The Extraordinary Rise in the Wealth of Older American Households

Edward N. Wolff

New York University and NBER

August 4, 2025

Abstract. There has been a seismic shift in age-wealth profiles in the U.S. over years 1983 to 2022. The most notable is the sharp rise in the relative household wealth of age group 75 and over. Correspondingly, the relative wealth holdings of all other age groups dropped over these years. Using the Survey of Consumer Finances, the paper focuses on the youngest age group, 35 and under, and the oldest age group, 75 and over, and analyzes the factors behind these relative shifts in wealth. I find that the three principal factors are the homeownership rate, total stocks directly and indirectly owned, and home mortgage debt. The homeownership rate is the same in the two years for the youngest group but falls relative to the overall rate, whereas it shoots up for the oldest group both in actual level and relative to the overall average. The value of stock holdings rises for both age groups but vastly more for the oldest households compared to the youngest ones and accounts for a substantial portion of the elderly's relative wealth gains. Mortgage debt rises in dollar terms for both groups but considerably more in relative terms for the youngest group.

Keywords: household wealth, inequality, age group portfolio composition

JEL Codes: D31, J1

*Department of Economics, New York University, 19 West 4th Street 6th Floor, New York, NY 10012. Email: ew1@nyu.edu.

1. Introduction

The original version of this paper started out to document that one of the shocking developments over the last few decades has been not only the relative decline of the wealth of young households but its absolute decline as well. Indeed, the original title was "The Disappearing Wealth of Young American Households." However, on further inspection, it appears that the real story is the remarkable upswing in the net worth of older American households. In fact, all other age groups saw their mean net worth decline relative to the overall average between 1983 and 2022. This paper documents these developments and then analyzes the reasons behind these trends.

There have been some remarkable shifts in age-wealth profiles over years 1983 to 2022 in the U.S. Perhaps, most notable is the sharp rise in the relative household wealth of age group 75 and over. Additionally, the relative wealth holdings of all other age groups dropped over these years. The paper focuses on the youngest age group, 35 and under, and the oldest age group, 75 and over, and analyzes the factors behind these relative shifts in wealth. I find that the three principal factors are the homeownership rate, the share of total stocks, directly and indirectly owned, in total assets, and home mortgage debt. The first remained unchanged for the youngest group but dropped relative to the overall average, whereas it shot up for the oldest group both in actual level and relative to the overall average. The second factor rose for both age groups but vastly more for the oldest households compared to the youngest ones. The third declined for both age groups but substantially more for the youngest one.

The next section of the paper, Section 2, discusses overall trends in household wealth in the U.S. from 1983 to 2022. Section 3 describes shifts in age-wealth profiles over these years. Section 4 looks at differential rates of return across age groups and considers the leverage effect. In Section 5, I consider a broad range of factors that might account for the dramatic shift in age-wealth profiles. A summary of findings and concluding remarks are presented in Section 6.

2. Overall wealth trends

Before focusing on wealth developments by age group, it is first useful to consider overall trends in household wealth in the U.S. Relying on calculations from the Survey of Consumer Finances (SCF) from the Federal Reserve Board of Washington, this section documents trends in household net worth in the United States for almost 40 years, from 1983 to 2022. Particular attention is devoted to how the middle class fared over years 2007 to 2010, during one of the

sharpest declines in stock and real estate prices, and over years 2010 to 2022 as asset prices recovered. The debt of the middle class exploded from 1983 to 2007, already creating a fragile middle class. One main question is whether their position deteriorated over the "Great Recession" and recovered after that.[1] I also investigate what happened to wealth inequality over these years, particularly from 2007 to 2022.[2] It should be stressed that 2022 is post-Pandemic, so that the results presented here reflect the effects of the Pandemic on household wealth.

The overall period covered is from 1983 to 2022. Particular attention is paid to years 1983, 1989, 2001, 2007, 2010, 2019, and 2022. The choice of years is dictated by the availability of survey data on household wealth. Asset prices plunged between 2007 and 2010 but then rebounded from 2010 to 2022. The most telling finding is that median wealth plummeted by 43.9 percent over years 2007-2010, almost double the drop in housing prices, and by 2010 was at its lowest level since 1969. From 2010 to 2019 median wealth rebounded by 41.9 percent and then by another 36.7 percent from 2019 to 2022. Median wealth in 2022 finally exceeded its previous peak in 2007. The inequality of net worth, as measured by the Gini coefficient, after almost two decades of little movement, was up sharply from 2007 to 2010. It then increased moderately from 2010 to 2019. This was followed by a substantial remission between 2019 and 2022, though the Gini coefficient in 2022 was still well above its 2007 level.

The rest of this section is organized as follows. The next part, Section 2.1 discusses the measurement of household wealth and describes the data sources used for this study. Section 2.2 presents time trends for median and average wealth holdings and Section 2.3 on the inequality of household wealth. Section 2.4 looks at changes in the portfolio composition of household wealth and also looks at developments in ownership rates for selected assets. Particular attention is paid to changes in relative indebtedness. Section 2.5 looks at the pattern of wealth holdings of the rich in comparison to the middle class. A summary of results on overall wealth trends is provided in Section 2.6.

2.1 Data sources and methods

The primary data sources used for this study are the 1983, 1989, 2001, 2007, 2010, 2019,

[1] As noted below, though the "official" recession ended in June, 2009, according to the NBER definition, I refer to the period 2007 to 2010 as the "Great Recession," since median income and wealth showed no recovery over these years and I have data points for these two years but not in between.

[2] This section is based on Wolff (2017) and Wolff (2021) with new updates through the year 2022.

and 2022 SCF. Each survey consists of a core representative sample combined with a high-income supplement. Starting in 1989, the first sample was selected from a standard multi-stage area-probability design. This part of the sample was intended to provide good coverage of asset characteristics such as home ownership that are broadly distributed. The second sample, the so-called “high income supplement,” was selected as a “list sample” from statistical records (the Individual Tax File) derived from tax data by the Statistics of Income (SOI) Division of the Internal Revenue Service. In this case, the IRS provided the names and addresses of a sample of very high-income families. This second sample was designed to disproportionately select families that were likely to be relatively wealthy. Typically, about two thirds of the cases come from the representative sample and one third from the high-income supplement.

The principal wealth concept used here is marketable wealth (or net worth), which is defined as the current value of all marketable or fungible assets less the current value of debts. Net worth is thus the difference in value between total assets and total liabilities. Total assets are defined as the sum of: (1) owner-occupied housing; (2) other real estate; (3) bank deposits, certificates of deposit, and money market accounts; (4) government and corporate bonds and other financial securities; (5) the cash surrender value of life insurance plans; (6) defined contribution (DC) pension plans, including IRAs and 401(k) plans; (7) corporate stock and mutual funds; (8) unincorporated businesses; and (9) trust funds. Total liabilities are the sum of: (1) mortgage debt, (2) consumer debt, and (3) other debt such as educational loans.

This measure reflects wealth as a store of value and therefore a source of potential consumption. I believe that this is the concept that best reflects the level of well-being associated with a family's holdings. Thus, only assets that can be readily converted to cash (that is, "fungible" ones) are included. Though the SCF includes information on the value of vehicles owned by the household, I exclude this from my standard definition of household wealth, since this treatment is consistent with the national accounts, where purchase of vehicles and other consumer durables is counted as expenditures, not savings. Also excluded here is the value of future Social Security benefits the family may receive upon retirement ("Social Security wealth"), as well as the value of retirement benefits from defined benefit pension plans ("DB pension wealth"). Even though these funds are a source of future income to families, they are not in their

direct control and cannot be marketed.[3]

I also use a more restricted concept of wealth, which I call "financial resources" or FR. This is defined as net worth minus net equity in owner-occupied housing (the primary residence only). FR is a more liquid concept than marketable wealth, since one's home is difficult to convert into cash in the short term. Moreover, primary homes also serve a consumption purpose besides acting as a store of value. FR represents what a household can draw down without lowering its standard of living, and thus excludes homes (and vehicles).[4]

Estimates of the size distribution of household wealth are sensitive to the sampling frame used in survey data. The reason is that because of the extreme skewness of the distribution of household wealth, the inclusion of a high-income supplement in the sample provides much more reliable estimates than a representative sample. The SCF has an explicit high-income supplement. Moreover, the accounting framework, the choice of observational unit, and patterns of response error, because of portfolio variation with wealth class, also affect wealth estimates.

2.2. Median wealth finally exceeds its previous 2007 peak

Table 1 documents a robust growth in wealth from 1983 to 2007 (also see Figure 1). Median wealth increased at an annual rate of 1.13 percent from 1983 to 1989 and 1.98 percent from 1989 to 2007. Then between 2007 and 2010, median wealth plunged by a staggering 43.9 percent! Indeed, real median wealth was actually about the same in 2010 as in 1969. The primary reasons are the collapse in the housing market and the high leverage of middle-class families. Median wealth rebounded robustly from 2010 to 2019, climbing by 41.9 percent, and again from 2019 to 2022, by 36.7 percent, and by 2022 it was 13.1 percent above its previous peak in 2007.

[Table 1 and Figure 1 about here]

Mean net worth also grew vigorously from 1983 to 1989, at an annual rate of 2.52 percent, about double the growth rate of median wealth. Over years 1989 to 2007, its growth rate accelerated to 3.24 percent per year. Mean wealth in 2007 was more than double its value in

[3] My baseline estimates, as noted, exclude vehicles. Moreover, my calculations are based on the "public use" samples provided by the Federal Reserve Board, which are to some degree different from their internal files. As a result, my wealth figures will in general be at a slight variance from the "standard" estimates provided by the Federal Reserve Board which include the value of vehicles in their statistics (see, for example, Bricker et. al., 2017).

[4] However, FR does include "valuables" like artwork, since this can be sold without significantly lowering a family's standard of living, as well as business assets which may be illiquid in the short term. As a result, FR is not a 100 percent purely liquid concept since it includes some illiquid assets as well.

1983. Another point of note is that mean wealth grew much faster than the median from 1983 to 2007, indicative of widening inequality of wealth.

The Great Recession also saw an absolute decline in mean household wealth. However, whereas median wealth plunged by 43.9 percent between 2007 and 2010, mean wealth fell by (only) 16.1 percent. However, here, too, the relatively faster growth in mean wealth than median wealth (that is, the latter's more moderate decline) was coincident with rising wealth inequality. Mean wealth then grew by 30.1 from 2010 to 2019 and by 2016 it had exceeded its previous 2007 peak. From 2019 to 2022 there was another robust growth spurt of 22.5 percent.

In sum, from 1989 to 2007, median net worth advanced strongly. The Great Recession, on the other hand, saw a massive destruction of median net worth, though by 2022 median wealth was greater than its previous 2007 peak.

2.3 Wealth inequality shows a strong remission in 2022

The figures in Table 1 also show that while wealth inequality increased sharply from 1983 to 1989, it remained virtually unchanged from 1989 to 2007 according to the Gini coefficient (also see Figure 2). The years 2007 to 2010 saw a sharp elevation in wealth inequality, with the Gini coefficient rising from 0.834 to 0.866. From 2010 to 2019 there was a very small rise from 0.866 to 0.869. However, from 2019 to 2022, it dropped sharply to 0.847, though still above its level in 2007. The decline in inequality was largely due to gains in housing wealth and increased savings among middle class households coupled with a dormant stock market.

[Figure 2 about here]

The time trend for income inequality contrasts with that for net worth. Income inequality increased sharply between 1982 and 1988, with the Gini coefficient rising from 0.480 to 0.521 (also see Figure 2).[5] Inequality again surged from 1988 to 2006 with the Gini index advancing from 0.521 to 0.574. Perhaps, somewhat surprisingly, the years 2007 to 2010 witnessed a rather sharp contraction in income inequality, with the Gini coefficient falling from 0.574 to 0.549, mainly due to a decline in property income and realized capital gains. Years 2009 to 2018 saw a reversal in this trend, with income inequality once again increasing sharply. The Gini coefficient increased to 0.571, about the same level as in 2006, largely because of a turnaround in property

[5] It should be noted that the income in each survey year (say 2022) is for the preceding year (2021 in this case).

income and realized capital gains. Income inequality then jumped up from 2018 to 2021, with the Gini coefficient rising to 0.607, even above its 2006 level and at its highest point over the 39 years. Once, again, the proximate cause were sharp rises in property income and realized capital gains.

All in all, income inequality increased much more in percentage terms than net worth inequality over years 1983 to 2022. On the basis of the Gini coefficient, net worth inequality was up by 6.0 percent while income inequality rose by a remarkable 26.3 percent.

2.4 Household debt recedes

In 2022, owner-occupied housing was the most important household asset in the average portfolio breakdown for all households shown in Table 2, accounting for 27.0 percent of total assets. However, net home equity -- the value of the house minus any outstanding mortgage -- amounted to only 19.2 percent of total assets. Real estate, other than owner-occupied housing, comprised 8.2 percent, and business equity another 20.3 percent. Liquid assets made up 6.7 percent and pension accounts 15.8 percent. Financial securities amounted to 1.1 percent; corporate stock plus mutual funds, to 16.9 percent; and trust funds to 2.7 percent. The debt to net worth ratio was 12.4 percent, while the debt-income ratio was 97.5 percent.

[Table 2 about here]

There were some notable changes in the composition of household wealth over time. First, the share of housing wealth in total assets jumped from around 30 percent in 1983-2001 to a peak value of 33.5 percent but then declined to 27.0 percent in 2022. The major factor explaining this movement is the trend in the overall homeownership rate, which rose from 63.4 percent in 1983 to a top value of 69.1 percent in 2004, fell off to 64.9 percent in 2019, but then recovered to 67.4 percent in 2022, though still below its 2004 peak.

Second, overall relative indebtedness first increased, with the debt-net worth ratio climbing from 15.1 percent in 1983 to 20.6 percent in 2010 and then tumbling to 12.4 percent in 2022. Likewise, the debt-income ratio surged almost continuously over time from 68.4 percent in 1983 to a peak of 127.0 percent in 2010 but then dropped off sharply to 97.5 percent in 2022.

A third change is that pension accounts rose from 1.5 to 15.8 percent of total assets from 1983 to 2022. This increase largely offset the decline in the share of liquid assets in total assets, from 17.4 percent to 6.7 percent, so that it is clear that to a large extent households substituted tax-deferred pension accounts for taxable savings deposits.

Fourth, if we include the value of stocks indirectly owned through mutual funds, trusts, IRAs, 401(k) plans, and other retirement accounts, then the value of total stocks owned as a share of total assets more than doubled from 11.3 percent in 1983 to a peak of 24.5 percent in 2001, but then declined to 23.6 percent in 2022. This trend largely reflects movements in the stock market.

2.5 Portfolio composition by wealth class

The tabulation in Table 2 provides a picture of the average holdings of all families in the economy, but there are marked differences in how middle-class families and the rich invest their wealth. As shown in Table 3, the richest one percent of households (as ranked by wealth) invested about 80 percent of their savings in investment real estate, businesses, corporate stock, and financial securities in 2022. Stocks either directly or indirectly owned comprised 26.8 percent by itself. Housing accounted for only 7.2 percent of their wealth, liquid assets 5.0 percent, and pension accounts another 6.1 percent. Their debt-net worth ratio was only 2.2 percent and their debt- income ratio was 40.4 percent.

[Table 3 about here]

Among the next richest 19 percent of U.S. households, housing comprised 26.7 percent of their total assets, liquid assets 7.2 percent, and pension assets another 22.6 percent. Investment assets -- real estate, business equity, stocks, and bonds – made up 42.2 percent and 26.6 percent was in the form of stocks directly or indirectly owned. Debt amounted to 8.6 percent of their net worth and 82.7 percent of their income.

In contrast, 63.9 percent of the assets of the middle three wealth quintiles of households was invested in their own home. Another 22.9 percent went into monetary savings of one form or another and pension accounts. Together housing, liquid assets, and pension assets accounted for 86.9 percent of the total assets of the middle class. The remainder was about evenly split among non-home real estate, business equity, financial securities and corporate stock. Stocks directly or indirectly owned amounted to only 9.6 percent of their total assets. The ratio of debt to net worth was 46.1 percent, and their ratio of debt to income was 135.1 percent, both much higher than that of the top quintile.

Almost all households among the top 20 percent of wealth holders owned their own home, in comparison to 77.4 percent of households in the middle three quintiles. A little over 70 percent of very rich households (in the top percentile) owned some other form of real estate, compared to 44.3 percent of rich households (those in the next 19 percent of the distribution) and

12.9 percent of households in the middle 60 percent. Over 90 percent of the very rich had a pension account, as did the rich, compared to 55.4 percent of the middle. A stunning 77.3 percent of the very rich reported owning their own business. The comparable figures are 31.5 percent among the rich and only 9.6 percent of the middle class.

Among the very rich, 91.8 percent held corporate stock, mutual funds, financial securities or a trust fund, in comparison to 71.8 percent of the rich and 25.3 percent of the middle class. Almost all of the very rich and the rich reported owning stock either directly or indirectly, compared to 56.8 percent of the middle.

2.6 Summary

In terms of median wealth, year 2007, on the eve of the Great Recession, stands out as a high-water mark. Median household net worth in constant dollars showed robust growth from 1983 to 2001, gaining 30.3 percent or 1.47 percent per year. Over the 2001-2007 period the median increased by 19.0 percent or 2.90 percent per year, even faster than in the preceding decades. Then the Great Recession hit and like a tsunami wiped out 40 years of wealth gains. From 2007 to 2010, house prices fell by 24 percent in real terms, stock prices by 26 percent, and median wealth by a staggering 43.9 percent. By 2010 median wealth was about at the same level as 1969. However, from 2010 through 2022, asset prices recovered, and median wealth more than doubled and by 2022 it had exceeded its previous 2007 peak. Mean wealth more than fully recovered by 2016 and by 2022 it was 35.1 percent above its 2007 level.

Another notable development is a steep drop in wealth inequality between 2019 and 2022. According to the Gini coefficient, wealth inequality rose sharply from 1983 to 1989 (the Gini coefficient was up by 0.029), remained relatively stable from 1989 to 2007, then showed a steep increase over years 2007 to 2010 (the Gini was up 0.032), and little change from 2010 to 2019. However, from 2019 to 202 there was a remission of wealth inequality, with the Gini coefficient down by 0.022. Still, from 1983 through 2019, wealth inequality was up, with the Gini coefficient rising by a substantial 0.048.

Relative debt accelerated upward after 1983. Among all households, the debt-income ratio peaked at 127.0 percent in 2010 and the debt-net worth ratio at 20.6 percent, while among the middle three wealth quantiles, the former peaked at 156.7 percent in 2007 and the latter at 69.2 percent in 2010. Since then, these two indicators have broadly retreated. The debt-income ratio fell to 97.5 percent in 2022 among all households and the debt-net worth ratio to 12.4

percent, while the former receded to 135.1 percent and the latter to 46.1 percent among the middle class.

The overall homeownership rate rose from 63.4 percent in 1983 to a peak value of 69.1 percent in 2004 but the fell off by 5.4 percentage points to 63.7 percent in 2016. However, it finally rebounded, by 3.7 percentage points, to 67.4 percent in 2022. The overall stock ownership rate (either directly or indirectly through mutual funds, trust funds, or pension plans), after rising briskly from 31.7 percent in 1989 to a peak of 51.9 percent in 2001, fell off to 46.1 percent in 2013. However, it also rebounded to 57.5 percent in 2022, considerably above its previous 2001 peak.

3. Shifts in the age-wealth profile

I next turn attention to the main subject matter of the paper. As shown in Table 4, the cross-sectional age-wealth profiles of the various years between 1983 and 2019 generally follow the predicted hump-shaped pattern of the life-cycle model (see, for example, Modigliani and Brumberg, 1954). Mean wealth increases with age up through age 65 or so and then falls off. FR has an almost identical profile, though the peak is generally somewhat higher than for net worth. Homeownership rates also had a similar profile before 2004, in 2007, and 2010, though the fall-off after the peak age is much more attenuated than for the wealth numbers, but in 2004, 2016, 2019, and 2022 they actually show a steady rise with age. In 2022, the mean wealth of elderly households (age 65 and over) was more than twice that of the non-elderly and their homeownership rate was 16.9 percentage points higher.

[Table 4 about here]

Despite the apparent similarity in the profiles, there were notable shifts in the relative wealth holdings of age groups between 1983 and 2007 (also see Figures 3 and 4). The relative wealth of the youngest age group, under 35 years of age, expanded from 21 percent of the overall mean in 1983 to 29 percent in 1989 but then collapsed to 17 percent in 2007. In 2007, the mean wealth of the youngest age group was $128,970 (in 2022 dollars), which was only slightly more than the mean wealth of this age group in 1989 ($120,920).

[Figure 3 and Figure 4 about here]

The mean net worth of the next youngest age group, 35-44, relative to the overall mean tumbled from 0.71 in 1983 to 0.58 in 2007, with most of the relative decline taking place between 2004 and 2007. The relative wealth of the next youngest age group, 45-54, also declined

rather steadily over time, from 1.53 in 1983 to 1.19 in 2007, while that of age group 55-64 generally gained from 1.67 in 1983 to 1.69 in 2007. The relative net worth of age group 65-74 dipped somewhat from 1.93 in 1983 to 1.86 in 2007, while that of the oldest age group went from 5 percent above the mean in 1983 to 16 percent above in 2007.[6]

Results for FR are very similar. The average FR of the youngest age group climbed from 17 to 28 percent of the overall mean from 1983 to 1989 and then plummeted to only 15 percent in 2007. A similar pattern is evident for age group 35 to 44. The relative average FR of age group 45-54 and 65-74 also fell over the 1983-2007 period, whereas that of age group 55-64 rose and that of the oldest age group was the same in 2007 as in 1983 (10 percent above the mean).

Changes in homeownership rates tend to mirror net worth trends. While the overall ownership rate increased by 5.2 percentage points between 1983 and 2007, the share of households in the youngest age group owning their own home increased by only 2.1 percentage points. The homeownership rate of households between 35 and 44 of age actually fell by 2.3 percentage points, and that of age group 45 to 54 years of age declined by 0.9 percentage points. Big gains in homeownership were recorded by the older age groups: 3.9 percentage points for age group 55-64, 7.1 percentage points for age group 65-74, and 7.6 percentage points for the oldest age group. By 2007, homeownership rates rose monotonically with age up to age group 65-74 and then dropped off for the oldest age group. The statistics point to a relative shifting of homeownership away from younger towards older households between 1983 and 2007.

Changes in relative wealth were equally dramatic from 2007 to 2022. The relative wealth of the under 35 age group continued to plummet from 0.17 in 2007 to 0.08 in 2019 but then picked up to 0.16 in 2022, about the same level as in 2007. In actual 2022 dollar terms, the average wealth of the youngest age group collapsed almost in half, from $129,000 in 2007 to $70,200 in 2019, but then rebounded to 159,700 in 2022, its highest point over the 39-year period. I will have more to say below about the recovery from 2019 to 2022. The relative net worth of age group 35-44 went from 0.58 in 2007 to 0.40 in 2016, rebounded to 0.57 in 2019 but then fell off again to 0.50 in 2022. In constant dollar terms, their net worth shrank from $436,900

[6] The ratios of median net worth by age group to the overall median show a very similar pattern to those of mean net worth. For example this ratio for the youngest age group fell from 0.13 in 1983 to 0.03 in 2019 and then recovered to 0.09 in 2022, though still below the 1983 ratio. Likewise, the ratio for the oldest age group climbed from 1.12 in 1983 to 1.87 in 2022.

in 2007 to $324,100 in 2016, but then bounced back to $515,100 in 2022, its highest value over the period.

The mean net worth of age group 45-54 slipped from 1.19 to 0.91 between 2007 and 2022, while the relative wealth of age group 55-64 dropped from 1.69 in 2007 to 1.48. In absolute terms there was little change for the former but the latter saw an 18.9 percent rise. The same pattern in relative wealth held for age group 65-74, though it experienced a 23.4 percent increase. In contrast, the relative wealth of the oldest age group, age 75 and over, jumped from 1.16 to 1.55, and was up by 81.0 percent in constant dollar terms. The pattern of change in mean FR by age group over the 2007-2022 period is very similar.

Over the full period, 1983-2022, all age groups except the oldest slipped relative to the overall mean in terms of net worth. The oldest, in contrast, was way up in relative terms. Here, again, the time pattern of change in mean FR by age group over 1983-2022 period is very similar.

On net, homeownership rates fell for all age groups from 2007 to 2022 except the very oldest among whom it increased by 4.0 percentage points. However, year-to-year changes are interesting. The overall homeownership rate fell by 4.9 percentage points from 68.6 percent in 2007 to 63.7 percent in 2016 and then rebounded to 66.0 percent in 2022. Likewise, the homeownership rate for youngest group plummeted by 7.6 percentage points over 2007-2016 and then turned up by 5.4 percentage points over 2016-2022. The homeownership rate for age group 35-44 witnessed an even greater plunge of 8.3 percentage points over the first period and then a more modest recovery of 3.3 percentage points over the second. The time patterns are similar for age groups 45-54 and 55-64. However, for age group 65-74 the homeownership rate declined in both periods, while for age group 75 and over it rose in the first and declined in the second.

Changes in the relative wealth position of different age groups depend in large measure on relative asset price movements and differences in portfolio composition. The latter are highlighted in Table 5 for the year 2022. Homes comprised a little under half the value of total assets for age group 35 and under, and its share of total assets generally fell off with age to 22.0 percent for age group 75 and over. The proportion of liquid assets in total assets was highest for the two youngest age groups, at around eight percent, and lowest for age group 55-64, at 5.7 percent. Pension accounts as a share of total assets rose with age, from 9.2 percent for the youngest group to 18.5 percent for age group 55 to 64 and then fell off to 11.8 percent for the oldest age group. This pattern reflects the build-up of retirement assets until retirement age and

then a decline as these pension assets are liquidated.[7] Corporate stock and financial securities as a group showed a steady rise with age, from a 10.1 percent share for the youngest group to a 31.2 percent share for the oldest. A similar pattern is evident for total stocks as a percentage of all assets. Business equity and non-home real estate were more important in the portfolios of age groups 55-64 and 65-74 than in the other age groups.

[Table 5 about here]

There was a pronounced fall off of the degree of indebtedness with age. The debt-net worth ratio declined continuously with age from 65.4 percent for the youngest group to only 3.2 percent for the oldest. Likewise, the debt-income ratio dropped from 136.7 percent for the youngest group to 51.7 percent for the oldest group. Mortgage debt as a ratio to house value declined continuously with age from 56.9 percent to 10.0 percent. As a result, total net home equity increased with age. However, total assets likewise went up with age, so interestingly net home equity as a proportion of total assets remained relatively flat across age groups at around twenty percent.

Were there notable changes in portfolio composition over time? Here I focus on the evolution of portfolios for the youngest and oldest age groups. There was a marked increase in the share of homes in total assets from 40.0 percent in 1983 for the under 35 age group to a peak of 56.9 percent in 2019 followed by a substantial drop off to 46.5 percent in 2022 (see Table 6). The share of liquid assets in total assets declined from a high point of 19.5 percent in 1983 to a bottom value of 5.7 percent in 2007 and then bounced back to 8.1 percent in 2022. The pension account share rose almost continuously over time from 1.0 percent in 1983 to 9.2 percent in 2022. This mirrored the trend for all households. The share of financial investment assets and total directly plus indirectly owned stocks fluctuated over time, tending to echo trends in the stock market. A similar pattern is found for the sum of business equity and other real estate.

[Table 6 about here]

Perhaps the most notable finding is the steep increase in the debt/net worth ratio from 20.2 percent in 1983 to a peak of 134.4 percent in 2010 followed by a modest decline to 130.9 percent in 2019 and then a precipitous drop by just about half to 65.4 percent in 2022. In comparison, the big drop in the ratio among all households was between 2010 and 2019,

[7] This pattern may also be partly a cohort effect since 401(k) plans and other defined contribution plans were not widely introduced into the workplace until after 1989.

followed by a more modest decline from 2019 to 2022. The sharp fall-off in the debt-net worth ratio among the youngest group between 2019 and 2022 deserves further comment. Was it due to a drop in real debt or a rise in net worth? We just saw that real mean net worth among this group mushroomed by 127 percent. The average real debt for this group was actually up by 13.8 percent, so that the cause of the sharp fall-off in the debt-net worth ratio was the upswing in net worth.

The debt-income ratio for this group also showed a sharp increase from 54.5 percent in 1983 to 148.5 percent in 2010 but a much more modest fall-off to 136.7 percent in 2022. The ratio of net home equity to total assets showed a downward drift from 30.9 percent in 1983 to 12.4 percent in 2010 and then a rebound to 20.1 percent in 2022. Mortgage debt as a share of house value zoomed up from 22.8 percent in 1983 to 76.4 percent in 2010 and then receded to 56.9 percent in 2022.

The time pattern is quite different for age group 75 and over. There was a generally downward trend in the share of homes in total assets from 1983 to 2022, particularly after 2007 (see Table 7). The share of liquid assets in total assets likewise generally declined over these years, especially after 1989. The pension account share rose almost continuously over time, which likewise mirrored the trend for all households. The share of financial investment assets and total directly plus indirectly owned stocks generally trended upward over time, as did the sum of business equity and other real estate starting in 1989. Unlike young households, the debt/net worth ratio generally trended downward over time among the oldest age group. Its level was also much lower than that for young households. The debt-income ratio for this group fluctuated a lot over time but showed no notable time trend.

[Table 7 about here]

Younger households were thus more heavily invested in homes and more heavily in debt whereas the portfolio of older households was more heavily skewed to financial assets, particularly corporate stock. As a result, younger households benefit in relative terms when housing prices rise and inflation is strong while older households relatively benefit from rising stock prices.

4. Rates of return and the leverage effect

4.1 Rates of return

To understand changes in the relative wealth position of different age groups, it is helpful to switch to a rate of return framework. Table 8 shows average annual *real* rates of return for both gross assets and net worth over the period from 1983 to 2022. Results are based on the average portfolio composition over the period and assume that all age groups receive the same rate of return, on average, by asset type. In particular, it is assumed that there are no systematic differences in returns on, for example, stocks by age class.

There is an extensive literature analyzing this issue by wealth class.[8] However, as far as I can ascertain, there is no such literature on differences in rates of return on individual assets by age class. For example, do middle-aged people get higher returns on their stock portfolio than young households?

[Table 8 about here]

It is first of interest to look at the results for all households (see Appendix Table 1 for data sources). The overall average annual *real* rate of return on gross assets rose from 2.36 percent in the 1983-1989 period to 3.14 percent in the 1989-2001 period and then increased again to 3.74 percent in the 2001-2007 period before plummeting to -5.21 percent over the Great Recession. This was followed by a substantial recovery to 4.78 percent over years 2010 to 2016, a decline to 4,17 percent per year over 2016 to 2019, and then a steep drop to 2.18 percent over 2019-2022.

As shown in Appendix Table 1, the highest annual return over the full 1983-2022 period was recorded for the financial assets category (including stocks) at 8.53 percent. This was followed closely by pension accounts at 7.61 percent. The combined category business and non-home real estate was next, at 4.97 percent, followed by residential real estate at 4.06 percent. The lowest return was recorded for liquid assets at 3.35 percent.

Over years 2007 to 2010 the largest *nominal* declines in asset prices occurred for residential real estate and the category businesses and non-home real estate. The value of financial assets, including stocks, bonds, and other financial securities, registered a positive annual rate of return of 0.77 percent because interest rates on corporate and foreign bonds continued to remain strong over these years. The value of pension accounts also had a positive annual return of 2.39 percent, reflecting the mixture of bonds and stocks held in pension

[8] See, for example, Johnson, Raub, and Newcomb (2013); Saez and Zucman (2016); Fagereng et. al. (2016); Bricker et. al. (2016); and Wolff (2017).

accounts, as did liquid assets at 1.96 percent per annum. From 2010 to 2016, all asset classes with the exception of liquid assets made a robust recovery. This was led by financial assets which recorded a 11.68 percent annual return and pension accounts with 6.87 percent annual rate of return. Between 2016 and 2019, returns slackened a bit but were still quite strong, led by financial assets at 11.68 percent per year and then pension accounts at 6.87 percent. The annual return on residential real estate declined to 4.49 percent per year, as did that on the combined category of other real estate and businesses to 5.19 percent, while that on liquid assets remained largely unchanged at 0.62 percent. Over years 2019-2022, the annual return on residential real estate picked up to 5.72 percent, that on business and non-home real estate to 8.44 percent, and that on pension accounts to 6.73 percent. However, the return on financial assets fell sharply to 6.73 percent and that on liquid assets was down slightly to 0.52 percent.

Returning to Table 8, we see that the average annual rate of return on *net worth* among all households also increased from 3.31 percent in the first period to 4.07 percent in the second and then to 4.78 percent in the third. Like the return on gross assets, it then fell off sharply to -5.88 percent over the 2007-2010 period. Once again, there was a strong recovery to 5.90 percent in the 2010-2016 period, a modest drop off to 5.08 percent in 2016-2019, and then a sharper drop to 3.11 percent in 2019-2022. It is first of note that the annual returns on net worth were uniformly higher – by about one percentage point – than those of gross assets over the first three and last three periods, when asset prices were rising. However, in the 2007-2010 period, the opposite was the case, with the annual return on net worth about a half percentage point lower than that on gross assets. These results illustrate the effect of leverage, raising the return when asset prices rise and lowering the return when asset prices fall. Over the full 1983-2022 period, the annual return on net worth was 0.86 percentage points higher than that on gross assets. I measure the *leverage effect* as the difference between the annual return on net worth and that on gross assets.

There are striking differences in rates of return on net worth by age class, with returns much higher for younger age groups. However, there is less variation in rates of return on gross assets and, in this case, returns are higher for older groups. The highest returns on gross assets over the full period, 1983-2022,were registered by age class 75 and over, at 3.02 percent per year. The returns fall off monotonically by age, with the lowest returns for age group 35 and under at 2.20 percent per year, for a difference of 0.82 points. These differences reflect differences in portfolio composition, with older households more heavily invested in high yield investment

assets like stocks and younger households with a greater share in housing. The rank order generally held up over time, with the notable exception of the 2001-2007 period when the returns were highest for the middle-aged groups. In the 2016-2019 period, the cleavage in returns between the oldest and youngest age groups was particularly high, 1.63 percentage points, reflecting the much higher gains on stocks and investment assets than on housing in those years.

This pattern is almost exactly reversed when we look at returns on net worth. In this case, returns over years 1983-2019 are highest for the youngest age group and decline monotonically with age. The gap between the youngest and oldest age group was 2.48 percentage points, much greater than the differential for gross assets. Moreover, in the first three periods and the last three when asset prices were rising, the highest returns were recorded by the youngest age group (except in 1983-1989 when the second youngest had a slightly higher return than the youngest one), and the lowest returns by the oldest group. Moreover, the rank order in returns, declining monotonically with age, remained largely unchanged with one or two minor exceptions. However, in the 2007-2010 period, when asset prices were declining, the youngest age group registered the lowest (that is, most negative) rate of return, and returns increased monotonically with age.

Differences in returns on net worth between the youngest and oldest age group were quite substantial in some years. In the 2001-2007 period, the annual return on net worth was 8.43 percent for the former and 3.45 percent for the latter – a difference of 4.98 percentage points. The spread was even greater over years 2010 to 2016, 6.21 percentage points, but lower in 2016-2019, 4.29 percentage points, and about the same in 2019-2022, 5.03 points. Over years 2007 to 2010, when asset prices declined, the return on net worth was -12.47 percent for the youngest group and -4.99 percent for the oldest– a huge differential of 7.48 percentage points in favor of the oldest group.

I next consider the leverage effect. This is defined as the difference in returns between net worth and gross assets. The return on net worth effect dominates that on gross assets. Despite the fact that returns on gross assets increase uniformly with age, the leverage effect monotonically declines with age. For the full 1983-2022 period, the leverage effect is 3.50 for age group 35 and under but only 0.21 for age group 75 and over, for a difference of 3.30 percentage points. The leverage effect falls off to 1.92 points for age group 35-44, then to 0.95 points for age group 45-54, and then more gradually up to the oldest age group. The leverage effect also declines

monotonically with age in each of the six sub-periods except for 2007-2010. In this latter case, the leverage effect rises uniformly with age, from -5.67 to -0.10 percentage points – a difference of 5.57 percentage points. Except for the 2007-2010 period, there is no notable time trend in the leverage effect over the remaining five periods. The spread in the leverage effect by age class reflects the much higher debt to net worth ratio of the younger age groups compared to the older ones. For example, in 2022, the debt-net worth ratio was 0.654 for the youngest age group, compared to 0.032 for the oldest one.

4.2 Decomposition Analysis

To understand trends in both wealth levels and wealth inequality, it is helpful to undertake a decomposition analysis. I begin with the basic wealth relationship as established in Wolff (1999):

(1) $\Delta W_T \equiv W_t - W_{t-1} = r_T W_T + S_T + G_t$.

where W_t = mean net worth (in constant dollars) at time t, ΔW_T is the change in mean wealth over period T from year t-1 to t, W_T is average wealth over period T, r_T = average real rate of return on wealth over period T, S_T = average household savings (in constant dollars) excluding capital gains and property income over period T,[9] and G_T = average net inheritances and gifts (in constant dollars) over period T. With regard to variable G_T, the SCF contains questions on (*inter-vivos)* gifts and inheritances received as well as gifts given to others and donations made to charitable organizations.

On the basis of equation (1), the change in wealth over a period can be decomposed into capital revaluation (existing wealth multiplied by the rate of return), savings, and net intergenerational transfers. The analysis is divided into seven sub-periods: 1983-1989, 1989-2001, 2001-2007, 2007-2010, 2010-2016, 2016-2019, and 2019-2022. The decomposition of mean wealth will also tell us the relative importance of capital gains and savings in explaining changes in wealth over time. The same decomposition can be used for each of the age groups.

Table 9 shows results of the decomposition for the rate of return effect by age group. Starting with the youngest age group, we see that the actual ratio of the mean net worth of age group 35 and under to the overall mean declined by 0.05 over 1983-2022. In contrast, the change in the mean net worth ratio from the return on wealth alone ($r_T W_T$) amounted to a positive 0.27.

[9] Though the standard SCF income measure includes realized capital gains as well as property income, these two components are excluded from S_T since they are already captured in the term $r_T W_T$.

In other words, the ratio should have risen by 0.27 between 1983 and 2022, instead of actually dropping by 0.05. The leverage effect should have raised the ratio of mean wealth between the youngest age group and the overall average to 0.48 in 2022, compared to the actual ratio of 0.16, a difference of 0.32.

[Table 9 about here]

The rate of return effect is similar for age group 35-44. The actual change in the ratio of the mean net worth of this age group to overall was -0.20, while the change in the mean net worth ratio from the return on wealth alone was a positive 0.25. The rate of return effect should have increased their mean wealth ratio to 0.95 compared to the actual ratio of 0.50, a discrepancy of 0.45. Likewise, age group 45-54 saw their ratio of the mean net worth group to overall decline by 0.62, whereas their wealth ratio should have remained virtually unchanged from the return on their wealth alone. Rates of return should have raised their relative mean wealth to 1.51 compared to the actual value of 0.91, a differential of 0.61.

Results are more muted for age groups 55-64 and 65-74. Among the former, their relative wealth decreased by 0.18, while rates of return should have lowered it by 0.11, for a difference of 0.08. For the latter, their net worth ratio was down by 0.23, whereas rates of return should have depressed it by 0.22, for virtually no divergence. In contrast, among the oldest age group, their net worth ratio rose by a staggering 0.50 – that is, by half. Rates of return should have caused it to fall by 0.14 to 0.91. Instead it zoomed up to 1.55, for a difference of 0.64. That is to say, even with the rate of return effect acting against it, the oldest age group managed to achieve a remarkable gain in its relative wealth. The reasons behind this are the main focus of the remainder of the paper.

5. What's Behind the Dramatic Shift in Age-Wealth Profiles?

What happened to account for the discrepancies between relative gains in net worth by age group and the power of the leverage effect? Several possibilities come to mind. (1) changes in mean gross home value relative to the overall average; (2) changes in mean net home equity relative to the overall average; (3) changes in mortgage debt relative to the overall average; (4) shits in mean home values over time; (5) trends in the homeownership rate; (6) movements in the value of a household's stock portfolio relative to average, and (7) relatedly, developments in the stock ownership rate; (8) change in mean net wealth transfers (inheritances and inter-vivos gifts)

relative to the overall average; and (9) in the case of young households, a rise in the value of educational loans relative to the overall average. Is there really a smoking gun? Let's consider each one in turn.

The first factor, the ratio of mean gross home value to the overall level, does not play a role for the youngest age group between 1983 and 2022 (see Panel A of Table 10). In fact, it actually rises for this age group, from 0.29 in 1983 to 0.39 in 2022, while their relative wealth holdings fall. However, this factor does play a role for the oldest age group. The ratio rises from 1.00 to 1.16 while its relative wealth holdings also expand. How important is this factor in explaining the age group's gain in relative mean net worth? To analyze this, I first compute the change in the group's mean net worth emanating from only the group's change in mean gross home value, which is $234,500 (in 2022 dollars). Second, I compute the change in overall mean net worth resulting from the change in overall mean gross home value, which is $184,900. This raises overall mean net worth from its actual 1983 value of $364,000 to its new 2022 simulated value of $549,000. Third, I re-compute the ratio of this age group's mean net worth to the overall average net worth. This ratio rises from its actual 1983 value of 1.050 to its new simulated value of 1.124 in 2002 or by 0.073. In contrast, its actual mean net worth ratio rose from 1.050 to 1.554 or by 0.504. Finally, I compute the share of the actual change in the mean net worth ratio explained by the change in gross house value by dividing the former change by the latter change. This factor explains a modest 14.6 percent (.073/5.04) of the actual increase in the group's mean net worth ratio.

[Table 10 about here]

The second factor, the ratio of mean net home equity to the overall level, is correct for both age groups. The ratio falls for age group 35 and under, from 0.28 to 0.24, as does the net worth ratio, but rises for the eldest age group, from 1.03 to 1.46, as does its relative wealth movement. In this case, this factor accounts for a trivial 3.3 percent of the drop in the mean net worth ratio of this age group's actual mean net worth ratio decline from 0.210 to 0.156 or by 0.054. On the other hand, this factor explains a substantial 38.3 percent of the relative gain in net worth of the 75 and over age group. However, it should be stressed that these results are *not* additive across the various factors considered in the analysis.

The third factor, the ratio of mean primary home mortgage debt to the overall level, is correct for both age groups. This ratio rises sharply for the youngest age group, from 0.32 to 0.78,

conformable with a decrease in the net worth ratio, and decreases substantially for the oldest age group, from 0.87 to 0.40, consistent with a rise in their net worth ratio. This factor turns out to be extremely important for the youngest age group and important for the oldest one as well. Subtracting the change in the former group's mean mortgage debt over 1983- 2022 to its 1983 net worth ratio would lower its mean net worth ratio from 0.210 to 0.050 or by 0.160. Its actual mean net worth ratio declined from 0.210 to 0.156 or by 0.054. As a result, this factor explains 297 percent (.160/.054) of the actual decline in the group's mean net worth ratio – that, is almost three times the actual decline. For the oldest age group, subtracting the change in the group's mean mortgage debt over 1983- 2022 to its 1983 net worth ratio would raise its mean net worth ratio from 1.050 to 1.228 or by 0.177. Its actual mean net worth ratio went up from 1.050 to 1.554 or by 0.504. As a result, this factor explains a significant 35.2 percent (.177/.504) of the actual decline in the group's mean net worth ratio.

The fourth factor concerns movements in the average home value. This is estimated as the ratio of mean gross home value to the homeownership rate. This factor has to be rejected for the youngest group because the ratio rises from 0.477 to 0.678, in contrast to a fall in its relative wealth. However, for the oldest group, it increases from 0.912 to .946, consistent with its gain in relative net worth.

The fifth factor, the homeownership rate, might well be close to a "smoking gun, at least for the oldest age group. In terms of its actual level, it is about the same for the youngest age group in 1983, 38.7 percent, and 2022, 38.5 percent, whereas its relative wealth falls more substantially. In contrast, the homeownership rate shoots up by 11.5 percentage points for the oldest group, from 69.4 to 81.0 percent, and its relative wealth holdings expands by a sizeable 50.4 percent. Likewise, relative to the overall average homeownership rate, that of the youngest group drops by 2.8 percentage points from -24.7 to -27.6 percent while that of the oldest enlarges by 8.9 percentage points from 6.0 to 14.9 percent.

The sixth factor, changes in the value of a household's stock portfolio relative to the overall average, could constitute another smoking gun for the oldest group. As noted above, I use the value of stocks directly owned plus the value of stocks indirectly owned through mutual funds, trusts, IRAs, 401(k) plans, and other retirement accounts as the metric for stock ownership. This ratio rises for the youngest age class from 0.09 to 0.25 from 1983 to 2022, which is inconsistent with its relative decline in net worth, but it skyrockets for the oldest group from

0.56 to 3.47, which accords with the sharp increase in its relative net worth. For the latter, it accounts for a staggering 269 percent of its gain in net worth relative to the overall average.

The seventh is the stock ownership rate which is directly related to the previous factor. The stock ownership rate rises over time for both the youngest age group and the oldest one as well. In contrast, the difference between the group's stock ownership rate and the overall average falls for both age groups. The former is consistent with the relative decline in the wealth of the youngest group while the latter is inconsistent with the rise in the relative wealth of the oldest age group. In fact, the differential drops more for the oldest than the youngest group, which is contrary to the increase in the former's relative net worth.

The eighth factor, the change in mean net wealth transfers (inheritances and inter-vivos gifts), deserves some comment. The analysis makes use of the Survey of Consumer Finances. The advantage of this data source is that it provides detailed information not only on bequests and gifts received but also on those given as well. Households are asked to record both the amount of the transfer received and the year of receipt as well as those given. In addition, they are asked to indicate for selected asset holding (real estate and businesses) whether the original source of the holding was from an inheritance or gift. This information will allow us to estimate the dollar value of a household's net transfers.[10] The variable of interest is the net value, the difference in value between transfers received and transfers given, over the five years prior to the survey year.

The recall or recollection method is likely to have serious under-reporting problems, and estimates of inheritances reported below are very likely to be biased downward. However, it is difficult to ascertain whether there is a systematic bias in under-reporting by age or income class, or by other demographic characteristics of the respondent

The results do show a downward trend in the dollar value of net transfers in 2022 dollars for the youngest group from 1989 to 2022, which is consistent with the relative decline in the

[10] As noted above, questions on inheritances and gifts are also asked in two different ways. First, there are several questions on what I call "general wealth transfers," which presumably refer to any type of gift or inheritance. Second, there are specific questions on inheritances and gifts of real estate and businesses. These are asked in the sections of the questionnaire which deal specifically with the value of homes, other properties, and businesses. It is unclear from the questionnaire whether the questions on general wealth transfers also incorporate the specific transfers indicated in the questions on real estate and businesses. In principle, the former should capture the responses to the questions on the specific transfers. To be on the conservative side, I have included the value of the specific wealth transfers in only two circumstances: (1) if no general wealth transfer was reported; and (2) if the value of the specific wealth transfer exceeds the value of the general wealth transfer.

group's net worth. However, the trend is also downward for the oldest group, which is inconsistent with its relative net worth trend. Likewise, there is a downward trend in the ratio of net transfers as a ratio to the overall average for the youngest group, from 0.834 to 0.569 but this is also true for the oldest group as well, from 0.299 to 0.049. Further analysis reveals that the reduction in the ratio of net transfers to the overall average for the youngest group accounts for only a very small fraction (8.3 percent) of the decline in the group's overall net worth ratio.

The final factor is a rise in the value of educational loans relative to the overall average in the case of young households. A lot of press coverage has been given to escalating student debt among young families. Its mean value did increase by 20.5 percent among young households between 2007 and 2022 (Panel L). However, as a fraction of overall mean student debt, it actually fell from 2.45 to 1.66, so that the trend is contrary to that of the group's relative net worth. Subtracting the change in the group's mean educational debt over 2007- 2022 from its 2007 net worth ratio would lower its mean net worth ratio from 0.170 to 0.164 or by 0.006. Its actual mean net worth ratio declined from 0.170 to 0.156 or by 0.014. As a result, this factor explains 43.5 percent (.006/.014) of the actual decline in the group's mean net worth ratio. Though this share seems quite substantial, it mainly reflects the very small change in the actual net worth ratio over this period and I therefore reject it as a major factor in explaining the decline in the group's net worth ratio.

Results are similar for median student debt among debtors. Its dollar value actually slipped a bit between 2007 and 2022 and fell from 1.17 to 0.73 as a ratio to overall median educational debt among debtors. A related factor is the share of households in the age group with an outstanding educational loan. As shown in Panel P, the percentage rose by 6.4 from 33.7 in 2007 to 40.1 in 2022 among the youngest age group. However, relative to the overall share there was virtually no change.

5. Summary and Concluding Remarks

The paper focuses on the slippage in the net worth ratio among households under age 35 relative to all households between 1983 and 2022 and its phenomenal rise among households aged 75 and over. Based on differential leverage between the two groups (the much higher debt-net worth ratio among younger families compared to older ones), we would have expected exactly the opposite – namely, that the net worth of younger households should have risen

relative to older ones. Indeed, the average real rate of return on net worth of the youngest age group over years 1983-2022 was 5.67 percent while that of the oldest was 3.29 percent. What factors explain these seemingly perverse results?

The first is increasing net home equity for the elderly. The increase in the ratio of mean net home equity to the overall level over 1983- 2022 explains a substantial 38.3 percent of the relative gain in net worth of the 75 and over age group but very little for that of the youngest group. The second is surging mortgage debt among the youngest households. This explains 297 percent (.160/.054), of the actual decline in the group's mean net worth ratio – that, is almost three times the actual decline. Its relative decline also accounts for a significant 35.2 percent of the increase in the oldest group's mean net worth ratio. However, it should be stressed that these results are *not* additive across the various factors considered in the analysis

Third, the homeownership rate might well be close to a "smoking gun" for the oldest age group. It shoots up by 11.5 percentage points for this group, and the group's relative wealth holdings expand by a sizeable 50.4 percent. Likewise, relative to the overall average homeownership rate, that of the oldest enlarges by 8.9 percentage points from 6.0 to 14.9 percent. The fourth is the fantastic growth in stock holdings among the oldest age group, which could constitute another smoking gun. The value of the group's stock portfolio relative to the overall average skyrockets from 0.56 to 3.47, which accords with the sharp increase in its relative net worth, and accounts for a staggering 269 percent of its gain in net worth relative to the overall average.

Fifth, among the youngest age group, despite dire press reports, educational loans fail to appear as a significant factor. As a fraction of overall mean student debt, it actually fell from 2.45 in 2007 (the first date of available data) to 1.66 in 2022, so that the trend is contrary to that of the group's relative net worth. Moreover, subtracting the change in the group's mean educational debt over 2007- 2022 from its 2007 net worth ratio lowers the group's mean net worth ratio by a rather trivial 0.006.

References

Bricker, Jesse, Jacob Krimmel, Alice Henriques, and John Sabelhaus. 2016. "Measuring Income and Wealth at the Top Using Administrative and Survey Data," *Brookings Papers on Economic Activity,* Spring, pp. 261-312.

Bricker J, Dettling LJ, Henriques A, Hsu JW, Jacobs L, Moore KB, Pack S, Sabelhaus J, Thompson J, Windle RA. 2017. "Changes in U.S. Family Finances from 2013 to 2016: Evidence from the Survey of Consumer Finances." *Federal Reserve Bulletin* 103(3): 1-42.

Fagereng, Andreas, Luigi Guiso, Davide Malacrino, and Luigi Pistaferri. 2016. "Heterogeneity in Returns to Wealth and the Measurement of Wealth Inequality," *American Economic Review,* Vol. 106, No. 5, pp. 651-655.

Johnson, Barry, Brian Raub, and Joseph Newcomb. 2013. ''A New Look at the Income-Wealth Connection for America's Wealthiest Decedents,'' IRS Statistics of Income Working Paper Series.

Modigliani, Franco, and Richard Blumberg. 1954. "Utility Analysis and the Consumption Function: An Interpretation of Cross-Section Data," in Kenneth K. Kurihara, Editor, *Post Keynesian Economics*, New Brunswick, N.J.: Rutgers University Press, pp. 388-436.

Saez, Emmanuel and Gabriel Zucman. 2016. "Wealth Inequality in the United States since 1913: Evidence from Capitalized Income Tax Data," *Quarterly Journal of Economics*, Vol. 131, No. 2, May, pp. 519-578.

Wolff, Edward N. 1999. "Wealth Accumulation by Age Cohort in the U.S., 1962-1992: The Role of Savings, Capital Gains and Intergenerational Transfers," *Geneva Papers on Risk and Insurance*, Vol. 24, No. 1, January, pp. 27-49.

Wolff, Edward N. 2017. A Century of Wealth in America. Harvard University Press, Cambridge, MA.

Wolff, EN (2021) Household Wealth Trends in the United States, 1962 to 2019: Median Wealth Rebounds… But Not Enough. NBER Working Paper No. 28383, January.

Table 1. Mean and Median Wealth and Gini Coefficients, Selected Years, 1983-2022

(In thousands, 2022 dollars)

Variable	1983	1989	2001	2007	2010	2019	2022
A. Net Worth							
1. Median	93.5	101.6	121.8	145.0	81.3	115.4	164.0
2. Mean	364.0	423.4	629.9	758.5	636.7	828.5	1,024.4
3. Gini coefficient	0.799	0.828	0.826	0.834	0.866	0.869	0.847
Percentage or Actual Change[a]							
	1983-1989	1989-2001	2001-2007	2007-2010	2010-2019	2019-2022	1983-2022
1. Median	8.7	19.9	19.0	-43.9	41.9	36.7	75.4
2. Mean	16.3	48.8	20.4	-16.1	30.1	22.5	181.4
3. Gini coefficient	0.029	-0.001	0.008	0.032	0.003	-0.022	0.048
Annual Growth Rates (percentage)							
	1983-1989	1989-2001	2001-2007	2007-2010	2010-2019	2019-2022	1983-2022
1. Median	1.39	1.51	2.90	-19.28	3.89	11.72	1.44
2. Mean	2.52	3.31	3.10	-5.84	2.93	7.07	2.65

Source: author's computations from the 1983, 1989, 2001, 2007, 2010, 2019, and 2022 SCF.
Wealth figures are deflated by the CPI-U-RS.
a. Percentage change for lines 1 and 2; actual change for line 3.

Table 2. Composition of Total Household Wealth, 1983 – 2022

(Percent of gross assets)

Wealth component	1983	1989	2001	2007	2010	2019	2022
Principal residence	30.1	30.2	28.2	32.8	30.7	26.9	27.0
Other real estate	14.9	14.0	9.8	11.3	11.6	9.4	8.2
Unincorporated business equity[a]	18.8	17.2	17.2	20.1	17.7	20.0	20.3
Liquid assets[b]	17.4	17.5	8.8	6.6	7.7	6.8	6.7
Pension accounts[c]	1.5	2.9	12.3	12.1	15.1	15.5	15.8
Financial securities[d]	4.2	3.4	2.3	1.5	1.8	0.9	1.1
Corporate stock & mutual funds	9.0	6.9	14.8	11.8	11.2	15.5	16.9
Personal trusts	2.6	3.1	4.8	2.3	2.4	3.6	2.7
Miscellaneous assets[e]	1.3	4.9	1.8	1.7	1.7	1.4	1.3
Total	100.0	100.0	100.0	100.0	100.0	100.0	100.0
Debt on principal residence	6.3	8.6	9.4	11.4	12.7	9.1	7.8
All other debt[f]	6.8	6.4	3.1	3.9	4.4	3.8	3.2
Total debt	13.1	15.0	12.5	15.3	17.1	12.9	11.0
Selected ratios in percent:							
Debt / net worth ratio	15.1	17.6	14.3	18.1	20.6	14.9	12.4
Debt / income ratio	68.4	87.6	81.1	118.7	127.0	104.0	97.5
Stocks, directly or indirectly owned as a ratio to total assets[g]	11.3	10.2	24.5	16.8	17.5	22.6	23.6

Source: author's computations from the 1983-2022 SCF.

a. Net equity in unincorporated farm and non-farm businesses and closely-held corporations.

b. Checking accounts, savings accounts, time deposits, money market funds, certificates of deposits, and the cash surrender value of life insurance.

c. IRAs, Keogh plans, 401(k) plans, the accumulated value of defined contribution pension plans, and other retirement accounts.

d. Corporate bonds, government bonds (including savings bonds), open-market paper, and notes.

e. Gold and other precious metals, royalties, jewelry, antiques, furs, loans to friends and relatives, future contracts, and miscellaneous assets.

f. Mortgage debt on all real property except principal residence; credit card, installment, and other debt.

g. Includes direct ownership of stock shares and indirect ownership through mutual funds, trusts, and IRAs, Keogh plans, 401(k) plans, and other retirement accounts

Table 3. Composition of Household Wealth by Wealth Class, 2022

(Percent of gross assets)

Asset	All Households	Top One Percent	Next 19 Percent	Middle 3 Quintiles
Principal residence	27.0	7.2	26.7	63.9
Liquid assets (bank deposits, money market funds, and cash surrender value of life insurance)	6.7	5.0	7.2	8.1
Pension accounts	15.8	6.1	22.6	14.8
Corporate stock, financial securities, mutual funds, and personal trusts	20.7	31.5	19.6	4.0
Unincorporated business equity other real estate	28.6	48.9	22.6	8.1
Miscellaneous assets	1.3	1.3	1.3	1.1
Total assets	100.0	100.0	100.0	100.0
Memo (selected ratios in percent):				
Debt / net worth ratio	12.4	2.2	8.6	46.1
Debt / income ratio	97.5	40.4	82.7	135.1
All stocks / total assets[a]	23.6	26.8	26.6	9.6
Ownership Rates (Percent)				
Principal residence	67.4	97.9	96.7	77.4
Other real estate	17.0	70.3	43.3	12.9
Pension assets	55.5	91.6	91.0	55.4
Unincorporated business	13.1	77.3	31.5	9.6
Corporate stock, financial securities, mutual funds, and personal trusts	31.5	91.8	71.8	25.3
Stocks, directly or indirectly owned[a]	57.5	95.8	94.9	56.8

Source: author's computations from the 2022 SCF. Households are classified into wealth class according to their net worth. Brackets for 2022 are:

Top one percent: Net worth of $13,390,060 or more.
Next 19 percent: Net worth between $845,000 and $13,390,059.
Quintiles 2 through 4: Net worth between $600 and $844,999.

Also, see Notes to Table 2.
a. Includes direct ownership of stock shares and indirect ownership through mutual funds, trusts, and IRAs, Keogh plans, 401(k) plans, and other retirement accounts

Table 4. Age-Wealth Profiles and Homeownership Rates by Age Group, 1983-2022

Age Group	1983	1989	2001	2004	2007	2010	2016	2019	2022
A. Mean Net Worth (Ratio to Overall Mean)									
Overall	1.00	1.00	1.00	1.00	1.00	1.00	1.00	1.00	1.00
Under 35	0.21	0.29	0.19	0.14	0.17	0.11	0.09	0.08	0.16
35-44	0.71	0.72	0.64	0.65	0.58	0.42	0.40	0.57	0.50
45-54	1.53	1.50	1.25	1.21	1.19	1.14	1.05	1.11	0.91
55-64	1.67	1.58	1.86	1.91	1.69	1.80	1.70	1.59	1.48
65-74	1.93	1.61	1.72	1.57	1.86	1.73	1.55	1.64	1.70
75 & over	1.05	1.26	1.20	1.19	1.16	1.35	1.57	1.30	1.55
B. Mean Financial Resources (Ratio to Overall Mean)									
Overall	1.00	1.00	1.00	1.00	1.00	1.00	1.00	1.00	1.00
Under 35	0.17	0.28	0.19	0.12	0.15	0.10	0.07	0.06	0.13
35-44	0.59	0.68	0.61	0.64	0.54	0.40	0.36	0.56	0.47
45-54	1.53	1.48	1.27	1.24	1.19	1.15	1.04	1.10	0.85
55-64	1.72	1.60	1.94	1.97	1.80	1.87	1.77	1.63	1.52
65-74	2.12	1.69	1.74	1.61	1.86	1.74	1.56	1.67	1.76
75 & over	1.10	1.27	1.11	1.08	1.10	1.27	1.55	1.27	1.58
C. Homeownership Rate (in Percentage)									
Overall	63.4	62.8	67.7	69.1	68.6	67.2	63.7	64.9	66.0
Under 35	38.7	36.3	40.2	41.5	40.8	37.5	33.1	36.2	38.5
35-44	68.4	64.1	67.6	68.6	66.1	63.8	57.8	61.4	61.1
45-54	78.2	75.1	76.1	77.3	77.3	75.2	68.8	69.7	70.7
55-64	77.0	79.2	83.2	79.1	80.9	78.1	73.7	74.1	77.8
65-74	78.3	78.1	82.5	81.2	85.5	82.5	78.9	78.4	76.1
75 & over	69.4	70.2	76.2	85.1	77.0	81.3	83.1	82.4	81.0

Source: author's computations from the SCF.
Households are classified according to the age of the householder.

Table 5. Composition of Household Wealth by Age Class, 2022
(Percent of gross assets)

Asset	All	Under 35	35-44	45-54	55-64	65-74	75 & over
Principal residence	27.0	46.5	39.1	34.4	23.7	20.9	22.0
Liquid assets (bank deposits, money market funds, and cash surrender value of life insurance)	6.7	8.1	7.9	7.5	5.7	7.2	6.7
Pension accounts	15.8	9.2	12.6	17.4	18.5	17.0	11.8
Corporate stock, financial securities, mutual funds, and personal trusts	20.7	10.1	11.9	12.9	20.1	23.7	31.2
Unincorporated business equity other real estate	28.6	25.0	26.7	27.1	30.9	29.7	26.7
Miscellaneous assets	1.3	1.0	1.9	0.7	1.0	1.4	1.6
Total assets	100.0	100.0	100.0	100.0	100.0	100.0	100.0
Memo (selected ratios in percent):							
Debt / equity ratio	12.4	65.4	34.5	20.5	8.7	5.0	3.2
Debt / income ratio	97.5	136.7	113.8	120.1	81.7	67.9	51.7
Net home equity / total assets[a]	19.2	20.1	19.9	21.6	18.3	18.0	19.7
Principal residence debt / house value	28.8	56.9	49.0	37.2	23.0	14.0	10.0
All stocks / total assets[b]	23.6	28.9	22.5	14.1	9.8	7.0	5.9

Source: author's computations from the 2022 SCF.
Households are classified according to the age of the householder.

Table 6. Evolution of the Composition of Household Wealth for the Under 35 Age Group, 1983-2022

(Percent of gross assets)

Asset	1983	1989	2001	2007	2010	2019	2022
Principal residence	40.0	41.8	42.9	54.3	52.6	56.9	46.5
Liquid assets (bank deposits, money market funds, and cash surrender value of life insurance)	19.5	11.2	11.8	5.7	8.3	9.0	8.1
Pension accounts	1.0	2.5	7.3	6.0	9.1	9.7	9.2
Corporate stock, financial securities, mutual funds, and personal trusts	9.1	7.7	16.5	4.2	4.0	4.7	10.1
Unincorporated business equity and other real estate	29.1	30.7	19.3	28.7	23.9	18.8	25.0
Miscellaneous assets	1.4	6.2	2.2	1.2	2.0	0.9	1.0
Total assets	100.0	100.0	100.0	100.0	100.0	100.0	100.0
Memo (selected ratios in percent):							
Debt / NW ratio	20.2	48.5	62.4	92.7	134.4	130.9	65.4
Debt / income ratio	54.5	94.3	106.4	167.5	148.5	125.4	136.7
Net home equity / total assets	30.9	17.6	15.5	18.8	12.4	20.3	20.1
Principal residence debt / house value	22.8	57.9	63.8	65.4	76.4	64.3	56.9
All stocks / total assets[a]		4.3	19.3	5.9	7.8	8.4	13.4

Source: author's computations from the SCF.

Households are classified into age class according to the age of the household head.

a. The variable "all stocks" is not available for 1983.

Table 7. Evolution of the Composition of Household Wealth for Age Group 75 Plus, 1983-2022
(Percent of gross assets)

Asset	1983	1989	2001	2007	2010	2019	2022
Principal residence	29.8	22.5	27.7	30.2	28.4	24.4	22.0
Liquid assets (bank deposits, money market funds, and cash surrender value of life insurance)	17.3	29.7	13.5	10.5	9.5	8.6	6.7
Pension accounts	1.5	0.0	6.9	5.0	8.5	13.9	11.8
Corporate stock, financial securities, mutual funds, and personal trusts	16.0	26.9	35.7	25.6	24.2	27.9	31.2
Unincorporated business equity other real estate	34.1	17.5	15.4	27.1	27.8	23.1	26.7
Miscellaneous assets	1.3	3.4	0.9	1.6	1.6	2.1	1.6
Total assets	100.0	100.0	100.0	100.0	100.0	100.0	100.0
Memo (selected ratios in percent):							
Debt / NW ratio	15.0	1.8	1.8	2.1	4.3	4.8	3.2
Debt / income ratio	55.0	20.0	22.8	29.9	61.4	63.4	51.7
Net home equity / total assets[a]	23.6	22.1	26.6	28.7	25.5	21.1	19.7
Principal residence debt / house value	21.0	2.0	3.8	4.9	10.1	13.4	10.0
All stocks / total assets[a]		9.0	29.3	20.0	18.9	28.0	30.1

Source: author's computations from the SCF.
Households are classified into age class according to the age of the household head.
a. The variable "all stocks" is not available for 1983.

Table 8. Average Annual Real Rates of Return by Period and Age Class, 1983 – 2022

Age Group	1983-1989	1989-2001	2001-2007	2007-2010	2010-2016	2016-2019	2019-2022	1983-2022
A. Gross Assets								
All households	2.36	3.14	3.74	-5.21	4.78	4.17	2.18	2.73
Under 35	2.06	2.74	3.63	-6.80	4.23	3.01	1.57	2.20
35-44	2.24	2.79	3.81	-6.03	4.45	3.38	2.03	2.43
45-54	2.23	2.99	3.78	-5.38	4.71	3.85	2.13	2.61
55-64	2.45	3.27	3.84	-4.79	4.87	4.28	2.35	2.87
65-74	3.06	3.27	3.78	-4.77	4.81	4.47	2.23	2.95
75 & over	2.97	3.74	3.34	-4.89	4.93	4.64	2.04	3.02
B. Net Worth								
All households	3.31	4.07	4.78	-5.88	5.90	5.08	3.11	3.58
Under 35	3.69	5.75	8.43	-12.47	11.40	9.21	7.34	5.70
35-44	3.70	4.72	6.14	-8.28	7.95	5.84	4.51	4.35
45-54	3.10	3.93	4.94	-6.22	6.15	5.00	3.46	3.56
55-64	3.12	3.81	4.49	-5.17	5.60	4.90	3.00	3.41
65-74	3.58	3.51	4.16	-5.02	5.30	4.88	2.61	3.27
75 & over	3.49	3.86	3.45	-4.99	5.19	4.92	2.31	3.22
C. Difference in returns between net worth and gross assets (leverage effect)								
All households	0.95	0.93	1.04	-0.68	1.12	0.92	0.93	0.86
Under 35	1.64	3.01	4.80	-5.67	7.18	6.20	5.77	3.50
35-44	1.47	1.93	2.33	-2.26	3.50	2.46	2.47	1.92
45-54	0.87	0.94	1.16	-0.84	1.44	1.15	1.33	0.95
55-64	0.66	0.54	0.65	-0.38	0.72	0.62	0.65	0.55
65-74	0.52	0.23	0.38	-0.24	0.49	0.41	0.38	0.33
75 & over	0.52	0.12	0.12	-0.10	0.26	0.28	0.27	0.21

Source: author's computations from the SCF. Households are classified into age class according to the age of the household head.
Rates of return are based on average portfolio composition and rates of return by asset type over the period.

Table 9. Decomposition of Trends in the Ratio of Mean Wealth by Age Group to the Overall Mean, 1983-2022

Age Group	1983-1989	1989-2001	2001-2007	2007-2010	2010-2016	2016-2019	2019-2022	1983-2022	2022 Projected Net Worth Ratio[a]
A. Age Under 35									
1. Actual change in mean net worth ratio	0.08	-0.09	-0.02	-0.06	-0.02	-0.01	0.07	-0.05	
2. Change in mean net worth ratio from return on wealth alone ($r_t w_{t-1}$)	0.00	0.06	0.05	-0.03	0.04	0.01	0.01	0.27	0.48
3. Difference	-0.07	0.15	0.07	0.03	0.06	0.02	-0.06	0.32	
B. Ages 35-44									
1. Actual change in mean net worth ratio	0.02	-0.08	-0.07	-0.16	-0.02	0.18	-0.07	-0.20	
2. Change in mean net worth ratio from return on wealth alone ($r_t w_{t-1}$)	0.02	0.06	0.05	-0.04	0.05	0.01	0.02	0.25	0.95
3. Difference	0.00	0.14	0.12	0.12	0.07	-0.17	0.10	0.45	
C. Ages 45-54									
1. Actual change in mean net worth ratio	-0.03	-0.24	-0.06	-0.05	-0.10	0.06	-0.20	-0.62	
2. Change in mean net worth ratio from return on wealth alone ($r_t w_{t-1}$)	-0.02	-0.02	0.01	-0.01	0.02	0.00	0.01	-0.01	1.51
3. Difference	0.01	0.22	0.07	0.03	0.11	-0.07	0.22	0.61	0.61
E. Ages 55-64									
1. Actual change in mean net worth ratio	-0.09	0.28	-0.17	0.12	-0.10	-0.11	-0.10	-0.18	
2. Change in mean net worth ratio from return on wealth alone ($r_t w_{t-1}$)	-0.02	-0.05	-0.03	0.04	-0.03	-0.01	-0.01	-0.11	1.56
3. Difference	0.07	-0.33	0.14	-0.08	0.07	0.10	0.10	0.08	
F. Ages 65-74									
1. Actual change in mean net worth ratio	-0.32	0.11	0.14	-0.13	-0.18	0.09	0.06	-0.23	
2. Change in mean net worth ratio from return on wealth alone ($r_t w_{t-1}$)	0.03	-0.11	-0.06	0.05	-0.06	-0.01	-0.02	-0.22	1.71
3. Difference	0.35	-0.21	-0.21	0.18	0.12	-0.10	-0.08	0.01	
G. Ages 75 and over									
1. Actual change in mean net worth ratio	0.21	-0.07	-0.04	0.19	0.22	-0.27	0.26	0.50	
2. Change in mean net worth ratio from return on wealth alone ($r_t w_{t-1}$)	0.01	-0.03	-0.09	0.03	-0.06	-0.01	-0.03	-0.14	0.91
3. Difference	-0.20	0.03	-0.05	-0.16	-0.27	0.27	-0.29	-0.64	

Source: author's computations from the SCF. Households are classified into age class according to the age of the household head.
Rates of return are based on average portfolio composition and rates of return by asset type over the period.
a. 2022 net worth ratio is projected on the basis of rates of return by age class.

Table 10. Time Trends in Factors Affecting the Age-Wealth Profile
(Dollar figures are in thousands of 2022 dollars)

Age Group	1983	1989	2001	2007	2010	2016	2019	2022	Percent Explained By Factor, 1983-2022
A.Ratio of mean gross home value / overall mean gross home value									
Under 35	0.29	0.50	0.42	0.46	0.36	0.34	0.36	0.39	-159.9
75 & over	1.00	0.82	1.04	0.92	1.08	1.22	1.08	1.16	14.6
B.Ratio of mean net home equity / overall mean net home equity									
Under 35	0.28	0.29	0.23	0.24	0.15	0.19	0.20	0.24	3.3
75 & over	1.03	1.12	1.51	1.35	1.65	1.66	1.41	1.46	38.3
C. Ratio of mean primary home mortgage debt / overall mean mortgage debt									
Under 35	0.32	1.01	0.80	0.86	0.67	0.61	0.68	0.78	297.2
75 & over	0.87	0.06	0.12	0.13	0.27	0.36	0.42	0.40	35.2
D. Ratio of mean imputed house price to the overall mean house price									
Under 35	0.48	0.86	0.71	0.77	0.65	0.65	0.65	0.68	--
75 & over	0.91	0.73	0.93	0.82	0.89	0.93	0.85	0.95	--
E. Homeownership rate (percentage)									
Overall	63.4	62.8	67.7	68.6	67.2	63.7	64.9	66.0	--
Under 35	38.7	36.3	40.2	40.8	37.5	33.1	36.2	38.5	--
75 & over	69.4	70.2	76.2	77.0	81.3	83.1	82.4	81.0	--
F. Difference in homeownership rate with the overall rate (percentage)									
Under 35	-24.7	-26.5	-27.4	-27.9	-29.7	-30.6	-28.7	-27.6	--
75 & over	6.0	7.5	8.6	8.4	14.1	19.4	17.5	14.9	--
G. Ratio of mean direct plus indirect stock holdings to the overall average[a]									
Under 35	--	0.09	0.37	0.09	0.08	0.00	0.10	0.25	-19.8
75 & over	--	0.56	2.17	1.11	1.08	0.00	2.23	3.47	269.1
H. Stock Ownership rate (percentage)[a]									
Overall	--	31.7	51.9	49.1	46.9	49.3	49.6	56.3	--
Under 35	--	21.8	48.9	36.0	36.0	39.1	43.8	52.5	--
75 & over	--	24.7	34.2	39.5	41.9	47.4	46.6	49.2	--
I. Difference in stock ownership rate with the overall rate (percentage)									
Under 35		-9.9	-3.1	-13.1	-10.9	-10.2	-5.8	-3.8	--
75 & over		-7.0	-17.7	-9.6	-5.0	-1.9	-3.1	-7.1	--

J. Mean net wealth transfers over the last five years (2022$)[a]									
All Households	**--**	**-9.9**	**-3.1**	**-13.1**	**-10.9**	**-10.2**	**-5.8**	**-3.8**	**--**
Under 35	**--**	**2.9**	**-14.7**	**3.5**	**5.9**	**8.3**	**2.8**	**-3.3**	**--**
75 & over	**--**	**7.0**	**17.7**	**9.6**	**5.0**	**1.9**	**3.1**	**7.1**	**--**
K. Ratio of mean net wealth transfers over the last five years to the overall average[a]									
Under 35	**--**	**-0.29**	**4.80**	**-0.27**	**-0.54**	**-0.81**	**-0.48**	**0.85**	**8.3**
75 & over	**--**	**-0.71**	**-5.80**	**-0.73**	**-0.46**	**-0.19**	**-0.52**	**-1.85**	**-8.5**
L. Mean value of educational debt (2022$)[b]									
Overall				**4.6**	**6.7**	**9.3**	**9.9**	**10.2**	**--**
Under 35				**11.4**	**14.1**	**18.0**	**19.7**	**16.9**	**--**
M. Ratio of mean educational debt to overall mean educational debt[b]									
Under 35				**2.5**	**2.1**	**1.9**	**2.0**	**1.7**	**43.5**
N. Median value of educational debt among debtors (2022$)[b]									
Overall				**17.0**	**17.5**	**23.2**	**25.3**	**24.5**	**--**
Under 35				**19.9**	**17.5**	**22.6**	**25.3**	**18.0**	**--**
O. Ratio of median educational debt to overall median educational debt[b]									
Under 35				**1.2**	**1.0**	**1.0**	**1.0**	**0.7**	**--**
P. Share of households with an outstanding educational loan (percentage)									
Overall				**15.2**	**19.1**	**22.3**	**21.4**	**21.7**	**--**
Under 35				**33.7**	**40.0**	**44.8**	**41.4**	**40.1**	**--**
Q. Difference in share with an educational loan between age group and overall (percentage)									
Under 35				**18.5**	**21.0**	**22.5**	**20.1**	**18.4**	**--**

a. These figures are not available for 1983.
b. These figures are not available before 2007.

Appendix Table 1. Average Annual Nominal Rates of Return By Asset Type and Period, 1983-2022

	Average nominal rates of return by period (percentage)							
Description	1983-1989	1989-2001	2001-2007	2007-2010	2010-2016	2016-2019	2019-2022	1983-2022
Residential real estate	4.02	4.66	5.84	-7.22	5.72	4.49	5.72	4.06
Business + non-home real estate	3.97	4.25	9.08	-5.68	6.79	5.19	8.44	4.97
Liquid assets	6.71	4.82	3.25	1.96	0.64	0.62	0.52	3.35
Financial assets (including stocks)	11.88	9.91	5.26	0.77	8.93	11.68	6.73	8.53
Pension accounts	10.52	8.98	5.22	2.39	6.82	6.87	8.58	7.61
Mortgage debt	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00
Non-mortgage debt	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00
Inflation (CPI-U-RS average)	3.46	2.72	2.67	1.71	1.65	2.13	4.64	2.69

Notes:

Real Rate of Return = (1 + nominal rate) / (1 + ΔCPI) -1

Residential Real Estate: The source for years 1989 to 2007 is Table 935 of the *2009 Statistical Abstract*, US Bureau of the Census, available at [http://www.census.gov/compendia/statab/].For years after 2007, the source is:

National Association of Realtors, "Median Sales Price of Existing Single-Family Homes for Metropolitan Areas," at

https://www.nar.realtor/sites/default/files/documents/metro-home-prices-q2-2020-ranked-median-single-family-2020-08-12.pdf

https://cdn.nar.realtor/sites/default/files/documents/metro-home-prices-q1-2024-single-family-2024-05-08.pdf?_gl=1*12z57sj*_gcl_au*NjE4NDEzODA4LjE3MjIzMzc0OTA.

https://www.nar.realtor/sites/default/files/documents/metro-home-prices-q3-2021-single-family-2021-11-10.pdf

The figures are based on median prices of existing houses for metropolitan areas only.

Businesses and Commercial Real Estate: Holding gains (taken from the Financial Accounts of the United States (FA),

Table R.100, divided by equity in noncorporate business (taken from the FA, Table B.100), available at: https://www.federalreserve.gov/releases/z1/20240607/html/r101.htm

Liquid assets: Before 2010, the weighted average of the rates of return on checking deposits and cash, time and saving deposits, and life insurance reserves. The weights are the proportion of these assets in their combined total (calculated from the FA, Table B.100). The assumptions regarding the rates of return are: zero for checking deposits, the rate of return on a 1-month CD (taken from the table "H.15 Selected Interest Rates" published by the Federal Reserve and available at: http://www.federalreserve.gov/releases/h15/data.htm) for time and saving deposits and CDs, and, one plus the inflation rate for life insurance reserves.

2010 and after: Weights are based on the SCF. Source for interest rate data is the FDIC: https://www.fdic.gov/regulations/resources/rates/previous.html

Bonds: The weighted average of the rates of return on open market paper, Treasury securities, municipal securities, corporate and foreign bonds, corporate equities, and mutual fund shares. The weights are the proportion of these assets in total financial assets held by the household sector (calculated from the FA, Table B.100). The assumption regarding the rate of return on open market paper is that it equals the rate of return on 1-month Finance paper (taken from the table H.15 "Selected Interest Rates" published by the Federal Reserve and available at: http://www.federalreserve.gov/releases/h15/data.htm). The data for the rates of return on other assets are taken from the *Economic Report of the President 2020*, Table B-25, available at

https://www.whitehouse.gov/wp-content/uploads/2020/02/2020-Economic-Report-of-the-President-WHCEA.pdf

The assumptions regarding Treasury securities, municipal securities, corporate and foreign bonds, and corporate equities are, respectively, average of Treasury security yields, high-grade municipal bond yield, average of corporate bond yields, and annual percent change in the S&P 500 index.

Mutual fund shares are assumed to earn a rate of return equal to the weighted average of the rates of return on open market paper, Treasury securities, municipal securities, corporate and foreign bonds, and corporate equities. The weights are the proportions of these assets in the total financial assets of mutual funds (calculated from the FA, Table L.123).

Source for 2019-2022:
https://www.federalreserve.gov/apps/fof/DisplayTable.aspx?t=b.101
[accessed 7/24/24 at 9:27am]

Stock prices: Based on the S&P Composite Index for Stocks. Source: Table B55 and B56, *Economic Report of the President, 2024*, available at https://www.govinfo.gov/content/pkg/ERP-2024/pdf/ERP-2024.pdf.
Up to 2003: Includes stocks as follows: for NYSE, all stocks listed; for Dow Jones industrial average, 30 stocks; for Standard & Poor's (S&P) composite index, 500 stocks; and for Nasdaq composite index, over 5,000.
After 2003: Includes stocks as follows: for NYSE, all stocks listed (in 2023, over 2,270); for Dow Jones industrial average, 30 stocks; for Standard & Poor's (S&P) composite index, 500 stocks; and for Nasdaq composite index, about 3,400.

Pension (DC) Accounts: Weighted average of returns on stocks, bonds, and money market funds, where the weights are based on the average portfolio composition of DC accounts over the period (for the 1983-89 period period, the weights are based on 1989 data only).

CPI-U-RS: from www.bls.gov/cpi/research-series/home.htm

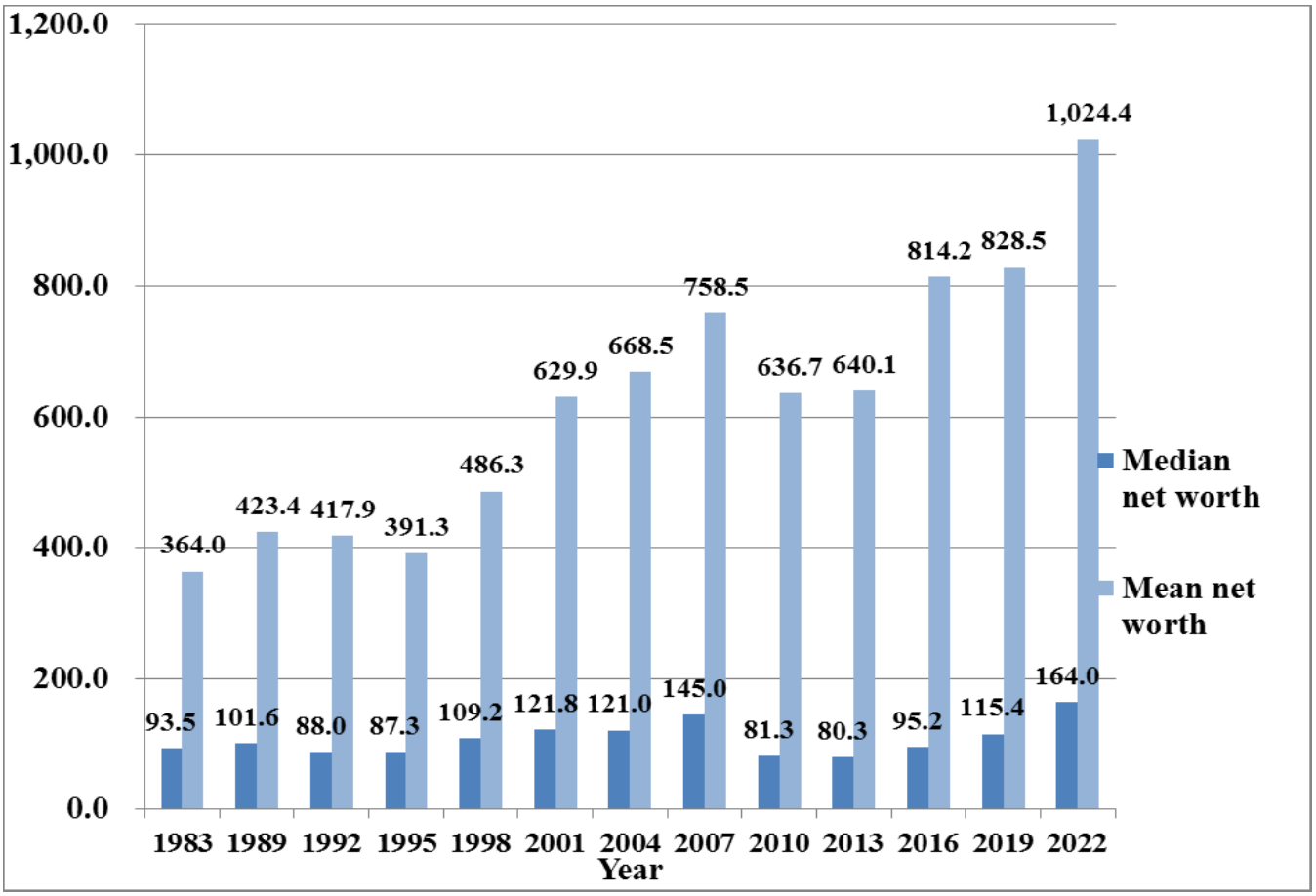


Figure 1. Mean and Median Net Worth, 1983-2022 (in thousands, 2022 dollars)

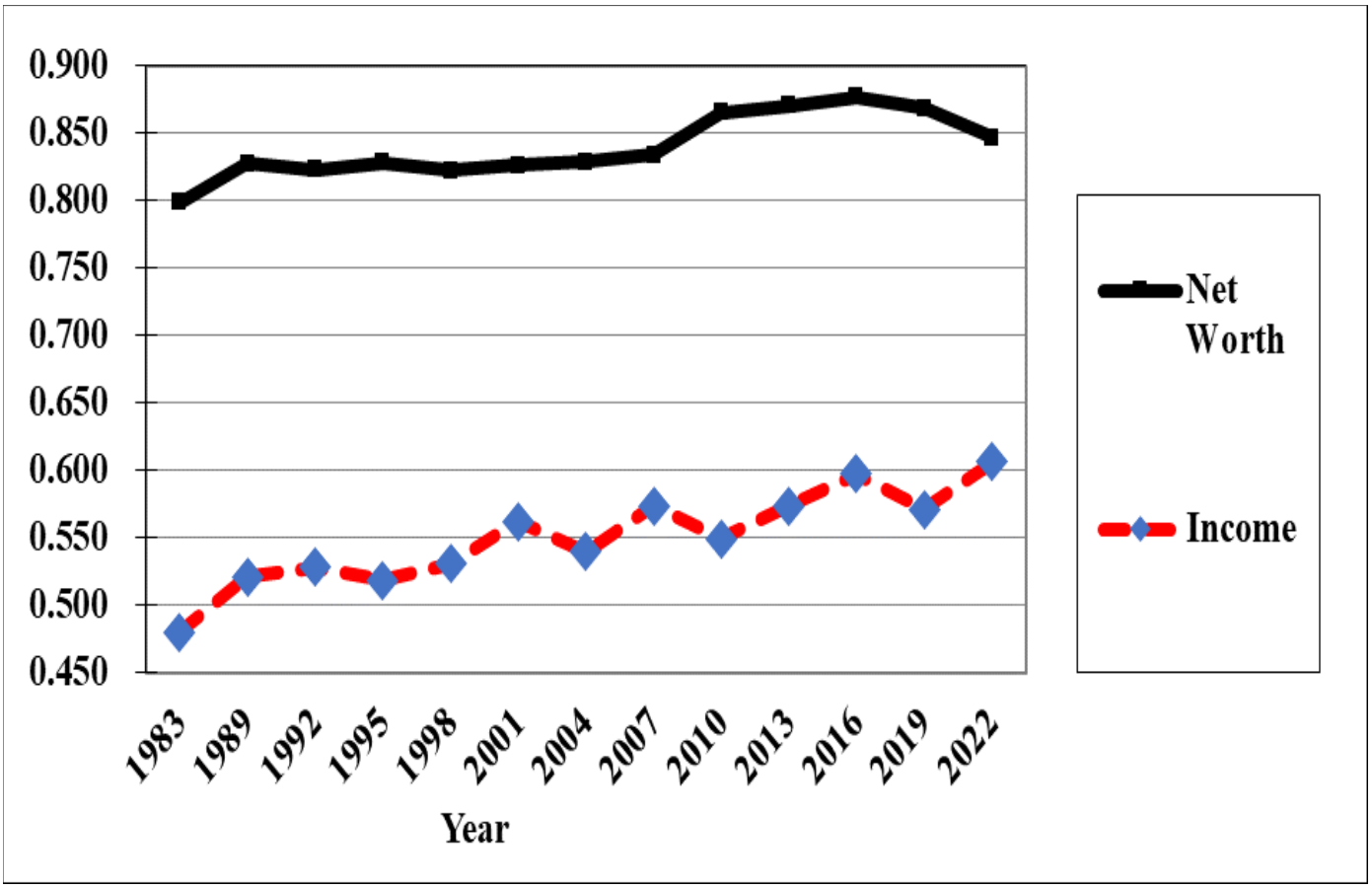


Figure 2. Wealth and Income Inequality, 1983-2022 (Gini coefficients)

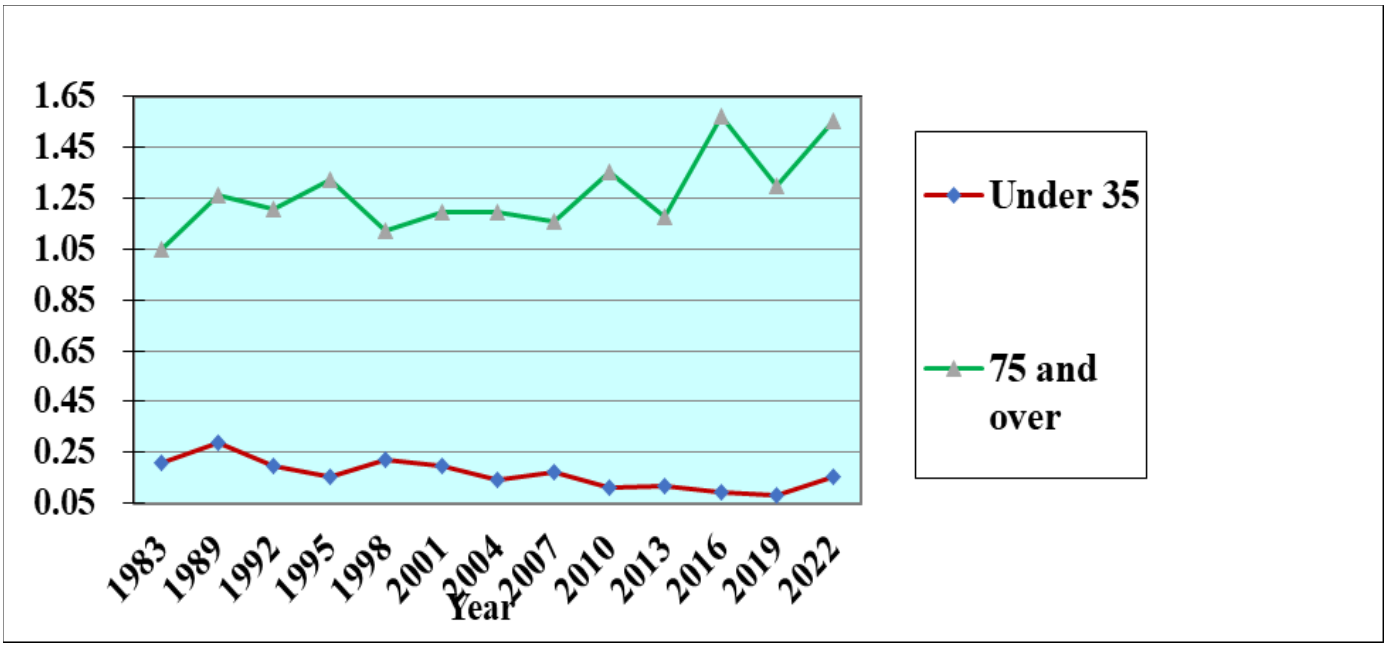


Figure 3. Ratio of Mean Net Worth of Age Group to Overall Mean Net Worth, 1983-2022

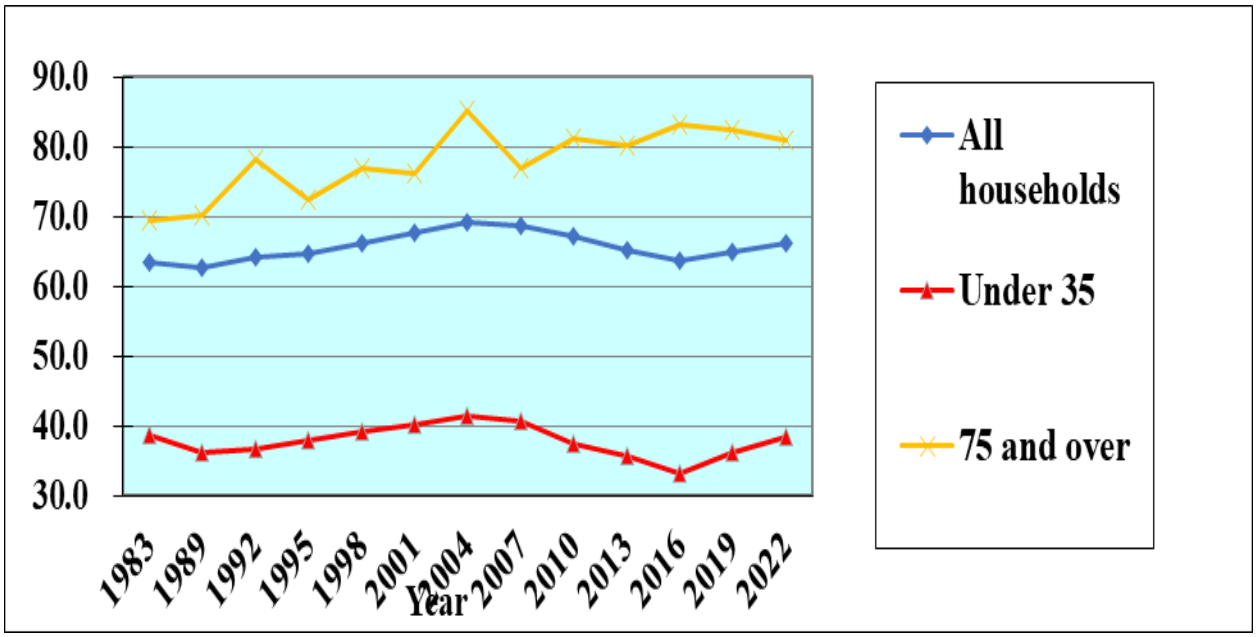


Figure 4. Homeownership Rates for Young Adults, Old Households, and All Households, 1983-2022 (percentage)