Global and China Li-ion Power Battery Industry Report, 2018-2022

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STUDY GOAL AND OBJECTIVES

This report provides the industry executives with strategically significant competitor information, analysis, insight and projection on the competitive pattern and key companies in the industry, crucial to the development and implementation of effective business, marketing and R&D programs.

REPORT OBJECTIVES

- To establish a comprehensive, factual, annually updated and cost-effective information base on market size, competition patterns, market segments, goals and strategies of the leading players in the market, reviews and forecasts.
- To assist potential market entrants in evaluating prospective acquisition and joint venture candidates.
- To complement the organizations' internal competitor information gathering efforts with strategic analysis, data interpretation and insight.
- To suggest for concerned investors in line with the current development of this industry as well as the development tendency.
- To help company to succeed in a competitive market, and

METHODOLOGY

Both primary and secondary research methodologies were used in preparing this study. Initially, a comprehensive and exhaustive search of the literature on this industry was conducted. These sources included related books and journals, trade literature, marketing literature, other product/promotional literature, annual reports, security analyst reports, and other publications. Subsequently, telephone interviews or email correspondence was conducted with marketing executives etc. Other sources included related magazines, academics, and consulting companies.

INFORMATION SOURCES

The primary information sources include Company Reports, and National Bureau of Statistics of China etc.

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Abstract

In 2017, the global demand for electric vehicle (EV) power battery reached 69.0GWh, being the one with most increments among consumer electronics, power, and energy storage. It is expected that the world's demand for EV lithium battery will be at least 325GWh till 2022, a 4.7-fold of the 2017's.

In 2017, China's output of automotive lithium power battery stood at 44.5GWh, an upsurge of 44.5% from a year earlier, and the output figure will be up to 215GWh in 2022, a 4.8-fold of the 2017's in the wake of national policy being enforced as well as the improvement of lithium battery production technologies, cost cuts, and the growing trend of new energy vehicle (NEV) and supporting facilities.

In the first half of 2018, China's shipments of power battery rose 23.8% year on year and reported 22.86GWh. The installations of power battery to new cars amounted to 15.54GWh, soaring 168% on an annualized basis.

In the first half of 2018, the power battery industry characterizes a growing concentration degree, with the top ten producers holding a combined 87% share by installations, among which CATL and BYD seized more than 60% shares together.

Comparing enterprises' performance in 2017 and 2018H1, the top two players' rankings remained unchanged, but part of cylindrical power battery producers like OptimumNano have been out of the top ten since they encountered difficulties in capital and had to reduce production substantially. With the higher national subsidies for power battery featuring high energy density, the class-A passenger cars tend to use the soft pack power battery and square power battery that boast higher energy density. Thanks to a significant rise in its demand from SAIC ROEWE and GAC, Wanxiang Group enters the top 10 list by installations in the first half of 2018.

The price of power battery still shows a downward mobility in 2018 largely due to improvements in energy density of power battery and cost cuts as a result of mass production. The selling price of China-made new energy vehicle (NEV) power battery system is falling year after year. At the end of 2017, the price of power battery system dropped 25% from 2.0 yuan/Wh at the end of 2016 to 1.4 - 1.5 yuan/Wh; LiFePO4 battery pack saw a price decrease from 1.9 yuan/Wh in 2017Q1 to 1.25 yuan/Wh in 2018Q2, a dive of 35%; NCM ternary battery pack price was down 25% from 1.6 yuan/Wh in 2017Q1 to 1.2 yuan/Wh in 2018Q2.

Considering the technical routes for power battery, the ternary power battery enjoyed a rising share from 24% in 2015 to 48% in 2017, and even over 60% in the first half of 2018 along with the higher demanding on energy density of power battery as well as mileage range. From the perspective of the material system, the high-nickel ternary materials have found some application in cylindrical power battery, while it still takes one to two years for high-nickel ternary soft pack and high-nickel ternary square power battery to be developed and further tested.

The report highlights the following:

◆Li-ion power battery industry chain (four key materials, cell, Pack + BMS, etc.);
◆Li-ion power battery technology roadmap (costs, performance, development direction, etc.);
◆Global and China EV industry (overall, by country, and production & sales and performance parameters of specific auto models, etc.);
◆Global and China li-ion power battery industry (shipments, prices, market size, batteries for auto models and carmakers, etc.);
◆Six Japanese and South Korean lithium battery enterprises (operation, technology, development planning, production & sales, etc.);
◆Ten Chinese li-ion power battery enterprises (operation, technology, development planning, production & sales, etc.)

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