

## **Insider-Buy Momentum Strategy: Key Criteria**

- **Trigger:** Buy at the next market open any stock with one or more **insider** *Form* **4 purchase filings** reported *after market close* the prior day. (Trade is entered within the first few minutes of the session, and exited before the close.)
- Volume & Liquidity: Target *mid-cap to large-cap* stocks. For example, require daily average volume ≈\$30M+, avoiding ultra-low-volume issues. WSV uses ~\$30M-\$100M for earnings-season trades (up to \$10B in year-round variant). Very high-dollar-volume stocks (>\$100M) should pass a market filter (see SPY Filter below).
- **Price Movement (ATR):** Require sufficient volatility for momentum. WSV suggests **ATR** ≥3.5% (of price) during earnings season. For year-round, use **ATR 7–20%**. (Avoid tiny moves that yield no profit.)
- Market Condition (SPY filter): Use a broad market filter for high-dollar trades. If SPY (S&P 500 ETF) opens with a *large gap* (>±0.5%), **skip high-volume insider trades**. If SPY is flat (±0.5%), trades proceed normally. This avoids being caught in market-wide volatility.
- Earnings Season: Favor trades during earnings seasons (February, May, August, November) when insider buying spikes. During these months, use **Variant 1 rules** (ATR 3.5%+, volume \$30M-\$100M, 50% ATR stop loss, 100% ATR take profit). Outside earnings season, apply **Variant 2** (year-round; looser volume, higher ATR, no preset TP, exit at close).
- **Multi-Insider Events:** A cluster of buys by multiple insiders (e.g. CEO **and** CFO **and** others, same day) is an exceptionally strong signal. These rare events ("multiple insider buys same day") historically produce higher momentum and lower risk. If ≥2 *insiders* file purchases same day, flag as **High-Conviction** trade (consider overweighting or "score boost").
- Repeat vs. First-Time Buys: Only trade first-time buys. If an insider has already reported a buy in the past 30 days ("repeat buy"), ignore it. Research shows repeat purchases are unpredictable and often weaker signals. By contrast, a first insider purchase after ≥30 days is "fresh momentum."
- Trade Type (Form 4 specifics): Only count open-market purchases (Form 4 Transaction Code "P"). Exclude option exercises, gifts or trades under pre-set plans. *Skip* insider trades coded as stock option exercises ("M"), grants ("G"), or executed under 10b5-1 plans. (These are often routine or tax-driven rather than information-driven.) Only true **market buys** should trigger signals.
- **Direct vs. Indirect Ownership:** In Form 4, note if the purchase is **direct** (insider's own account) or **indirect** (through trust/spouse). Empirical research indicates *indirect* purchases may be more information-driven. For a simple rule, **give extra weight to indirect buys** (e.g. family trust), as direct buys can be partly liquidity-driven.

- Insider Role: Prioritize higher-confidence roles. Studies find CFO purchases often outperform CEO purchases in predicting future returns. In practice, any C-level or director buy is a signal, but one might score it: e.g. CFO/COO buy = +2, CEO/President = +1, director = +0 (or similar). (Also consider 10%-owners/trustees, though these may be institutional accounts.)
- **Transaction Size:** Favor substantial buys. A larger insider purchase (in \$ or as % of insider's holdings) indicates stronger confidence. For example, require  $$value \ge X$$  (e.g. \$50k-\$100k) or filter tiny trades. Literature suggests *sales small relative to holdings* can even correlate with positive future returns, underscoring that **size matters**. In practice, filter out trivial trade sizes that are likely diversification or exercise sales.
- **Sector/Market Context:** Consider industry trends. (E.g., insiders in beaten-down sectors like energy may buy for recovery; heavy retail sectors may see more selling.) Also avoid trades in highly speculative "lottery" stocks recent evidence shows insiders in such stocks often game hype. When possible, exclude penny/microcaps or stocks with extremely high retail volatility.
- **Signal Freshness (Delay Decay):** Act quickly. Empirical studies find most of the price reaction occurs rapidly after the news. Backtests show *shorter holding periods yield higher returns* waiting longer erodes edge. In other words, execute on day+1 (or intraday) signals **decay within minutes to days**.
- **Stop Loss / Exit Rules:** Always use discipline. WSV sets stop losses of –50% ATR and take-profits at +100% ATR during earnings-season trading, and looser (–150% ATR, exit at close) off-season. While specifics depend on risk tolerance, always cap losses and have a clear exit (before market close) to avoid overnight risk.

## **Additional Signal Factors**

- Overreaction and Liquidity: Insider signals are strongest in *smaller, less-liquid stocks*. Studies note returns from trading on insider buys are negatively correlated with liquidity. Thus, mid-cap (where WSV focuses) may be ideal; avoid ultra-large, highly efficient stocks where the move is already absorbed.
- Macro Sentiment: Avoid trading if the overall market is extremely risk-off. Beyond SPY gap filtering, one can skip trades on days with e.g. VIX spikes or sell-off news. Insider signals assume some rational reaction during panic, any buy might get overwhelmed.
- **Valuation/Mispricing:** Some research suggests insiders trade on mispricing: they tend to buy undervalued firms for longer-term gains 1 2. For short-term momentum, this implies **opportunistic purchases** (not routine ones) are best. If a buy coincides with a suspected rebound (e.g. stock grossly oversold, or low composite share issuance), it's stronger 3.
- **Control Variables:** Whenever possible, adjust for known biases. For example, exclude pre-scheduled plan buys, or trades by affiliated funds. Check if insider already holds a large stake (heavily-owned firms might not move).

## **Conditional Framework**

Combine the above into a scoring/decision rule. For example:

Criterion	Weight/Action
Insider Buy Event	<b>Yes</b> → consider trade; <b>No</b> → ignore
First-Time in 30d	+1 if yes; 0 or skip if repeat (exclude)
Insider Role	+2 if CFO/COO, +1 if CEO/President, +0 if director
Multiple Insiders	+2 if ≥2 insiders buy same day
Transaction Type	+1 if "P" (open-market buy); exclude otherwise
Direct vs Indirect	+1 if indirect account
Trade Size	+1 if large (e.g. >\$100k or >0.5% float)
Stock Volume Range	+1 if daily vol \$30M-\$100M (earnings season) or \$30M-\$10B (off-season)
Stock ATR	+1 if ATR ≥3.5% (earnings) or 7–20% (year-round)
Earnings Season	+1 if in Feb/May/Aug/Nov
SPY Gap Filter	+0 if SPY open ±0.5% (ok); skip trade if gap >±0.5%
Recent Price Spike	+1 if stock hasn't already spiked (avoid buying at peak)
Signal Freshness	execute next open (do not delay); required
Total Score	<b>High</b> (e.g. ≥5): <b>execute</b> trade; <b>Low</b> : ignore

## A practical **logic tree** might be:

- 1. New Insider Buy? (Form 4 purchase reported) otherwise do nothing.
- 2. **Repeat Buy?** if yes, *ignore*.
- 3. **Insider Role** note position (CFO > CEO > others).
- 4. Purchase Code confirm open-market buy (exclude options/grants).
- 5. Calculate Score: evaluate Stock ATR, Volume, Market/SPY, Earnings season, #Insiders, etc.
- 6. **Decision:** If all filters passed and score high, **buy at open**. Else **skip**.
- 7. **Risk Controls:** place stop/take-profit per ATR rules, exit before close.

This scoring emphasizes *quantifiable filters* so an automated bot can apply them easily. Each condition is objective (e.g., "insider is CFO", "stock ATR > threshold", "SPY open flat"), making the strategy machine-implementable.

**Sources:** These criteria synthesize WSV's trading system with academic and practitioner research (e.g. CFO vs. CEO returns, direct vs. indirect trades, liquidity effects, insider signal decay). Together they form a robust filter-based framework for short-term trades on insider buy disclosures.

1 2 3 Insider Trading: Does it increase Market Efficiency?

https://alphaarchitect.com/insider-trading-increases-market-efficiency/