

Did rising inequality cause the 2007-2008 financial crisis?

Michael R. Smith
McGill University

What needs explaining

- The epicentre of the crisis was the US.
- The crisis was preceded by a very substantial run-up in house prices.
- The crisis was precipitated by a decline in house prices that began in late 2006 and accelerated during 2007-2008.
- That decline wiped out a good chunk of the assets of financial institutions; this caused those institutions to stop lending to each other and to commercial firms.
- This caused the liquidity problems of the early phases of the crisis to turn into solvency problems at the end.

Possible explanations

- A flow of capital from overseas caused the run-up in house prices.
- Deregulation, particularly the repeal of Glass-Steagall (1999) allowed more risk-taking.
- Compensation practices at large financial institutions encouraged risk-taking.
- Financial innovations, especially, the securitization of debt, collateralized debt obligations of various kinds as a particular form of that securitization (CDOs), and credit default swaps (CDSs) made it difficult to understand the real risk exposure of institutions.
- Dumb policy by the US government or its agencies (the 'Greenspan put', the encouragement of home purchases by people who couldn't afford to buy homes.
- Political responses to distributional conflict caused by rising inequality – leading to the encouragement of home purchases by people with insufficient incomes.

The distributional conflict account

- There was a problem with income growth in the lower part of the distribution.
- This provoked distributional conflict.
- US politics preclude the sort of distributional interventions that are possible elsewhere (through taxes and transfers).
- *Therefore*, the US government managed distributional conflict by making credit available.
- In particular, it facilitated home purchases by a broader part of the population, who could than accumulate wealth as long as house prices increased (and they had done for a long time).

Sources of this sort of account

- Greta Krippner, *Capitalizing on Crisis: The Political Origins of the Rise of Finance* (2011).
- Greta Krippner, “The political origins of financial exuberance” in Lounsbury and Hirsch (eds.), *Markets on Trial* (2010).
- Raghuram Rajan, *Fault Lines: How Hidden Fractures Still Threaten the World Economy* (2010)
- Eileen Appelbaum, “Macroeconomic policy, labour market institutions and employment outcomes” *Work, Employment & Society* (2011).
- Jean-Paul Fitoussi, “The problem of social deflation” in Anton Hemerijk et al., *Aftershocks: Economic Crisis and Institutional Choice* (2009).
- Charles Maier, “A history of profligate lending” in Anton Hemerijk et al., *Aftershocks: Economic Crisis and Institutional Choice* (2009).

Evidence provided consistent with the account

- Inequality in the US has risen substantially.
- Federal Housing Enterprise Safety and Soundness Act (1992) gave HUD a mandate to: i) establish affordable housing goals; and ii) monitor progress to those goals at the GSEs.
- In 1995 the Clinton administration declared its intent to broaden housing access, pressuring regulators to apply more forcefully the Community Reinvestment Act (1977).
- The Clinton administration also directed the FHA to reduce the minimum down payment required for an FHA mortgage guarantee.
- The GSEs bought or guaranteed a large proportion of the sub prime mortgages defaults on which precipitated the crisis.

Some institutional background

- The GSEs are Fannie Mae and Freddie Mac.*
- They were both created by the government to increase home ownership by i) *guaranteeing* mortgages issued by other financial institutions; ii) buying and holding mortgages issued by other financial institutions.
- They are both private, but their charters confer special responsibilities on them and their size and importance in the US housing market has been (correctly) interpreted to mean that their solvency is guaranteed by the federal government.
- From the 1980s, increasingly, the mortgages were guaranteed and traded as securities – that is mortgages bundled together and a security issued providing a stream of revenue from those who bought parts of a bundle.
- It was possible to ensure against losses on the bundled mortgages using *credit default swaps* (whether you own the security in question or not).

*Federal National Mortgage Association, Federal Home Loan Mortgage Corporation

Pre 2007-2008 postwar financial crises (“the closure, merging, takeover, or large-scale government assistance of an important financial institution (or group of institutions that marks the start of a string of similar takeovers”)

Severe

Spain (1977)

Norway (1987)

Finland (1991)

Sweden (1991)

Japan (1992)

Less severe

UK (1974)

Germany (1977)

Canada (1983)

US (1984)

Iceland (1985)

Denmark (1987)

New Zealand (1987)

Australia (1989)

Italy (1990)

Greece (1991)

UK (1991)

France (1994)

UK (1995)

Source: Reinhart and Rogoff, *This Time is Different* (2009)

More testing of the inequality account

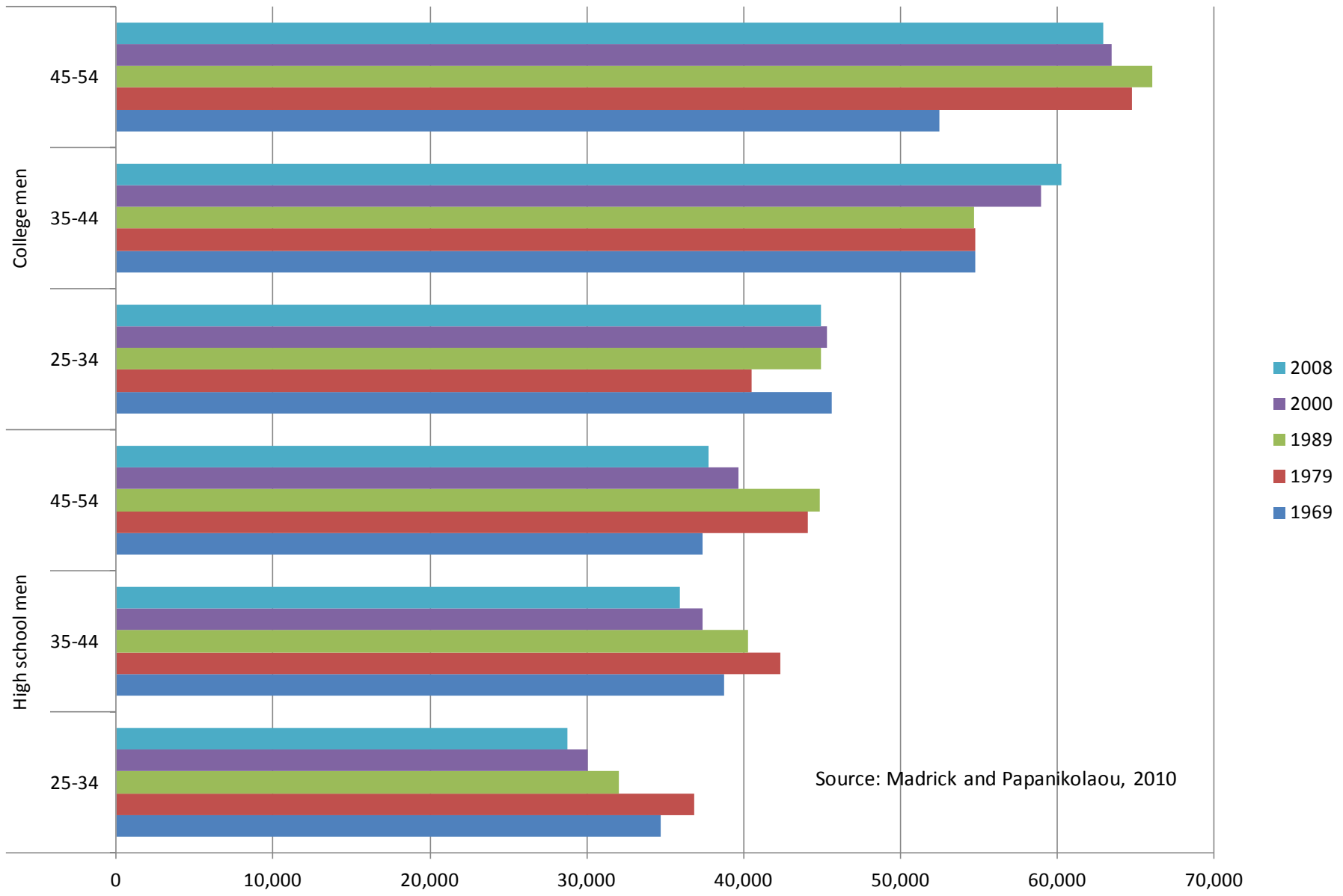
- Has there been a trend in incomes likely to cause distributional conflict?
- Did distributional conflict cause the adoption of the policies that encouraged sub prime lending?
- Did the provision of mortgages to low income buyers (sub prime loans) cause the boom and subsequent bust in house prices?
- Did government policy increase the risk associated with loans to buy houses?

THE TREND IN INCOMES

What distributional trends are needed to precipitate distributional conflict?

- There is rising inequality.
- That rising inequality meant “stagnant or declining incomes” for part of the population (Rajan, 2010: 34).

Figure 2: Male Median Wage by Age and Educational Level, 1969-2008



Source: Madrick and Papanikolaou, 2010

Figure 3: Female Median Wage by Age and Educational Level, 1969-2008

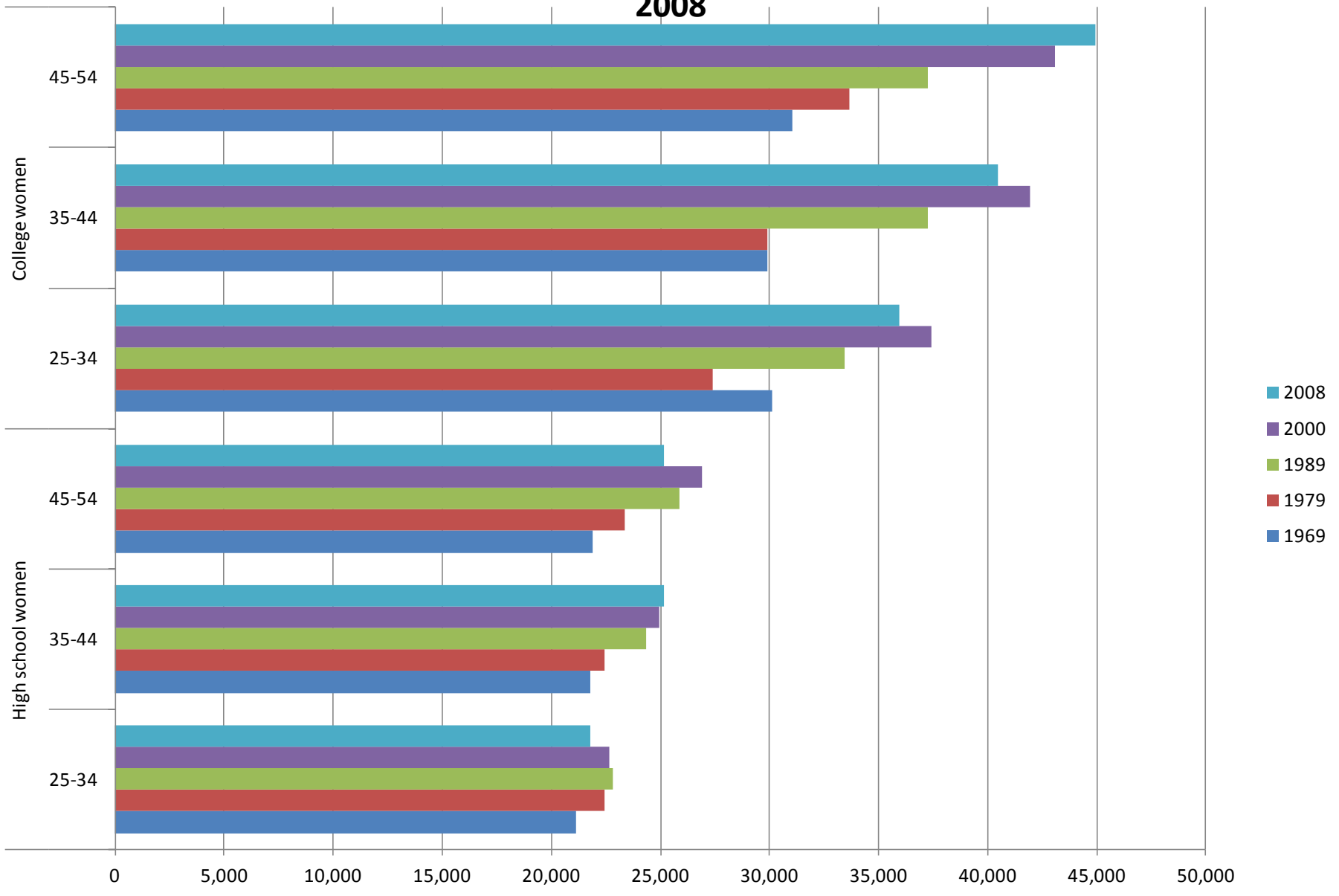


Figure 4: Mean Household Income by Income Quintile (2010 dollars), 1967-2010

Source: US Current Population Survey, Annual Social and Economic Supplements

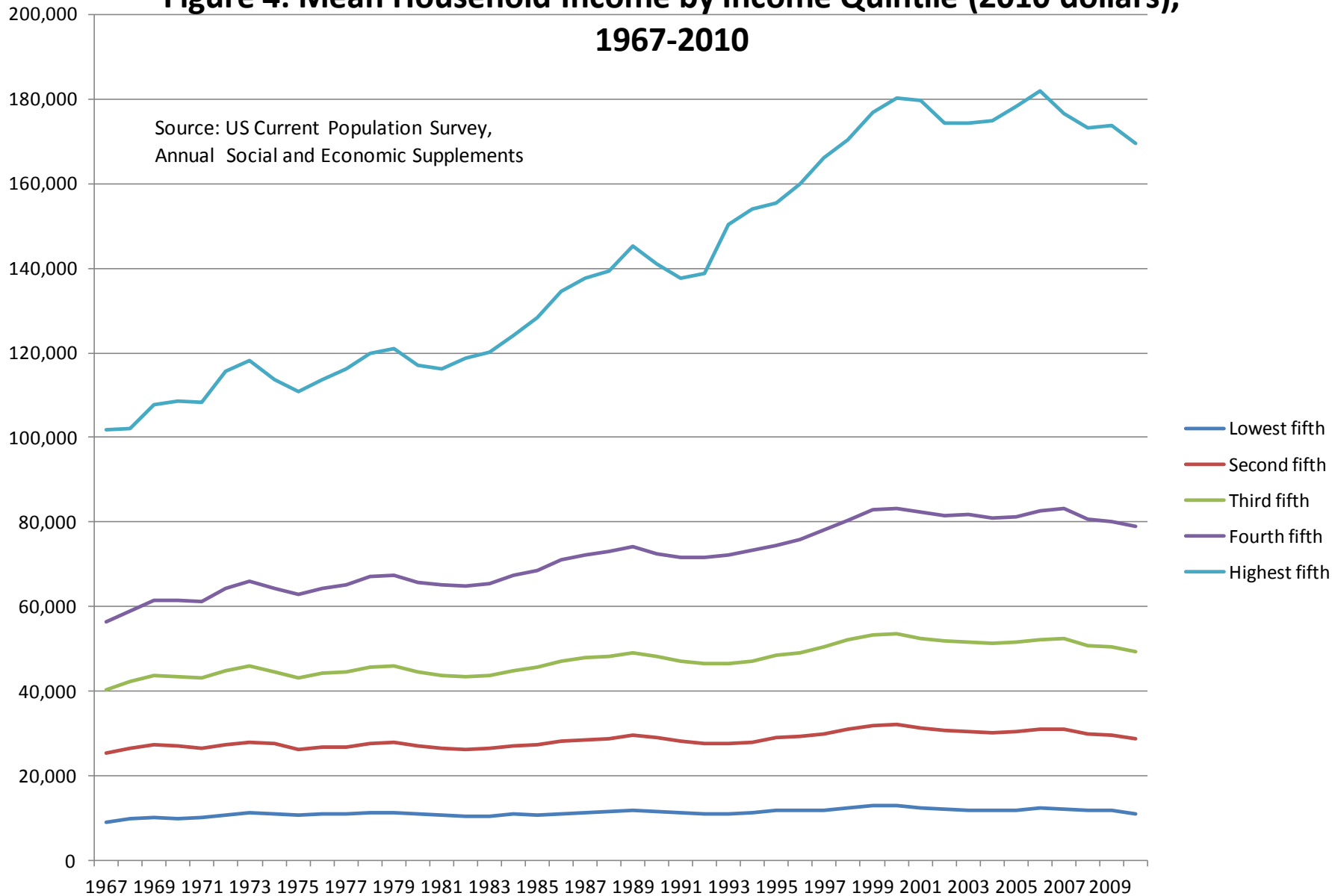
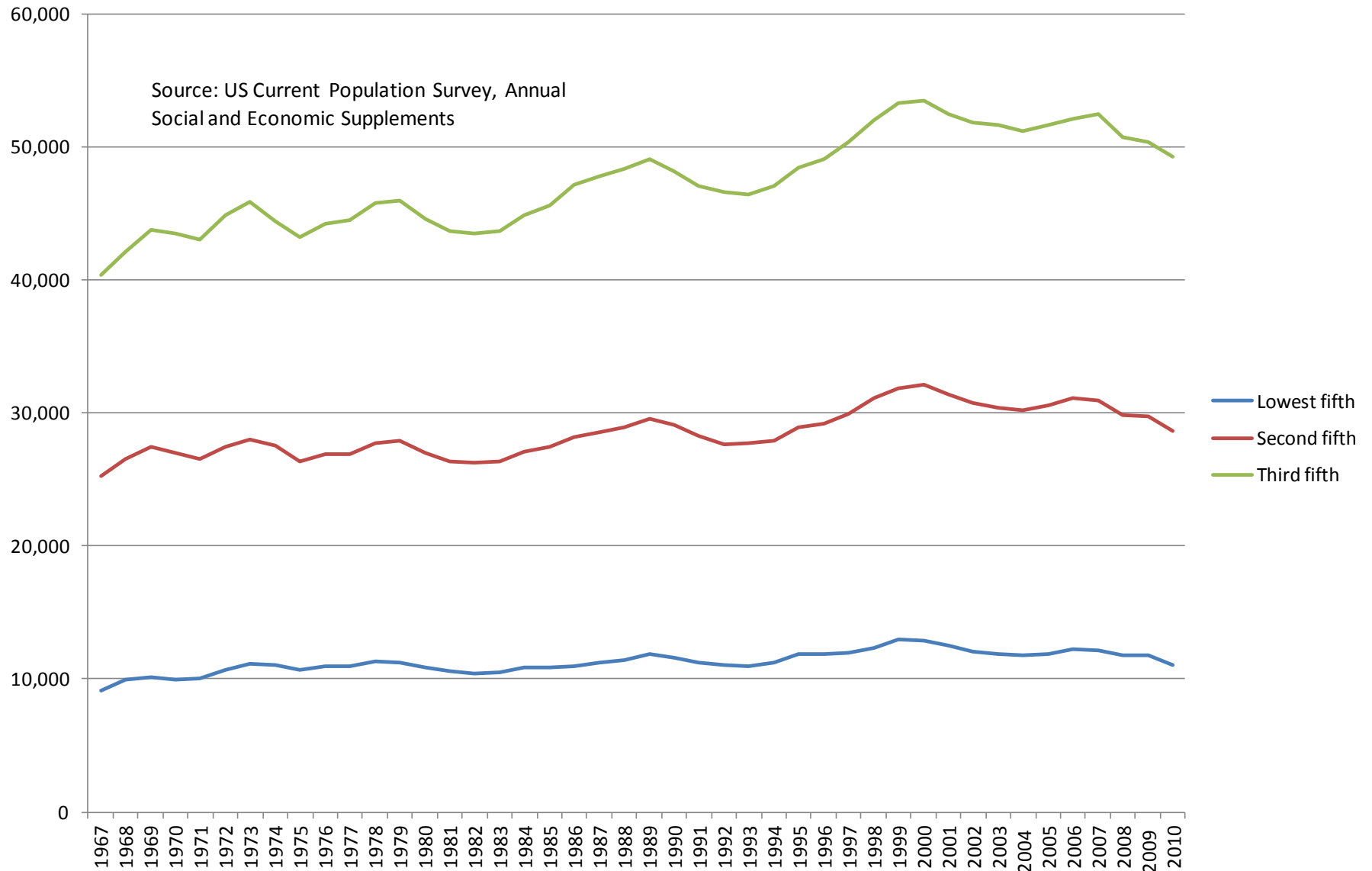


Figure 5: Mean Income by Lower Three Quintiles (2010 dollars), 1967-2010



Further considerations

- It is male high school graduate wages that decline. High school graduates are a diminishing proportion of the population (70% in 1969, 40% in 2005).
- The trends in wages in Figures 2 and 3 overstate decline. Wages rise with seniority/age; the relevant comparison is not between high school graduates, 25-34, over the five years, it's between high school graduates 25-34 in 1969 and 35-44 in 1979.
- These data do not describe a decline. Do they describe stagnation?

**DID DISTRIBUTIONAL CONFLICT CAUSE THE POLICY
CHANGES?**

Evidence of distributional conflict?

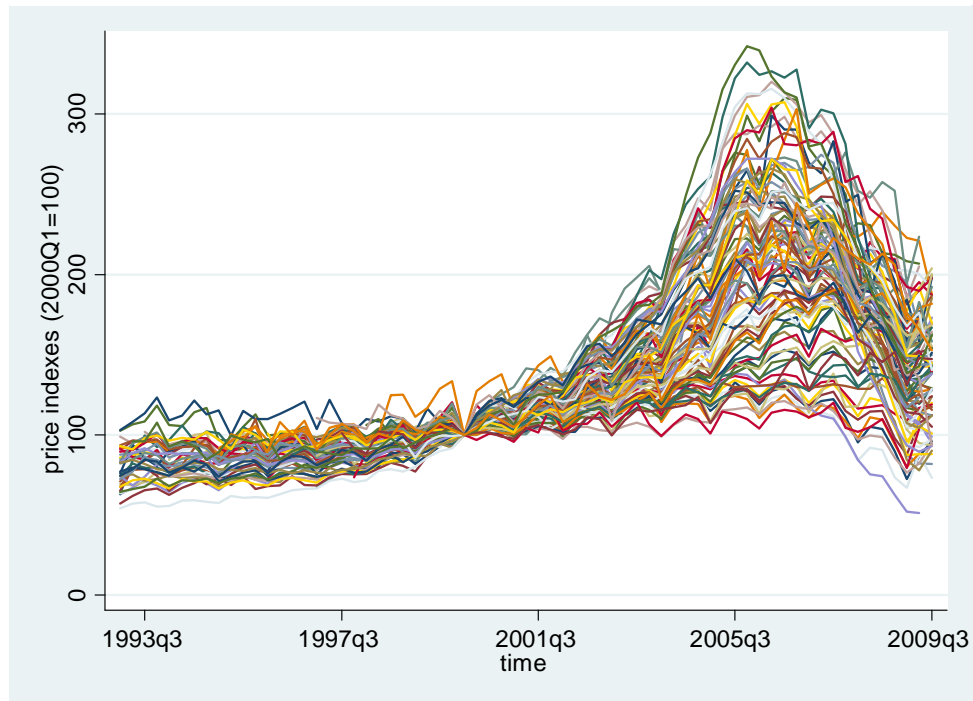
- None provided by any of the writers listed earlier.
- Some evidence that some forms of social protest are more common in more equal societies (Dubrow, et al., “Effects of democracy and inequality on soft political protest ...”, *International Journal of Sociology* (2008)).
- Most obvious source of protest – the union movement – has shrivelled in the US.

Evidence on the reason the government adopted the policies it did

- In 1994 Bill Clinton announced his intention to broaden home ownership to the National Association of Realtors.
- Fannie and Freddie lobbied the government to allow them to relax lending standards in order to increase the size of their market.
- Fannie and Freddie did favours for lawmakers who promoted loans to low income households: the case of Barney Franks.
- The GSEs were lobbied by the mortgage-broking industry; Anthony Mozilo, Countrywide, the use of the corporate jet, and low interest loans to buy expensive houses.
- Politicians and administrators were given low interest loans as “friends of Angelo”: Chris Dodd, Kent Conrad, Barbara Boxer, Donna Shalala, Richard Holbrooke, etc., and some Republicans.

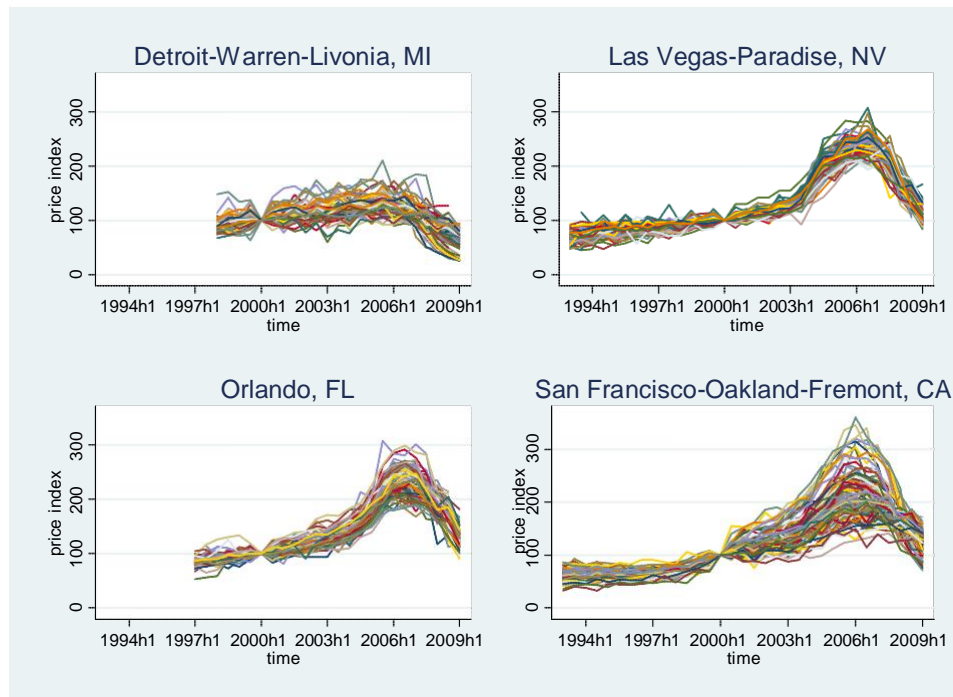
**DID LOANS TO LOW INCOME HOME BUYERS
CAUSE THE BOOM IN HOUSE PRICES?**

Figure 3: Individual Metropolitan Area Hedonic House Price Indexes by Quarter



Notes: Each line represents a hedonic price index that was separately estimated for each MSA according to equation (3). The index for 2000Q1 is normalized to 100 for each MSA.

Figure 4: Neighborhood Hedonic Price Indexes, Selected MSAs



Notes: Each line represents a hedonic price index that was separately estimated according to equation (3) for each tract group within the relevant MSA. The index for 2000Q1 is normalized to 100 for each tract group.

Low income families and house purchases

- In the early part of the boom, house prices rose in markets where income was rising.*
- In the later part of the boom the association between income and price increases across markets weakens.*
- The share of house purchases financed with subprime mortgages rises as the boom progresses.*
- Also, from 2004-2005, 35% of home purchases were for second homes or for investment properties.
- Rising incomes led the booms, sub prime loans followed.
- Part of the boom was fuelled by rich purchasers (of second homes, investment properties).

*Ferreira and Gyourko, "Anatomy of the beginning of the housing boom", National Bureau of Economic Research, Working Paper 17374

**DID GOVERNMENT POLICY CAUSE FINANCIAL
INSTITUTIONS TO ENGAGE IN RISKY BEHAVIOUR?**

Risky lending increased, government policy encouraged it ...

- The LTV rose in general and in the mortgages bought by Fannie and Freddy.
- Fannie and Freddie lowered the standards of the mortgages they purchased.
- Fannie and Freddy lowered the standards of the mortgages they guaranteed.
- From 2001-2006 the share of non prime mortgages issued rose from 14% to 48%.
- The use of ARMs rose from 16% to 45% over the same period.
- But Posner: “the pressure exerted by the government to lower lending standards was a case of pushing on an open door.” (*A Failure of Capitalism*, p.242).

Evidence of an appetite for risk (1)

- There have been previous financial crises caused by risky behaviour by financial institutions; e.g., the junk bond (“high yield security”) collapse at the end of the 1980s.
- Mortgage broker Ameriquest Capital as an *example*: i) pay tied to loan volume; ii) extensive use of ARMs; iii) “fraud was an everyday occurrence” (McLean and Nocera, *All the Devils are Here* (2010)).
- The subprime market was attractive to financial institutions: i) attempts to develop it for car loans in the early 1990s, before the changes in home ownership policy in the US; ii) banks made a lot of money from subprime mortgages (bundling for a fee and selling, *and* holding) – consequently they bought mortgage brokers to ensure a steady supply.

Evidence of an appetite for risk (2)

- The possibility of selling securities to the GSEs was only one way of reducing risk; financial institutions developed another way of reducing risk – CDSs (many of which were provided by AIG).
- Risk was increased by home sellers and financial institutions when they made loans that often exceeded the value of the property at the time of the sale.
- Risk was increased by the fact that the financial institutions funded their lending by borrowing short and lending long.
- Northern Rock – in a different institutional environment – engaged in very risky behaviour too (borrowing short lending long, lending to the already indebted).

Conclusion

- Income inequality rose, but so did incomes across the income distribution. They might have risen too little to forestall distributional conflict but none of the accounts specifies what changes would have to have occurred to constitute stagnant incomes.
- There is no evidence of distributional conflict leading to the extension of credit to low income borrowers. The evidence suggests that, on the whole, politicians responded to industry lobbying.
- The role of sub prime lending in the housing price boom seems to have been overstated; in the early part of the boom house prices rose where incomes rose.
- There is lots of evidence of an appetite for, what proved to be, unreasonable amounts of risk on the part of financial institutions, quite independent of government policy encouraging sub prime lending.
- The other explanations of the crisis look much more promising than inequality.