

Matt King  
27 May 2026

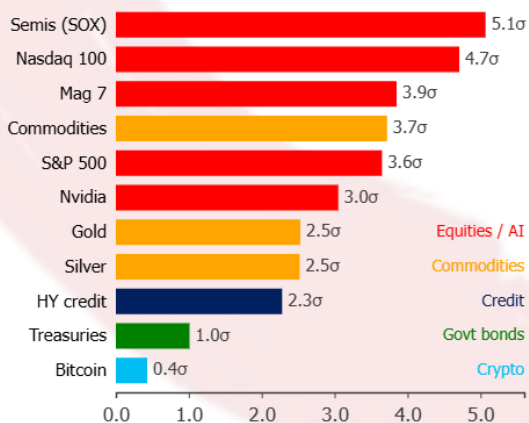
# The unbearable momentum of momentum

- **Multiple markets are in melt-up – and for fifteen years, momentum has trumped mean reversion**
- **This feels instinctively unhealthy, and rightly so: crowding and herding really are at extremes across asset classes**
- **But it is not the sell signal it seems – neither for indices, nor for Momentum itself**
- **What crowding changes is the tail, not the trend: the real risk is a correlation spike**

One of the first lessons every financial research analyst learns is the importance of mean reversion. It is the very essence of the power of P/Es, or CAPEs, or even credit spreads. With it, we can create valuation frameworks and trade rationally and carefully; without it, we are merely chasing after the price action just as blindly as the next punter.

## Multiple markets are in melt-up

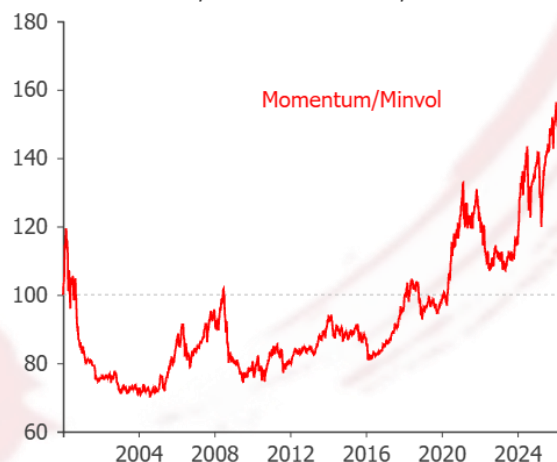
Price vs own 3-year trend, std deviations



Source: Bloomberg; Satori Insights. Monthly, detrended log price (36m), latest reading.

## Momentum has gone vertical

MSCI World factors, relative total return, 2000=100



Source: MSCI, Bloomberg, Satori Insights.

But for the last fifteen years, mean reversion has lost its power, and consistently been trumped by momentum. Value investing in equities has been the most obvious casualty, but the same principle has applied across the board, from the S&P to the Mag7 to bitcoin

to gold. It has been tough to devise a better strategy than simply buying and holding – or more extreme still, buying and holding the assets that have already been rallying the most. The cleverer and more careful your investment process, the more you are likely to have underperformed.

**Mean reversion died in the 2010s**

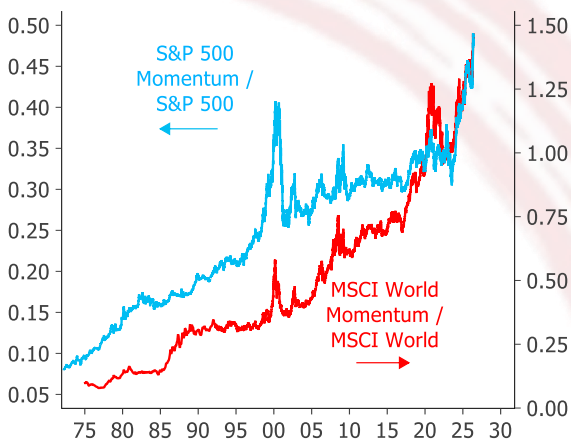
MSCI World sectors, indices



Source: MSCI, Satori Insights.

**Long live momentum!**

US and global performance of equity momentum factor



Source: Bloomberg, Satori Insights.

This is why seasoned professional investors are proclaiming frustratedly that “dumb money is the new smart money”<sup>1</sup> (and vice versa), and why the market feels “schizophrenic”<sup>2</sup>. Retail is panic-buying equities, the BofA survey cash rule has tripped a sell signal, and semiconductors are reportedly the most crowded trade on the planet – yet hedge funds are running plenty of short positions and have the highest gross leverage in five years. Everyone says they feel underinvested; almost every positioning gauge says the opposite – and then the economy just ends up following markets rather than driving them.<sup>3</sup>

The causes of this phenomenon seem to lie more with market microstructure than with fundamentals or even money creation. From 2012-24, equity and Growth outperformance and rallies in risk generally could be explained in terms of central bank liquidity. Since 2024, they seem to have taken on a life of their own.<sup>4</sup> The obvious culprits are AI and extraordinary corporate earnings – but the outperformance of Value as well as Growth, of equities over credit, and above all of the Momentum factor itself – suggest the explanation lies elsewhere. Globally but especially in the US, the best strategy has just been to buy what has already been going up.

<sup>1</sup> [“Carson Block: ‘Maybe the dumb money is the smart money’”](#), *FT Unhedged*, 22 May.

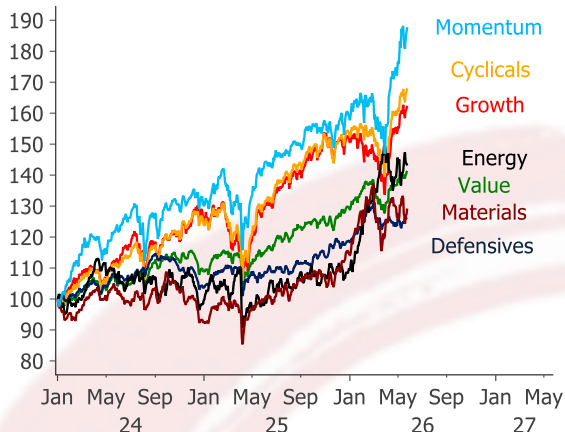
<sup>2</sup> [The Market Ear](#), 20 May.

<sup>3</sup> [When shocking behaviour meets shock-proof markets](#), Feb25.

<sup>4</sup> [The limits of easy money](#), Oct25.

**The real leader isn't AI or growth**

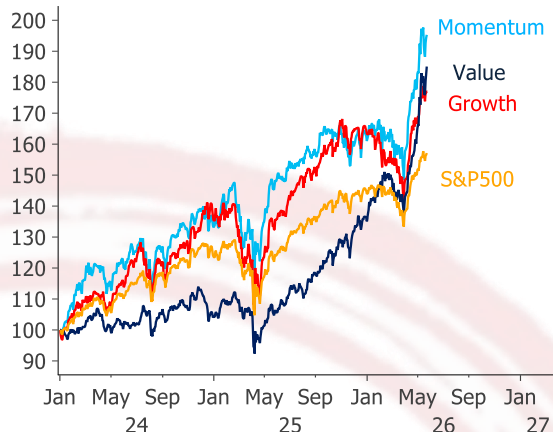
MSCI World equity factors, Jan24=100



Source: MSCI, Bloomberg, Satori Insights.

**The momentum is now in Momentum**

MSCI US equity factors, Jan24=100

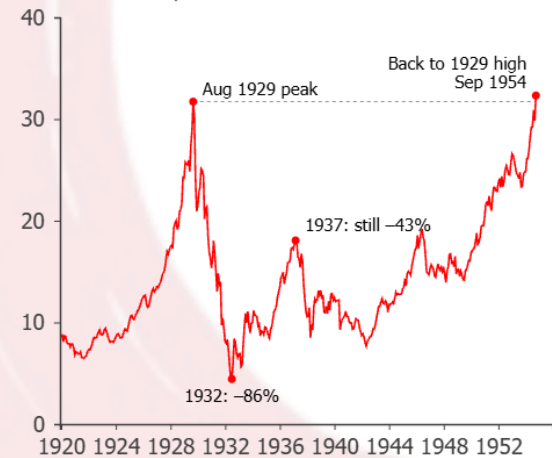


Source: MSCI, Bloomberg, Satori Insights.

What's especially disturbing about this – especially to those of us with grey hair – is that it *feels* so intrinsically vulnerable. You shouldn't be able to make money just by buying stuff that's already rallying, still less by buying every dip. Everyone knows that sooner or later it ends in disaster: just look at the 1930s. Piling in with the crowd goes against every professional investor's hard-earned contrarian instincts.

**Dip-buying didn't always pay**

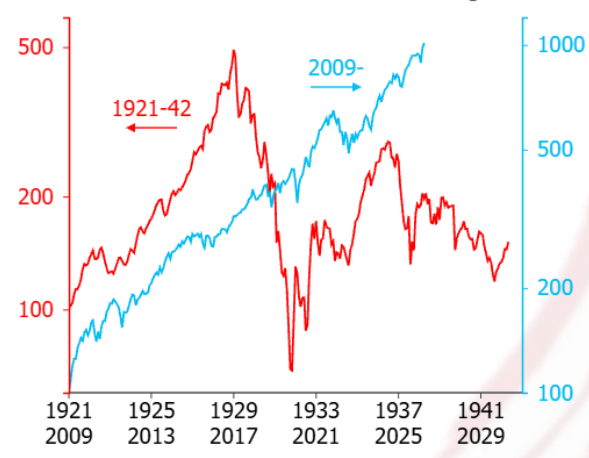
S&P 500, monthly close



Source: S&P (Macrobond), Shiller pre-1928; Satori Insights.

**But this bull market has gone on longer**

S&P 500, rebased to 100 at bull-market low, log scale

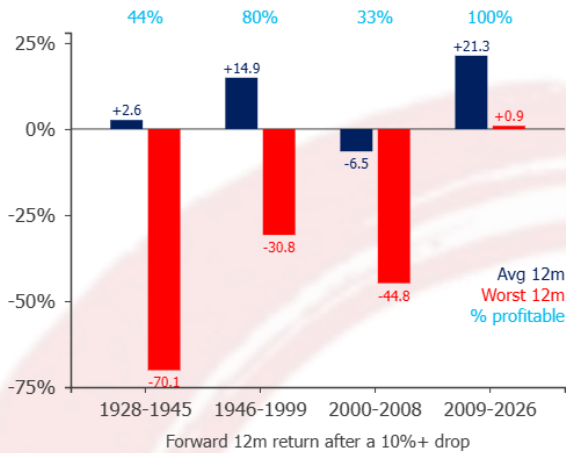


Source: S&P (Macrobond), Shiller pre-1928; Satori Insights.

And yet something does seem to have flipped, at least over the past fifteen years. Buying dips in the 1930s lost money more often than not, and could cost up to seventy cents on the dollar. Buying every 10% dip in the S&P has worked without exception since 2009, with the worst outcome 12m later being a small gain.

**Buy-the-dip is regime-dependent**

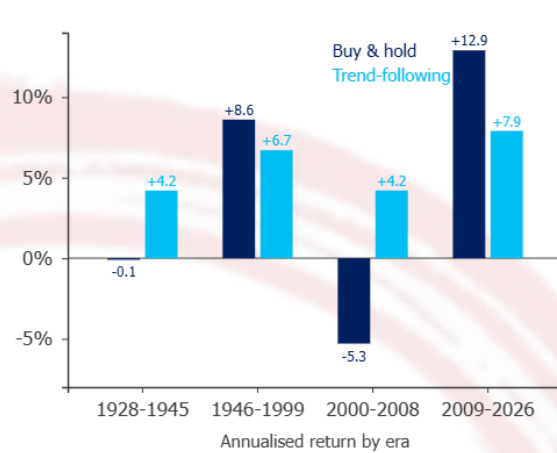
S&P 500 after a 10% fall, by era



Source: S&P, Macrobond; Satori Insights. Top % = share of dips up over 12m.

**Trend-following: safer but lagging**

S&P 500 CAGR by era: hold vs 10m-MA trend



Source: S&P, Macrobond; Satori Insights. Trend = long when above 10-month average, else cash.

A more stable and defensible strategy over the long term would be buying the index when it lies above its own moving average, which has performed consistently in almost every regime. But even that has in recent years fallen short of simple buy-and-hold, and of buying dips, and of buying winners. Surely all this is a sign of something extreme and ultimately vulnerable?

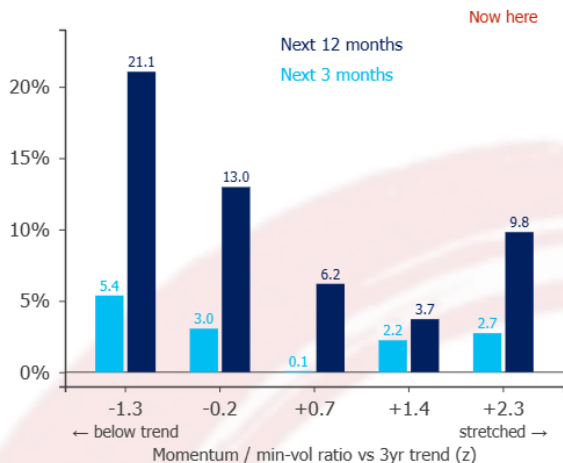
**Not the sell signal you think**

One of the many multi-faceted joys of working with AI<sup>5</sup> is the ability not just to look for mean reversion but to test for trading rules based upon it. Analyses that would previously have taken hours take mere seconds and become effortless. Unfortunately what they reveal is that extreme readings on all these metrics – from gold to silver to Nvidia to Momentum itself – are not in fact sell signals.

<sup>5</sup> [Surfing tsunamis: Six weeks with Claude Code](#) (free to view), 13 May.

**Mostly a buy-the-dip signal**

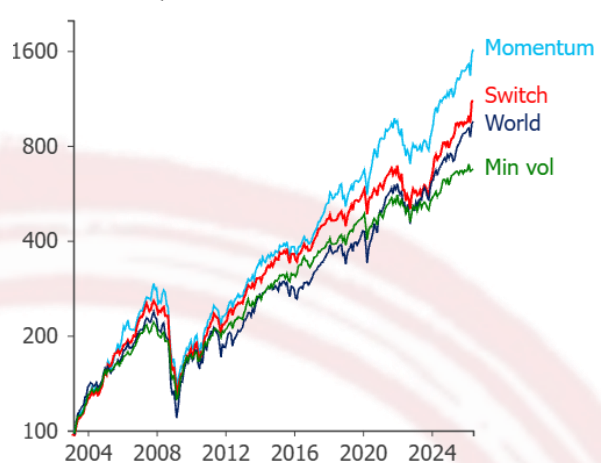
Forward MSCI World return, by ratio stretch



Source: MSCI, Bloomberg; Satori Insights. Overlapping monthly windows, 2003-2026.

**Timing doesn't beat holding it**

Growth of 100; min vol when ratio stretched



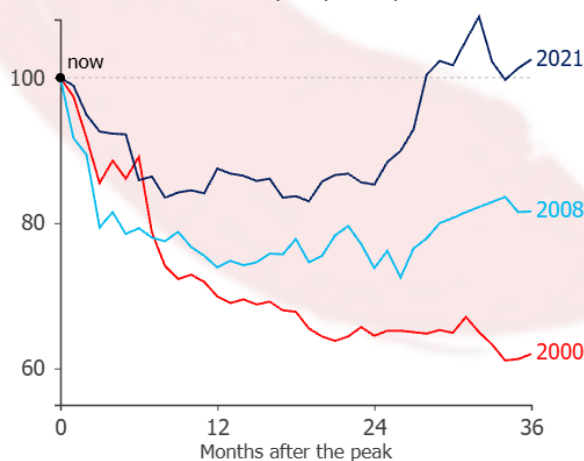
Source: MSCI, Bloomberg; Satori Insights. In-sample, illustrative.

Consider, for example, the forward returns on the MSCI World during periods where Momentum/MinVol has looked stretched. On both 3m and 12m forward returns back to 2003, buying when the ratio has been this stretched has produced returns which are thoroughly average. If anything, what this does is to confirm the wisdom of buying the dip in recent years: what little predictive power there is sits entirely in the cheap tail, where buying a depressed ratio caught the post-crash recoveries. More remarkable still, a trading rule which rotated into MinVol whenever momentum looks extended has underperformed vs simply holding momentum (11% vs 13% pa, in-sample).

Both in this case and more broadly, reversion does eventually come – but unreliably. For Momentum/MinVol, the ratio fell some 30-40% after the 2008 peaks, yet only 15% after 2021 before fully recovering. Knowing it is stretched tells you remarkably little about *when*, or *how far*. This is one of many respects in which it's easier to be a strategist than to be a portfolio manager.

**Reversion, yes – but unreliable**

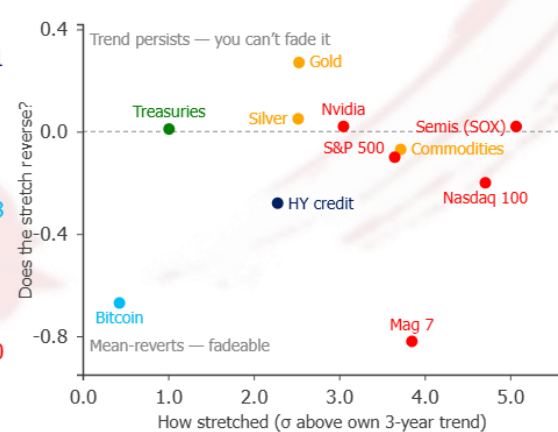
Momentum / min vol after past peaks, peak=100



Source: MSCI, Bloomberg; Satori Insights. MSCI World, total return.

**Stretched – and you can't fade it**

Stretch vs next-12m return reversion



Source: Bloomberg; Satori Insights.  $y = \text{Spearman}(\text{stretch, fwd 12m})$ ; monthly history per asset. From 1970 for broad benchmarks; Bitcoin 2010+, Mag 7 2015+.

This same principle – of it being hard to fade the trend – applies across other assets and asset classes. As we saw earlier, a great many are looking stretched – with semiconductors, the Nasdaq and commodities well over 3 standard deviations above their own 3-year trends, and gold and silver around 2.5. It's almost the assets which don't look stretched which stand out, either because their bubbles have seemingly already burst (bitcoin) or because they never joined in in the first place (Treasuries). While these measures of momentum going vertical may tell you what kinds of markets these are, they still convey remarkably little about what is about to happen to them.

So sort each market's history by how stretched it is and ask what the next year did: for the entire 'hot' cohort the answer is "nothing systematic". The correlation between stretch and forward return is essentially zero, and for gold it is positive (it has paid to chase the trend). Only credit reliably mean reverts, in the well-understood way that tight spreads pre-ordain low forward returns.

## **Bubble trouble? Not yet, says Sornette**

If your bread-and-butter has always been fixed income and value and mean-reversion and all this feels just too much to bear, it's worth noting that even equity-focused quant metrics like Didier Sornette's bubble monitor point to similar conclusions.

Without going into all the mathematical detail, this is an academic framework which to us never seemed quite to catch on institutionally but which had a great deal of theoretical appeal. The idea is that as bubbles suck in new money and sow the seeds of their own future destruction, the price action goes super-exponential or hyperbolic and can in principle be detected through mathematical measures of autocorrelation and volatility. While the free [ETH Zurich monthly Bubble Monitor](#) seems to have been discontinued, it is now very easy to have AI run the necessary [log-periodic power law tests](#) on multiple assets and trading pairs to look for the characteristic super-exponential bubble signature.

## Bubble shape: only in silver and semis-vs-S&P

Sornette LPPLS fits across asset cohort

Asset	m	$\omega$	O	D	tc	Sornette signature
Silver	0.67	12.2	3.8	1.07	Aug 2026	clean bubble
Gold	0.57	14.2	5.6	1.29	Sep 2026	bubble (relaxed)
Semiconductors (SMH)	0.24	6.7	2.5	0.59	Sep 2026	bubble (relaxed)
Semis vs S&P 500	0.31	8.3	4.5	1.60	Jun 2026	clean bubble
S&P 500	0.47	12.1	2.3	0.66	Jun 2027	partial
Mag 7	0.40	21.0	3.8	0.34	–	no bubble
Momentum vs Min Vol	0.09	2.5	1.8	0.53	–	no bubble

Source: Satori Insights. LPPLS fits per Johansen–Ledoit–Sornette specification; daily prices since Jan 2022, multi-seed Levenberg–Marquardt across 1–3 year sub-windows. ‘Clean bubble’ = canonical filter ( $0.1 < m < 0.9$ ,  $6 < \omega < 13$ ,  $B < 0$ ,  $O \geq 2.5$ ,  $D \geq 1.0$ ); ‘relaxed’ =  $\omega \in [4, 15]$ ,  $O \geq 2.0$ ,  $D \geq 0.5$ .

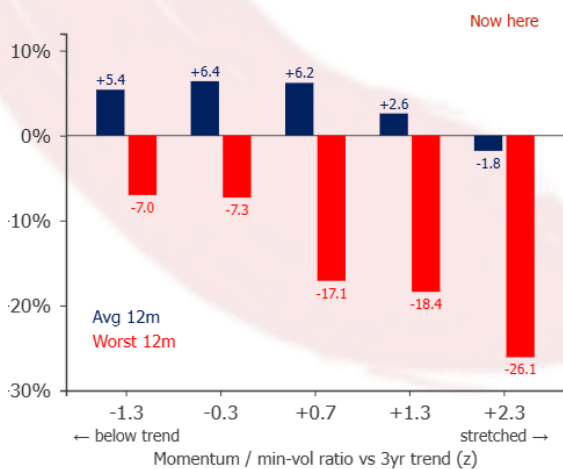
As things stand, the only clear bubbles the framework finds are in silver and in semiconductors vs the S&P. Semiconductors outright and gold just about breach the necessary thresholds, but Momentum or Momentum vs MinVol barely register. Here too, then, we come back to the same – unbearable – conclusion. There is no market in the complex where being extended has actually translated into a tradeable sell. Which is precisely why everyone is still long all of it.

## The risk is in the tail, not the trend

But none of this means that the signs of excess should simply be ignored. What crowding changes is not the central case, but the size of the tail. Recent trading strategies seem to be exacerbating a pattern initially attributable to QE, in which day-to-day volatility is suppressed but downside risk is amplified.<sup>6</sup> The magnitude of the impact varies by asset class and trade pair.

### Crowding fattens the tail

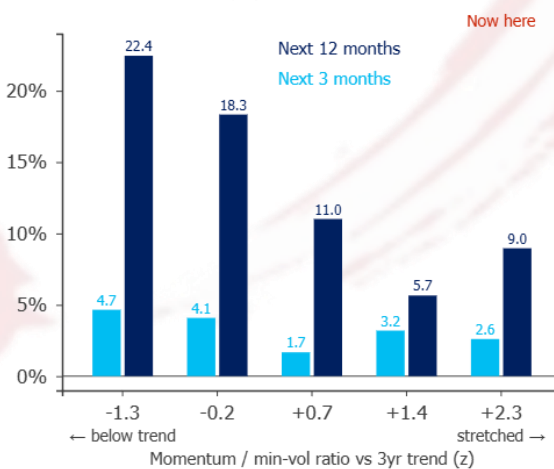
Fwd 12m momentum minus min vol, by stretch



Source: MSCI, Bloomberg; Satori Insights. Overlapping monthly windows, 2003-2026.

### Stretched momentum tends to fade

Forward Momentum return, by ratio stretch



Source: MSCI, Bloomberg; Satori Insights. Overlapping monthly windows, 2003-2026.

<sup>6</sup> *The Liquidity Paradox*, Citi, May 2015. [Mind the exits](#), Satori Insights, Aug24.

Let’s take the original Momentum vs MinVol pairing as the canonical and clearest example. Sort the history by how stretched the trade was at the time, and the average forward return barely moves. What moves instead is the maximum downside. At today’s extreme, typical 12m relative returns are mildly negative, and the probability of positive returns fall to a coin toss – but the worst case widens from around -7% to -26%. The danger is not that momentum *must* mean-revert, but that when it does, it tends to do so violently.

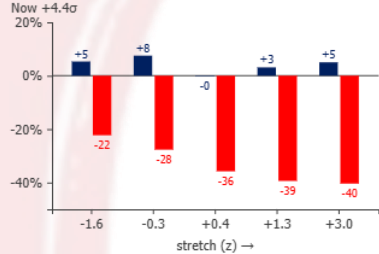
That signature is not unique to momentum equities, but nor is it universal – and the difference across asset classes is telling. Apply the same exercise to the rest of the stretched complex and three groups emerge.

**Crowding fattens the tail – for some assets, not others**

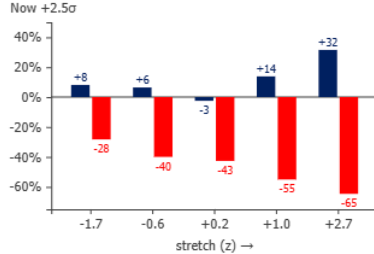
Forward 12m total return by stretch quintile (z-score vs own 3y trend); twin bars per bucket: mean (navy) and worst (red) 12m return

**Stretch shape: tail fattens, mean barely moves**

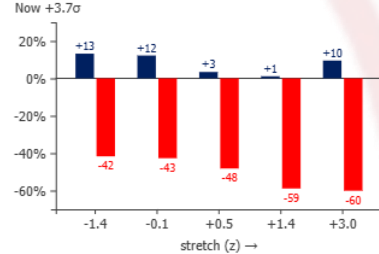
**SOX vs S&P 500**



**Silver**

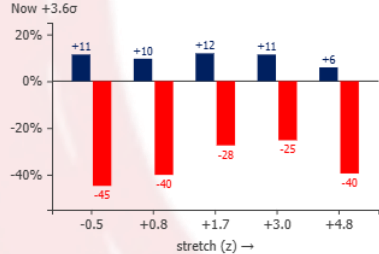


**Commodities (GSCI)**

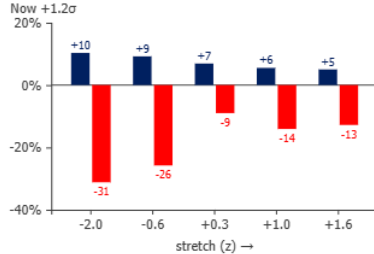


**Stretch shape: tail flat or shrinks (mean-reverting regime)**

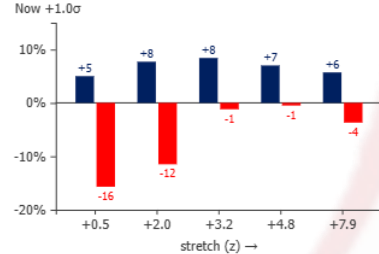
**S&P 500**



**HY credit (by spread tightness)**



**Treasuries**



Source: Bloomberg via Macrobond; Satori Insights. Overlapping monthly windows since data start; quintiles on stretch.

The first group look like Momentum vs MinVol. Semiconductors against SPX traces it almost exactly: the average forward return drifts within a 5% range across every quintile, but the worst case roughly doubles, from -22% to -40%. Broad commodities tell the same story, and silver more violently still (-28% to -65%). These are the markets where their own tendency towards melt-up comes at the expense of significantly increased downside tails.

The second group is SPX itself. The S&P 500 sits +3.6σ above its own three-year trend, but the distribution shape does not track it: the worst case at +5σ looks much like the worst case at 0σ, and the average forward return is almost flat. The popular “five-sigma overshoot” tells you the market is high; it does not, by itself, tell you anything about the forward return distribution.

The third group is credit and govies, where the tail conditional on peak stretch actually *narrows*. Sort HY and IG by spread tightness, for example, or Treasuries by yield, and the downside tail *diminishes* as we move from wides to tights. Mean forward 12m returns fall also: you are more likely both to make high gains – and have high losses – in fixed income when you start from a depressed market, not from a buoyant one.

These observations may sit awkwardly at first with the textbook view of credit returns being asymmetric, and more so at tights – but in fact they are consistent. Fixed income assets do not *melt up*: the path into peak-tight stretch is a slow real-money grind for carry, not a leveraged positioning chase. Spreads widen gradually before they panic, so by the time the catastrophic 12m windows actually start – November 2007, for example – stretch has already collapsed and the window starts from “already widening”, not “still rallying”.

So in credit and rates, peak stretch is a state. In crowded equity trades, it is a primed mechanism. Credit and rates fall apart gradually then suddenly; in equities the initial melt-up is just as irresistible as the ultimate meltdown. It is these factors in combination which make for a fragility that *feels* universal but is actually very hard to point at.

## Hedge funds are now much of the crowd

Usually we think of dip-buying<sup>7</sup> and momentum trading as retail-driven phenomena, and to some extent they still are. US equity mutual fund and ETF inflows, in particular, have remained remarkably resilient to setbacks; one recent interesting paper on the recycling of share buybacks points to some of the potential reason why.<sup>8</sup>

But hedge funds have been growing steadily in importance in this space, and their fingerprints are now all over the price action. A violent unwind of momentum trades, should one occur, would hit them at least as hard as retail.

Return correlations help show the reasons why.

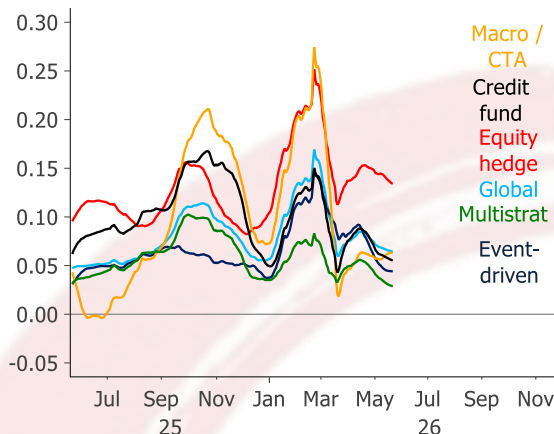
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<sup>7</sup> With or without the commonly appended expletive.

<sup>8</sup> [\*Do Share Repurchases Increase the Aggregate Value of Non-repurchasing Firms?\*](#), B. Kim, Dec25.

**Low betas**

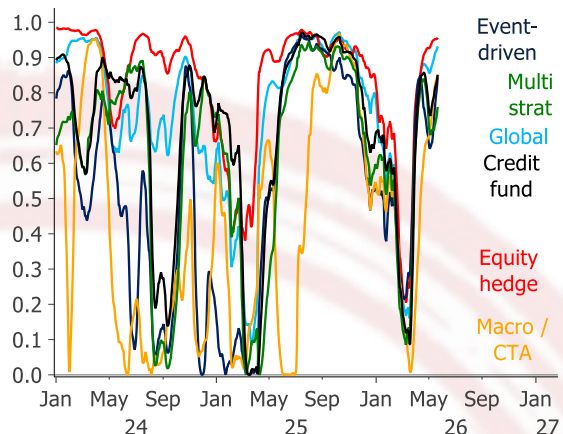
Hedge fund daily return beta to S&P 500, rolling 3m



Source: HFR, S&P Global, The Office of Financial Research (OFR), Macrobond, Satori Insights.

**But high correlations**

Hedge fund R-square to S&P 500, rolling 3m



Source: HFR, S&P Global, The Office of Financial Research (OFR), Macrobond, Satori Insights.

Hedge funds' market exposures on the face of it look small. Daily return betas to the S&P sit around 0.1 across event-driven, multi-strat, credit, equity hedge, global macro and Macro/CTA – low single-digit market sensitivity. The shorts are doing their job; the books look hedged.

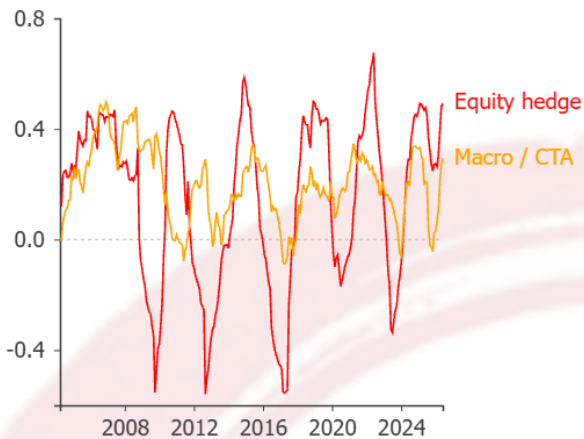
Unfortunately what they are not doing is diversifying. The  $R^2$  between those same hedge fund returns and the S&P runs at 0.7 to 1.0 across every category. The slope is small, but the residual moves with the market almost mechanically. Whatever each strategy holds individually, the *residual after hedges* is the same trade in six labels.

That is the very thing the Financial Stability Board describes as crowdedness<sup>9</sup> – and it is why the beta number flatters. A stop-loss-driven unwind does not break the level of exposure, which is small. It breaks the correlation regime the hedges depend on. When that goes, small betas do not bound the loss: risk models sized on a beta of 0.1 turn out to have been sized for a world in which the strategies were genuinely diversified, which the  $R^2$ s say they are not.

<sup>9</sup> [Leverage in Nonbank Financial Intermediation](#), FSB, Jul25.

**Quietly a momentum bet**

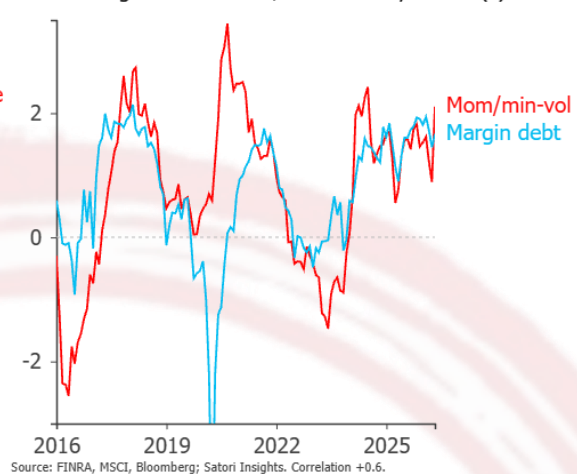
HF return correlation to momentum factor, 12m



Momentum factor = MSCI World Momentum minus World.  
Source: HFR, MSCI, Bloomberg; Satori Insights.

**Leverage and momentum, together**

US net margin debt & mom/min-vol vs 3yr trend (z)



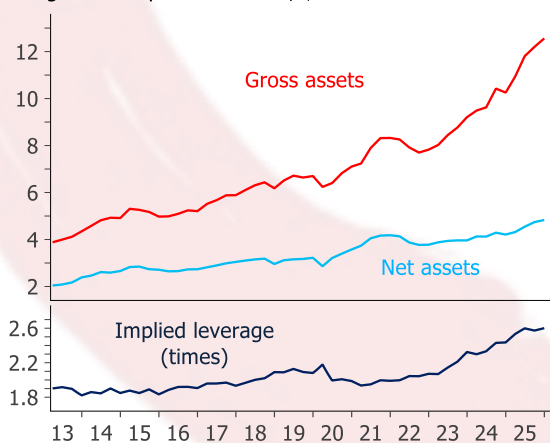
Source: FINRA, MSCI, Bloomberg; Satori Insights. Correlation +0.6.

It turns out the long book has a name. The residual that shows up in those R<sup>2</sup>s sits heavily in the AI/momentum complex: semiconductors, megacaps, the names everyone is long. Hedge funds' equity long/short returns now correlate with the momentum factor at around 0.7, close to a record – not because they have all decided to “buy momentum”, but because that is what their long books happen to contain.

Leverage sits alongside, and is also at extremes: net margin debt is back near the top of its range as a share of market value. The co-movement with momentum is mostly shared risk appetite; what matters is less that leverage drives the trade up than that it is loaded for the way down.

**HF leverage at post-GFC highs**

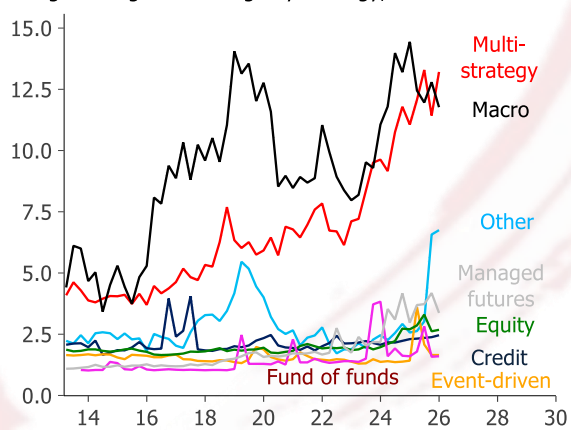
Hedge fund exposure metrics, \$tn



Source: The Office of Financial Research (OFR), Fed, S&P Global, Macrobond, Satori Insights.

**Leverage growth at macro+multistrat**

Hedge fund gross leverage by strategy, times



Source: The Office of Financial Research (OFR), Fed, S&P Global, Macrobond, Satori Insights. Excludes relative value funds, where leverage is higher but down from 2022 peak.

The scale is at post-GFC highs. Industry gross assets have climbed to roughly \$12.5tn against around \$5tn of net, leaving implied gross leverage close to 2.6, the top of the post-2013 range. The gearing is not evenly carried: multi-strat and macro run at 12-14x gross,

an order of magnitude above event-driven, equity, credit and fund-of-funds. The shared book is held with the most leverage at the funds running the tightest risk gates.

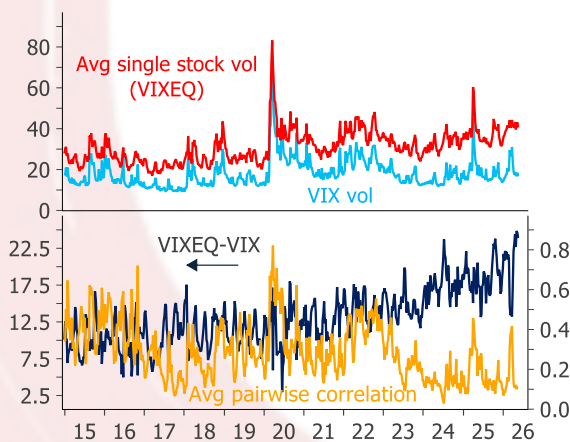
It is this point which is critical for the outlook, and it turns on how these books are run: lots of gross, policed by tight VaR and stop-loss limits. The FSB describes the mechanism almost exactly: forced deleveraging “when investors breach risk or stop loss limits or aim to maintain a target level of risk”, and “crowded” cohorts whose similar positions make them “react in a correlated manner during stress”. Built to run in the body, wired to bolt at the tail.

## The market is pricing a calm of its own manufacture

The hedge-fund mechanism above is wired for a correlation event. The market is pricing close to the opposite. S&P 1m implied correlation sits near 0.11, a record low and structurally depressed for fifteen years. That is a wager that the index will not broaden in stress: that a crack in one cohort will not pull the liquid non-crowded names with it through forced selling. Yet that is precisely the transmission a VaR-driven de-gross from a crowded book would be likely to produce.

### Equity correlations close to lows

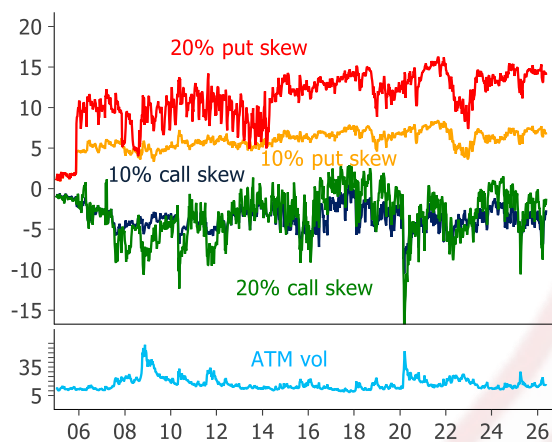
US equity volatility indices



Source: CBOE, Bloomberg, Satori Insights.

### Downside puts well bid

10% and 20% 3m S&P 500 skew, %

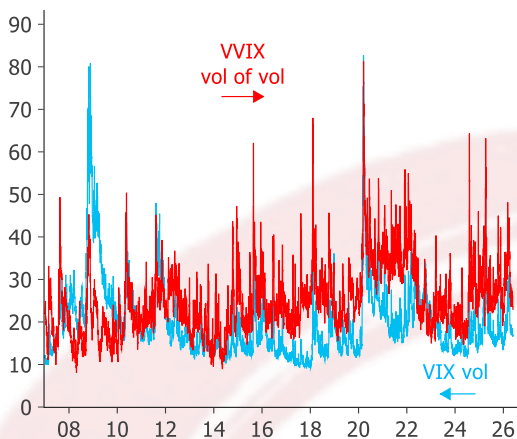


Source: Bloomberg, Satori Insights.

Beyond correlation, with the exception of OTM puts the rest of the vol surface is also increasingly pricing calm. VVIX vol-of-vol – the natural diagnostic for whether a calm regime is itself fragile – is moving back towards lows after a brief spike in early May. Even the SKEW index has come off its highs thanks to a drop in call skew. Credit and FX vol look low. Only single-name equity vol and put skew remain rich, reflecting where defensive positioning has actually been spent.

**VVIX looking low again**

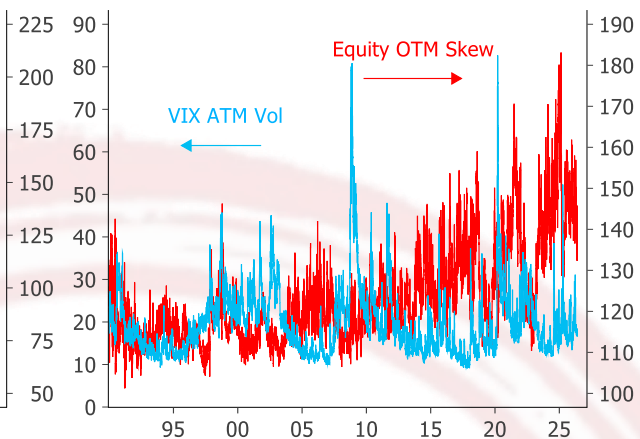
US equity volatility indices



Source: CBOE, Bloomberg, Satori Insights.

**Even skew is off the highs**

CBOE VIX vs SKEW (call+put skew) indices, implied vol



Source: CBOE, Satori Insights.

What this suggests is that the market is paying for direction. What it should be paying for is correlation.

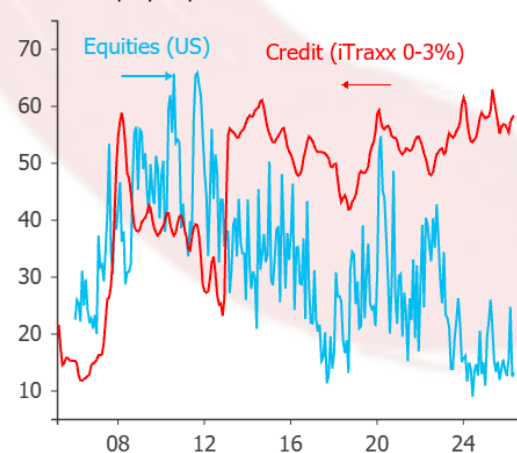
**The hedge is correlation, not vol**

If the diagnosis above is right, then the ideal hedge is actually the very thing the market is mispricing. Unfortunately correlation is also harder to trade than it should be, and uncertainty over timing means that proxies using options risk carrying expensively.

The cleanest expression would be to go long the CBOE Implied Correlation Index (COR1M) outright – but it remains a benchmark rather than a tradable instrument. Variance swaps on dispersion (long index, short single-name variance) and OTC correlation basket swaps could achieve much the same thing. Apparently CBOE has flagged plans for futures on its related S&P Dispersion Index (DSPX), but has nothing live yet.

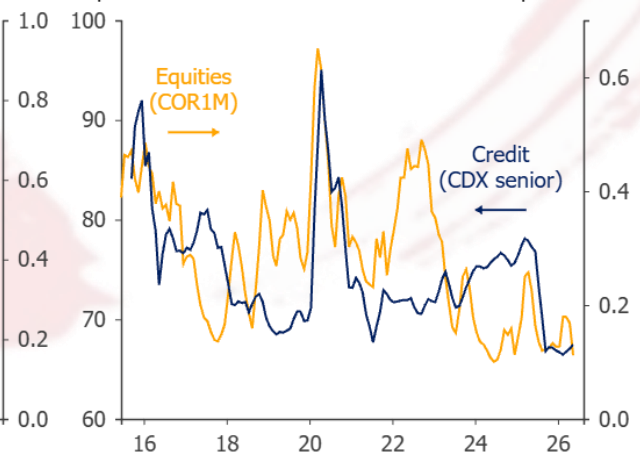
**Credit correlation appears more elevated But senior tranches are similarly relaxed**

Credit vs equity implied correlation



Source: Benoit Grasset, Bloomberg, Satori Insights.

Implied correlation: credit senior tranche vs equities



Source: Bloomberg, Markit, Cboe, Satori Insights.

Credit correlation through tranches potentially also looks cheap in this context – but is subject to its own technicals and less likely to be caught up in an equity momentum unwind. Note also that while a long correlation history<sup>10</sup> makes it look as though credit is pricing something very different from equities, most of this is specific to junior tranches in credit: senior and mezz tranche correlations suggest a relaxed pricing of systemic risks in credit too.

## Schizophrenic, not stupid

To sum up, there is some method in the markets' madness – but also a potential mispricing. Investors are simultaneously max long and nervously hedged – but the hedging is in the wrong currency. The conditioning that makes momentum and dip-buying feel invincible is the very same mechanism that has built the crowding underneath. Fragility in pricing is suppressed; fragility in plumbing is being amplified. Dip-buying may have worked consistently back to 2009, but the 1930s shows it is far from a law of nature.

The surprise from here may not be a meltdown. It is just as likely to be a further melt-up that pulls in more late money: there is no market where being extended has been a tradeable sell. The unbearable momentum of momentum is not that it must end in a violent sell-off; it is that one cannot prudently sit out. The only way out of this dilemma is to hedge the shape of the eventual unwind – through correlations – rather than its level.

Mean reversion has not died. It has just moved – from price to correlation, and from level to shape.

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<sup>10</sup> So far we can only find data for iTraxx 0-3% this far back – Bloomberg pricing for senior and mezz and for CDX goes back only to 2015.