Competition in the Financial Sector: Challenges for Regulation

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10 Key Issues for Policy Makers

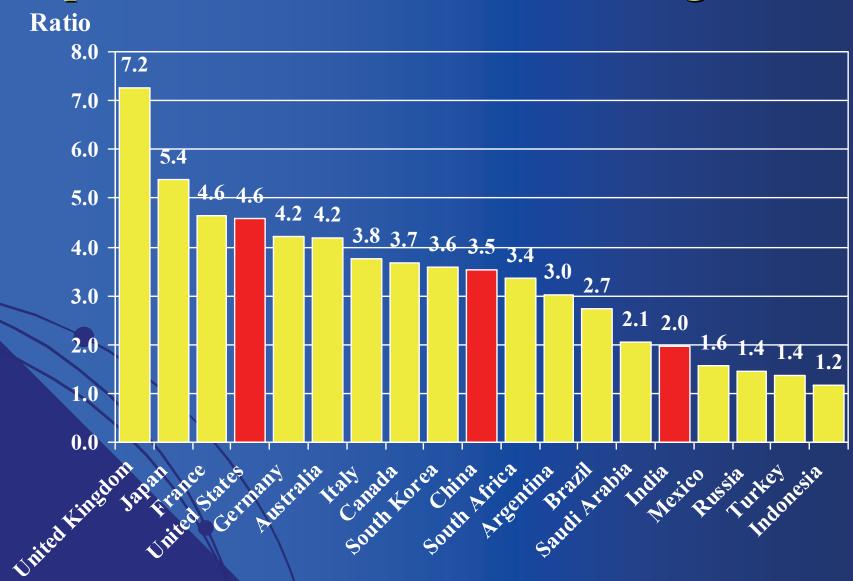
- Do differences in the size and composition of financial sectors necessitate different regulatory regimes?
- Every country regulates banks, but what is a bank?
- How concentrated is the banking industry, and how complex are banks?
- How globalized are big banks, and what is a country's regulatory posture toward foreign entry?
- What is the current structure of regulation?
- Should supervision be on the banks of separate industries or products/services?
- How much/what kind of activity is unregulated or lightly regulated?
- How can regulation avoid stifling innovation and competition but still promote safety and soundness?
- What characteristics of financial sectors promote effective market discipline (adequate disclosure, transparency, reliable outside rating agencies, other)?
- What other goals are there/should there be for regulation (competition, consumer protection, other)?

Do differences in the size and composition of financial sectors necessitate different regulatory regimes?

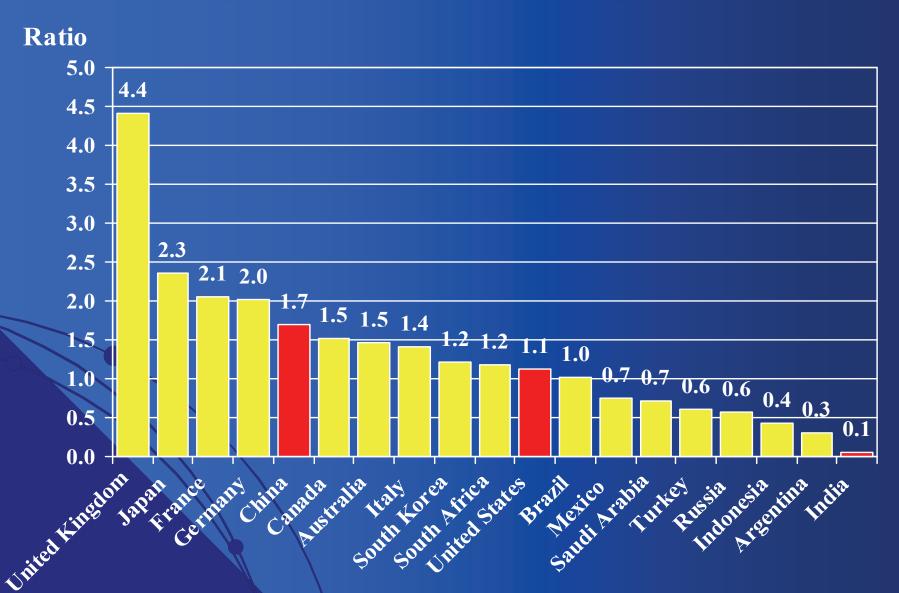
G-20: Comparative Information on Population, GDP, Size and Composition of the Financial Sector

	Share of World Total (%)					Ratios					
	Population	GDP	Bank Assets (BA)	Equity Market Capitalization (MC)	Bonds Outstanding (BO)	(BA+MC +BO)/ GDP	BA / GDP	MC / GDP	BO/ GDP	BA/ (MC+BO)	
Argentina	0.6	0.4	0.1	0.9	0.2	3.0	0.3	2.2	0.5	0.1	
Australia	0.3	1.4	1.5	2.3	1.5	4.2	1.5	1.5	1.2	0.5	
Brazil	2.9	2.2	1.6	2.3	1.3	2.7	1.0	1.0	0.7	0.6	
Canada	0.5	2.3	2.5	2.9	2.0	3.7	1.5	1.1	1.0	0.7	
China	20.2	5.0	6.2	7.3	2.2	3.5	1.7	1.3	0.5	0.9	
France	0.9	4.1	6.1	4.5	5.5	4.6	2.1	1.0	1.6	0.8	
Germany	1.3	5.3	7.8	3.6	7.1	4.2	2.0	0.6	1.6	0.9	
India	17.8	1.8	0.1	3.0	0.6	2.0	0.1	1.5	0.4	0.03	
Indonesia	3.5	0.6	0.2	0.3	0.1	1.2	0.4	0.5	0.2	0.6	
Italy	0.9	3.4	3.4	1.8	5.3	3.8	1.4	0.5	1.9	0.6	
Japan	1.9	6.7	11.4	7.5	11.6	5.4	2.3	1.0	2.0	0.8	
Mexico	1.6	1.5	0.8	0.7	0.6	1.6	0.7	0.4	0.4	0.9	
Russia	2.2	1.9	0.8	1.6	0.2	1.4	0.6	0.8	0.1	0.6	
Saudi Arabia	0.4	0.6	0.3	0.8	0.01	2.1	0.7	1.3	0.02	0.5	
South Africa	0.7	0.4	0.4	0.7	0.2	3.4	1.2	1.6	0.6	0.5	
South Korea	0.7	1.4	1.3	1.8	1.5	3.6	1.2	1.1	1.2	0.5	
Turkey	1.1	1.1	0.5	0.5	0.3	1.4	0.6	0.4	0.4	0.8	
U.K.	0.9	4.1	13.1	6.7	4.8	7.2	4.4	1.5	1.4	1.5	
U.S.	4.6	20.5	16.7	29.0	37.9	4.6	1.1	1.3	2.2	0.3	
Total	63.1	64.8	74.7	78.3	82.9	3.5	1.4	0.9	1.2	0.7	

G-20: Bank Assets + Equity Market Capitalization + Bonds Outstanding / GDP



G-20: Bank Assets / GDP



Ratio of Bank Assets to GDP



112%

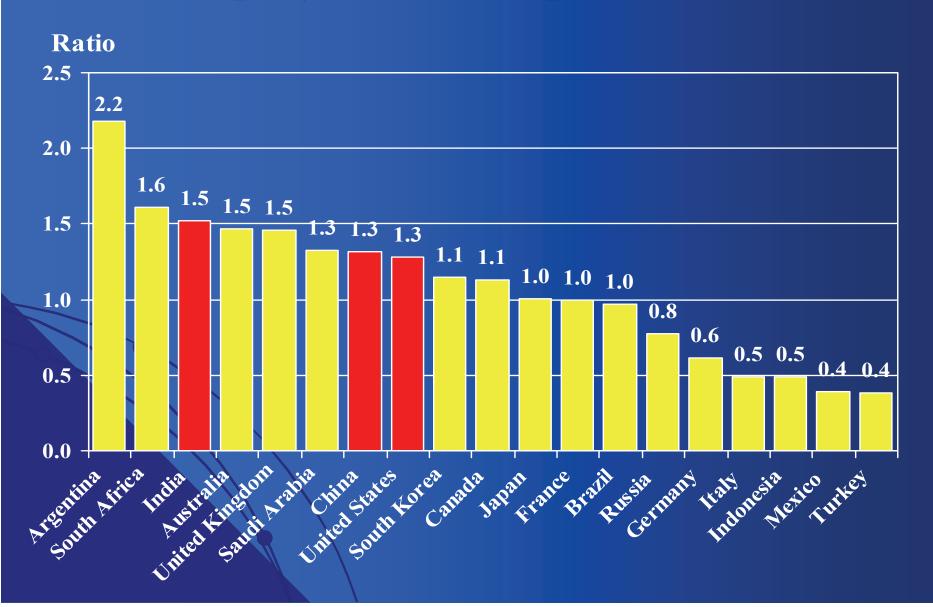








G-20: Equity Market Capitalization / GDP



G-20: Bonds Outstanding / GDP



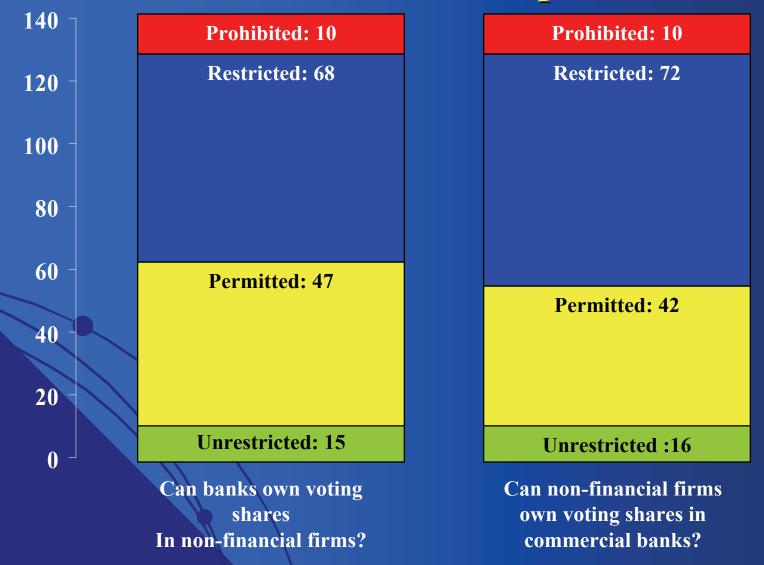
Key Issue Number One
Do differences in the size and composition of
financial sectors necessitate different regulatory
regimes?

Observation
Bigger and more balanced financial sectors
promote economic growth and development.

Regulatory Challenge
Design a regulatory regime that promotes such a financial sector to enable a country to better compete in global financial markets.

Every country regulates banks, but what is a bank?

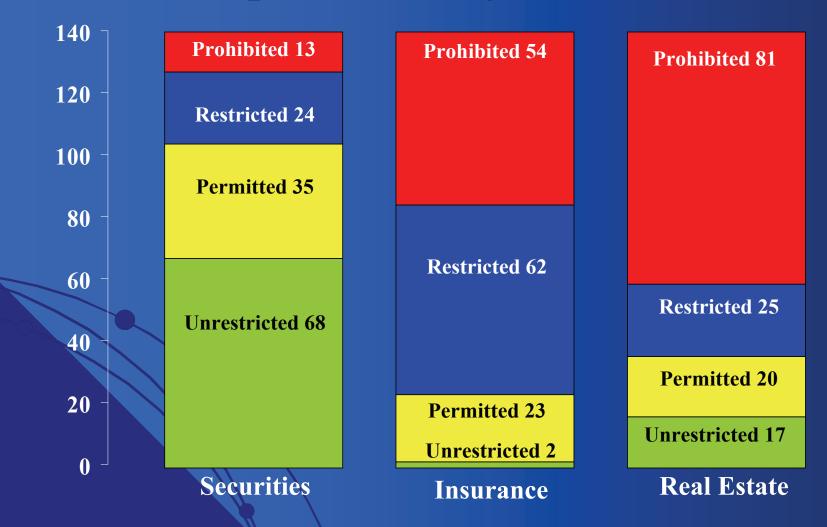
What Is a Bank? Bank/Non-Bank Ownership Restrictions



Are Financial/Non-Financial Conglomerates Permitted?

	Can banks own voting shares in non-financial firms?	Are limits placed on ownership of non- financial firms by banks?	Can non-bank financial firms own any voting shares in commercial banks?	Are limits placed on ownership of banks by non-bank financial firms ?	Can non-financial firms own voting shares in commercial banks?	Are limits placed on ownership of banks by non-financial firms, such as maximum percentage of a commercial bank's capital or shares?
Argentina	Yes	Yes	Yes	Yes	Yes	Yes
Australia	Yes	Yes	Yes	Yes	Yes	Yes
Brazil	Yes	Yes	Yes	Yes	Yes	Yes
Canada	Yes	Yes	Yes	Yes	Yes	Yes
China	No	n/a	Yes	Yes	Yes	Yes
France	Yes	Yes	Yes	Yes	Yes	Yes
Germany	Yes	Yes	Yes	Yes	Yes	Yes
India	Yes	Yes	Yes	Yes	Yes	Yes
Indonesia	No	n/a	Yes	Yes	Yes	Yes
Italy	Yes	Yes	Yes	Yes	Yes	Yes
Japan	Yes	Yes	Yes	Yes	Yes	Yes
Mexico	Yes	No	Yes	No	Yes	No
Russia	Yes	Yes	Yes	Yes	Yes	Yes
Saudi Arabia	Yes	Yes	Yes	Yes	Yes	Yes
South Africa	Yes	Yes	Yes	Yes	Yes	Yes
South Korea	Yes	Yes	Yes	Yes	Yes	Yes
Turkey	Yes	No	Yes	Yes	Yes	No
United Kingdom	Yes	No	Yes	Yes	Yes	Yes
United States	Yes	Yes	Yes	Yes	Yes	Yes
All countries	125 Yes, 15 No	115 Yes, 10 No	127 Yes, 12 No	112 Yes, 15 No	138 Yes, 3 No	114 Yes, 10 No

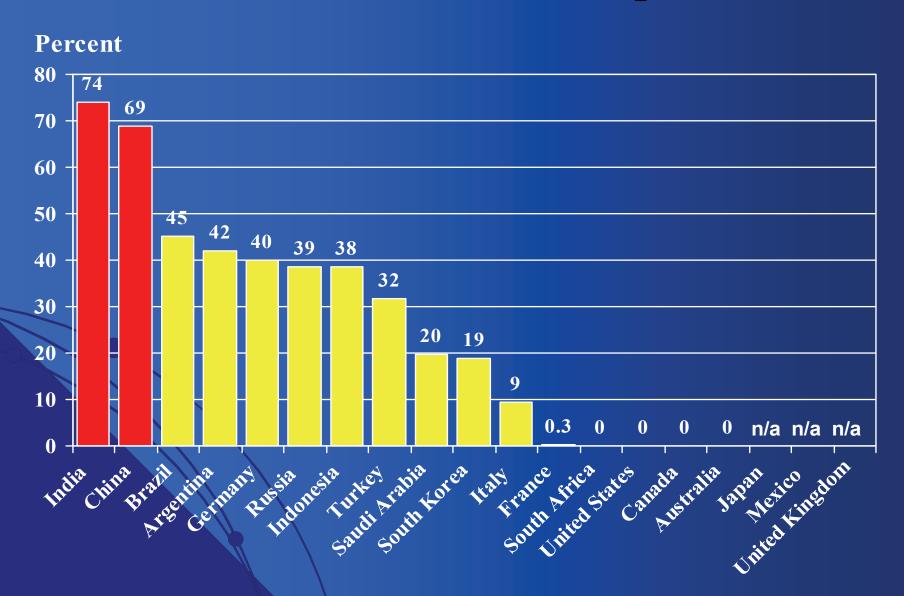
What Is a Bank? Scope of Activity Restrictions



What Activities Are Allowed for Banks?

	What kinds o	of securities activengage in?	ities can banks	What kinds of insurance activities can banks engage in?		What kinds of real estate activities can banks engage in (other than real estate in which banking operations are conducted or resulting from foreclosure on loans)?		
	Underwriting?	Dealing and brokering?	Mutual Funds?	Underwriting?	Selling?	Investment?	Development?	Management?
Argentina	Yes	Yes	No	No	Yes	No	No	No
Australia	Yes	Yes	No	No	Yes	Yes	No	No
Brazil	Yes	Yes	Yes	Yes	Yes	Yes	No	No
Canada	Yes	Yes	Yes	Yes	Yes	Yes	Yes	Yes
China	No	No	No	No	Yes	No	No	No
France	Yes	Yes	No	No	Yes	Yes	No	Yes
Germany	Yes	Yes	No	No	Yes	Yes	Yes	Yes
India	Yes	Yes	Yes	Yes	Yes	No	No	No
Indonesia	No	No	No	No	No	No	No	No
Italy	Yes	Yes	Yes	No	Yes	No	No	No
Japan	Yes	Yes	Yes	Yes	Yes	No	No	No
Mexico	Yes	Yes	Yes	No	Yes	Yes	Yes	Yes
Russia	Yes	Yes	No	No	No	Yes	No	Yes
Saudi Arabia	Yes	Yes	Yes	No	Yes	No	No	No
South Africa	Yes	Yes	No	No	Yes	Yes	No	No
South Korea	Yes	No	No	No	Yes	Yes	No	No
Turkey	Yes	Yes	Yes	Yes	Yes	Yes	Yes	Yes
United Kingdom	Yes	Yes	Yes	Yes	Yes	Yes	Yes	Yes
United States	Yes	Yes	Yes	Yes	Yes	No	No	No
All countries	96 Yes, 22 No	94 Yes, 23 No	69 Yes, 46 No	21 Yes, 96 No	73 Yes, 44 No	52 Yes, 66 No	30 Yes, 88 No	38 Yes, 79 No

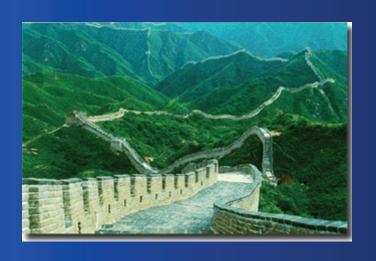
G-20: Government Ownership of Banks



Government-Owned Banks' Share of Total Bank Assets



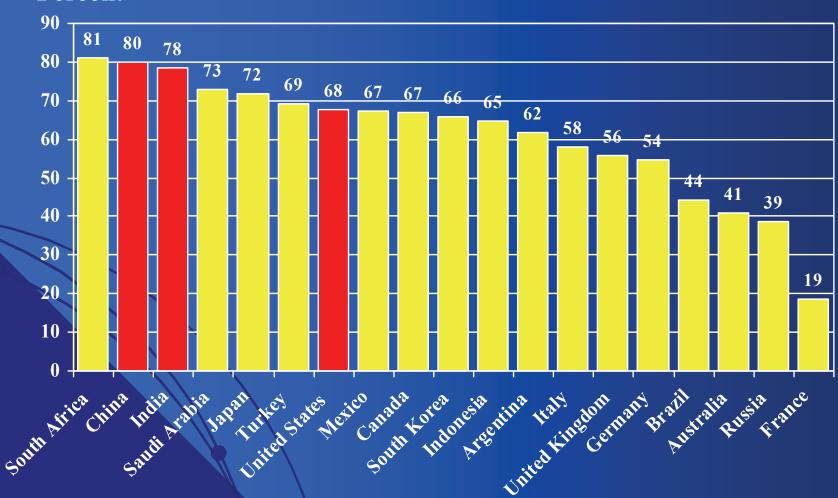
74 Percent



69 Percent

G-20: Percentage of Banking System's Assets Funded with Deposits

Percent

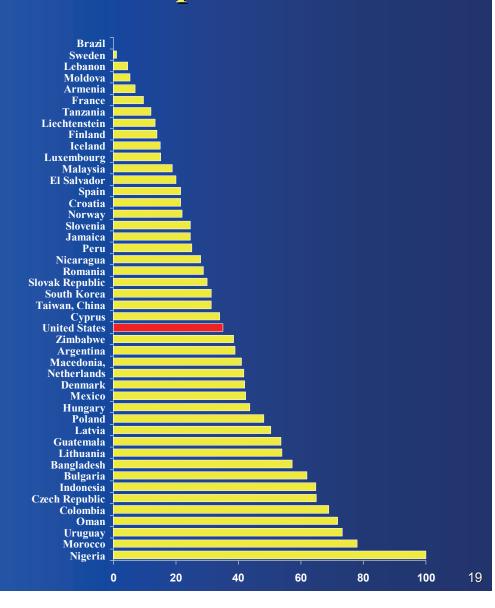


Percent of the Commercial Banking System's Assets Funded with Insured Deposits

61 countries with no assets funded with insured deposits

Angola, Anguilla, Antigua and Barbuda, Australia, Belize, Benin, Bhutan, Bolivia, Botswana, British Virgin Islands, Burkina Faso, Burundi, Cameroon, Cayman Islands, Central African Republic, Chad, China, Congo, Cook Islands, Costa Rica, Cote d'Ivoire, Dominica, Dominican Republic, Equatorial Guinea, Ethiopia, Fiji, Gabon, Ghana, Grenada, Guernsey, Guinea Bissau, Guyana, Jersey, Kosovo, Kuwait, Kyrgyz Republic, Lesotho, Macau, China, Malawi, Maldives, Mali, Mauritius, Montserrat, Mozambique, New Zealand, Niger, Pakistan, Panama, Papua New Guinea, Senegal, Seychelles, South Africa, Sri Lanka, St. Kitts and Nevis, St. Lucia, St. Vincent and the Grenadines, Suriname, Syria, Thailand, Togo, Vanuatu.

Note: No information for India.



Every country regulates banks, but what is a bank?

Observation

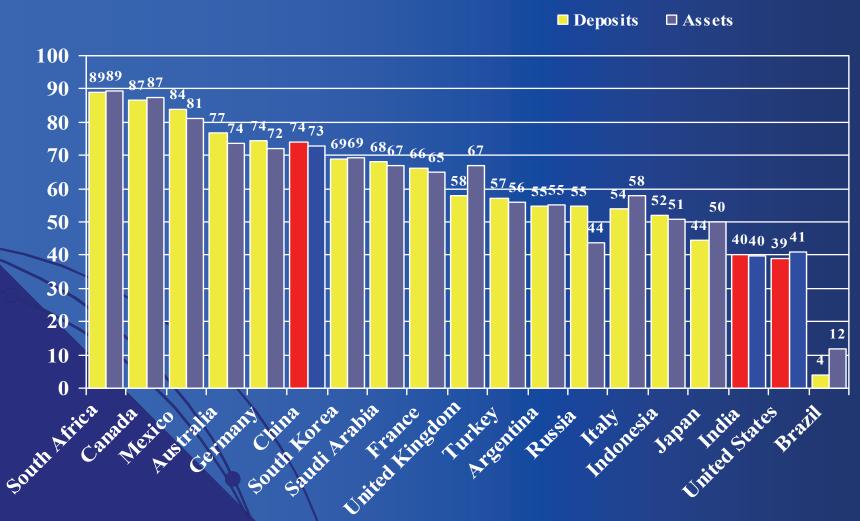
Ownership and activity restrictions on banks limit competition between banks and nonbank financial service firms and differences across countries affect the ability of banks to compete internationally. This, government ownership of banks, and generous deposit insurance have been shown to produce negative outcomes.

Regulatory Challenge Decide on what a bank should be based on competitive factors but also taking into account prudential matters.

How concentrated is the banking industry, and how complex are banks?

G-20: Percent of Deposits and Assets Held by Five Largest Banks

Percent



Big Banks Increasingly Dominate Banking Industry: Asset Shares by Bank Size

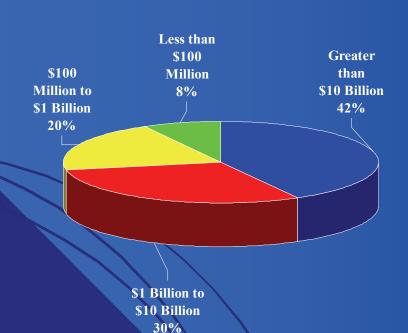
Is Competition Lessened or SMEs Underserved?

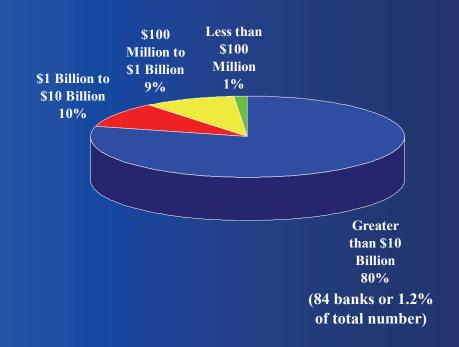
1984

Number: 14,484 Banks Assets: \$2.5 Trillion

2008 Q2

Number: 7,203 Banks Assets: \$11.4 Trillion





Organizational Complexity Is A Regulatory Challenge

(Citigroup Hierarchical Organization)

Citigroup Inc.

(The FHC)
Assets: \$2,188 billion

Wholly Owned Subsidiaries: 2,247 Majority owned: 34

Citibank NA (Las Vegas) Assets: \$1,252 billion

Wholly Owned Subsidiaries: 115 Majority owned: 30

Note: Citigroup has 200 million customer accounts and does business in more than 100 countries, with 44% of its employees in the U.S. and 56% of its income earned in the U.S.. Its credit commitments totaled \$1,631 billion in 2007.

Citibank Spain
Assets: \$3.9 billion
Of which Citibank NA owned more
than 50% and the rest of ownership
is held by other subsidiaries of
Citigroup

Product Complexity Is a Growing Challenge

Citigroup Segments and Products

Global Consumer Group

Corporate and Investment Banking

Global Wealth Management

Alternative Investments

Corporate/ other

U.S.

• Cards

- MasterCard, VISA, Diners Club, private label and Amex
- Consumer Lending
- Real estate lending
- Student loans
- Auto loans
- Retail Distribution
- Citibank branches
- CitiFinancial branches
- Primerica Financial Services

Commercial Business

- Small and middlemarket commercial banking

International

- Cards
- MasterCard, VISA, Diners Club, and private label
- Consumer Finance
- Real estate lending
- Student loans
- Auto loans
- Retail Banking
- Retail bank branches
- Small and middlemarket commercial banking
- Investment services
- Retirement services
- Real estate lending
- Personal loans
- Sales finance

• Capital Markets

- and BankingInvestment banking
- Debt and equity markets
- Lending
- Transaction Services
- Cash management
- Trade services
- Custody and fund services
- Clearing services
- Agency/trust services

• Smith Barney

- Advisory
- Financial planning
- Brokerage
- Private bank
- Wealth management services
- Citigroup Investment Research
- Equity and fixedincome research

- Private equity
- Hedge funds
- Real estate
- Structured products
- Managed futures
- Treasury
- Operations and technology
- Corporate expenses
- Discontinued operations

What Organizational Form Is Best for Broader Range of Activities? *Permissible Activities: Pre-GLBA*

Bank Holding Company

National Bank

- Bank-eligible securities only
- Very limited insurance activities

Section 20 Subsidiary

- All securities activities
- Bank-ineligible securities limited to 25% of total revenue

Other Affiliate

 Financial activities "closely related to banking" only

Traditional Subsidiary

Financial activities of bank only

Op-Sub

- Financial activities "incidental to banking"
- Municipal revenue bonds
- Potentially, securities and insurance activities

What Organizational Form is Best for Broader Range of Activities? Permissible Activities: Post-GLBA

Financial Holding Company

Securities Firm

- All securities activities
- No revenue limitation

Insurance Company

• All insurance activities

Merchant Bank

• All merchant banking activities

Other Affiliate

• "Complementary" financial activities

National Bank

- Bank-eligible securities only
- Very limited insurance activities

Traditional Subsidiary or Op-Sub

• Financial activities of bank only

Financial Subsidiary

• All financial activities, except insurance underwriting, insurance company portfolio investments, real estate investment and development, and merchant banking

Some Regulatory Exceptions Pose Challenges U.S. Industrial Loan Companies

- Mixing of banking and commerce are prohibited, but statechartered Industrial Loan Companies (ILCs) may be owned and operated by firms engaged in commercial activities.
- Parent companies that operate ILCs include Merrill Lynch, American Express, Morgan Stanley, BMW group, Goldman Sachs, General Electric, Toyota, Target Corporation and Volkswagen.
- Total assets of 58 FDIC-insured ILCs totaled \$213 billion at the end of 2006.
- Wal-Mart and Home Depot tried to acquire an existing ILC.
- The FDIC placed a moratorium until January 2008 on commercial firms opening or acquiring insured ILCs.

Key Issue Number Three How concentrated is the banking industry, and how complex are banks?

Observation

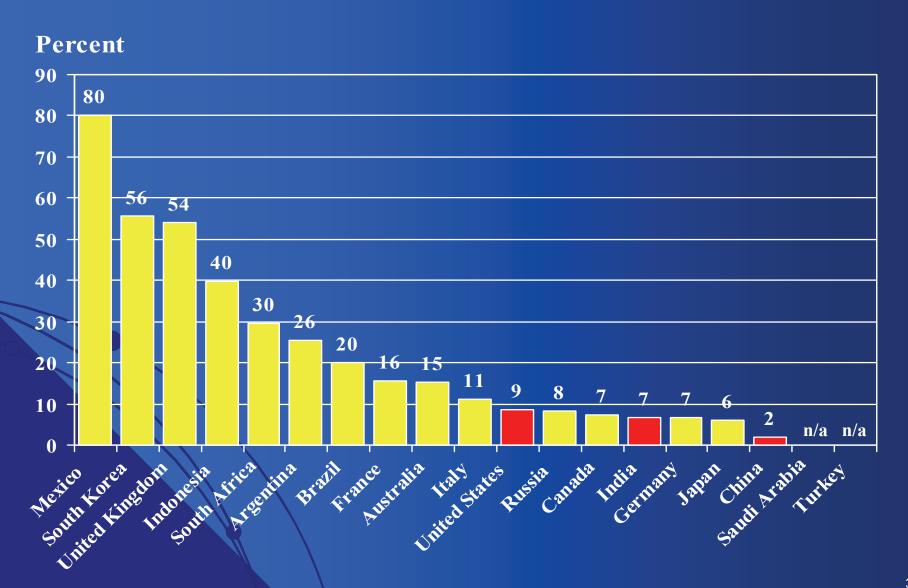
Competition in banking differs across countries and banks in countries like the United States are becoming bigger and more complex in terms of organizational form and mix of products. In some cases, exceptions allow unique organization forms.

Regulatory Challenge

Decide on an appropriate measure of concentration for accessing competition for banks with different organizational forms and different product mixes, taking into account contestability issues.

How globalized are big banks, and what is a country's regulatory posture toward foreign entry?

G-20: Foreign Ownership of Banks



Foreign-Owned Banks' Share of Total Bank Assets

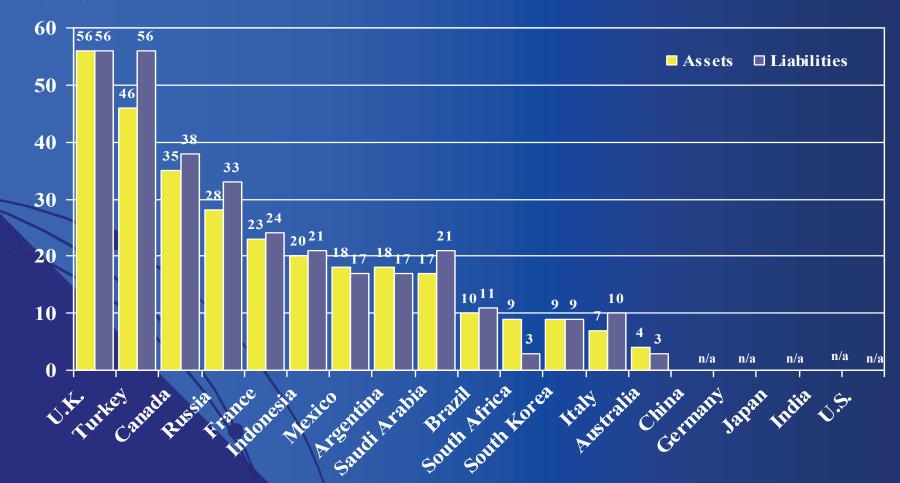




80 Percent

G-20: Percent of Commercial Banking Assets and Liabilities that Are Foreign Currency-Denominated

Percent



Globalization of Big Banks

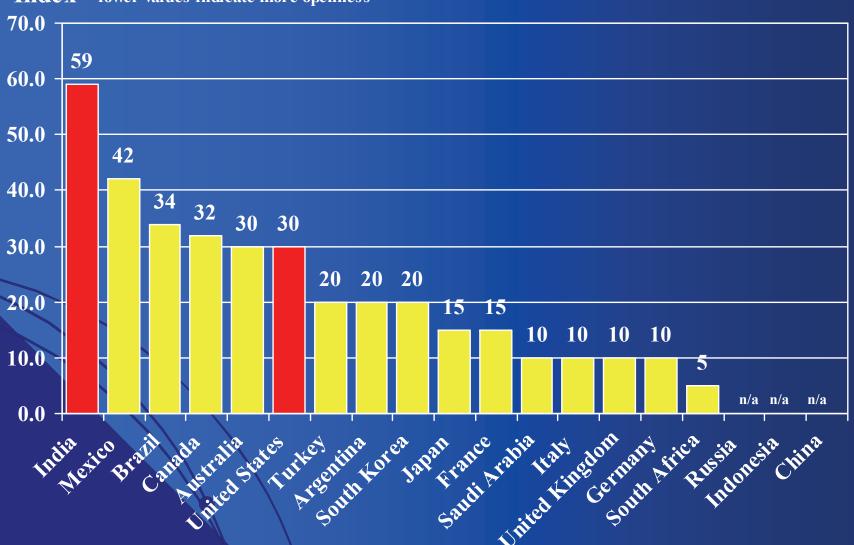
	Nov. 14, 2008 Market Capitalization (US\$ Billions)	Total Assets (US\$ Billions)	Assets Outside Home Country (%)	Income Outside Home Country (%)	Staff Outside Home Country (%)
Industrial and Commercial Bank of China, China	191	1,190	3	3	0.6
HSBC Holdings, United Kingdom	129	2,354	55	70	65
JPMorgan Chase, United States	129	1,562	62	25	n/a
China Construction Bank Corporation, China	126	904	2	1	n/a
Bank of China, China	109	821	4	3	9
Wells Fargo, United States	109	575	n/a	n/a	n/a
Bank of America, United States	82	1,716	n/a	n/a	n/a
Mitsubishi UFJ Financial, Japan	67	1,933	23	19	27
Banco Santander, Spain	66	1,331	64	75	77
Citigroup, United States	52	2,188	38	43	54

World Bank Data and WTO Data

- "WTO Commitments vs. Reported Practices on Foreign Bank Entry and Regulation: A Cross-Country Analysis," with Juan A. Marchetti, Daniel E. Nolle and Wanvimol Sawangngoenyuang, in Oxford Handbook of Banking, forthcoming in 2009.
- Same or similar aspects of bank entry and permissible activities from both WB and WTO data; 123 countries.
- Can we compare "WTO Commitments" and WB "Reported Practices" country-by-country across nine dimensions of banking system assets, restrictions on forms of bank entry, permissible banking activities.
- Also possible to construct an index of openness and an index of discrimination: assign values to particular responses for each component, then weight each of the nine components.
 - Openness index values range from 0 (very open) to 100 (very closed).
 - Discrimination index values range from 0 (no discrimination) to 60 (maximal discrimination).

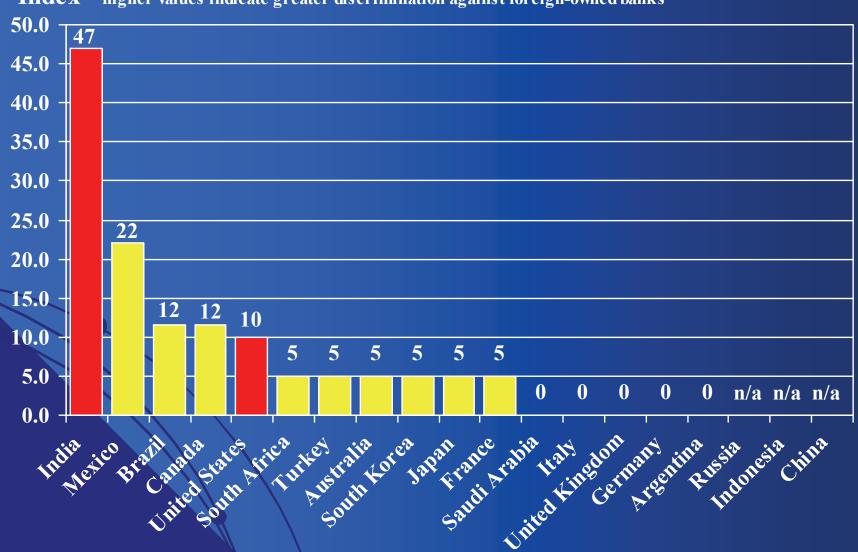
G-20: Market Openness to Foreign Banks WTO Commitments Index Value

Index - lower values indicate more openness



G-20: Discrimination Against Foreign Banks WTO Commitments Index Value

Index - higher values indicate greater discrimination against foreign-owned banks



What Do the World Bank and WTO Data Tell Us About Restrictions on Foreign Bank Entry?

- Developing countries are more restrictive under WTO than developed countries.
 - Developing countries less open to foreign entry than developed countries.
- But they are MORE open in practice than their WTO commitments indicate.
- AND developed countries are *LESS* open in practice than their WTO commitments indicate.

World Bank Survey: Restrictions on Entry

Domestic

Foreign

Limitations on foreign entry/ownership
% of entry applications denied (foreign & domestic)

Summary indicator of rules to obtain a license draft by-laws, organizational chart, financial projections, financial background information on major owners, background of directors/managers, sources of capital etc.

	Limitations on Foreign Bank Entry/Ownership	Domestic Denials	Foreign Denials
Argentina	0	50.0	0
Australia	0	0	0
Brazil	0	0	0
Canada	0	0	0
China	0	n/a	n/a
France	0	0	0
Germany	0	0	0
India	0	80.0	42.9
Indonesia	0	n/a	0
Italy	0	13.2	2.7
Japan	0	0	0
Mexico	1.0	n/a	n/a
Russia	1.0	21.1	n/a
Saudi Arabia	0	n/a	n/a
South Africa	1.0	0	0
South Korea	0	n/a	0
Turkey	3.0	71.4	41.7
United Kingdom	0	n/a	n/a
United States	0	n/a	0

Key Issue Number Four How globalized are big banks, and what is a country's regulatory posture toward foreign entry?

Observation

Foreign ownership of banks differs significantly across countries, highly-valued banks are operating globally, and WTO commitments regarding foreign entry may not tell the whole story. Evidence shows foreign entry produces good outcomes.

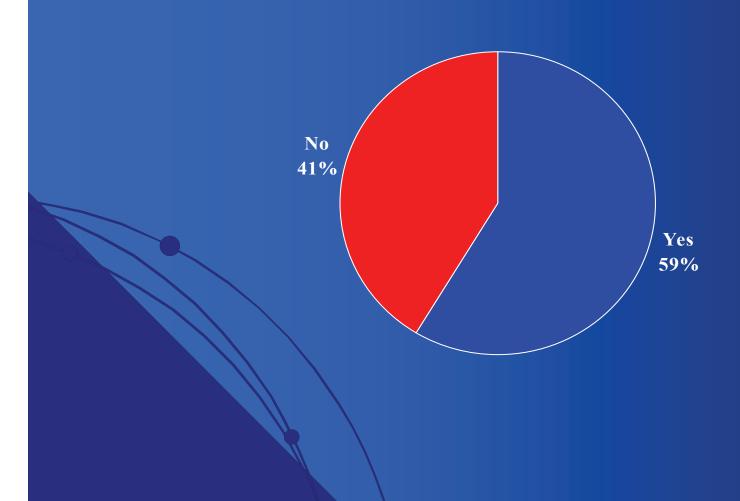
Regulatory Challenge
Reduce barriers to foreign and domestic entry, subject to
only real prudential concerns.

What is the current structure of regulation?

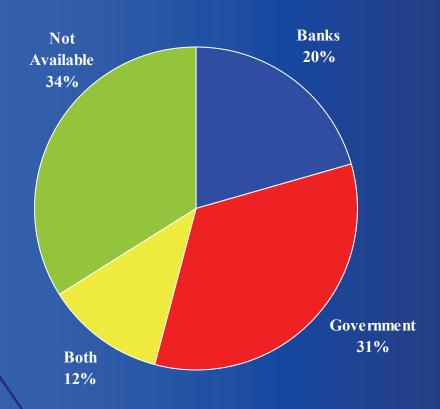
Who Supervises Banks, And How Many Licenses Are Required?

	What body/agency supervises banks?			Is there a single financial supervisory	Is there a single		Is more than one license required
	Central Bank	A Single Bank Supervisory Agency/ Superintendancy	Multiple Bank Supervisory Agencies/Super- intendancies	agency for all of the main financial institutions (insurance companies, contractual savings institutions, savings banks)?	financial	Is there more than one body/agency that grants licenses to banks?	(e.g., one for each banking activity, such as commercial banking, securities operations, insurance, etc.)?
Argentina	Yes	Yes	No	No	Yes	No	No
Australia	No	Yes	No	Yes	No	No	Yes
Brazil	Yes	No	No	No	No	No	No
Canada	No	Yes	No	No	No	No	Yes
China	No	Yes	No	No	Yes	No	Yes
France	No	Yes	No	No	Yes	No	Yes
Germany	Yes	Yes	No	Yes	Yes	No	No
India	Yes	No	No	No	No	No	Yes
Indonesia	Yes	No	No	No	No	No	Yes
Italy	Yes	No	No	No	No	No	Yes
Japan	No	Yes	No	Yes	Yes	No	No
Mexico	No	Yes	No	No	Yes	Yes	No
Russia	Yes	No	No	No	No	Yes	Yes
Saudi Arabia	Yes	No	Yes	No	No	No	No
South Africa	Yes	No	No	No	Yes	No	No
South Korea	Yes	No	Yes	No	n/a	No	Yes
Turkey	No	Yes	No	No	No	No	No
United Kingdom	No	No	No	Yes	Yes	No	No
United States	Yes	No	Yes	No	No	Yes	No
All countries	82 Yes, 58 No	68 Yes, 72 No	9 Yes, 131 No	44 Yes, 96 No	84 Yes, 52 No	9 Yes, 134 No	67 Yes, 76 No

Is the Central Bank a Supervisory Authority?



Who Funds Supervision in Countries?



The U.S. Regulatory Regime: Multiple, Overlapping, Inconsistent and Costly Regulation

Justice Department

 Assesses effects of mergers and acquisitions on competition

Financial, bank and thrift holding companies

- Fed
- OTS

Fannie Mae, Freddie Mac, and **Federal Home Loan Banks**

• Federal Housing Finance Agency

Federal courts • Ultimate decider of banking, securities, and insurance products

Fed is the umbrella or consolidated regulator

National banks

State commercial and savings banks Federal savings banks

Insurance companies

Securities brokers/dealers Other financial companies, including mortgage

Primary/ secondary functional regulator

- OCC • FDIC
- State bank regulators
- FDIC
- Fed--state member commercial banks
- OTS • FDIC
- 50 State insurance regulators plus **District of Columbia** and Puerto Rico
- FINRA
- SEC
- CFTC
- State securities regulators
- companies and brokers
- Fed
- State licensing (if needed)
- U.S. Treasury for some products

Federal branch

- OCC
- Host county regulator

Foreign branch

- Fed
- Host county regulator

Limited foreign branch

- OTS
- Host county regulator

Notes:

Justice Department: Assesses effects of mergers and acquisitions on competition Federal Courts: Ultimate decider of banking, securities, and insurance products

CFTC: Commodity Futures Trading Commission

FDIC: Federal Deposit Insurance Corporation

Fed: Federal Reserve

FINRA: Financial Industry Regulatory Authority

GSEs: Government Sponsored Enterprises

OCC: Comptroller of the Currency

OTS: Office of Thrift Supervision

SEC: Securities and Exchange Commission

Example 19 Key Issue Number Five What is the current structure of regulation?

Observation

Regulatory structures differ substantially, from one to multiple regulators, with the central bank a regulator in some countries but no others. There is no evidence regarding which structure is best.

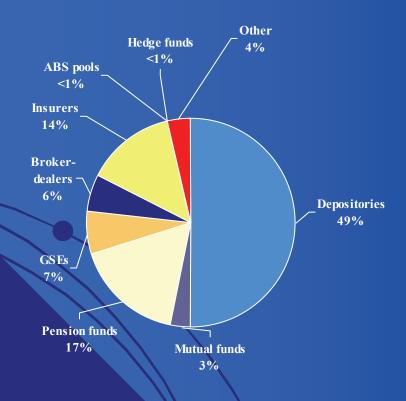
Regulatory Challenge
Reduce barriers to foreign and domestic entry, subject to
only real prudential concerns.

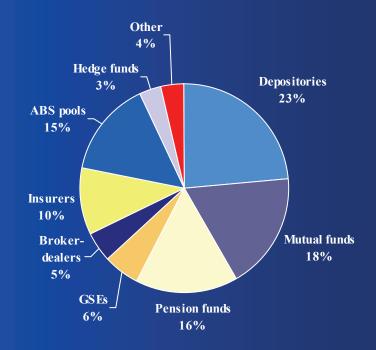
Should supervision be on the basis of separate industries or products/services?

Wide Diversity in Types of U.S. Financial Services Firms

1980, Total = \$4.7 Trillion

2008 Q2, Total = \$61.0 Trillion





Financial Services Firms Compete by Offering Equivalent Products

- Banking vs. Insurance
 - Time deposits vs. fixed annuities
 - Letters of credit vs. surety bonds
- Securities vs. Banking
 - Money market funds vs. demand deposits
 - Medium-term notes and commercial paper vs.
 commercial loans
- Insurance vs. Securities
 - Variable annuities vs. equity mutual funds
 - Reinsurance vs. catastrophe bonds

Innovative Hybrid Products

- Variable-rate CDs: interest rate tied to a specified market index (e.g., S&P 500)
- Security futures
- Home mortgages with "debt cancellation"
- Synthetic collateralized loan obligations

Innovative Un- or Under-Regulated Products

- Over-the-counter derivatives
- Hedge funds
- Stored value cards
- Subprime home mortgages
- Financial guarantees

Over-the-Counter Derivatives

- Banks, insurance companies and securities firms all issue standardized OTC derivative products.
- Derivatives compete with a wide array of regulated banking, insurance and securities products.
- Derivatives are embedded in hybrid products.
- The "on-balance sheet/off-balance sheet" dividing line for regulation is a concern.

Stored Value Cards

- Any type of company can issue stored value cards.
- Originally intended as replacements for paper gift certificates, they have taken on many uses.
- Technology enables credit, debit and stored value accounts on a single chip.

Key Issue Number Six Should supervision be on the basis of separate industries or products/services?

Observation

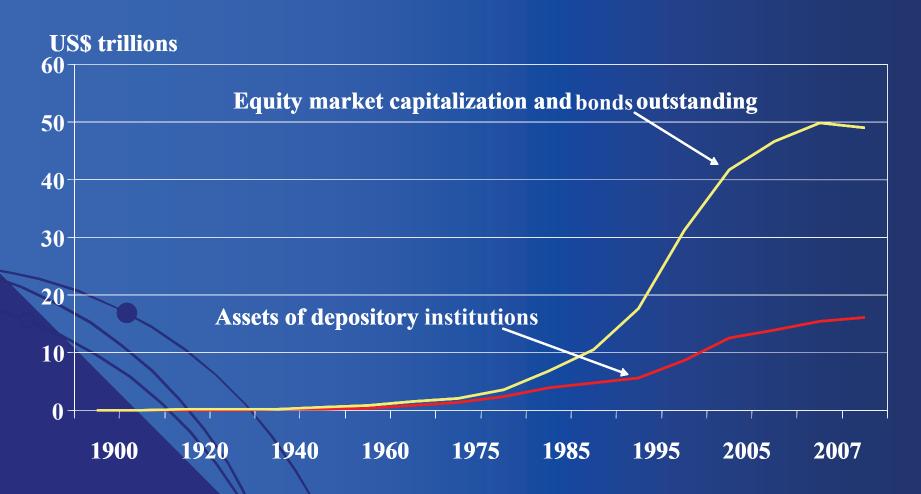
There are a variety of financial services firms, offering a diversity of products, some of which are equivalent, others are hybrid products, and the regulatory treatment of both firms and products is uneven. This contributes to competition and innovation.

Regulatory Challenge
Provide more equal treatment of both firms and products
to promote a level playing field.

How much/what kind of activity is unregulated or lightly regulated?

Federal Reserve Vice Chairman Donald Kohn notes that "Market-intermediated finance also requires us to live with less control and less knowledge that we had when banks were dominant. Greater uncertainty about where risk is lodged is the flip side of better dispersion of those risks, especially to less regulated sectors, and of more resilience of the whole system." (May 16, 2007)

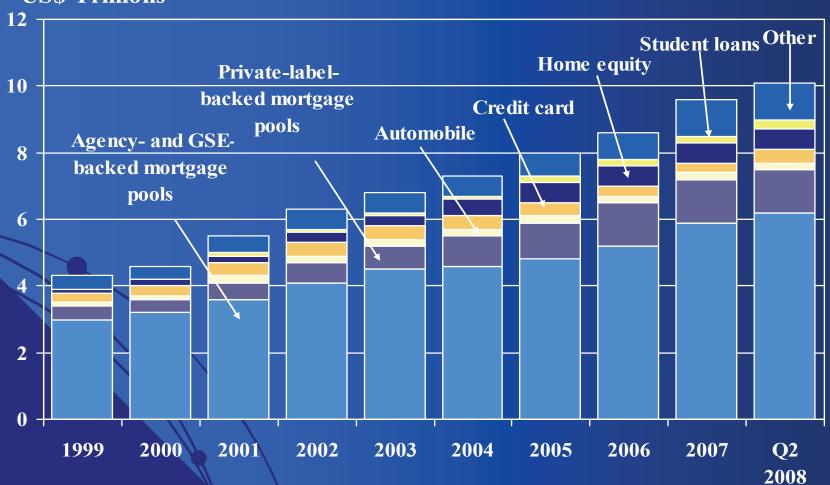
Increasing Reliance on U.S. Securities Markets for Capital Funding and Portfolio Investment: Complements but Also Competes with Traditional Bank Loans and Deposits



Surge in Amount and Diversity of U.S. Asset-Backed Securities Outstanding

Securitization Promotes Credit Intermediation Conducted in Capital Markets Rather than Through Banks

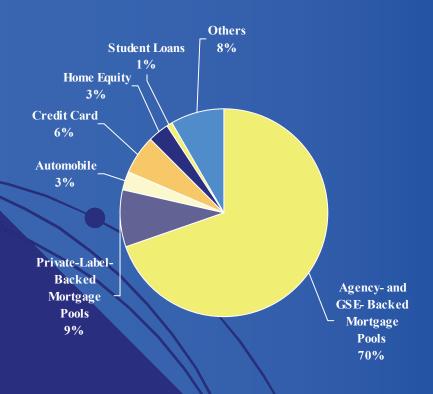


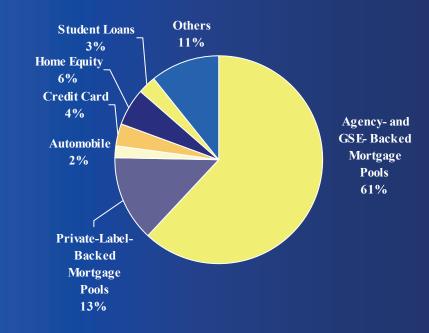


U.S. Asset-Backed Securities Outstanding

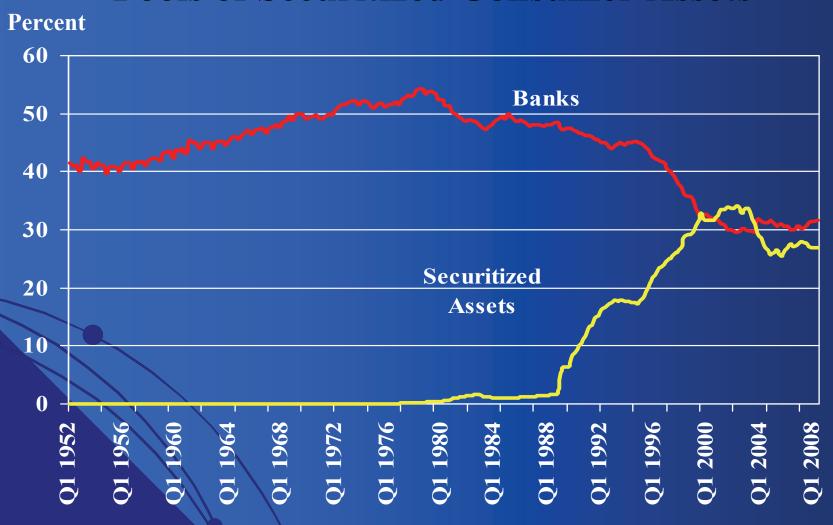
1999, Total = \$4.2 Trillion

2008 Q2, Total = \$10.1 Trillion

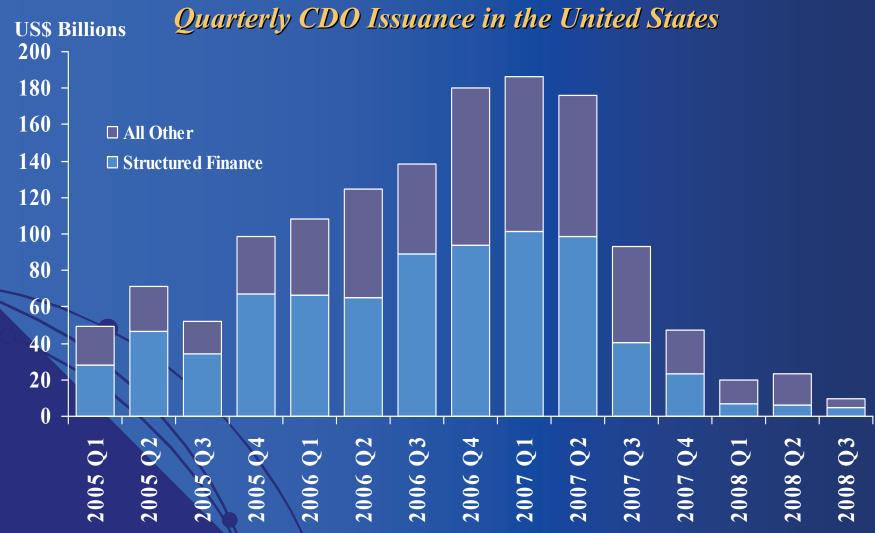




Shares of Consumer Credit: Banks Compared to Pools of Securitized Consumer Assets

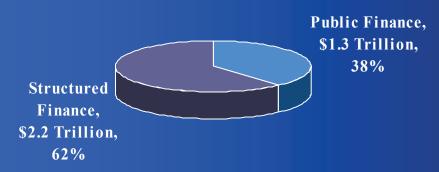


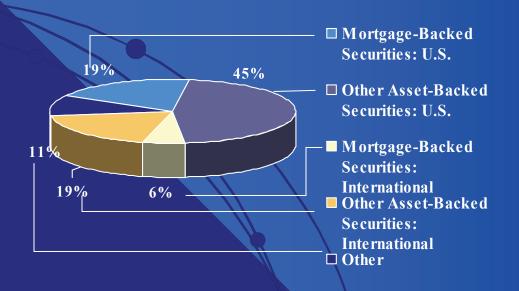
The Growth in Mortgage-Backed Securities Has Contributed to the Rise of Structured Finance Collateral in Collateralized Debt Obligations

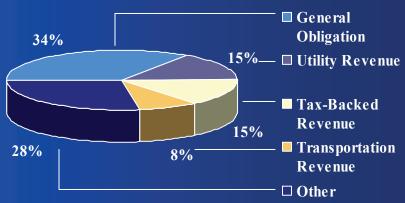


Monoline Insurers Financial Guarantees of Securities Increase, But What Happens If They Cannot be Honored?

Net Par Outstanding = \$3.5 Trillion
December 2006





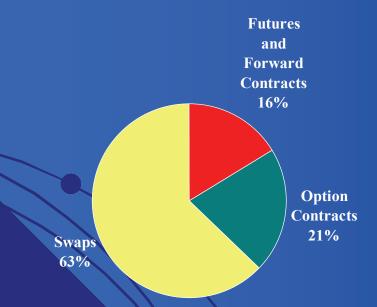


A Regulatory Challenge as Commercial Bank Derivatives Explode

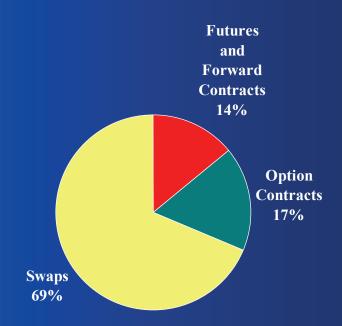
December 2003

Total = \$70.1 Trillion

Credit Derivatives = \$1.0 Trillion

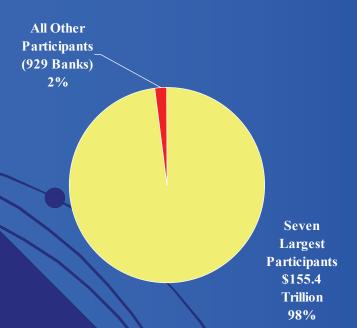


June 2008
Total = \$166.7 Trillion
Credit Derivatives = \$15.5 Trillion

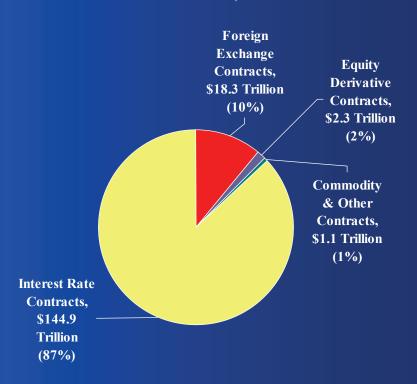


Are the Concentration and Composition of Commercial Bank Derivatives a Concern?

Concentration of Commercial Bank Derivatives September 30, 2007



Composition of Commercial Bank Derivatives
June 30, 2008



EXECUTE: Key Issue Number Seven How much/what kind of activity is unregulated or lightly regulated?

Observation

In some countries, intermediation is increasingly done through the capital markets rather than depository institutions. In addition, many types of bank loans are becoming securitized, involving a wider range of financial players. This reflects a movement towards an originate to distribute, as compared to an originate and hold, model.

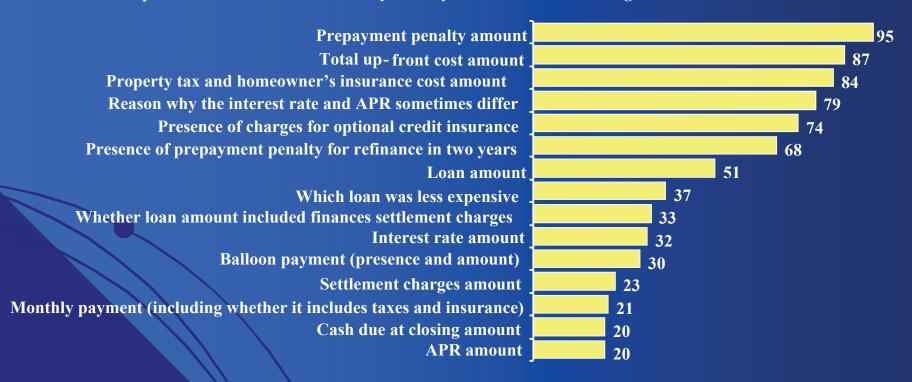
Regulatory Challenge

How can greater attention be paid to off-balance sheet transactions, who should regulate all the different financial players involved, and should greater emphasis be placed on transparency and market discipline?

How can regulation avoid stifling innovation and competition but still promote safety and soundness?

Is adequate Information Disclosed to Consumers?

Percent of respondents who could not correctly identify various loan costs using current disclosure forms



Key Issue Number Eight How can regulation avoid stifling innovation and competition but still promote safety and soundness?

Observation

The United States is in the midst of a subprime mortgage market meltdown, which has spread to other parts of the financial sector, and has exposed gaps in the U.S. regulatory system and market discipline. New risky mortgages were originated and securitized by private agencies, rated and guaranteed by private parties, and sold to investors, with the result being substantial foreclosures and losses.

Regulatory Challenge

Can policymakers in countries adapt regulations and the regulatory structure fast enough to changes in the financial market place? If not, what are reasonable alternatives?

What characteristics of financial sectors promote effective market discipline (adequate disclosure, transparency, reliable outside rating agencies, other)?

Case Study What Works Best for Banks?

Rethinking Bank Regulation: Till Angels Govern, co-authored with Gerard Caprio and Ross Levine, Cambridge University Press, 2006.

What best promotes:

- Bank development
- Efficiency
- Integrity
- Stability
- Bank governance?

Measuring "What Works Best" (Illustrative Proxies)

- Bank development
- Efficiency
 - Net interest margins
 - Overhead costs
 - Valuation of banks
- Integrity of loans (corruption in lending)
- Fragility (Systemic crises)

Findings So Far ...

- Until angels govern, the data suggest ...
 - Avoid relying only on official oversight, restrictions etc.
 - Emphasize private monitoring / incentives
 - Stress Basel II's third pillar (not capital / official oversight)
 - Increases in deposit insurance generosity increase moral hazard and thereby increase fragility
- Supervisors have crucial role
 - Support market discipline, not supplant it
 - Foster / force information disclosure

How Do Countries Choose? "Best practices" depend on political system.

- Open, competitive, democratic institutions:
 - Foster private monitoring, transparency.
 - Are less likely to limit bank entry, activities.
 - Are less likely to have state banks.
- Closed, uncompetitive, autocratic institutions:
 - Do NOT favor transparency.
 - Limit bank entry, activities.
 - Tend to have state banks.

Key Issue Number Nine What characteristics of financial sectors promote effective market discipline (adequate disclosure, transparency, reliable outside rating agencies, other)?

Observation

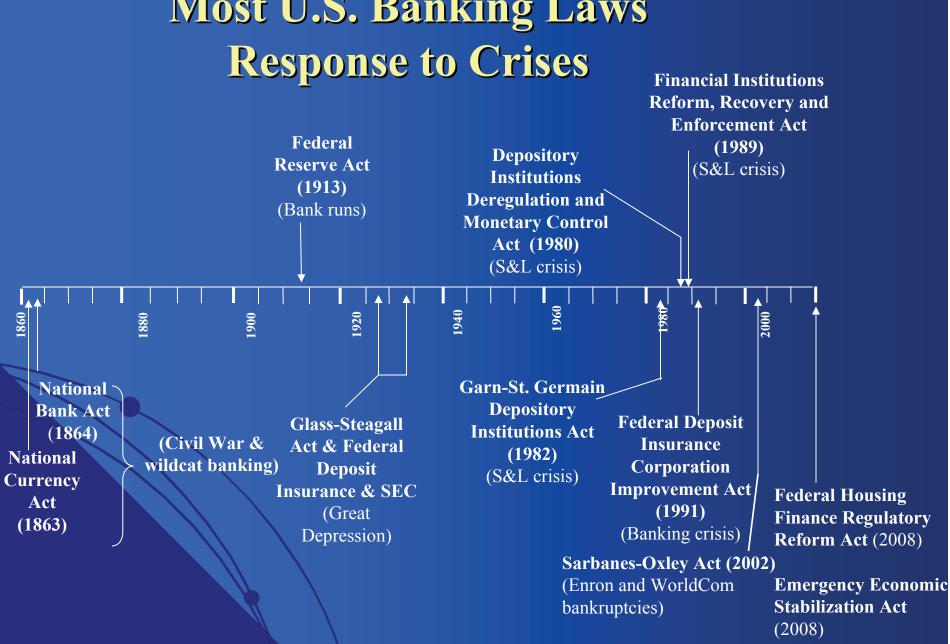
More empirical studies (and more data) are needed.

Regulatory Challenge
Increase receptivity to research and analysis to
complement supervisory experience on the ground.

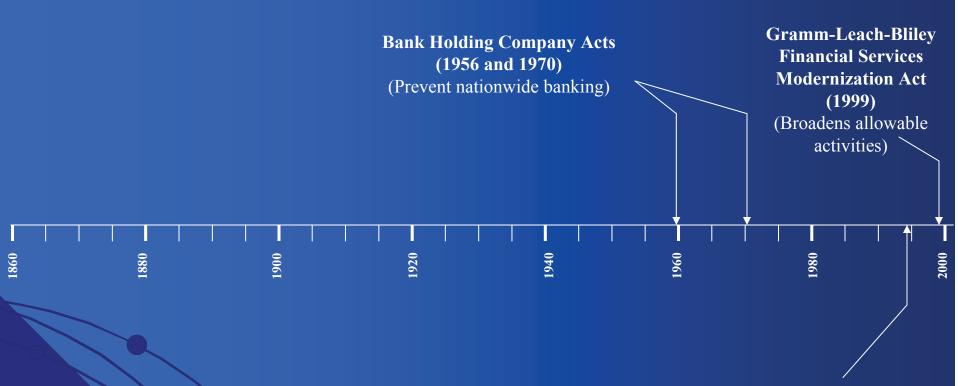
What other goals are there/should there be for regulation (competition, consumer protection, other)?

Case Study Major U.S. Banking Laws **Federal Housing Finance Depository Institutions Deregulation and Monetary Control Act (1980)** Regulatory Reform Act (2008) - Phases out deposit rate ceilings by April 1986 - Allows NOW accounts at all depository **Emergency Economic Stabilization Act** institutions - Allows S&Ls to make consumer loans and issue (2008) **Bank Holding Company Acts** credit cards (1956 and 1970) **Gramm-Leach-Bliley** -BHCs could engage in business deemed to be **Financial Services** "closely related to banking" by the Federal Reserve **Modernization Act (1999)** - Restricted interstate bank ownership - Repeals last vestiges of - Defined a bank the Glass Steagall Act of Federal Reserve Act (1913) 1933 -Furnishes "elastic currency" -Expands the permissible -Establishes the Federal Reserve scope of activities for bank System as the central banking system holding companies and of the U.S. bank subsidiaries 1980 1860 **National Bank Great Depression** Garn-St. Germain Depositary Institutions Act (1982) - SEC Act - Allows possibility interstate and interinstitutional - Federal deposit insurance for banks and S&Ls (1864)mergers -Banking Act of 1933 (Glass-Steagall) separates - Allows S&Ls to make some commercial loans National commercial and investment banking Currency Financial Institutions Reform, Recovery and - Federal Home Loan Bank System Act **Enforcement Act (1989)** (1863)- Changes structure of S&L institution regulation. - Replaces FHLBB with OTS Sarbanes-Oxley Act (2002) - Replaces FSLIC with SAIF -Establishes new or enhanced standards for all **Federal Deposit Insurance Corporation** Office of the Comptroller of the Currency U.S. public company boards, Improvement Act (1991) - Federally chartered banks management, and public -Mandates prompt corrective action - Uniform currency accounting firms. - Tax on state bank notes Riegle-Neil Interstate Banking and Branching Efficiency Act (1994) -BHCs can acquire banks nationwide -Nationwide branching after June, 1997 unless state opts out 76

Most U.S. Banking Laws



Some U.S. Banking Laws Not Crisis Response



Note: Bank acquisitions and mergers are subject to an evaluation of the impact on competition by bank supervisory agencies and the Justice Department. If an increase in concentration is too large, "divestitures" of competing branches may be required.

Riegle-Neil Interstate Banking and Branching Efficiency Act (1994)

(Allows nationwide banking: but acquisitions limited to 10% of nationwide deposits and 30% of individual state deposits)

Example 19.1 What other goals are there/should there be for regulation (competition, consumer protection, other)?

Observation

Regulation typically encompasses safety and soundness, financial stability, market integrity, consumer protection and competition.

Regulatory Challenge
What is the right balance of these different goals? Who should supervise? And are new supervisory mechanisms necessary?