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 strategic 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 an approximate 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 10–20 high-frequency 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 7) Aircraft
2) Construction Machinery 8) Ships and Boats
3) Materials Handling Equipment 9) Railroad Equipment
4) All Other industrial Equipment 10) Trucks
5) Medical Equipment 11) Computers
6) Mining & Oilfield Machinery 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 six 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. For 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

A rising index signals stronger growth in investment

~6 months

Investment Growth Rate

A falling index signals weaker growth in investment

A relatively flat index signals no significant change in investment growth

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. 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. The Index’s recent trend continues to indicate that growth may moderate over the next 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 six 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, the report ends with an interpretation of where investment growth is heading over the next six months based on the index’s recent movement and historical strength.
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 two 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 two quarters. This makes them potentially attractive targets for new short-term leasing and finance opportunities.
**Agriculture Machinery:**
Investment in Agricultural Machinery dropped 39% (annualized) in Q2 2020 and is down 16% from one year ago. The Agriculture Momentum Index improved from 87.3 (revised) to 89.6 in September. Exports of Poultry Broilers pulled back 7.0% in June, while Lamb & Mutton Production decreased 3.2% in July. Overall, the Index continues to point to a modest to moderate contraction in agricultural machinery investment over the next six months.

**Construction Machinery:**
Investment in Construction Machinery declined 44% (annualized) in Q2 2020 and is down 27% year-over-year. The Construction Momentum Index ticked up from 83.3 (revised) in August to 84.4 in September, its second consecutive monthly gain after hitting the lowest level in over a decade in July. Public Construction Spending eased 1.3% in July, while the Conference Board Consumer Confidence Index dropped 12% in August. Overall, the Index points to a continued contraction in construction machinery investment over the next 1–2 quarters, but recent movement is encouraging.

**Materials Handling Equipment:**
Investment in Materials Handling Equipment declined at a 13% annualized rate in Q2 2020 and is down 7.3% year-over-year. The Materials Handling Momentum Index jumped from 64.2 (revised) in August to 71.1 in September. In July, Unfilled Orders for Materials Handling Equipment eased 0.6%, and Materials Handling Equipment Manufacturers’ Wages slipped 3.3%. Overall, the Index suggests continued negative growth in materials handling equipment investment over the next six months, but this month’s sharp improvement is notable.

**Other Industrial Equipment:**
Investment in All Other Industrial Equipment contracted at a 28% annualized rate in Q2 2020 and dropped 11% from a year ago. The Other Industrial Equipment Momentum Index increased from 79.4 in August to 85.7 in September, though remains historically low. The Merchant Wholesale Industries Inventory-Sales Ratio decreased 7.9% in June, and Inventories of Machinery slipped 0.7% in July. Overall, the Index points to continued negativity in other industrial equipment investment growth over the next 1–2 quarters, but recent movement is encouraging.
**Medical Equipment:**
Investment in Medical Equipment grew 15% (annualized) in Q2 2020 and improved 2.6% year-over-year. The Medical Equipment Momentum Index increased from 84.0 (revised) in August to 88.5 in September. Consumer Prices for Physician’s Services inched up 0.7% in July, and Cardinal Health’s Market Cap dropped 7.1% in August. Overall, the Index points to modest growth in medical equipment investment over the next six months.

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**Mining & Oilfield Machinery:**
Investment in Mining & Oilfield Machinery pulled back at a 55% annualized rate in Q2 2020 and fell 13% compared to a year ago. The Mining & Oilfield Machinery Momentum Index improved from 63.3 (revised) in August to 66.4 in September, though it remains in a weak position. Mining, Oil, and Gas Field Machinery Industrial Production declined 6.2% in July, while Oil & Gas Extraction Employment decreased 0.7% in August. Overall, the Index suggests continued negative growth in mining & oilfield investment growth over the next six months, despite this month’s improvement.

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**Aircraft:**
Investment in Aircraft plummeted 99% (annualized) in Q2 2020 and is 72% below year-ago levels. The Aircraft Momentum Index improved slightly from 96.5 in August to 98.2 in September. In July, Aerospace Exports to Canada collapsed 50%, and the Civilian Aircraft Exports plummeted 32%. Overall, the Index points to continued negative growth in aircraft investment over the next six months.

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**Ships & Boats:**
Investment in Ships & Boats fell sharply at an annualized rate of 64% in Q2 2020 and is down 21% year-over-year. The Ships & Boats Momentum Index improved from 98.1 (revised) in August to 102.8 in September. In July, Ships & Boats Shipments improved 8.1%, but the Emerging Market Economies Currency Index eased 1.8%. Overall, the Index points to continued negative growth in ships and boats investment in the coming 1–2 quarters, though recent movement in the index is encouraging and could signal improved investment in early 2021.
Railroad Equipment:
Investment in Railroad Equipment dropped 34% (annualized) in Q2 2020 but is up 5.6% year-over-year. The Railroad Equipment Momentum Index increased from 66.6 (revised) in August to 71.2 in September. Producer Price Index of Rail Transportation eased 0.2% in July, and Rail Carloads of Farm & Food Products Excluding Grain fell 2.1% in August. Overall, the Index continues to suggest weakening growth in railroad equipment investment over the next two quarters, despite this month’s improvement.

Trucks:
Investment in Trucks collapsed at an 82% annualized rate in Q2 2020 and is down 41% from year-ago levels. The Trucks Momentum Index jumped from 80.7 (revised) in August to 93.3 in September. In July, Industrial Production of Light Trucks surged 45%, however, Manufacturers’ Inventories of Light Trucks & Utility Vehicles fell 1.3%. Overall, the Index points to improvement in trucks investment growth over the next two quarters.

Computers:
Investment in Computers surged 83% (annualized) in Q2 2020 and is up 12% year-over-year. The Computers Momentum Index ticked up from 108.5 (revised) in August to 108.8 in September. In July, Capacity Utilization for Computer & Electronic Product Manufacturing inched up 0.3 point to 71.1%, but New Orders of Defense Search & Navigation Equipment fell 2.1% in July. Overall, the Index suggests that computers investment growth should remain solidly positive over the next six months.

Software:
Investment in Software eased 3.2% (annualized) in Q2 2020 but is up 5.7% year-over-year. The Software Momentum Index improved from 90.9 (revised) in August to 94.3 in September. Revolving Consumer Credit Outstanding slipped 0.3% in June, but the NFIB Interest Rate Paid on Short-Term Loans rose 0.7 point to 4.8%. The Index points to continued growth in software investment over the next two quarters.