



May 2019

U.S. Equipment & Software Investment Momentum Monitor



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About the U.S. Equipment & Software Investment Momentum Monitor

Business leaders require actionable forward-looking intelligence to make decisions. Accordingly, the Equipment Leasing & Finance Foundation commissioned Keybridge LLC to develop a series of custom leading indicators for the equipment sector. Published monthly, the "U.S. Equipment & Software Investment Momentum Monitor" consists of indices for the 12 equipment and software investment verticals listed below. These indices are designed to identify turning points in their respective investment cycles with a 3 to 6 month lead time.

The Momentum Monitor is based on Keybridge's extensive research which shows that not all movements in economic data are reliable signals of future economic trends. Keybridge has operationalized its research by constructing indices, each comprised of between 10 to 20 highfrequency indicators. These indicators undergo rigorous testing to determine the optimal thresholds at which their short-term fluctuations are economically meaningful. In simpler terms, the Momentum Monitor sifts out the "noise" in the data and identifies the dominant trends. As a result, each Momentum Monitor index is statistically optimized to signal turning points in the investment cycle without giving false readings of shifts in momentum.

The Momentum Monitor covers 12 equipment and software verticals as defined by the U.S. Department of Commerce Bureau of Economic Analysis.

U.S. Equipment & Software Investment Momentum Monitor - 12 Verticals

- 1) Agriculture Machinery
- 2) Construction Machinery
- 3) Materials Handling Equipment
- 4) All Other industrial Equipment
- 5) Medical Equipment
- 6) Mining & Oilfield Machinery

- Aircraft
- Ships and Boats 8)
- 9) Railroad Equipment
- 10) Trucks
- 11) Computers
- 12) Software



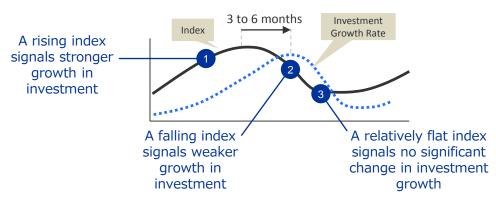


How to Read the Monitor

Each Momentum Monitor index provides a signal of the direction and magnitude of growth in equipment investment over the next 3 to 6 months. It is important to note that index values do not correspond to particular growth rates. Instead, the Momentum Monitor indices should be interpreted within the context of prior index readings and investment growth rates. example, there are several simple rules to follow when examining the latest index values:

- 1) A rising index signals that growth in investment will accelerate from the current rate;
- 2) A falling index signals that growth in investment will decelerate from the current rate; and
- 3) No change in the index signals no meaningful change from the current growth rate.

Momentum Monitor Signals



To help the reader interpret the latest Momentum Monitor signals, a summary report for each equipment vertical follows a specific outline:

Materials Handling Equipment:

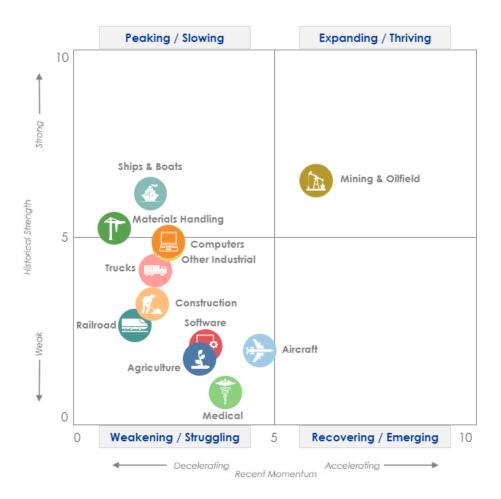
- 1 Investment in Materials Handling Machinery inched up at a 0.3% annualized rate in Q4 2014 and is up 7.3% year-over-year. 2 The Materials Handling Momentum Index slipped from 93.5 in February to 92.5 in March. 3 A 23% decline in the MNI-Chicago Business Barometer and a spike in Economic Policy Uncertainty offset gains in Machinery Sales, Manufacturing Sales, and the ISM Manufacturing Suppliers Deliveries Index.
- 4 The Index's recent trend continues to indicate that growth may moderate over the next three to six months.
- 1) The first sentence reports the latest growth rate for investment in a given vertical. This provides a context for interpreting the order of magnitude of growth over the next 3 to 6 months.
- 2) The second sentence explains the latest movement in the index, indicating whether momentum is accelerating or decelerating.
- 3) The report then describes the recent movements of one or more indicators to help to explain the index's latest reading.
- 4) Finally, report ends the interpretation of where investment growth is heading over the next 3 to 6 months based the index's recent movement and historical strength.





U.S. Equipment & Software Investment Momentum Monitor May 2019

Momentum Monitor Sector Matrix



The matrix above summarizes the current values of each of the 12 Equipment & Software Investment Momentum Indices based on two factors: Recent Momentum (x-axis) and Historical Strength (y-axis):

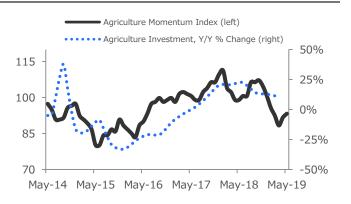
- "Recent Momentum" represents the degree of an indicator's recent acceleration or deceleration in the past month relative to its average movement during the previous 3 months. Ratings closer to "0" represent an indicator that is rapidly decelerating, while ratings closer to "10" represent an indicator that is rapidly accelerating.
- "Historical Strength" represents the strength or weakness of an indicator in the past month relative to its typical level since 1999.
 Ratings closer to "0" represent an indicator that is weaker than average, while ratings closer to "10" represent an indicator that is stronger than average.

The matrix is comprised of four quadrants according to each vertical's recent momentum and historical strength readings. If a vertical is located in the top-left quadrant, its momentum reading is higher than average, but positive movement has slowed (and perhaps reversed) in recent months — suggesting that investment levels may fall over the next 1-2 quarters. Verticals located in the bottom-right quadrant, however, have momentum readings that are below average, but recent movement shows promise — suggesting that investment levels may rise over the next 1-2 quarters. This makes them potentially attractive targets for new short-term leasing and finance opportunities.



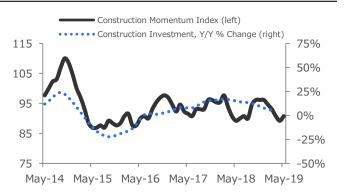
Agriculture Machinery:

Investment in Agricultural Machinery dropped 8.4% (annualized) in Q1 2019 but is up 10% from one year ago. The Agriculture Momentum Index increased from 91.6 (revised) in April to 93.3 in May. The Agricultural Price Index for All Crops rose 2.1% in March, while Soybean Futures declined 4.9% in April. Overall, despite recent increases, the Index points to slower growth in agricultural machinery investment over the next three to six months.



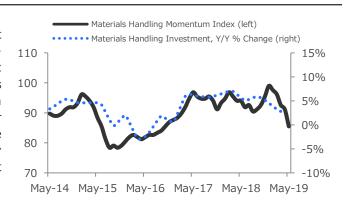
Construction Machinery:

Investment in Construction Machinery increased at a 7.3% annualized rate in Q1 2019 and is up 4.6% year-over-year. The Construction Momentum Index rose from 89.2 (revised) in April to 90.8 in May. In March, New Houses For Sale Under Construction decreased 6%, (its sharpest decline in 7.5 years), but New Privately-Owned Houses increased 12%. Overall, the Index continues to suggest weak growth in construction machinery investment over the next three to six months.



Materials Handling Equipment:

Investment in Materials Handling Equipment increased at a 2.4% annualized rate in Q1 2019 and is up 4.8% year-over-year. The Materials Handling Momentum Index dropped from 91.2 (revised) in April to 85.5 in May, its lowest level since October 2016. Industrial Production declined 0.1% in March, while Unfilled Orders for Materials Handling Equipment dropped 1.4%. Overall, the Index points to further weakening and potentially negative growth in materials handling equipment investment over the next two quarters.



Other Industrial Equipment:

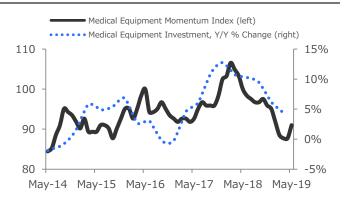
Investment in All Other Industrial Equipment edged up at a 0.6% annualized rate in Q1 2019 and is up 3.4% from a year ago. The Other Industrial Equipment Momentum Index decreased from 88.1 (revised) in April to 85.3 in May, its lowest level in nearly three years. Capacity Utilization for Electrical Equipment Manufacturing declined 0.2 point to 74.5 in March, while the ISM Manufacturing PMI fell 2.5 points to 52.8 in April. Overall, the Index continues to suggest weak and potentially stalled growth in other industrial equipment investment over the next three to six months.





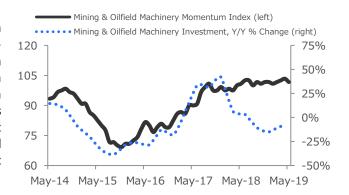
Medical Equipment:

Investment in Medical Equipment decreased at a 1.9% annualized rate in Q1 2019 but is up 4.4% year-over-year. The Medical Equipment Momentum Index increased from 87.7 in April to 91.0 in May. Private Hospital Construction Spending rose 2.1% in March, its fourth consecutive increase, while the S&P 500 Health Care Index rose 2.7% in April. Overall, the Index points to sluggish growth in medical equipment investment over the next two quarters, though this month's reading could represent the early signs of an investment rebound in late 2019.



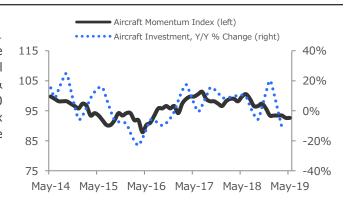
Mining & Oilfield Machinery:

Investment in Mining & Oilfield Machinery dropped at a 16% annualized rate in Q1 2019 and is down 9.2% year-over-year. The Mining & Oilfield Machinery Momentum Index declined from 103.3 (revised) in April to 101.7 in May. Industrial Production for Natural Gas Distribution increased 3.8% in March, but the Bloomberg Natural Gas Sub-Index dropped 5.2% in April. Overall, the Index continues to suggest improving mining & oilfield machinery investment growth over the next three to six months.



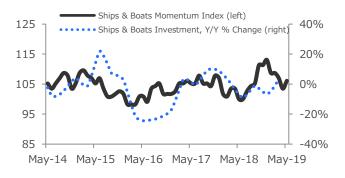
Aircraft:

Investment in Aircraft declined 47% (annualized) in Q1 2019 and is down 11% on a year-over-year basis. The Aircraft Momentum Index held steady at 92.6 from April (revised) to May. Shipments of Non-Defense Aircraft & Parts decreased 0.5% in December, while the S&P 500 Volatility Index dropped 4.3% in April. Overall, the Index points to weak growth in aircraft investment over the next two quarters.



Ships & Boats:

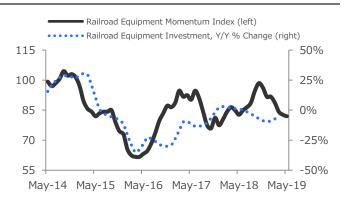
Investment in Ships & Boats increased at an annualized rate of 22% in Q1 2019 and rose 3.7% year-over-year. The Ships & Boats Momentum Index increased from 103.5 (revised) in April to 106.1 in May. In March, Inventories of Ships and Boats rose 7.8%, while Houston Shipping Container Traffic surged 41%, its fastest growth in eight years. Overall, despite this month's increase, the Index continues to suggest weaker growth in ships and boats investment over the next three to six months.





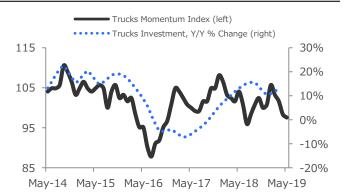
Railroad Equipment:

Investment in Railroad Equipment increased at a 23% annualized rate in Q1 2019 but is down 4.9% year-over-year. The Railroad Equipment Momentum Index ticked down from 82.7 (revised) in April to 82.0 in May. Industrial Production for Railroad Rolling Stock decreased 1.3% in March, and Rail Transportation Employees fell 0.3% in April. Overall, the Index points to continued weakness in railroad equipment investment growth over the next three to six months.



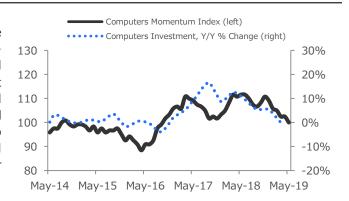
Trucks:

Investment in Trucks rose at a 23% annualized rate in Q1 2019 and is up 13% from year-ago levels. The Trucks Momentum Index decreased from 98.4 (revised) in April to 97.6 in May. In March, Coal Production fell 4.5%, while Industrial Production for Motor Vehicles & Parts decreased 2.5%, its sixth decline in the past year. Overall, the Index continues to point to softening growth in trucks investment over the next three to six months.



Computers:

Investment in Computers increased at an annualized rate of 3.9% in Q1 2019 and is essentially unchanged year-over-year. The Computers Momentum Index decreased from 102.5 (revised) in April to 100.0 in May, its lowest level since September 2016. Computer Exports declined 2.9% in February, and New Orders for Electromedical Products decreased 2.5% in March, its steepest drop since April 2015. Overall, the Index points to weak and potentially negative growth in computers investment over the next two quarters.



Software:

Investment in Software increased at a 13% annualized rate in Q1 2019 and is up 11% year-over-year. The Software Momentum Index rose from 92.6 (revised) in April to 94.2 in May. Microsoft's Market Cap rose 11% in April, but Shipments of Computers & Related Products declined 5.2% in April. Overall, despite improving this month, the Index points to weaker growth in software investment over the next two quarters.

