

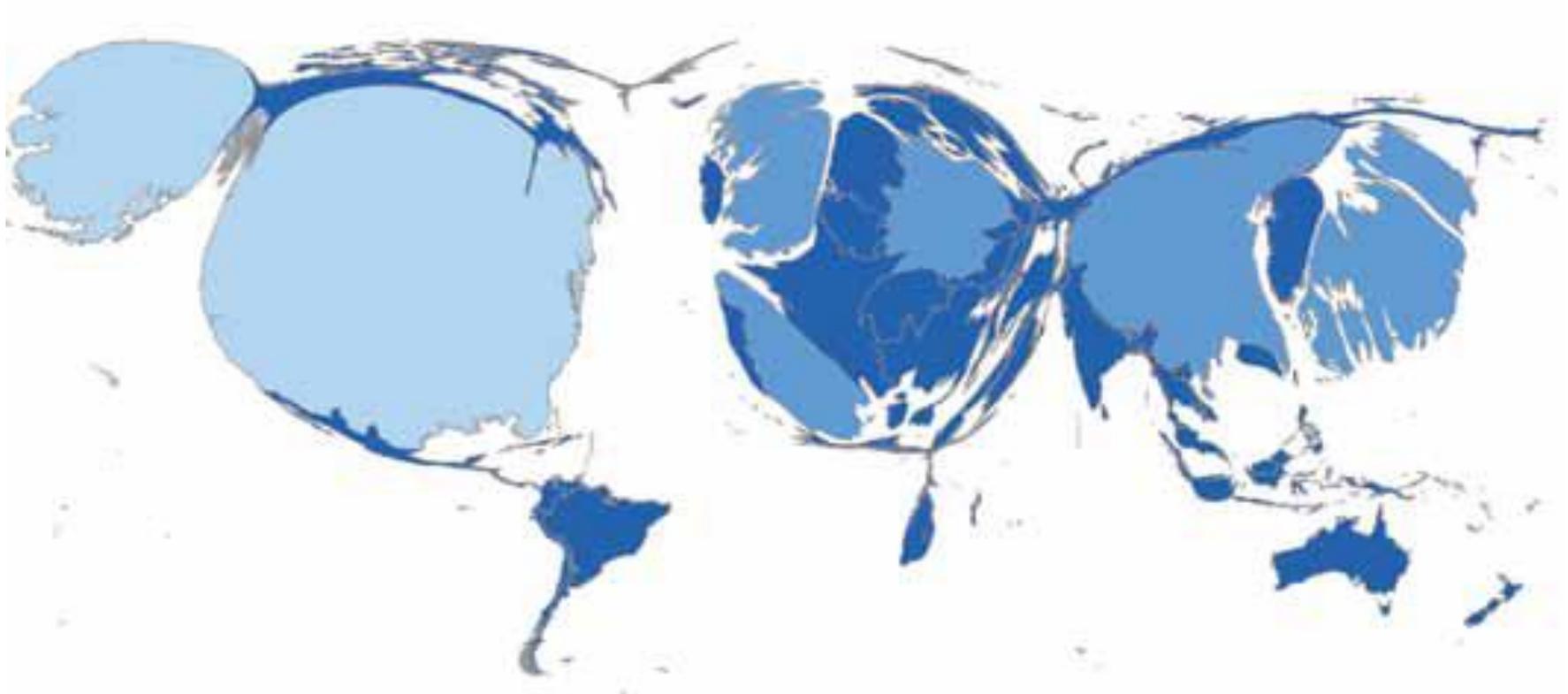
Are banks public utilities?

Philip Molyneux
Bangor University

A decorative graphic consisting of several horizontal lines of varying lengths and colors (teal, light blue, white) extending from the right side of the slide towards the center.

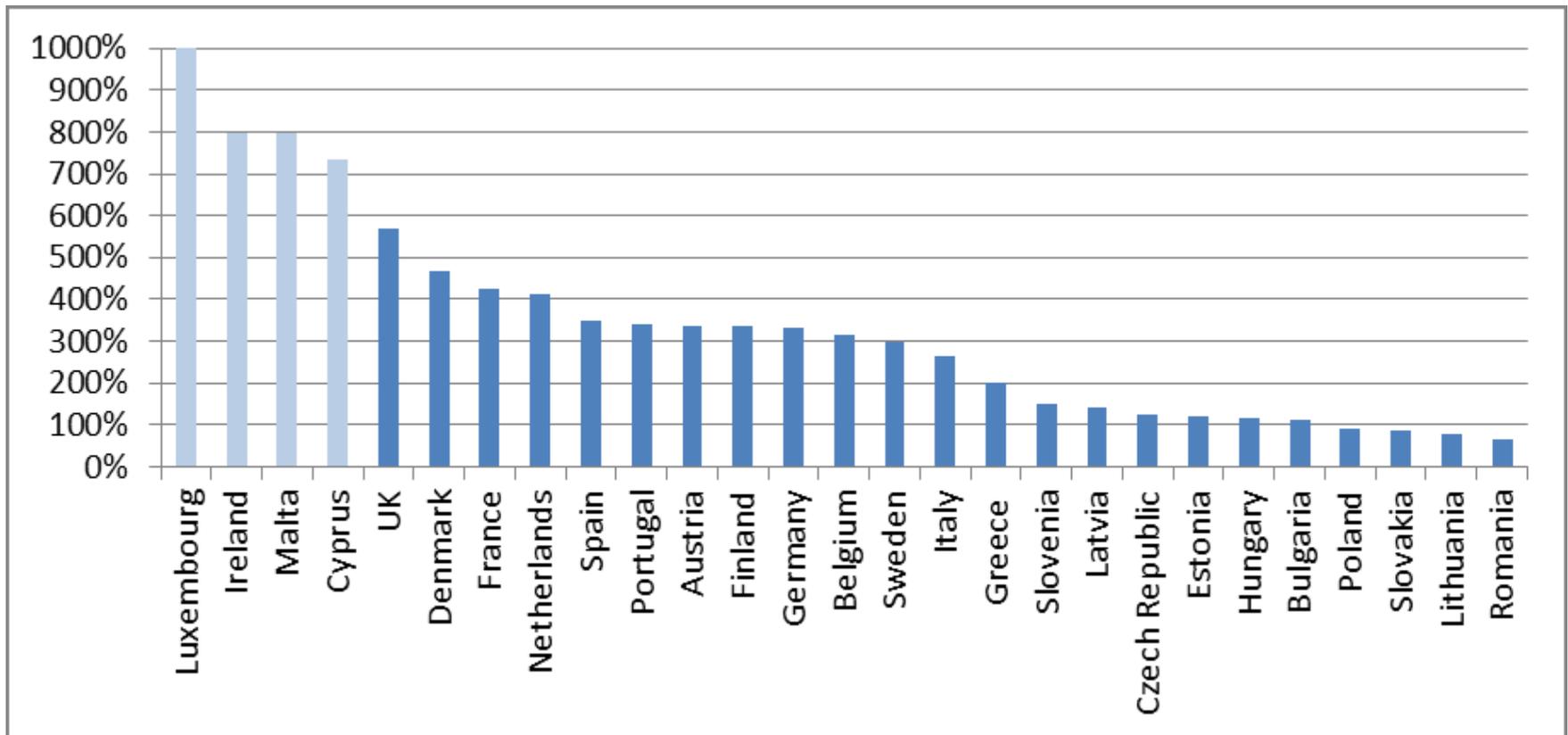
Banking is a weird world

Country sizes are adjusted to reflect the volume of financial sector assets in the jurisdiction, measured in U.S. dollars at the end of 2010



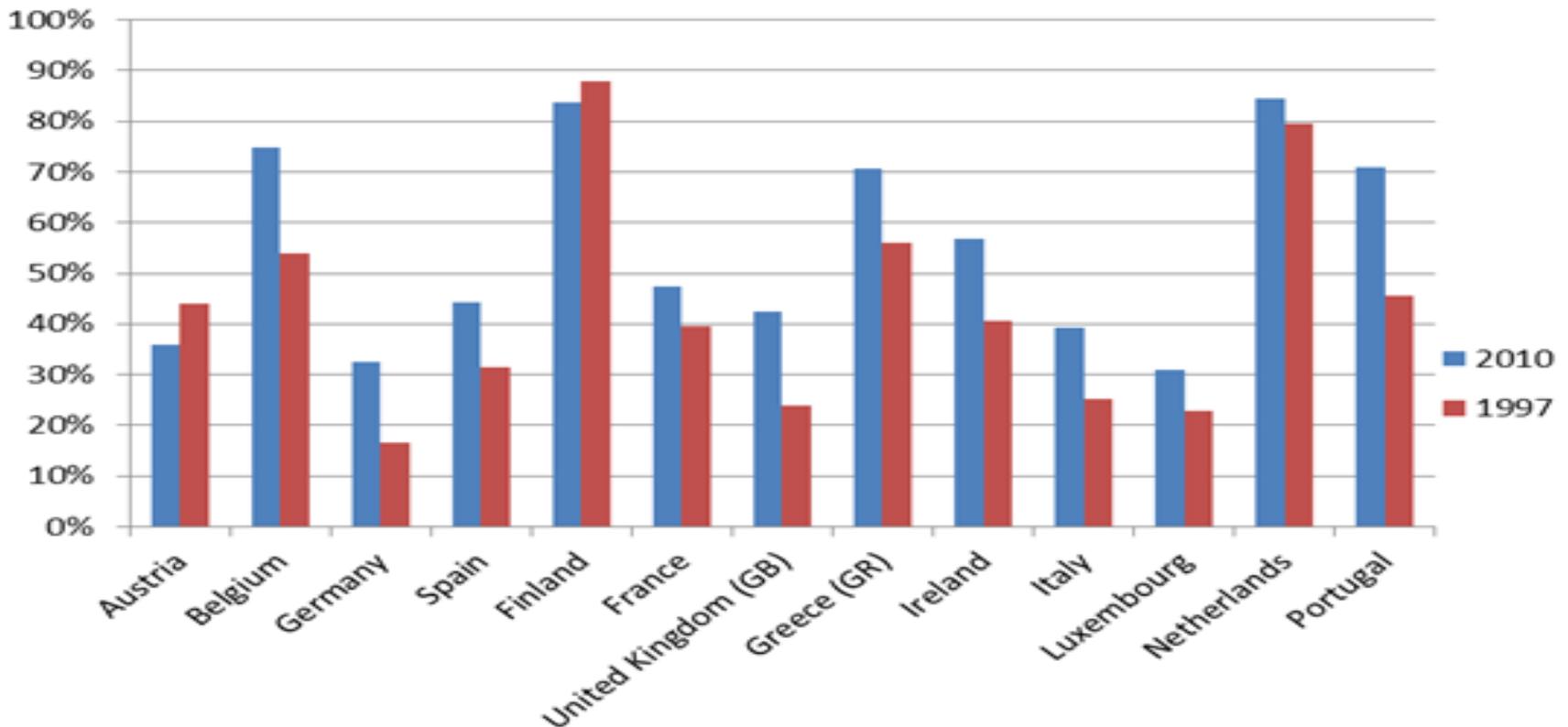
Source: World Bank's Global Financial Development Report (2013) Fig 1.6, p35

Banking systems are big relative to country size (%GDP).....



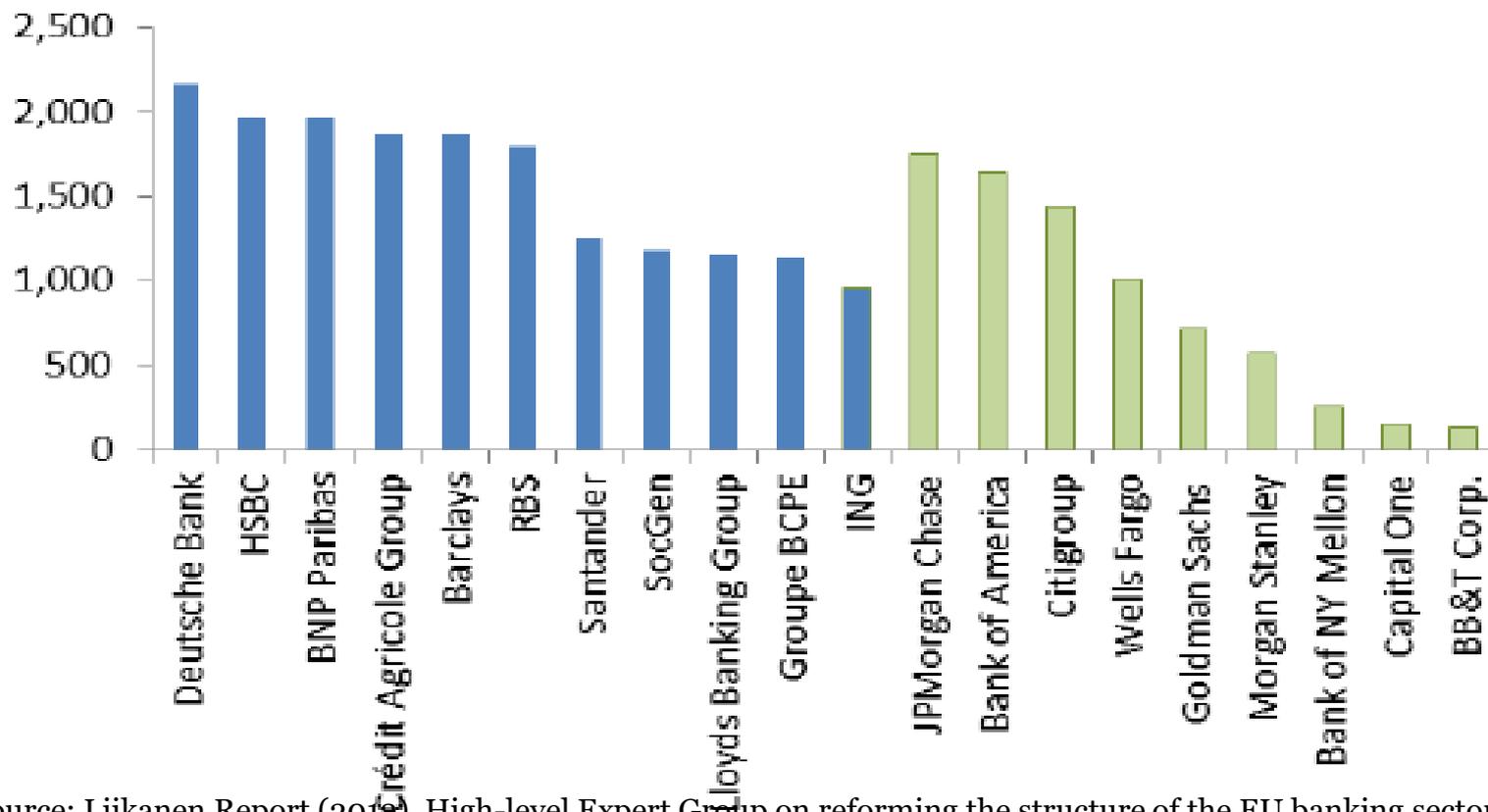
Source: Liikanen Report (2012) High-level Expert Group on reforming the structure of the EU banking sector Chaired by Erkki Liikanen, FINAL REPORT Brussels, 2 October 2012 , p

.....and biggest banks are typically getting bigger!



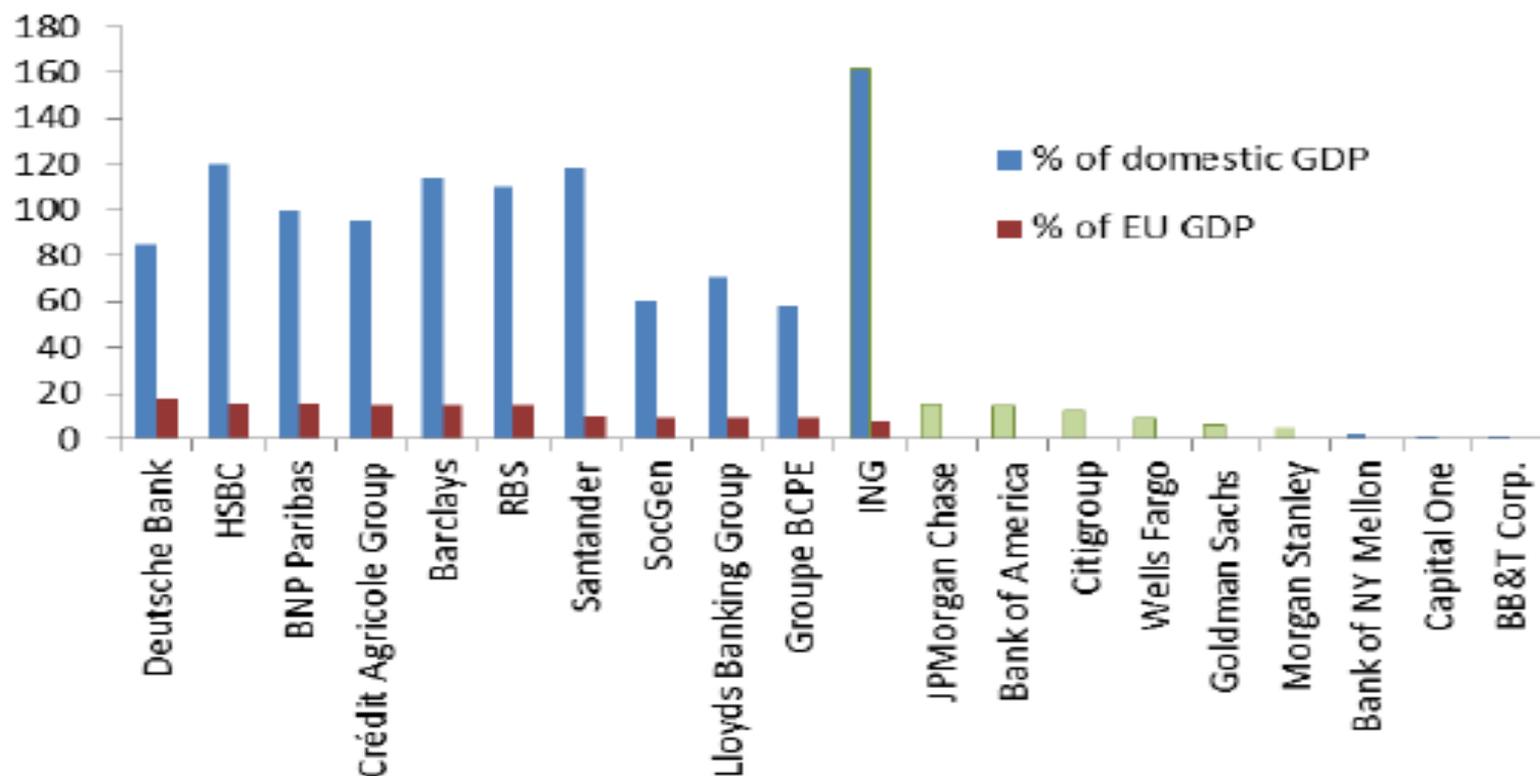
Source: Liikanen Report (2012) High-level Expert Group on reforming the structure of the EU banking sector Chaired by Erkki Liikanen, FINAL REPORT Brussels, 2 October 2012 , p 18.

Big banks in Europe & U.S are roughly the same size € billion (2011)



Source: Liikanen Report (2012) High-level Expert Group on reforming the structure of the EU banking sector Chaired by Erkki Liikanen, FINAL REPORT Brussels, 2 October 2012 , p 40.

...but much bigger relative to the size of individual European economies



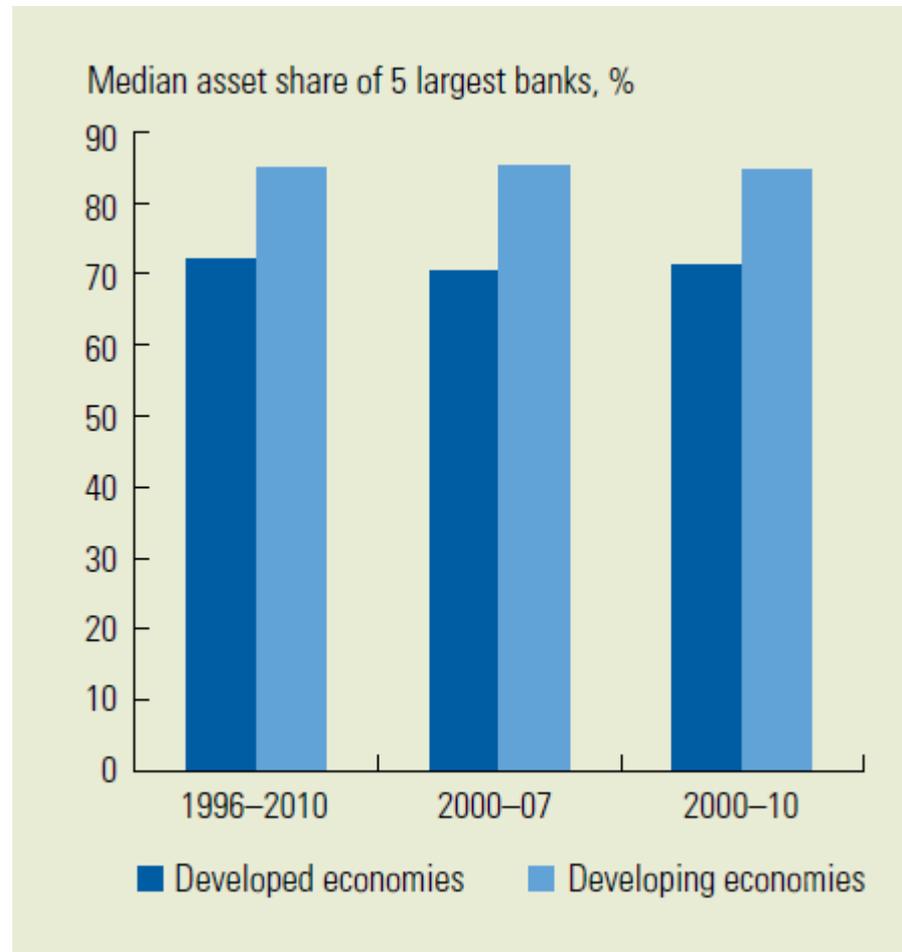
Source: Liikanen Report (2012) High-level Expert Group on reforming the structure of the EU banking sector Chaired by Erkki Liikanen, FINAL REPORT Brussels, 2 October 2012 , p 41.

4 of Europe's top 8 banks are bigger than the economies where they are based

Bank	Country	Total assets (€ million)	Total assets/ national GDP (%)	Total assets/ EU GDP (%)	FTE employees 2011	No. of European branches	Δ in total assets (% change 2007-11)
Deutsche Bank*	DE	2,164,103	84.8	17.4	100,996	2,735	12.4
HSBC*	UK	1,967,796	119.8	15.8	288,316	1,984	22.2
BNP Paribas*	FR	1,965,283	99.8	15.8	198,423	6,816	16.0
Crédit Agricole Group*	FR	1,879,536	95.4	15.1	162,090	9,924	22.0
Barclays*	UK	1,871,469	113.9	15.0	141,100	2,602	12.0
RBS*	UK	1,803,649	109.8	14.5	146,800	2,477	-28.0
Santander*	ES	1,251,525	118.2	10.1	193,349	7,467	37.1
Société Générale*	FR	1,181,372	60.0	9.5	159,616	6,456	10.2
Lloyds Banking Group*	UK	1,161,698	70.7	9.3	98,538	2,956	141.5

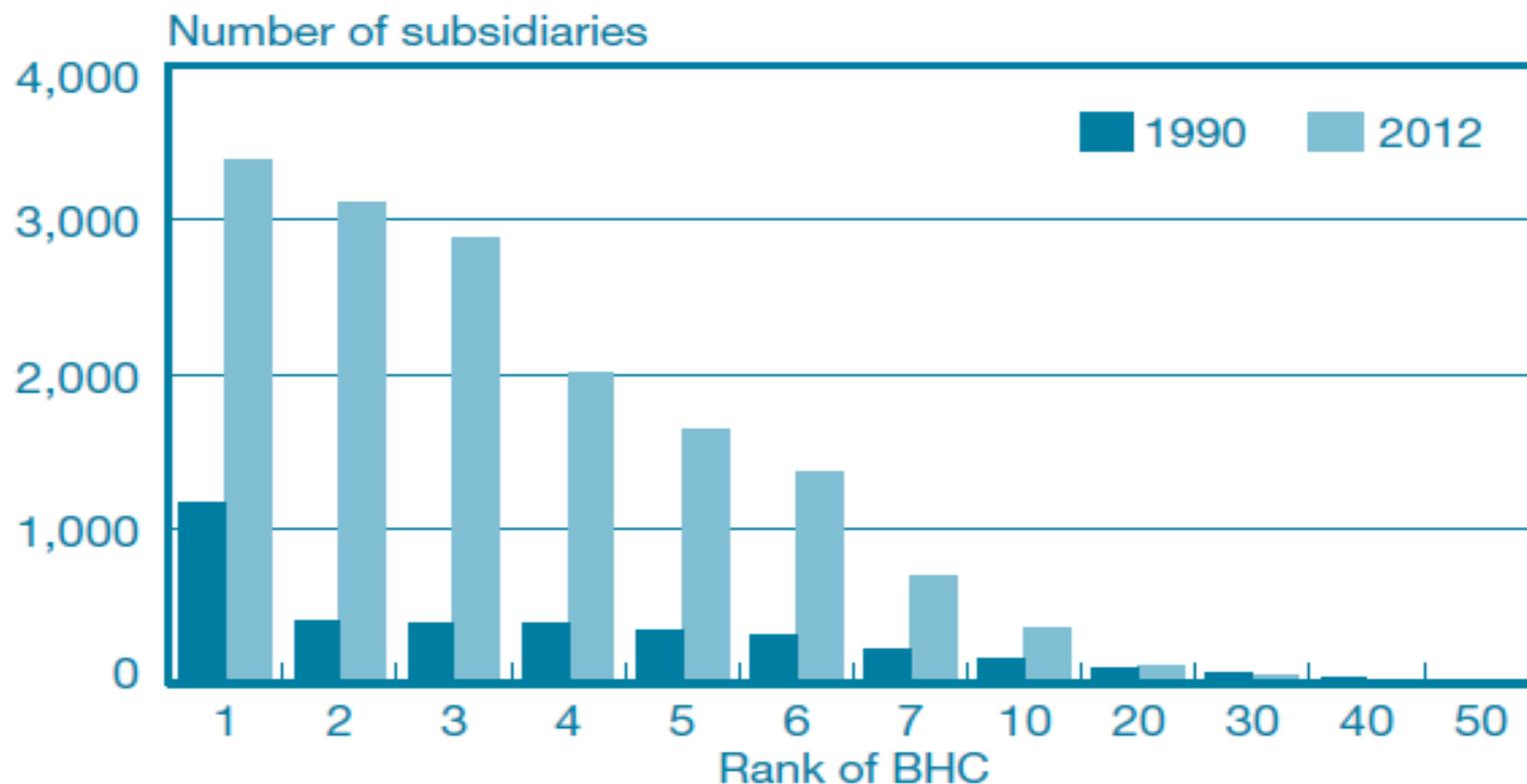
Source: Liikanen Report (2012) High-level Expert Group on reforming the structure of the EU banking sector Chaired by Erkki Liikanen, FINAL REPORT Brussels, 2 October 2012 , p 39.

Same trends in developed and developing world



Source: World Bank's Global Financial Development Report (2013) Fig 3.1, p86

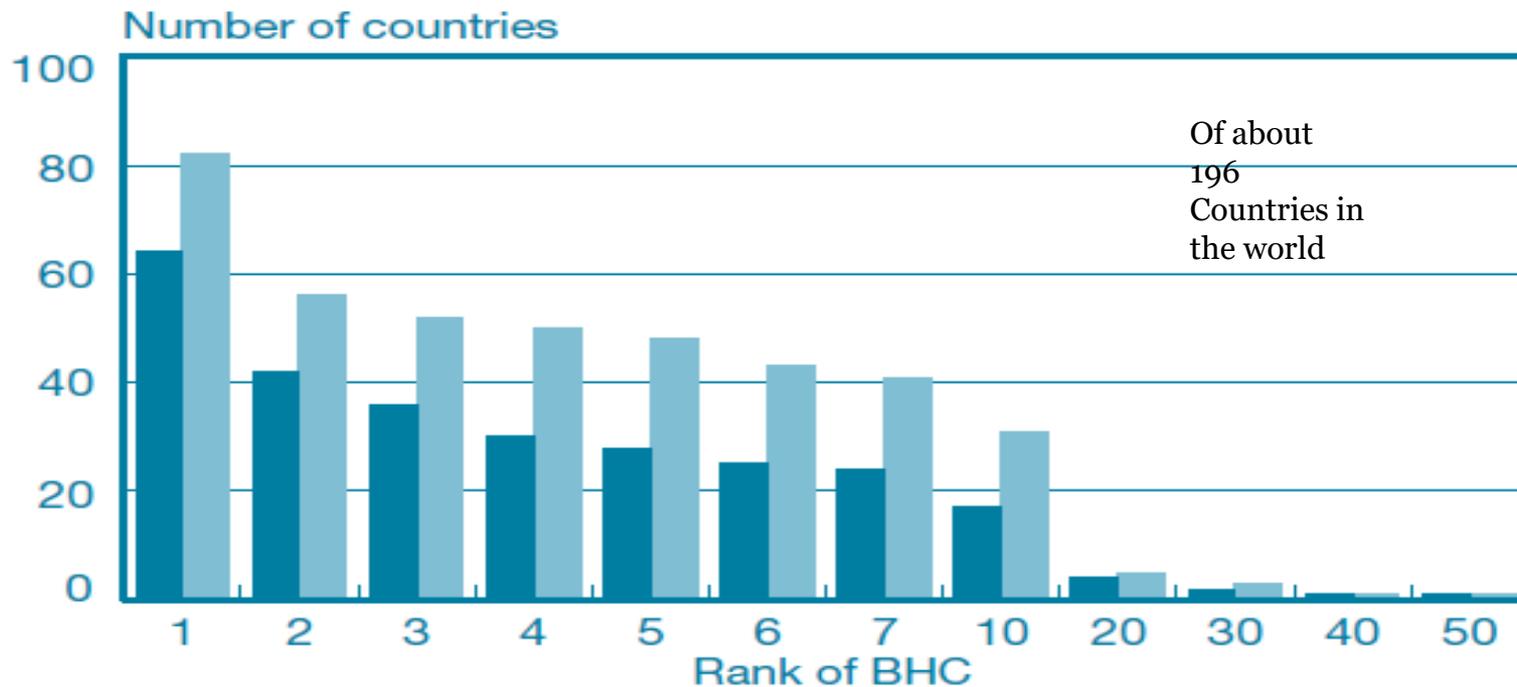
They are becoming more complex.....



Data for Feb 2012 and Dec 1990. US Bank Holding Companies

Source: Avraham, D. Selvaggi, P and J. Vickery (2012), A Structural View of U.S. Bank Holding Companies, Federal Reserve Bank of New York Economic Policy Review, July, p66

.....operating across more countries

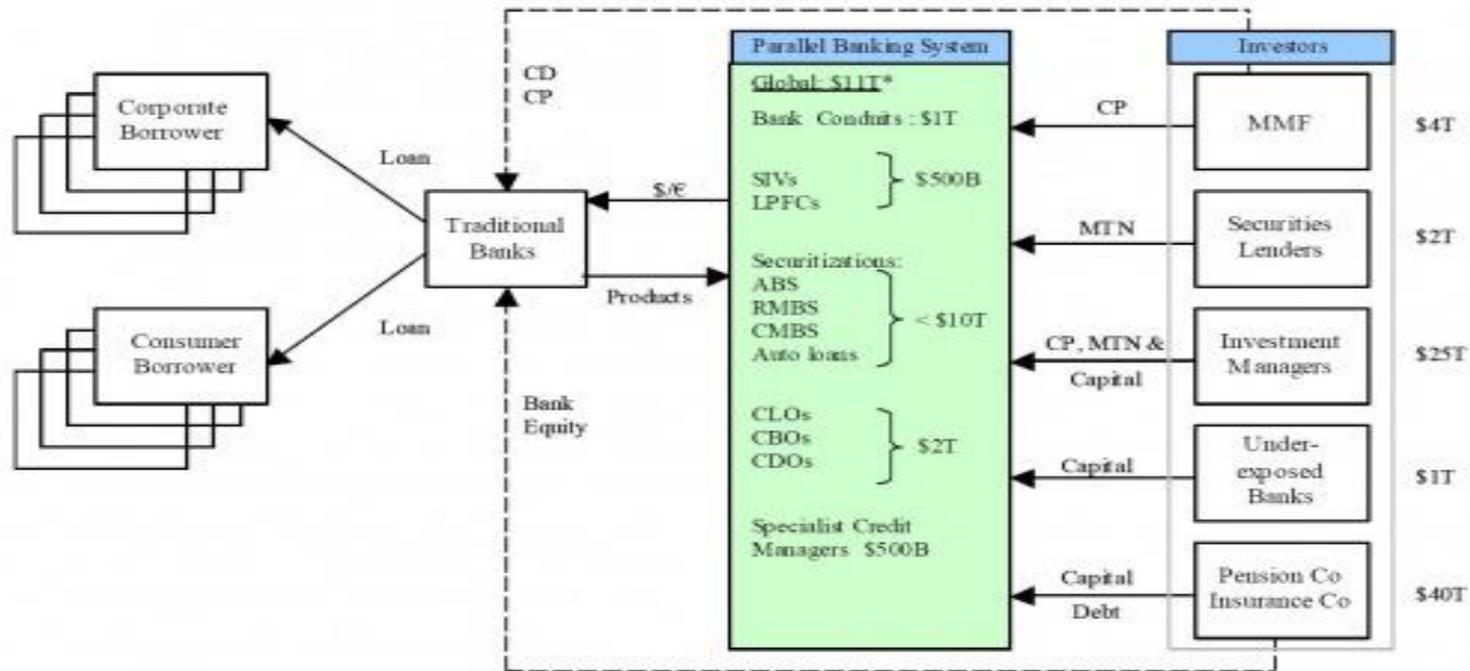


Data for Feb 2012 and Dec 1990. US Bank Holding Companies

Source: Avraham, D. Selvaggi, P and J. Vickery (2012), A Structural View of U.S. Bank Holding Companies, Federal Reserve Bank of New York Economic Policy Review, July, p66

...and dealing with Shadow Banks via securitisation, SPVs and the like

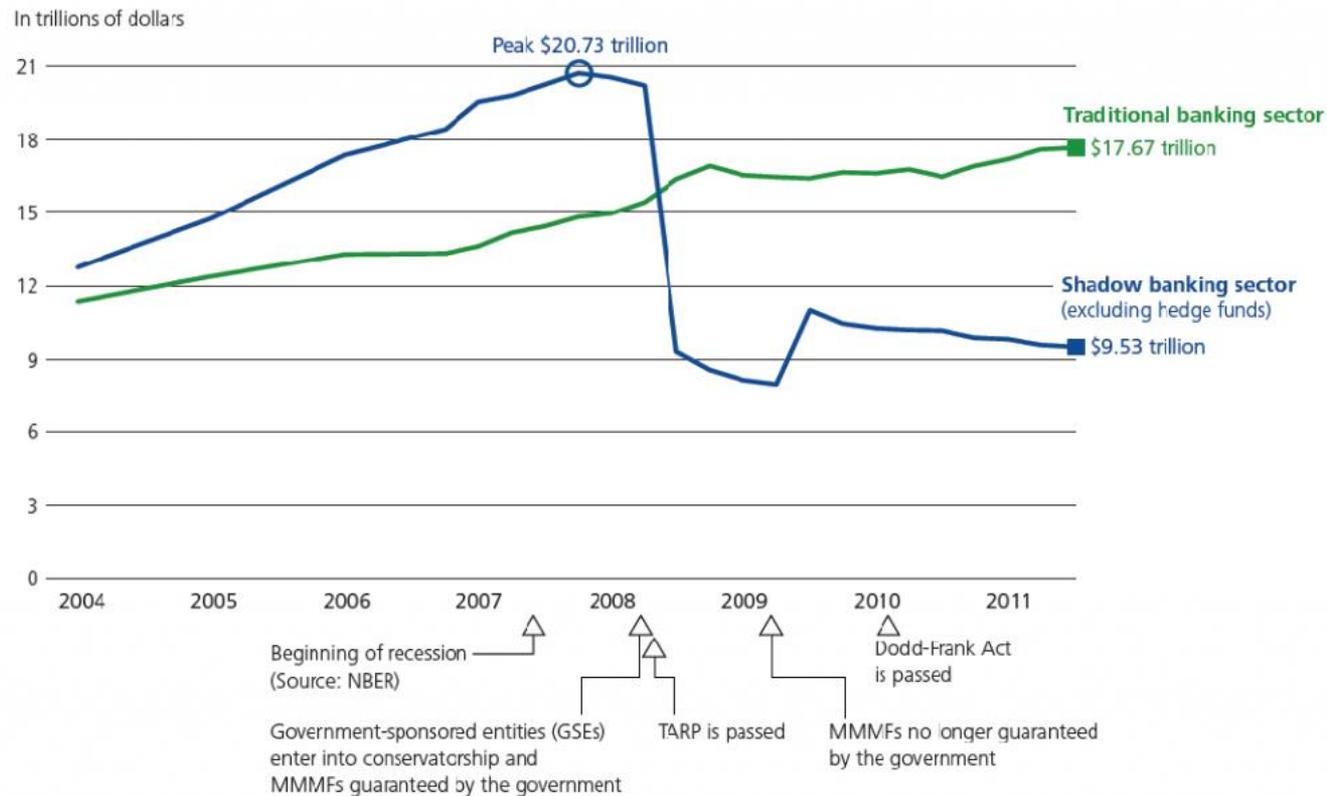
Traditional Banking Funding via the Parallel Banking System (pre-Crisis numbers)



Source: Gordian Knot.

...which is a large market.....

U.S. shadow banking and traditional banking have diverged since 2008

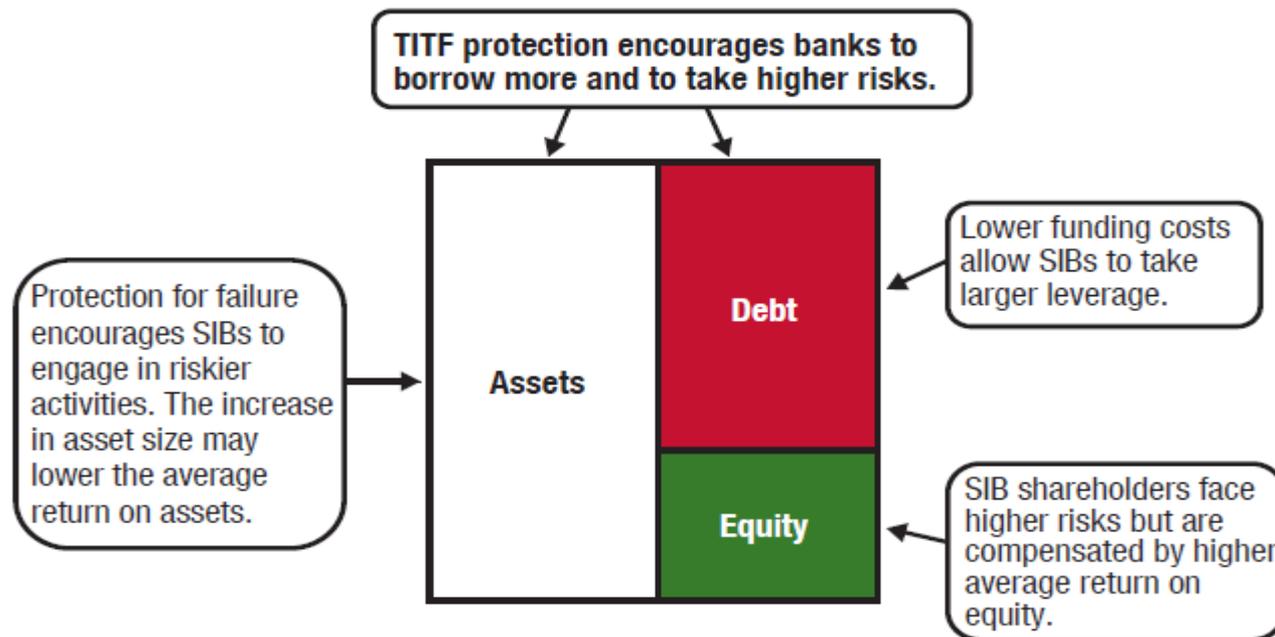


.... creating more complexity.....

BHC Rank	Name	Number			Total	Asset Value	
		Commercial Bank	Other	Foreign		Domestic Commercial Bank (Percentage of Y-9C Assets)	Consolidated Total Assets (Y-9C) (Billions of U.S. Dollars)
1	JPMorgan Chase & Company	4	2,936	451	3,391	86.1	2,265.8
2	Bank of America Corporation	5	1,541	473	2,019	77.9	2,136.6
3	Citigroup Incorporated	2	935	708	1,645	68.8	1,873.9
4	Wells Fargo & Company	5	1,270	91	1,366	92.5	1,313.9
5	Goldman Sachs Group, Incorporated	1	1,444	1,670	3,115	11.2	923.7
6	MetLife, Inc.	1	39	123	163	3.2	799.6
7	Morgan Stanley	2	1,593	1,289	2,884	10.5	749.9
10	The Bank Of New York Mellon Corporation	3	211	146	360	83.2	325.8
20	Regions Financial Corporation	1	35	4	40	97.1	127.0
30	Comerica Incorporated	2	72	2	76	99.8	61.1
40	First Horizon National Corporation	1	35	1	37	99.1	24.8
50	Webster Financial Corporation	1	21	0	22	99.8	18.7
Total		86	13,670	5,847	19,603	70.4	14,359.1

Source: Avraham, D. Selvaggi, P and J. Vickery (2012), A Structural View of U.S. Bank Holding Companies, Federal Reserve Bank of New York Economic Policy Review, July, p71

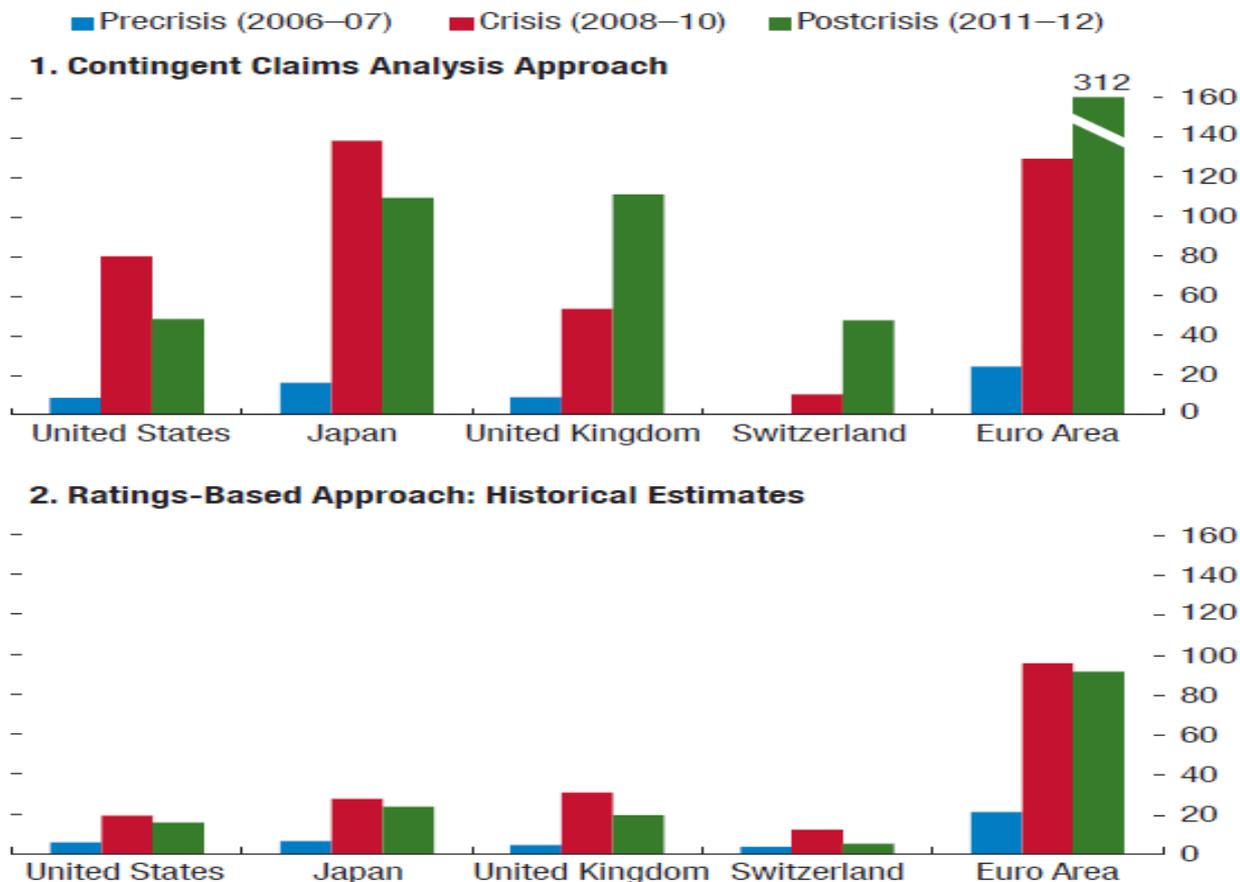
...and this size and complexity enables Big Banks to extract Safety Net Subsidies.....



Source: IMF staff.

Note: SIB = systemically important bank; TITF = too important to fail.

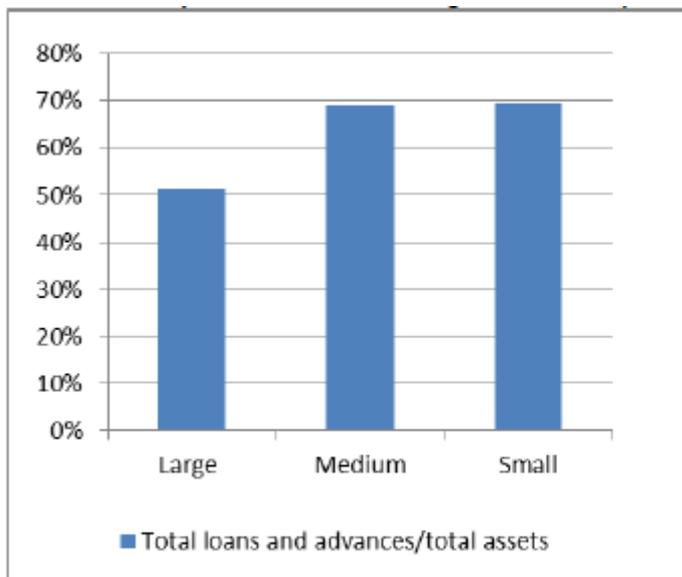
.....and these for G-SIBs (mega banks) are large.....



Source: IMF (2014) Global Financial Stability Report, April, Fig 3.2, p119

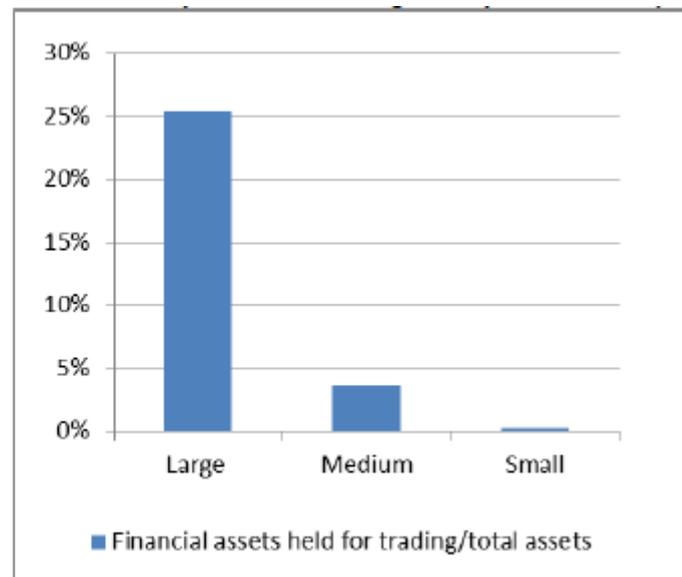
Big banks have created distorted business models.....

Importance of loan making for EU banks (2011)



Source: ECB consolidated banking data.

Importance of trading activity for EU banks (2011)



Source: ECB consolidated banking data.

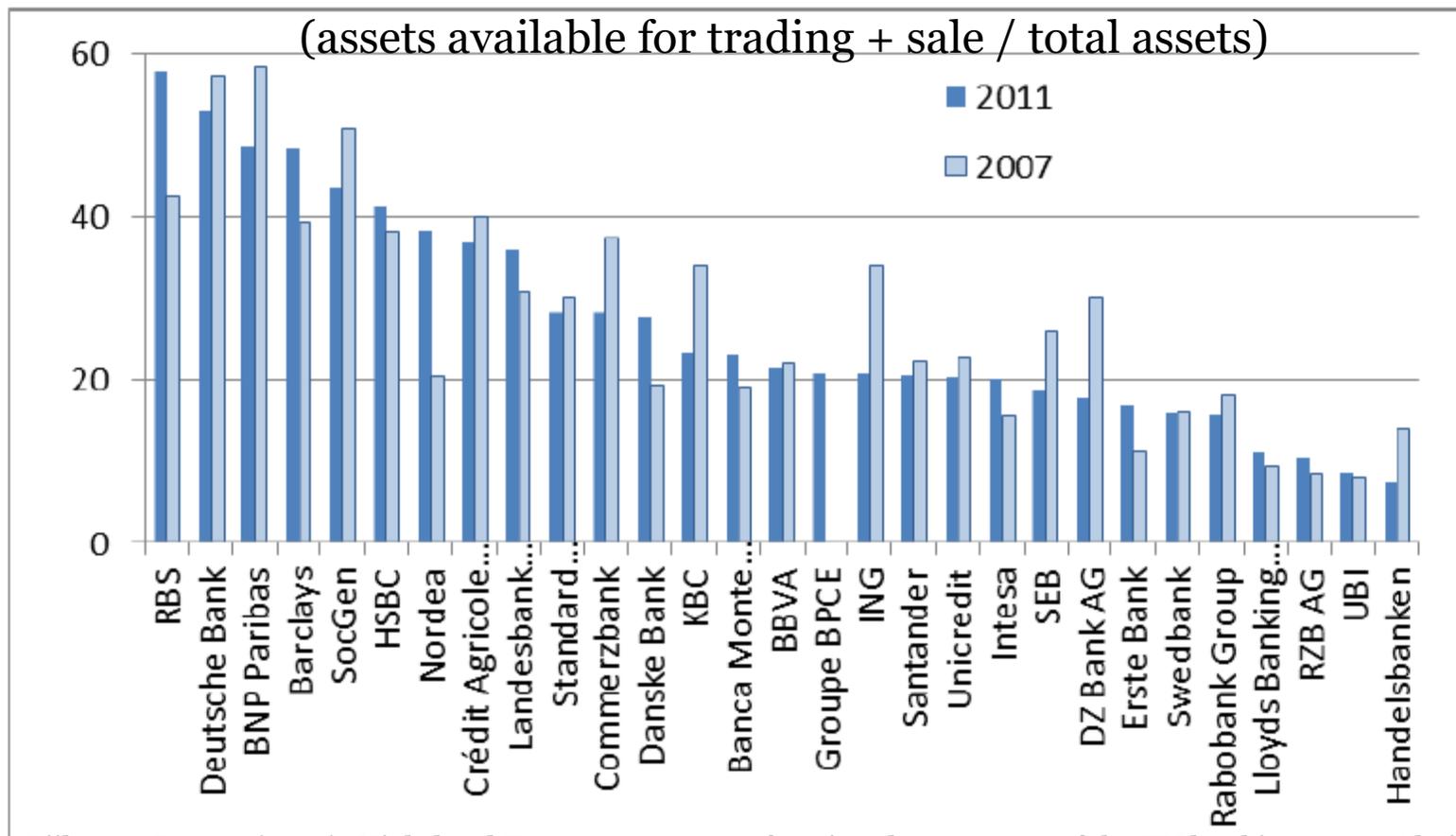
Small banks
Assets < €1 bn

Medium
between €1bn
And €100bn

Large > €100bn

Source: Liikanen Report (2012) High-level Expert Group on reforming the structure of the EU banking sector Chaired by Erkki Liikanen, FINAL REPORT Brussels, 2 October 2012 , p 35.

.....focused on trading



And when they failOuch!!!!

Between 2008 and October 2011, the national parliaments of the Member States committed in total to €4.5trillion (36.7% of EU GDP) of state aid measures, the majority of which in the form of guarantees on bank liabilities with maturities up to 5 years.

Parliamentary approved amounts of state aid in the period 10/2008-10/2011 in the EU:

	Guarantees	Liquidity measures	Recapitalisation	Impaired assets	Total	
Years	€ billion	€ billion	€billion	€billion	€ billion	% of GDP
2008	3097	85	270	5	3457	27.7
2009	88	5	110	339	542	4.6
2010	55	67	184	78	384	3.1
2011	49	40	34	0	123	1
2008-11	3290	198	598	421	4506	36.7

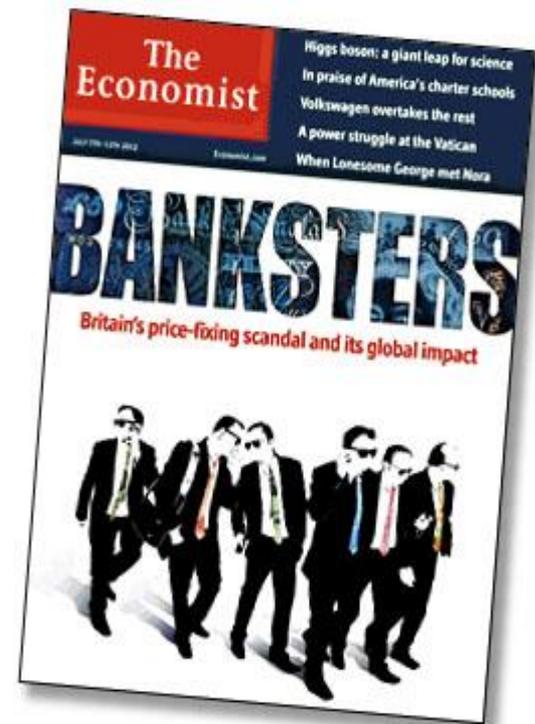
Source: Liikanen Report (2012) High-level Expert Group on reforming the structure of the EU banking sector Chaired by Erkki Liikanen, FINAL REPORT Brussels, 2 October 2012 , p 21.

...so they are 'kicked' to behave...

- United States - Dodd-Frank 2010
- European Union - Liikanen (2012) recommendations
- UK – Vickers Report (2011) – Financial Services (banking Reform) Act 2013
- Basel 3 – more capital, more liquidity, less risk
- Ongoing governance / executive pay / bonus restrictions
- Other stuff – OTC reform (pushing onto exchanges), rating agency regulation

.....but they're still misbehaving!!!!

- Rigging markets:
 - LIBOR
 - FX
 - Gold
 - Brent Oil (possibly)
 - Swaps
 - Other benchmarks



SO MAYBE ITS TIME TO TREAT BANKS AS PUBLIC UTILITIES

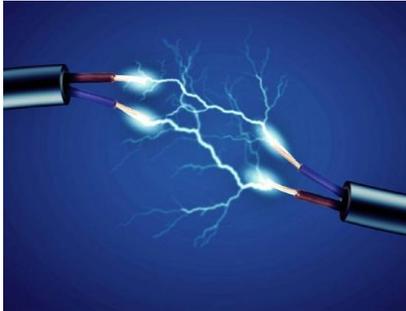


Banks as Public Utilities?

- With the greater regulatory oversight
- Tougher restrictions curtailing their activities
- Widespread government involvement in banking in the US and Europe since the 2007-2009 bailouts (and in 2010-2012 sovereign debt crisis in Europe)
- Growing calls that banks should be viewed as public utilities and overseen / regulated accordingly?????

What are Public Utilities

ELECTRICITY



RAILROADS



TELECOMS



AIRLINES



CABLE TV



Features of Public Utilities

- Common NETWORK STRUCTURE
 - Extensive distribution system
- Substantial SUNK COSTS
 - Extensive infrastructure
- Utilities can be government or privately owned
 - Where privately owned their returns or/and prices are regulated
- Utilities are usually granted legally enforced monopolies over services territories

Common Features of Utilities

Production is often Private and typically more competitive than other stages

Transmission and distribution can be private or government

Industry	Production	Transmission	Distribution
Airlines	Airplanes	Air traffic control	Airports
Trucking	Trucks	Highways	Local streets, distribution centers
Telecoms	Telecom terminal equipment	Long-distance cos. and local telecoms	Local telecoms
Electricity	Generating plants	High-voltage lines	Local power lines
Natural gas	Gas wells	Interstate pipelines	Local distribution companies
Railroads	Trains	Trunk lines	Local sidings

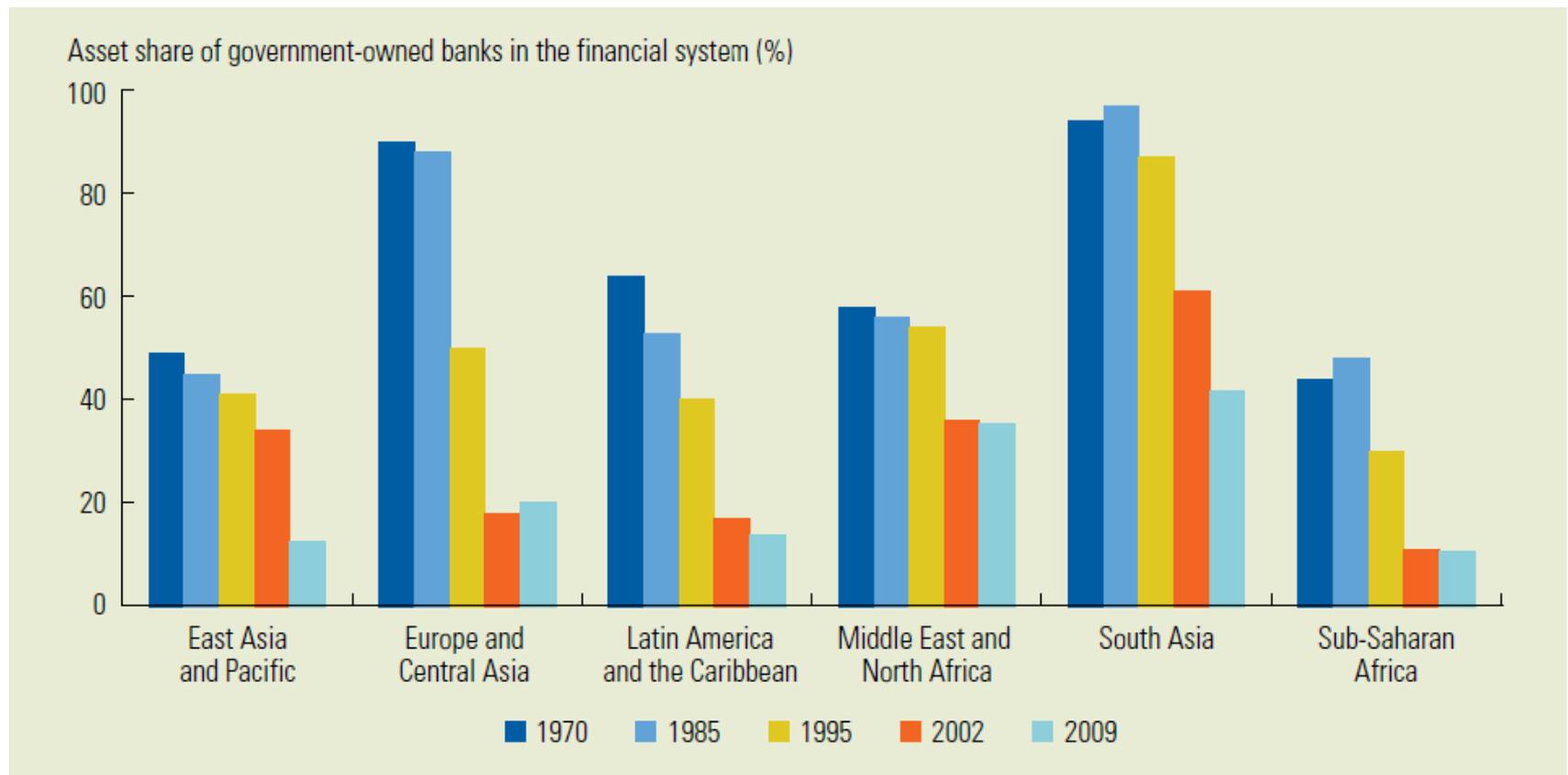
Source: Crandall, RW and Ellig, J (1997) Economic deregulation and Customer Choice: Lessons for the Electric industry, Fairfax VA, Centre for Market Processes, p.70

In Banking.....

- Production = Banking Licence / Deposits / Funding / Loans
- Transmission = Payments System
- Distribution = Branch Network

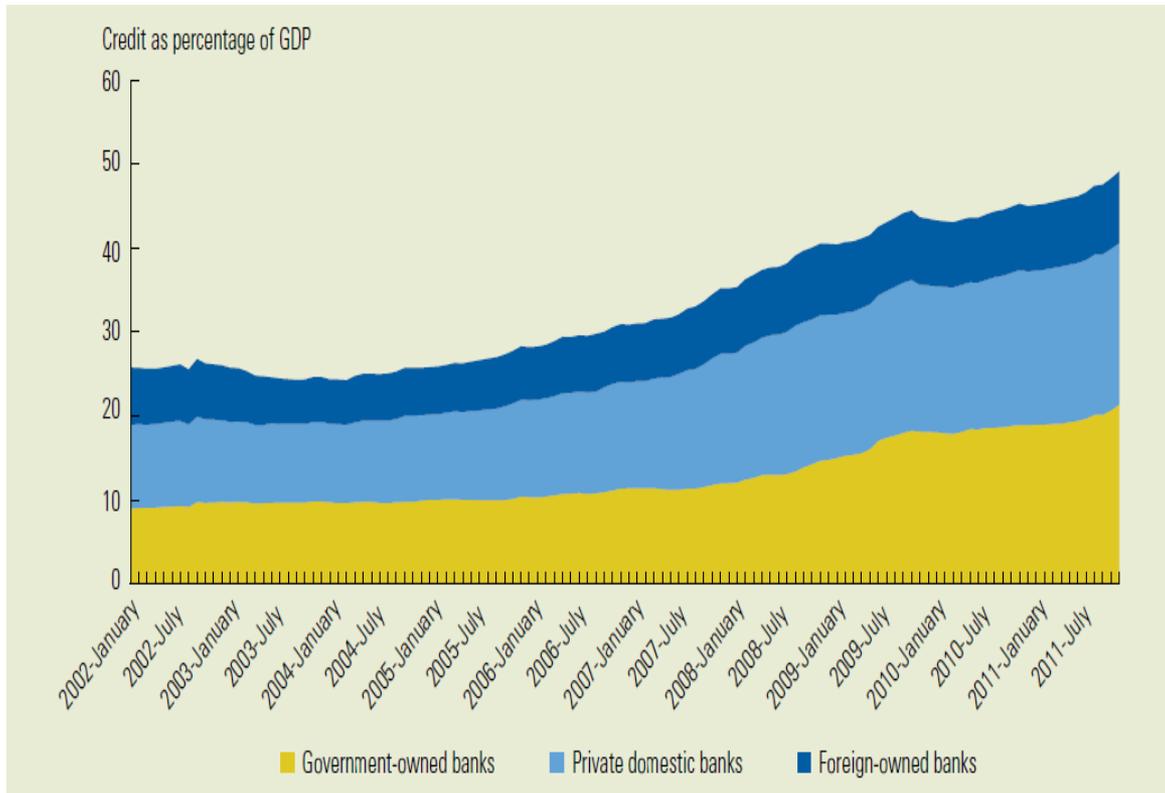
Typically all these are PRIVATE

..... although Governments still own banks
.....but importance has fallen since 70s



Source: World Bank's Global Financial Development Report (2013) Fig 4.2, p104

...and in some cases they remain significant ... as in case of Brazil (+ UK!)

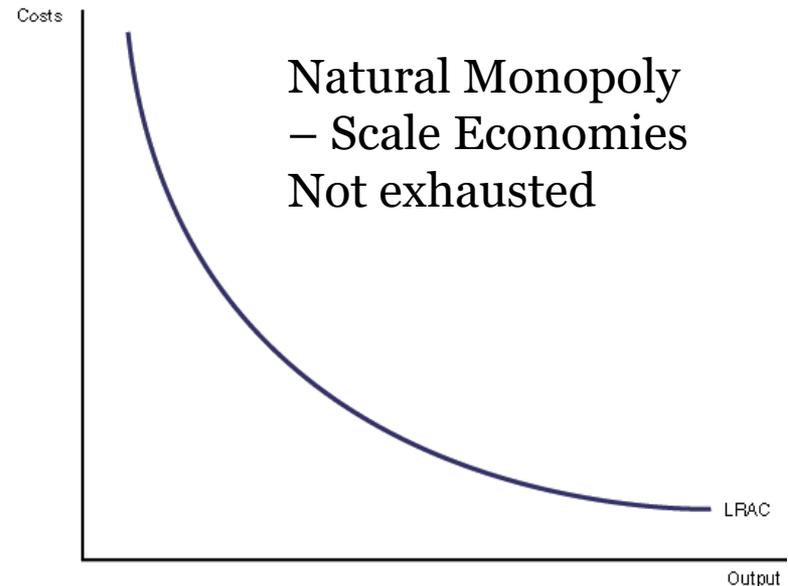
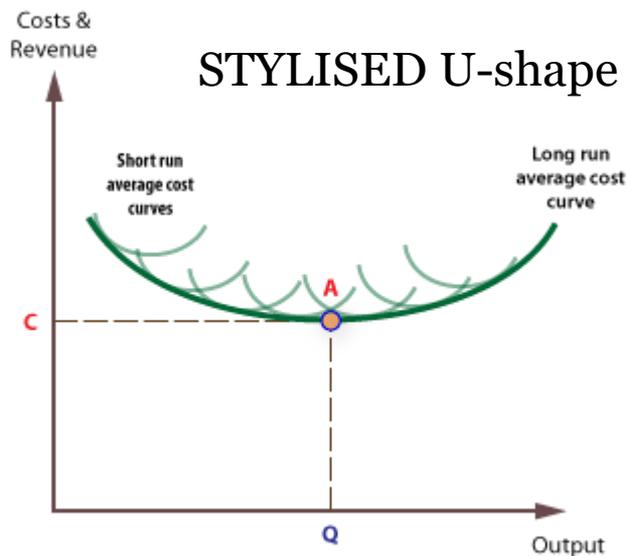


In UK April 3rd 2014:

RBS – 82% government owned
Lloyds banking group – 33% government owned

Rationale for Regulation of Utilities

- Natural monopoly – the industry is naturally monopolistic where average long-run cost is declining throughout the full output range. Productive efficiency achieved with 1 firm



Rationale for Regulation of Utilities 1

- **Consumers need to be protected against price gouging and other bad treatment possible under a natural monopoly**
- Hence the justification for regulating utilities, particularly on their pricing (banks really should be capped on their pricing – usury and other restrictions perhaps)
- **To stop natural monopolies exploiting their position**

So do large banks exploit scale economies.....some thought not....



Alan Greenspan

“For years the Federal Reserve had been concerned about the ever larger size of our financial institutions. Federal Reserve research had been unable to find economies of scale in banking beyond a modest-sized institution.”
Brookings Papers on Economic Activity, Spring 2010, p. 231

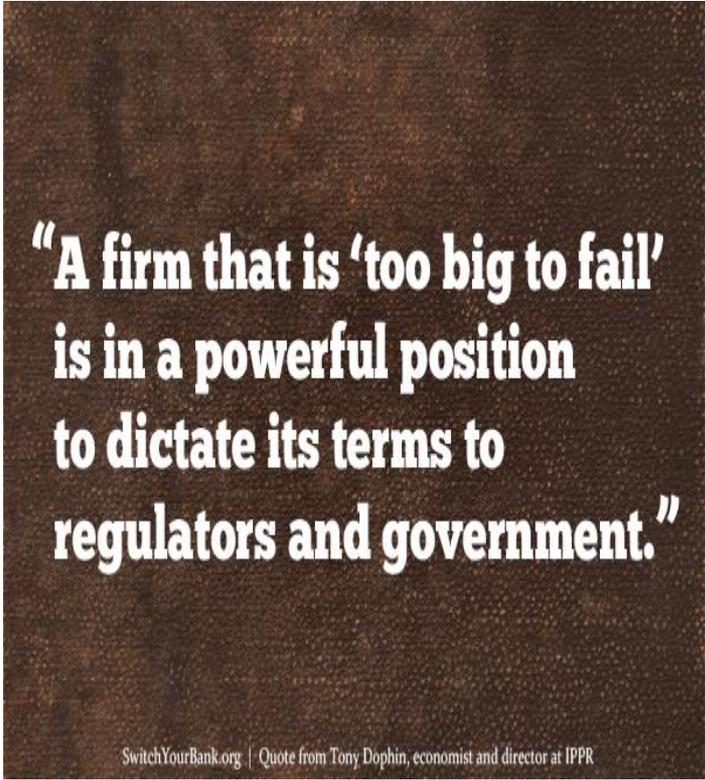
..but there is growing evidence of big bank economies and therefore a trend toward natural monopoly.....

Scale economies for big bank found by:

- Hughes, Lang, Mester, and Moon (JMCB 1996)
- Berger and Mester (JBF 1997)
- Hughes and Mester (ReStat 1998)
- Hughes, Mester, and Moon (JBF 2001)
- Bossone and Lee (IMF 2004)
- Wheelock and Wilson (StLouisFed W/P 2009)
- Feng and Serletis (JBF 2010)
- Dijkstra (UoAmsterdam W/P 2013)
- Hughes and Mester (JFI 2013)
- Beccalli et al (w/p 2014)
- Hughes and Mester (2014) Oxford Handbook, 2nd Ed

Rationale for Regulation of Utilities 2

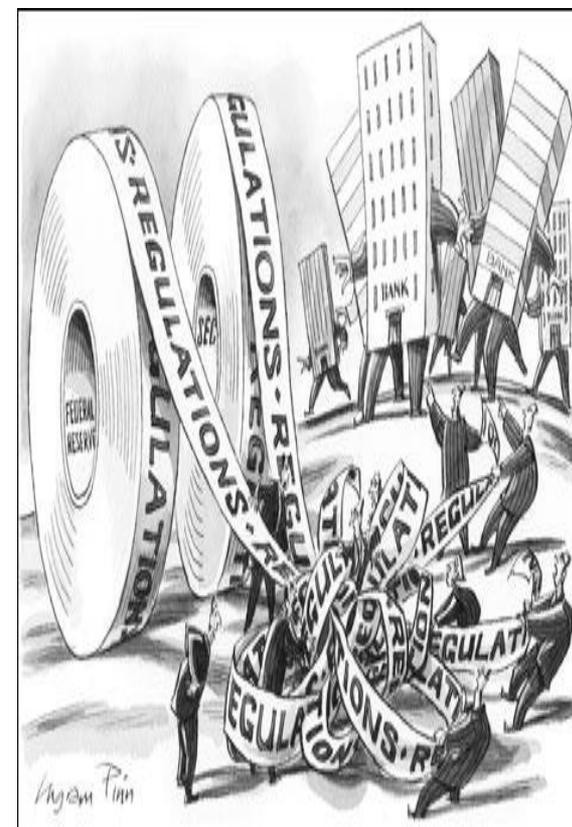
- To **stop regulators from being captured by producers**
- The aim is to protect all producers and not just the biggest!
- BUT IN BANKING:
 - BIG BANKS GAIN SAFET NET SUBSIDIES – Lower Funding Costs
 - BIG BANKS HELP WRITE THE RULES – BASEL, EU
 - BIG BANKS DOMINATE CAPITAL & MONEY MARKETS - AGAIN THEY HELP WRITE THE RULES
 - BIG BANKS ARE TOO BIG TO FAIL
- REGULATEES KNOW MUCH MORE THAN REGULATOR – THE BANKS HELP SET THE REGULATORY AGENDA / OR AT LEAST MOULD IT.



“A firm that is ‘too big to fail’ is in a powerful position to dictate its terms to regulators and government.”

Rationale for Regulation of Utilities 3

- **Economic Theory of Regulation** (Coase JLE 1959; Stigler BJ 1971, Becker QJE 1983, Armstrong and Sappington 2007, among many others):
 - **Lowest cost operators likely to be biggest rent gainers** (YES IN BANKING THEY GAIN MOST FROM SAFETY NET SUBSIDIES TBTF, Deposit Insurance, LoLR)
 - **Cost-based cross-subsidization will become widespread** (YES IN BANKING – MOVE TO UNIVERSAL BANKING)
 - **Rents are likely to be spread among various groups – producers and consumers** (YES IN BANKING – STAFF IN CERTAIN PARTS OF THE BANK AND BIG BORROWERS – PROPERTY DEVELOPERS, HEDGE FUNDS, PRIVATE EQUITY – VIA PRIME BROKER ROLE!))



So ?.....In Banking there is a.....

- Trend toward Natural Monopoly
- Evidence of Regulatory Capture (or at least barriers to capture are low)
- Rent-seeking by low cost producers and other parties and cross-subsidization is also widespread

**ALL FACTORS JUSTIFYING THE REGULATION
OF PUBLIC UTILITIES!!!!!!**

... what about Contestability????.....

- Natural monopoly and ever increasing returns to scale may result in 1 firm in the industry but this is not a problem if the market is contestable (Baumol, Panzar and Willig, 1982, 1988)
- Contestable market – free entry and exit (no/low sunk costs), potential hit and run entry. The threat of competition forces a competitive outcome irrespective of market structure.
- Some evidence on this in banking but the empirical work is flawed, as sunk costs are substantial – initial licensing costs, branch network, capital and other costs – **SUNK COSTS ARE HIGH IN BANKING**

SO WHAT??????...

- **BIG BANKS HAVE ALL THE FEATURES OF PUBLIC UTILITIES – SO THEY SHOULD BE TREATED AS SUCH**
- **PRIVATE BANKS ARE NOT FIT FOR PURPOSE SO SOMETHING MORE NEEDS TO BE DONE**
- **REGULATION SHOULD COVER – not only bank financial features (capital/ liquidity), operations and governance – BUT ALSO THEIR PRICING AND RETURNS**

..... and.....

- **ROLE OF STATE OWNERSHIP OF BIG BANK ASSETS SHOULD BE RECONSIDERED**
- **BIG STATE BANKS CAN BE USED:**
 - **COERCE / DISCIPLINE BIG PRIVATE BANKS**
 - **PROVIDE A MECHANISM FOR SUPPORT IN TIMES OF CRISIS**
 - **EXTEND CREDIT TO SMES AND OTHERS WHEN NEEDED**
 - **GUIDE MARKET PRICING**
- **A GOOD CASE CAN BE MADE FOR MAINTAINING A MAJOR STATE BANK IN EVERY BANKING SYSTEM**

.....WHAT WILL ALL THIS COST???.NOT MUCH!!!!!!! as it...

- Reduces the likelihood of excessive bank risk-taking if pricing and returns are restricted
- Reduces the role of banks in the overall economy so reducing the cost of the safety net subsidy
- Enhances the role of the government in banking – this is endemic already in most systems so my suggestions just make the role explicit
- Give public recognition that the private sector and market solutions are not the best solution for big banks and public/private mix is more optimal.