



## 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 between 10 to 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.

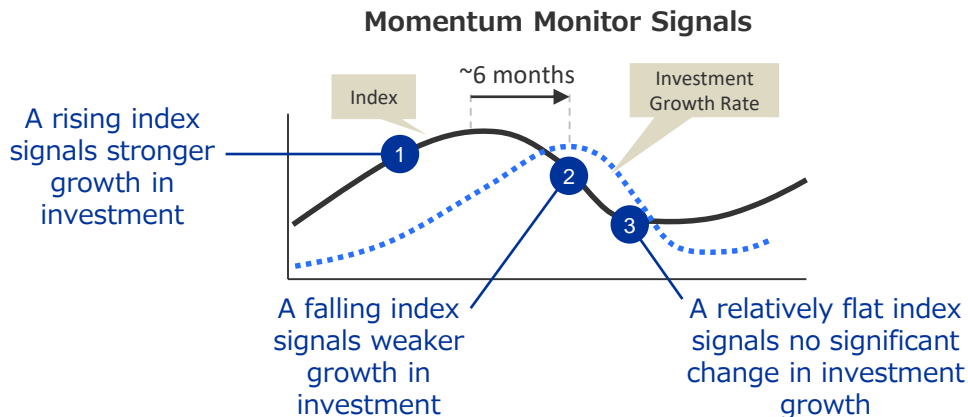
## U.S. Equipment & Software Investment Momentum Monitor – 12 Verticals

- |                                   |                       |
|-----------------------------------|-----------------------|
| 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.



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

### Materials Handling Equipment:

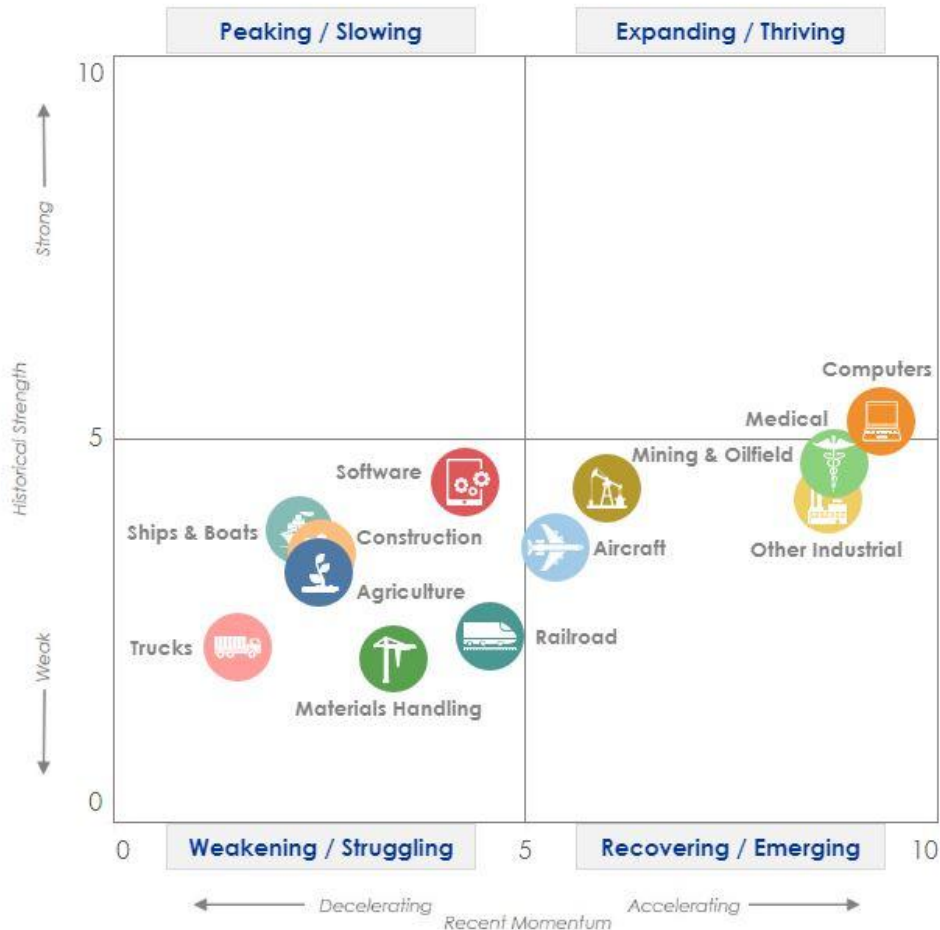
- 1 Investment in Materials Handling Machinery inched up at a 0.3% annualized rate in Q4 2014 and is up 7.3% year-over-year.
- 2 The Materials Handling Momentum Index slipped from 93.5 in February to 92.5 in March.
- 3 A 23% decline in the MNI-Chicago Business Barometer and a spike in Economic Policy 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 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 the index's recent movement and historical strength.

# U.S. Equipment & Software Investment Momentum Monitor

## March 2020

### Momentum Monitor Sector Matrix



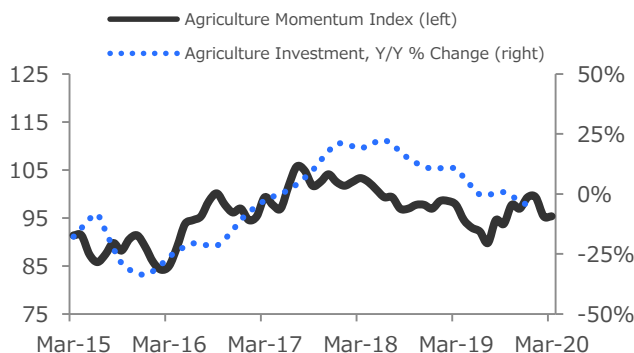
The matrix above summarizes the current values of each of the 12 Equipment & Software Investment Momentum Indices based on two factors: Recent Momentum (x-axis) and Historical Strength (y-axis):

- **"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 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.

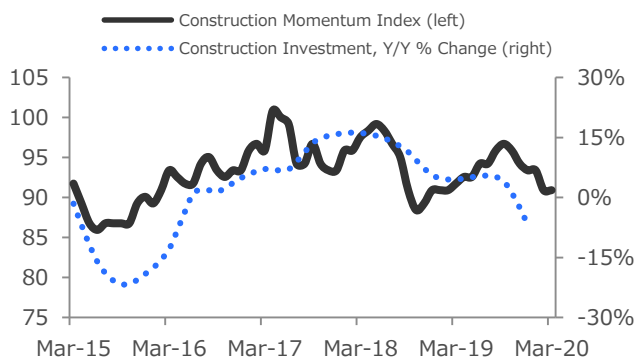
**Agriculture Machinery:**

Investment in Agricultural Machinery decreased 6.8% (annualized) in Q4 2019 and is down 4.8% from one year ago. The Agriculture Momentum Index held at 95.3 from February to March. In December, Exports of Poultry Broilers dropped 8.7%, while Unmanufactured Tobacco Exports pulled back 12%. Overall, the Index points to continued weakness in agricultural machinery investment growth over the next six months.



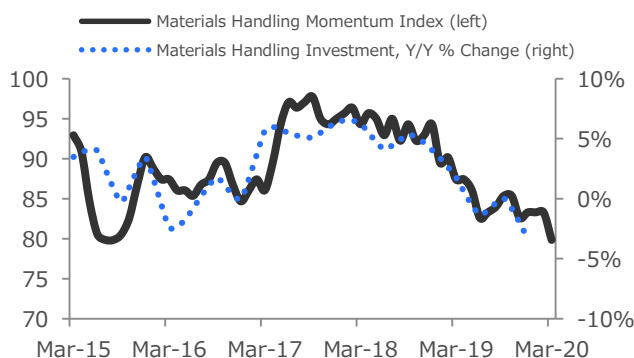
**Construction Machinery:**

Investment in Construction Machinery dropped at a sharp 37% annualized rate in Q4 2019 and is down 7.0% year-over-year. The Construction Momentum Index held steady at 90.9 from February to March, matching the lowest level in a year. New Privately-Owned Homes Under Construction increased 1.3% in January, and the Conference Board Consumer Confidence Index declined 5.1% in February. Overall, the Index suggests that investment growth in construction machinery is likely to remain negative over the next six months.



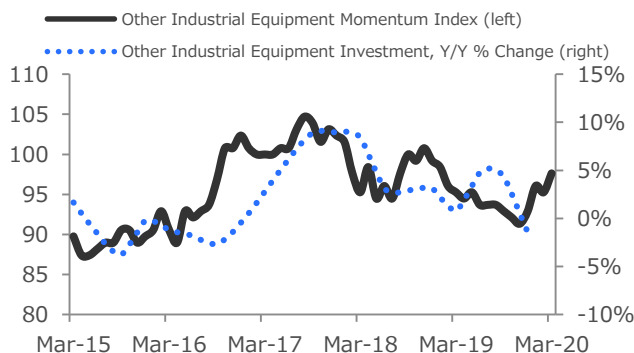
**Materials Handling Equipment:**

Investment in Materials Handling Equipment fell at an 11% annualized rate in Q4 2019 and dropped 3.4% year-over-year. The Materials Handling Momentum Index fell from 83.3 in February to 79.9 in March, a multi-year low. In December, Inventories of Materials Handling Equipment fell 7.2%, while Materials Handling Equipment Exports dropped 9.7%. Overall, the Index points to continued negative growth in materials handling equipment investment growth over the next six months.



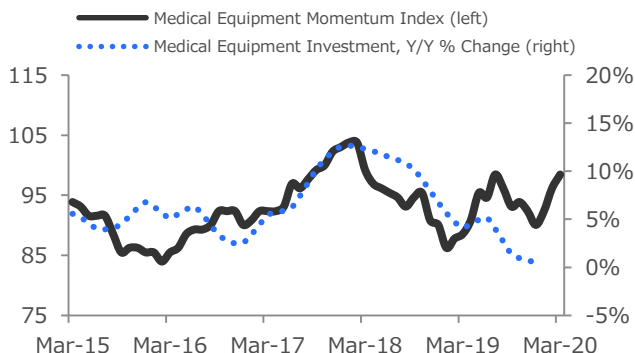
**Other Industrial Equipment:**

Investment in All Other Industrial Equipment fell at a 13% annualized rate in Q4 2019 and eased 1.5% from a year ago. The Other Industrial Equipment Momentum Index improved from 95.3 in February 97.6 in March. Nonfarm Payrolls inched up 0.1% in January, while Terex Market Cap dropped 14% in February, the second consecutive double-digit decline. Overall, the Index points to modest turnaround in other industrial equipment investment growth over the next two quarters.



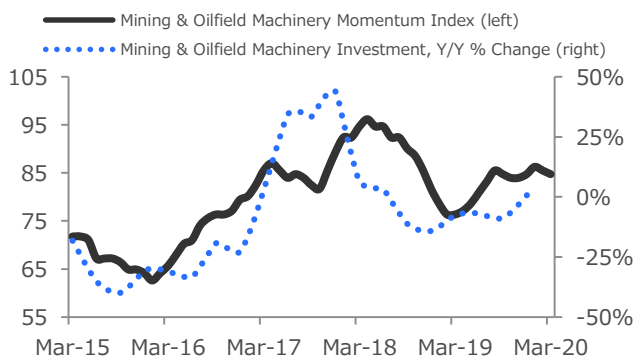
**Medical Equipment:**

Investment in Medical Equipment fell at a 2.3% annualized rate in Q4 2019 and is essentially flat year-over-year. The Medical Equipment Momentum Index improved from 96.2 in February to 98.5 in March, its highest reading in two years. In January, Consumer Prices for Physicians' Services fell 0.4%, while Scientific & Medical Machinery Export Prices rose 0.7%. Overall, the Index points to improved growth in medical equipment investment over the next six months.



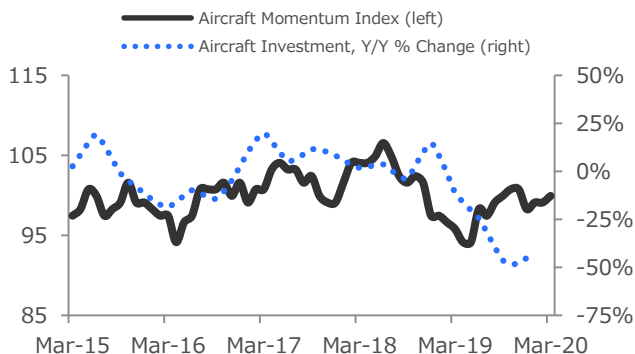
**Mining & Oilfield Machinery:**

Investment in Mining & Oilfield Machinery improved at an 22% annualized rate in Q4 2019 and is slightly positive (0.7%) over the last 12 months. The Mining & Oilfield Machinery Momentum Index eased from 85.5 (revised) in February to 84.7 in March. In January, the Brent Crude Oil Spot Price fell 15%, the sharpest decline since November 2018, but Mining & Logging Employment edged up 0.3%. Overall, the Index suggests weak but positive growth in mining and oilfield machinery investment over the next six months.



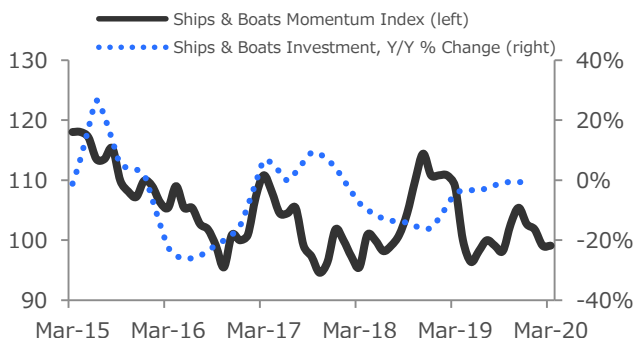
**Aircraft:**

Investment in Aircraft surged at an 113% (annualized) in Q4 2019 but is 45% below year-ago levels. The Aircraft Momentum Index edged up from 99.1 (revised) in February to 99.9 in March. Shipments of Non-Defense Aircraft & Parts pulled back 21% in January, while the Market Cap of Southwest Airlines fell 16% in February. Overall, the Index continues to suggest negative aircraft investment growth over the next six months.



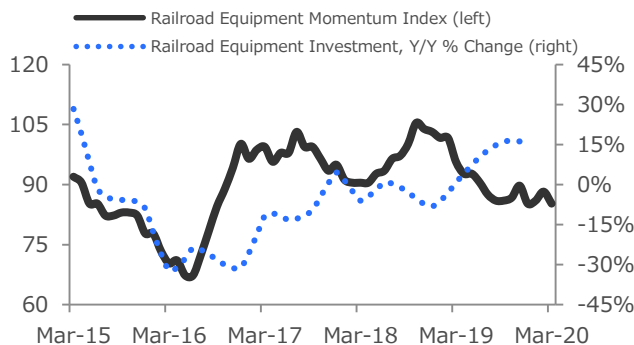
**Ships & Boats:**

Investment in Ships & Boats dropped at an annualized rate of 9.2% in Q4 2019 and eased 1.1% year-over-year. The Ships & Boats Momentum Index remained at 99.1 from February (revised) to March. In December, Exports of Ships, Boats, and Floating Structures to China fell 21%, while Ships & Boats Shipments pulled back 6.0%. Overall, Index points to further weakening in ships and boats investment growth over the next six months.



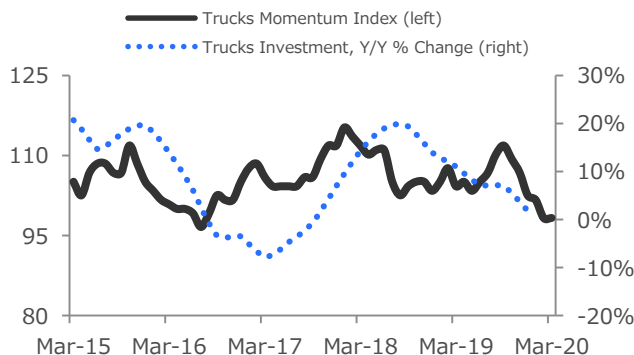
**Railroad Equipment:**

Investment in Railroad Equipment contracted at a 5.5% annualized rate in Q4 2019 but is up 15% year-over-year. The Railroad Equipment Momentum Index declined from 88.2 (revised) in February to 85.2 in March, matching the lowest level since September 2016. In January, Rail Carloads of Forest Products fell 16%, and Crude Oil and Petroleum Products Imports rose 4.1%. Overall, the Index points to a slowdown in railroad equipment investment growth over the next two quarters.



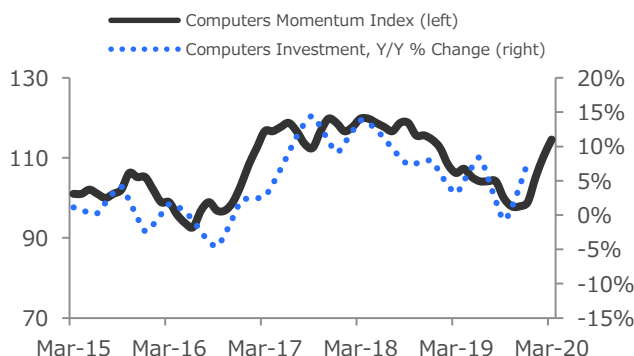
**Trucks:**

Investment in Trucks inched pulled back 8.2% annualized rate in Q4 2019 but is up 1.8% from year-ago levels. The Trucks Momentum Index held steady at 98.3 from February (revised) to March, remaining at the lowest level since mid-2016. Shipments of Heavy-Duty Trucks fell 3.4% in December, and Sales of Heavy-Duty Trucks declined 7.3% in January. Overall, the Index points to continued weak growth in trucks investment over the next six months.



**Computers:**

Investment in Computers surged at an annualized rate of 30% in Q4 2019 and is up 7.8% year-over-year. The Computers Momentum Index rose from 110.4 (revised) in February to 114.6 in March, the highest level since November 2018. Capacity Utilization for Computers & Electronic Products Manufacturing improved 0.3 point to 73.2% in January, and the University of Michigan Consumer Sentiment Index improved 1.6 points to 92.1 in February. Overall, the Index points to solid growth in computers investment over the next six months.



**Software:**

Investment in Software improved at a 5.3% annualized rate in Q4 2019 and is up 8.9% year-over-year. The Software Momentum Index remained at 96.4 from February to March. Shipments of Computers & Related Products rose 8.2% in January, while the ZEW Current Economic Situation Index improved 14% in February, the second consecutive month of double-digit growth. Overall, the Index points to slower (but still positive) growth in software investment over the next six months.

