Top Incomes throughout the Great Recession

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December 2012

INTRODUCTION

Free market economies generate substantial inequality

$\Rightarrow$ Main criticism of capitalism

Issue of inequality becomes particularly acute when economic growth slows down such as during recent Great Recession

Raises 2 important issues for economists:

1) Measuring and understanding inequality: What is the level of inequality? How does it change overtime? What factors drive inequality?

2) Should the government reduce inequality using redistributive policies such as taxes, transfer programs, and other regulations?

TOP INCOME SHARES

Simple way to measure inequality: what share of total **pre-tax market income** goes to the top 10%, top 1%, etc.

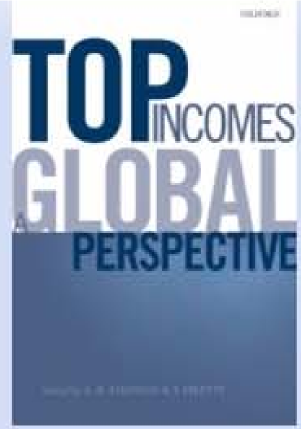
Income tax statistics are a valuable resource to construct such inequality series over long time periods and across countries [best source for top incomes]

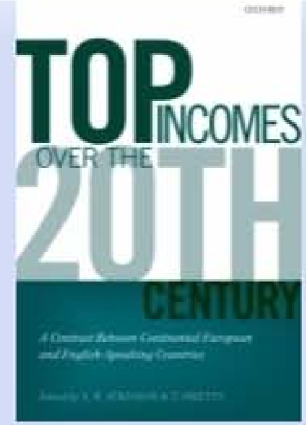
Piketty and Saez (2003) have analyzed US since 1913

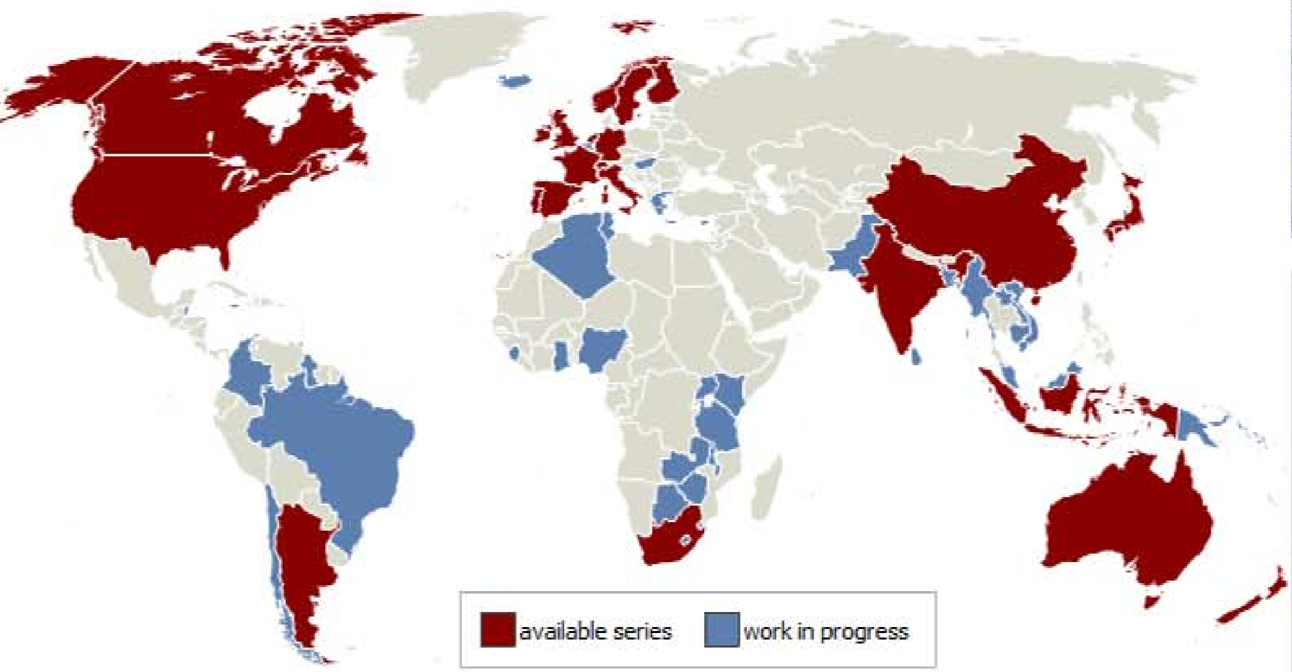
Over 25 countries have now been analyzed

Studies summarized in Atkinson-Piketty-Saez JEL'11 and data online in **The World Top Incomes Database**

The Top Incomes Database







PARIS SCHOOL OF ECONOMICS

Institute for New Economic Thinking

Center for Equitable Growth

Institute for Economic Modelling

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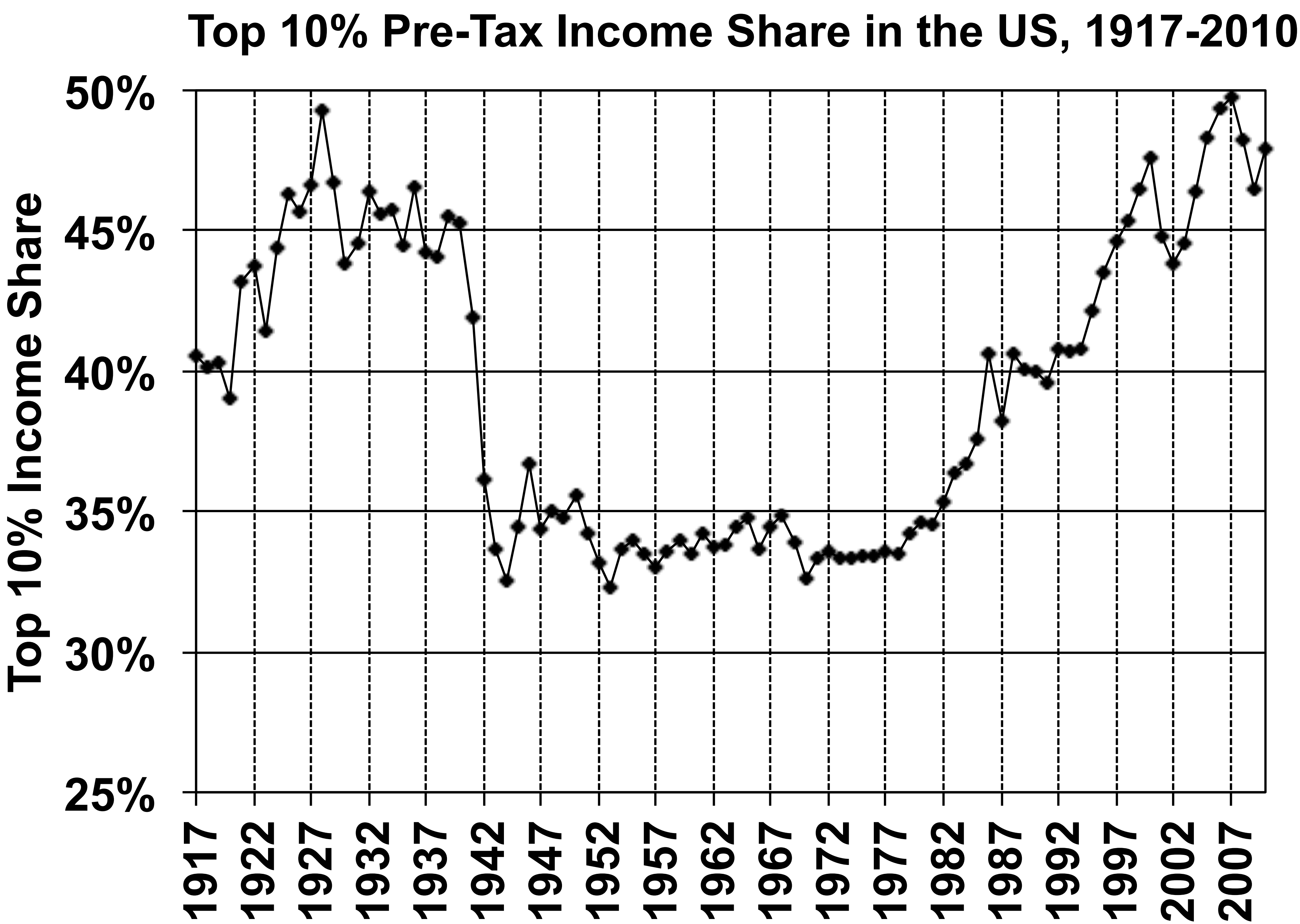
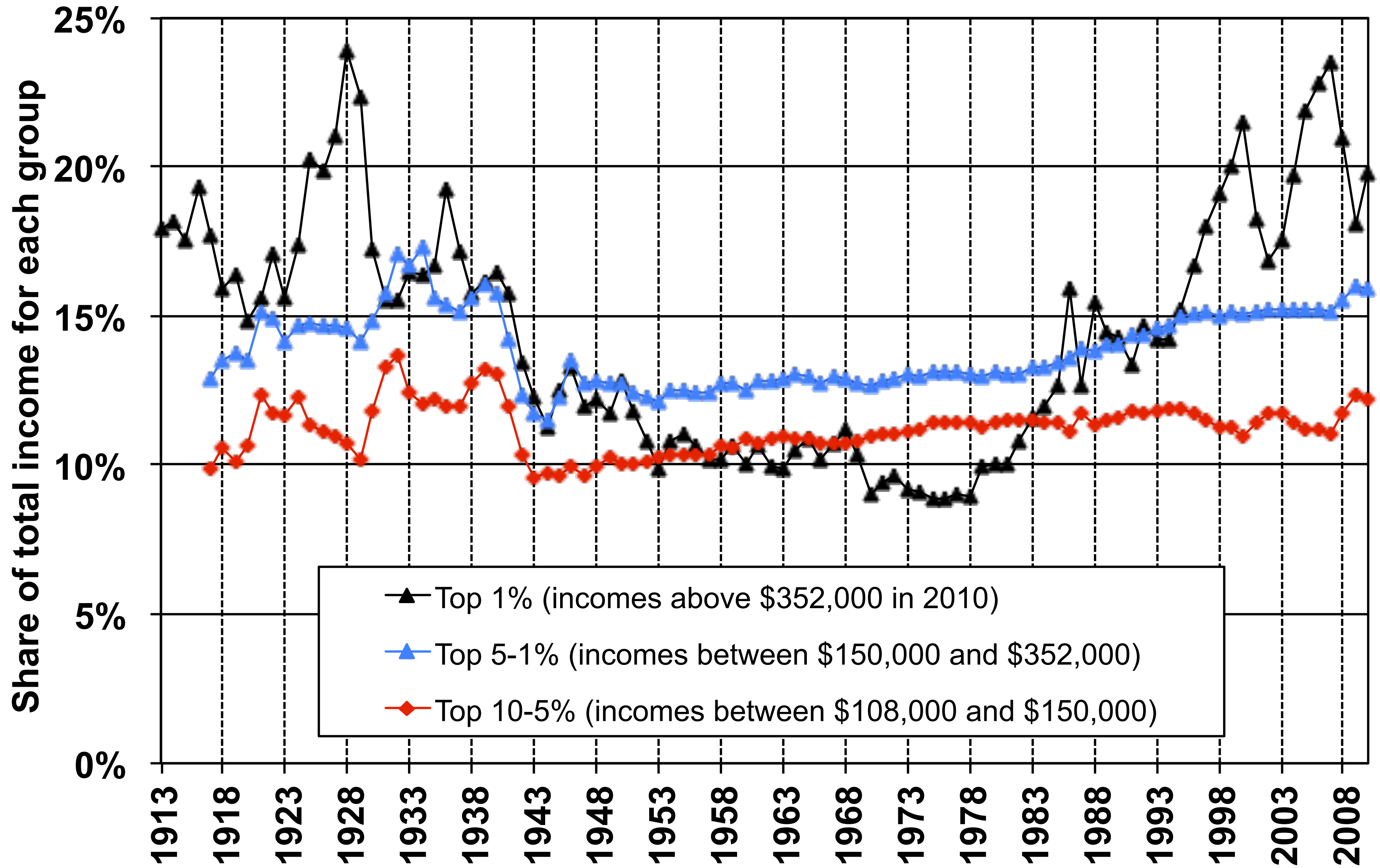


Source: Piketty and Saez, 2003 updated to 2010. Series based on pre-tax cash market income including realized capital gains and excluding government transfers.

Decomposing Top 10% into 3 Groups, 1913-2010



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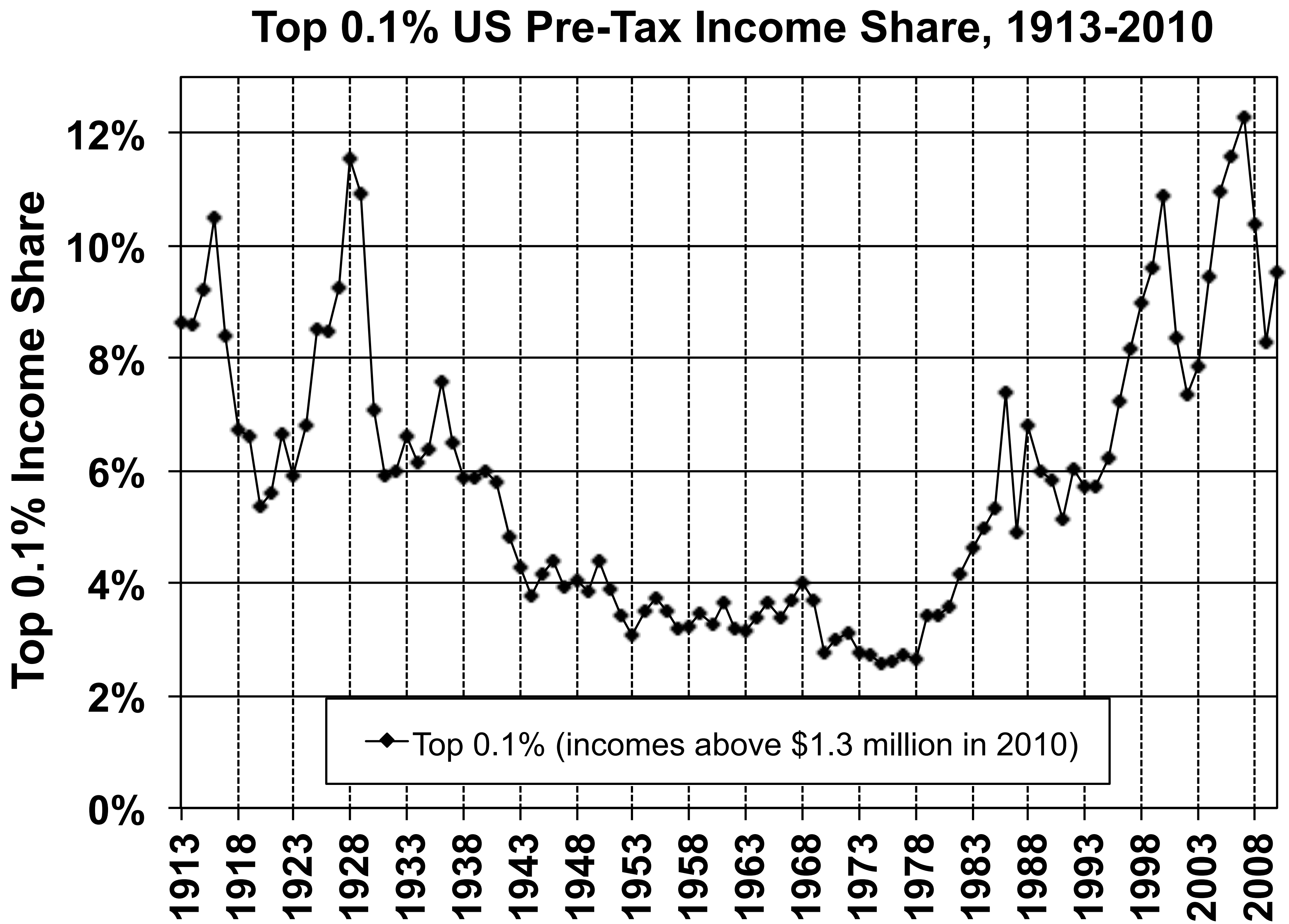


Source: Piketty and Saez, 2003 updated to 2010. Series based on pre-tax cash market income including or excluding realized capital gains, and always excluding government transfers.

WHY DO TOP INCOME SHARES MATTER?

1) Inequality matters because people evaluate their economic well-being relative to others, not in absolute terms

$\Rightarrow$ Public cares about inequality

2) Surge in US top 1% income share so large that income growth of bottom 99% is only half of average income growth

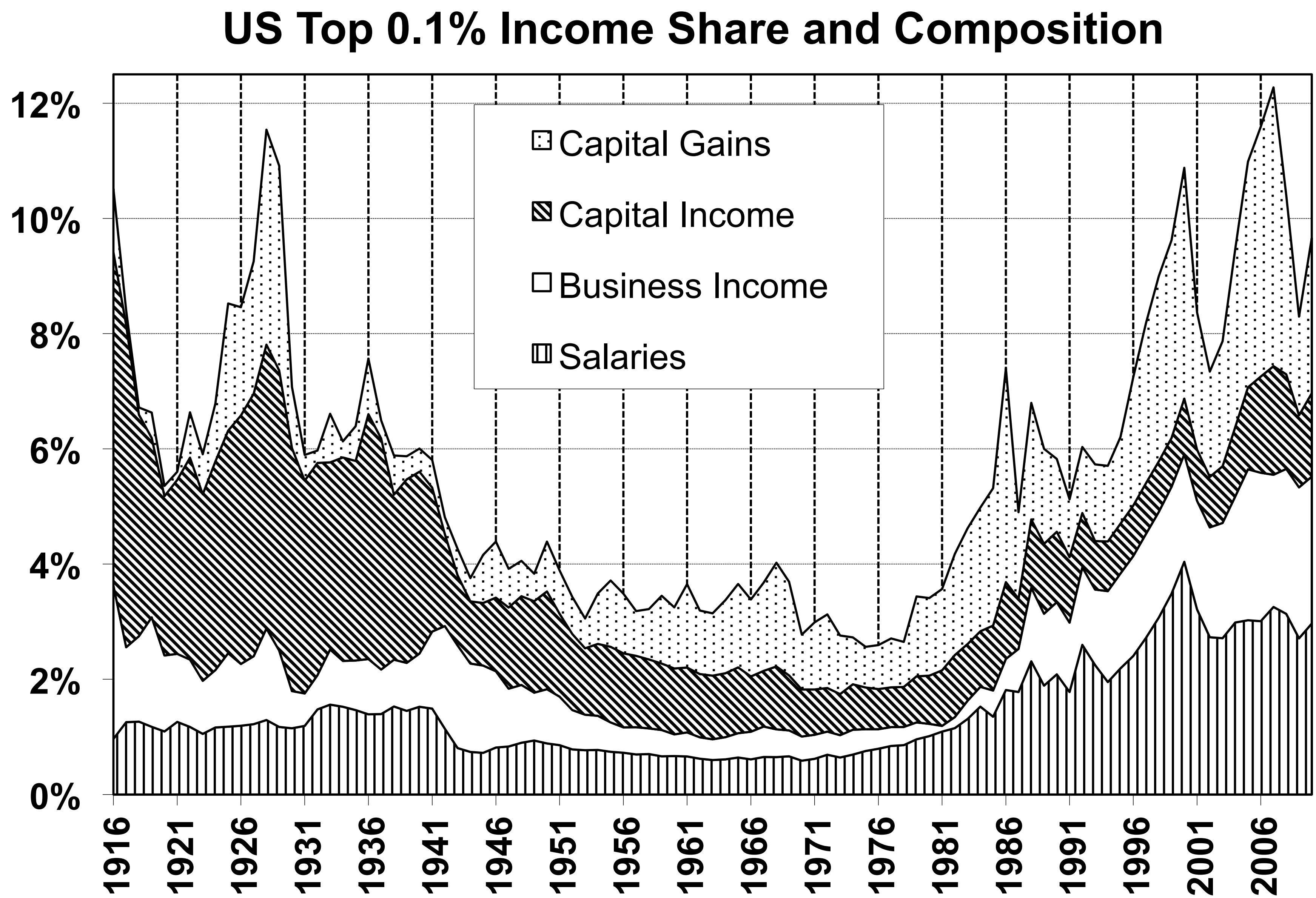
3) Surge in top incomes gives top earners more ability to influence political process (think-tanks, lobbying, campaign funds)

4) Can undermine confidence in economic/political system

Table 1. Real Income Growth by Groups, 1993-2010

	Average Income Real Growth (1)	Top 1% Incomes Real Growth (2)	Bottom 99% Incomes Real Growth (3)	Fraction of total growth (or loss) captured by top 1% (4)
Full period 1993-2010	**13.8%**	**58.0%**	**6.4%**	**52%**
Clinton Expansion 1993-2000	31.5%	98.7%	20.3%	45%
2001 Recession 2000-2002	-11.7%	-30.8%	-6.5%	57%
Bush Expansion 2002-2007	16.1%	61.8%	6.8%	65%
Great Recession 2007-2009	-17.4%	-36.3%	-11.6%	49%
Recovery 2009-2010	2.3%	11.6%	0.2%	93%

Computations based on family market income including realized capital gains (before individual taxes).
Incomes exclude government transfers (such as unemployment insurance and social security) and non-taxable fringe benefits.
Incomes are deflated using the Consumer Price Index.


US Top 0.1% Income Share and Composition
Capital Gains
Capital Income
Business Income
Salaries
12%
10%
8%
6%
4%
2%
0%
1916
1921
1926
1931
1936
1941
1946
1951
1956
1961
1966
1971
1976
1981
1986
1991
1996
2001
2006

SUMMARY OF US RESULTS

1) Dramatic reduction in income concentration during the first part of the 20th century

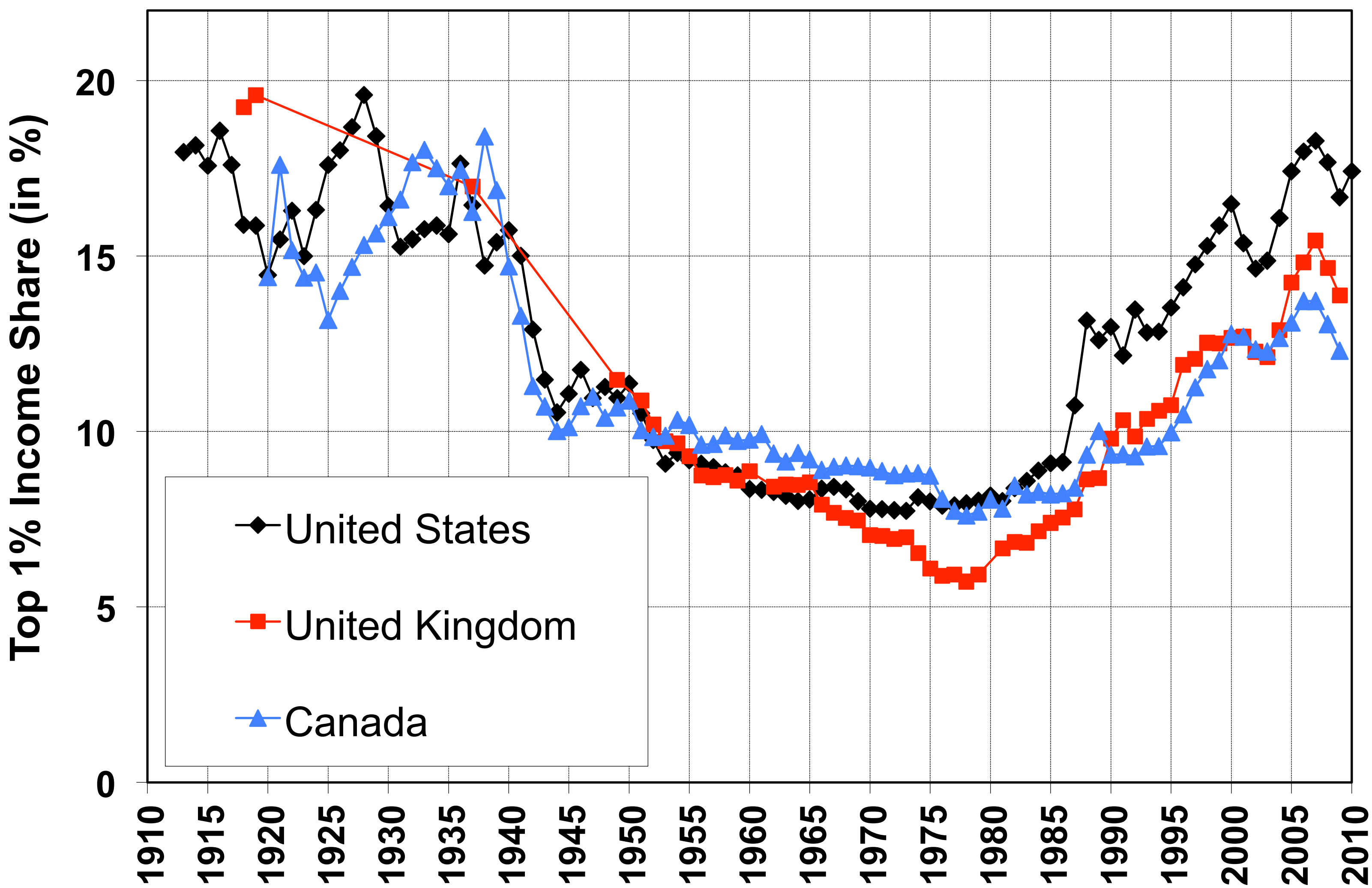
2) No Recovery in the 3 decades following World War II

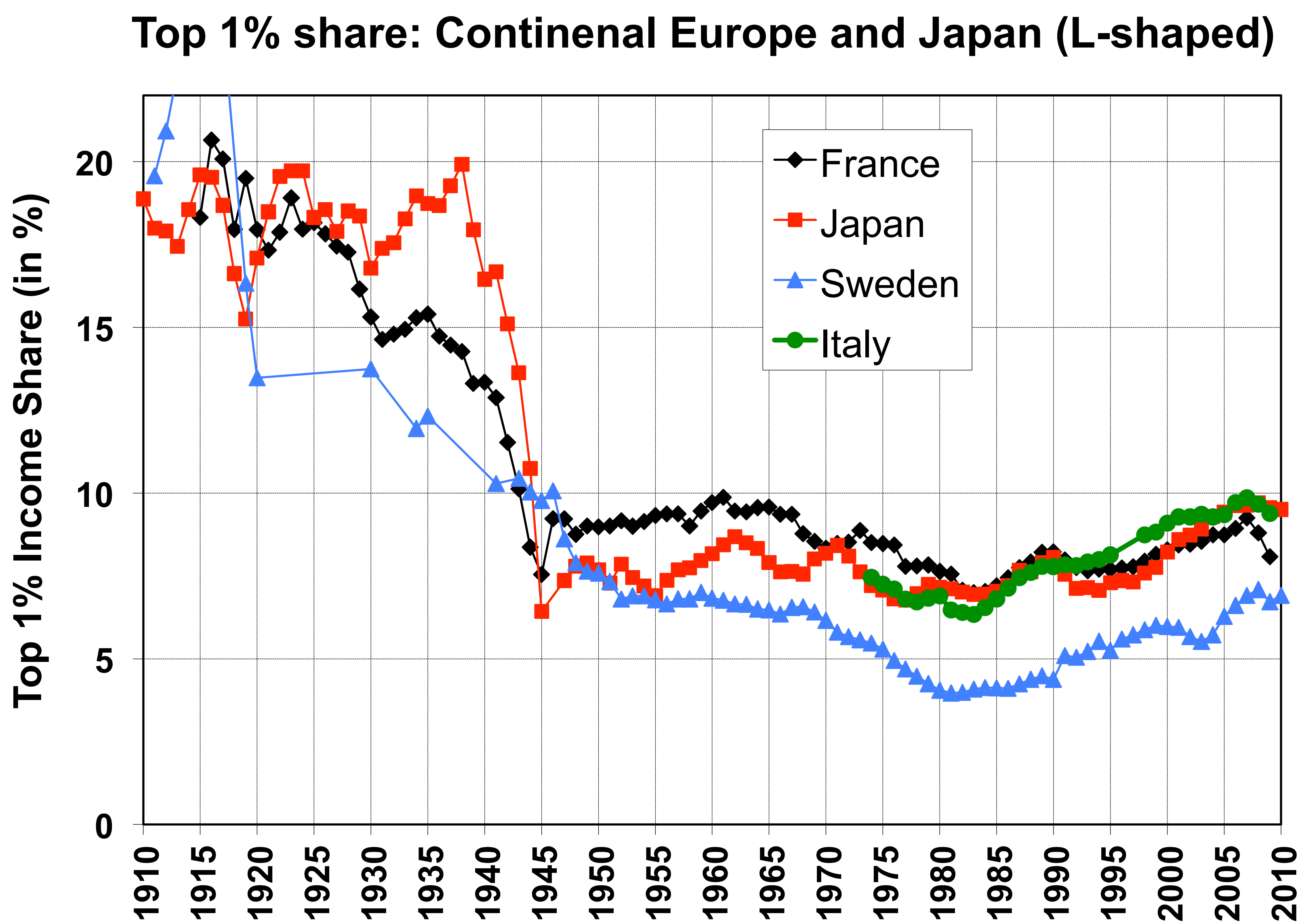
3) Sharp increase in top 1% income share since 1970s

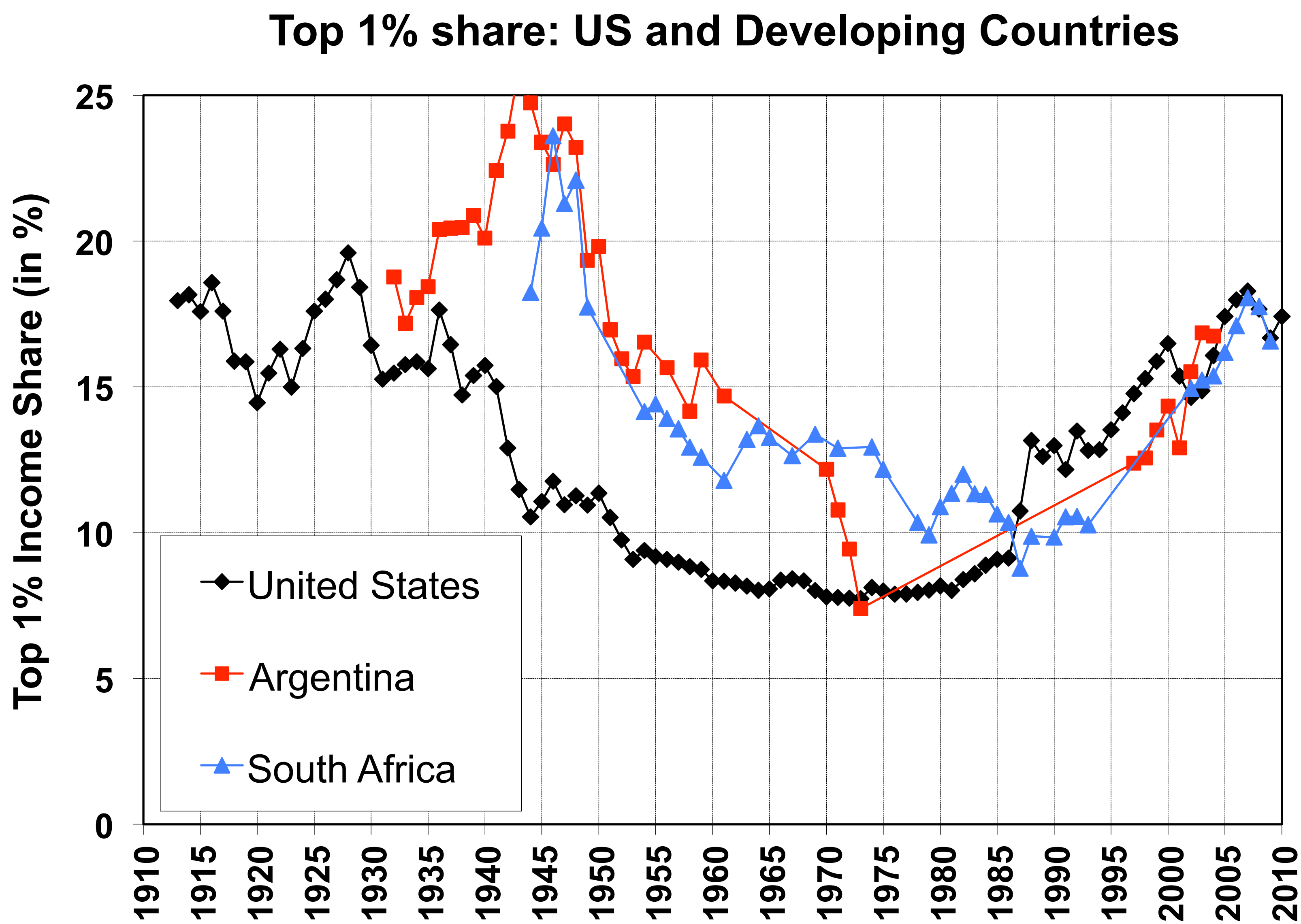
4) Top 1% income share today is similar to top 1% share in 1920s but "working rich" have partly replaced "rentiers"

Let us turn to international evidence

Top 1% share: English Speaking countries (U-shaped)




Top 1% share: Continenal Europe and Japan (L-shaped)
Top 1% Income Share (in %)
0
5
10
15
20
France
Japan
Sweden
Italy
1910
1915
1920
1925
1930
1935
1940
1945
1950
1955
1960
1965
1970
1975
1980
1985
1990
1995
2000
2005
2010



Top 1% share: US and Developing Countries
Top 1% Income Share (in %)
25
20
15
10
5
0
1910
1915
1920
1925
1930
1935
1940
1945
1950
1955
1960
1965
1970
1975
1980
1985
1990
1995
2000
2005
2010
United States
Argentina
South Africa

RESULT 1: DROP IN TOP CAPITAL INCOMES

All advanced countries had very high income concentration one century ago

Most countries experience sharp reduction in income concentration during the first part of the 20th century

1) This is a capital income phenomenon

2) War and depression shocks hit top capital earners (drop follows each country specific history)

3) Government policies–regulations and very progressive income and inheritance taxation–make this drop permanent

Nothing to do with a technology driven Kuznets-curve process

RESULT 2: RECENT SURGE IN TOP INCOMES MAINLY IN ENGLISH SPEAKING COUNTRIES

1) Driven primarily by surge in top **labor** incomes $\Rightarrow$ Difference across countries rules out pure technical change explanation

2) Right-wing view: market for top earners hindered by frictions (regulations, Unions, etc.) which have disappeared in the US, UK, Canada but not Continental Europe and Japan

3) Left-wing view: US top earners have increased their ability to extract rents at the expense of others because policy/regulation changes have favored the rich

TOP US INCOMES IN THE GREAT RECESSION

Top US incomes have become more cyclical since 1970s

1) Short Run: Top 1% income shares have fallen during Great Recession because capital gains, stock-options, business profits collapse (wage earners in P90-99 do well)

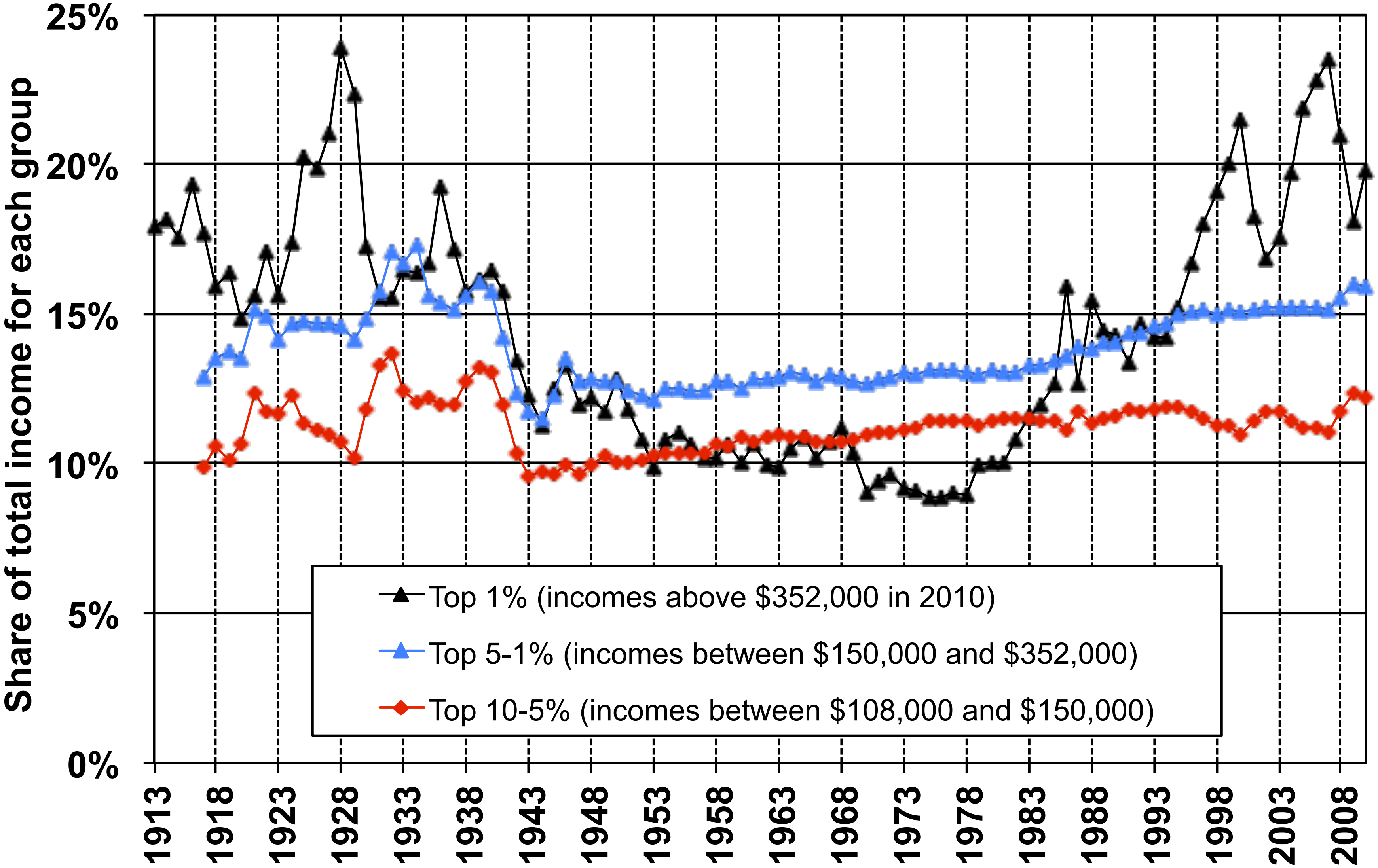
2) Medium Run: Based on historical record

a) Top 1% incomes recover faster than bottom 99% income if there is no drastic change in tax and regulation policies (e.g., '01 recession)

b) Top incomes do not recover after Great Depression because of large tax and regulatory **New Deal** changes

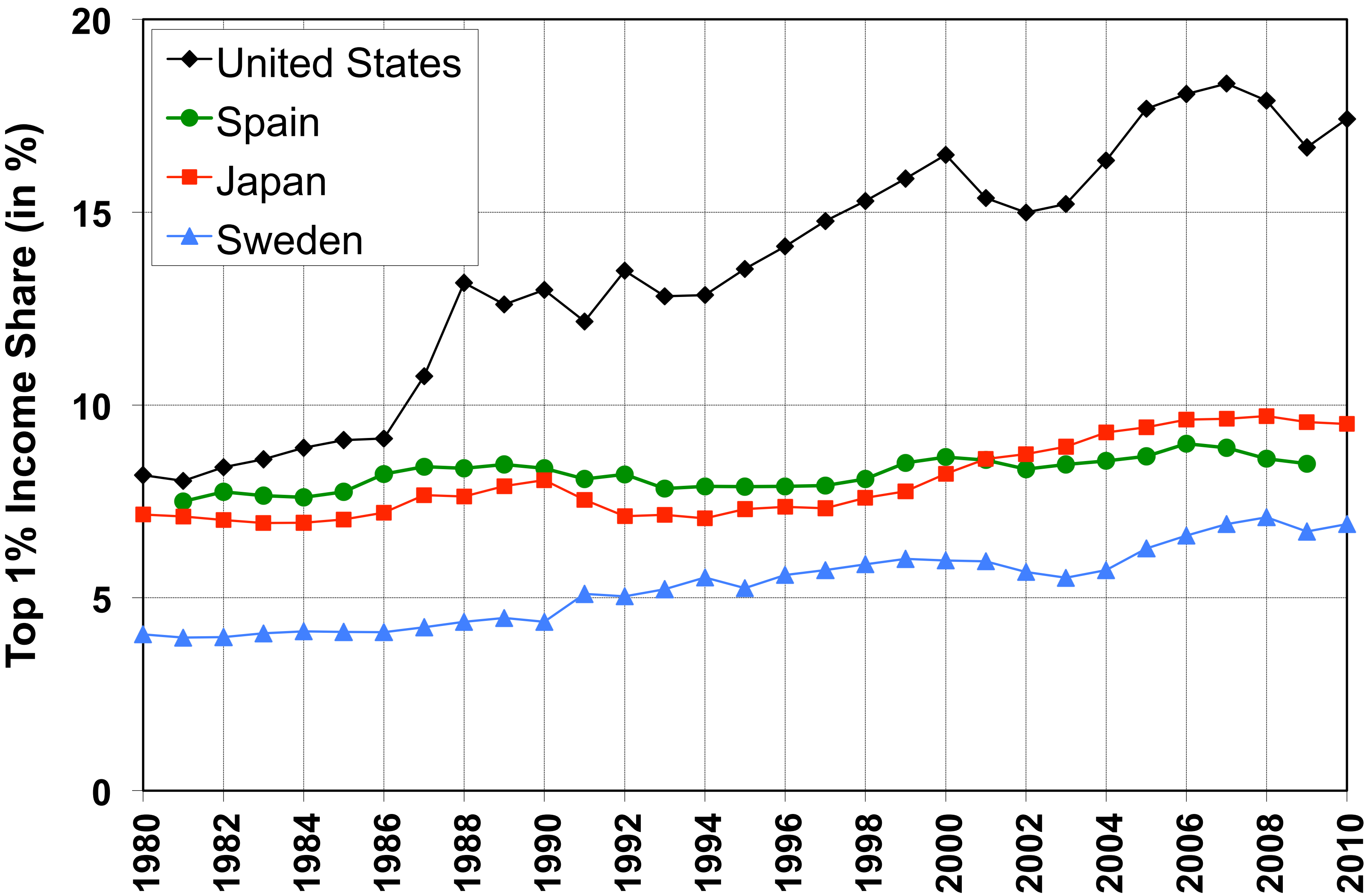
US today seems more in scenario a) than b)

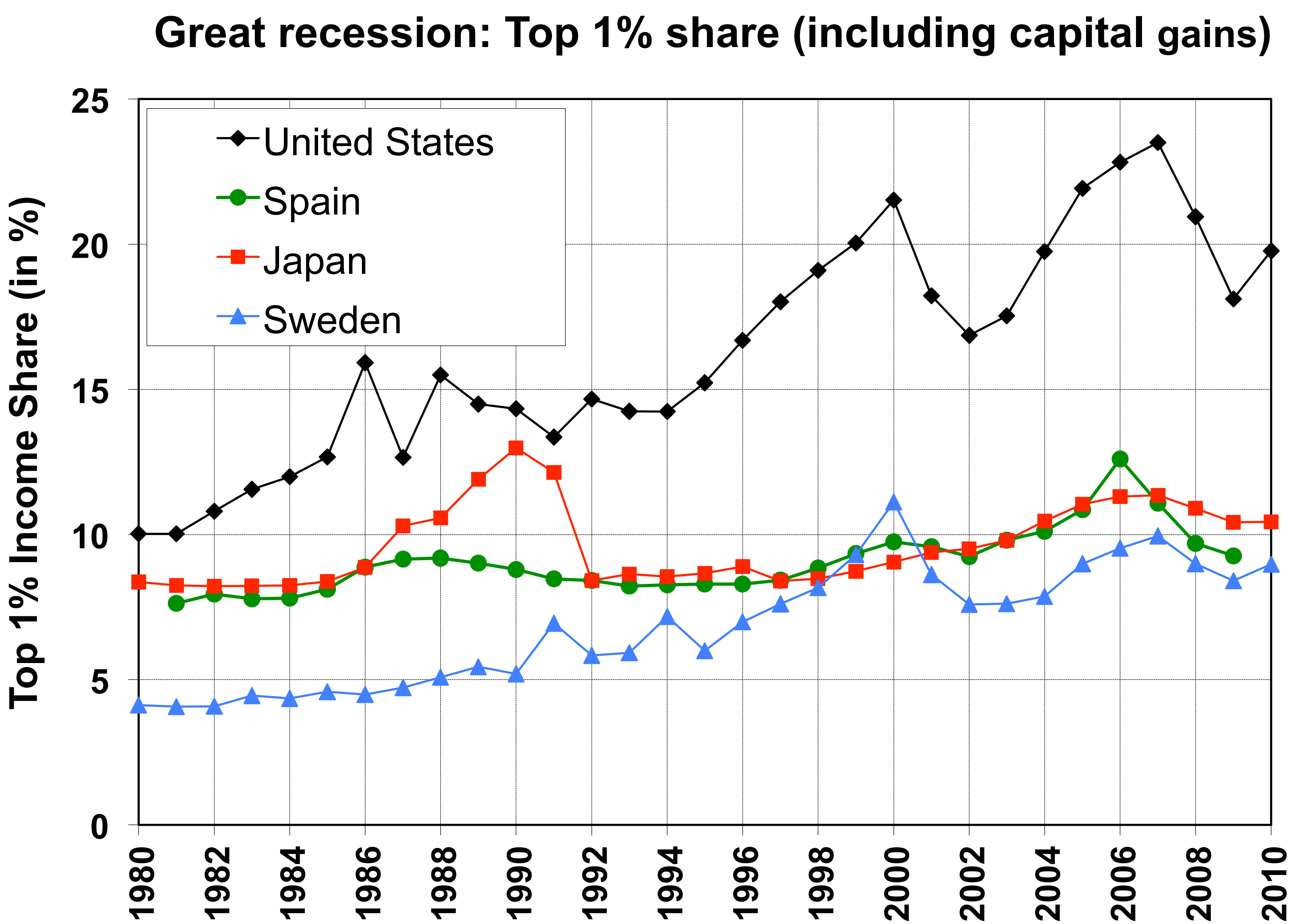
Decomposing Top 10% into 3 Groups, 1913-2010



Source: Piketty and Saez, 2003 updated to 2010. Series based on pre-tax cash market income including realized capital gains and excluding government transfers.

Great recession: Top 1% share (excluding capital gains)




Great recession: Top 1% share (including capital gains)
Top 1% Income Share (in %)
United States
Spain
Japan
Sweden
0
5
10
15
20
25
1980
1982
1984
1986
1988
1990
1992
1994
1996
1998
2000
2002
2004
2006
2008
2010

Top Incomes in Great Recession: International Evidence

1) Top 1% income shares increase before Great Recession especially when including realized capital gains (asset bubbles)

2) Top 1% income shares fall during the recession, especially when including realized capital gains (bubble bursts)

3) Recovery of top 1% income share starts in 2010 for US and Sweden

$\Rightarrow$ Net long-term effect of recent asset bubbles and subsequent financial crises on top incomes seems small

TOP INCOMES AND FINANCIAL CRISES

Two questions than can systematically researched with World Top Income Database using past financial crises :

1) Impact of financial crises/recessions on income concentration

2) Does high income concentration cause financial crises?

Atkinson and Morelli (2011), Morelli (2012), Bordo and Meissner (2012) have done an empirical analysis

TOP INCOMES DURING FINANCIAL CRISES

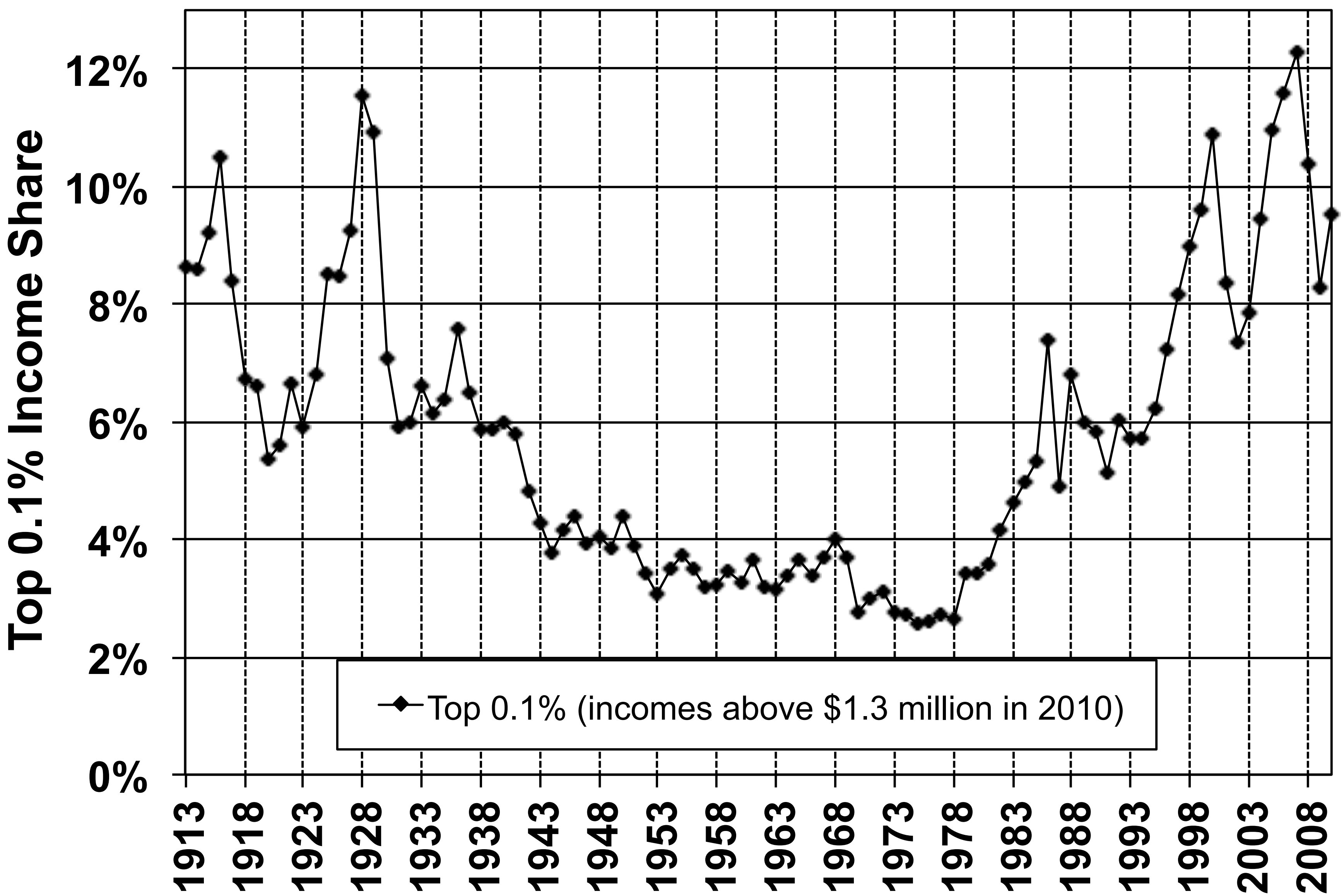
Morelli (2012) uses the World Top Incomes Database to analyze systematically the effects of financial crises on top income shares

1) Financial crises reduce top income shares in OECD countries

2) But drop is fairly small and temporary, top income shares have fully recovered 4 years after the crisis starts

$\Rightarrow$ Top incomes are hit harder by financial crises but recover faster

Top 0.1% US Pre-Tax Income Share, 1913-2010



Source: Piketty and Saez, 2003 updated to 2010. Series based on pre-tax cash market income including or excluding realized capital gains, and always excluding government transfers.

DOES INEQUALITY CAUSE FINANCIAL CRISES?

Highest peaks of US income concentration are 1928 and 2007 just before the Great Depression and Great Recession

Deepest economic crises often triggered by bursting of bubbles (stock crash in 1929, real estate crash in 2007) $\Rightarrow$ Brings down financial system and propagates internationally

But international financial crash ends up hurting many countries: In 2008, Europe/Japan were not protected by their lower income concentration

Atkinson and Morelli (2011), Bordo and Meissner (2012) do not find systematic link bt rising inequality and financial crises

$\Rightarrow$ Financial crises have long-run effects only if they trigger permanent regulatory or tax policy response

TOP INCOMES AND TAXES

Big US policy debate on whether top tax rates should increase

Pre-tax top US incomes have surged in recent decades: top 1% income share increased from 9% in 1970 to 20% today

In 2010, top 1% income earners paid average Federal individual tax rate of 22% = 2.6 GDP points

Increasing the Federal individual tax rate on top 1% from 22% to 33% would raise revenue by 1.3 GDP points = $200bn/year [absent behavioral responses]

Obama's plan increases top earners tax by 1 GDP point

$\Rightarrow$ Top 1% has large potential tax capacity but higher taxes on top 1% might discourage economic activity / encourage tax avoidance

ECONOMIC EFFECTS OF TAXING THE TOP 1%

Strong empirical evidence that **pre-tax** top incomes are affected by top tax rates

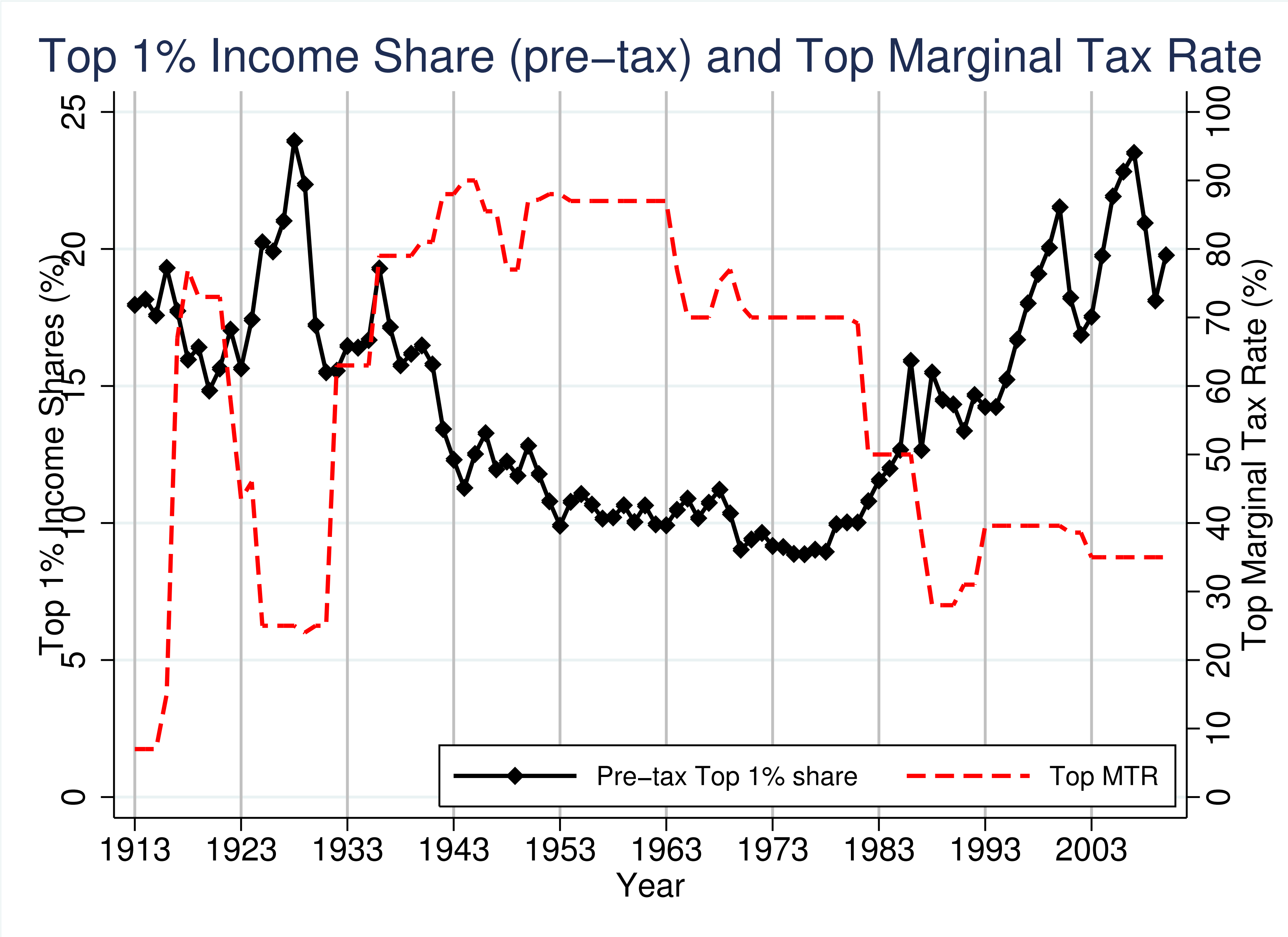
3 potential scenarios with very different policy consequences

1) Supply-Side: Top earners work less and earn less when top tax rate increases $\Rightarrow$ Top tax rates should not be too high

2) Tax Avoidance/Evasion: Top earners avoid/evade more when top tax rate increases

$\Rightarrow$ a) Eliminate loopholes, b) Then increase top tax rates

3) Rent-seeking: Top earners extract more pay (at the expense of the 99%) when top tax rates are low $\Rightarrow$ High top tax rates are desirable


Top 1% Income Share (pre−tax) and Top Marginal Tax Rate
Top 1% Income Shares (%)
Top Marginal Tax Rate (%)
0
5
10
15
20
25
0
10
20
30
40
50
60
70
80
90
100
1913
1923
1933
1943
1953
1963
1973
1983
1993
2003
Year
Pre−tax Top 1% share
Top MTR

Supply-side, Tax Avoidance, or Rent-Seeking?

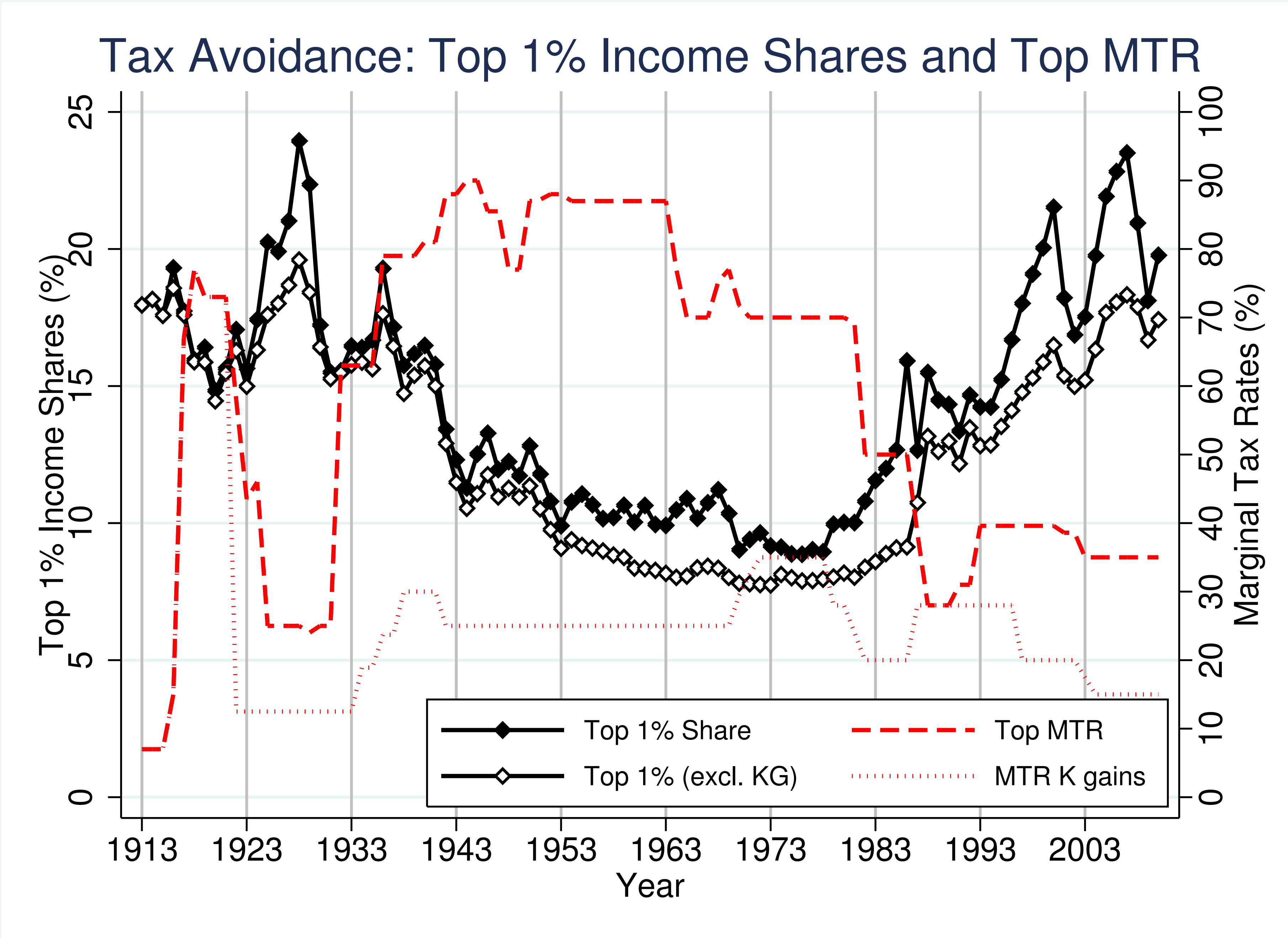
Strong correlation between **pre-tax** top incomes and top tax rates

1) If tax avoidance, correlation should be much stronger when using narrow taxable income definition than when using comprehensive income definition

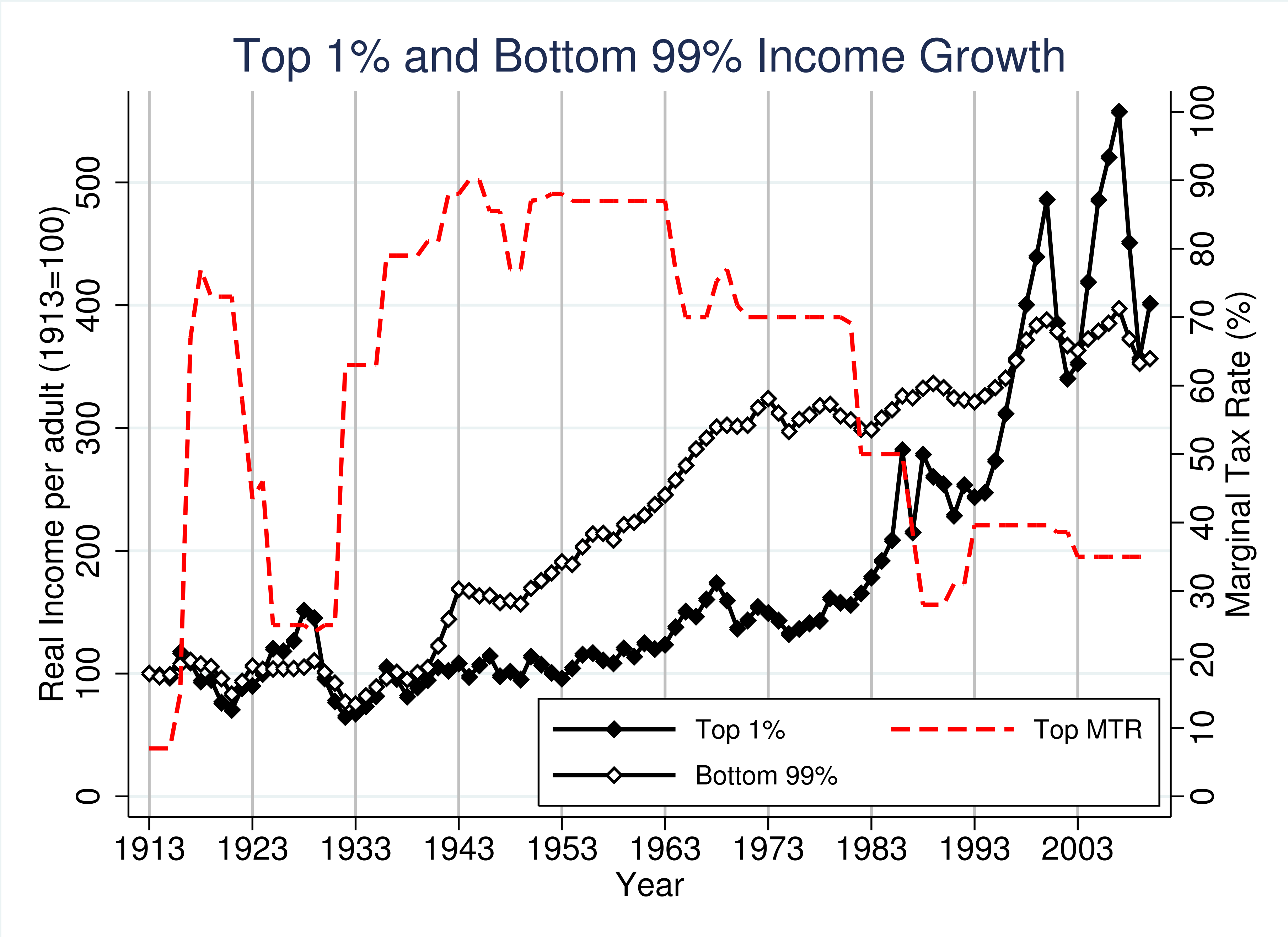
Empirical correlation is very similar ruling out the tax avoidance scenario

2) If rent-seeking: growth in top 1% incomes should come at the expense of bottom 99% (and conversely)

In the US, top 1% incomes grow slowly from 1933 to 1975 and fast afterwards. Bottom 99% incomes grow fast from 1933 to 1975 and slowly afterwards $\Rightarrow$ Suggestive of rent-seeking effects



Tax Avoidance: Top 1% Income Shares and Top MTR
Top 1% Income Shares (%)
Marginal Tax Rates (%)
Year
0
5
10
15
20
25
0
10
20
30
40
50
60
70
80
90
100
1913
1923
1933
1943
1953
1963
1973
1983
1993
2003
Top 1% Share
Top 1% (excl. KG)
Top MTR
MTR K gains

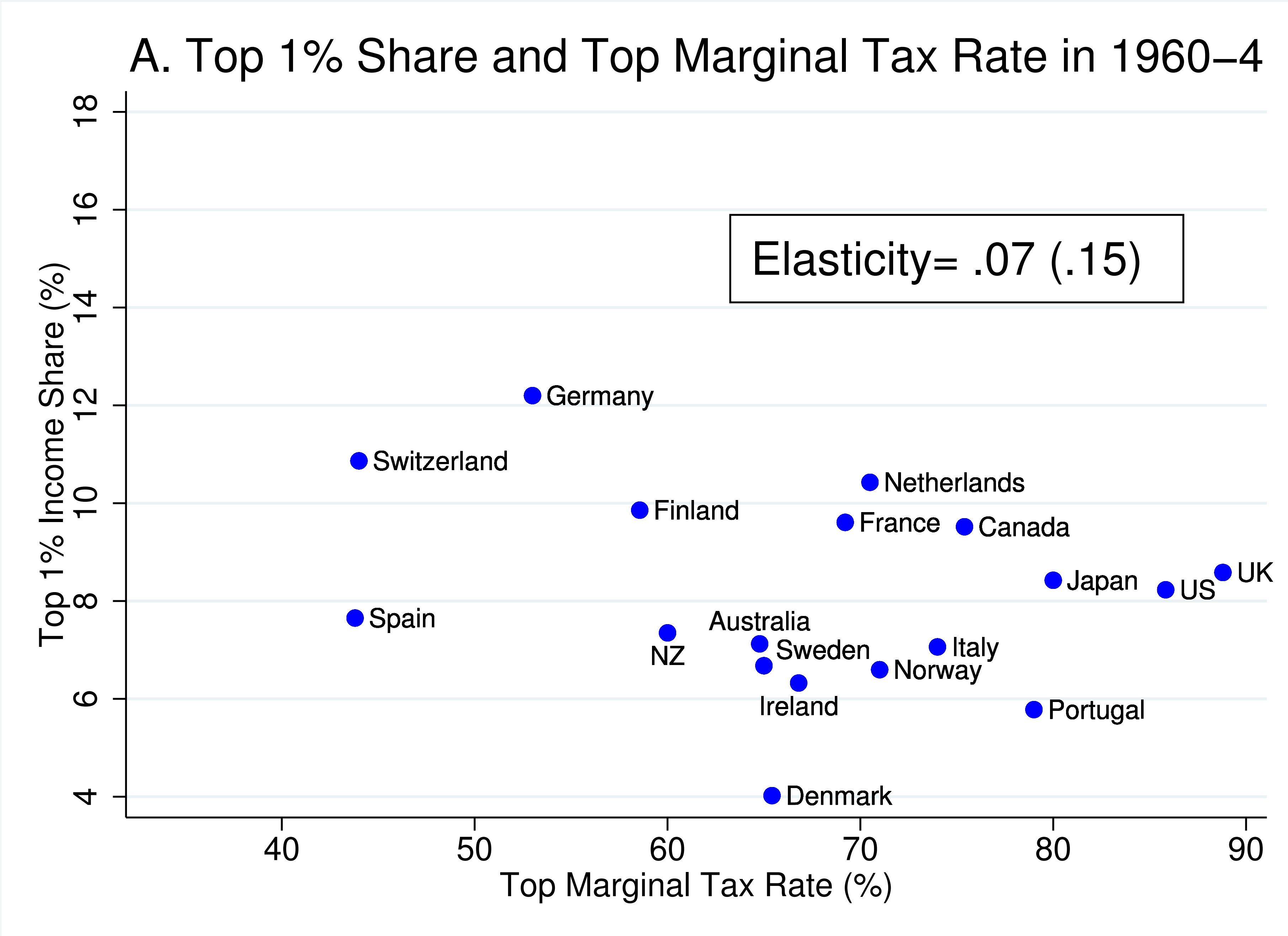

Top 1% and Bottom 99% Income Growth
Real Income per adult (1913=100)
0
100
200
300
400
500
Marginal Tax Rate (%)
0
10
20
30
40
50
60
70
80
90
100
1913
1923
1933
1943
1953
1963
1973
1983
1993
2003
Year
Top 1%
Top MTR
Bottom 99%

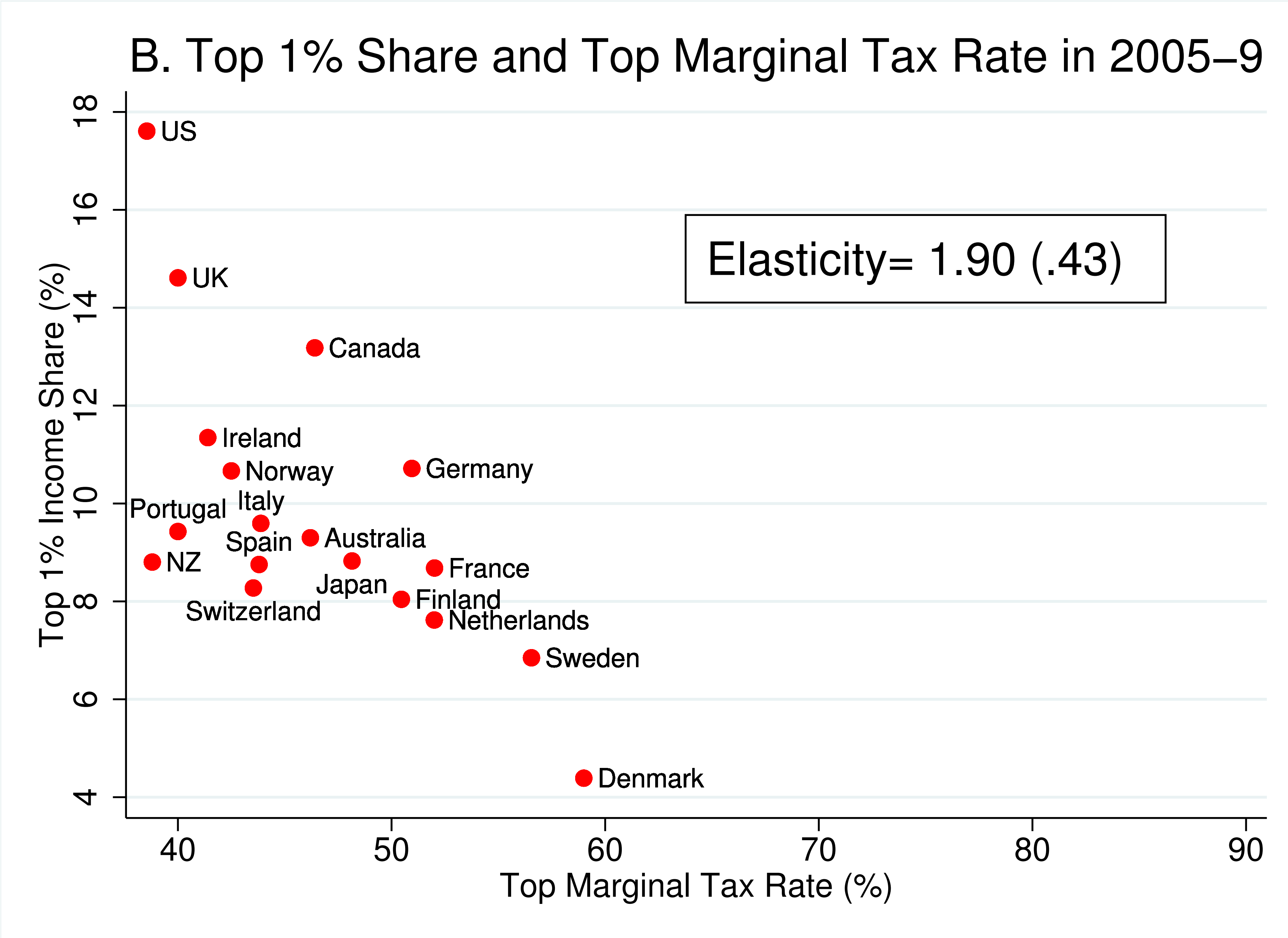
TOP RATES AND TOP INCOMES INTERNATIONAL EVIDENCE

1) Use pre-tax top 1% income share data from 18 OECD countries since 1960 using the **World Top Incomes Database**

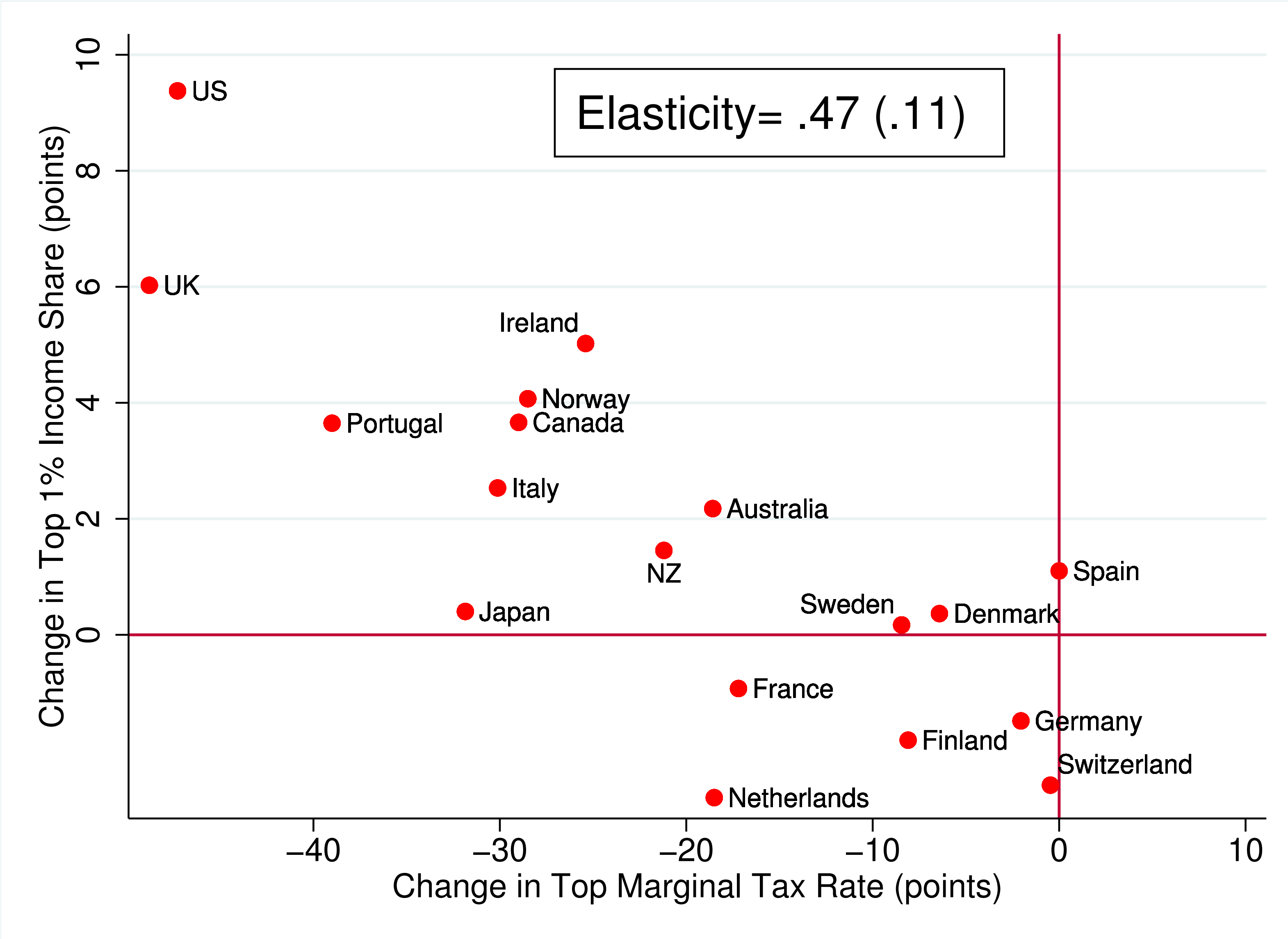
2) Compute top (statutory) individual income tax rates using OECD data [including both central and local income taxes].

Plot top 1% pre-tax income share against top MTR in 1960-4, in 2005-9, and 1960-4 vs. 2005-9


A. Top 1% Share and Top Marginal Tax Rate in 1960–4
Elasticity= .07 (.15)
Top 1% Income Share (%)
18
16
14
12
10
8
6
4
Top Marginal Tax Rate (%)
40
50
60
70
80
90
Germany
Switzerland
Netherlands
Finland
France
Canada
Japan
UK
US
Spain
Australia
NZ
Sweden
Italy
Norway
Ireland
Portugal
Denmark



B. Top 1% Share and Top Marginal Tax Rate in 2005–9
Elasticity= 1.90 (.43)
Top 1% Income Share (%)
Top Marginal Tax Rate (%)
4
6
8
10
12
14
16
18
40
50
60
70
80
90
US
UK
Canada
Ireland
Norway
Germany
Portugal
Italy
Spain
Australia
NZ
France
Japan
Finland
Switzerland
Netherlands
Sweden
Denmark



Change in Top Tax Rate and Top 1% Share, 1960-4 to 2005-9

TOP RATES AND TOP INCOMES EVIDENCE

1) Pre-tax Top income shares have increased significantly in some but not all countries [Atkinson-Piketty-Saez JEL'11]

2) Top tax rates have come down significantly in a number of countries since 1960s

3) Correlation between 1) and 2) is strong but not perfect: lower top tax rates are a necessary but not sufficient condition for surge in top incomes

$\Rightarrow$ Total elasticity is large but could be a mix of real effects, avoidance effects, or bargaining effects

DOES THE 1% GAIN AT THE EXPENSE OF 99%?

Tea Party Scenario: Top Pay $<$ productivity

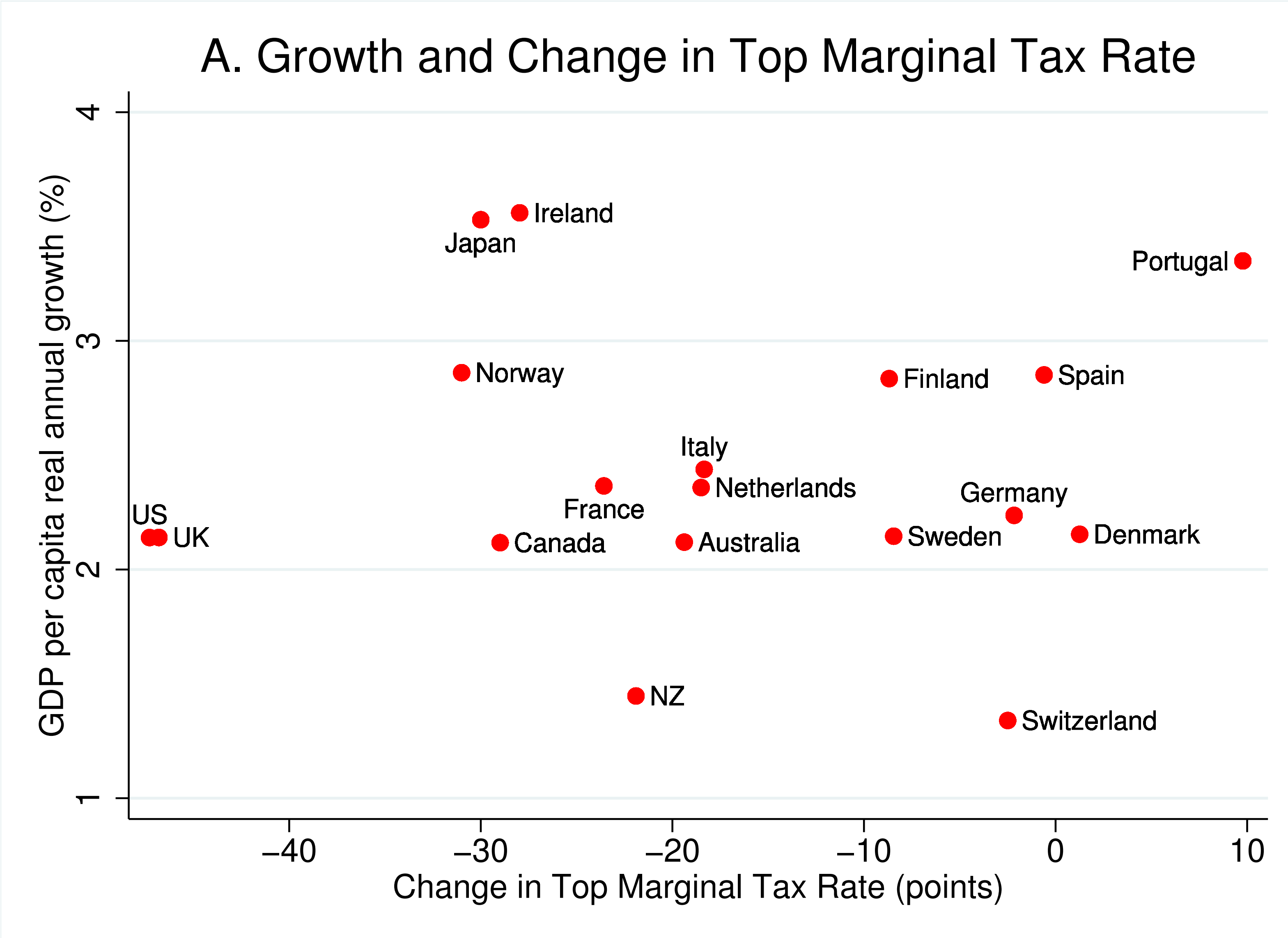
Lower top tax rates $\Rightarrow$ more economic activity among upper incomes benefits broader economy (job creators)

$\Rightarrow$ Surge in top income shares should come with more economic growth $\Rightarrow$ Low top tax rates are desirable

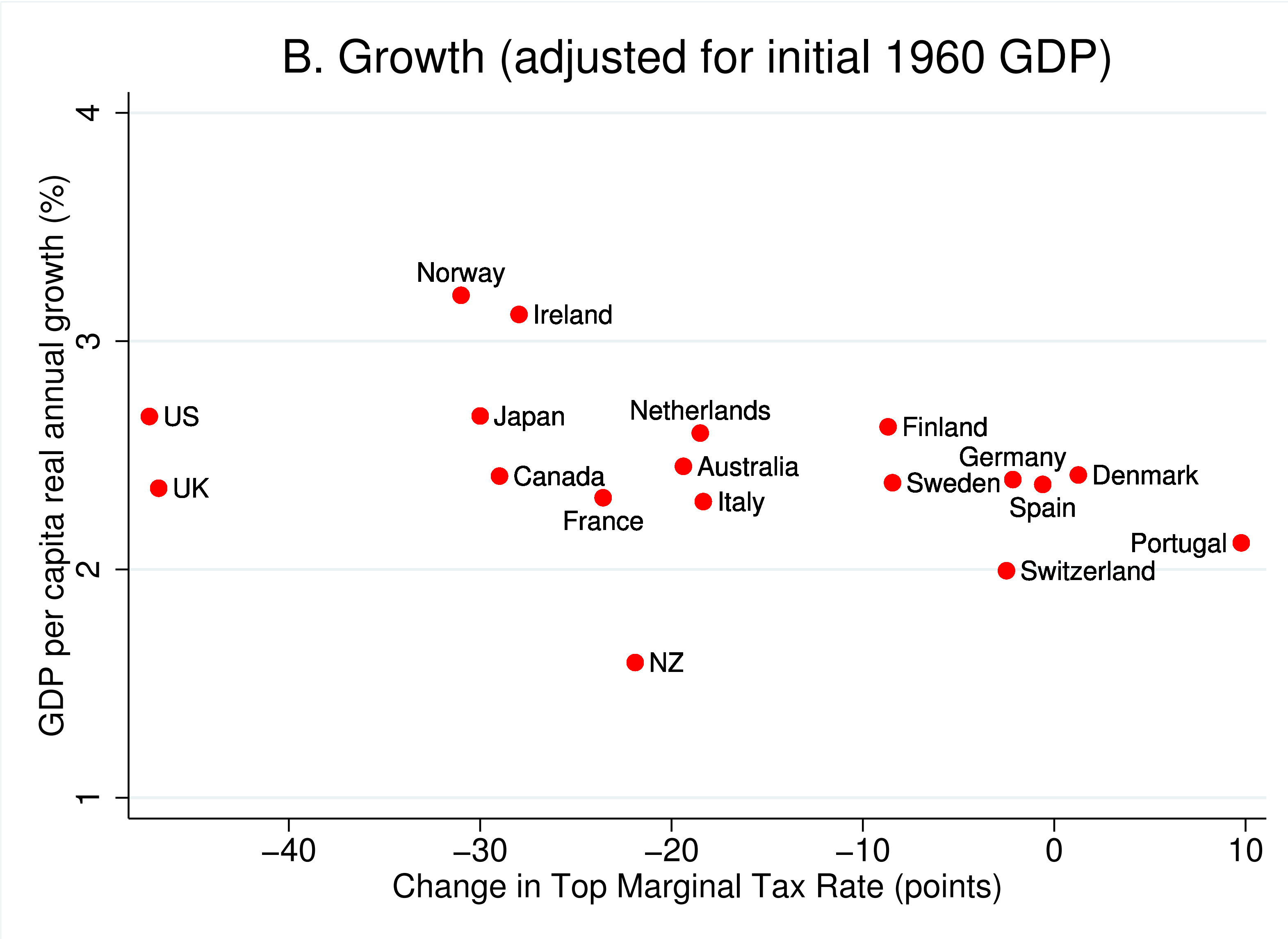
Occupy Wall Street Scenario: Top Pay $>$ productivity

Lower top tax rates $\Rightarrow$ Upper incomes extract more compensation at the expense of others

$\Rightarrow$ Surge in top income shares should not be associated with more economic growth $\Rightarrow$ High top tax rates are desirable



Change in Top Tax Rate and GDP per capita growth since 1960



Change in Top Tax Rate and GDP per capita growth since 1960

POLICY CONCLUSIONS

1) US historical evidence and international evidence shows that policy plays a key role in the shaping the income gap

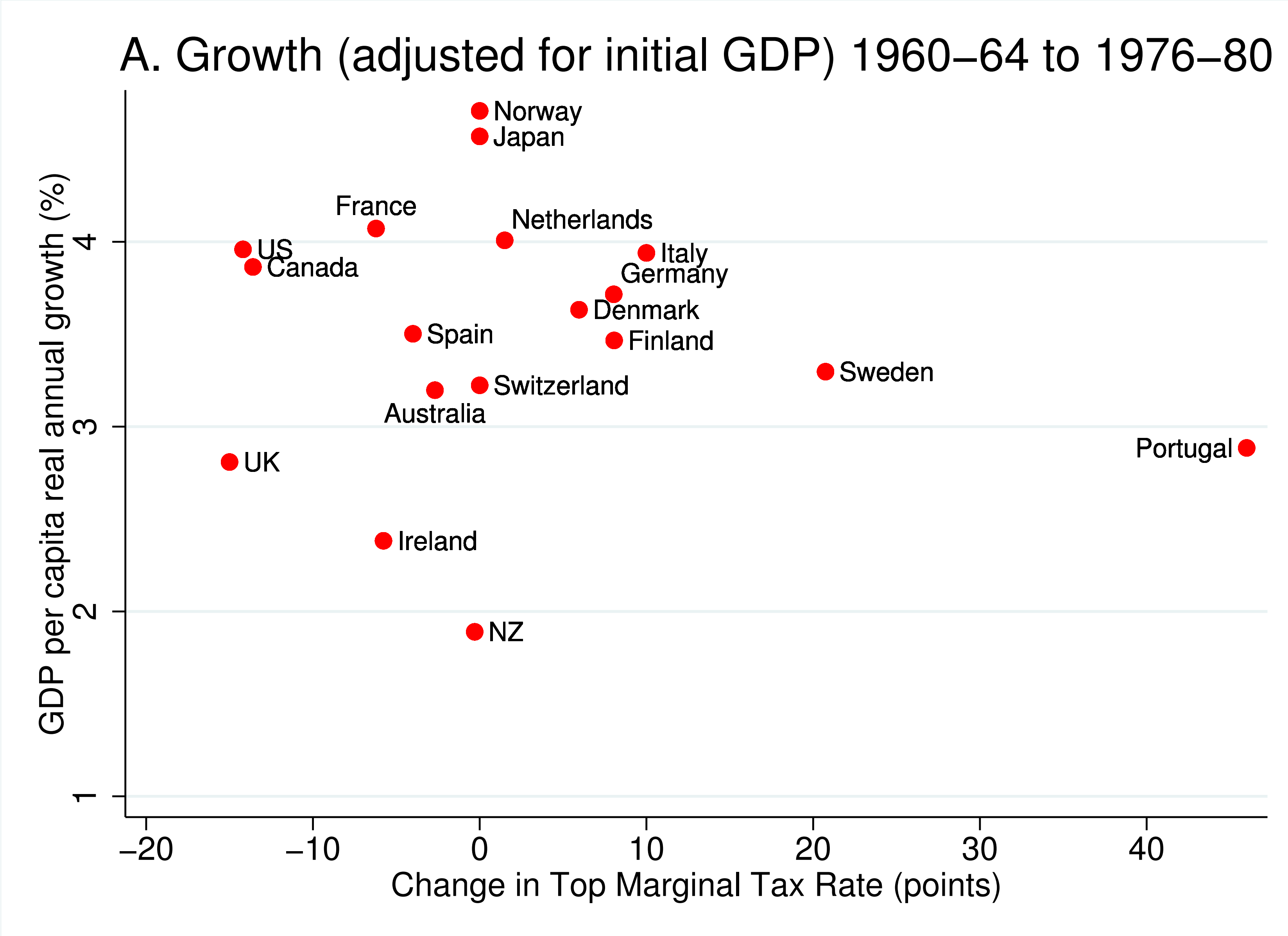
$\Rightarrow$ Great recession per-se will not change things fundamentally absent policy response

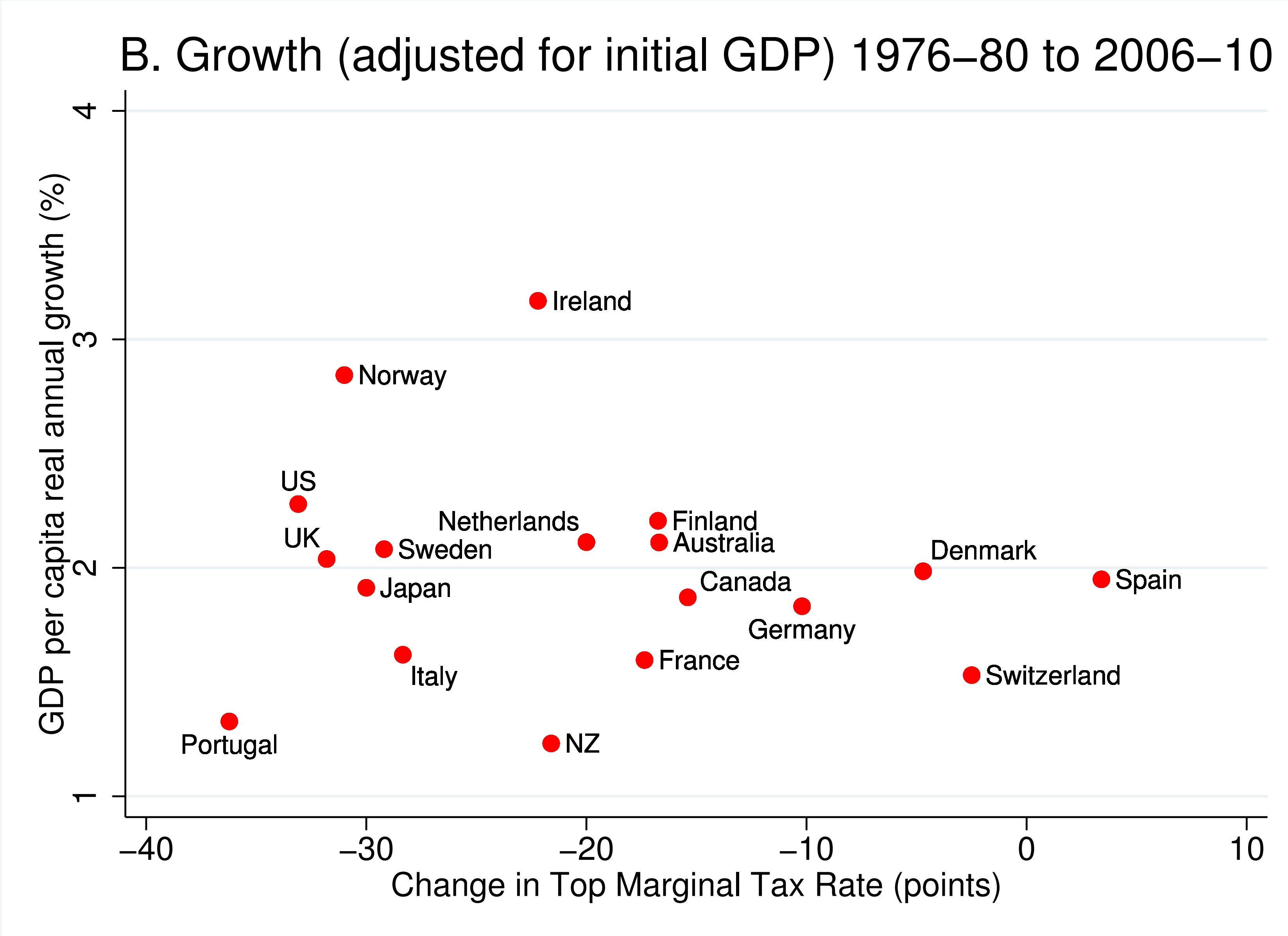
2) High top tax rates reduce the **pre-tax** income gap without hurting economic growth

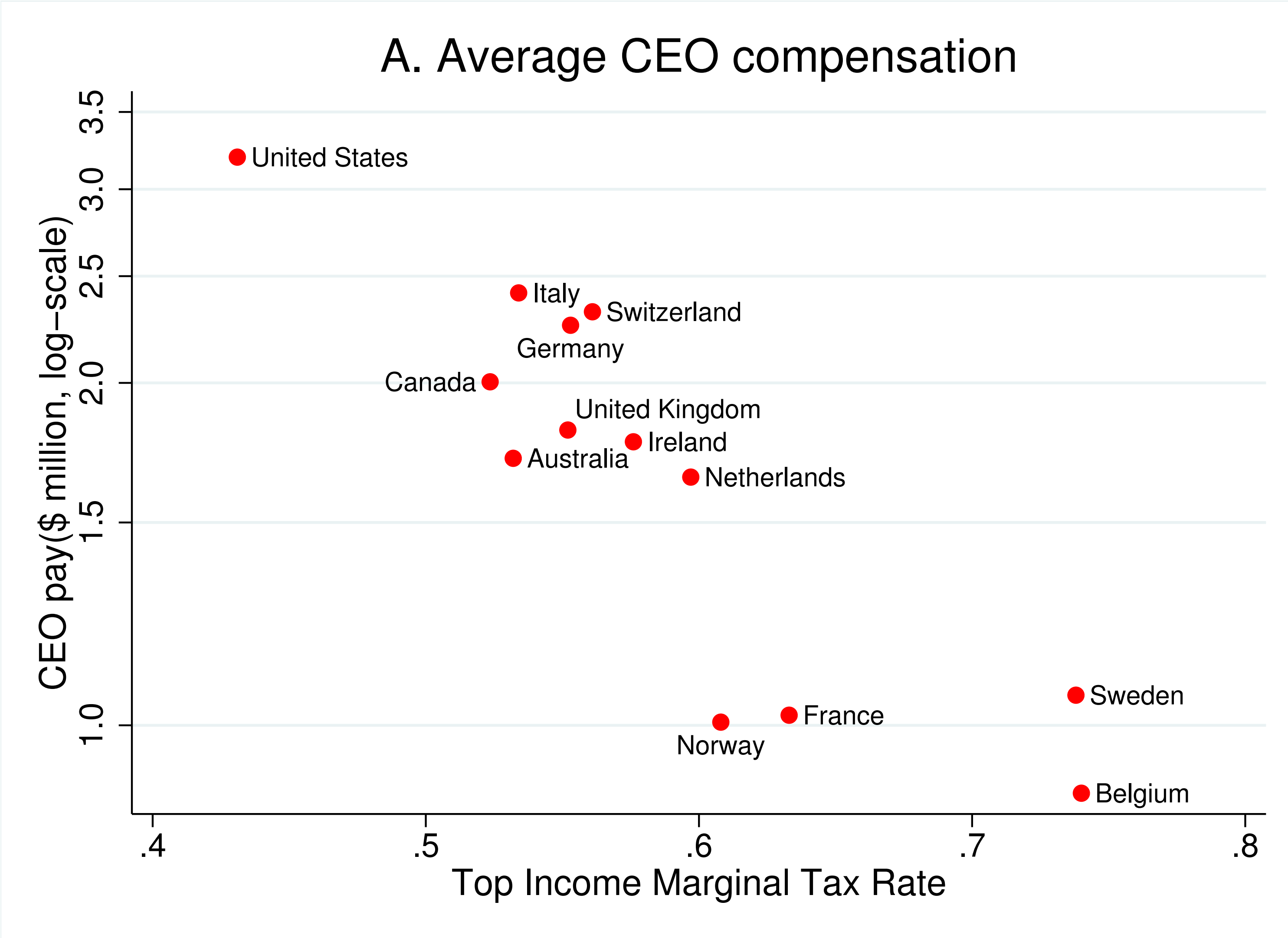
3) In globalized world, progressive taxation will require international coordination to keep tax avoidance/evasion low

4) Public will favor more progressive taxation only if it is convinced that top income gains are detrimental to the 99%

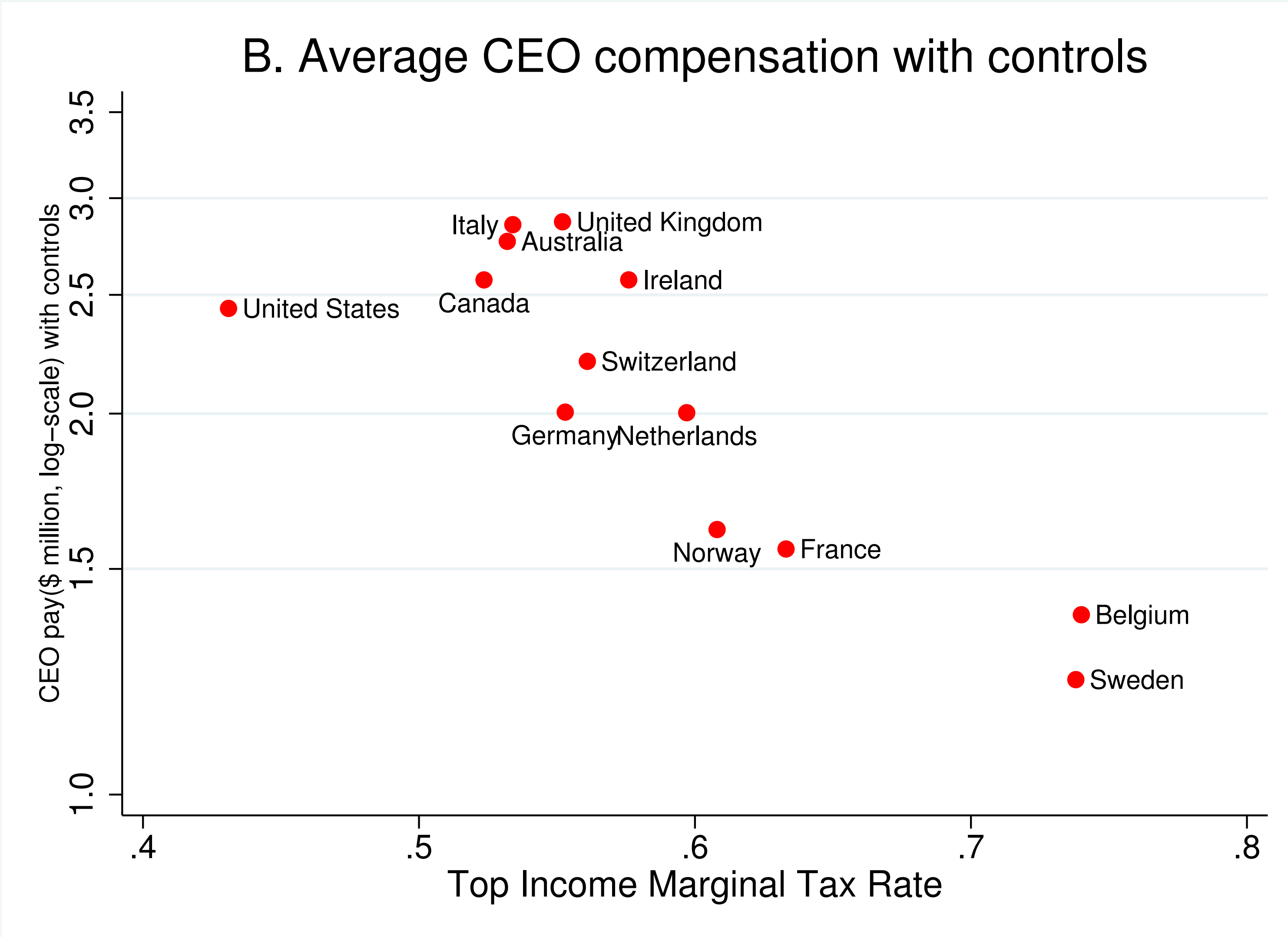
EXTRA SLIDES


A. Growth (adjusted for initial GDP) 1960–64 to 1976–80
GDP per capita real annual growth (%)
1
2
3
4
Norway
Japan
France
Netherlands
US
Canada
Italy
Germany
Denmark
Spain
Finland
Sweden
Switzerland
Australia
Portugal
UK
Ireland
NZ
–20
–10
0
10
20
30
40
Change in Top Marginal Tax Rate (points)


B. Growth (adjusted for initial GDP) 1976–80 to 2006–10
GDP per capita real annual growth (%)
1
2
3
4
Ireland
Norway
US
UK
Netherlands
Sweden
Finland
Australia
Denmark
Spain
Japan
Canada
Germany
Italy
France
Switzerland
Portugal
NZ
–40
–30
–20
–10
0
10
Change in Top Marginal Tax Rate (points)



Link between top tax rate and CEO pay in 2006 across countries



Controlling for firm profitability, governance, size, and industry