

MNQ Range Expansion 96

Tier B - MNQ range-bar research candidate

TRADES

108

WIN

59.3%

NET R

+58.7R

PF

2.24

MAX DD

4.29R

Research Thesis

A compact MNQ range-bar candidate with high expectancy but a smaller sample, useful as a research shelf strategy rather than a current unattended automation pick.

Best Use Case

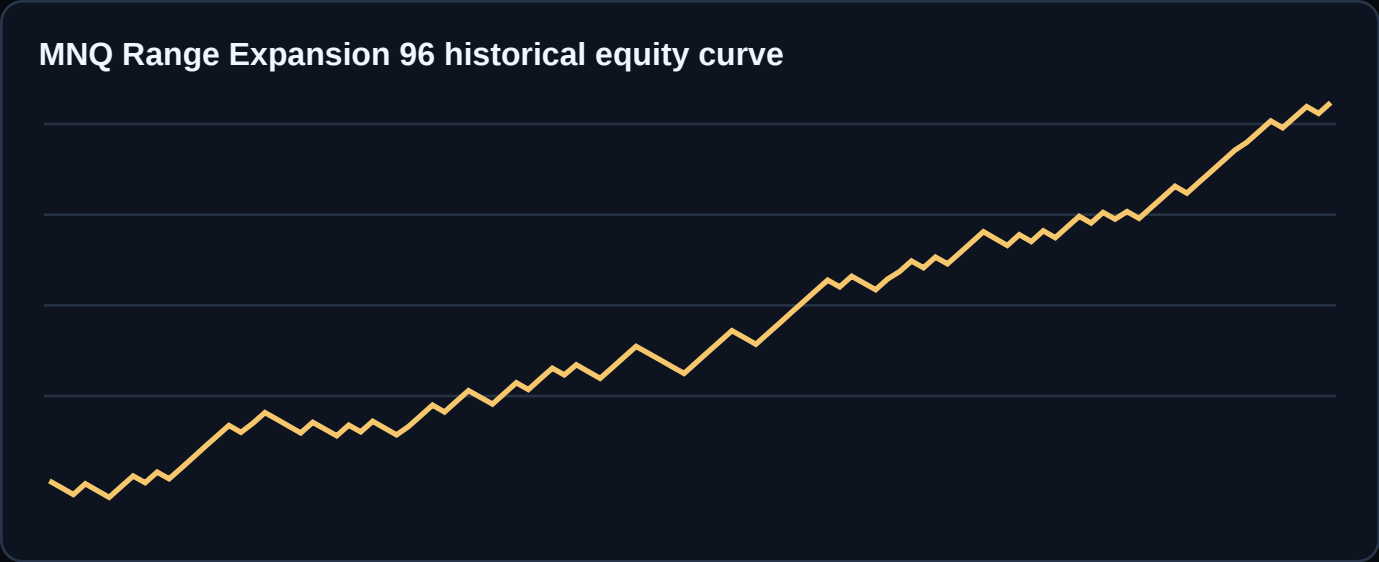
Best for discretionary study, signal confirmation, and platform translation testing.

Public Unlock Policy

Public PDF shows evidence and math. Exact entries, source code, and platform parameters stay locked until unlock.

Packet Section	What it gives the buyer
Evidence dashboard	Core stats, equity visualization, expectancy, drawdown, and sample size.
Prop-firm math	Modeled pass/fail windows, stress drawdown, and capital-buffer math.
Methodology	Data/replay assumptions, citations, and what the test does not prove.
Forward plan	Demo monitoring checklist, reject criteria, and journal fields.

Evidence Dashboard



Metric	Value	Why it matters
Trades	108	More trades reduce, but do not remove, overfit risk.
Win rate	59.3%	Useful for execution confidence and drawdown clustering.
Expectancy	0.54R	Average normalized return per closed signal.
Profit factor	2.24	Gross wins divided by gross losses.
Max drawdown	4.29R	Worst historical equity peak-to-valley in R.

Prop-Firm Related Math

This strategy is not currently labeled as a prop automation candidate. The sample is useful for discretionary research, but the public page does not publish pass/fail bootstraps yet.

Prop Caveats

Pass/fail odds are modeled from historical active-day resampling. They are not official prop-firm promises. Rule changes, daily loss limits, trailing drawdown definitions, consistency rules, payout rules, copy-trading limits, and execution latency can materially change the outcome.

Methodology and Sources

Step	What was tested
1. Historical replay	Closed-trade artifacts were generated from local futures replay exports and Databento historical pulls where available.
2. Normalized scoring	Trades were scored in R-multiples to compare signal quality across instruments and risk sizes.
3. Path stress	Equity curve, max drawdown, Monte Carlo paths, and active-day bootstrap estimates were produced from the closed-trade artifacts.
4. Prop model	\$350 risk/trade, \$6/trade commission proxy, \$3,000 target, \$2,000 drawdown-style floor, and consistency-aware pass through.

CME MES contract specs: <https://www.cmegroup.com/markets/equities/sp/micro-e-mini-sandp-500.contractSpecs.html>

CME MNQ contract specs: <https://www.cmegroup.com/markets/equities/nasdaq/micro-e-mini-nasdaq-100.contractSpecs.html>

Databento Historical API: <https://databento.com/docs/api-reference-historical>

Limitations

This brief is educational research, not financial advice. It is not a broker statement or audited live execution record. Results can fail in live trading due to slippage, commissions, missed fills, platform behavior, market-regime changes, contract-roll handling, news events, and user execution errors.

Forward-Test Checklist

Before any real-capital use: run at least one month on demo, compare every live signal to the historical logic, log rejected trades, cap daily loss, pause during abnormal volatility/news, and review weekly drift against the PDF evidence profile.

Forward-Test Operating Plan

Control	Rule of thumb for demo or prop evaluation
Minimum observation	20 trading days before considering any size increase; 40-60 sessions preferred for automation.
Daily risk stop	Stop taking new signals after the strategy is down about 1.5R-2.0R on the day, even if the historical model allowed more.
Weekly review	Compare live fill quality, missed signals, slippage, and win/loss clustering against the PDF evidence.
Prop-firm check	Confirm current automation, copy-trading, consistency, trailing drawdown, and payout rules before connecting any bot.
Kill switch	Pause after a new historical drawdown high, a platform mismatch, or a news/regime day that invalidates the signal context.

Journal Template

Field	Why it matters
Signal timestamp	Confirms live timing matches the historical replay assumptions.
Instrument/session	Separates MES, MNQ, open, midday, and late-session behavior.
Entry, stop, target	Audits execution quality without exposing locked strategy rules publicly.
Fill/slippage	Shows whether platform friction is eating the modeled expectancy.
Outcome in R	Keeps all strategies comparable across account sizes.
Screenshot note	Captures market structure, volatility, DOM/order-flow context, and mistakes.

Strategy Profile And Market Regime

This strategy is a futures scalping research model designed around repeatable intraday structure, defined risk, and post-trade R-multiple scoring.

Dimension	Operating Definition	Practical Use
Primary market	MNQ standalone failed-auction/range-bar research candidate.	Use the listed contract first; do not assume identical behavior on ES, NQ, CFDs, or synthetic symbols.
Execution chart	MNQ Range 8.	Signals should be confirmed on closed bars. Do not backfill intrabar signals after the fact.
Session profile	Range-bar intraday sample; use only during liquid index futures conditions.	Avoid expanding into overnight hours unless a separate replay proves the edge survives.
Best regime	Sharp failed auction with clean rejection and enough distance for 1.5R target.	Use the regime note to decide whether the signal is automation-grade or discretionary-only.
Worst regime	Thin overnight liquidity, chop around the trigger, or risk wider than 36 ticks.	A live bot should pause when market quality does not match the historical test profile.
Signal frequency	108 closed trades across n/a active dates where available.	Low-frequency strategies require patience; forcing extra trades usually damages edge.

Component Breakdown

Module	Historical Role	Observed Evidence
Single public model	Standalone research branch.	Component-level stats were not stored separately for this C-tier/public artifact.

Explicit Entry And Exit Parameters

These are the operating parameters to use when translating the research into a chart signal, discretionary checklist, or demo bot. They are intentionally written as execution rules, not as broker advice. For paid tiers, this page gives the trading blueprint; private source-code internals can still stay behind an unlock.

Parameter	Value / Rule	Execution Note
Instrument/chart	MNQ Range 8 for standalone Vector Vault Grid; MES blend variants use VVG as a filtered add-on.	Do not translate blindly to time charts without a separate replay.
Signal engine	FailedAuction model; threshold=94; cooldown=4; score_edge=90; alt_ticks=16; stretch=20; target_rr=1.5; min_rr=1.15; max_risk=36; confirm=3; horizon=24.	These values came from the VVG/prop-guard research artifacts.
Risk profile	Average standalone VVG risk was about 33.6 ticks in the stored diagnostics.	Risk must be converted to dollars using the current contract tick value.

Entry Checklist

Step	Required Condition	Reject If
1. Market is open and tradable	Session, symbol, contract, and chart template match the strategy sheet.	Contract roll, holiday liquidity, wrong time zone, or bad feed.
2. Closed-bar signal exists	Signal appears only after the bar closes and remains fixed in lookback.	Arrow appears/disappears intrabar or changes after reload.
3. Stop and target are known	Entry, stop, target, risk ticks, and target R are calculated before entry.	Any missing order field or manual guesswork.
4. Guardrails pass	Daily trade count, side sequence, daily loss, news filter, and account drawdown are all clear.	Daily stop already hit, high-impact news, or too many same-side signals.
5. Execution quality acceptable	Spread/latency are normal and order routing is stable.	Platform lag, data disconnect, widened spread, or DOM liquidity shock.

Exit, Stop, And Trade Management Rules

Exit Item	Rule	Reason
Hard stop	Exit at the defined stop. Do not widen.	The model is built around fixed R loss control.
Profit target	Exit at the defined target limit order or fixed R target.	Historical stats assume the modeled target, not discretionary extension.
Time stop	Exit when the horizon expires if neither stop nor target has filled.	A stale scalp becomes a different trade.
Daily stop	Stop trading the strategy after roughly -2R realized or when the strategy-specific daily stop is hit.	Protects prop accounts from one-day ruin.
Manual override	Only flatten for platform malfunction, news shock, data loss, or rule mismatch.	Discretionary overrides should reduce operational risk, not chase profit.

Order Placement Template

Order Field	Template Value	Notes
Entry	Closed-bar FailedAuction entry after threshold=94, score_edge=90, stretch=20, confirm=3.	Use market replay to verify whether limit orders underfill too often.
Stop	Stop beyond failed-auction extreme; max_risk=36.	For futures automation, stop should be server-side or broker-native where supported.
Target	1.5R target, minimum acceptable RR 1.15.	Do not manually widen target after entry.
Cancel rule	Cancel unfilled entry if the next bar invalidates signal context.	Prevents stale signals from filling after the edge is gone.
Time exit	Exit at horizon=24 bars if unresolved.	Time horizon is part of the model, not an optional convenience.

Trade Management Warning

The backtest assumes rule-consistent exits. Moving stops, taking early partials, holding past the horizon, or adding discretionary revenge trades creates a different strategy and invalidates the reported stats.

Automation Readiness And Bot Guardrails

This strategy should be demo-forward-tested before any live or prop-firm automation. It is not live-funded approval.

Guardrail	Default Setting	Why It Exists
One-signal-at-a-time	Do not open a second position while the prior signal is live.	Prevents accidental stacking and makes historical R math comparable to live execution.
Side sequencing	Require a new failed-auction context after each trade.	Reduces overtrading in chop and keeps the signal feed readable.
Daily max trades	Start with max 3 trades/day until larger forward sample exists.	Caps variance and prevents one bad regime from dominating the account.
Daily stop	Stop at -2R or after two consecutive losses.	Prop accounts are often killed by one uncontrolled day, not by long-run expectancy.
News filter	Disable around CPI, FOMC, NFP, rate decisions, and unscheduled high-impact shocks.	The replay does not prove edge during abnormal liquidity conditions.
Contract roll	Do not trade through roll distortion; verify continuous contract mapping.	Prevents false levels and bad tick-value assumptions.
Live-vs-model audit	Every live signal needs entry, stop, target, timestamp, and screenshot logged.	This is how we detect drift before capital damage.

Expanded Prop-Firm Math

The practical question is not only whether expectancy is positive. For prop firms, the strategy must also survive trailing drawdown, daily loss limits, minimum trading days, consistency rules, payout restrictions, automation policy, and the psychological pressure of small evaluation buffers.

Sizing Case	Approximate Meaning	Planning Interpretation
No prop bootstrap stored	This candidate has not been promoted to a prop-firm automation model.	Treat as educational/discretionary research only.
Minimum live buffer	Use at least 2x the modeled p95 drawdown, plus room for commissions and platform mistakes.	Small accounts should scale down first; compounding only matters after survival.
Evaluation pacing	Do not force daily trades. Let signal frequency define the calendar.	Most prop failures come from impatience, not lack of strategy ideas.
Pass readiness	Research shelf candidate; not prop autopilot yet because sample is smaller.	A backtest can earn the right to a demo; demo earns the right to capital.

Validation Notes And Overfit Controls

Control	How This Packet Treats It	What Still Needs Work
Sample size	108 closed trades where available.	More recent forward trades are still needed because historical data cannot prove future fill quality.
Regime split	Window shown: n/a to n/a.	Add explicit walk-forward partitions before selling automation as final.
Metric stack	Uses win rate, expectancy, profit factor, drawdown, active-day stats, and prop bootstraps when stored.	No single metric should be used alone.
Independence	Blended strategies combine modules with different context rather than loosening one signal until it overtrades.	Measure correlation between modules during forward testing.
Execution realism	Reports are historical replay artifacts, not audited live broker fills.	Live slippage, commissions, queue position, and partial fills must be logged.
No repainting	Signal use should be closed-bar only.	Any platform implementation must prove it does not move historical arrows after bar close.

Buyer / User Due Diligence Checklist

Before using or buying any implementation, confirm the exact symbol, tick value, chart type, session template, time zone, commission model, and risk unit. Then replay at least 20 historical signals manually and compare them to the PDF rules.