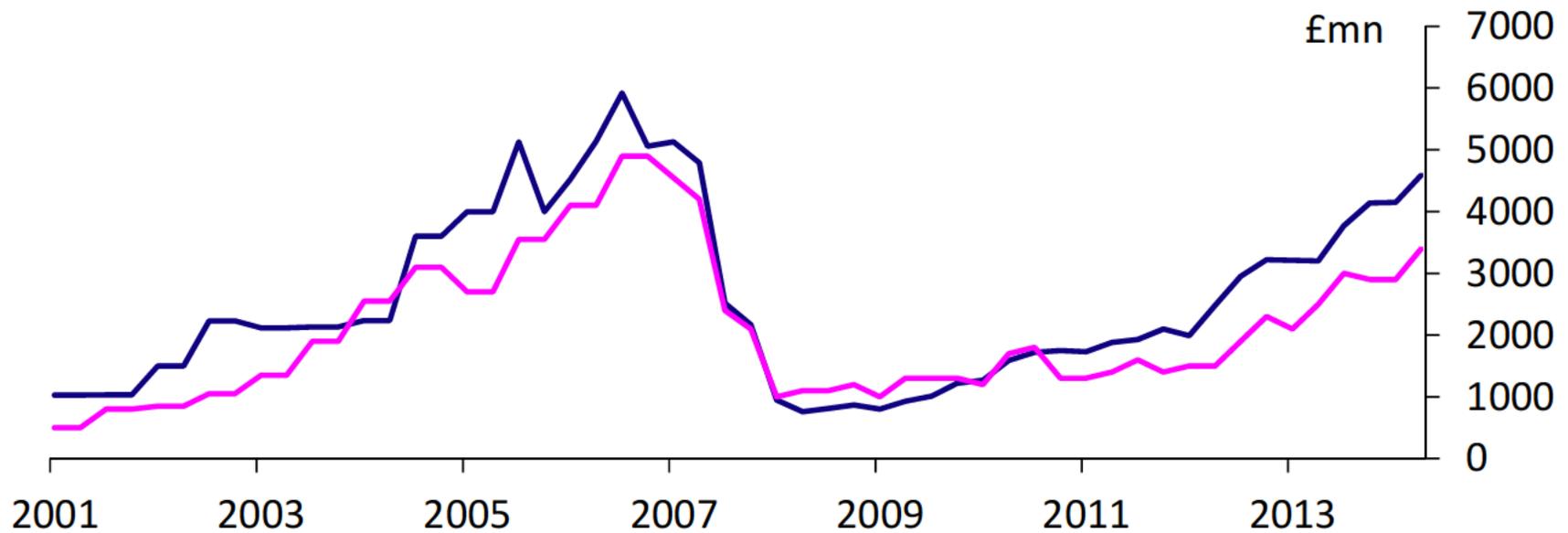
This analysis assumes a property price of £200,000 and a 75% LTV interest only mortgage rate of 3.64%; the mortgage rate for 25% and 50% LTV is assumed to be 3.02%. The return on equity is calculated as the profit of running a BTL property (ie rental income minus tax, maintenance and mortgage payments) over the initial equity injection.



This analysis assumes a property price of £200,000 and a 75% LTV interest only mortgage rate of 3.64%; the mortgage rate for 25% and 50% LTV is assumed to be 3.02%. The return on equity is calculated as the profit of running a BTL property (ie rental income minus tax, maintenance and mortgage payments) over the initial equity injection.

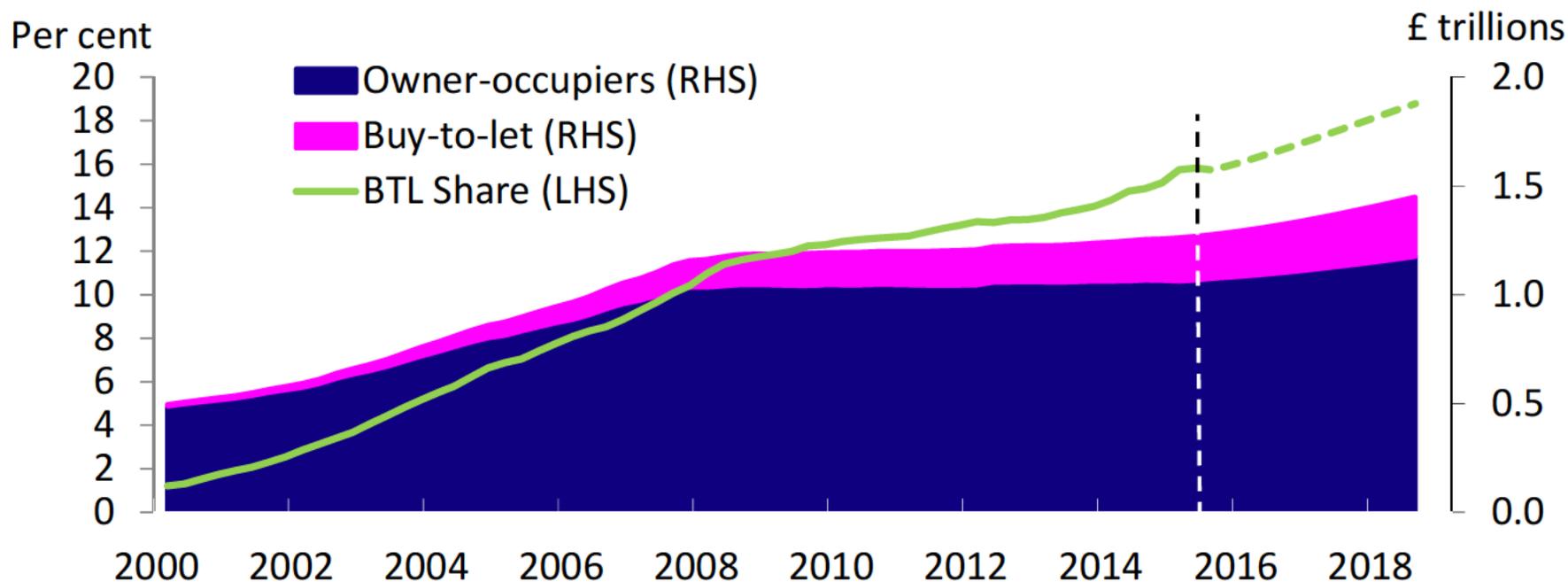
- The Summer Budget reforms remove the incentive for BTL investors to leverage up.



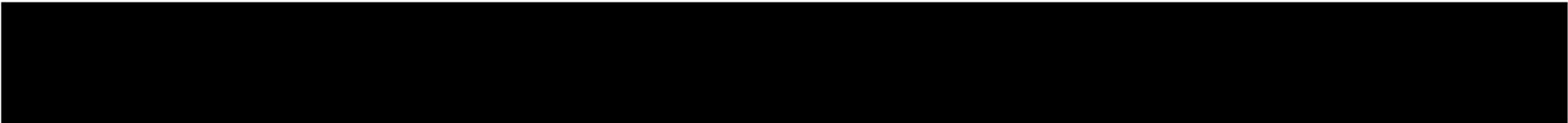


—Advances for remortgaging —Repayments in full

- Difference between remortgaging and repayments accounts for 1/4 of the increase in the stock of BTL debt since end-2011.



- The forecast for the buy-to-let share of lending increases from just under 16% to just under 19%.



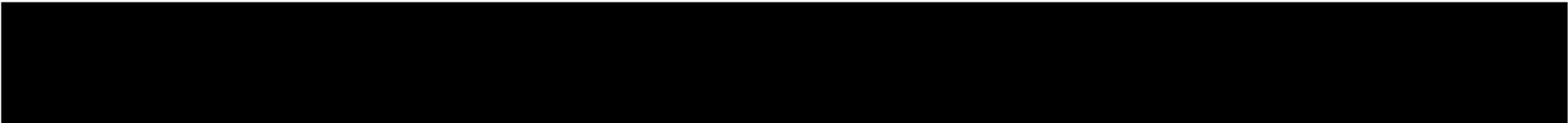
- **Outlook for the housing market**

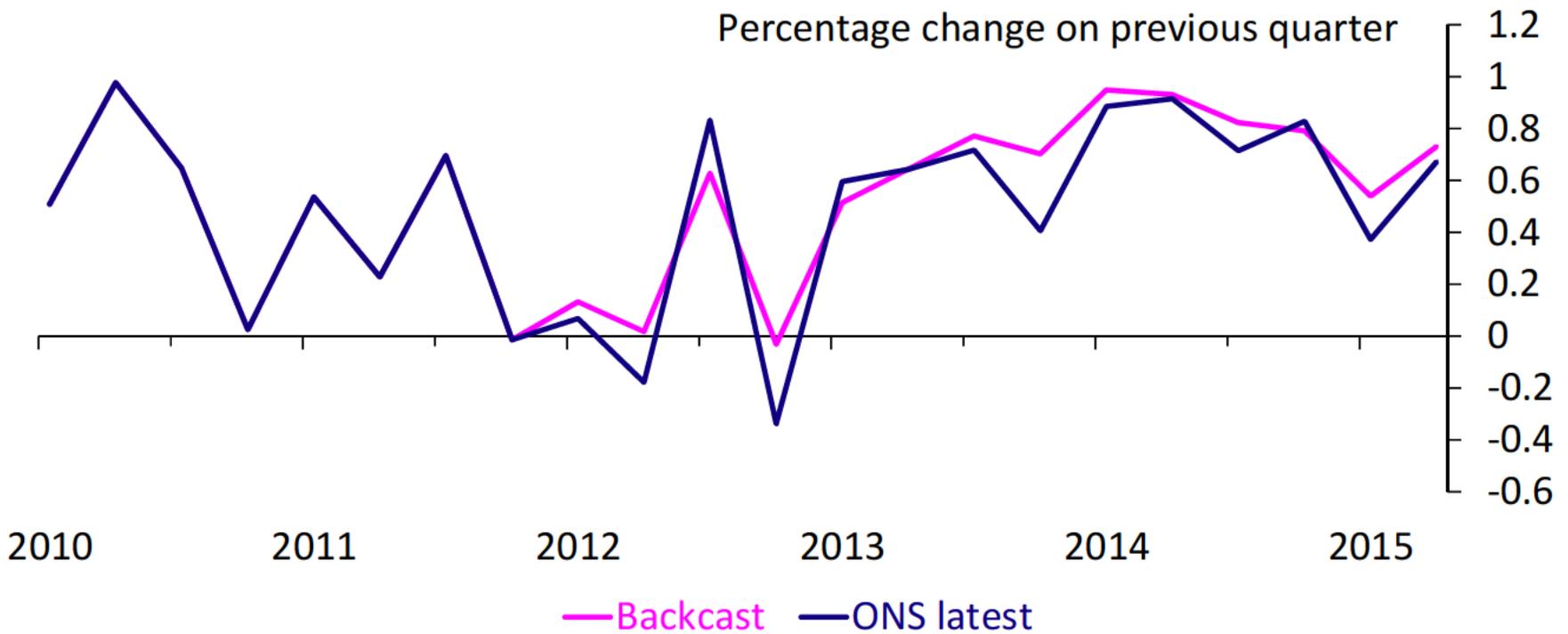
- Activity and prices

- Secured debt

- **Owner occupier and buy to let comparisons**

- BTL lending currently forms around 16% of the stock of mortgage lending, but is projected to grow to just under 19% by the end of the forecast.
- 

- 
- Housing market
 - **Demand and output**
 - **Q2 GDP and Q3 nowcast**
 - What do developments in China imply for UK GDP?
- 

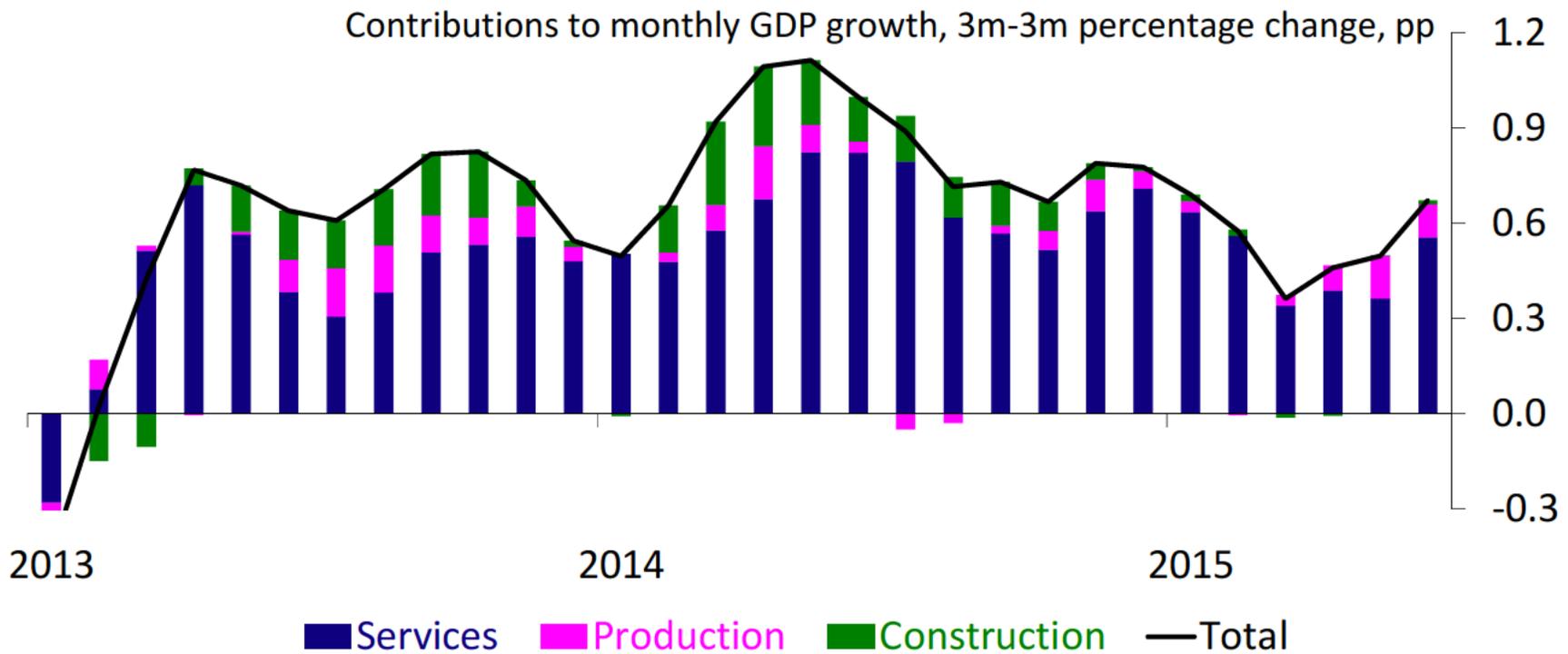


- The second estimate of quarterly Q2 GDP growth was unrevised at 0.7%.

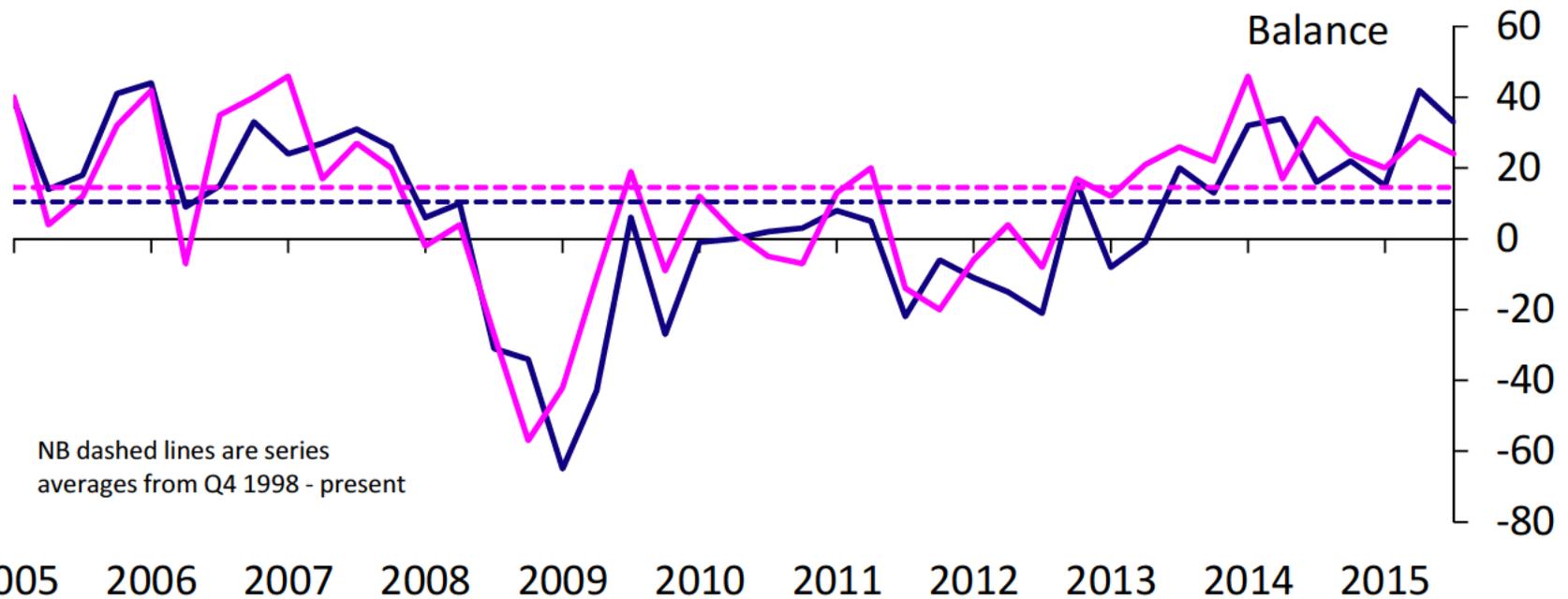
| | Q1 | Q2 | |
|-------------------------|-------------|----------------------|-----------------------|
| | Latest % | 2nd GDP release % | August <i>IR</i> % |
| GDP | 0.4 | 0.7 | 0.7 |
| Final domestic demand | 1.2 | 0.8 | 0.7 |
| Private consumption | 0.9 | 0.7 | 0.9 |
| Government consumption | 0.9 | 0.9 | 0.0 |
| <i>Total Investment</i> | 2.6 | 1.0 | 0.9 |
| <i>o/w business</i> | 2.0 | 2.9 | 0.9 |
| <i>o/w housing</i> | 2.4 | -3.5 | 1.2 |
| Net trade* | -0.6 | 1.0 | 1.1 |
| Stockbuilding** | -0.2 | -1.1 | -1.0 |

*Contribution to GDP growth

** Stockbuilding including alignment adjustment

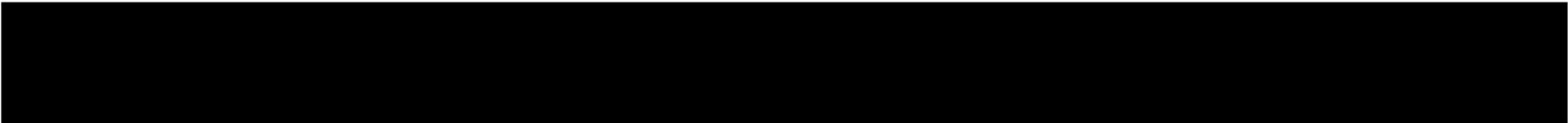


- Services growth has picked up after weakness in Q1.

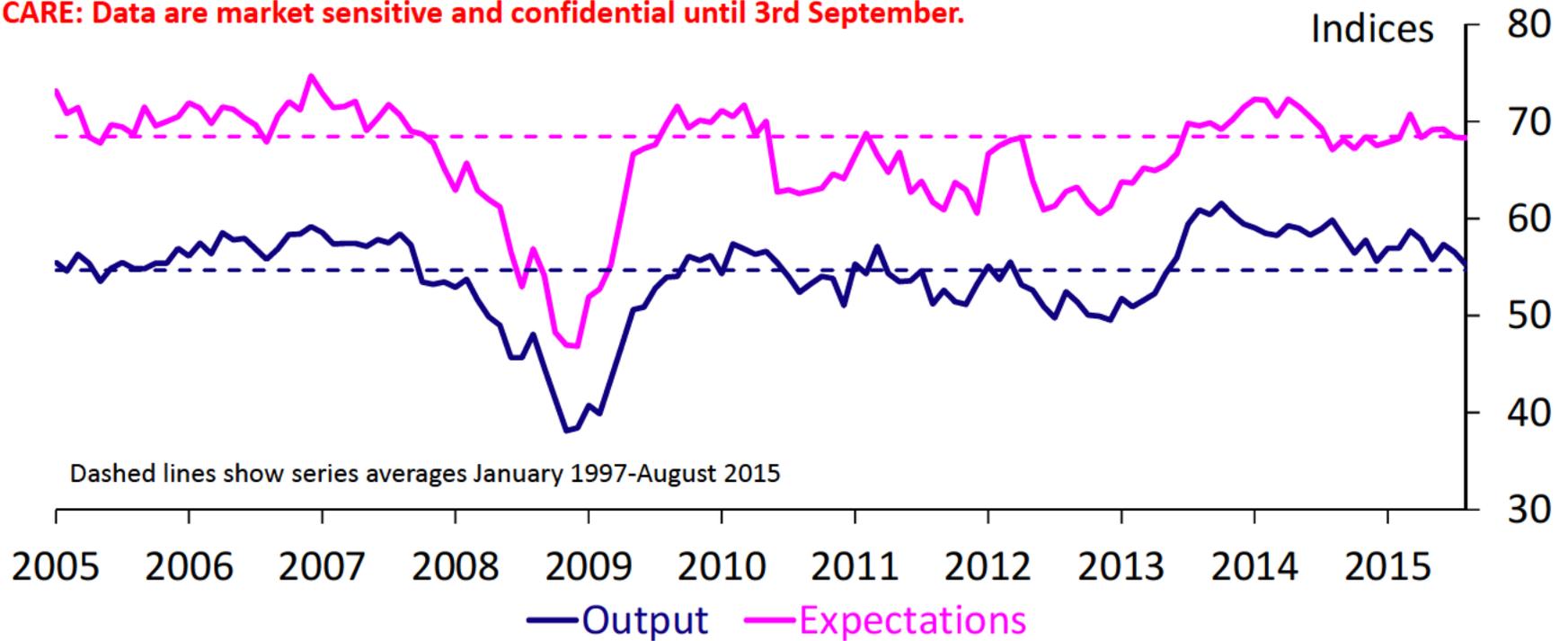


— Volume of output - past three months — Volume of output - next three months

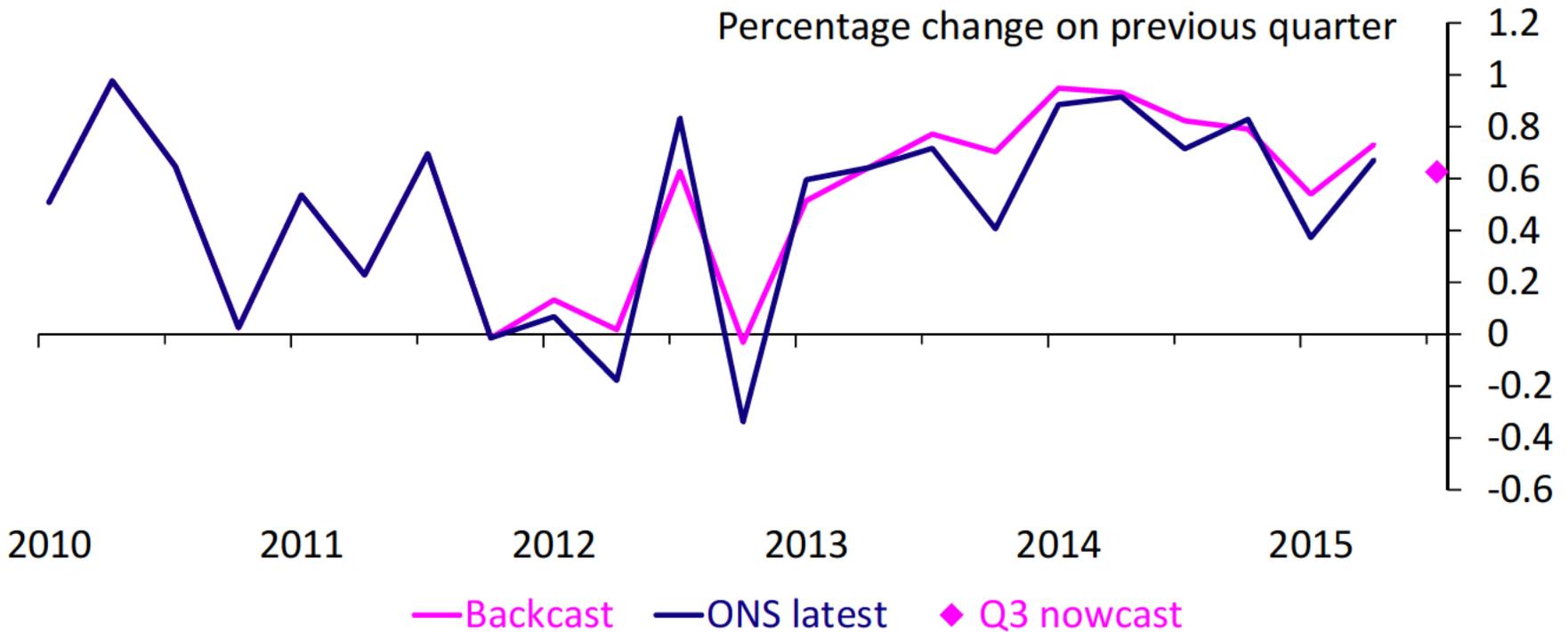
- CBI output balance fell back but remains around its H1 2014 level.

- 
- Steady growth in **consumer services & retail sales values** .
 - **Professional and financial services** turnover growth remains robust & **other business services** turnover increasing at a modest rate.
 - **Domestic manufacturing output & goods exports volumes** growth slowed - £ appreciation and weakening global demand.
 - **Construction output** volume growth edged up further this month - increased house building and commercial development .
 - **Investment intentions** point to fairly modest growth in capital spending over the coming year.
- 

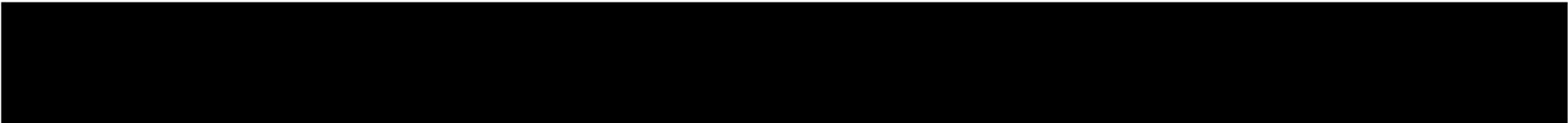
CARE: Data are market sensitive and confidential until 3rd September.



- Output composite fell back in August , expectations were broadly unchanged.

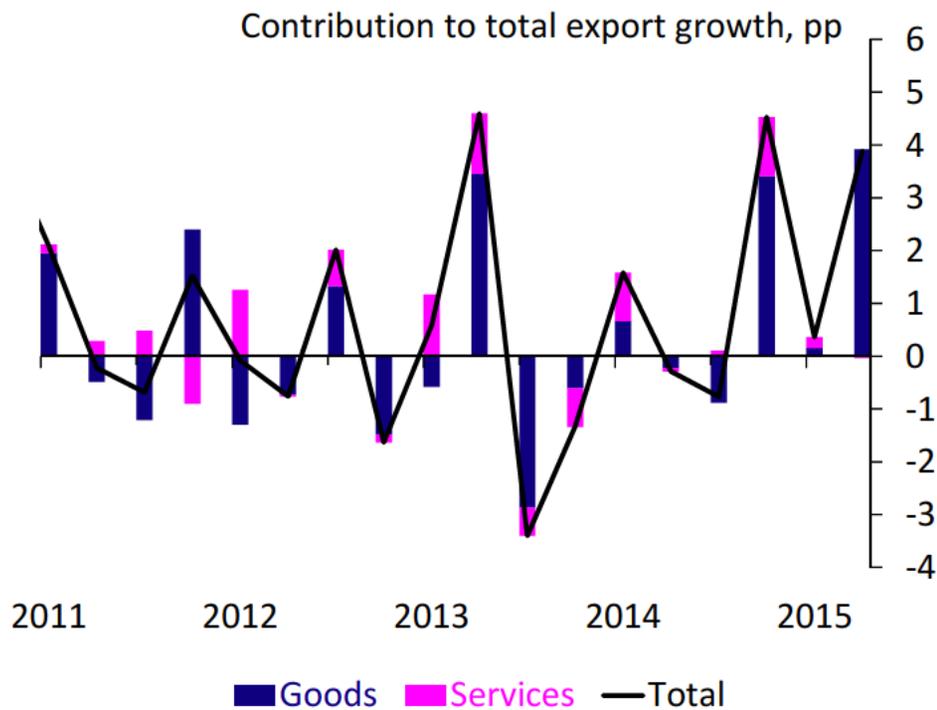


- Our nowcast for Q3 GDP growth has been revised down from 0.7% to 0.6%.

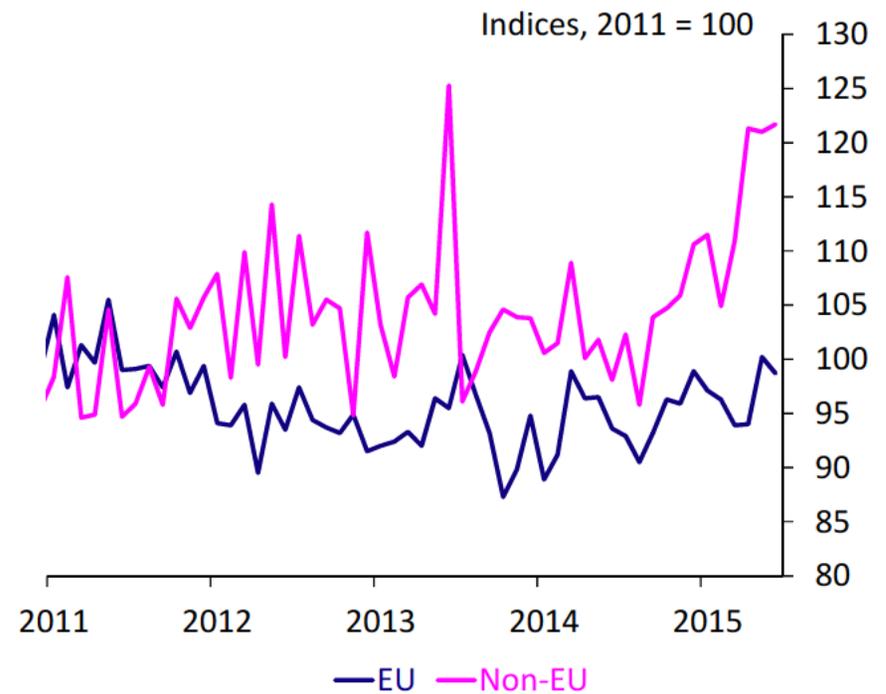
- 
- Housing market
 - **Demand and output**
 - Q2 GDP and Q3 nowcast
 - **What do developments in China imply for UK GDP?**
- 

| Channel | Near-term impact on UK GDP |
|--------------------------------------|----------------------------|
| Trade | |
| MPC financial conditioning variables | |
| Equity prices | |
| Uncertainty | |

Quarterly export growth



EU versus non-EU goods exports



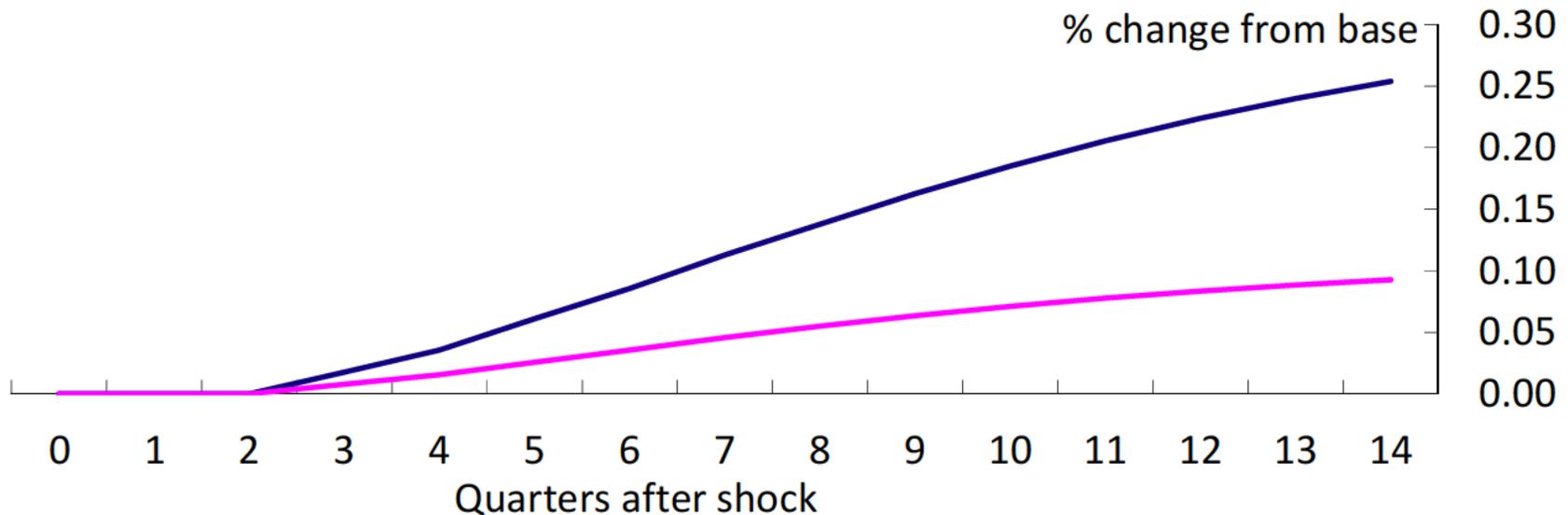
- Goods wholly accounted for the growth in total exports in Q2

| Channel | Near-term impact on UK GDP |
|--------------------------------------|---|
| Trade | Ready reckoner suggests a 1% shock to Chinese GDP reduces UK GDP by 0.1%, with most of the trade effect coming through indirect channels. We would expect the effects to come through fairly quickly. |
| MPC financial conditioning variables | |
| Equity prices | |
| Uncertainty | |

| Channel | Near-term impact on UK GDP |
|--------------------------------------|---|
| Trade | Ready reckoner suggests a 1% shock to Chinese GDP reduces UK GDP by 0.1%, with most of the trade effect coming through indirect channels. We would expect the effects to come through fairly quickly. |
| MPC financial conditioning variables | Movements in the exchange rate and the yield curve add less than 0.1% to Q4 GDP. News in oil prices and credit conditions small and broadly offsetting. |
| Equity prices | |
| Uncertainty | |

— Impact of financial wealth shock on spending: Model 1

— Impact of financial wealth shock on spending: Model 2



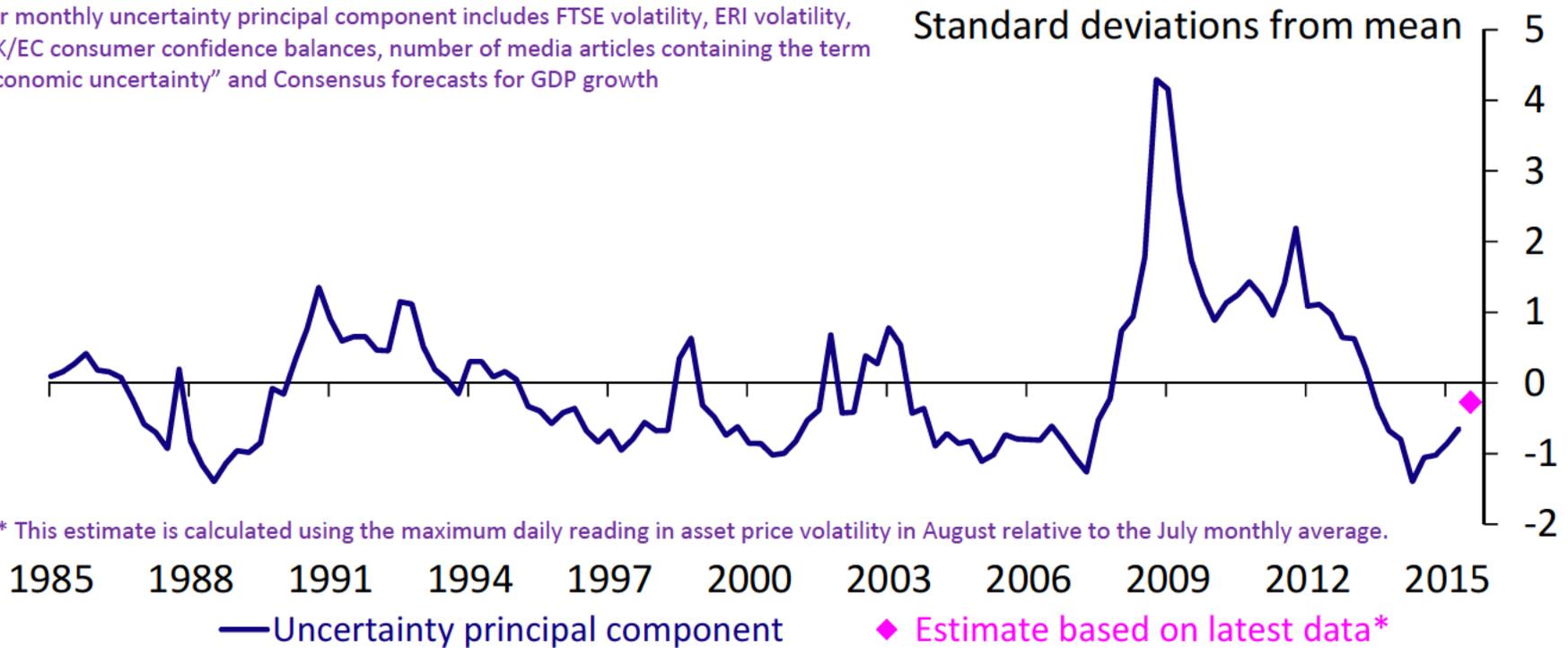
Model 1 is an ECM which includes financial wealth in the long-run term; Model 2 also includes housing wealth.

- Model estimates suggest lower financial wealth could reduce the level of consumption by up to 0.3% in the long-run.

| Channel | Near-term impact on UK GDP |
|--------------------------------------|---|
| Trade | Ready reckoner suggests a 1% shock to Chinese GDP reduces UK GDP by 0.1%, with most of the trade effect coming through indirect channels. We would expect the effects to come through fairly quickly. |
| MPC financial conditioning variables | Movements in the exchange rate and the yield curve add less than 0.1% to Q4 GDP. News in oil prices and credit conditions small and broadly offsetting. |
| Equity prices | Impact through lower financial wealth likely to be negligible in the near term (but could build to 0.2% of GDP in the long-run). |
| Uncertainty | |

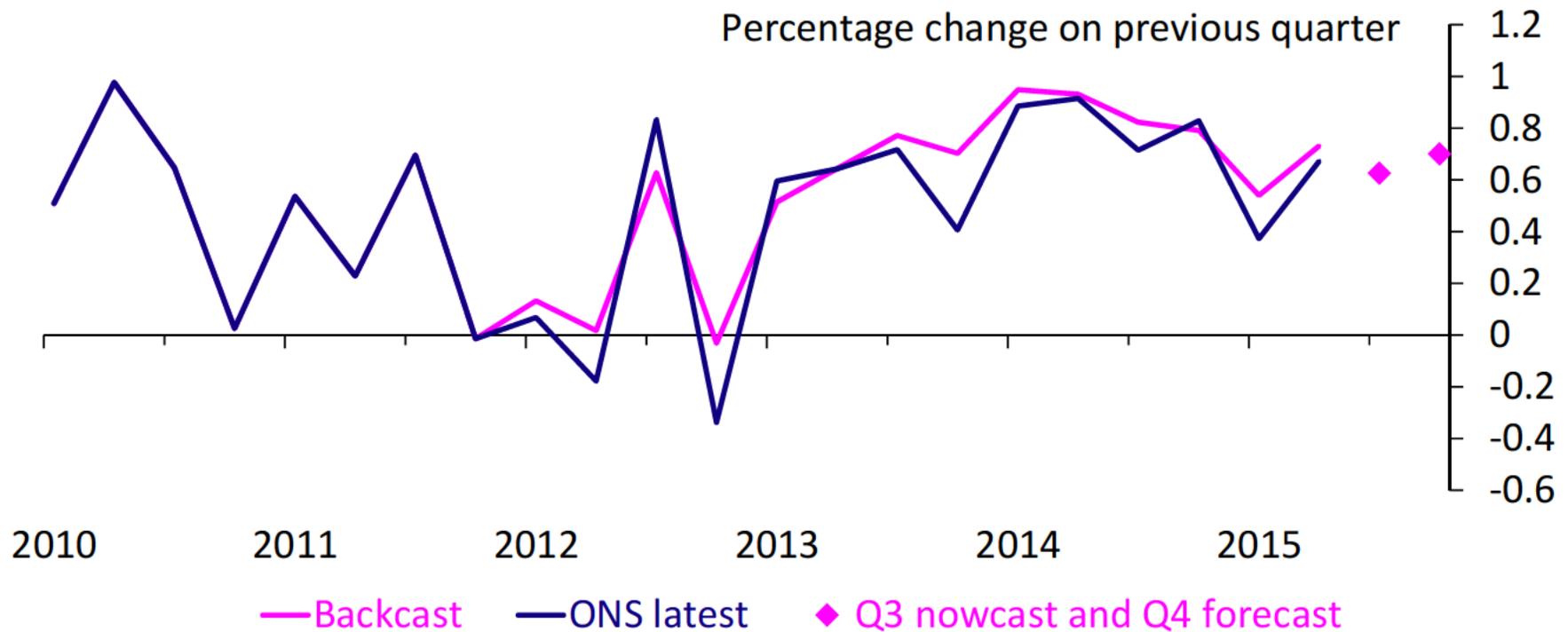
Our monthly uncertainty principal component includes FTSE volatility, ERI volatility, GfK/EC consumer confidence balances, number of media articles containing the term “economic uncertainty” and Consensus forecasts for GDP growth

Standard deviations from mean

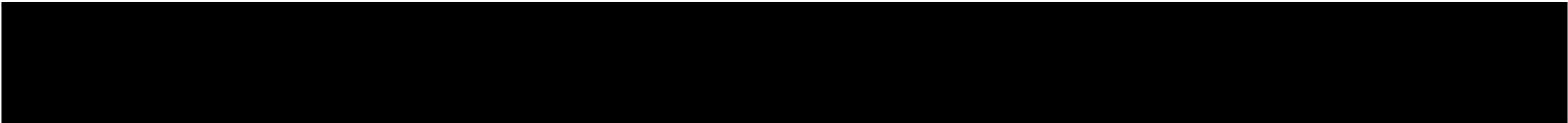


- Our central estimate is that the impact of increased uncertainty on the level of GDP in Q4 is less than 0.1pp.

| Channel | Near-term impact on UK GDP |
|--------------------------------------|---|
| Trade | Ready reckoner suggests a 1% shock to Chinese GDP reduces UK GDP by 0.1%, with most of the trade effect coming through indirect channels. We would expect the effects to come through fairly quickly. |
| MPC financial conditioning variables | Movements in the exchange rate and the yield curve add less than 0.1% to Q4 GDP. News in oil prices and credit conditions small and broadly offsetting. |
| Equity prices | Impact through lower financial wealth likely to be negligible in the near term (but could build to 0.2% of GDP in the long-run). |
| Uncertainty | Rise in uncertainty likely to subtract less than 0.1% from GDP in Q4. |



- We still expect growth in Q4 of 0.7%, but downside risks have increased.



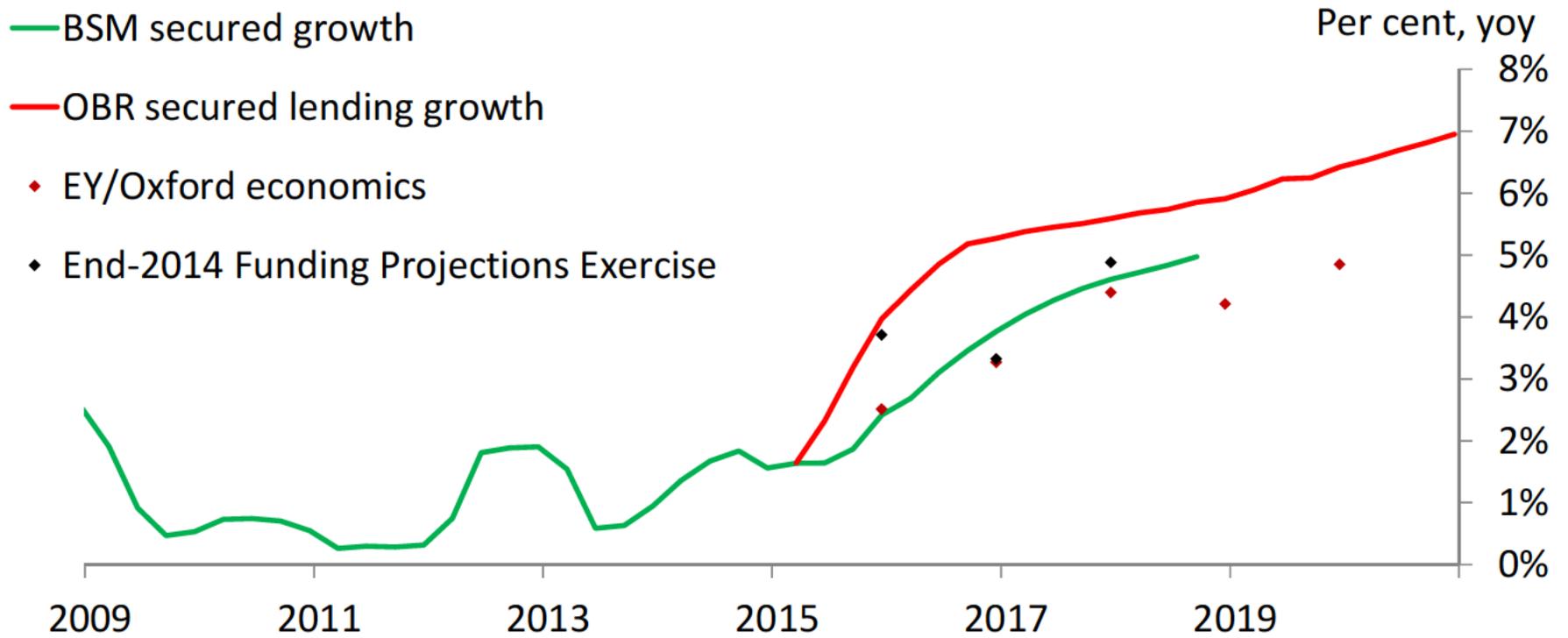
- **Demand and output**

- Q3 nowcast: Revised down Q3 from 0.7% to 0.6% due to weaker underlying trend.

- What do developments in China imply for UK GDP? Downside risks around Q4 growth.











6: Costs and Prices



Costs & Prices

1 September 2015

Structural Economic Analysis Division



Agenda

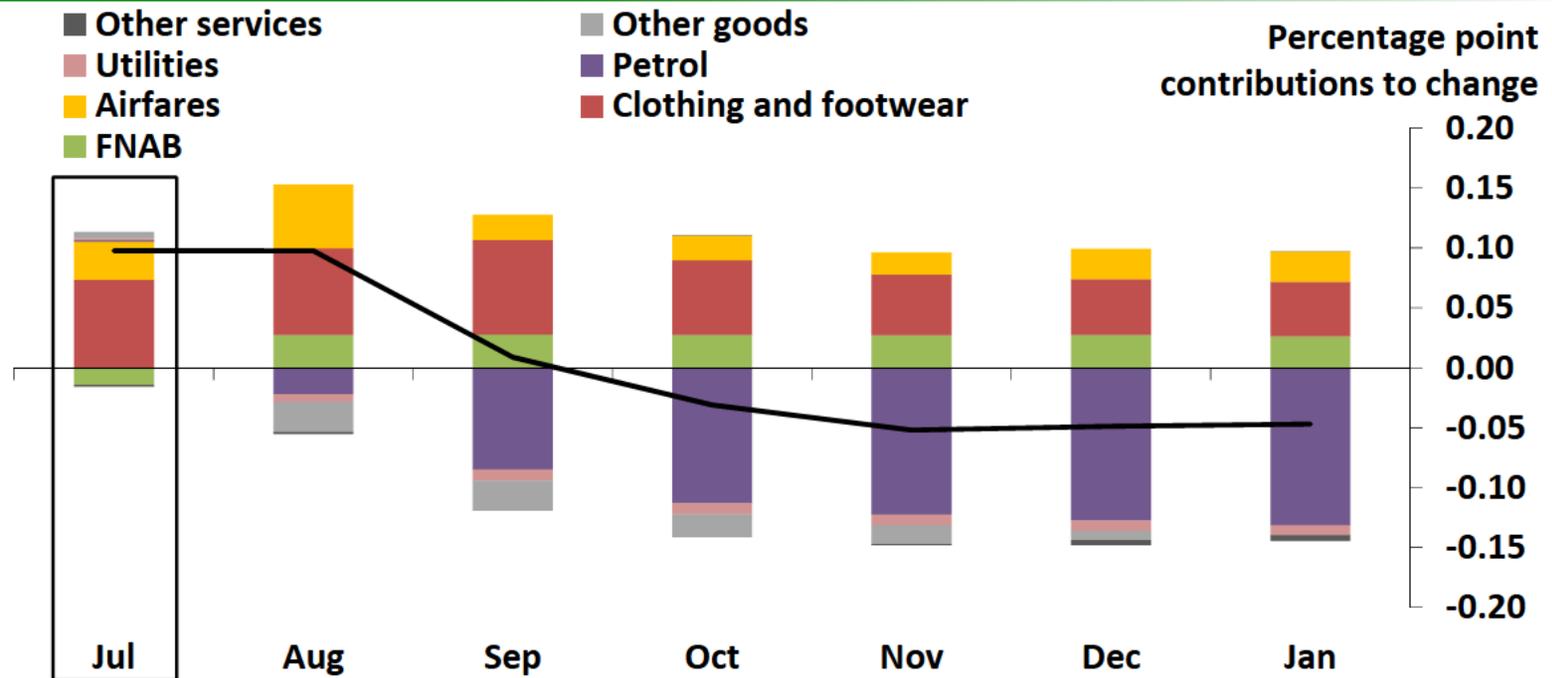
- **Short-term inflation forecast.**
- **Latest labour market quantities data.**
- **Trends in pay.**
- **Productivity and unit labour cost growth.**



Inflation



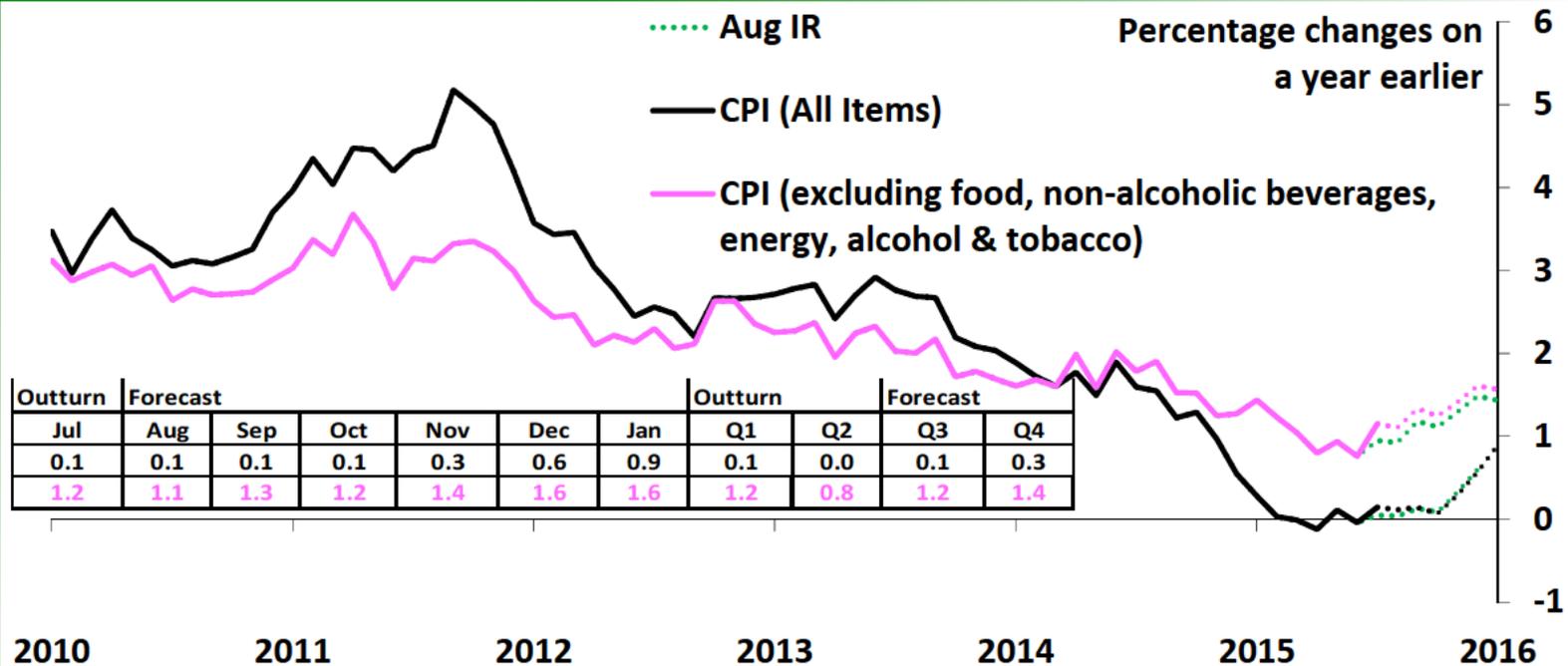
Change to the STIF since Aug IR



- Slight upside news in July, but STIF currently marginally lower due to oil price falls earlier in the month.



Short-Term Inflation Forecast



- Current STIF profile slightly lower than the Aug IR, but forecast for the ONS core inflation measure revised up.

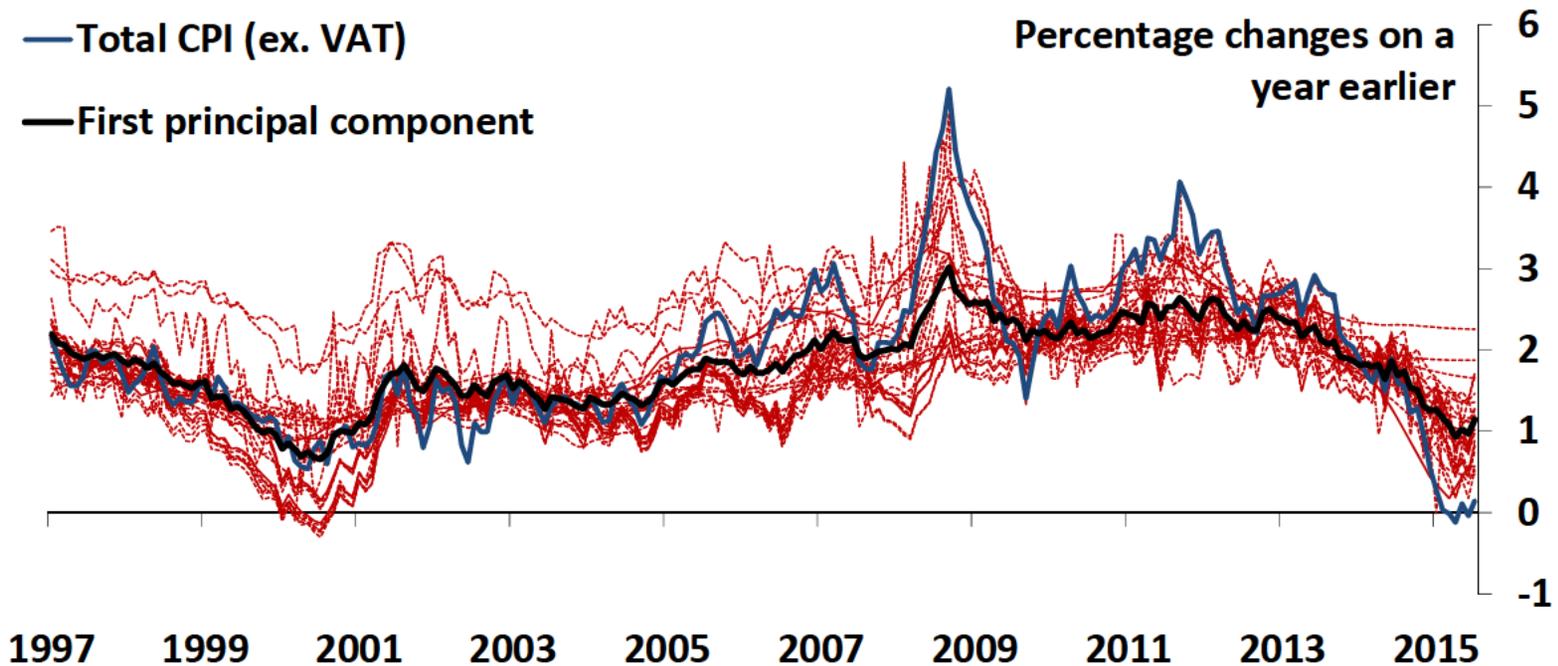


Core inflation measures

— Total CPI (ex. VAT)

— First principal component

Percentage changes on a
year earlier



- Core inflation measures have ticked up on the month – our principal component measure rose to 1.1% in July.



Summary

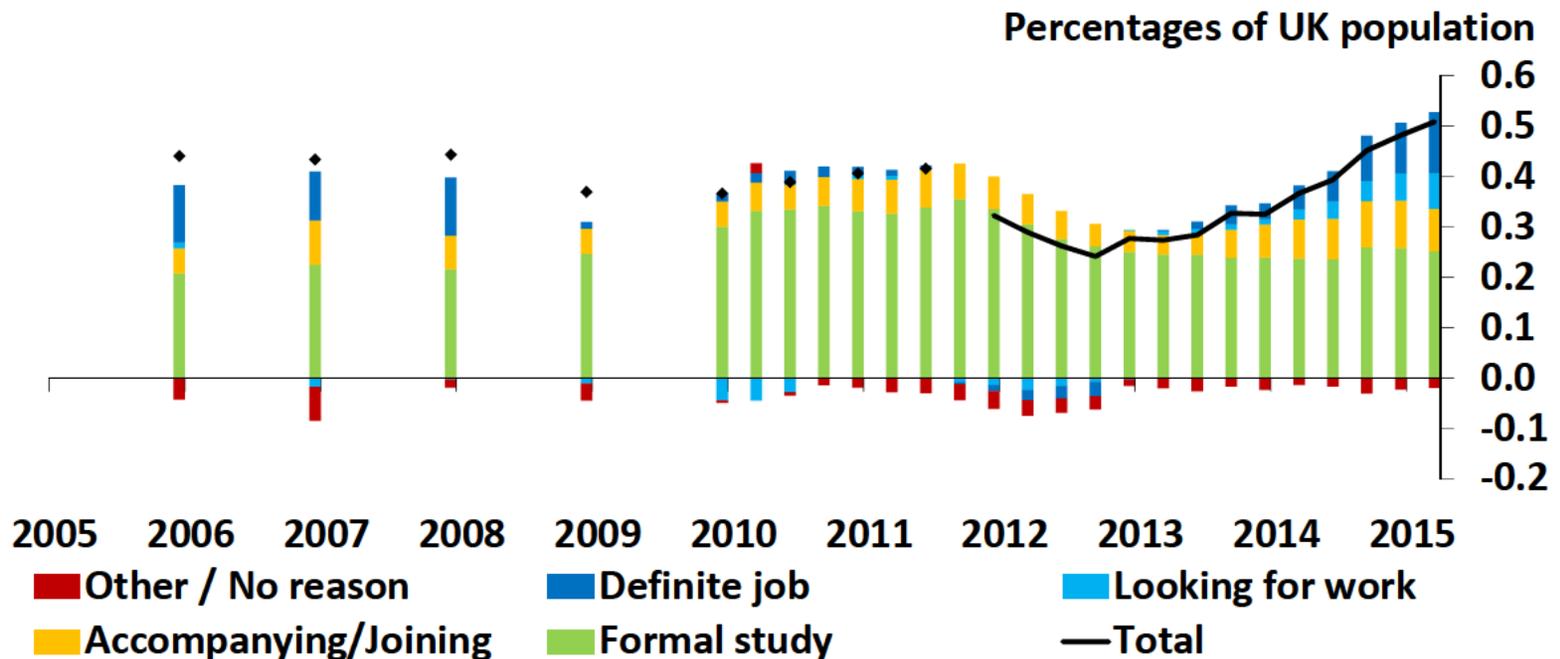
- **Headline inflation forecast revised down very slightly because of lower oil prices, but core inflation forecast revised up.**



Labour market quantities



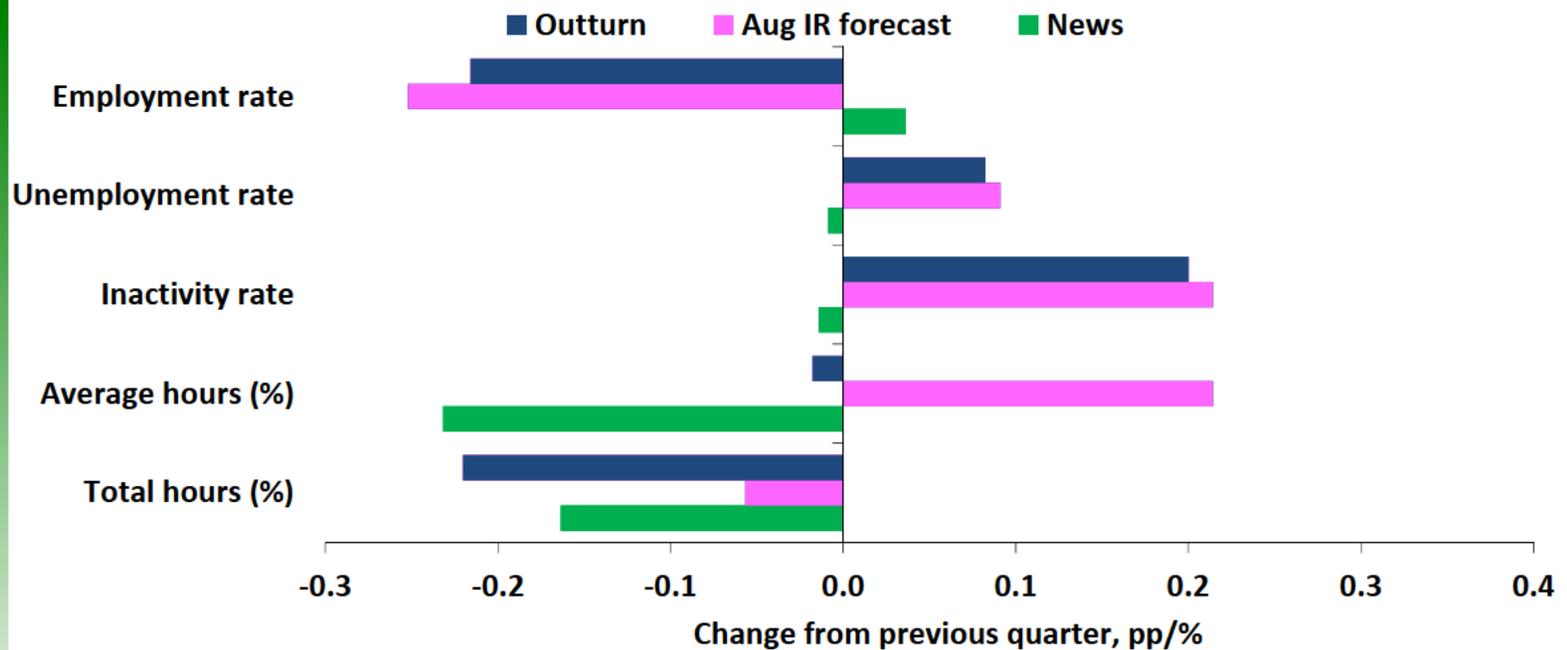
Long-term net migration



- Net migration reached 330,000 in the year to 2015 Q1 – a record high driven by an increase in migrants with jobs.



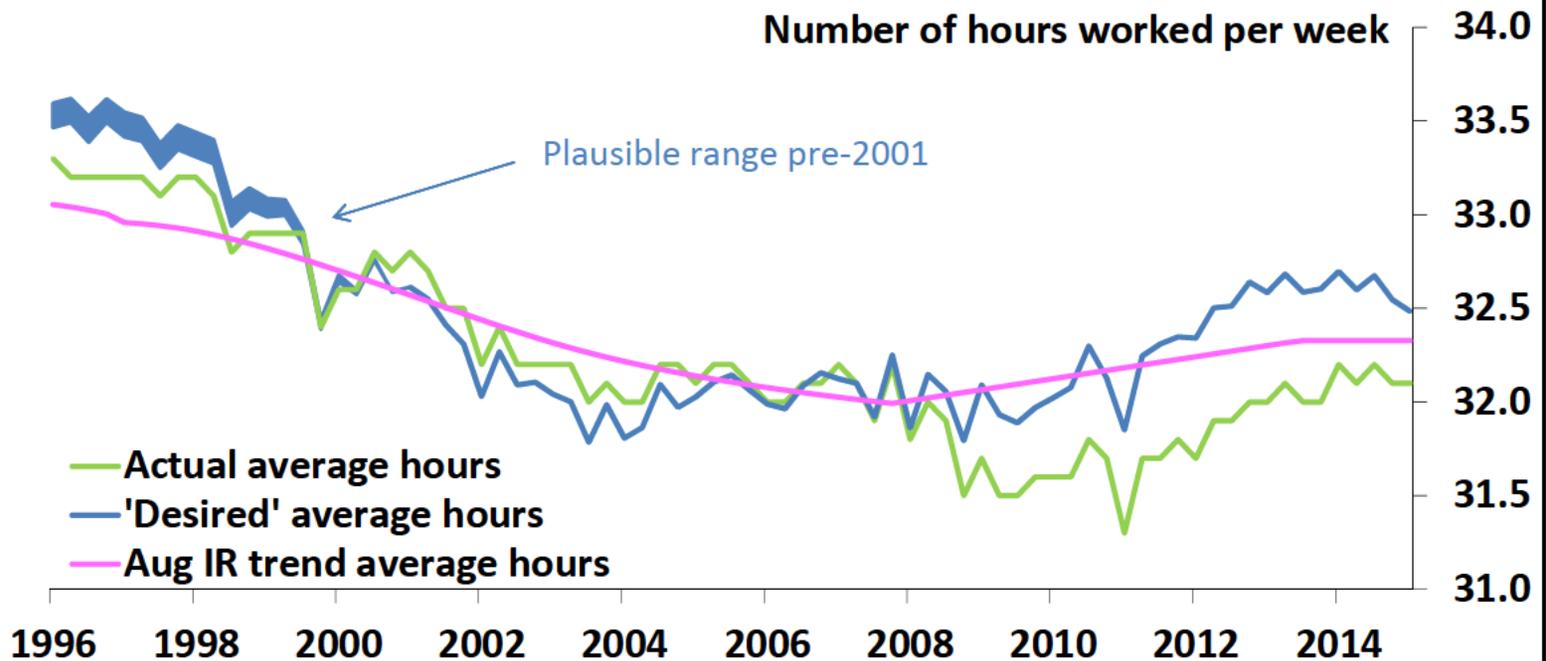
News in labour market quantities



- **Little news in employment this month. Average hours were lower than expected.**



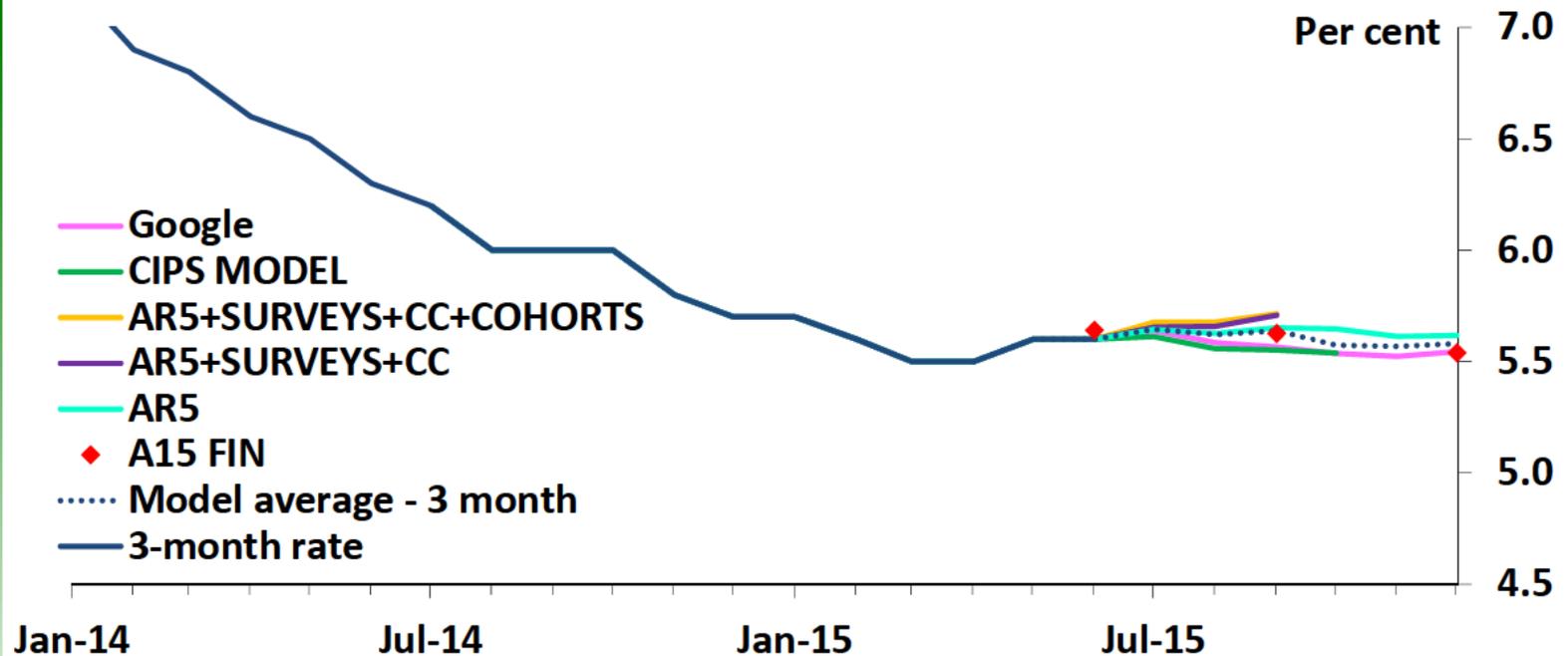
Actual and 'desired' hours



- **Desired average hours are drifting down, but there remains some slack in average hours.**



Short-term unemployment forecast



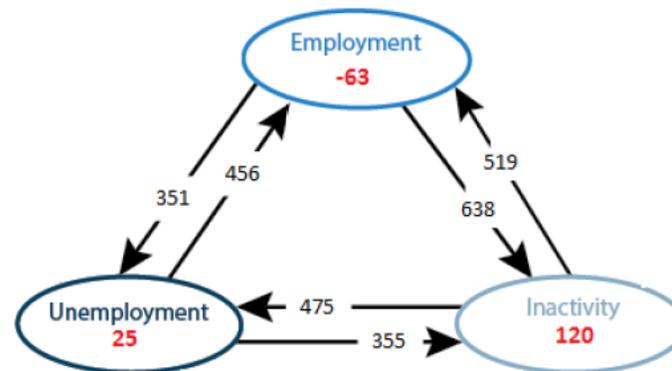
- Models suggest a flat unemployment profile in the short term, broadly in line with the Aug IR.



Q2 labour market flows

Quarterly flows
UK, seasonally adjusted

Apr-Jun 2015



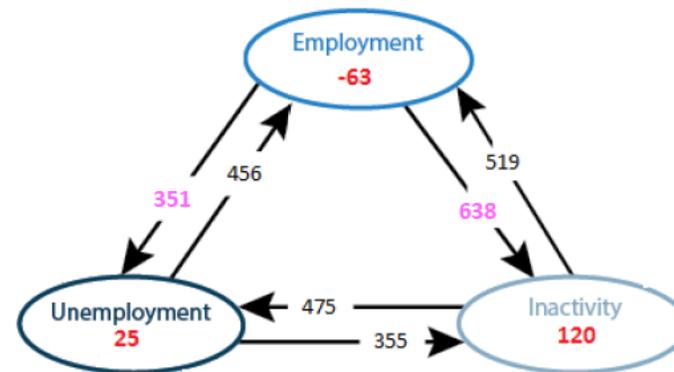
Number of people aged 16+ (thousands)



Q2 labour market flows

Quarterly flows
UK, seasonally adjusted

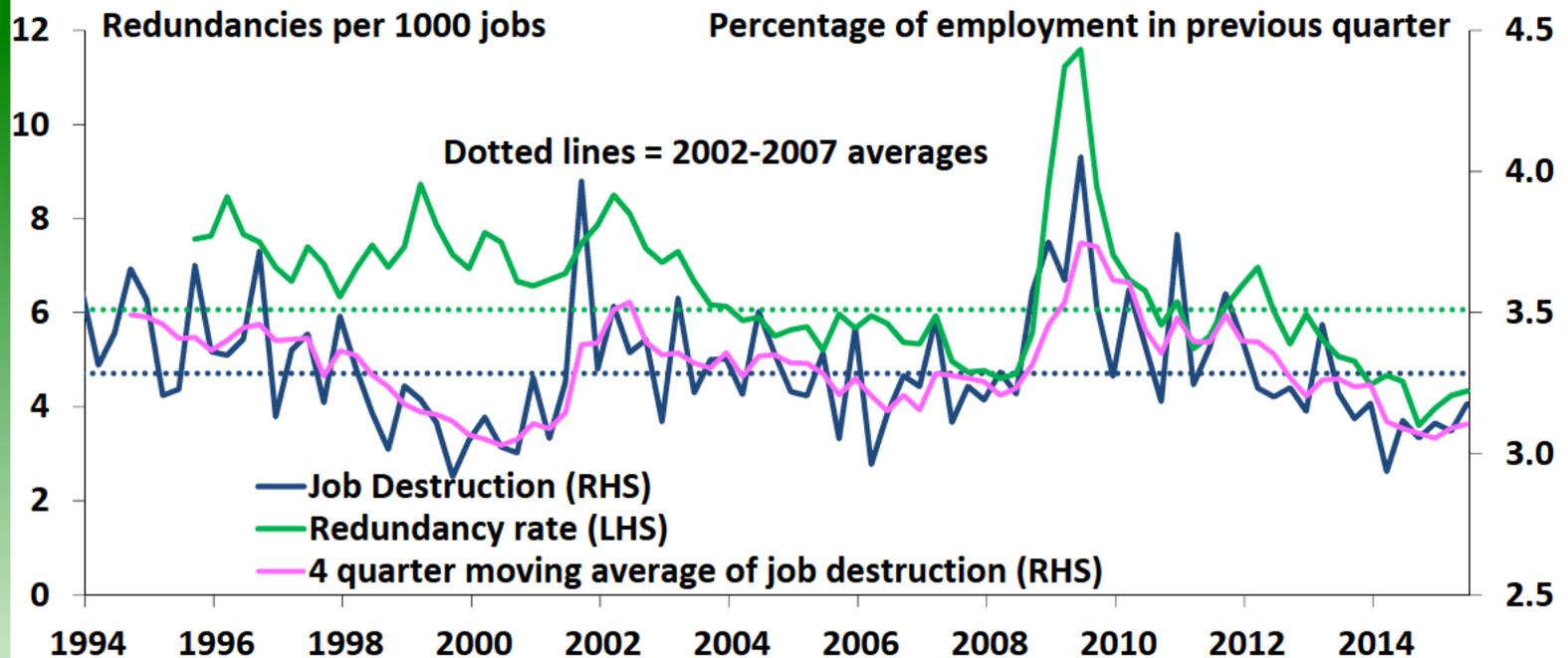
Apr-Jun 2015



Number of people aged 16+ (thousands)



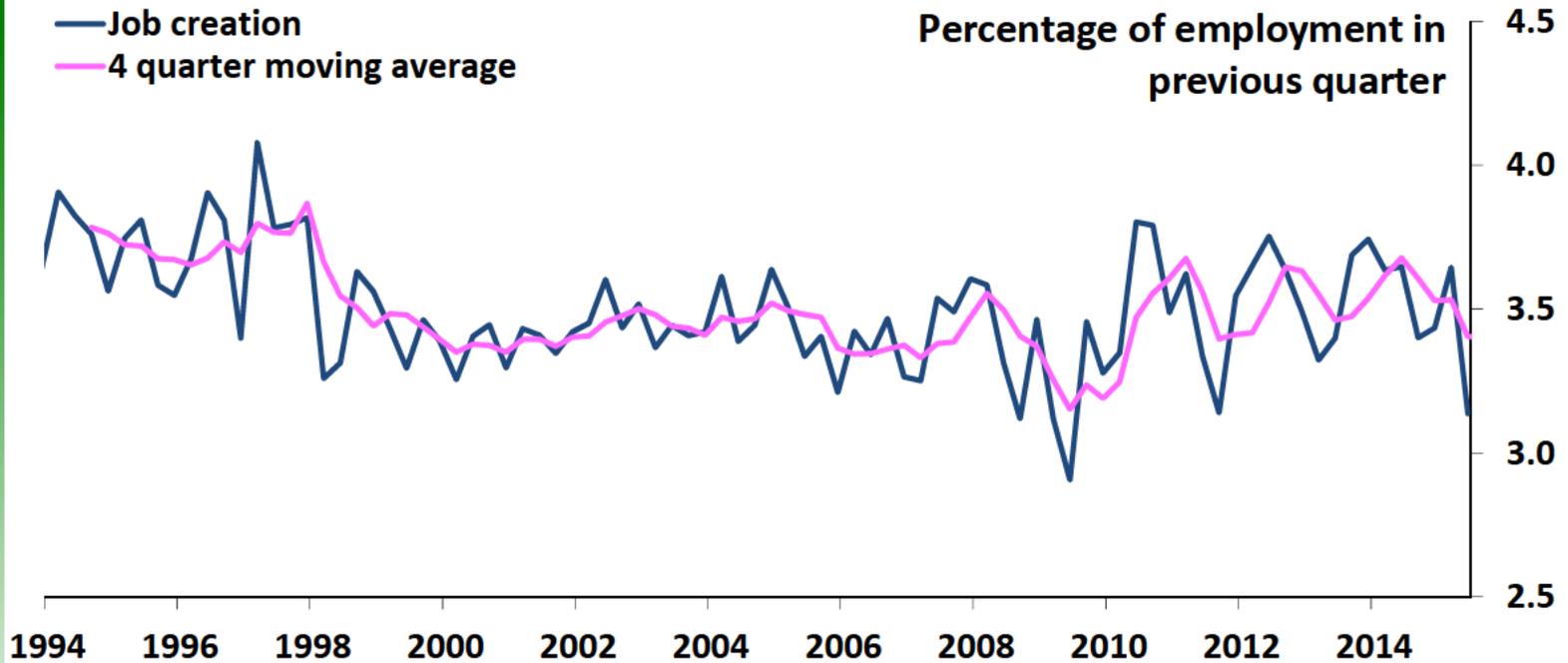
Outflows from employment



- No imminent signs of a labour market shake-out.



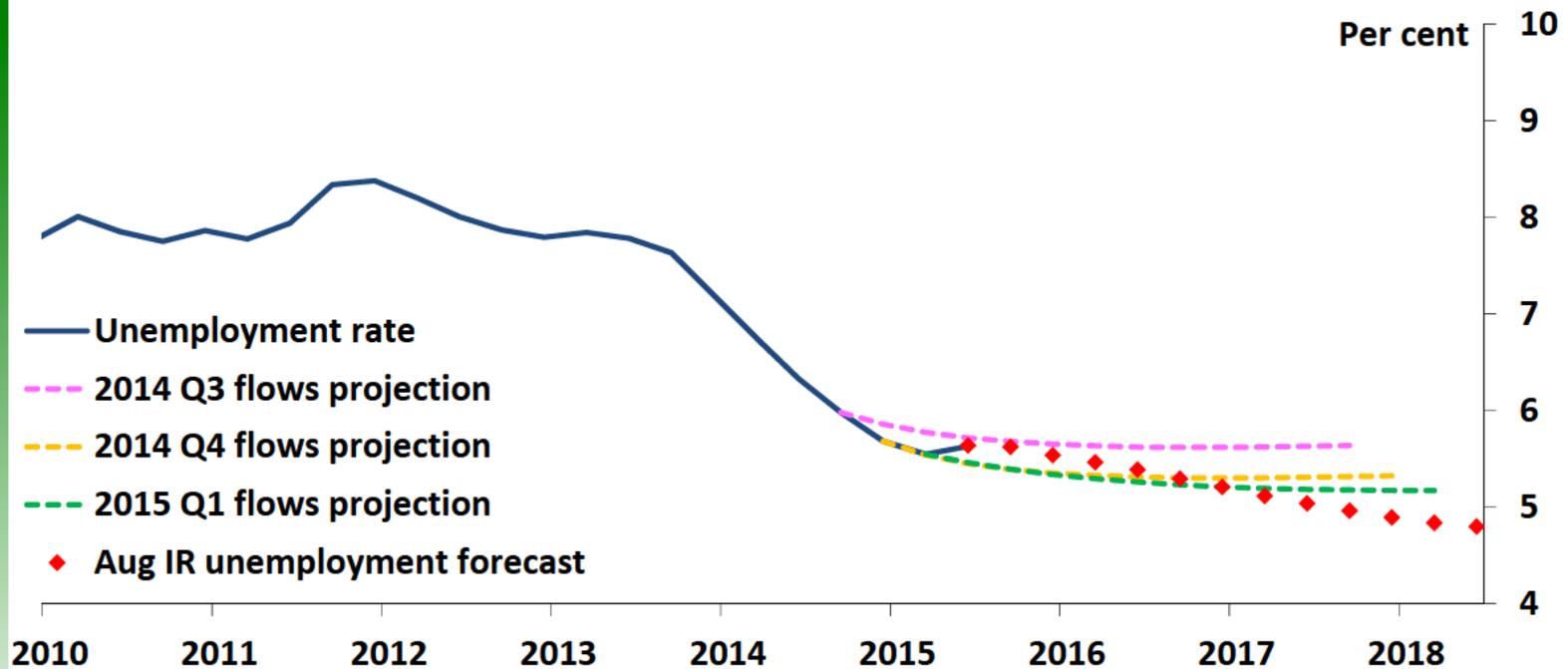
Inflows to employment



- Small fall in Q2 employment reflected a fall in job creation.



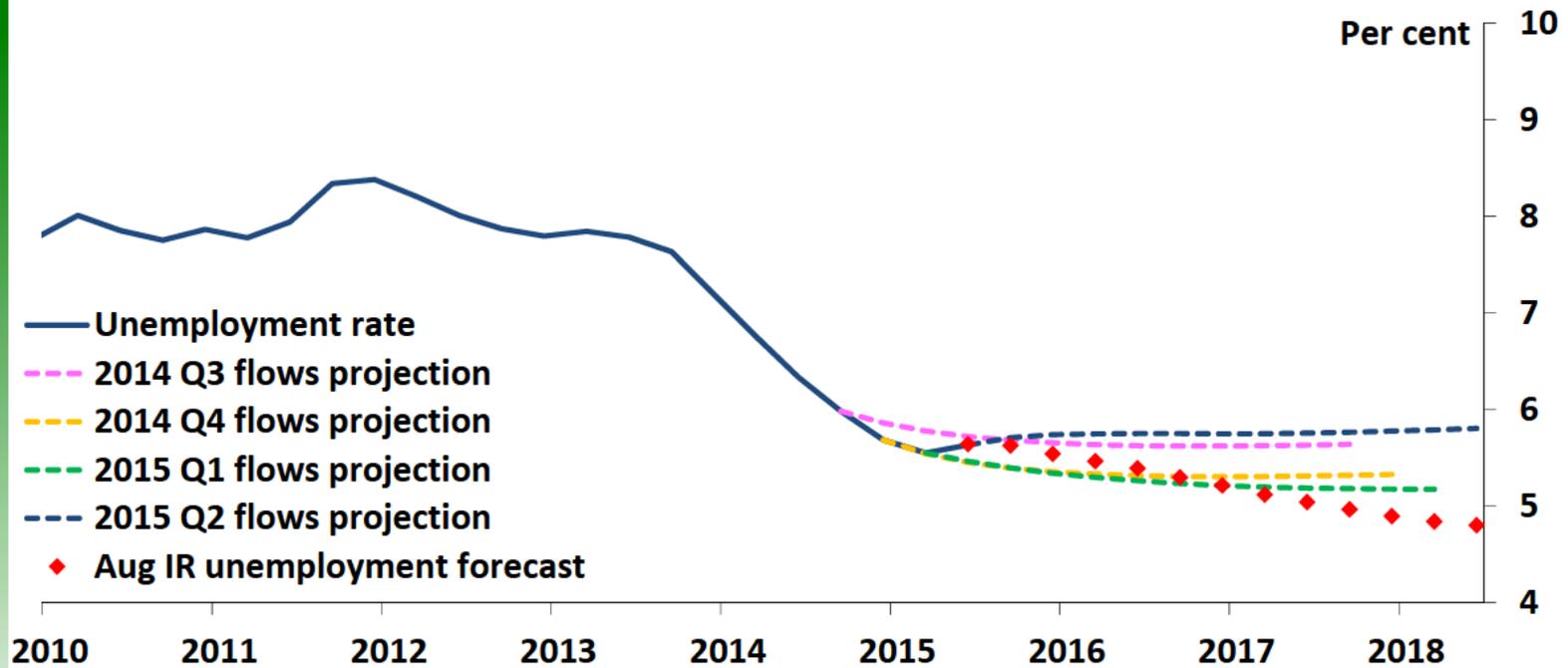
Unemployment flow scenarios



- Projections that assumed labour market flow rates remained unchanged had pointed to a gradual fall in unemployment...



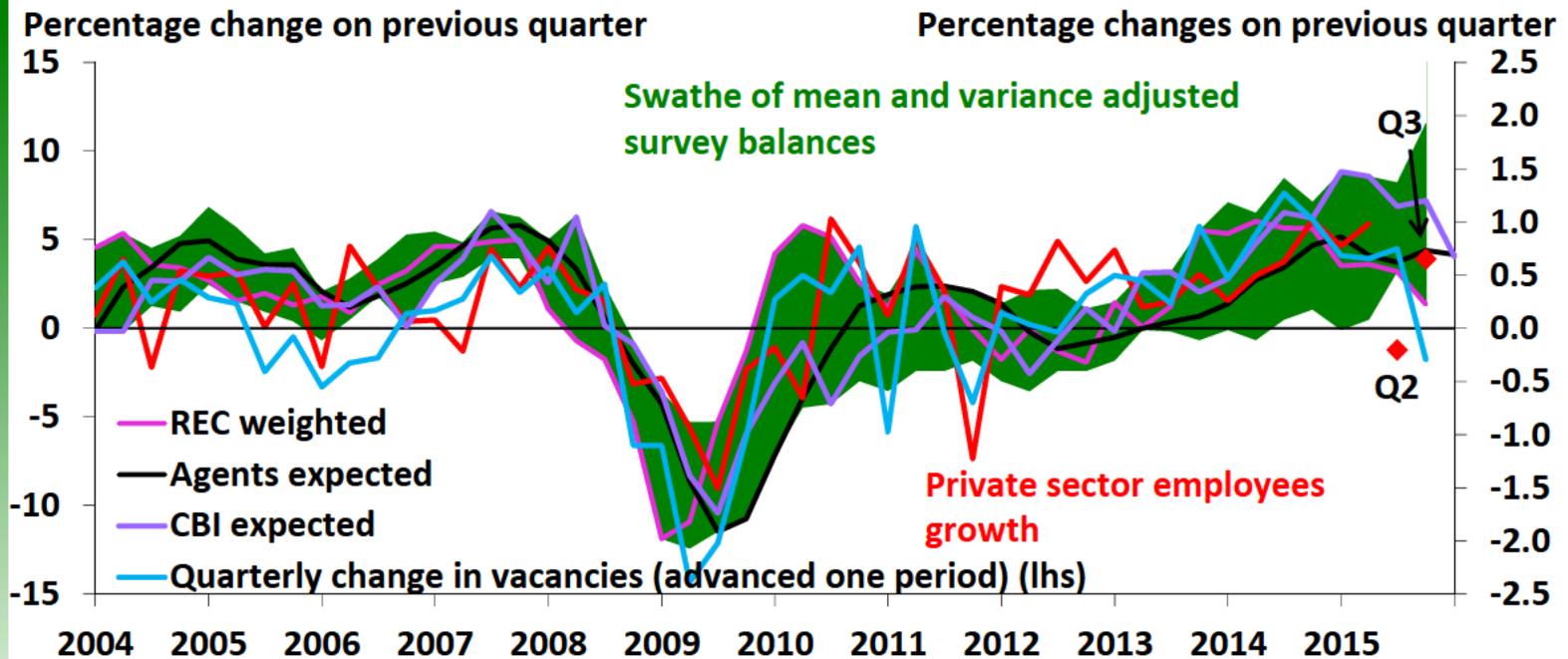
Unemployment flow scenarios



- But we now need to see an increase in hiring rates relative to Q2 if unemployment is to resume its decline.



Employment intentions swathe



- Demand for labour continues to look robust, although vacancies have fallen back slightly from recent record highs.



Summary

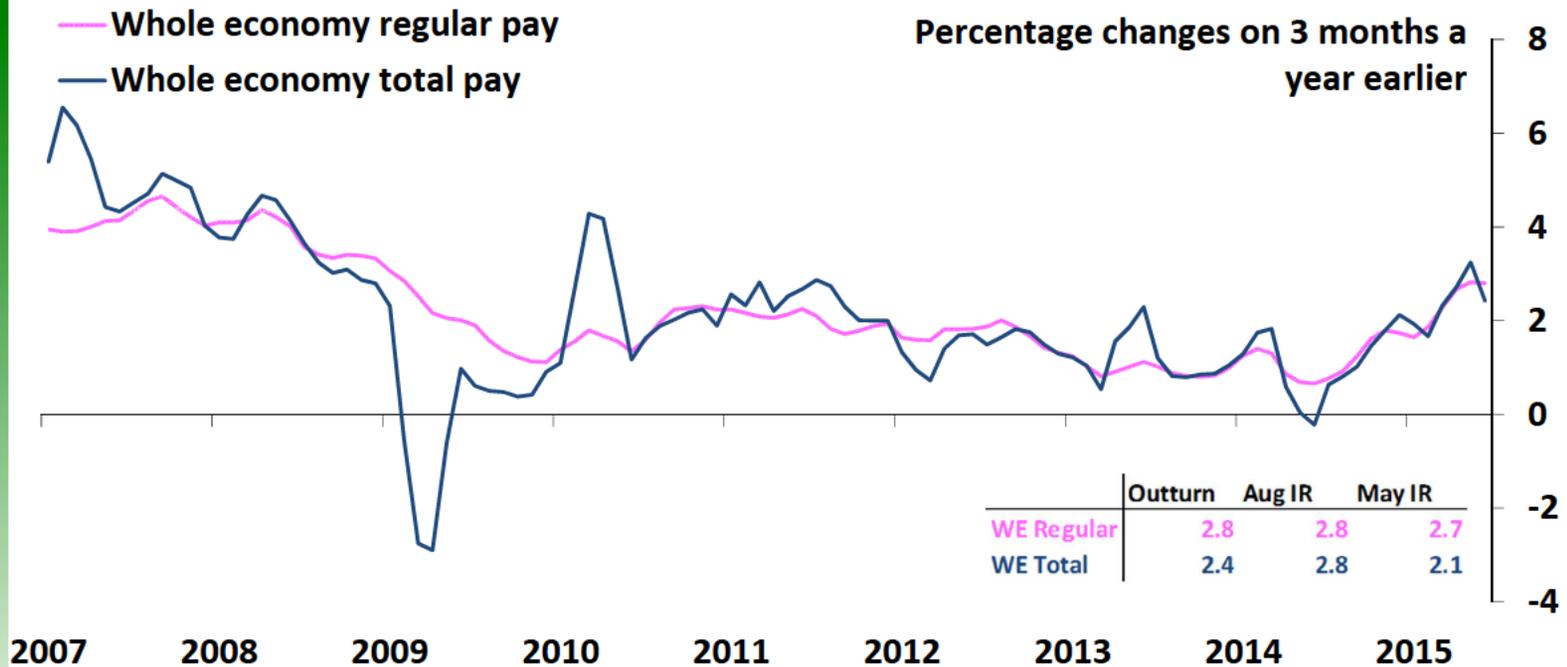
- **Headline inflation forecast revised down very slightly because of lower oil prices, but core inflation forecast revised up.**
- **The recent fall in employment was driven by a fall in hiring, but surveys of labour demand remain positive, and our forecast is unchanged.**



Wages



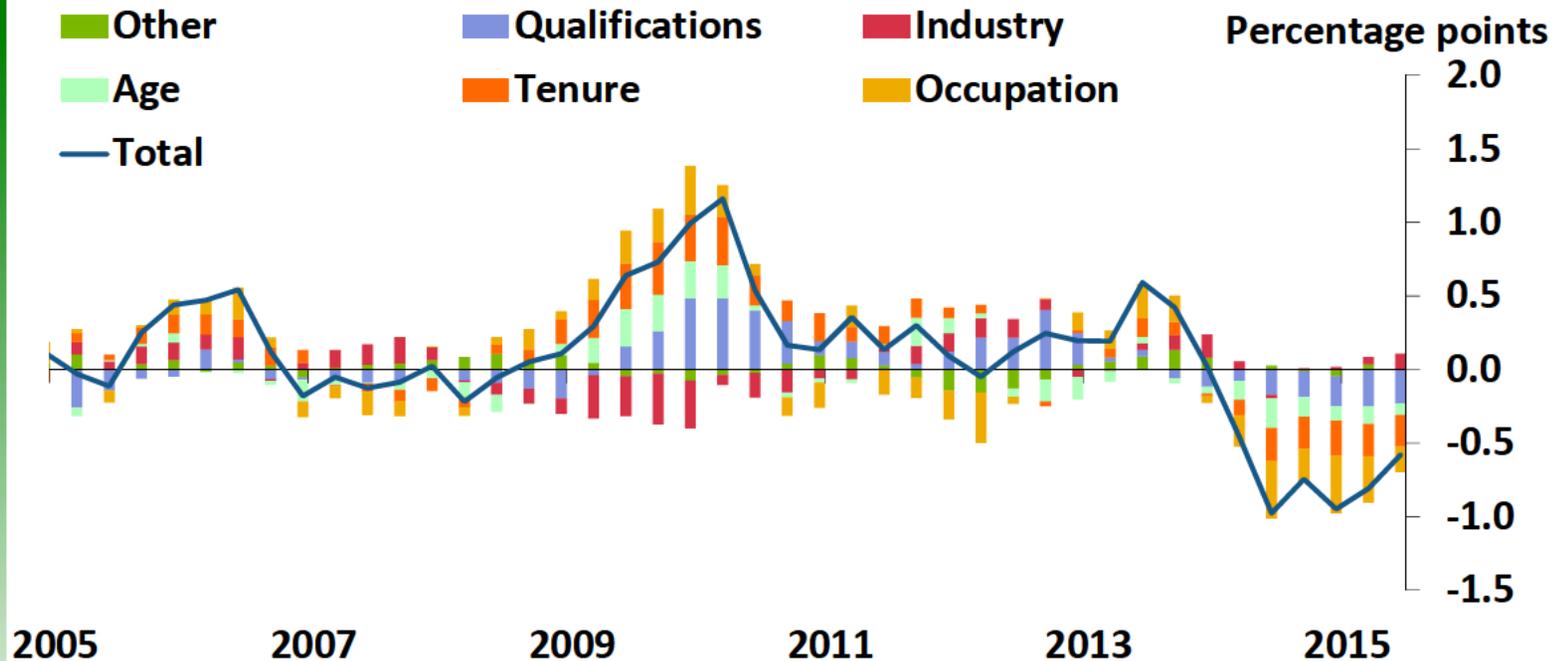
Wages



- **Whole economy annual regular pay growth was 2.8% as expected in Q2, but bonuses were unexpectedly weak this month.**



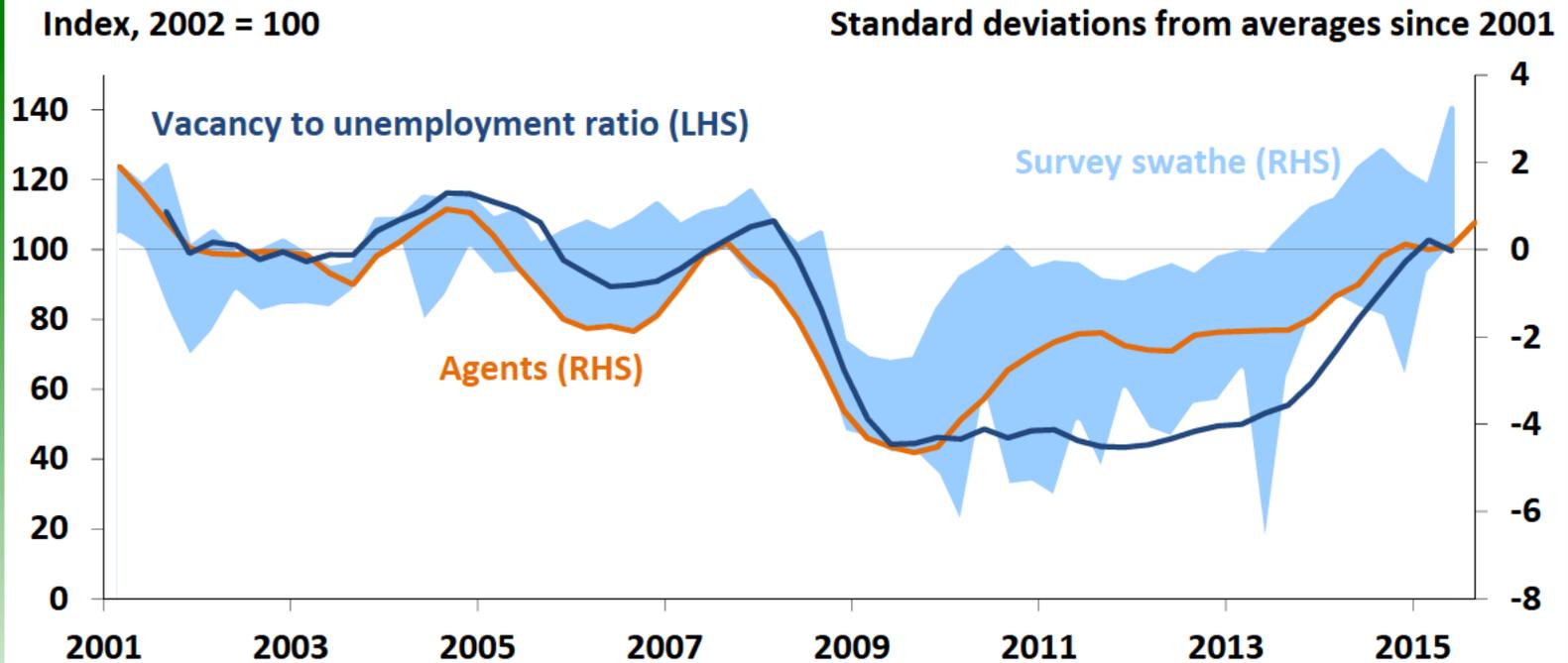
Compositional effects



- Compositional effects still dragging on pay growth in Q2, but by less than expected.



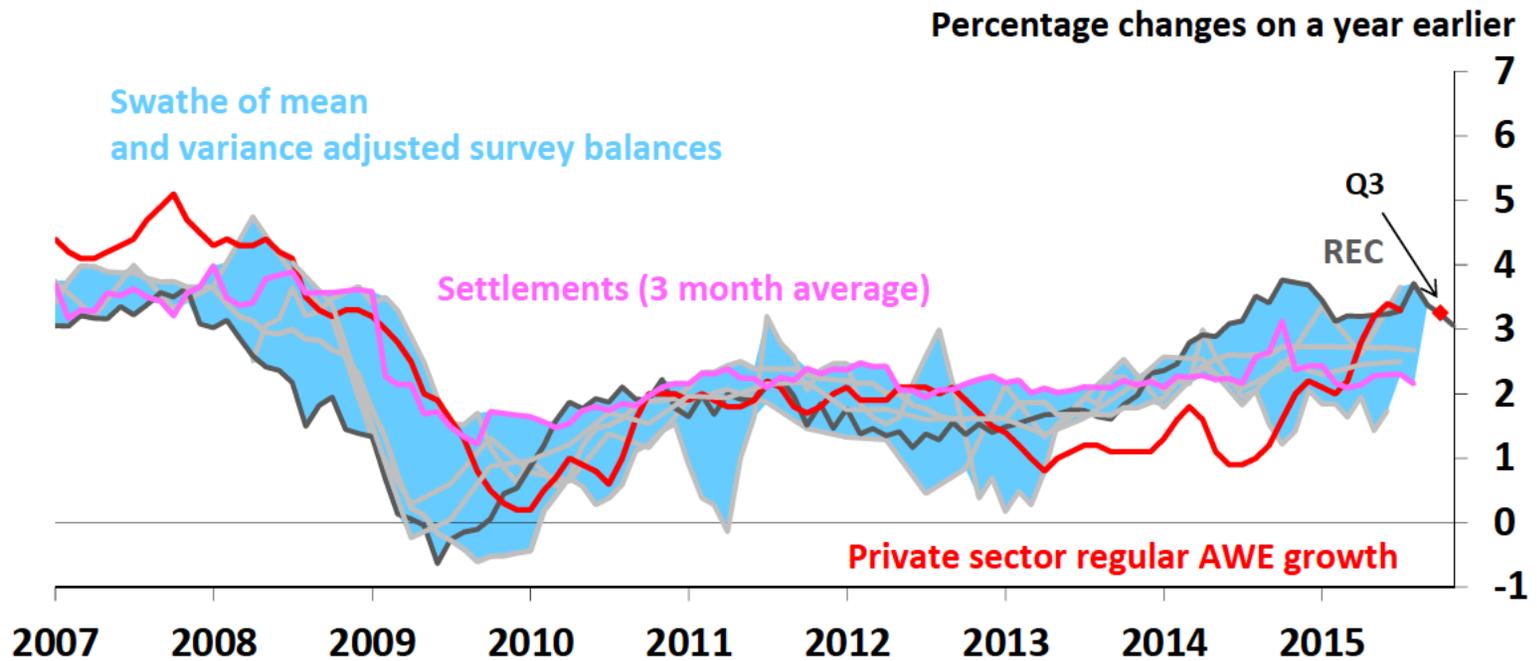
Recruitment difficulties



- The labour market has tightened over the past year.



Earnings swathe



- We expect pay growth to remain around current levels in the near term.



Summary

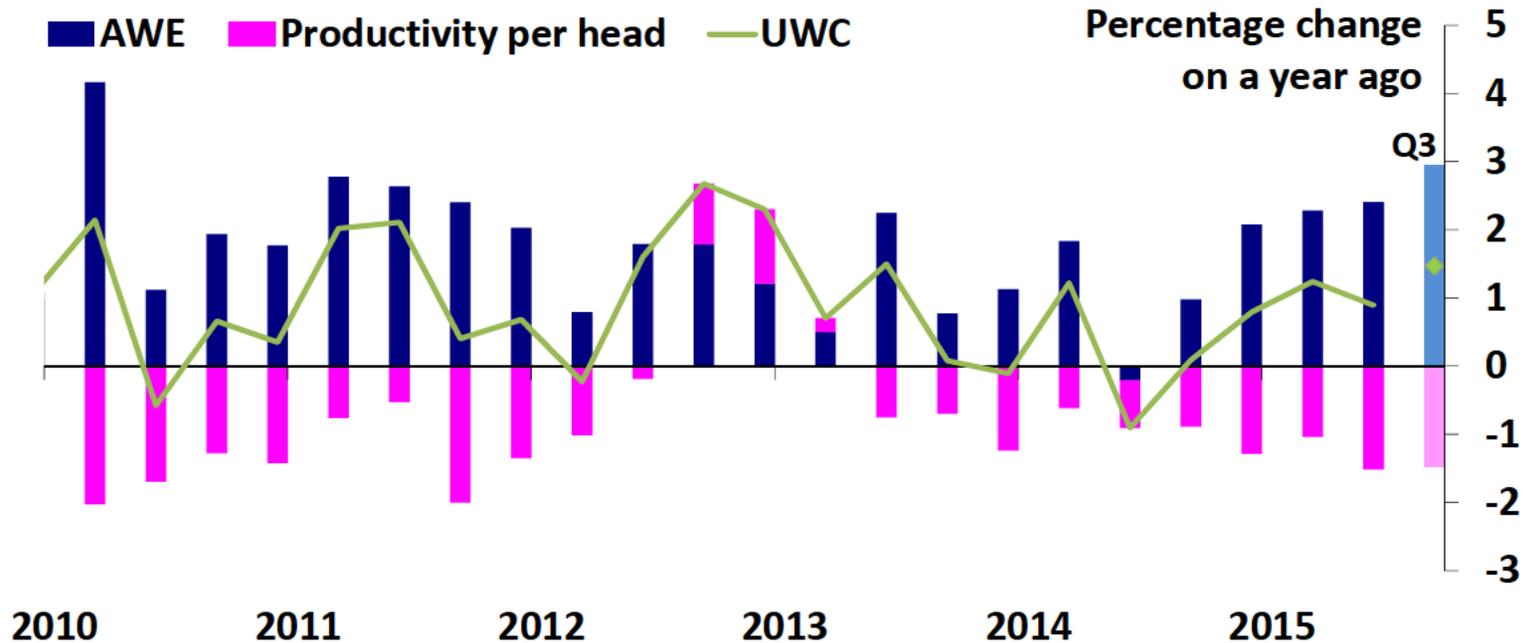
- **Headline inflation forecast revised down very slightly because of lower oil prices, but core inflation forecast revised up.**
- **The recent fall in employment was driven by a fall in hiring, but surveys of labour demand remain positive, and our forecast is unchanged.**
- **Bonuses were weaker than expected this month, but pay is still stronger than we expected in the May Inflation Report.**



Productivity and unit labour costs



Whole economy unit wage cost growth

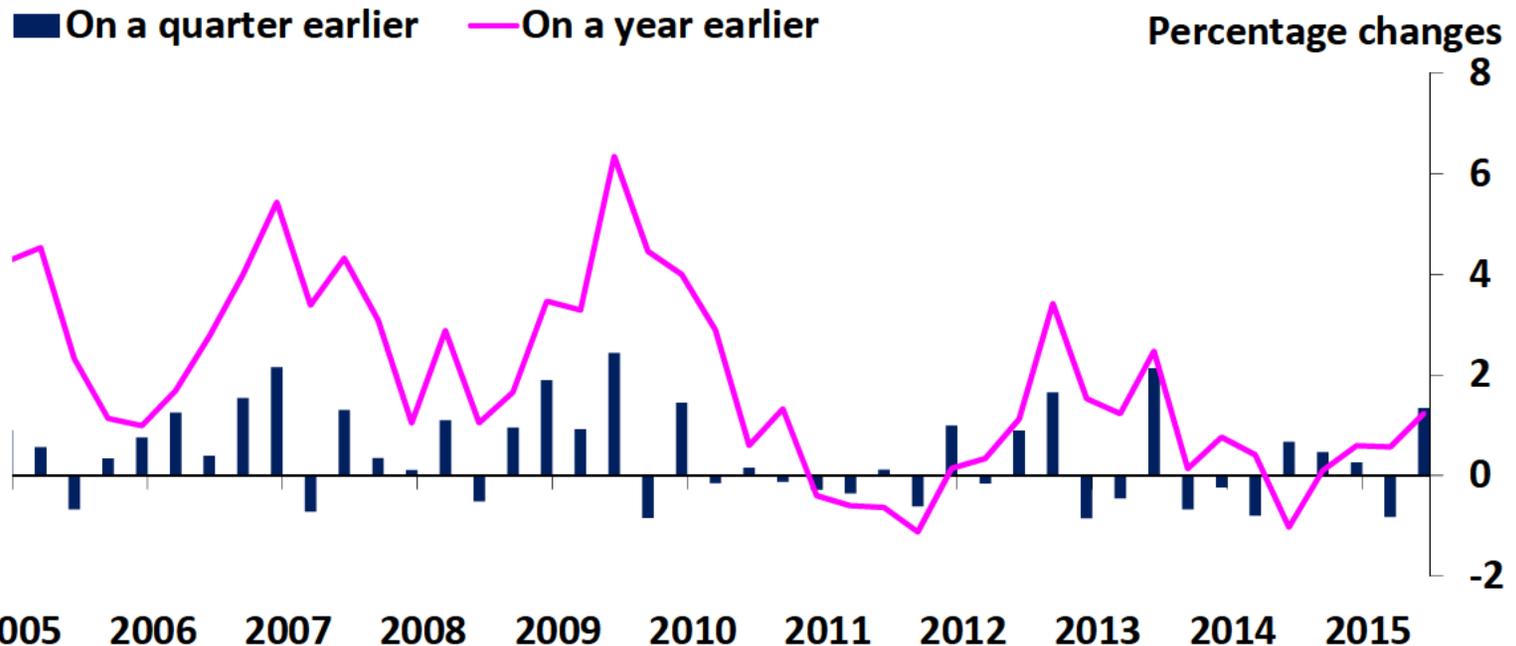


- Whole economy AWE-based estimate of UWCs grew 0.9% in the year to Q2 and is expected to rise to 1.5% to Q3.

29



Whole economy unit labour cost growth



- Latest ONS data suggests ULC annual growth in Q2 was 1.2%.



Summary

- **Headline inflation forecast revised down very slightly because of lower oil prices, but core inflation forecast revised up.**
- **The recent fall in employment was driven by a fall in hiring, but surveys of labour demand remain positive, and our forecast is unchanged.**
- **Bonuses were weaker than expected this month, but pay is still stronger than we expected in the May Inflation Report.**
- **Unit wage costs growing at around 1% on a year earlier.**



END



7: Staff Presentation: Current Account and Policy Framework



Bank of England

**Macroeconomic policy and the
current account: what options?**

1 September 2015

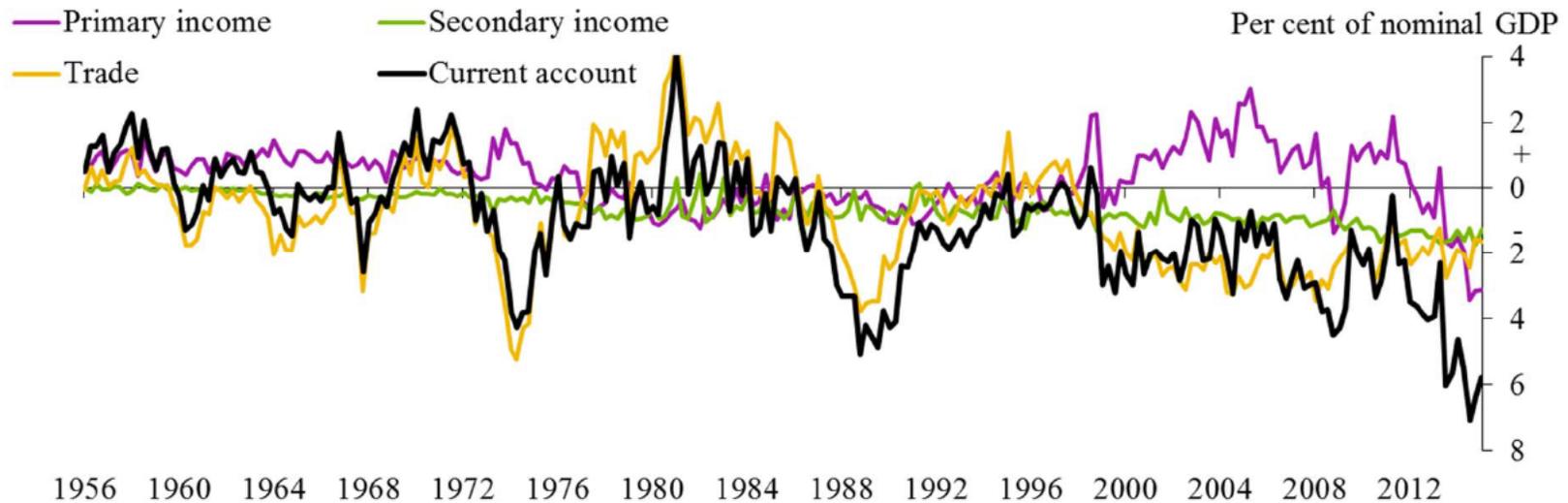
Prepared by FSSR, ID and MA

Overview



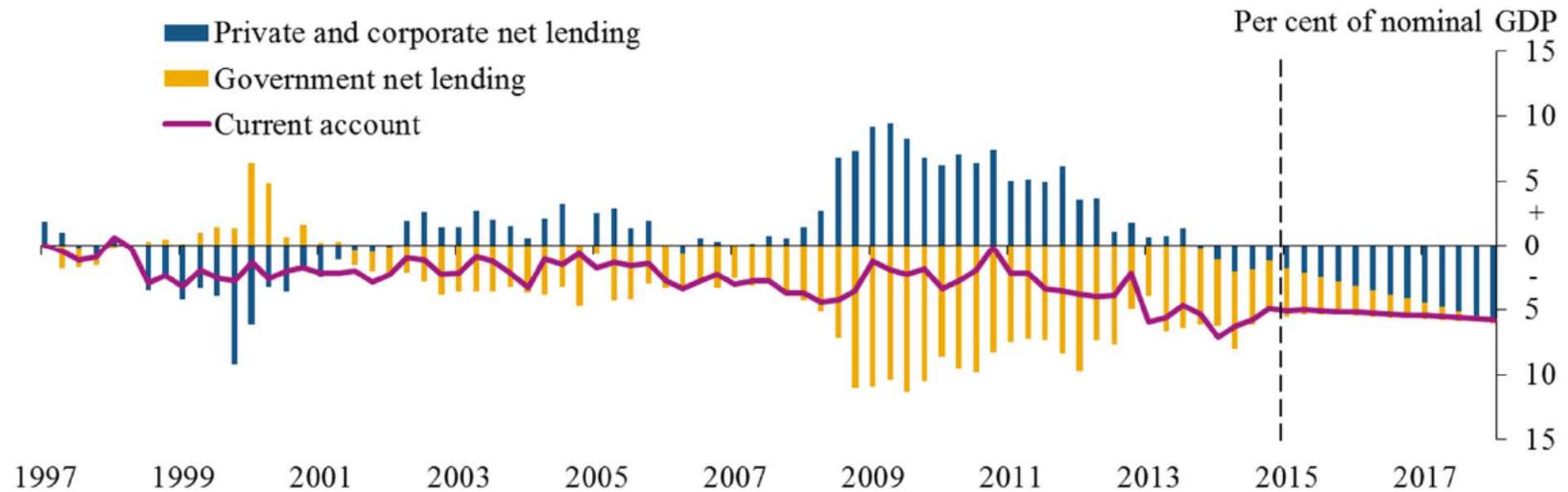
- The UK has a record current account deficit
- So what?
- What has already been done?
- Should you do more?
- How would you do it?

UK current account



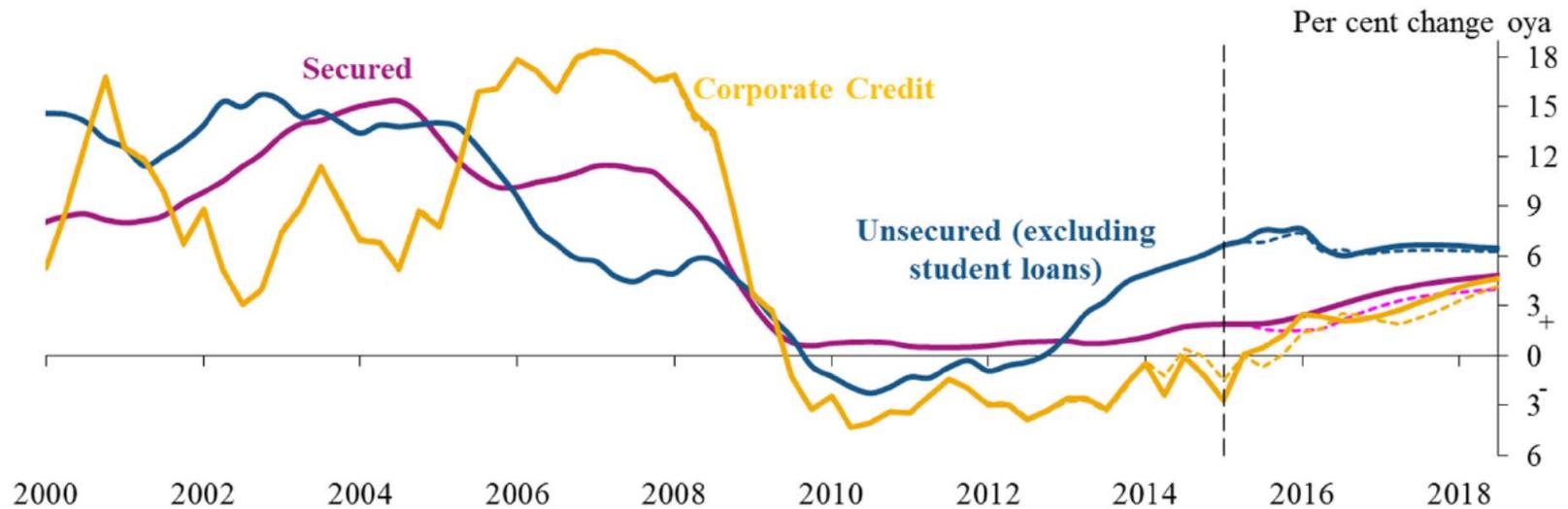
UK current account deficit largest on record
Recent deterioration driven by low income on investments

Current account in the forecast



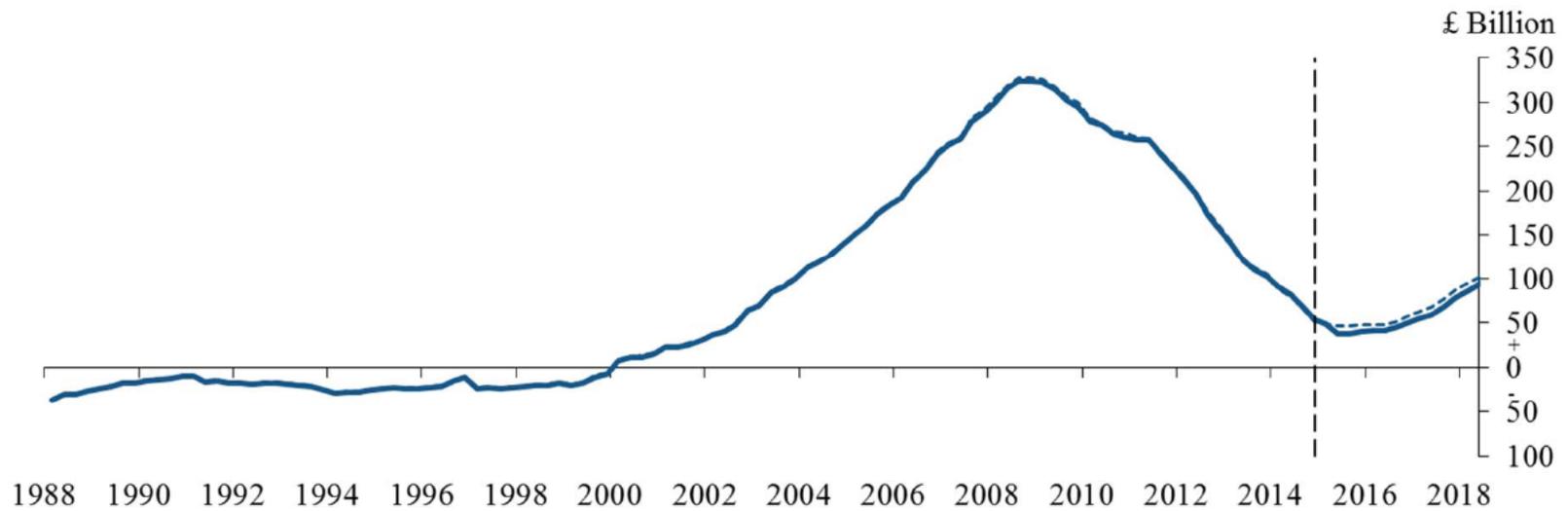
In the forecast the current account remains flat; composition changes from public to private deficit

Forecast of private credit growth



- Private credit growth accelerates somewhat over the forecast

Real economy customer funding gap



Why prefer a smaller current account deficit?



- Lawson doctrine: private deficits are between 'consenting adults'
 - Public contribution to deficit forecast to disappear
- Current account deficit key risk in July 2015 FSR
 - Capital inflows could reverse suddenly
 - Higher interest rates and inflation
 - Sharp fall in growth
 - Threat to primary and secondary objectives of both committees

Mitigating factors



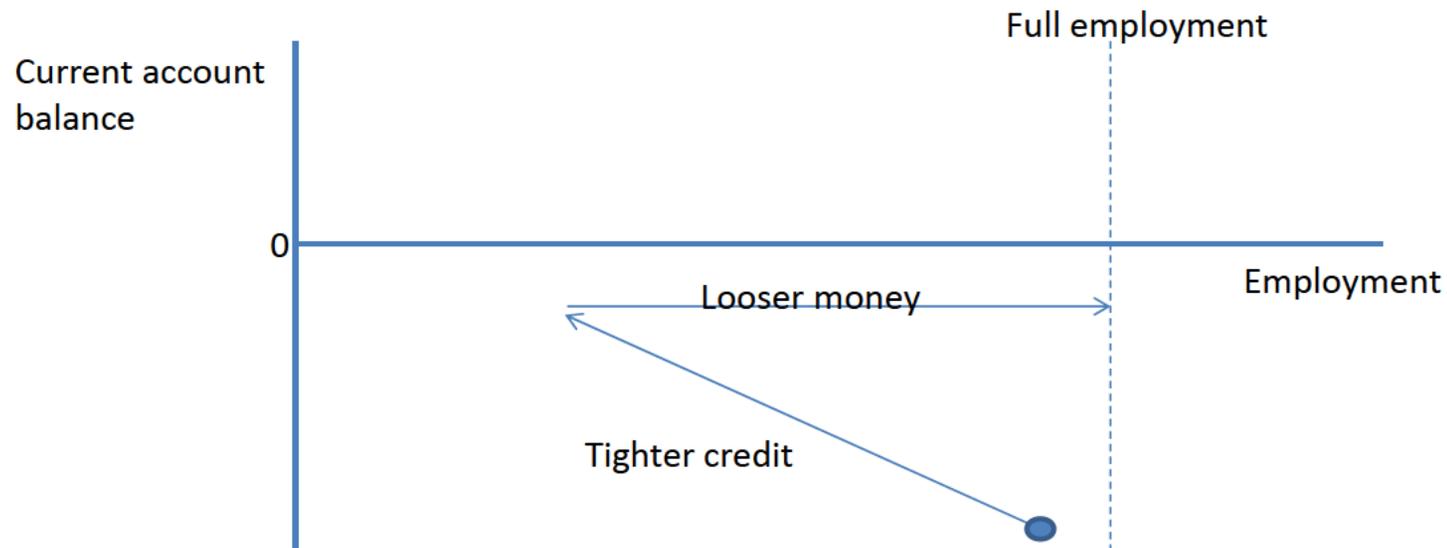
- Healthy financing and stock positions
- Subdued private credit growth (for now)
- Actions already taken:
 - Fiscal deficit set to close
 - Limits in place on high-LTI borrowing
 - Bank capital robust to sudden stop stress test

How to reduce the current account deficit



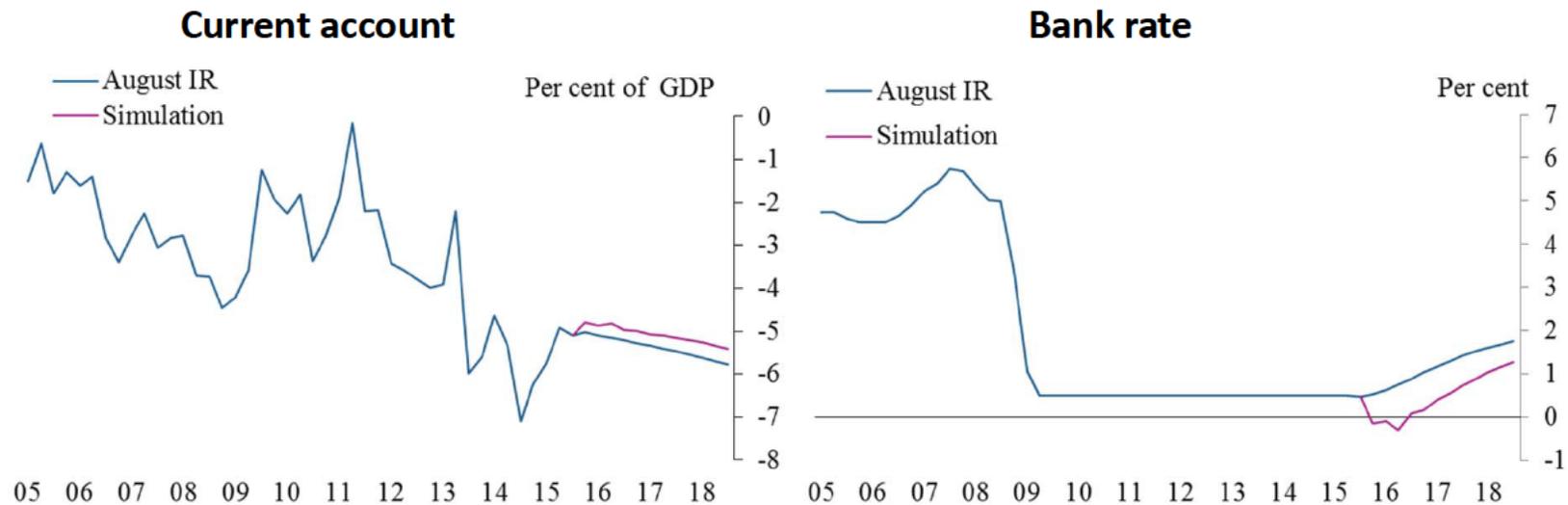
- The current account depends on the level of domestic spending and on the exchange rate
 - Higher spending means higher imports and a higher deficit
 - A stronger exchange rate encourage imports and discourages exports, increasing the deficit
- So a policy mix that reduces domestic spending and weakens the exchange rate will reduce the current account deficit
- For example, restricting credit and loosening monetary policy

Loose money, tight credit



- Alternative policy mix: tighten macropru rather than raise Bank rate
 - Tighter credit reduces domestic demand
 - Lower interest rates weaken the exchange rate so UK goods are priced more competitively
 - Productive capacity used for exports instead

Bank capital and the current account – illustrative estimates



- 100bp rise in credit spreads – maybe 5-10pp rise in capital requirements
- Small effect on the current account, large adverse effect on productivity, interest rates need to fall below zero

Additional policy levers



- Household and corporate borrowing
- Bank liabilities
- Capital flows
- Exchange rate

Summary



- **Risks from the current account seem contained at present**
- **But they could grow if the deficit remains wide**
- **Policymakers may prefer to narrow the current account deficit by increasing exports as the fiscal position improves**
- **This would involve restricting credit and keeping interest rates low**
- **It would be difficult and possibly costly to achieve this with existing instruments**
- **Exchange-rate intervention and capital flow management would be more direct, but much harder to implement**
- **Policy can also continue to focus on ensuring the system is robust to a current-account reversal**