THREE HORIZONS CAPITAL · RESEARCH

Protected Against the Wrong Shock.

Most portfolios built to survive the next crisis are built to survive a recession: long duration, quality equity, defensive credit. We stress-tested ten of them against three inflation and energy shocks we built for this study. In a 1970s-style shock all ten lose a quarter of their value. A portfolio built for the other regime loses 9.7%, and in 2022 it lost 8.3% against 14.9%.

−26.7% vs −9.7%

Average modelled loss of ten recession-protected portfolios in a combined inflation and energy shock, against a portfolio built for inflation

−14.9% vs −8.3%

What actually happened in 2022: the recession-protected design against the portfolio built for inflation

+8.2% vs +2.3%

The price, in 2020's recession: the portfolio built for inflation gave up most of the recovery

THE FINDING IN ONE LINE

Recession protection and inflation protection are different problems: the assets that shield a portfolio in a downturn are the ones that hurt it when inflation and rates surge, so a portfolio protected against one shock is exposed to the other.

Three Horizons Capital, Portfolio Analytics. Modelled 12-month scenarios built by 3HC; realised monthly-rebalanced returns, August 2013 to September 2026.

01 Most protection is built for one kind of shock

A portfolio engineered to survive a recession leans on long-duration bonds, quality equity and defensive credit. In a downturn those assets win: yields fall, bonds rally, quality holds. But the opposite regime is just as possible: inflation re-accelerates or an energy shock hits supply, central banks hike into it, and duration and long-dated growth equity become the losers.

So we asked a simple question. Take ten portfolios built to be recession-protected, across a 10% to 20% risk budget. What happens to them when the shock is inflation, not recession? And what does a portfolio designed for that other regime look like, and what does it cost?

02 Three shocks we built for the test

None of the three scenarios is a published stress case. We constructed them for this study, calibrated to named historical episodes, and applied them asset by asset across 58 asset classes using standard sensitivities: duration, credit spreads, equity discount rates, commodity and currency exposure, and inflation pass-through for real assets.

SHOCK	MODELLED ON	THE CORE MOVES OVER 12 MONTHS
Inflation shock	1983 and 2021 to 23	Core CPI +400bp above consensus; real 10-year yield +150bp; breakevens +130bp; further policy hikes of 150bp to 275bp; high-yield spreads +150bp
Energy shock	1973 to 74 and 2022	Oil +85%; commodities +38%; headline CPI +250bp; real yields −30bp as growth fears cap rates; high-yield spreads +180bp
Combined, 1970s-style	1973 to 74 and 1979 to 80	Oil +100%; commodities +52%; headline CPI +550bp as expectations de-anchor; real yields +170bp; high-yield spreads +340bp

All scenario inputs are 3HC constructions, not market-observed or third-party figures. Source: 3HC portfolio analytics.

The combined shock is deliberately worse than the sum of its parts. When inflation expectations de-anchor, policy is forced to tighten into weakening growth, so equity and credit fall further than in either shock alone.

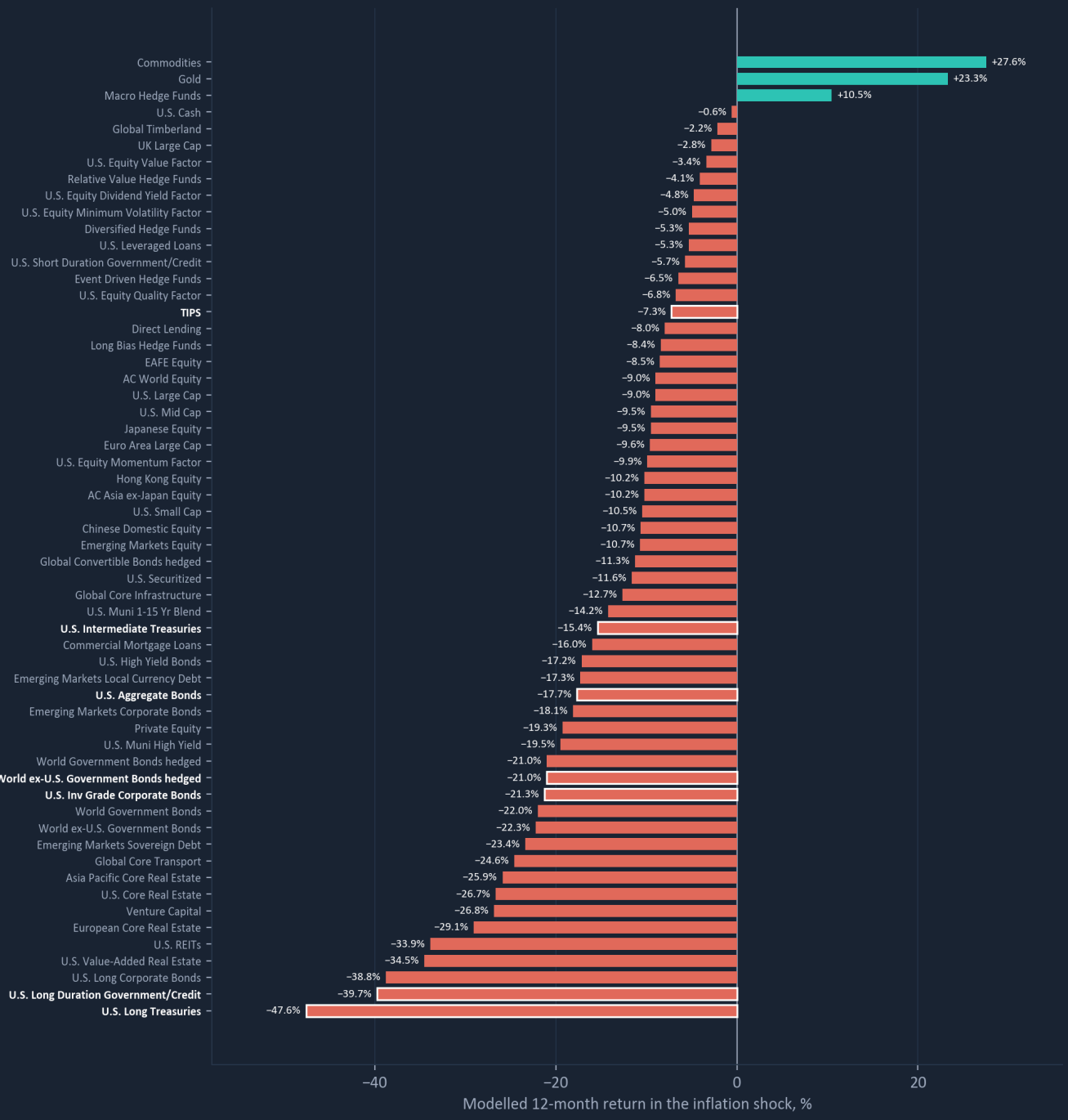
03 What a recession hedge does in an inflation shock

The assets that provide recession protection are exactly the ones that break. In our inflation shock, long Treasuries fall 47.6% and investment-grade corporates 21.3%. Even TIPS, the obvious inflation hedge, lose 7.3%, because the jump in real yields outweighs the gain in breakevens at the 10-year point.

Across all 58 asset classes, 55 fall in the inflation shock. The three that rise are commodities (+27.6%), gold (+23.3%) and macro hedge funds (+10.4%).

In our inflation shock 55 of 58 asset classes fall, led by the recession shield

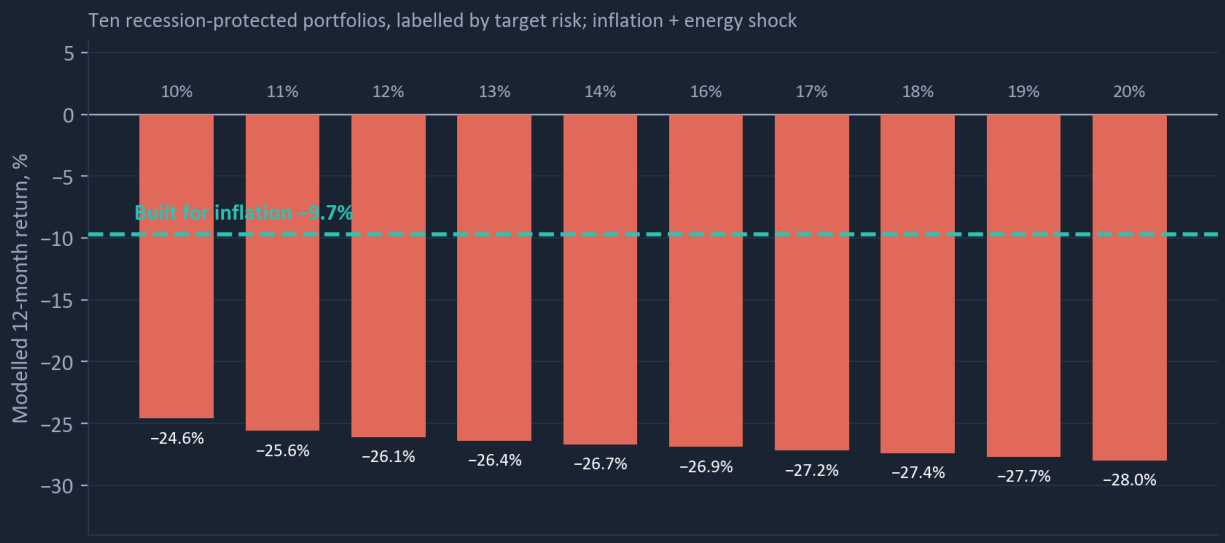
Bold with a white outline = assets that protect a portfolio in a recession. Only commodities, gold and macro hedge funds rise.



Source: 3HC portfolio analytics. Modelled 12-month inflation shock built by 3HC, applied across 58 asset classes.

The ten recession-protected portfolios lose 11.3% to 13.9% in the inflation shock (average 12.8%), 5.6% to 8.4% in the energy shock (average 7.1%), and 24.6% to 28.0% in the combined shock (average 26.7%).

Taking more risk does not buy protection: all ten lose 24.6% to 28.0% in the combined shock



Source: 3HC portfolio analytics. Modelled 12-month scenarios built by 3HC; cohort = ten recession-protected portfolios, 10% to 20% target risk.

Taking more risk does not buy a way out. The higher-risk portfolios, with more dividend equity and a thinner defensive floor, are only marginally less bad in the inflation shock and marginally worse in the combined one. Solving for a recession does not solve for inflation, or even change much how exposed a portfolio is to it.

04 A portfolio built for the other regime

We then built one global, ten-asset portfolio for a volatility budget of about 15%, designed specifically to hold up when inflation and energy prices surge.

ASSET CLASS	WEIGHT	ROLE
U.S. equity value factor	27%	Equity risk with the least duration and multiple sensitivity
UK large cap	20%	The heaviest energy-major and miner weight among developed equity
EAFE equity	17%	International diversification away from US growth
Emerging markets equity	13%	Global diversification, partly commodity-linked
Commodities	11%	Direct energy and broad inflation hedge
Gold	6%	Inflation and safe-haven hedge
Direct lending	3%	Floating-rate income, little duration
TIPS	1%	Direct real-yield and breakeven hedge
Global core infrastructure	1%	Inflation-linked contractual cash flows
U.S. leveraged loans	1%	Floating-rate credit, near-zero duration

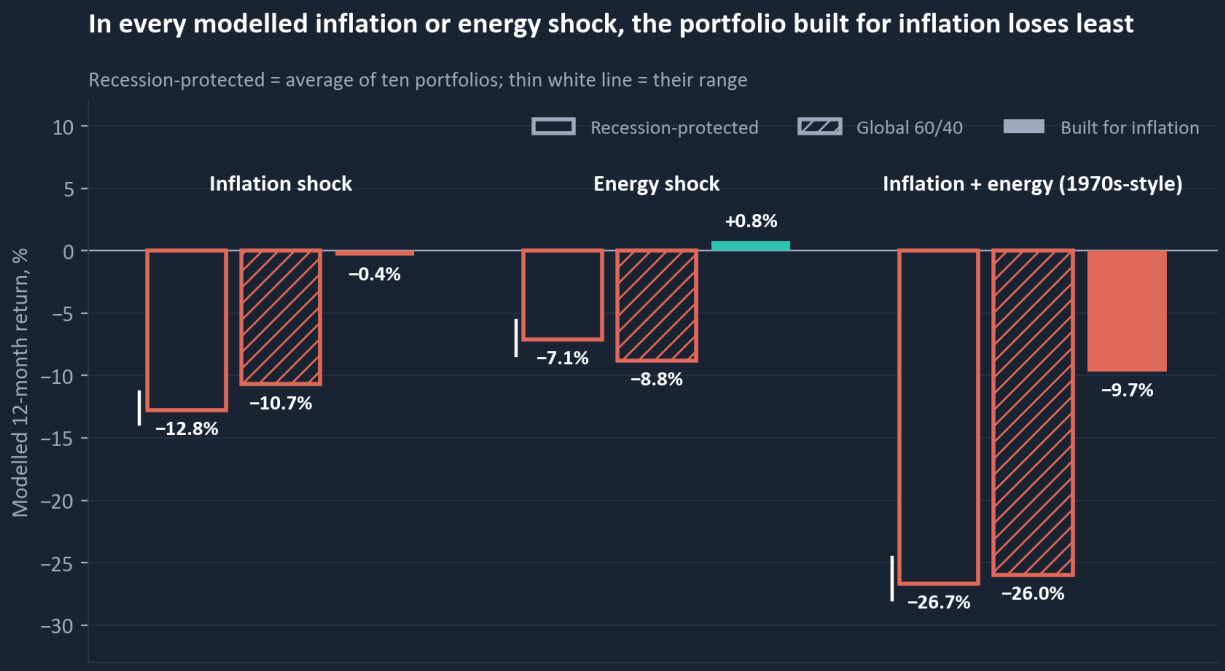
Illustrative research design, not a recommendation. Source: 3HC portfolio analytics.

It is honest about what it is. A 15% volatility budget cannot be reached with pure inflation hedges, which cluster at about 8% to 11% volatility on their own. So the portfolio still carries real equity risk: growth explains 93% of its variance. The design puts that equity risk in the least rate-sensitive, most commodity- and value-tilted equity available, and sizes the commodity, gold, TIPS and infrastructure sleeve to cushion the fall, not to eliminate it.

05 In the modelled shocks, it loses least every time

SCENARIO	RECESSION-PROTECTED (AVERAGE OF TEN)	GLOBAL 60/40	BUILT FOR INFLATION
Inflation shock	−12.8%	−10.7%	−0.4%
Energy shock	−7.1%	−8.8%	+0.8%
Combined, 1970s-style	−26.7%	−26.0%	−9.7%

Modelled 12-month returns. Source: 3HC portfolio analytics.



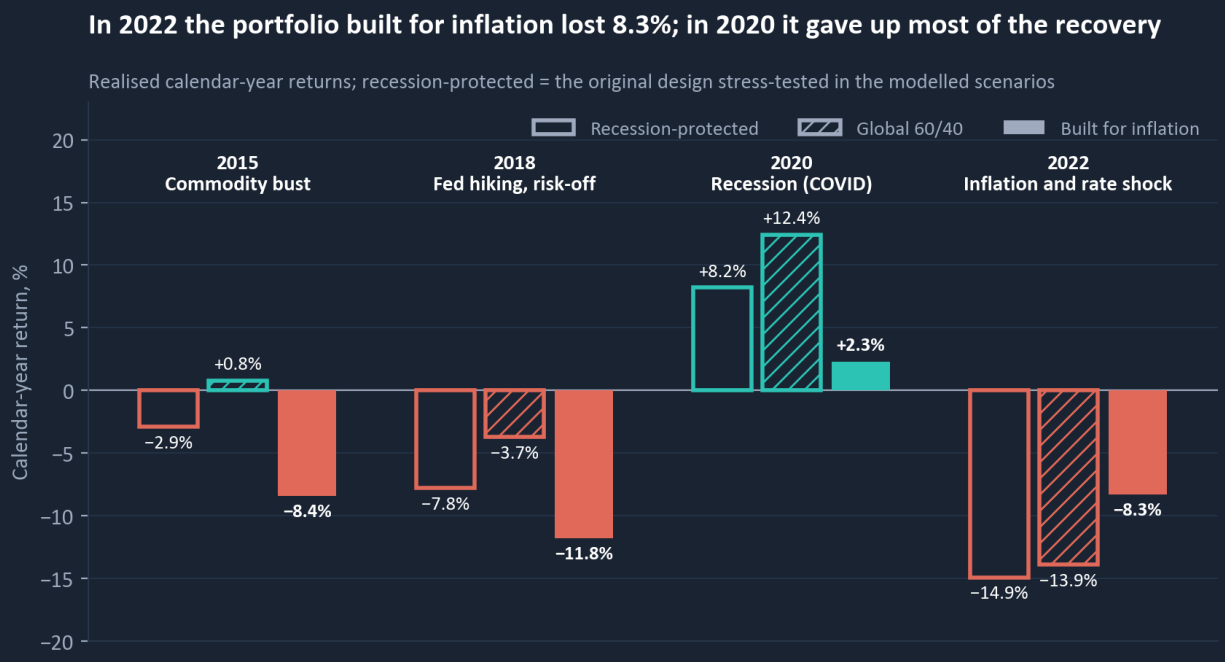
Source: 3HC portfolio analytics. Modelled 12-month scenarios built by 3HC; cohort = ten recession-protected portfolios, 10% to 20% target risk.

The gap to the recession-protected average is 12.4 points in the inflation shock, 7.9 in the energy shock and 17.0 in the combined shock. Against a global 60/40 it is 10.3, 9.6 and 16.4 points. As a cross-check, our production scenario engine's own independently modelled stagflation case, which we did not build for this study, puts the portfolio at −0.6%, in line with our inflation shock.

The same engine shows the other side of the trade: −11.7% in a normal recession and −20.6% in a hard, 2009-style recession. This portfolio is not recession-protected. It is built for the opposite regime, deliberately.

06 In 2022, it actually happened

Models only go so far, so we ran both designs and a global 60/40 on realised, monthly-rebalanced returns over the longest common history, August 2013 to September 2026 (158 months). In 2022, the one real inflation and rate shock in that window, the portfolio built for inflation lost 8.3%. The recession-protected design lost 14.9%, and the global 60/40 13.9%.



Source: 3HC portfolio analytics. Realised monthly-rebalanced total returns, calendar years.

The protection is real, and it is not free. In 2020's recession the portfolio built for inflation made 2.3% while the recession-protected design made 8.2% and the 60/40 12.4%. It also lost more in 2015's commodity bust (−8.4%) and in 2018's Fed-hiking sell-off (−11.8%).

OVER THE FULL WINDOW	BUILT FOR INFLATION	RECESSION-PROTECTED (ORIGINAL)	RECESSION-PROTECTED (RECALIBRATED)	GLOBAL 60/40
Cumulative return	+183.4%	+127.7%	+144.1%	+180.2%
Annual return	8.23%	6.45%	7.01%	8.14%
Volatility	13.07%	10.76%	12.31%	9.01%
Sharpe ratio	0.56	0.49	0.49	0.75
Worst drawdown	−25.67% (Mar 2020)	−22.32% (Sep 2022)	−24.87% (Sep 2022)	−19.24% (Sep 2022)

Realised, monthly rebalanced, August 2013 to September 2026. Source: 3HC portfolio analytics.

Over 13.2 years the portfolio built for inflation compounded slightly faster than the 60/40 but with more volatility, so the 60/40 had the better Sharpe ratio. A recalibrated version of the recession-protected design, which added more small-cap equity to reach higher risk levels, made 16.4% in 2020 but lost 17.6% in 2022: the extra growth risk made the inflation year hurt more.

THE POINT FOR A PORTFOLIO

Each design wins its own regime and pays in the other. Most of the time all three move together; the difference shows up in a handful of tail months. Those are the months a portfolio is judged on.

07 What this does and does not show

This is not a case that recession protection is wrong, or that the portfolio built for inflation is better. Over the full history the global 60/40 had the best risk-adjusted return, and the portfolio built for inflation had the deepest drawdown, in March 2020. The finding is narrower: the two kinds of protection are close to independent problems, and a portfolio that has solved one should not assume it has solved the other.

The limits are plain. The scenarios are our constructions, calibrated to history, not forecasts. The stress test uses the original recession-protected design; the recalibrated version did worse in 2022. One realised inflation shock confirms direction, not size. We publish no forward return or Sharpe estimates here.

08 What changes for a portfolio

- **Test the book against both regimes.** A stress test that only asks "what happens in a recession?" answers half the question.
- **Know which assets change sides.** Long duration and investment-grade credit are the shield in a downturn and the main source of loss in an inflation shock.
- **Treat the two kinds of protection as complementary sleeves, not rival portfolios.** Size them to a view on which regime is more likely over the horizon that matters, and revisit it.
- **Judge protection in the tail months, not the averages.** High correlations hide the few months when the designs diverge.

09 What we measured

- **Scenarios:** three 12-month shocks constructed by 3HC (inflation, energy, combined), calibrated to 1973 to 74, 1979 to 80, 1983, 2021 to 23 and the 2022 European gas crisis, and applied across 58 asset classes using duration, credit-spread, equity discount-rate, commodity, currency and inflation pass-through sensitivities; cross-checked against the 3HC production scenario engine's own cases.
- **Recession-protected portfolios:** ten global portfolios optimised for recession protection at target risk of 10% to 20%. The stress test uses their original design. The portfolio built for inflation is shown in section 04.
- **Backtest:** realised monthly total returns, rebalanced monthly, August 2013 to September 2026 (158 months), the longest window common to every constituent. Sharpe ratios are measured against one- to three-month Treasury bills.
- Modelled scenarios are not forecasts, and past performance is not indicative of future results. This paper is research, not investment advice, and is not a recommendation to adopt any portfolio.

IF THIS IS USEFUL

This read joins 58 asset classes, a scenario engine and realised fund-level returns on one platform. If you build multi-asset portfolios or model portfolios and want to see how your book behaves in an inflation shock as well as a recession, talk to us at threehorizonscapital.com.