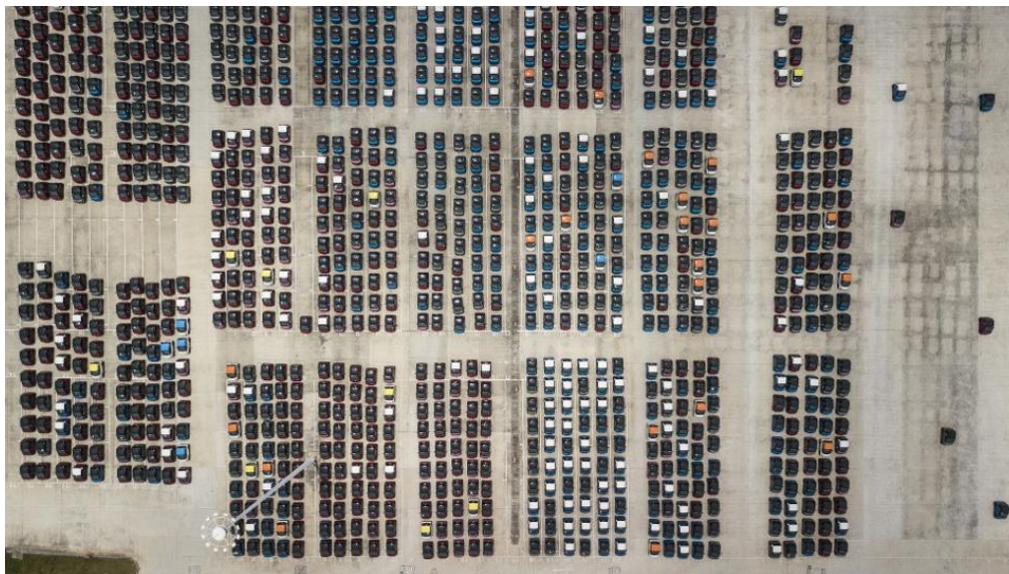


# Demand Crash On The EV Highway Hits Battery Metals

A collapse in sales of electric vehicles in China has triggered a chain reaction up the raw materials pipeline and raised fresh questions about the short-term future of EVs without heavy-duty government subsidies.

What rocked supporters of the EV industry earlier this week was a report from the China Association of Automobile Manufacturers that sales of new-energy vehicles, a description that include full electric and hybrids, fell 34.2% in September compared with the same month last year.



Baojun E100 electric vehicles sit parked in the parking lot of the SAIC-GM-Wuling Automobile Co. ... [+] Baojun Base plant, a joint venture between SAIC Motor Corp., General Motors Co. and Liuzhou Wuling Automobile Industry Co., in this aerial photograph taken in Liuzhou, Guangxi province, China, on Wednesday, May 23, 2018. GM and its partners sold 4 million vehicles in China in 2017, about 1 million more than the automaker sold in the U.S. Photographer: Qilai Shen/Bloomberg

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Explanations for the sharp decline range from consumer concern about a reduction of government incentives to buy an EV, to lingering doubts about how far an EV can travel without a power top-up (range anxiety).

## Shock Waves

Whatever the reasons the Chinese experience has sent shock waves through the global vehicle industry as major manufacturers gear up for a wholesale switch from gasoline and diesel power to electric versions of their leading models.

A similar shock has rocked mining companies producing the raw materials that go into an EV's batteries, such as lithium, cobalt, graphite and nickel.

Boom-like conditions which prevailed last year have turned into a bust with a number of lithium mining projects in Australia slowing output, delaying expansion plans, or being shelved until prices recover.

## Sharp Price Falls

The issue for the lithium producers is easiest to understand. Just over two years ago the price of lithium carbonate, a part-processed feed-stock used by battery makers, was selling for \$20,000 a ton. Today, it is selling for around \$7400/t.



Stockpiles of lithium ore stand at a Talison Lithium Ltd. facility, a joint venture between Tianqi ... [+] Lithium Corp. and Albemarle Corp., in Greenbushes, Australia. Photographer: Carla Gottgens/Bloomberg

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The lithium price fall has been matched by a similar collapse in the prices for cobalt and graphite which are also used in batteries, but not yet in the price of nickel which is being held up by its major use in the production of stainless steel.

Two Australian lithium miners, Pilbara Minerals and Altura Mining, have been forced to raise fresh capital to help ride out the lower lithium price and finish building mines and processing facilities started when prices were higher.

Investment banks have become more cautious on the outlook for battery raw materials as EV sales struggle and some producers reduce output while prospective EV makers such as British inventor, James Dyson, dump plans to make EVs.

## **Weak Metal Demand**

Morgan Stanley said in a note to clients earlier this week that strong inflows of lithium carbonate into China in the September quarter had met with weak demand from the battery sector.

Macquarie Bank described the latest Chinese EV sales figures as “sobering” with the lowering of government subsidies proving to be a significant factor in the fall.

On a global basis, Macquarie said the slowdown in China was being offset by increased EV sales in Europe and the U.S. but the overall picture was of “sales growth screeching almost to a halt at 8% growth in 2019” versus 52.6% year-on-year growth between 2015 and 2018. “Quite the deceleration,” the bank said.

Perhaps more important than the EV sales slowdown, according to Macquarie, was the demonstration that demand for EVs is “no longer bullet-proof”.

“The likelier lasting impact on battery metals will be the loss of demand invincibility in investors’ minds,” Macquarie said.