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PE Exit Timelines and the Impending Maturity Wall

Is US PE heading toward a pileup of companies taking longer to exit?

PitchBook is a Morningstar company providing the most comprehensive, most accurate, and hard-to-find data for professionals doing business in the private markets.

Key takeaways

- The US PE industry is facing a new normal of stunted exit activity. Quarterly US PE exit value declined significantly beginning in Q1 2022 and is now well-below the pre-COVID-19 (2017 to 2019) median.
- With exits expected to remain slow for the next few years, we will see a significant pileup of not-yet-exited PE assets as investors struggle to sell the portfolio companies that are entering their exit time frames. The mismatch between the explosion of deals made in the last few years and a challenged exit market will cause the backlog of investments to swell.
- A maturity wall is fast approaching for PE funds that are nearing the end of their term life to distribute their capital back to investors through exits. PE investors will need to pick up their exit pace or will be confronted with 20% to 26% of the capital initially invested by funds to hit the maturity wall. The cumulative amount of still-held investments could grow to over \$360 billion in the next 12 years.
- Investors and sponsors alike are increasingly turning to continuation funds, GP-led and LP-led secondaries, and NAV lending as possible solutions to either extend asset exit timelines, secure liquidity without force-selling, or boost marketability for a future exit process.

Introduction

Private markets have been enjoying an extended period of bullish economic conditions, setting new records in investment activity even after the initial shock of the COVID-19 pandemic. By the second half of 2020, US private equity activity recovered and even flourished, thanks to cheap and abundant access to capital and investor interest in alternative assets. US PE set new records in 2021, with deal value jumping by 86.6% to reach \$1.3 trillion, and deal count by 53.1% to 9,286 deals.

The surge in PE exit activity was even more extraordinary. The industry did the equivalent of roughly 2.6 years of exit value in a single year in 2021, when the combined torrent of M&A sales, IPO listings, and reverse mergers with SPACs generated \$870.6 billion in total exit value. In comparison, there was an average of \$338.5 billion in annual exit value for the 10-year period preceding it. The 2021 annual exit count also soared to a new record with 1,792 exits, compared with a 10-year average of 1,200, which is approximately 1.5 years of exit count.

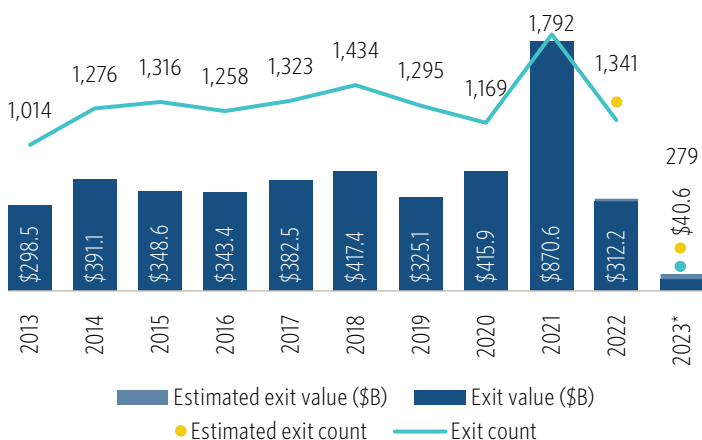
While the bull market seemingly knew no bounds, markets tumbled shortly after as rising inflation and resulting interest rate hikes disrupted a golden period for PE. Deal activity fell from its peak, but exits have dropped even more precipitously and have been suffering ever since. Quarterly exit value was flat to down for seven consecutive quarters starting in Q3 2021, and declined significantly throughout 2022—sponsors continue to struggle against unfavorable valuation adjustments, an effectively closed IPO market, and an uncertain economic outlook. By the end of Q1 2023, quarterly exit value was down 75.1% from the peak in Q2 2021. Quarterly exit activity is now well-below the pre-COVID-19 median of 2017 to 2019 with no signs of bottoming, which indicates to us that a new normal is firmly in place.

Of course, nothing lasts forever, and at some point, the current cycle will exhaust itself after correcting for the excesses of 2021. Eventually, gradual improvement in monetary conditions and liquidity will sow the seeds for better exit volumes. The IPO market will re-open and bank lending to LBOs will resume. However, even if we assume a rebound to the pre-COVID-19 norm, the industry is running out of time to complete an orderly disposition of portfolio holdings within the time frames initially allotted to its funds.

A typical buyout fund has a lifespan of approximately 10 years, with many PE funds starting to exit their successful assets earlier around the five- or even three-year mark. On the other hand, buyout firms can extend their funds' lifespans for two one-year periods as needed to create more value for their assets. The current weakness in exit activity is creating a gap between the two flows of capital: While deal activity soldiers on, exit pacing has been slower as GPs hold onto their portfolio companies for longer to allow for valuations to recover to their liking or grow revenues and EBITDA to compensate for lower multiples.

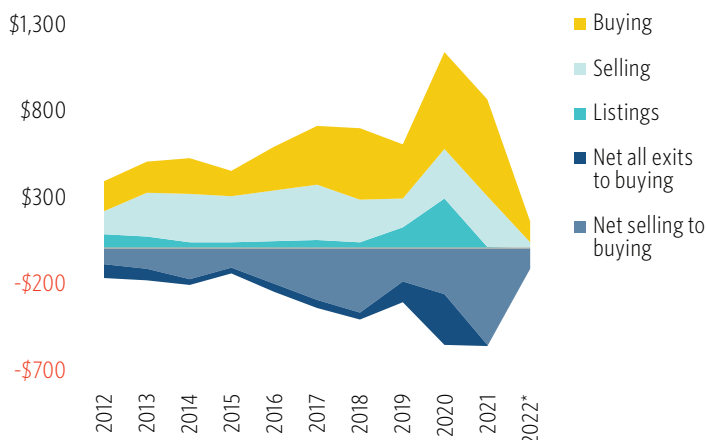
The significantly fatigued exit market means that an impending "maturity wall" looms in the PE industry for deals made five to seven years ago that are beginning to reach their natural exit timelines. With exit activity expected to remain stunted in the near future as investors continue to face macroeconomic headwinds, GPs will need to address the oncoming maturity wall of their existing investments. The investments made during the bullish deal environment of the last 10 years are now confronted with an economic downturn and will need to adjust to a much different exit environment.

PE exit activity



Source: PitchBook • Geography: US
*As of March 31, 2023

Exit versus investment gap (\$B)



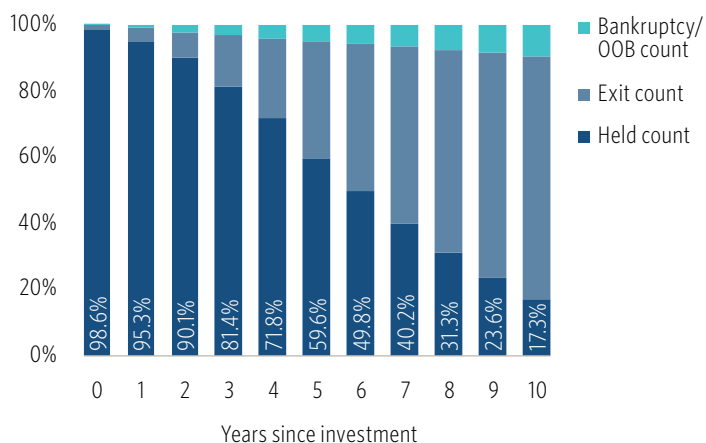
Source: PitchBook • Geography: US
*As of March 31, 2023

Exit timing data

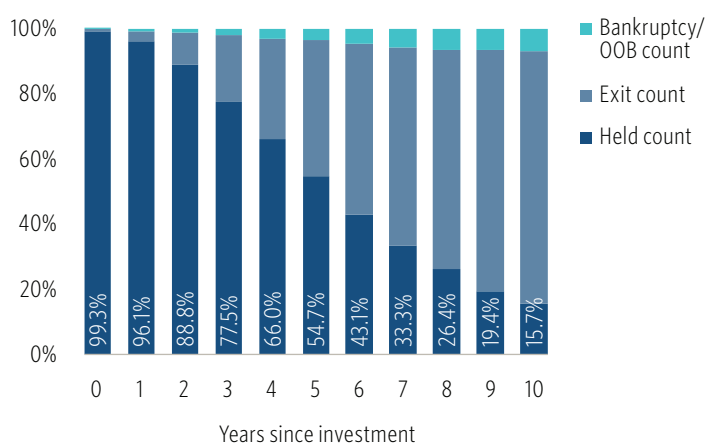
To better understand the holding periods of US PE investments and how they compare over time, this report looks at three different investment cohorts: 2007, 2012, and 2017. The 2007 cohort shows the US buyout deals closed in 2007 and how they progressed through a full 10-year cycle. The 2007 cohort is an interesting group to examine because shortly after these investments were made, sponsors endured the global financial crisis (GFC) and the sluggish exit conditions that persisted for many years thereafter. When and how these PE investors were able to exit their holdings closely resembles the current PE investments that were closed just before or after a similar disruption in exit activity and may provide some clues. The second cohort is the 2012-closed deals. Like the 2007 cohort, the PE firms that made these investments completed a full 10-year period of observable results in winding down their holdings. While its timeline includes the heightened exit activity of 2021, because it is later in

the 10-year cycle, this cohort could be seen more as a control group for how buyout deals have fared in a supportive market environment. The last cohort is the deals closed in 2017, which have recently hit the five-year mark and are starting to enter a typical exit period. This cohort will be the one to look out for as the assets mature during a market downturn.

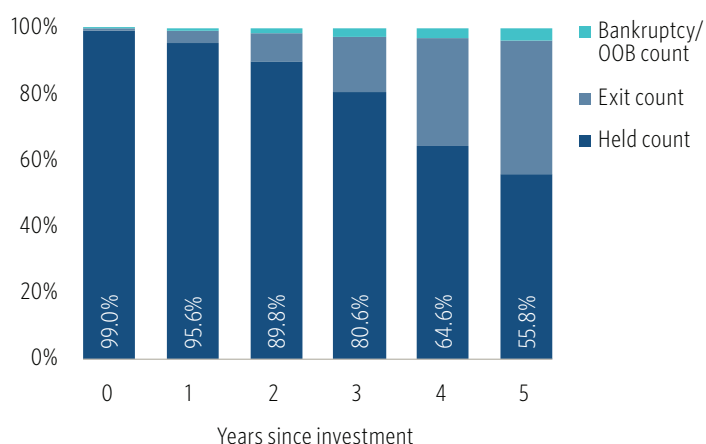
Each of the cohort charts show the percentage of investments that were still held and the cumulative percentage of those that have been able to exit out of their PE funds after each year since investment. The changing percentage of cumulative exits depicts the pace of exits undergone by the groups of deals that closed in different time periods. Some of the portfolio companies that have yet to exit by the end of the 10-year time frame may or may not be performing poorly. While the exit timelines largely reflect when sponsors were able to extract the most value from their investments, bankrupt or out-of-business portfolio companies are also shown separately in the data to provide a better picture of which exits are successful and which are merely being closed at the end of its life cycle.

Share of 2007 PE buyout companies by exit status*


Source: PitchBook • Geography: US
*As of December 31, 2017

Share of 2012 PE buyout companies by exit status*


Source: PitchBook • Geography: US
*As of December 31, 2022

Share of 2017 PE buyout companies by exit status*


Source: PitchBook • Geography: US
*As of December 31, 2022

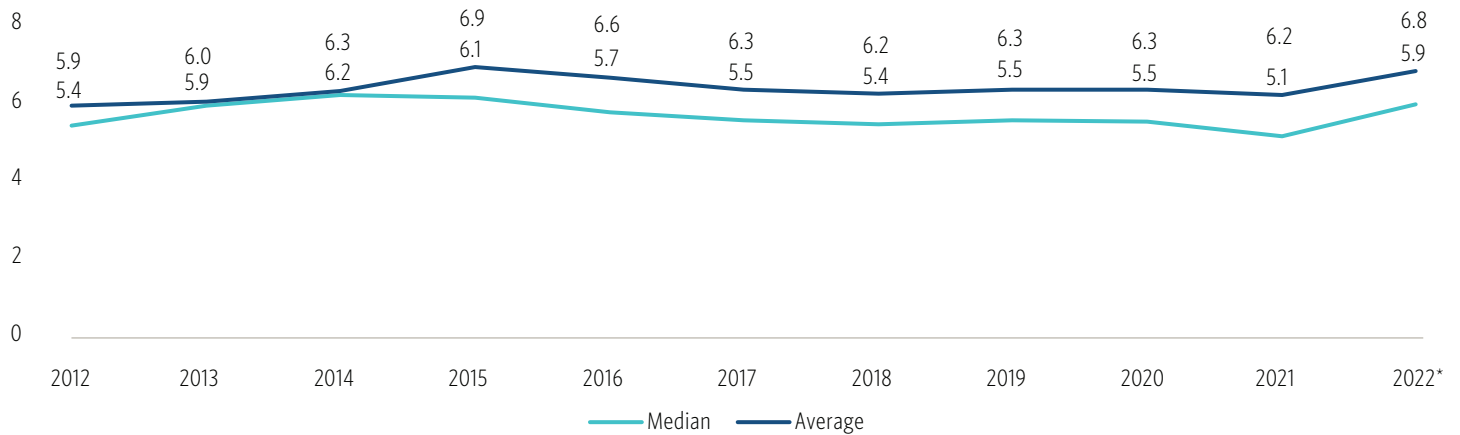
2017 cohort on pace with older cohorts

Interestingly, the exit pace between the 2007 and 2012 cohort are quite similar despite the different market conditions in which the PE firms had to realize the assets. For both cohorts, around 20% of the investments had already exited by the end of the third year after investing—2010 for the 2007 cohort and 2015 for the 2012 cohort. And almost half of the investments had exited by the five-year mark—2012 for the 2007 cohort and 2017 for the 2012 cohort. Because of the volatility during and after the GFC, the 2007 cohort lags 2012 slightly, exiting 18.6% of the cohort by the three-year mark compared with 22.5% of the 2012 cohort after the same number of years; and exiting 40.4% of the 2007 cohort by the five-year mark compared with 45.3% of the 2012 cohort by the same time frame. By and large, however, the two cohorts exited their assets at a similar pace, with roughly 10% more of their portfolios exited every year after the five-year mark.

So far, the 2017 cohort has followed a similar path. By the end of the three-year mark in 2020, 19.4% of the cohort had exited, and 44.2% of the cohort exited by the end of the five-year mark in 2022. We attribute this to the record number of exits in 2021. Despite a slowdown in 2022, exit count remained above the 10-year average, helping move the 2017 cohort along to nearly reach the exit pace seen in previous cohorts. The 2017 cohort's exit pace is comparable with 2012's so far, reflecting the shared period of bullish conditions that proliferated in the PE industry since around 2015. On the other hand, the 2017 cohort consecutively exited a slightly greater share of its investments than the 2007 cohort, starting at the two-year mark. This is likely due to the 2007 cohort having to exit its assets in a recovering post-GFC market while the 2017 cohort has mainly experienced a bull market save for the pandemic-driven disruption and market volatility that started in 2022.

The true test for this vintage, and those that followed, will be the next five years now that exits have slowed to a crawl. In fact, investments made in 2017 and after could have been able to exit faster than the typical five- to 10-year investment period because of the recent advantageous market environment. 2021 was a major year for PE exits, thanks to elevated transaction multiples across sectors driven by post-2020 recovery and fervent investment activity. With rising multiples, numerous GPs hit financial targets early, sometimes by several years, and exited their portfolio companies into an attractive seller's market. High levels of PE dry powder, corporate balance sheets, and booming public markets meant PE investors had multiple attractive exit routes.

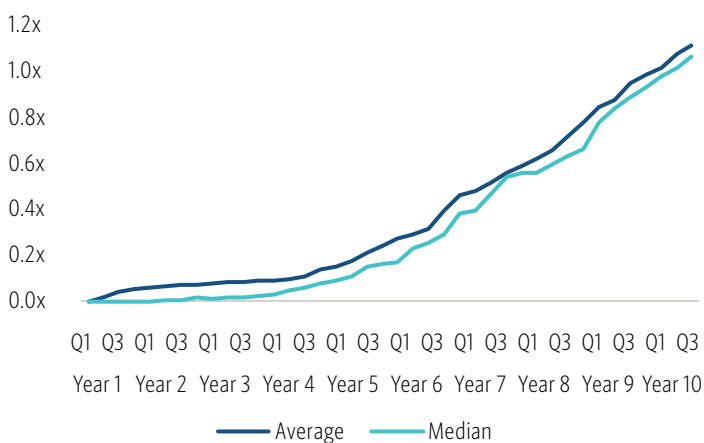
Median PE buyout holding period (years)



Source: PitchBook • Geography: US
*As of December 31, 2022

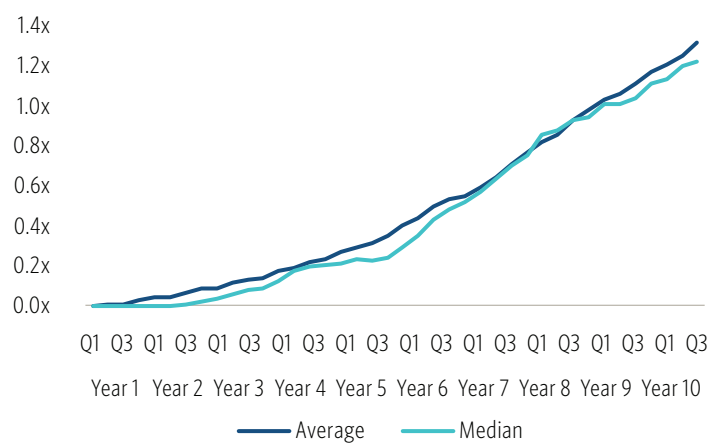
Investments from the 2017 cohort rode this wave, with cumulative exits jumping from 19.4% of the group by the end of 2020 to 35.4% by the end of 2021. This boost in exit activity has shortened the hold times for investments from this cohort, causing faster-than-usual exits. Seen in another way, the average holding period of PE investments that exited in 2021 was the lowest when compared with those that had exited in the prior seven years. For the 2017 cohort, cumulative exits—excluding bankrupt or OOB companies—jumped 15.5% from 2020 to 2021, which is the greatest increase seen YoY out of the three cohorts. The surge in exits is especially meaningful because these portfolio companies were only in their fourth year of investing and well-before the typical unwinding period for buyout deals. This level of realization pace will be hard to replicate in the near term given the currently depressed market conditions.

DPI for 2007 vintage PE buyout funds by time since inception*



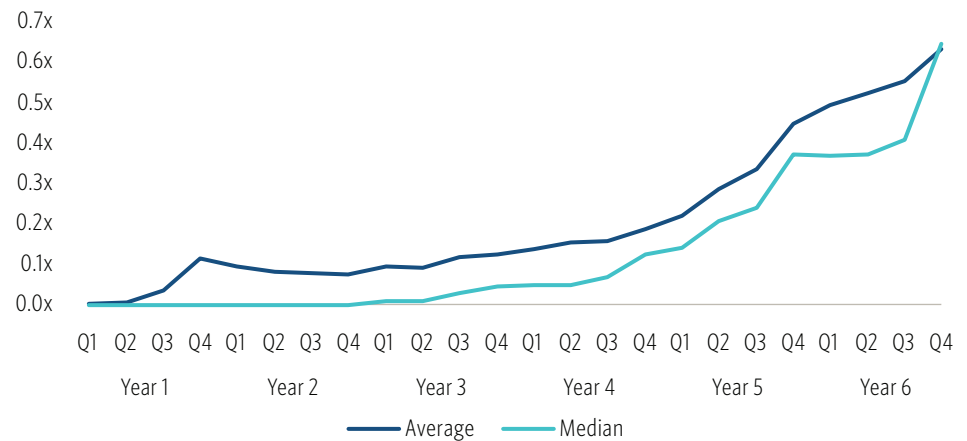
Source: PitchBook • Geography: US
*As of June 30, 2022

DPI for 2012 vintage PE buyout funds by time since inception*



Source: PitchBook • Geography: US
*As of June 30, 2022

DPI for 2017 vintage PE buyout funds by time since inception*



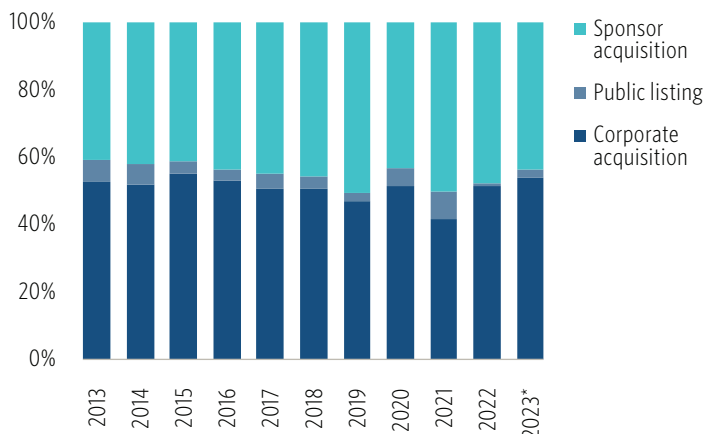
Source: PitchBook • Geography: US
*As of June 30, 2022

The distributions to paid-in (DPI) capital is another method to examine the progress of exiting investments at different points in time. DPI, which measures the proceeds returned to their investors by funds relative to contributions, can be used as a proxy for exit velocity: Lower DPI can be interpreted as funds still needing to exit a lot of their portfolio companies or selling assets at distressed prices, while higher DPI shows there have been many successful exits. Buyout funds that started investing in 2007 and 2012 display a similar trajectory; funds of 2007 and 2012 vintage reach a median DPI of 0.5x around year seven since fund inception and hit 1x around the full 10-year investment cycle. The 2012 vintage has a slightly quicker pace of DPI, echoing the marginally faster pace at which investments made in 2012 exited compared with those made in 2007. While fund vintage used in DPI calculation is not the same grouping of investments as the cohorts—since funds can make investments several years after inception—DPI still provides a useful comparison of the pace at which PE firms have been able to exit their positions during different time periods. For 2017 vintage funds, both the average and median DPI reach past 0.5x during the sixth year since inception. Though it reaches this mark faster than other vintages by just a few quarters, it is in line with the impressive rate at which the 2017 cohort's investments have been able to exit relative to the other cohorts. As the sixth year since inception is 2022, the increase in DPI mirrors the boost in exits that the funds would have benefitted from in 2021.

2017 cohort will fall behind schedule

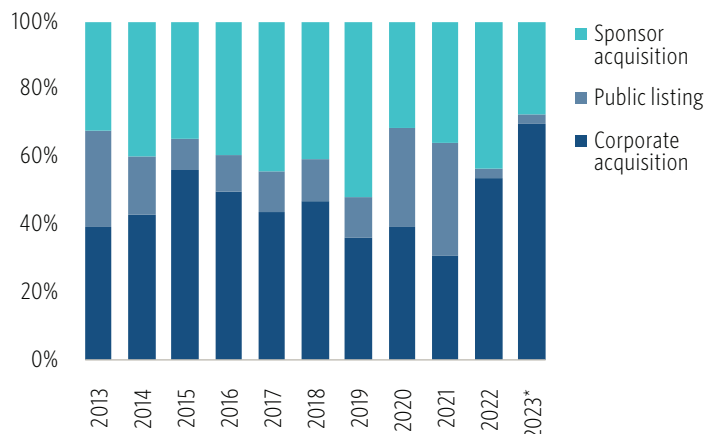
We expect the 2017 cohort and investments that have been made since to fall behind on their exit timelines due to the currently disrupted exit environment. Liquidity from PE exits has fallen sharply in recent quarters. Exits through public listings effectively disappeared in 2022 as the steep stock market decline deterred PE firms from risking their private companies to an unfavorable debut. Exits to corporates also fell due to fears of a recession, as well as rising input costs, which caused a previously confident C-suite environment to become more hesitant toward acquisitions. More corporations are focused on protecting their balance sheets and riding out a market downturn rather than expanding their businesses. Sponsor-to-sponsor exits have been affected

PE buyout exit count by type



Source: PitchBook • Geography: US
*As of March 31, 2023

PE buyout exit value by type



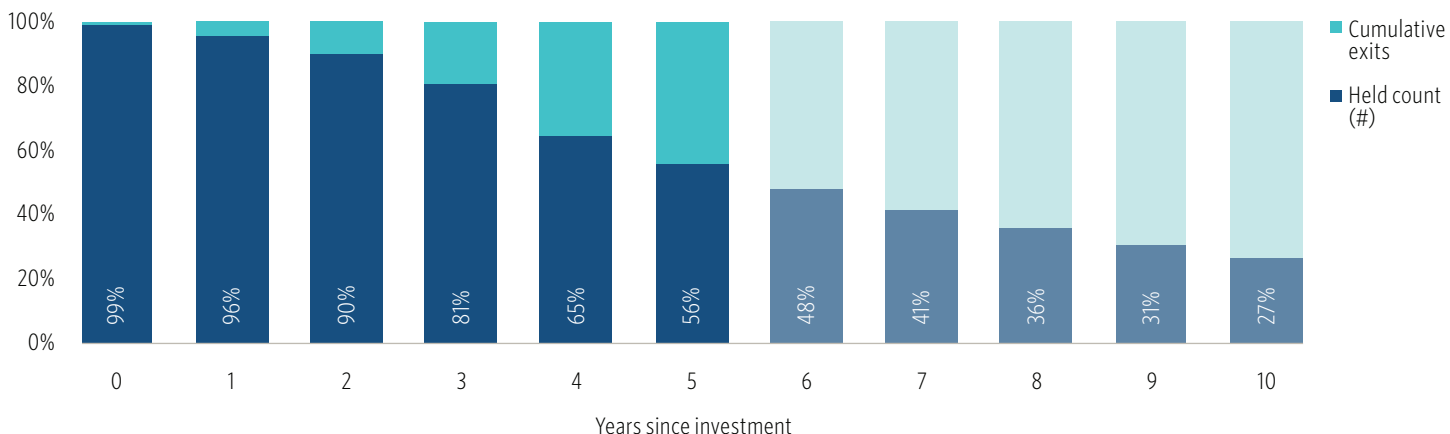
Source: PitchBook • Geography: US
*As of March 31, 2023

as well. Despite a near record amount of dry powder, PE buyers are hampered by buyer-seller disconnect amid adjusting valuations. While plenty of PE firms are looking to buy, many PE firms are not willing to let go of their assets for what they see as an undervalued price. At the same time, a weakened financing market makes it difficult for sponsors to secure the leverage needed to acquire large PE-backed assets.

Exit activity continues to drift lower in Q1 2023 in a prolonged uncertain economic outlook. Both quarterly exit value and count have dropped below pre-COVID-19 pandemic levels and major PE giants are signaling for a stunted year of realizations—as referenced in PitchBook’s [Q1 2023 US Public PE and GP Deal Roundup](#). With exit pace expected to remain slow in the near future, we are likely to see a meaningful pileup of investments in the 2017 cohort for the next few years, as well as the investments made a few years ago that are now entering their early exit timeframes.

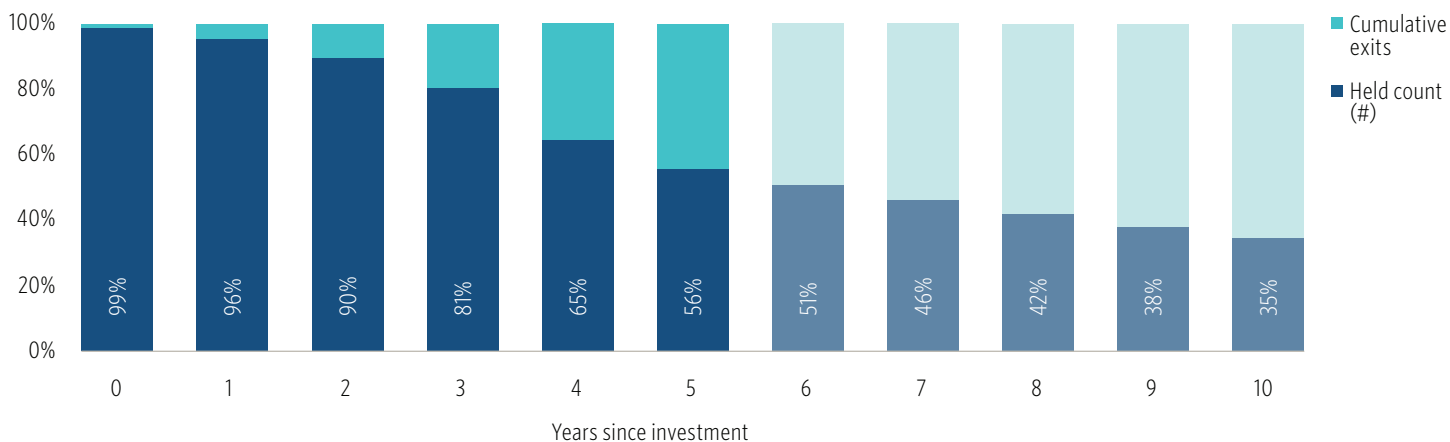
The charts on the following page forecasts two scenarios. The first demonstrates the extrapolated exit pace of the 2017 cohort for the next five years (extrapolations after 2022) that would be in line with the pre-COVID-19 average exit activity. This is a rough estimate of a normalized exit pace that the cohort would have experienced before the surge in exits between 2020 and 2021. Using that steady state exit rate, the 2017 cohort would have less cumulative exits by the 10-year mark than the 2007 and 2012 cohorts did at the same timeframe—73.4% for the 2017 cohort versus 82.7% and 84.3% for the 2007 and 2012 cohorts, respectively. This is because the 2017 cohort’s exit pace from 2023 through 2027 (year six through 10 for the cohort) was extrapolated using 13.8% as the annual exit pace (the average annual exit count as a share of US PE companies between 2017 and 2019). In comparison, the 2007 and 2012 cohorts had a higher average annual exit pace of 21.9% for their respective years six through 10, driven by the widespread economic recovery post-GFC and post-pandemic.

2017 cohort's extrapolated exit using pre-COVID-19 rate*



Source: PitchBook • Geography: US
 *Data as of December 31, 2022.
 Note: Extrapolated exit rate based on count.

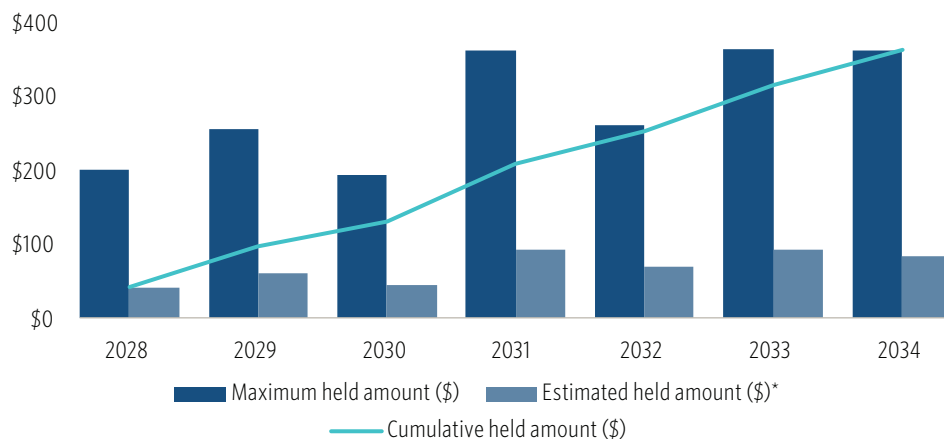
2017 cohort's extrapolated exit using LTM rate*



Source: PitchBook • Geography: US
 *Data as of December 31, 2022.
 Note: Extrapolated exit rate based on count.

It is important to note that recent exit activity has fallen below pre-COVID-19 levels, suggesting that the 2017 cohort and the deals closed later will be even slower to exit. The second scenario extrapolates an exit pace for the next five years based on the annualized exit activity seen between Q2 2022 and Q1 2023. This simplified assumption presents a worst-case scenario of how exits will fall if the recent stunted exit pace continues. If the 2017 cohort were to have an annual exit pace the same as that of the last 12 months, 35.0% of the cohort would still be held by the 10-year mark. This potential pileup is significant when comparing to the 2007 and 2012 cohorts at their 10-year mark, which had less than 20% held. While this is a rough extrapolation that simplifies the same annual exit pace and does not take into consideration the changing pace of exits for more mature funds, it is still useful in visualizing a worst-case scenario of PE market pileup. Furthermore, because the number of deals made exploded in the last few years, we anticipate a significant portion of current PE investments to be held for longer than before as sponsors struggle against a slow exit market and the backlog of not-yet-exited PE assets swells.

Capital raised (\$B) in funds closed with a 12-year shift

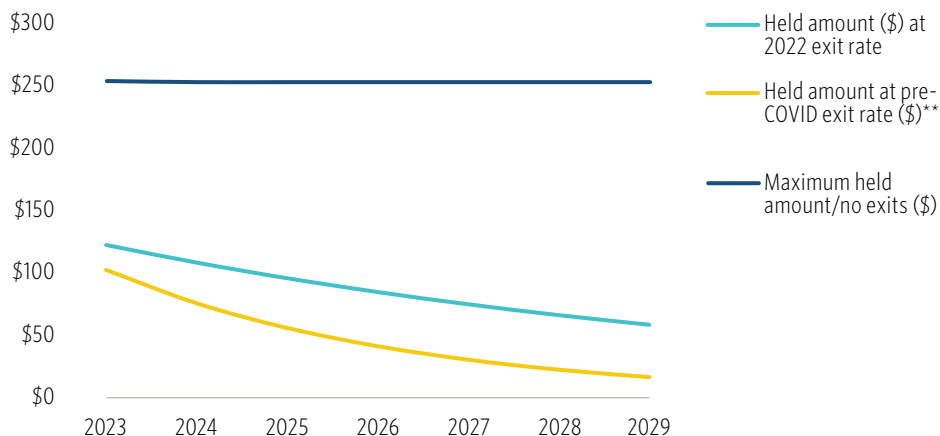


Source: PitchBook • Geography: US
 *Estimation using the observed exit rate for the six years ending 2022, and the TTM 2022 exit rate for all years thereafter.

Maturity wall approaching for legacy PE funds

A way to discern the approaching maturity wall is to see the capital raised by funds that are reaching the end of their 12-year term life. Funds that closed in 2016 will hit their term in 2028, and the capital invested in 2016 and beyond that has yet to be exited will be the amount hitting the maturity wall, assuming no change in value. The chart above shows the set of funds and the value of capital raised between 2016 and 2022 with a 12-year shift—and the estimated remaining held amount at each juncture assuming a liquidation rate. In a hypothetical case of nothing getting liquidated from this set of funds, the chart shows the maximum amount of capital that would hit the maturity wall at the 12-year mark, which equals the capital that had been initially raised by US PE funds. However, a portion of these funds have already had exits. Using a more realistic assumption, the chart presents the expected amount of the remaining capital that will hit the maturity wall at the end of the 12-year fund life using the incremental pace of exits seen through 2022, and then a slower 2022 exit rate thereafter for the remainder of the fund life cycle. This rough estimation, which combines the exit pace we have already seen and an adjusted exit pace, shows a reasonable expectation of how funds will wind down and the amount that will be liquidated, and how it will not be enough. Around 20% to 26% of the capital initially invested by funds is expected to hit the maturity wall, using this estimation. The cumulative held amount grows from \$41.0 billion to \$363.0 billion in the seven years commencing in 2028 as more fund vintages reach the maturity wall. PE investors would be faced with an enormous pileup of deals still held if the slowed exit activity were to continue.

Various scenarios using 2017 vintage funds*



Source: PitchBook • Geography: US

*All values are extrapolated for the years shown.

**Pre-COVID is defined as the years 2017 through 2019.

The same assumptions are applied to the second chart, which shows a rough estimate of how funds raised in 2017 are expected to liquidate at various assumed exit rates. One scenario presented shows the remaining amount, assuming no exits, more for reference purposes to show the original invested capital for this vintage. Another scenario shows the liquidation trajectory using the slower exit pace recorded in 2022. This exit rate would result in a held amount of \$59.4 billion by year 12, or 23.4% of the original \$254.5 billion invested by that vintage.

The third scenario, which uses the pre-COVID-19 exit pace for each year after 2022, results in a much more manageable held amount of \$16.9 billion by year 12, or 6.6% of the original invested amount. However, this is a tall order given that quarterly exit volumes have already fallen 28.3% below pre-COVID-19 averages with no signs of bottoming. For that reason, we use 2022's exit rate as our base case. Continued depressed exit activity will have trickle-down effects on the PE industry. As PE firms hold on to their assets for longer, performance will suffer, and more immediately, reduce distributions back to LPs. This will in turn hurt fundraising efforts for PE in two ways: LPs will have less capital to reinvest in additional PE funds, and as more capital is tied up in PE funds for longer, investors will be overweight in their allocations to PE strategies and will be discouraged from allocating capital to new funds.

Liquidity solutions

With the exit landscape subdued and expectations dashed for a significant change in fortune any time soon, PE firms will have to turn to other methods to address the increasing liquidity concern. For LPs needing to free up capital, they can sell their interests in illiquid funds to other investors in a secondary transaction. With the consent from the GP of the fund being traded, fund stakes would trade to alleviate some of the original LP's liquidity needs. For GPs seeking ways to continue to hold what they view as attractive and promising assets, one of the solutions they have

turned to are continuation funds.¹ They allow GPs to roll portfolio companies out of their original buyout funds into a new vehicle to extend the holding period past what the 10-1-1 (10 year lifespan and two 1-year extensions) traditional fund structure allows, and to be able to capture the remaining upside potential. Known broadly as GP-led secondaries, these transactions give LPs an option to monetize their stake in certain assets for needed liquidity or to roll their positions into the new fund structure. They provide GPs an additional three to five years of runway to extract the most value out of their portfolio companies. This is a popular method for GPs to offer LPs the option to secure liquidity without force-selling attractive assets at an inopportune time.

GP-led secondaries are already becoming more prominent in alternative investing. They represented 58% of global secondaries transactions in 2020, overtaking LP secondaries volume for the first time when GPs sought liquidity options during the height of the pandemic, and have remained roughly half of the annual transaction volume since.² Clearlake Capital, for example, created a series of single asset vehicles in 2021.³ The PE firm launched three special purpose vehicles for three assets they saw potential for further growth but were held in funds that were running out of time and capital for further add-ons.⁴ Other PE firms are turning to multi-asset continuation funds; Accel KKR closed a \$1.8 billion continuation vehicle in March 2022 for follow-on investments in seven companies from its 2013 vintage technology buyout fund.⁵ In an environment where exits are going to slow for the foreseeable future, the ability to turn to continuation funds will be an increasingly attractive option for PE firms with companies to sell. For PE firms that believe they have trophy assets that need more time and capital before they can be exited for maximum gain, they will have to get continuation fund businesses up and running soon for those investments that have around three years left on the clock.

Another tool gaining traction for PE firms seeking liquidity solutions is net asset value (NAV) financing. In NAV financing, banks or other lenders provide a fund with borrowing capacity based on the NAV of the fund's investment portfolio. Unable to exit their assets, sponsors are borrowing against them to gain some liquidity. The injection of capital allows GPs to make add-on acquisitions or investments in a portfolio company to boost its value and marketability in a future exit process or accelerate distributions to investors in advance of an exit.⁶ In the backdrop of a challenged monetization environment, deal volume involving NAV financing jumped 50% in the 12-month period ending in September 2022.⁷ The demand for NAV facilities from PE sponsors increased further in Q1 2023 as firms continued to navigate a tough exit market, and other traditional sources of credit have been reduced. As

1: For more information on private market secondaries, please refer to our [Q2 2023 PitchBook Analyst Note: The Evolution of Private Market Secondaries](#).

2: "Global Secondary Market Review," [Jefferies, January 2023](#).

3: PitchBook tracks single asset continuation funds as sponsor-to-sponsor exits. These exits are tracked as secondary buyouts or secondary transactions during further categorization.

4: "Clearlake Creates Series of Single-Asset Funds Amid Growing Push to Extend Holds," [Buyouts, Chris Witkowsky, April 7, 2021](#).

5: "Accel-KKR Announces Closing of \$1.765 Billion Accel-KKR Capital Partners CV IV Fund," [Cision PR Newswire, March 30, 2022](#).

6: "NAV Financing: A Terrific Tool for Savvy Fund Sponsors," [Ropes & Gray, Patricia C. Lynch, Patricia Teixeira and Anastasia N. Kaup, October 11, 2022](#).

7: For more on this, read our PitchBook news article, [GPs Quench Thirst with NAV Financing as Liquidity Dries Up](#).

exit activity continues to slow down in the PE industry, more firms could use NAV financing to meet cash needs and liquidity demands from LPs and firm up their portfolio companies in order to increase their ability to exit on time.

Conclusion

The economic outlook has changed for PE: Exit activity has fallen 75% peak to trough on a quarterly basis and shows no immediate signs of recovery to its previous heydays. Sponsors will need to adjust to this newly challenged exit environment as the inventory of investments that are nearing their exit timelines are either unable to sell or being held for longer than expected because of their currently lower valuations. Even when we assume exit activity to revert to pre-COVID-19 levels, PE firms are not out of the woods. A simple forecast using pre-COVID-19 exit levels shows that investments that are entering their typical exit timelines will be slower to liquidate than previous investments.

Further extrapolation shows that the stunted exit pacing that is likely to pervade the PE industry's foreseeable future will push holding periods beyond the exit time frame that both GPs and LPs have been accustomed to. While the assets purchased five years ago or more are slightly ahead of the game, thanks to the impressive boost in exits seen in 2021, the industry now faces a growing maturity wall as exits have slowed to a crawl and funds draw closer to their end dates.

GPs therefore will need to find solutions to a rising liquidity concern, and it is likely that more sponsors will turn to secondary sales, continuation funds, or NAV lending to placate capital needs while avoiding becoming forced sellers in an unattractive exit market. The PE industry will have to innovate and do so quickly.