**Australian Securities Exchange Announcement** **3 November 2021**

# Project Status Update

## Highlights

- New precursors and P-CAM product development has been achieved in the laboratory
- Laboratory Scale Pilot Plant up and running

## Summary

King River Resources Limited (ASX:KRR) is pleased to provide this update on the ongoing laboratory work which supports the Definitive Feasibility Study for the Type 1 Precursor Processing Plant. As previously reported (KRR ASX release 8 September 2021) KRR chose to pursue the opportunities associated with the processing of our 5N (99.999%) purity Type 1 Precursor (an Aluminium Salt) required in the battery manufacturing industry.

**Type 1 Precursor - Aluminium Salt - 5N Purity**

Our initial laboratory focus has been to engage Source Certain International (SCI) to use our Type 1 Precursor to produce precursor Cathode Active Materials (P-CAM), which are intermediate mixed metal hydroxides used in the manufacture of Lithium Ion Battery (LiB) cathodes. P-CAM's are made by a co-precipitation process where the nickel, cobalt, manganese and aluminium salts are precipitated as a mixed metal hydroxide of specific composition, morphology and particle size distribution.

SCI have also been investigating using our Type 1 Precursor salt to produce other high purity aluminium based precursors, including:

- Type 2 Precursor: An aluminium compound which is used in the manufacture of LiB Cathodes
- Type 3 & 4 Precursors: Aluminium Salts which are used in the manufacture of LiB Cathodes, as coatings for LiB electrodes, LED Phosphors and in the Electronics and Optics industry



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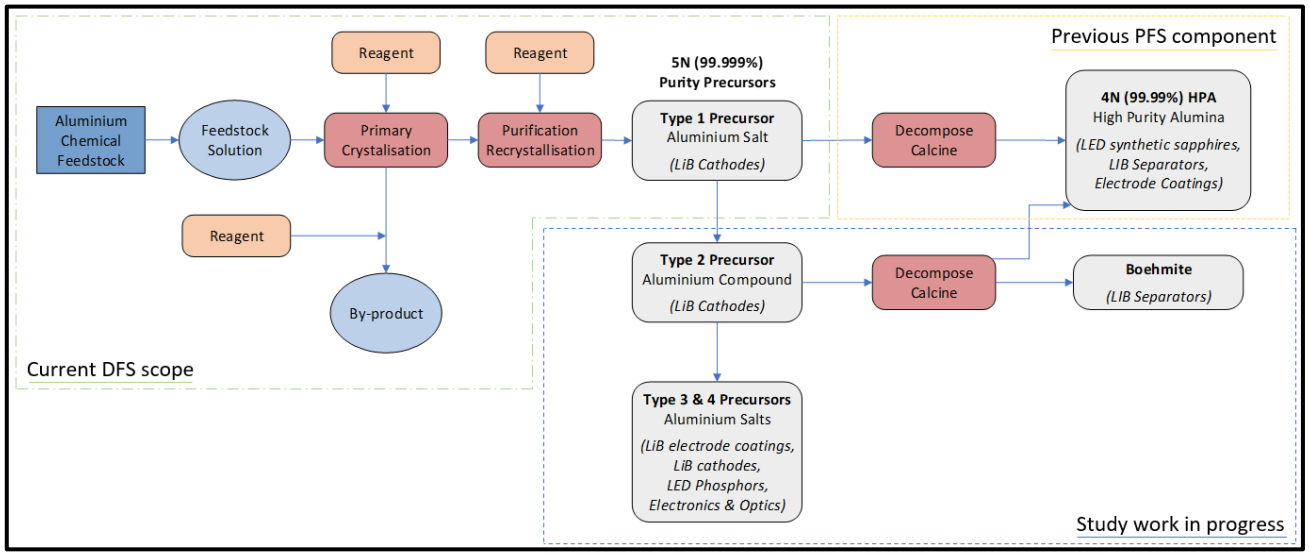
As previously reported (KRR ASX release 8 September 2021), SCI have successfully produced a Nickel-Cobalt-Aluminium (NCA) P-CAM product in the laboratory, with further testwork underway to refine the composition, morphology and particle size distribution.

In addition, SCI have produced Type 2 Precursor and testwork is ongoing to optimise the process and improve the purity to 5N. On successful completion of this phase of testwork, other Precursor salts will be produced.

The flowsheet below delineates the current DFS scope and shows the new product opportunities and their applications.




**Overview Flowsheet**

At this stage, it is not KRR's intention to become a P-CAM manufacturer but to rather supply its Precursor products as the high purity aluminium source to this expanding market.

**Type 2 Precursor - Aluminium Compound (P-CAM in background)**

**Nickel-Cobalt-Aluminium (NCA) based P-CAM**

Receipt and assembly of the laboratory scale Pilot Plant at Source Certain International is complete and commissioning is underway to refine the process and produce Type 1 Precursor product market samples for distribution.

**Laboratory Scale Pilot Plant - Precursor production of market samples**

The development of new precursor compounds, their successful integration into P-CAM's required by the industry, along with the completion of the mini pilot plant are very exciting developments for King River Resources.

Work on the Definitive Feasibility Study being undertaken remains on track and these developments will enhance further opportunities rather than delay them.

This announcement was authorised by the Chairman of the Company.

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**Statement by Competent Person**

The information in this report is based on information compiled by Mr Ken Rogers (BSc Hons) and fairly represents this information. Mr Rogers is the Chief Geologist and an employee of King River Resources Ltd, and a Member of both the Australian Institute of Geoscientists (AIG number 2359) and The Institute of Materials Minerals and Mining (IMMM number 43552), and a Chartered Engineer of the IMMM. Mr Rogers has sufficient experience in the activities undertaken to qualify as a Competent Person as defined in the 2012 Edition of the Joint Ore Reserves Committee (JORC) Australasian Code for Reporting of Exploration Results, Mineral Resources and Ore Reserves. Mr Rogers consents to the inclusion in this report of the matters based on information in the form and context in which it appears.