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Macro Economic Activity and Sector Price Movements: A Closer Look at PMI Data

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Study Objective:
Determine if S&P Sector prices covary directly with the PMI New Orders index.

Research Approach:
- Univariate Regression Analysis
- Time Period: 2004-2013
- Date Frequency: Monthly
- Data Sets:
  - PMI new orders index
  - 10 S&P Sector ETF’s
  - S&P (SPY)

Model Specification:
- $\ln(SC_{it}) = A + B \times \ln(NO_t)$
- Where $SC_{it}$ = ith S&P Sector Price at time t
- $A$ = Intercept
- $B$ = regression Coefficient
- $NO_t$ = New Orders at time t
- $i$ = 1-10 S&P Sector ETF’s
- $t$ = monthly Time Intervals From 2004-2013

Hypothesis:
$B > 1$, $Tstat > 2$

Finding:
04-08: XLI, XLB, XLU and IZY had $B$ coefficients $>1$
08-14: All $B$ coefficients $>1$
04-14: All sectors except XLF and IYZ had $B$ coefficients $>1$
SPY: B coefficient after, 08 recession quite strong. Monetary policy a likely factor.

Conclusion: New orders are reliable predictors of sector price movements. The $B$ coefficients are time variant.