Risk & Performance Summary – AAPL/MSFT/TSLA Portfolio

This dashboard summarizes key financial risk indicators using historical portfolio returns, including Value at Risk, Conditional Value at Risk and return adjusted ratios.

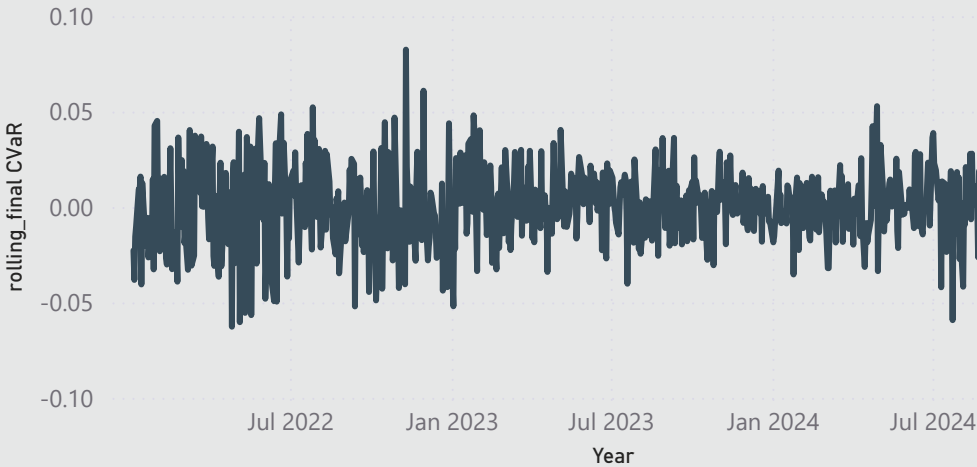| Historical VaR	Sortino Ratio	CVaR	Sharpe Ratio	Max Drawdown
−0.05	**0.05**	**−0.06**	**0.03**	**−0.45**

Date
All

Confidence
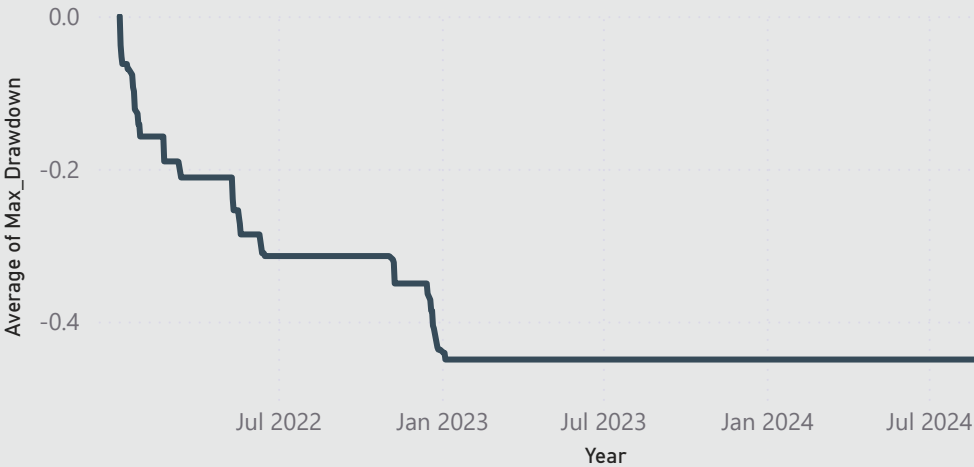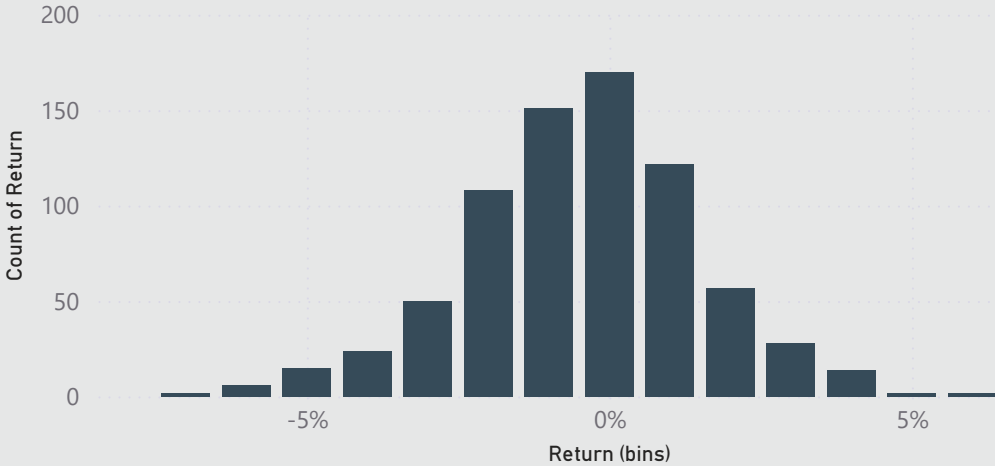0.99

Method
Historical
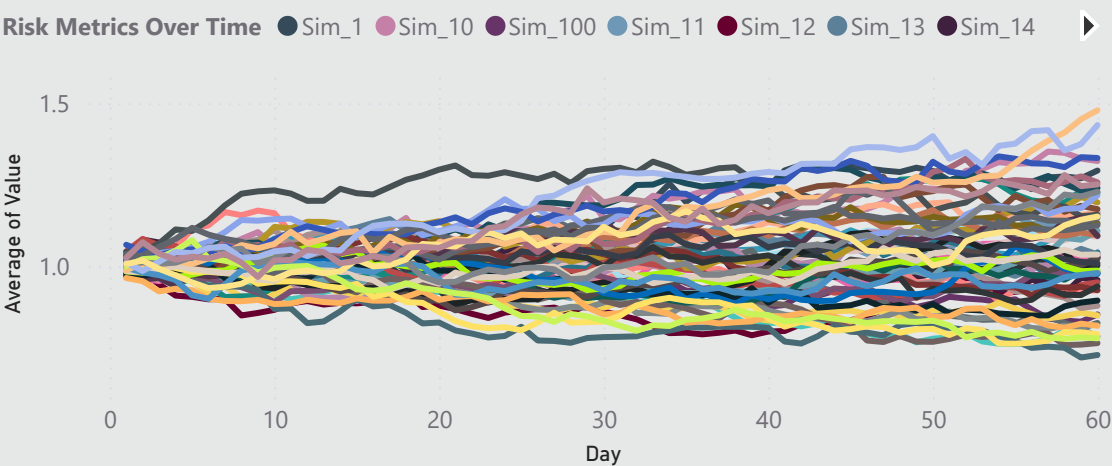
Rolling Conditional Value at Risk (CVaR)

Max Drawdown

Distribution of Daily Returns

Monte Carlo Simulated Portfolio Paths

Risk Metrics Over Time ● Sim_1 ● Sim_10 ● Sim_100 ● Sim_11 ● Sim_12 ● Sim_13 ● Sim_14 ▶

Risk & Performance Summary – AAPL/MSFT/TSLA Portfolio

This dashboard summarizes key financial risk indicators using historical portfolio returns, including Value at Risk, Conditional Value at Risk and return-adjusted ratios.

Historical VaR(95%)

-0.03

CVaR

-0.04

Max Drawdown

-0.45

Sharpe Ratio

0.03

Sortino Ratio

0.05

This dashboard summarizes key financial risk indicators using historical portfolio returns. It includes Value at Risk, Conditional Value at Risk, Maximum Drawdown, and risk-adjusted return metrics.
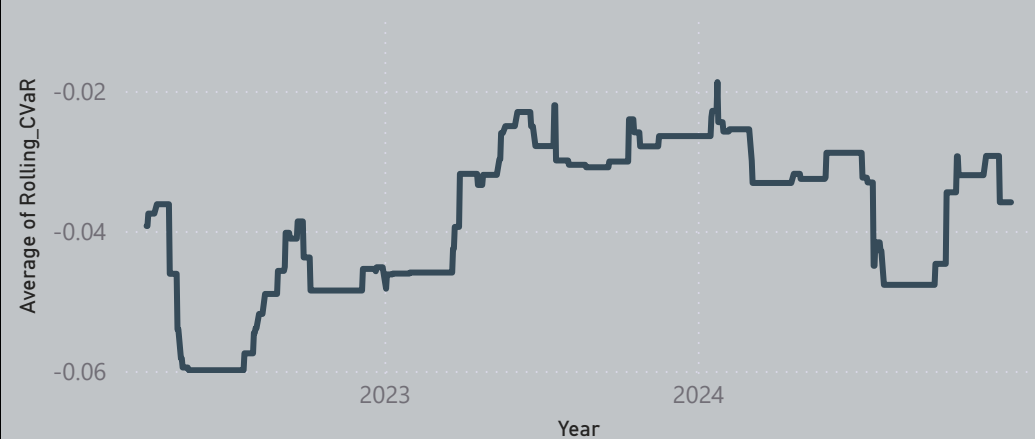
Interpretation:
The portfolio exhibits a 95% Value at Risk (VaR) of -3%, indicating that in 95% of cases, daily losses are expected to stay above -3%. The Conditional Value at Risk (CVaR) of -4% reflects the **average** loss on days when losses **exceed the VaR threshold**. The Sharpe and Sortino ratios suggest **low risk-adjusted performance**, and the maximum drawdown of -45% highlights the largest observed peak-to-trough decline during the analysis period.
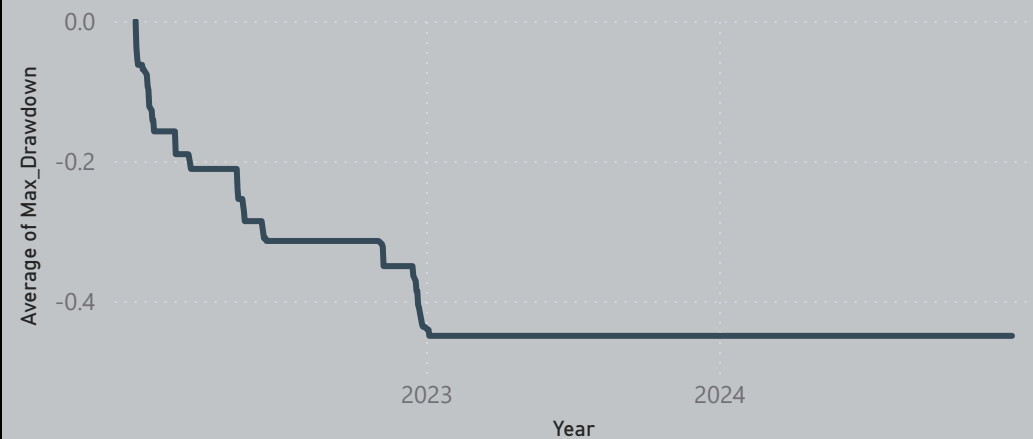
Rolling Risk Trends – CVaR and Drawdown Over Time

This section visualizes how Conditional Value at Risk (CVaR) and Maximum Drawdown evolved over time, highlighting periods of elevated downside risk and volatility in the AAPL/MSFT/TSLA portfolio.
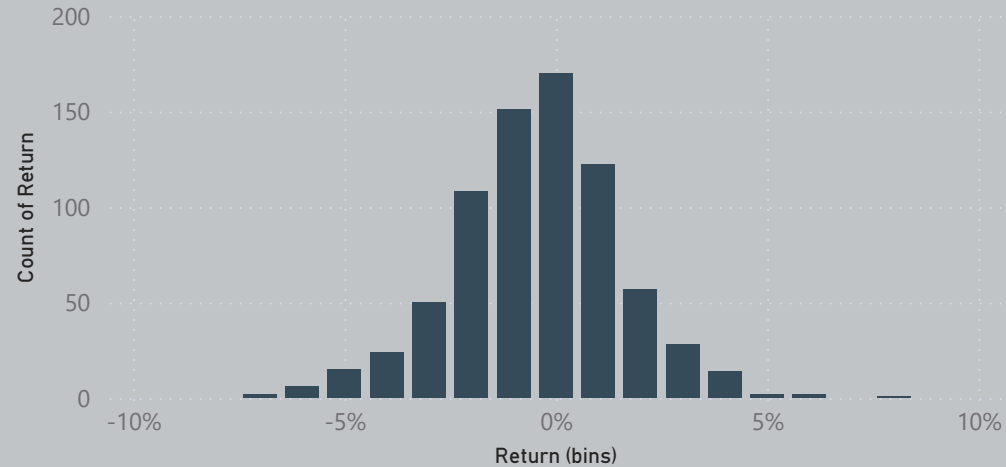

Interpretation:

From mid-2022 to 2024, the Conditional VaR (CVaR) shows periods of elevated downside risk, peaking around -6%. Meanwhile, the maximum drawdown deepened gradually to approximately -45%, indicating persistent historical losses in the portfolio over the same timeframe.
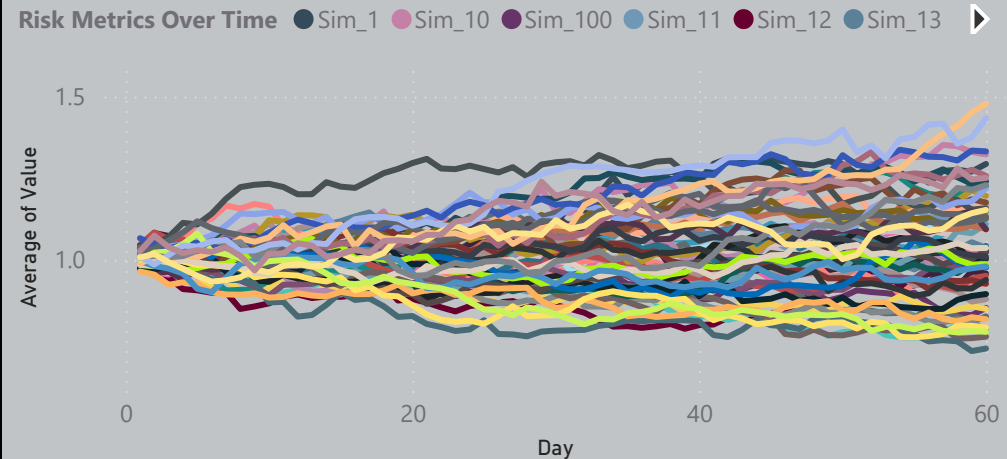
Return Distribution & Monte Carlo Simulation

Visualizes the distribution of daily returns and simulates possible future portfolio paths using historical volatility patterns.

Distribution of Daily Returns

Monte Carlo Simulated Portfolio Paths

Risk Metrics Over Time ● Sim_1 ● Sim_10 ● Sim_100 ● Sim_11 ● Sim_12 ● Sim_13 ▶

Interpretation:

The **Return Distribution** shows that daily portfolio returns are mostly centered around 0%, with fewer extreme gains or losses — indicating moderate day-to-day volatility.

The **Monte Carlo Simulation** illustrates 100 possible future paths based on historical return patterns. Most simulations stay within a predictable range, but some show significant gains or losses, highlighting potential risk and uncertainty.