

Making Sense of the Lithium Craze



It's the mining and exploration world's hottest commodity, with parabolic price rises amid a rush to find new sources of supply. Junior companies are joining the lithium club by the dozen seemingly every week. Share price increases are being generated by the simple act of acquiring exploration licence's or lodging exploration licence applications. Even talking about the possibility of acquiring a lithium project, or evaluating one's own projects for lithium potential, has been enough to generate a reasonable price rally in the current market environment.

And of course every company is mentioning the word 'Tesla' in their presentations.

The key question in all of this is how long can the lithium mania continue? We've been here before many time with other commodities - the uranium price collapse of 2007, rare earths in 2011, graphite in 2012 and lithium itself between 2009 and 2011, and of course iron ore.

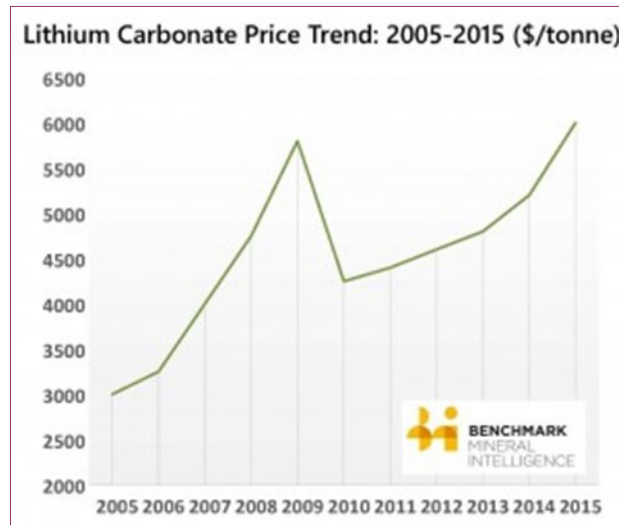
Despite much alarm and excitement a few years back, there is plenty of tellurium to feed the solar panel industry, and more than enough gallium to keep LED lights on. It would take flat-screen manufacturers years to work their way through the indium stocks sitting in warehouses in China, and everyone knows by now that rare earths are not actually rare.

The demand story however, when you look at forecasts for electric vehicle production and energy storage is most definitely real. Yet the lithium story in 2009 was virtually identical to what it is today.

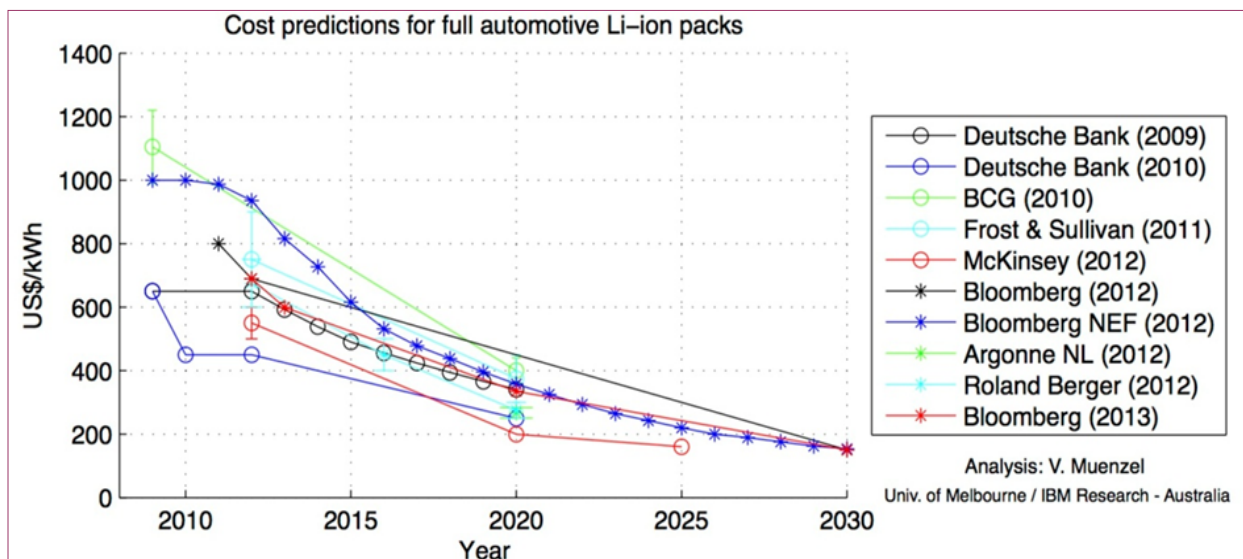
Electric vehicles had arrived and were considered ready to compete, however in actual fact they could not compete on a cost basis with internal combustion engines.

Major lithium suppliers were able to catch up anyhow and meet the continually increasing battery demand for uses in laptops, phones and tablets.

The recent increase in the price of lithium itself has been real. Lithium prices in China have risen from about \$7,000 a ton to more than \$20,000 recently, according to research by consultants CRU; while industry website Asian Metal says lithium carbonate, the compound used in batteries, has jumped by 76% over the past 12 months.



Perhaps the most significant difference this time around is the dramatically lower cost of a lithium-ion battery on a per-kilowatt-hour basis. Lithium-ion battery prices have fallen by around 14% annually, which has significantly boosted the potential for vehicle electrification to take hold. At the same time they've also become more powerful.



So the battery price trend is down.

However battery-based vehicles are still a long way from competitive with those using the time-tested internal combustion engine. The Boston Consulting Group and other analysts have suggested that a kilowatt-hour of lithium-ion batteries will have to dip below the \$100 mark for the cost of the two powertrain technologies to be a true wash. Compare this with the forecast cost predictions in the graphic above.

Industry expert Chris Berry says: "There are predictions that EVs will be 20% to 25% of the overall vehicle fleet by 2025. I think that if full electric vehicles, plug-ins and hybrids made up 5% to 7% of the global fleet by 2025, that would be a huge win for the lithium market in particular and for the electric vehicle movement as well."

He foresees “a tight lithium market over the next three or four years”, although not a situation where demand is going to blow supply away.

And as we said earlier, we cannot forget the lessons of the past where niche metal prices went crazy, and a large flock of juniors went into the space. The net result was that a lot of capital was misallocated, with paper fortunes made and then lost. Ultimately this boils down to the difference between investing and speculating.

Vehicle electrification really is a Tesla-centric story right now; however this focus is misguided. When one examines the vehicle landscape, there are so many other emerging competitors.

In addition to the increased competition from big auto manufacturers, there are also now many venture-backed startups that are now kicking tires within the electric vehicle industry. According to Tracxn, a start-up intelligence platform, some of Tesla’s rivals include Faraday Future, NextEV, and Atieva.



Significant new supplies of batteries are scheduled for 2017 onwards - with Tesla Motors, LG Chem and Foxconn Technology Group all planning lithium-ion megafactories. This is in addition to new plants and expansions by battery majors such as Samsung SDI.

There are important variables that will affect its development, positively or negatively. These are: infrastructure availability, range, battery costs and government policies, all of which have difficult challenges to overcome. And there is another variable that may have an even stronger negative impact on the development EVs - the oil price.



Let's now examine things from a share market perspective. A colleague and friend of mine - Mark Hansen of Market Capital Group - recently published an interesting analysis of the lithium boom in the context of the Australian sharemarket.

He comments that during May the number of companies that he had identified in the lithium space on the ASX had grown from 35 (with a combined market cap of \$3.1 B) to 51 companies (with a combined market cap of \$3.3B). This represents a 45% increase in the number of players in just a month, however the combined market cap only increased by 5%.

This sends out warning signals of a market top – or at least a pause in the sector hysteria.

What's also interesting is that his analysis shows that average Year-to-Date (YTD) gains had fallen over the course of the month from 209% to 159% for the companies he's tracking. And it's primarily the newer entrants that are dragging the average gain down.

What's also interesting is that the three sector leaders – Orocobre (ASX: ORE), Pilbara Minerals (ASX: PLS) and Galaxy Resources (ASX: GXY) have drawn even further ahead of the pack in terms of their share price performances, whilst the smaller companies are drifting further behind.

In my mind this could well be reflective of a market becoming a little more circumspect about the whole lithium speculative boom.

Many ASX juniors are using the lithium boom as a means to top-up desperately low cash reserves. But true investors need to reflect upon the prospects of anything tangible ever eventuating from the companies' published hype. Like all booms, few companies will ever develop a 'real' project. Most are short-term speculative playthings, where punters and speculators will look to ride the crest of the lithium sharemarket wave for as long as they possibly can, before the inevitable wipe-out.

Note: You can access Mark Hansen's lithium study at

<http://marketcap.com.au/asx-lithium-may-2016-update-bell-rung-top/>

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