

A bird's eye view of OECD housing markets

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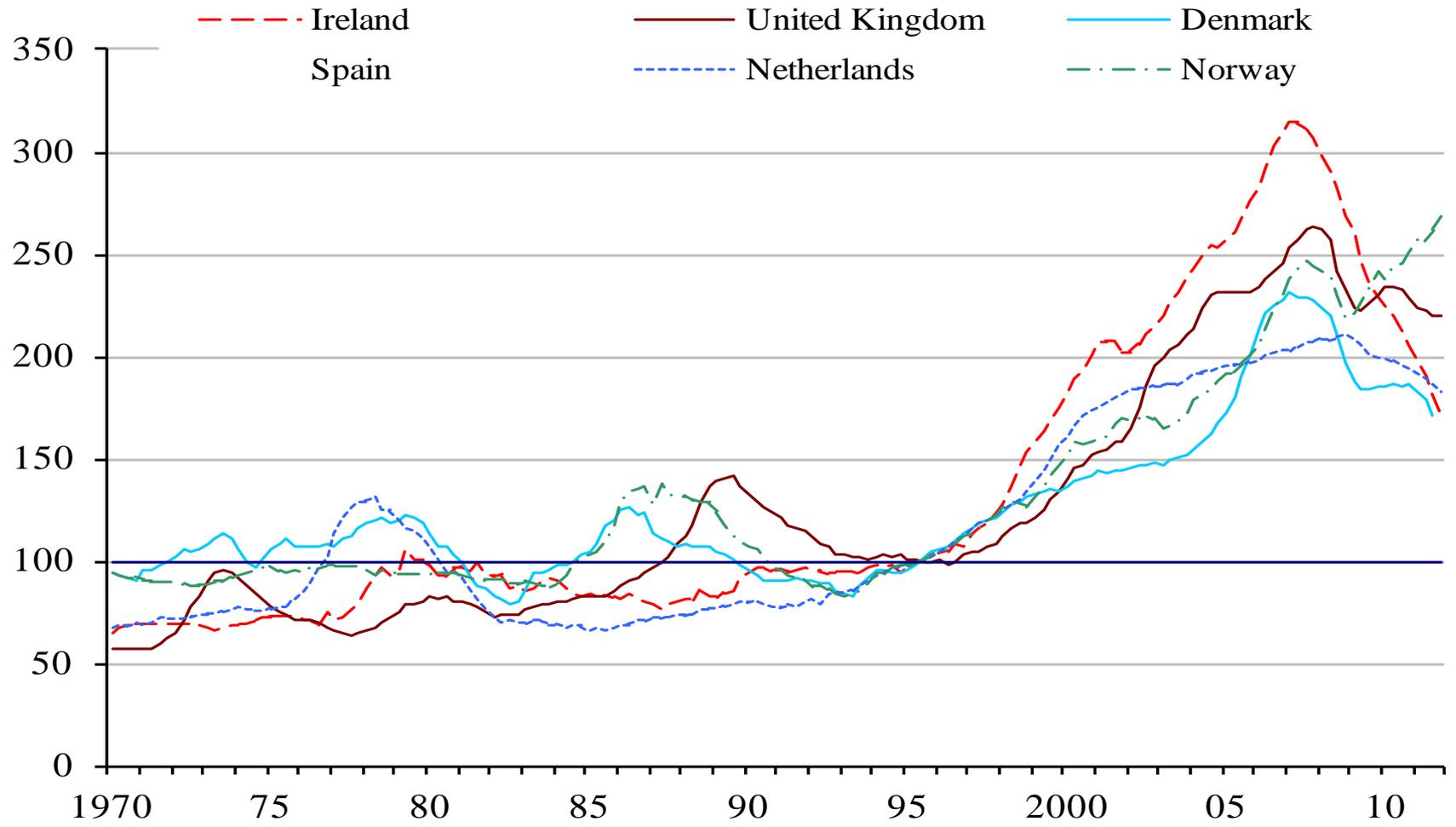
Outline of the presentation

- **Recent developments in OECD housing markets**
- **Drivers of supply and demand**
- **Housing and the wider economy**

Recent developments in OECD housing markets

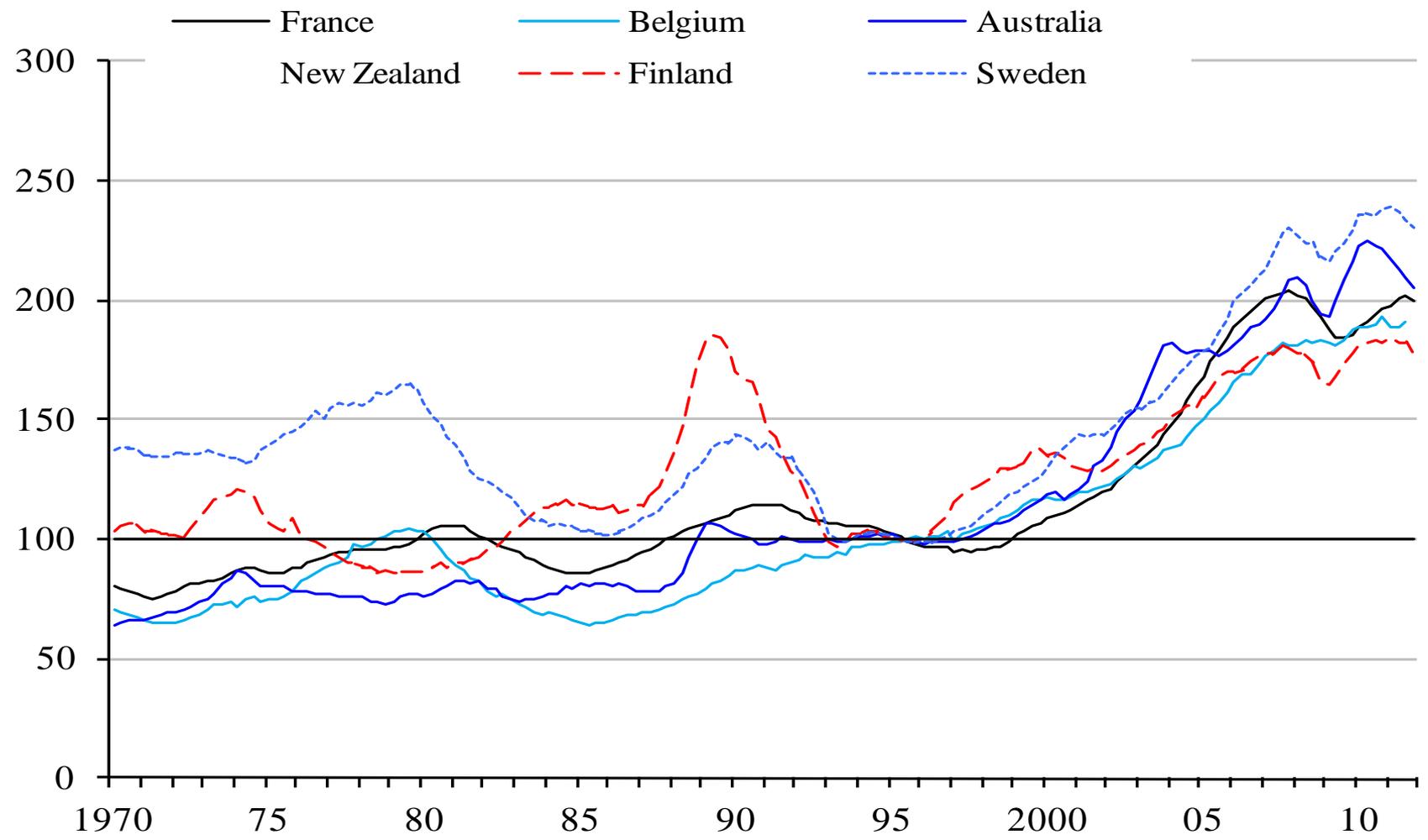
Real house prices

Indices, 1995 = 100



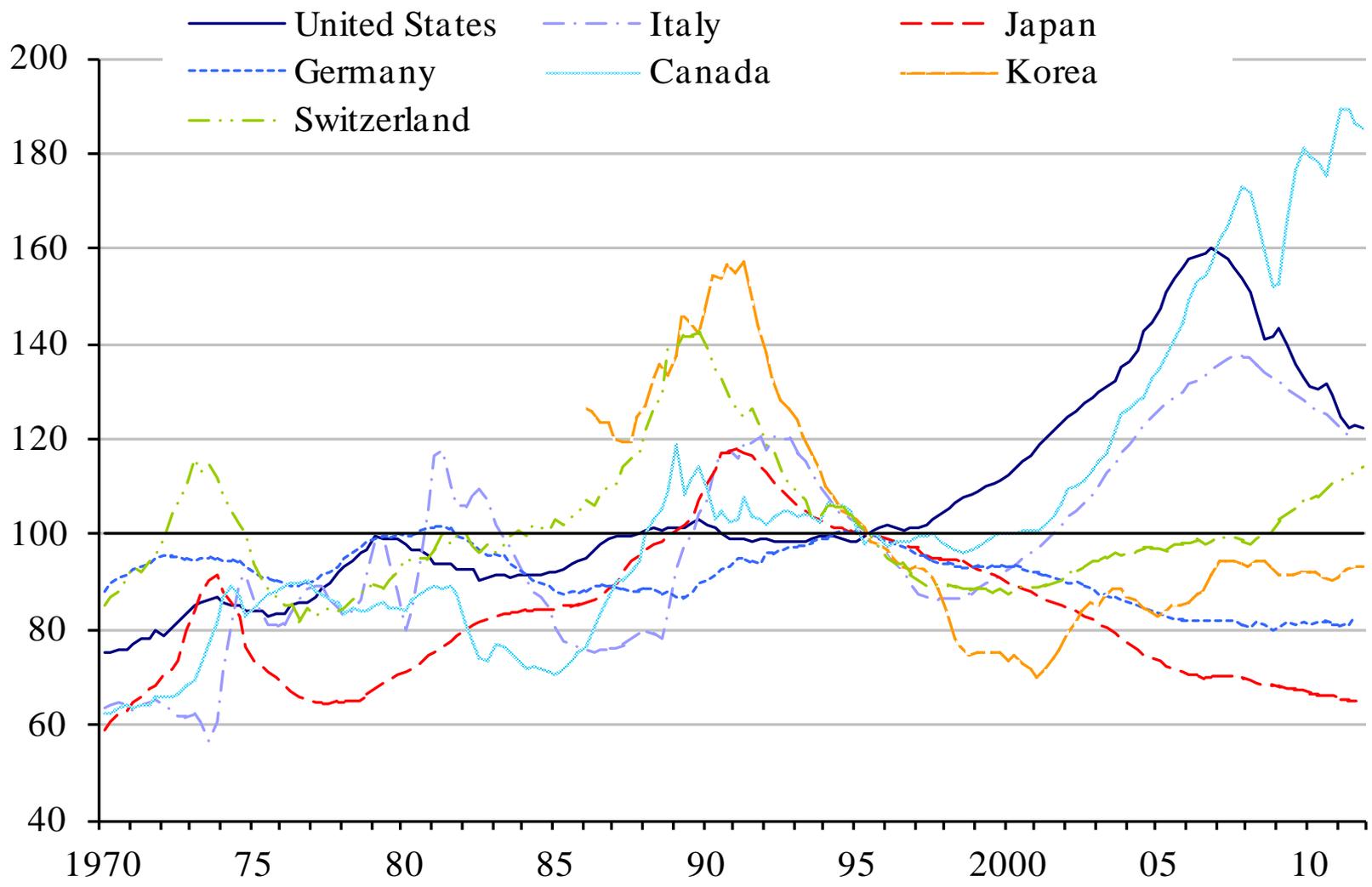
Real house prices (cont.)

Indices, 1995 = 100



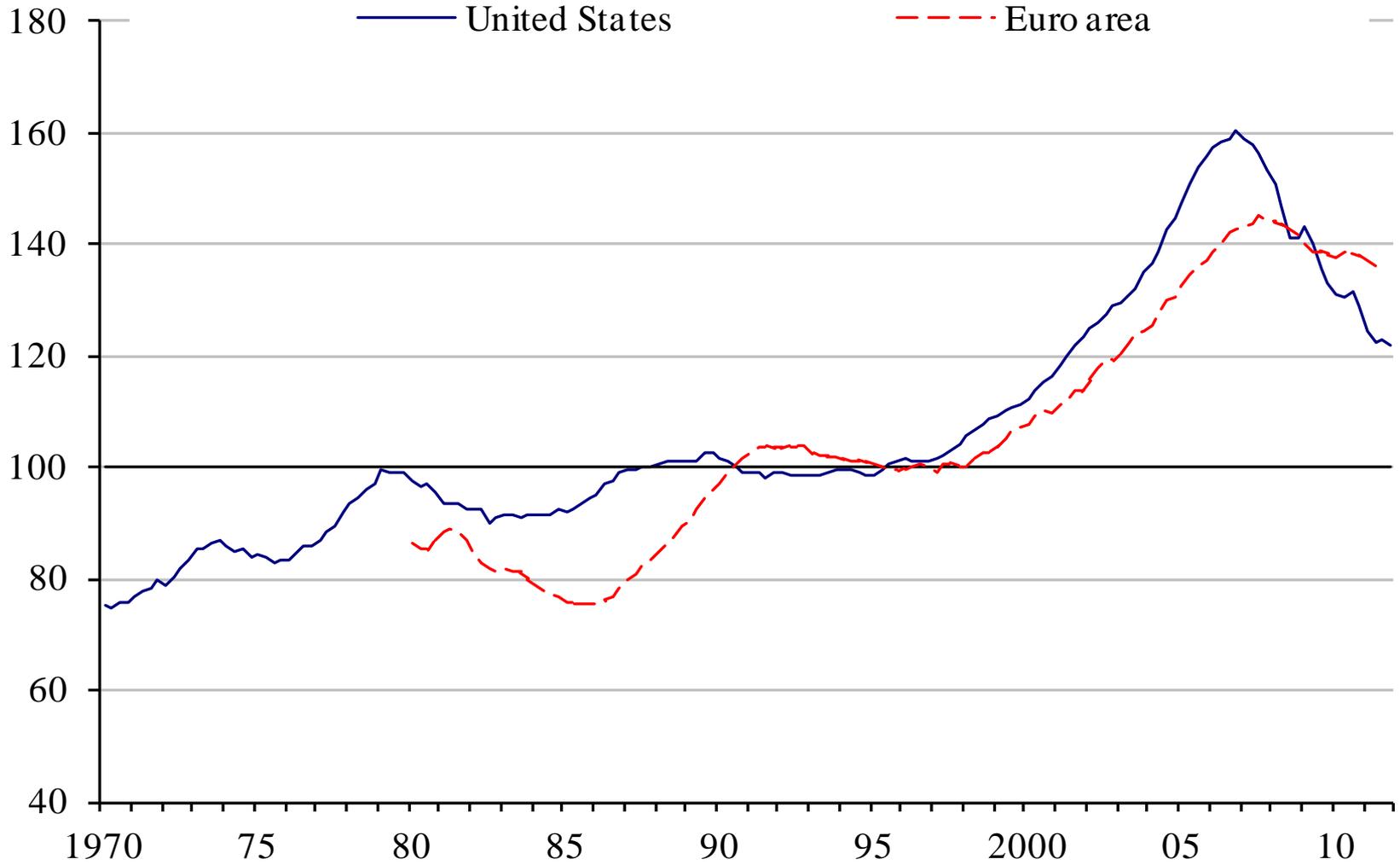
Real house prices (cont.)

Indices, 1995 = 100



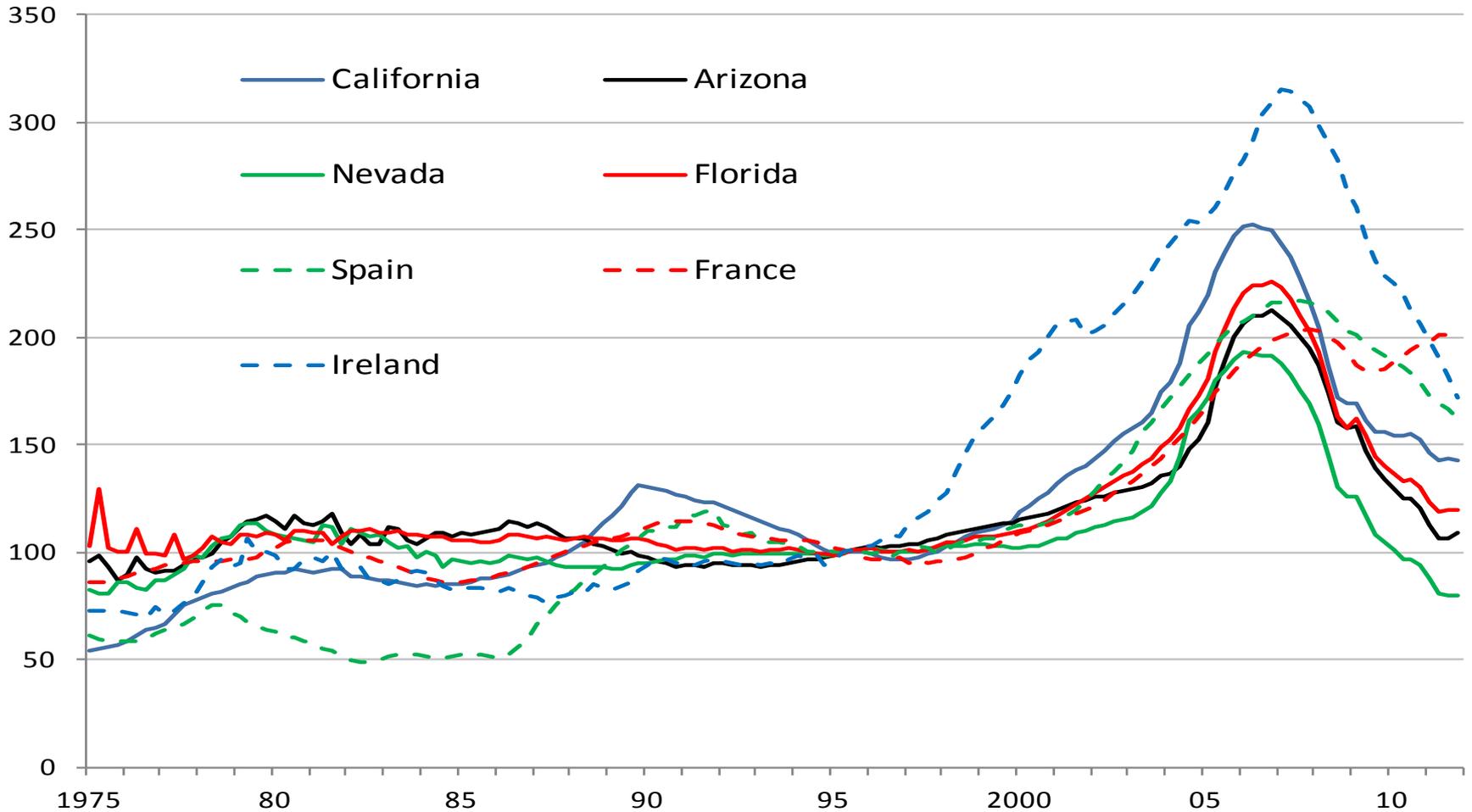
Real house prices in the US and euro area

Indices, 1995 = 100



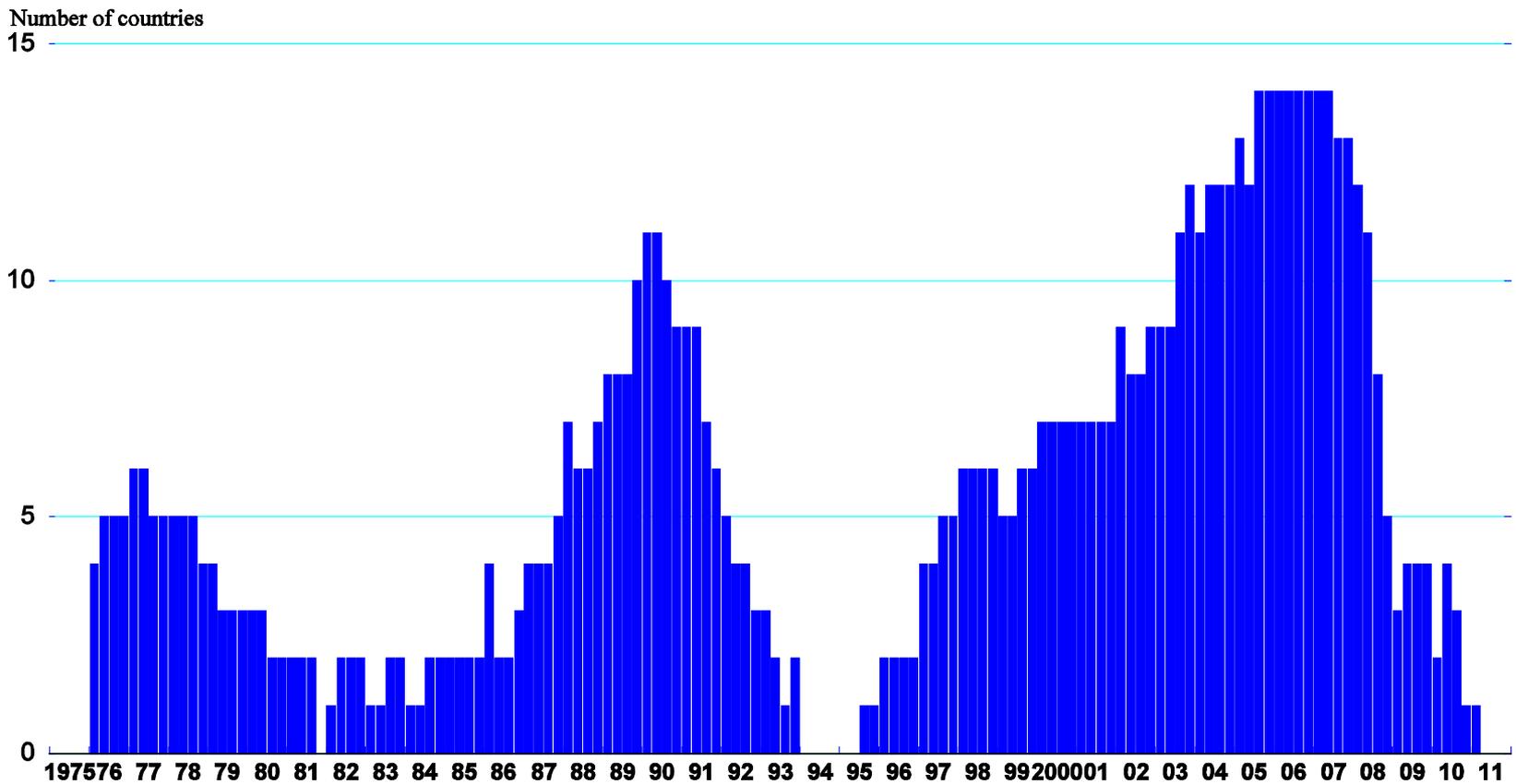
Real house prices in selected US states and euro area countries

Indices, 1995 = 100

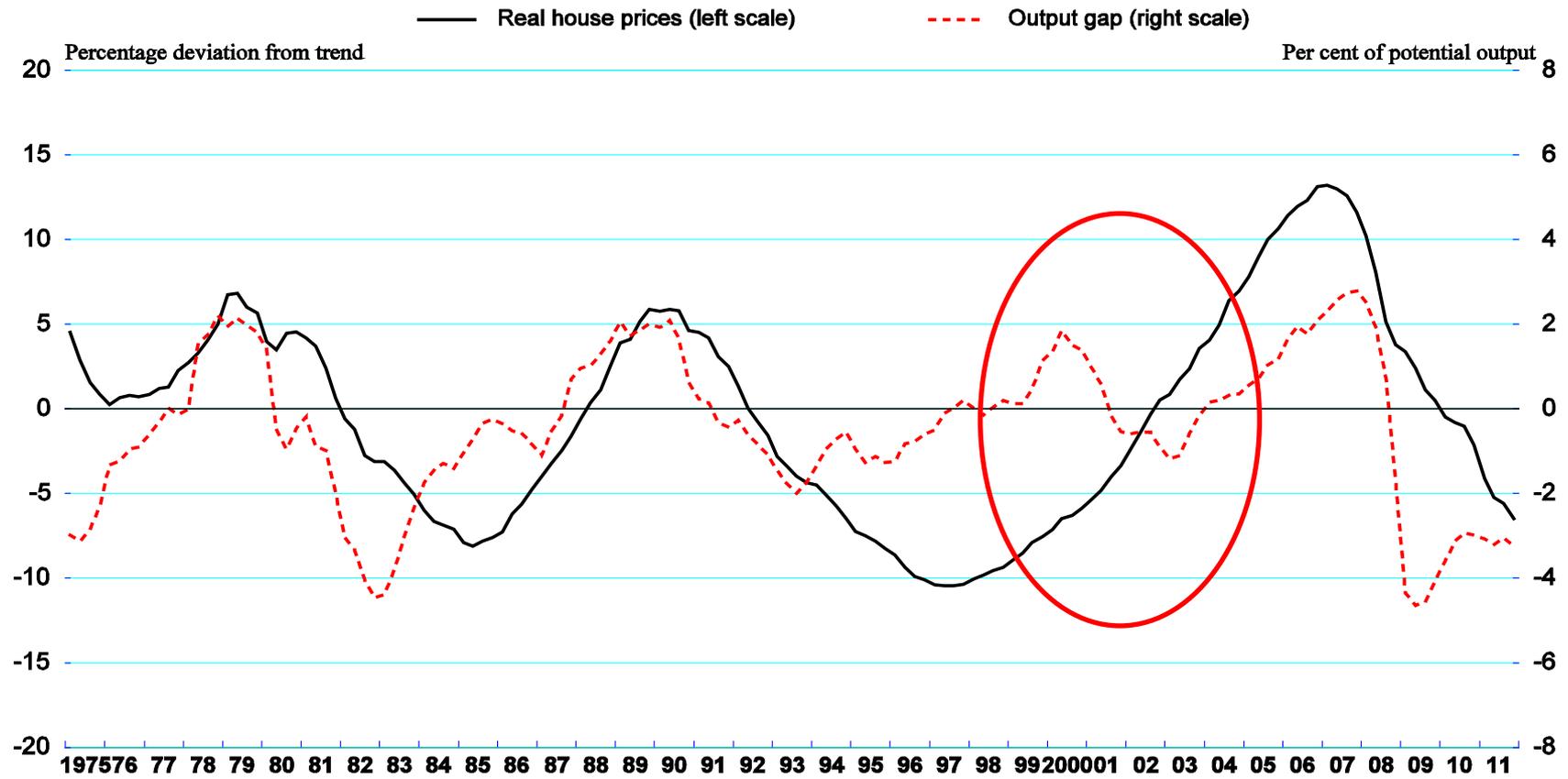


Cross-country coincidence of real house price increases

Number of countries (out of 18) with over 25% increase
in real prices over the previous five years

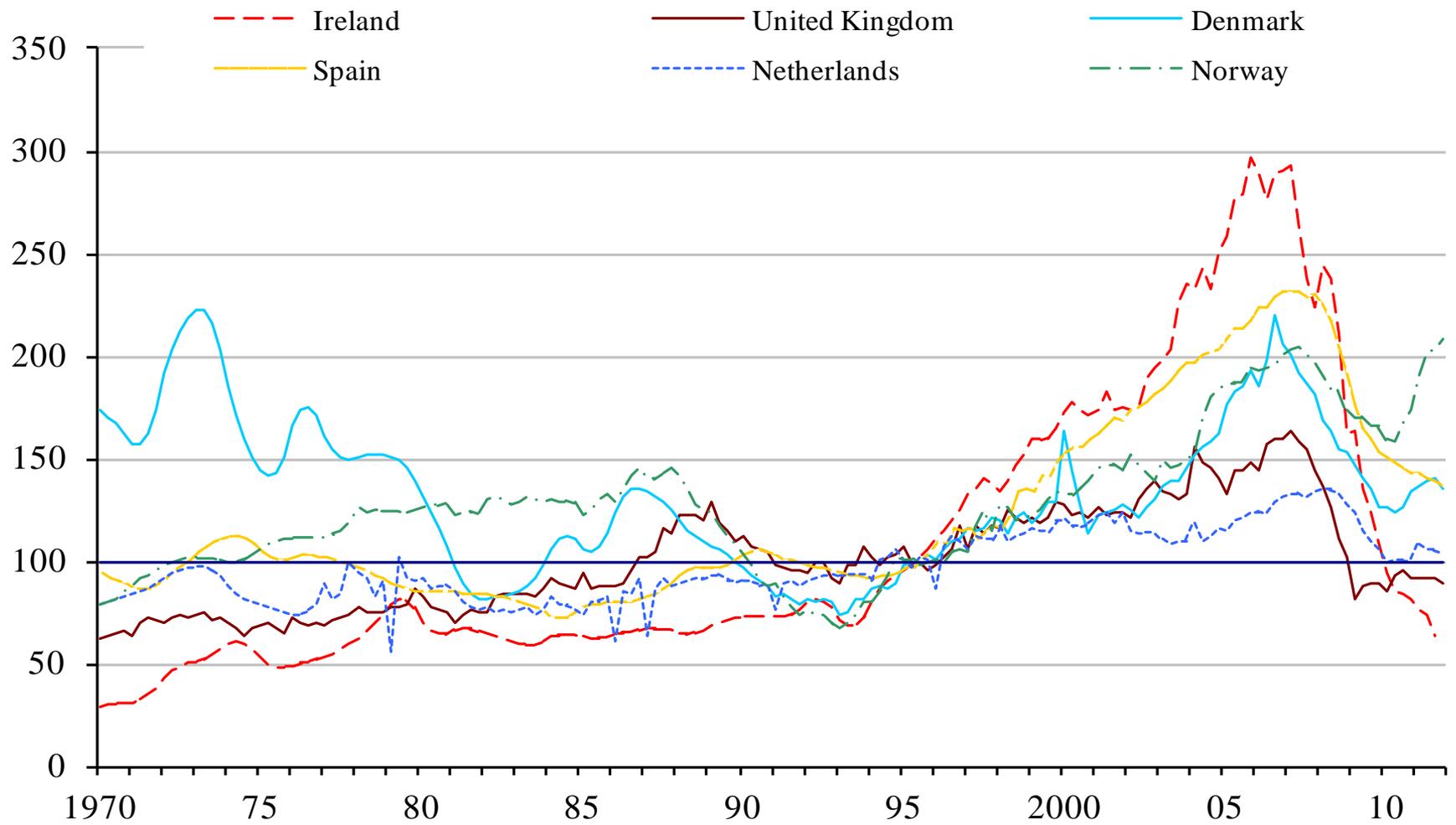


OECD Real house prices and the business cycle



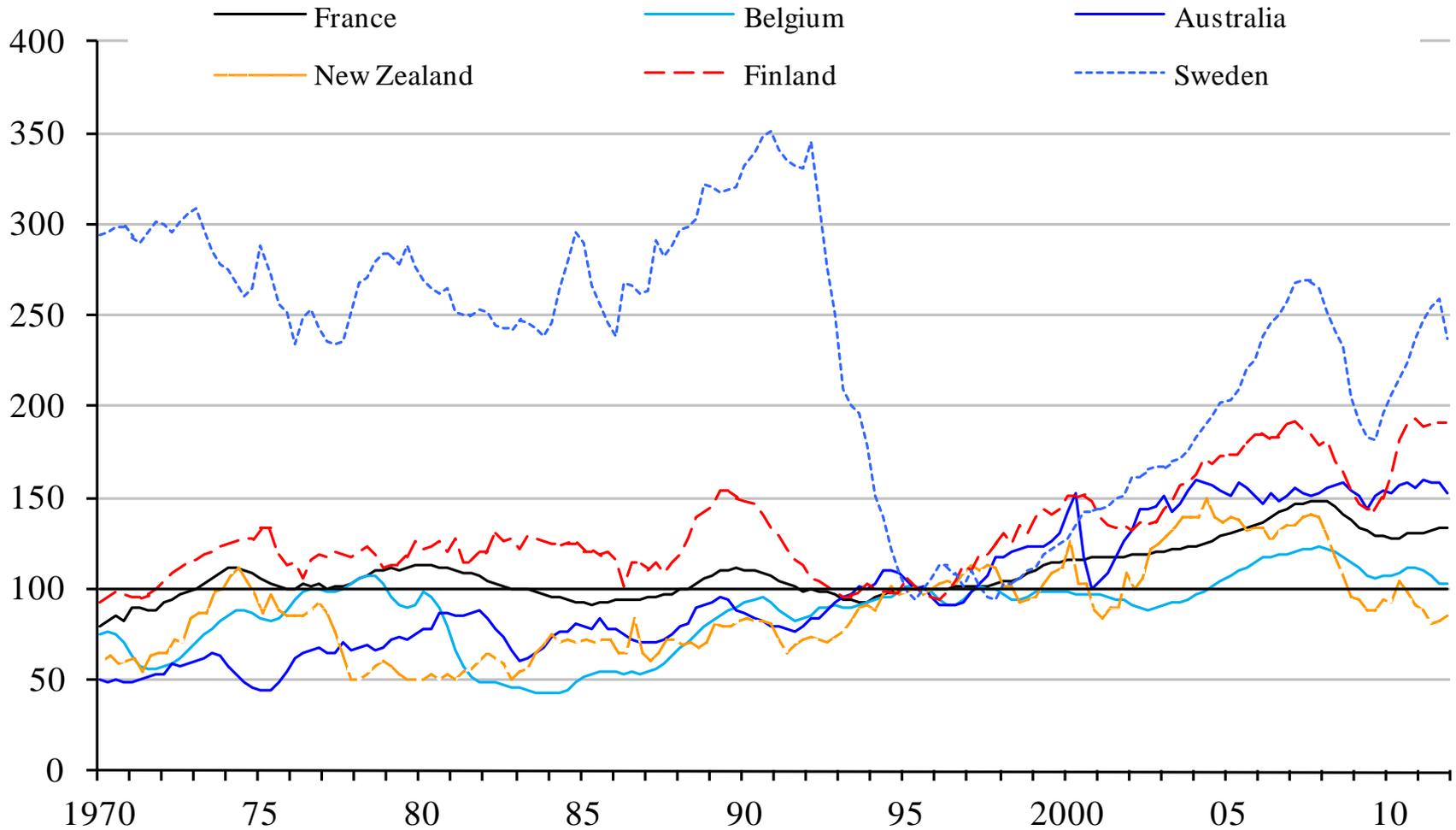
Real residential investment

Indices, 1995 = 100



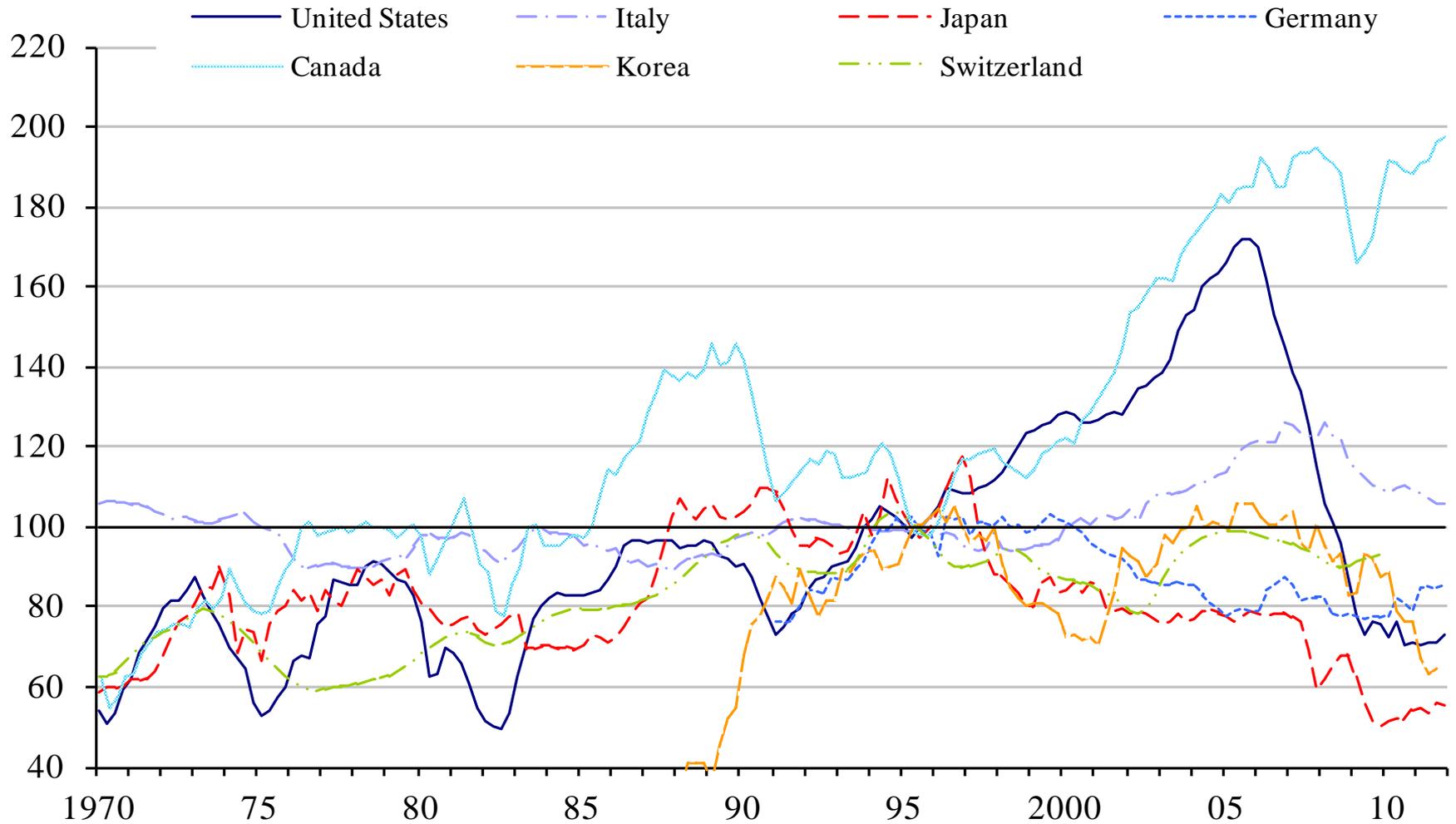
Real residential investment (cont.)

Indices, 1995 = 100



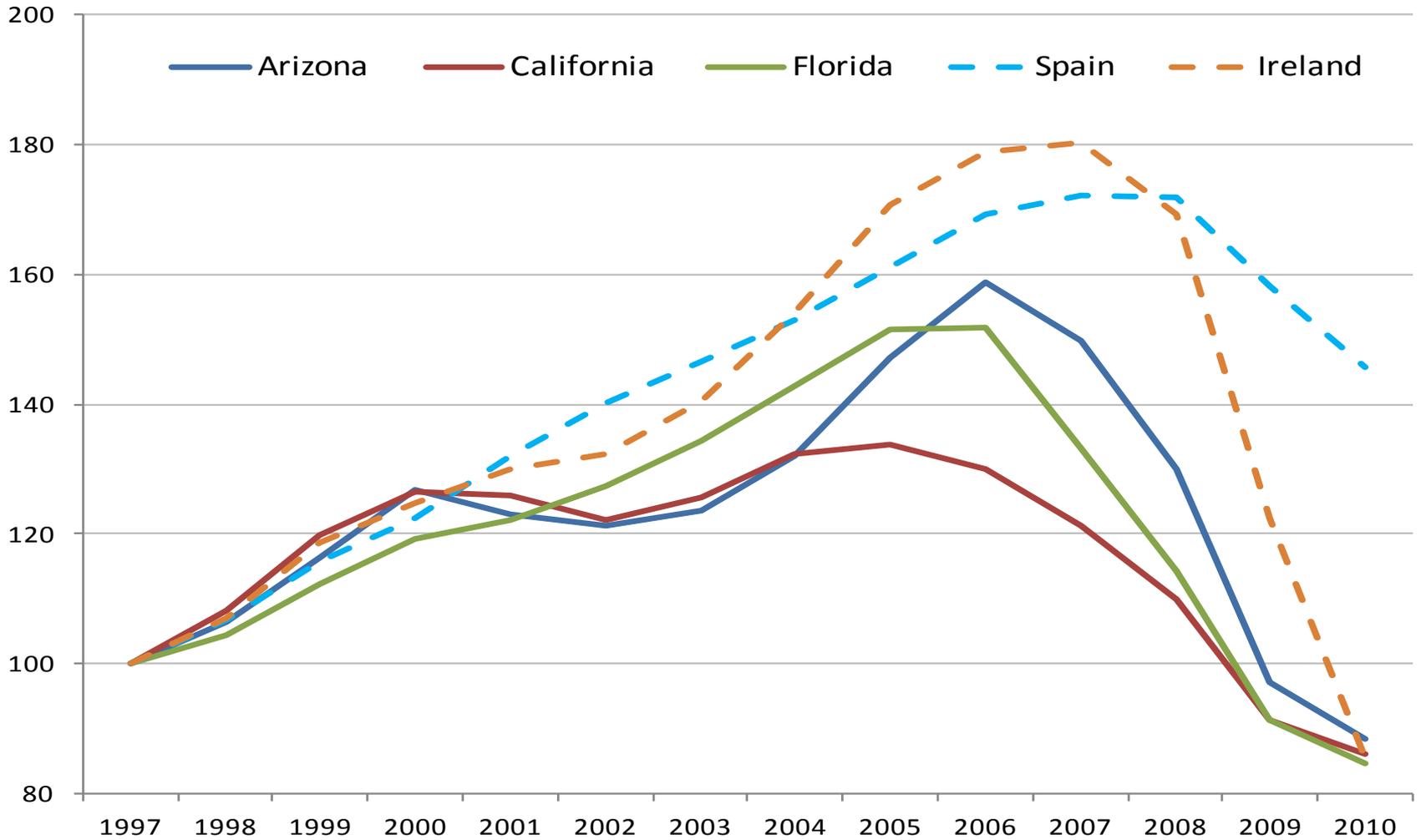
Real residential investment (cont.)

Indices, 1995 = 100



Construction in selected US states and euro area countries

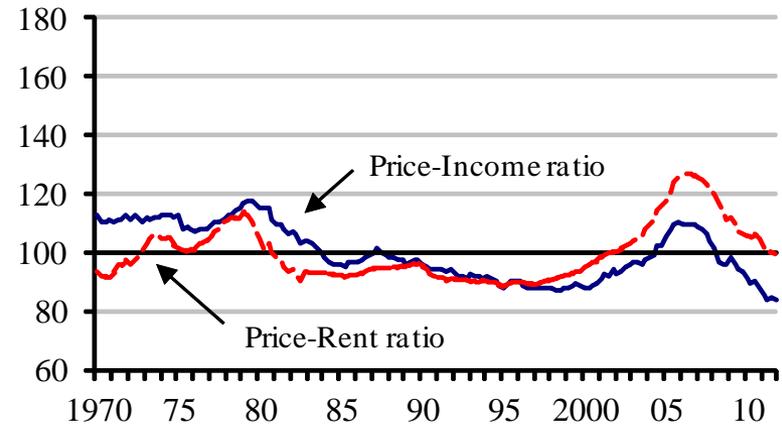
Volume indices, 1997=100



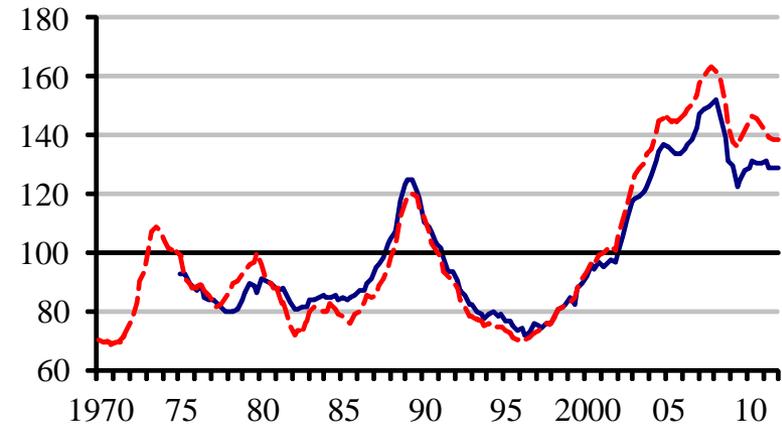
Price-Income and Price-Rent ratios

Long-term average = 100

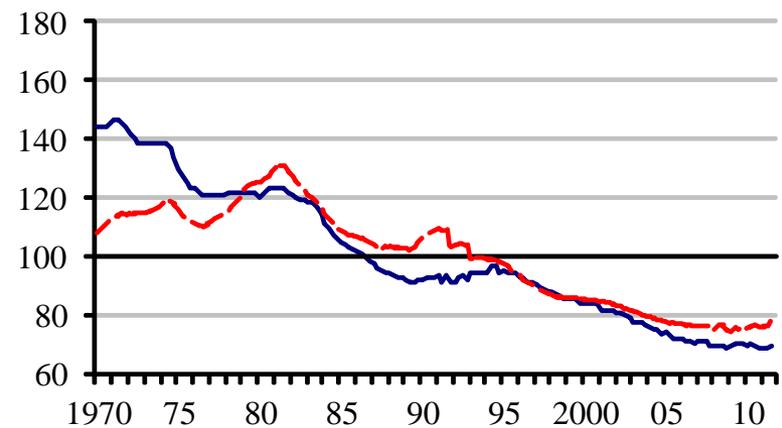
United States



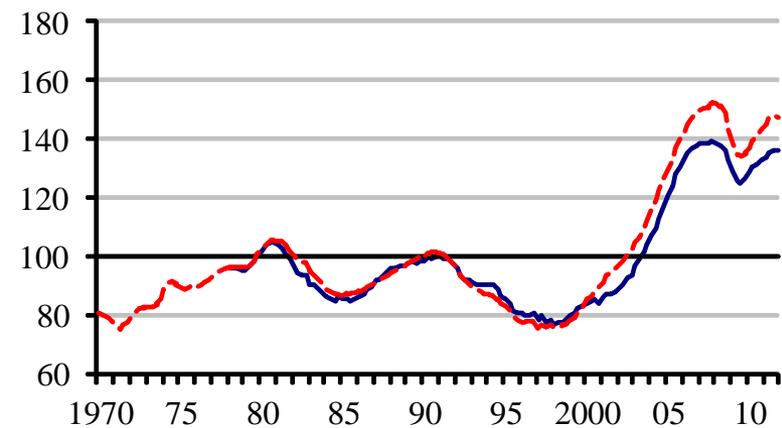
United Kingdom



Germany



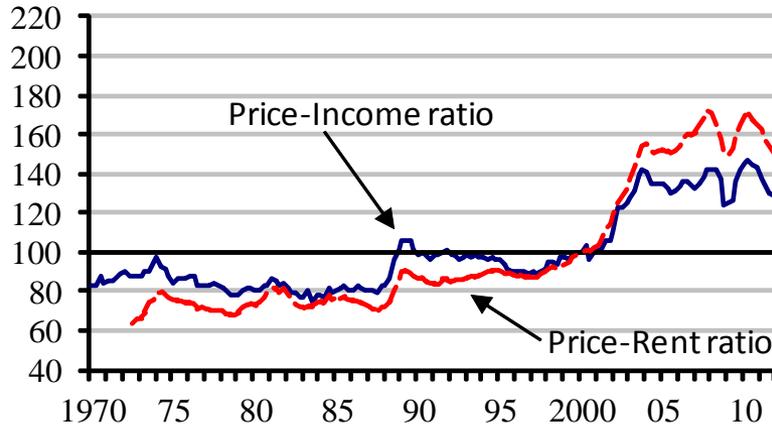
France



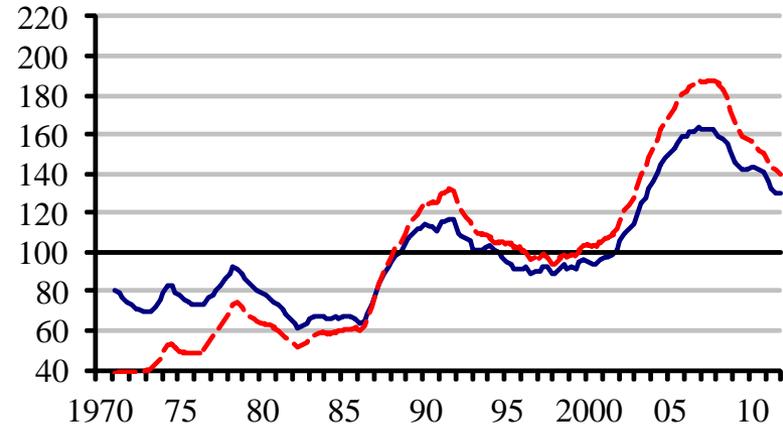
Price-Income and Price-Rent ratios (cont.)

Long-term average = 100

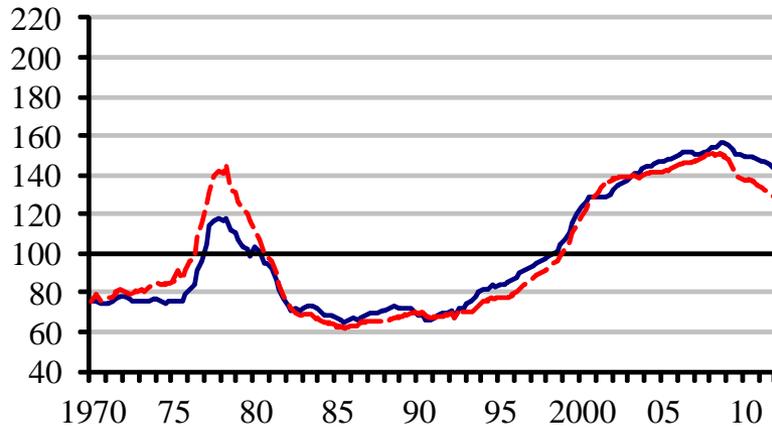
Australia



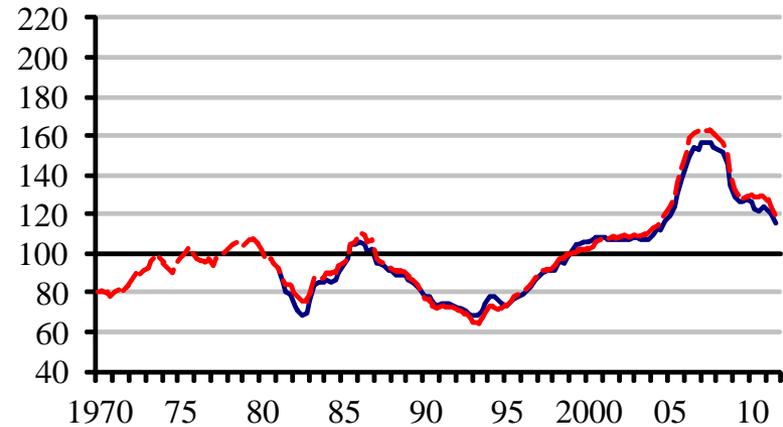
Spain



Netherlands



Denmark



Asset-pricing model

Poterba (1984)

$$P = R / (i_a + \tau + f - \pi)$$

P = House prices

R = Rents

i_a = After tax mortgage rate

τ = Property tax rate

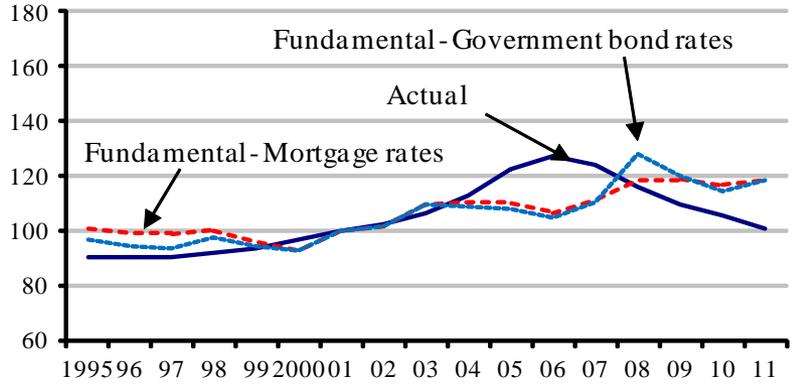
f = Recurring holding costs

π = Expected capital gains

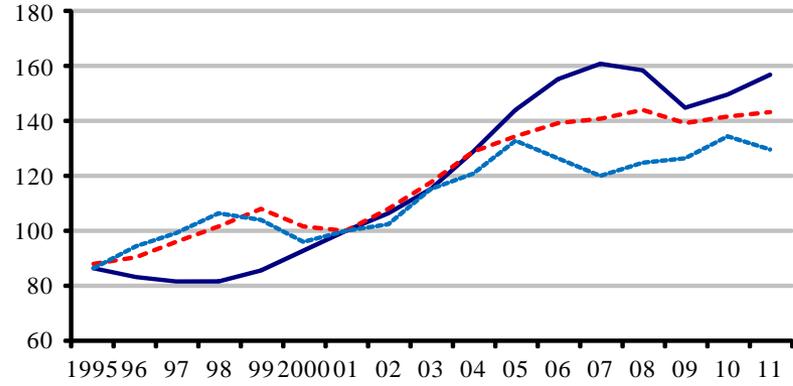
Actual and fundamental price-rent ratios

Long-term average = 100

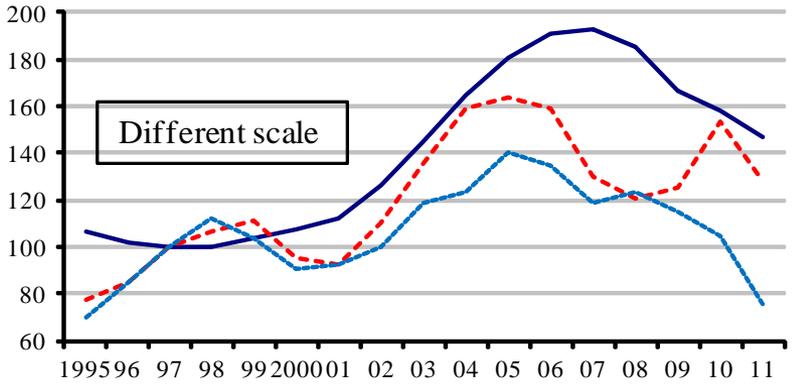
United States



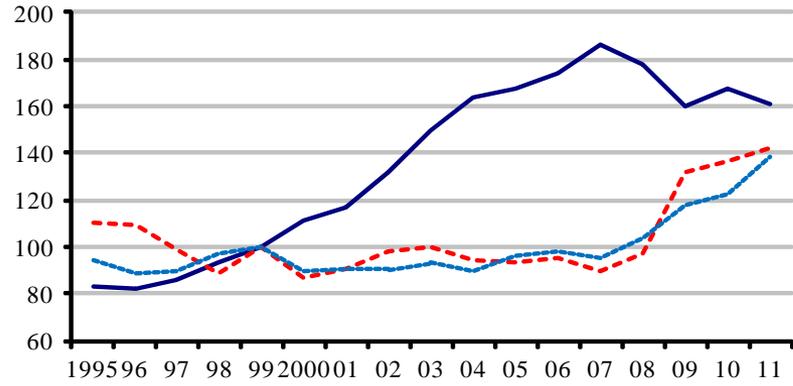
France



Spain



United Kingdom



Drivers of supply and demand

Drivers of demand

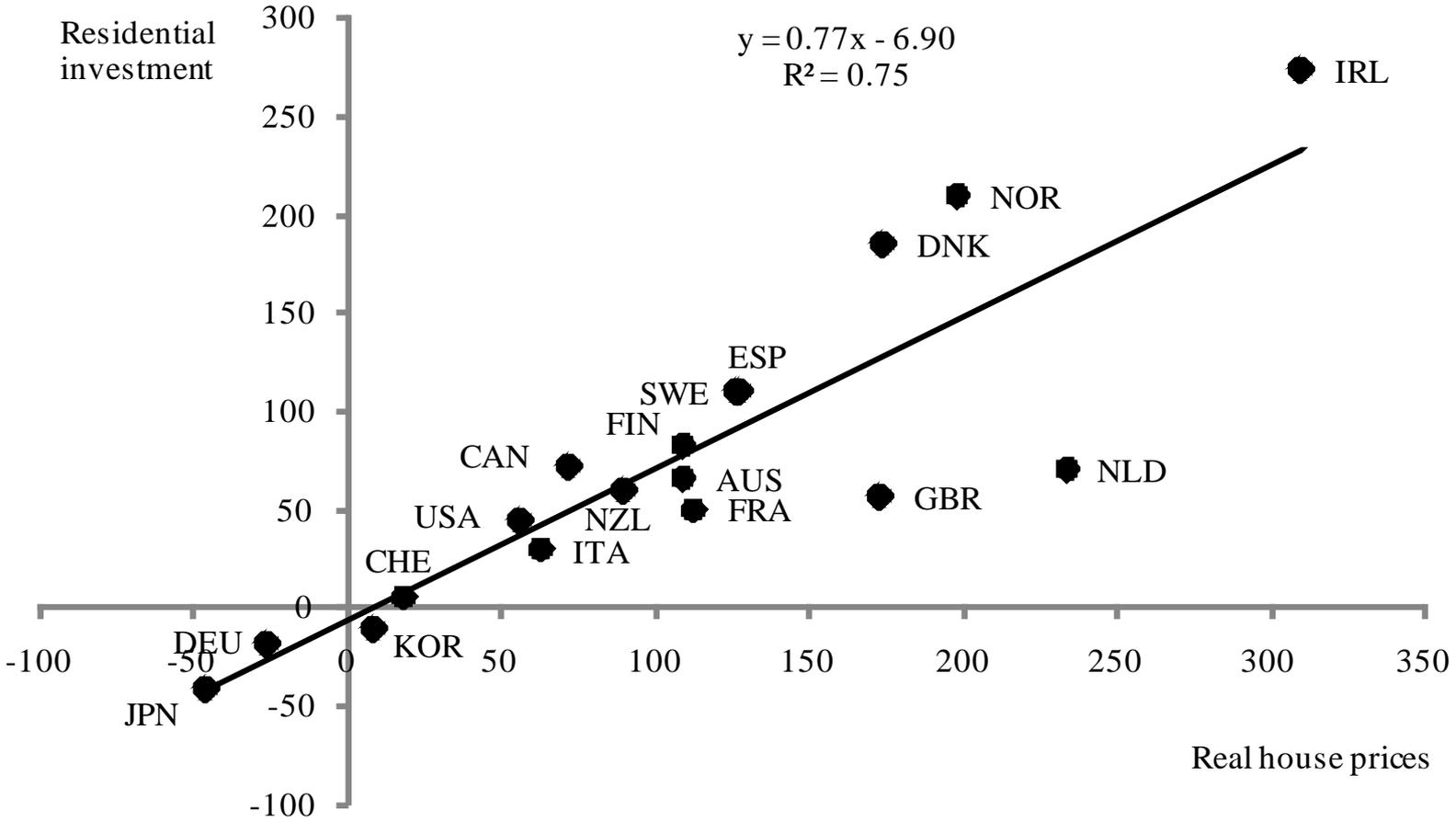
- Household real disposable income
- Interest rates
- Mortgage market sophistication >>>>
- Demographics
- Demand by non-residents
- Price expectations

Drivers of supply

- **Profitability : House prices compared to production costs**
- **Expectations of future house prices**
- **Physical limitations to increasing supply**
- **Land-use and building regulations**

Real house prices and residential investment

Percentage change over the latest cyclical expansion

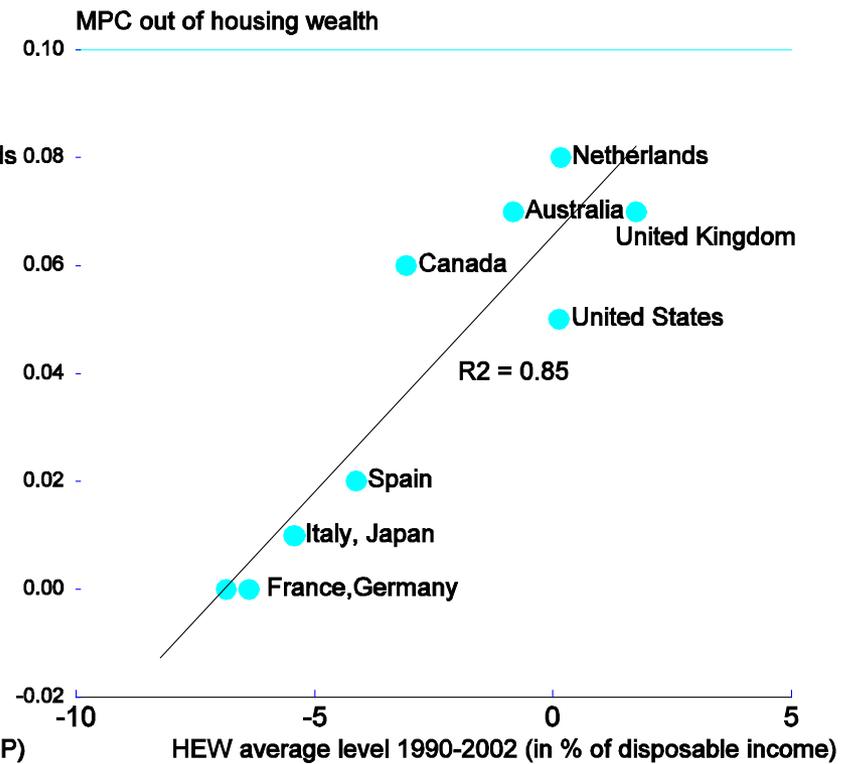
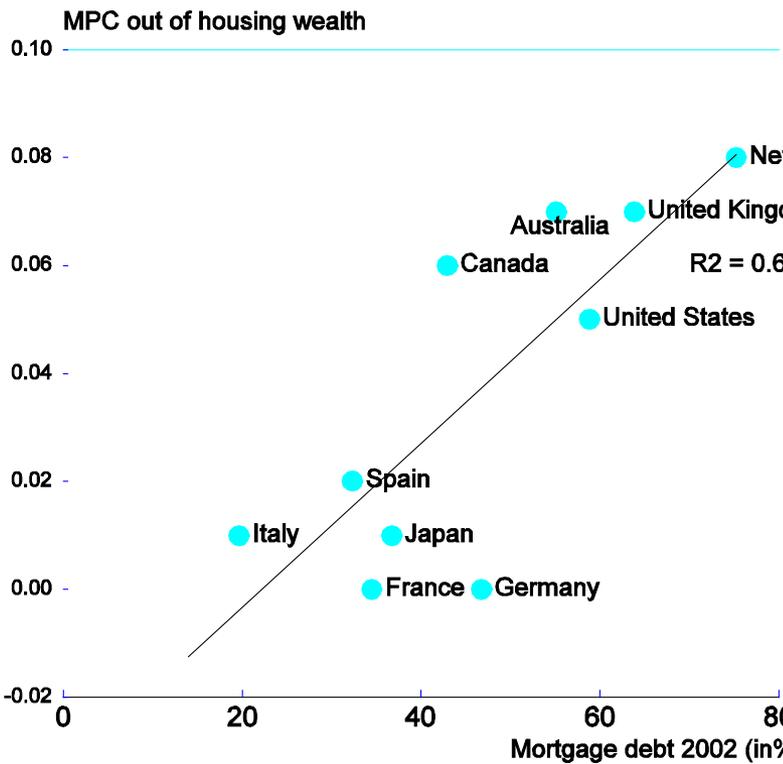


Housing and the wider economy

Marginal propensity to consume housing wealth and mortgage market indicators

A : Mortgage debt ratios

B : Housing equity withdrawal

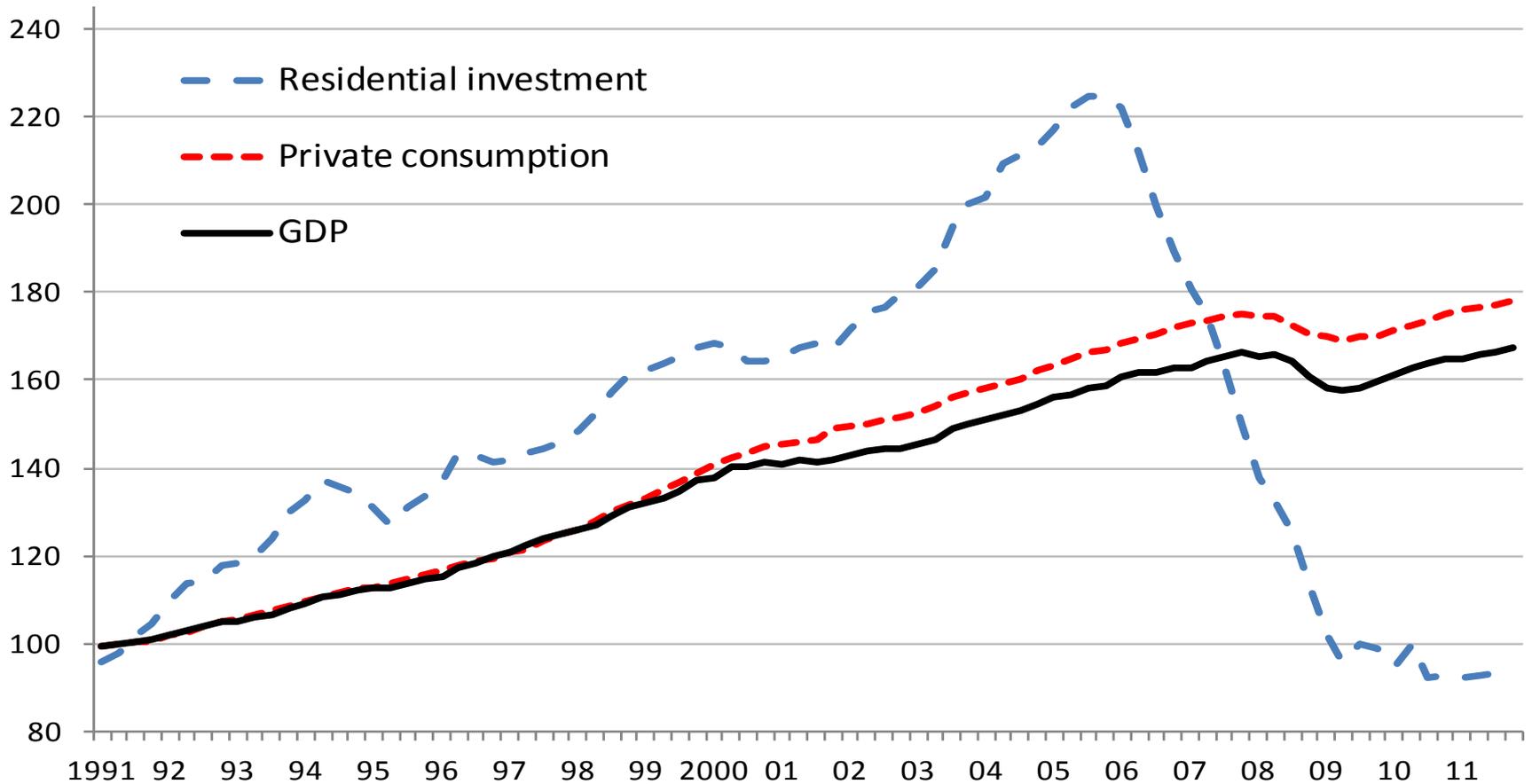


Note : MPC is for marginal propensity to consume; HEW is for housing equity withdrawal.

Source: OECD Economics Department working paper, No 394 (2004).

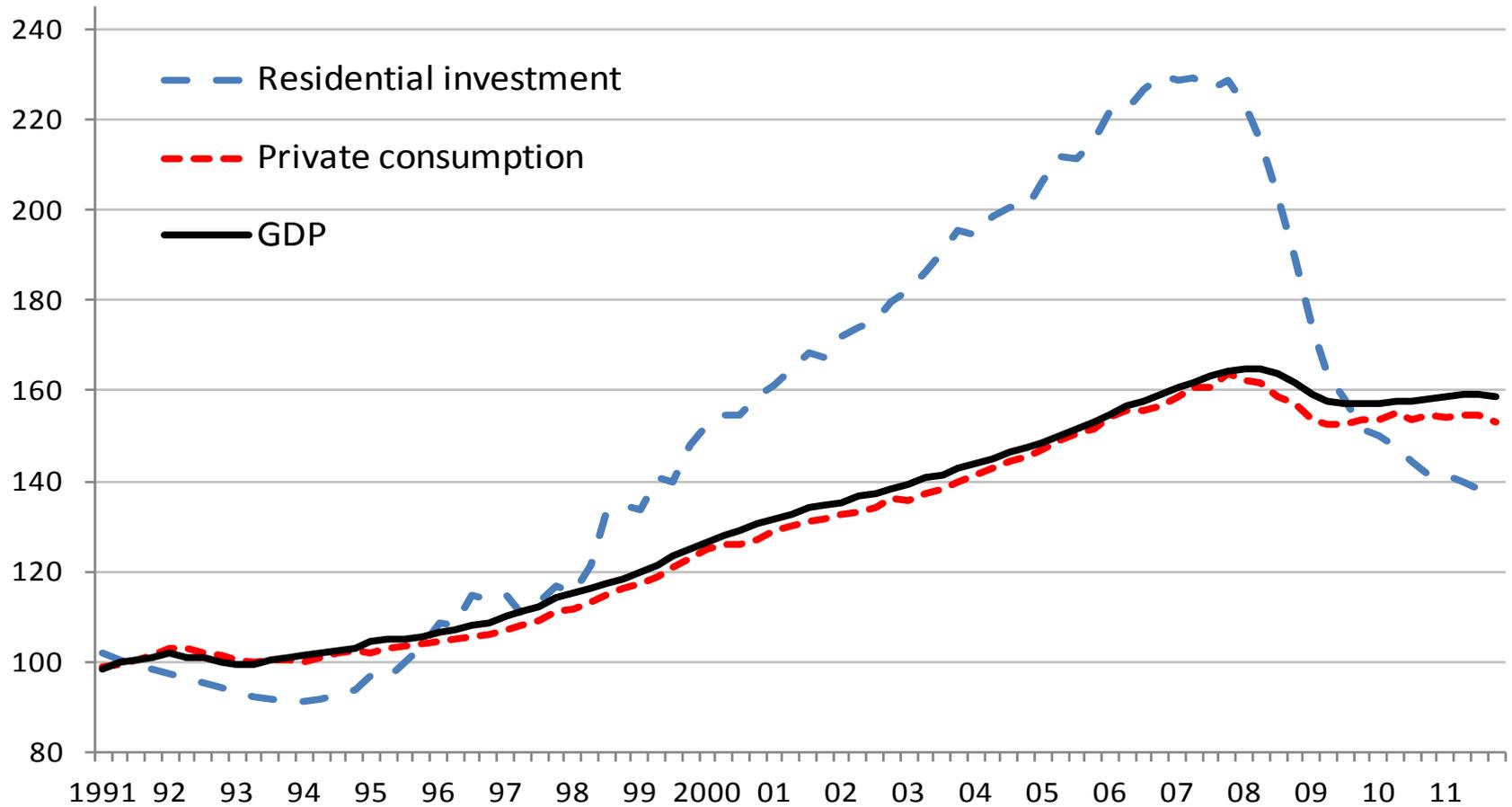
Residential investment and private consumption - United States

Volume indices, 1991=100



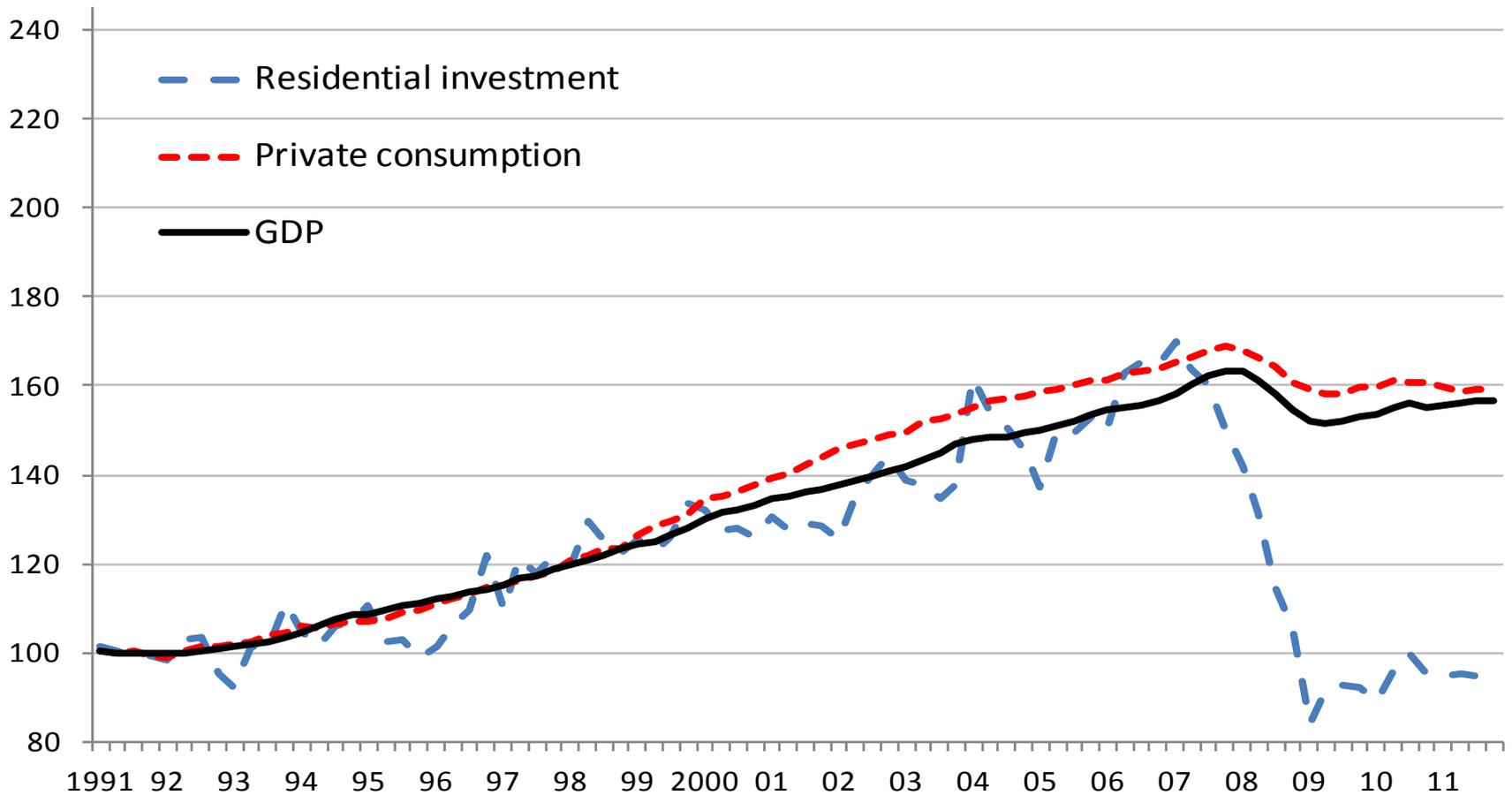
Residential investment and private consumption – Spain

Volume indices, 1991=100



Residential investment and private consumption – United Kingdom

Volume indices, 1991=100

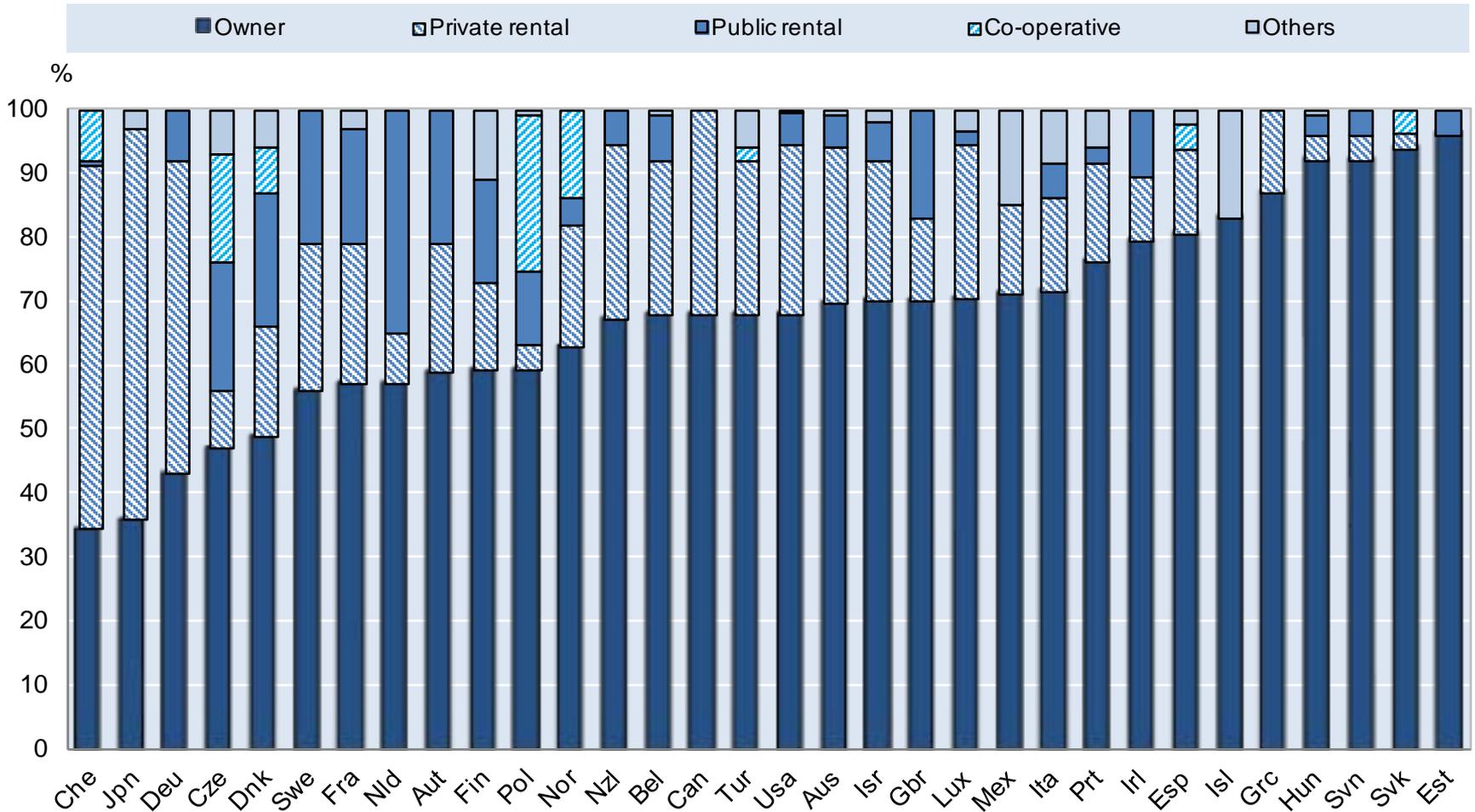


The role of policies

- **Loose monetary policy risks fuelling housing booms >>>>**
- **Regulatory and supervisory failures have often led to housing crises >>>>**
- **Taxation of housing often encourages homeownership and leads to higher debt levels**

Tenure structure across countries

Per cent of dwelling stock



Source: Andrews, Caldera Sánchez and Johansson, "Housing Markets and Structural Policies in OECD countries", *OECD Economics Department Working Papers*, No. 836.

Globalisation and housing

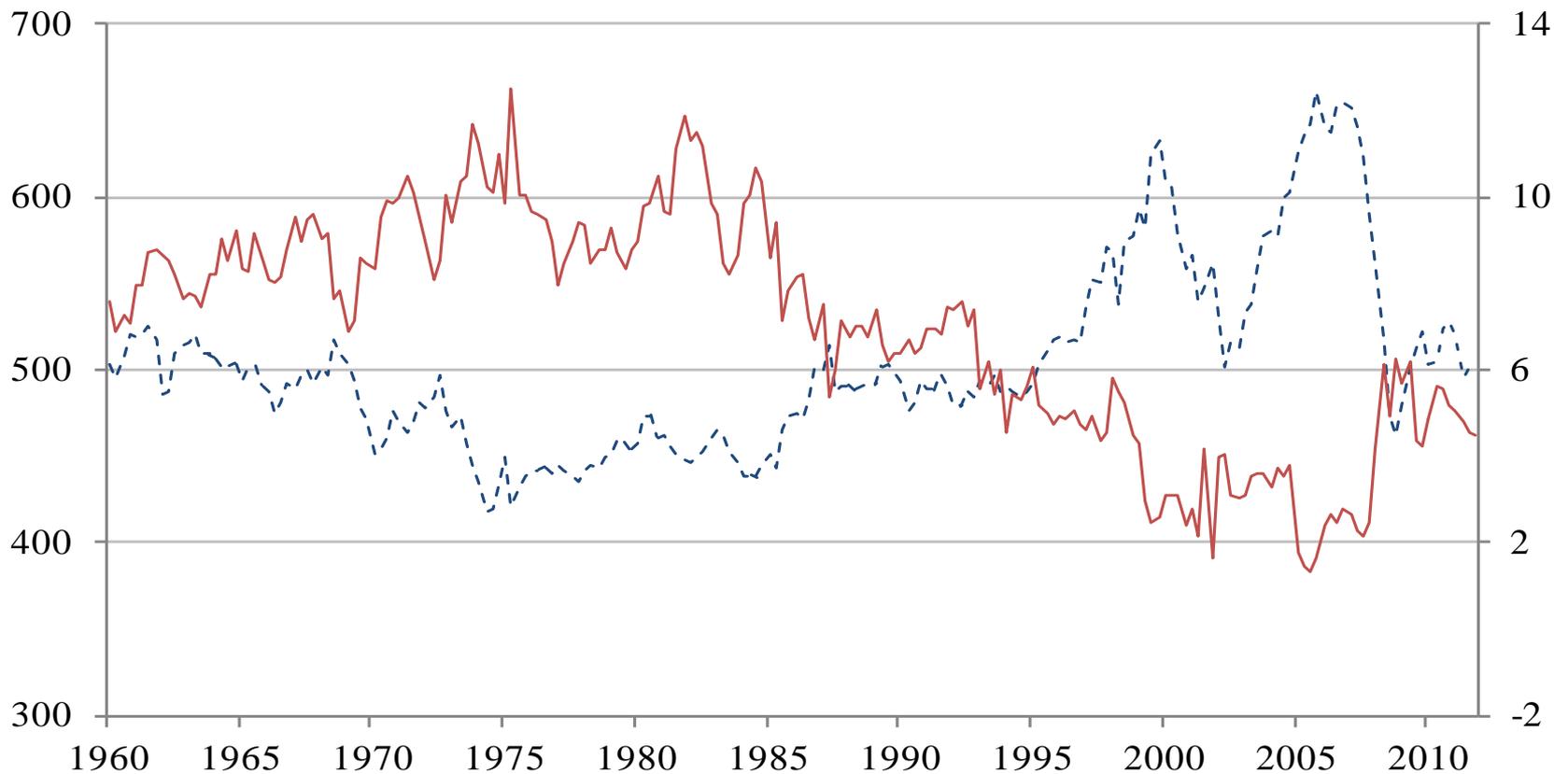
- **Capital inflows associated with trade imbalances have played an important role in fuelling the boom in some countries**
- **The “savings glut” has contributed to keeping long-term interest rates low**

Households wealth and saving in the United States

Per cent of household disposable income

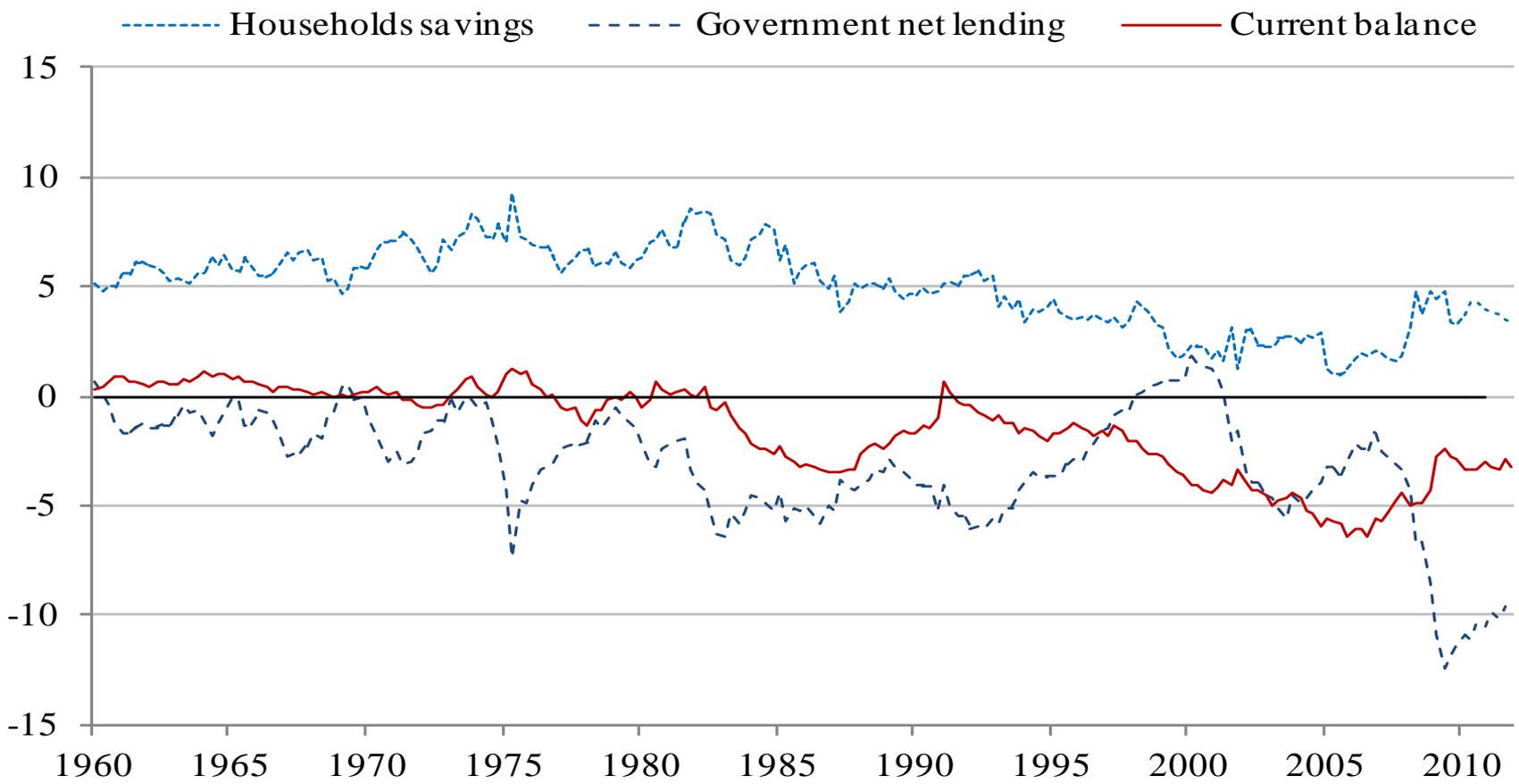
--- Net household wealth (left scale)

— Saving ratio (right scale)

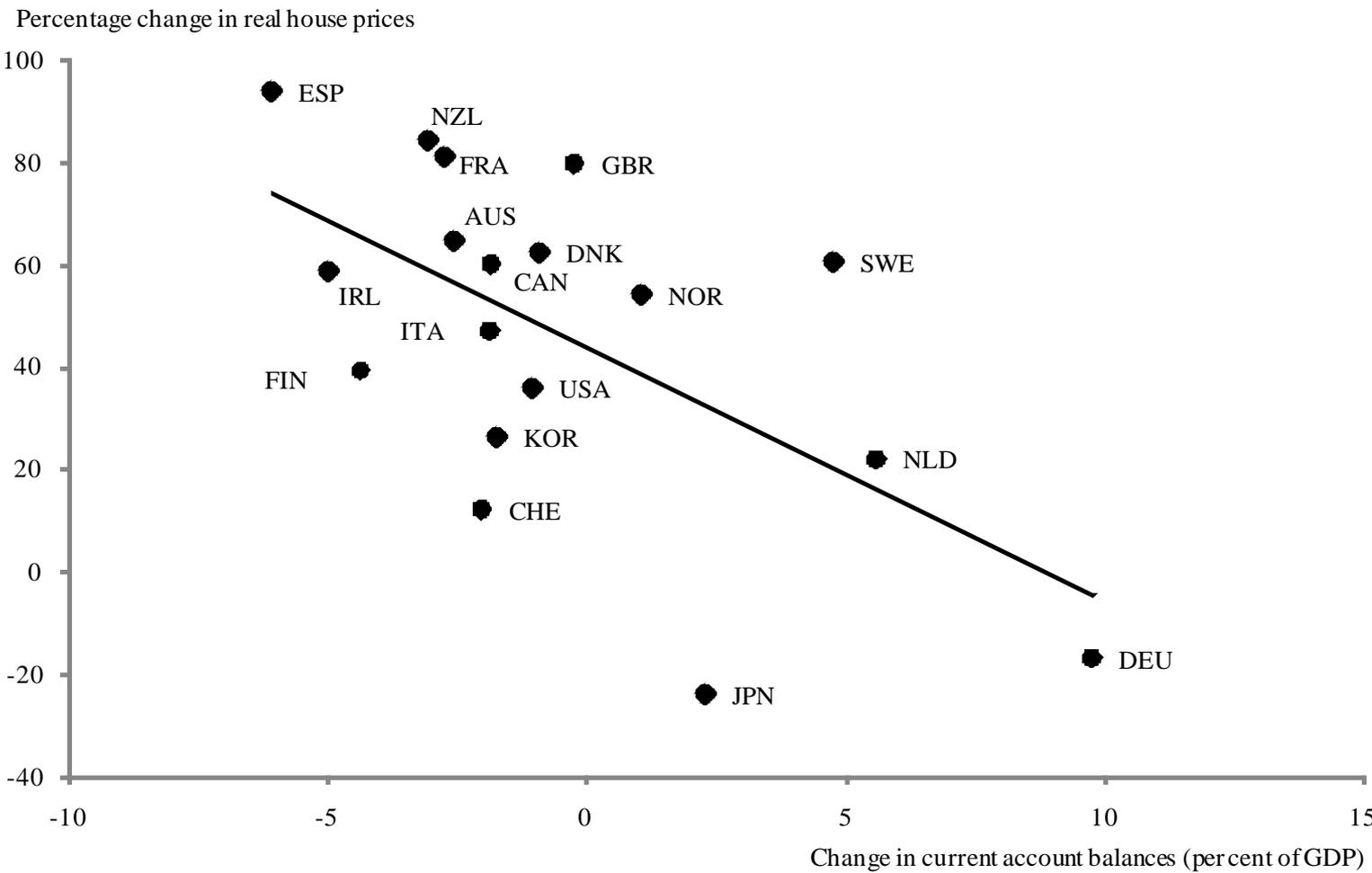


Households saving, government deficit and current account balance – United States

Per cent of GDP



Evolution of real house prices and current account balances 2000-2007



Conclusions

- Low interest rates and mortgage market innovations have been the main drivers of the latest housing expansion, at least initially
- After 2003-04, house prices and construction activity seem to have overshot in many countries
- Global imbalances have kept long-term interest rates low
- Inadequate financial regulation and supervision have allowed unsustainable developments in housing finance
- Tax systems favouring homeownership have tended to increase instability

Thank you !

Mortgage market sophistication and innovations

- Extension of loan terms
- Interest-only loans / Flexible repayment loans
- Increased reliance on adjustable-rates
- Higher loan-to-value ratios
- Housing equity withdrawal
- Subprime loans
- Securitisation

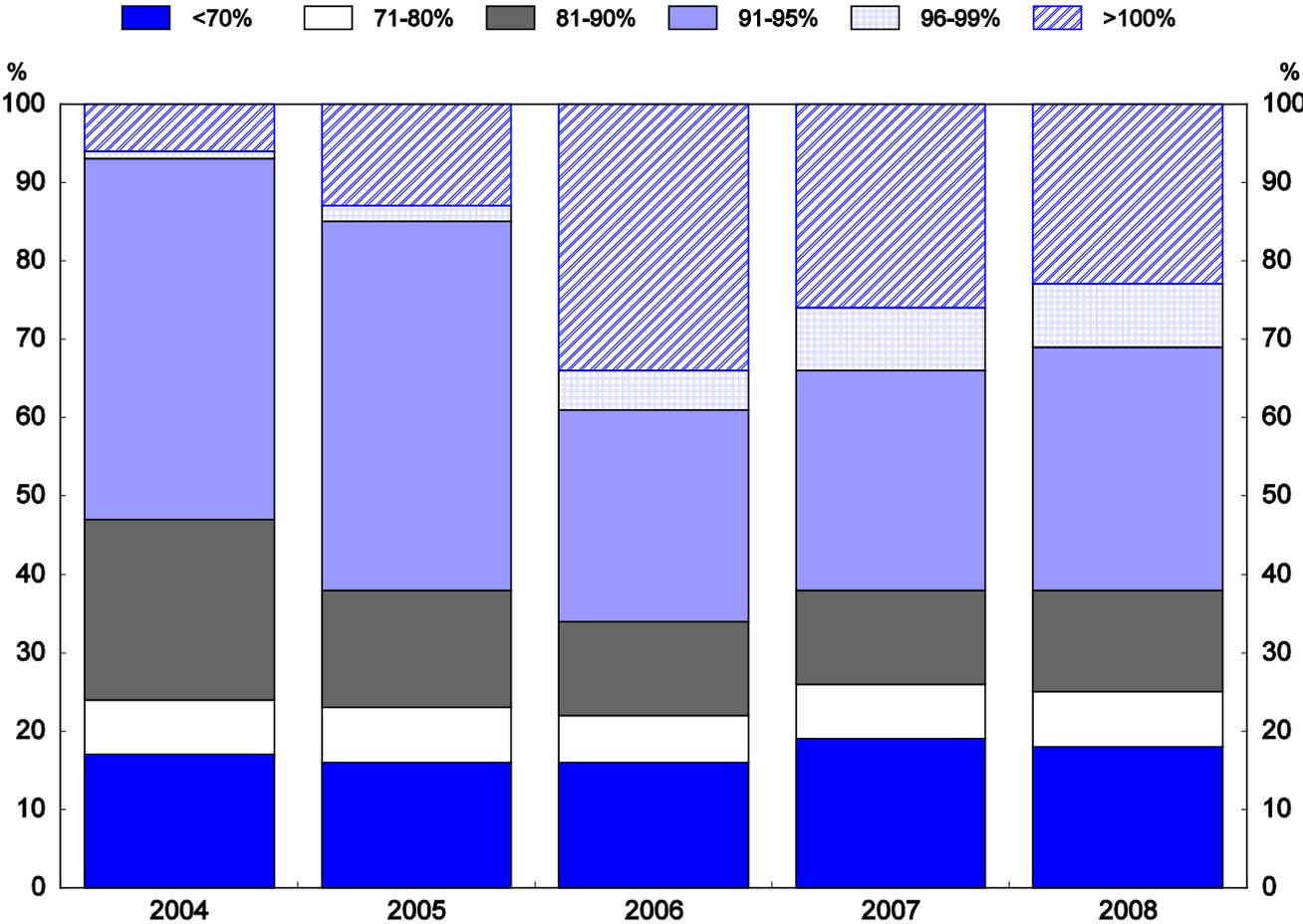
Risky lending in the UK

Share of all regulated mortgage sales represented by high-risk products in 2007

- **49% Non-income verified**
- **32% Interest-only**
- **28% Loan-to-income ratios of 3.5 or over**
- **14% Loan-to-value ratios of 90% or over**
- **4% To individuals with impaired credit history**

Source: FSA

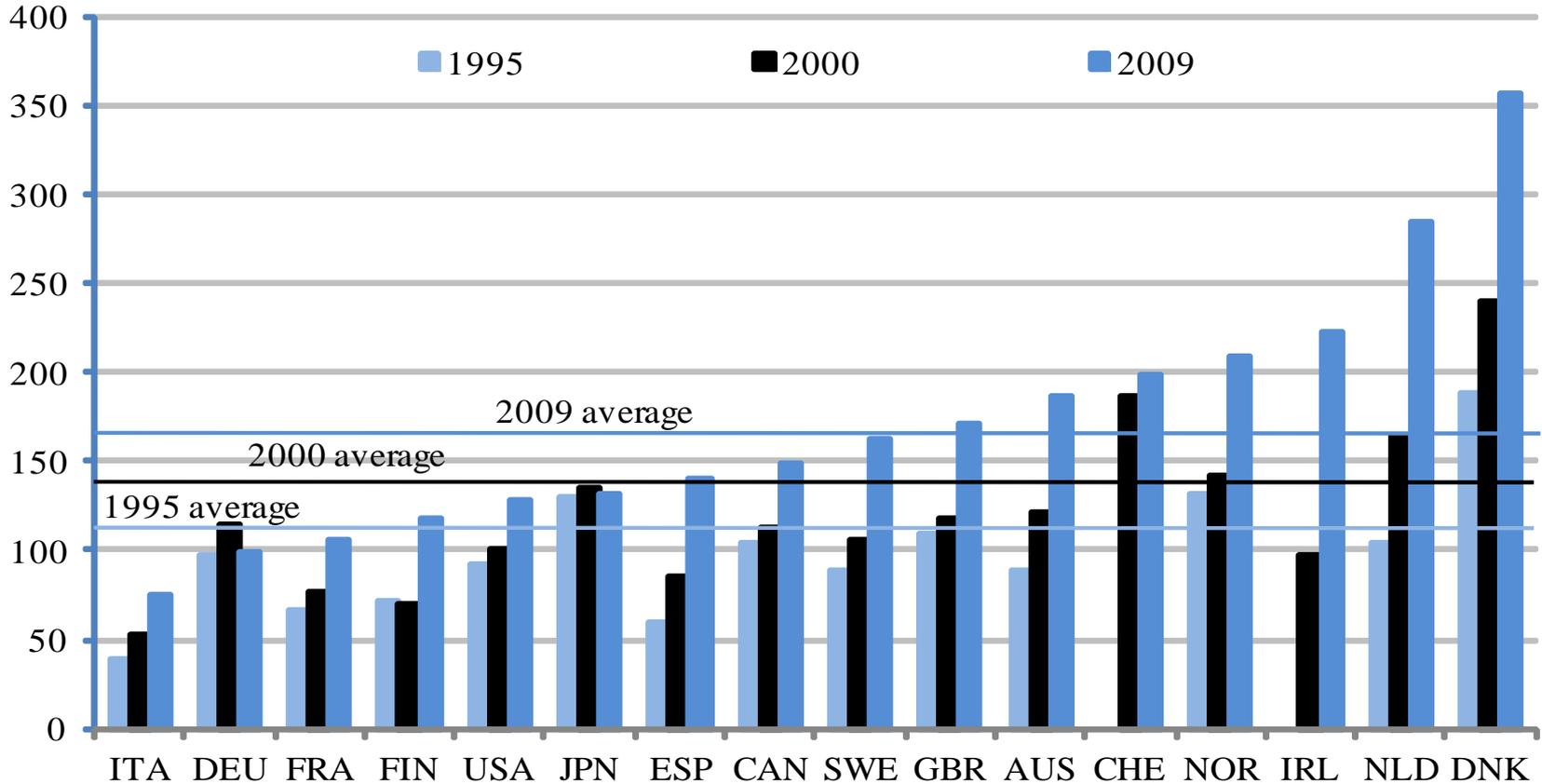
Loan to value ratios for housing of first time buyers in Ireland



Source: Department of environment, Heritage and Local Government.

Household debt

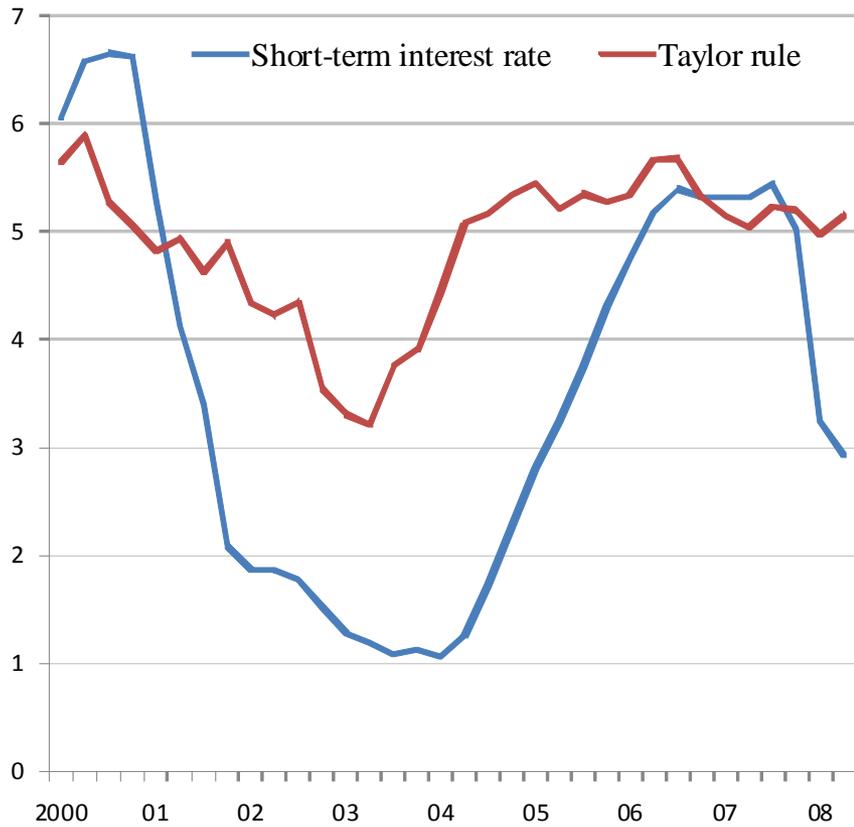
Per cent of disposable income



Policy rates and Taylor rule

United States

Per cent

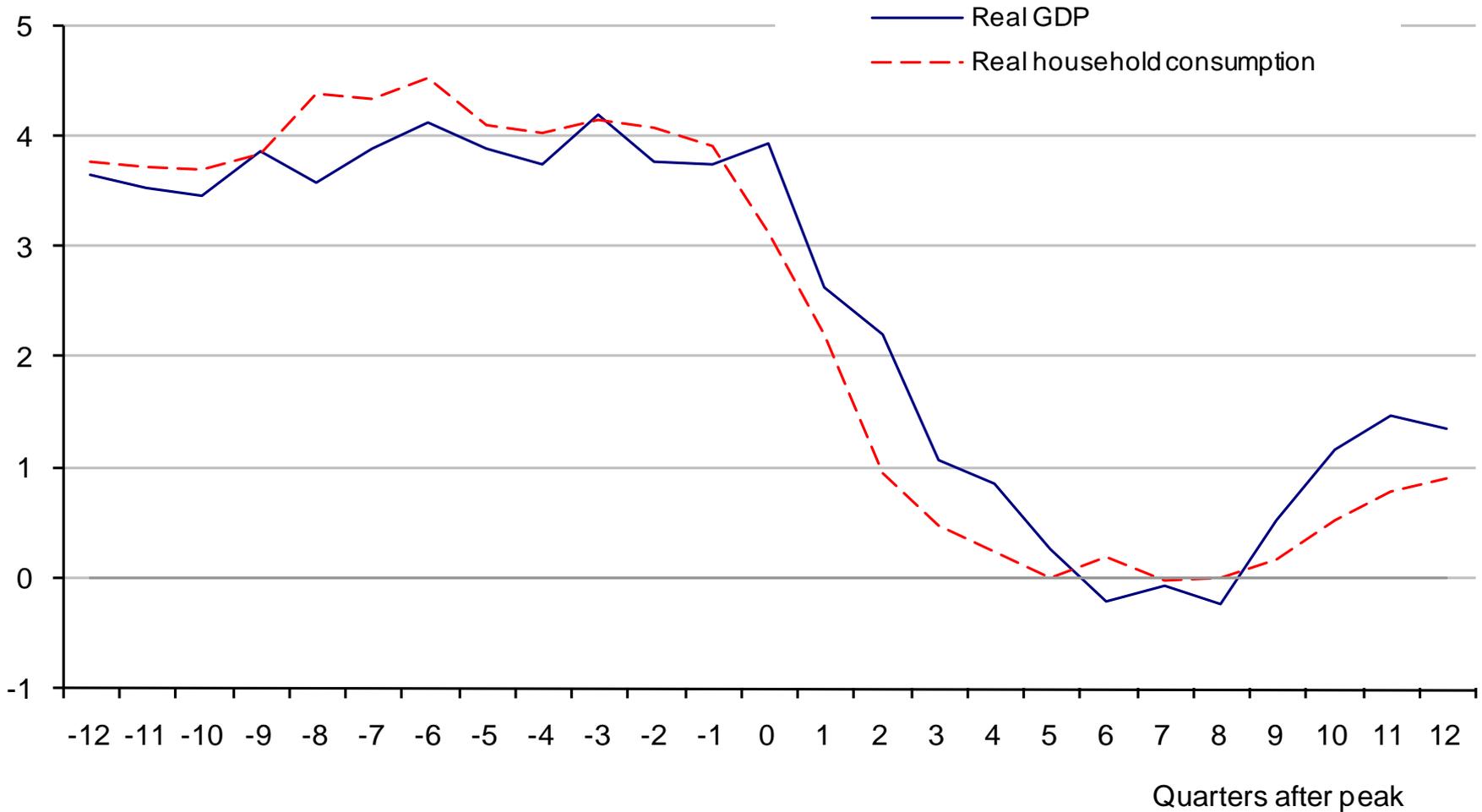


Euro area

Per cent



Real GDP and consumption during housing downturns



Regulatory and supervisory failures

- “Shadow” banking system
- Excessive leverage
- Pro-cyclicality
- Opaque securities and risk management failures
- Conflict of interest in rating agencies
- Poor underwriting standards for mortgages
- Insufficient attention to liquidity