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ASX ANNOUNCEMENT

LITHIUM ION BATTERY COMPONENTS FROM MICA AT SADISDORF, GERMANY

SUMMARY

By producing lithium from unconventional sources, Lithium Australia NL (ASX: LIT) (or 'the Company') has identified a metallurgical process route which may provide security for the European renewable energy industry.

Lithium Australia's recent use of mine waste to produce lithium-ion batteries (see ASX announcement dated [22 November 2018](#)) formed the basis of a recently completed processing evaluation for the Company's Sadisdorf lithium/tin project ('the Project') in Saxony, Germany. That evaluation contemplated the production of high-performance cathode powders from mica recovered from tin-mining operations there. The processes required have been extensively pilot-tested (see ASX announcements dated [11 September 2018](#) and [13 September 2018](#)) and market evaluation of the types of cathode powders produced is ongoing in China and Japan.

Results of the investigations allow Lithium Australia to confidently commit to the next step towards commercialising operations at the Project and ultimately producing cathode powders in Europe.

Lithium Australia is of the opinion that, by situating a SiLeach[®] plant at Sadisdorf to treat locally available micas and converting the lithium chemicals produced to cathode powders, as has been previously demonstrated at pilot scale, the Company could combine low capital intensity with high margins to reduce the European battery industry's reliance on imported lithium ion battery components.

BACKGROUND

Lithium Australia, through its wholly-owned subsidiary Trilithium Erzgebirge GmbH, has a 100% beneficial interest in the Project, which is currently on care and maintenance. Historically Sadisdorf was a tin-mining enterprise, the tin veins occurring within a 'greisen' (altered granite), with the pervasive alteration within the granite consisting of lithium micas.

The Project, which is situated near the border with the Czech Republic, as shown in Figure 1, is close to Deutsche Lithium's Zinnwald deposit and European Metals' Cinovec deposit (Czech Republic).

This location is significant in terms of its proximity to the rapidly expanding European electric vehicle and battery industries.

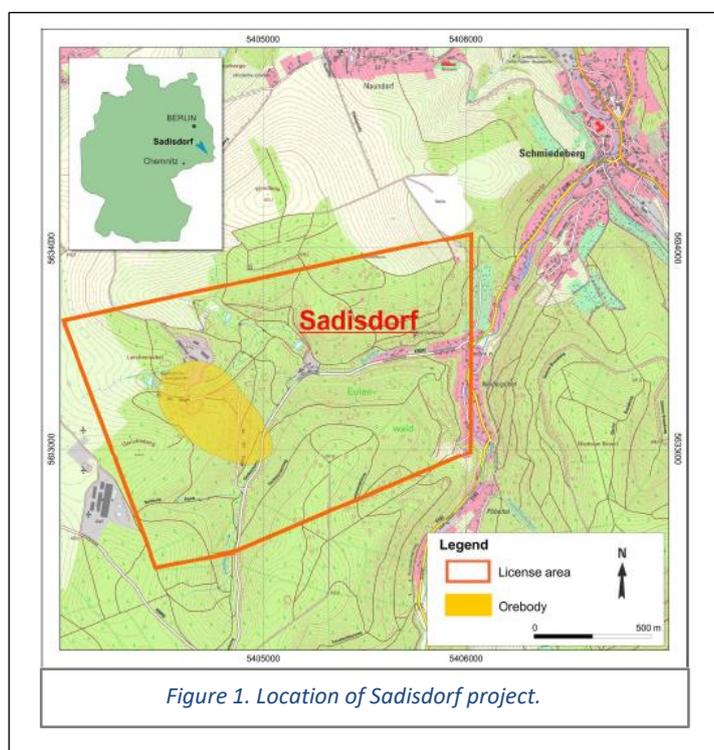


Figure 1. Location of Sadisdorf project.

At present, the Project contains an Inferred Resource of 25 Mt @ 0.45% Li₂O (see ASX announcement dated [7 December 2017](#)). A three-hole diamond drilling campaign completed in May 2018 (see ASX announcement dated [11 May 2018](#)) was designed to confirm historic data and test the outer boundaries of the mineral resource model.

Drilling results from that programme suggest the potential for a future resource upgrade (see ASX announcement dated [27 August 2018](#)). In addition to lithium and tin, significant tungsten mineralisation was encountered in parts of the inner alteration (greisen) zone, as indicated in Figure 2.

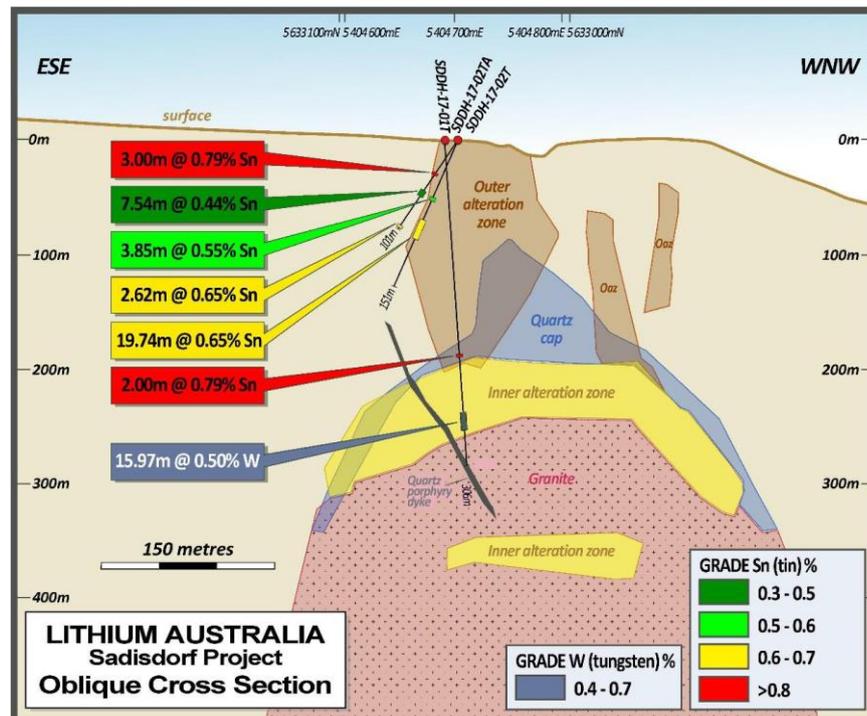


Figure 2. Drill-hole section showing results.

PROCESSING EVALUATIONS

In light of the positive results from the aforementioned drilling campaign, an evaluation of processing options was initiated in the latter half of 2018 and finalised in January 2019.

The Project concept involves the extraction of both tin and lithium from the deposit, initially by open cut mining. Zinnwaldite mineralisation (a mica containing the target lithium) is beneficiated by conventional wet, high-intensity magnetic separation and the cassiterite mineralisation (containing the target tin) via a combination of conventional flotation and gravity separation (see Figure 3). The tin concentrate is considered of sufficient quality for direct sale, while the lithium concentrate is further processed hydrometallurgically using SiLeach[®] into lithium phosphate, with potassium sulphate as a by-product (see Figure 4).

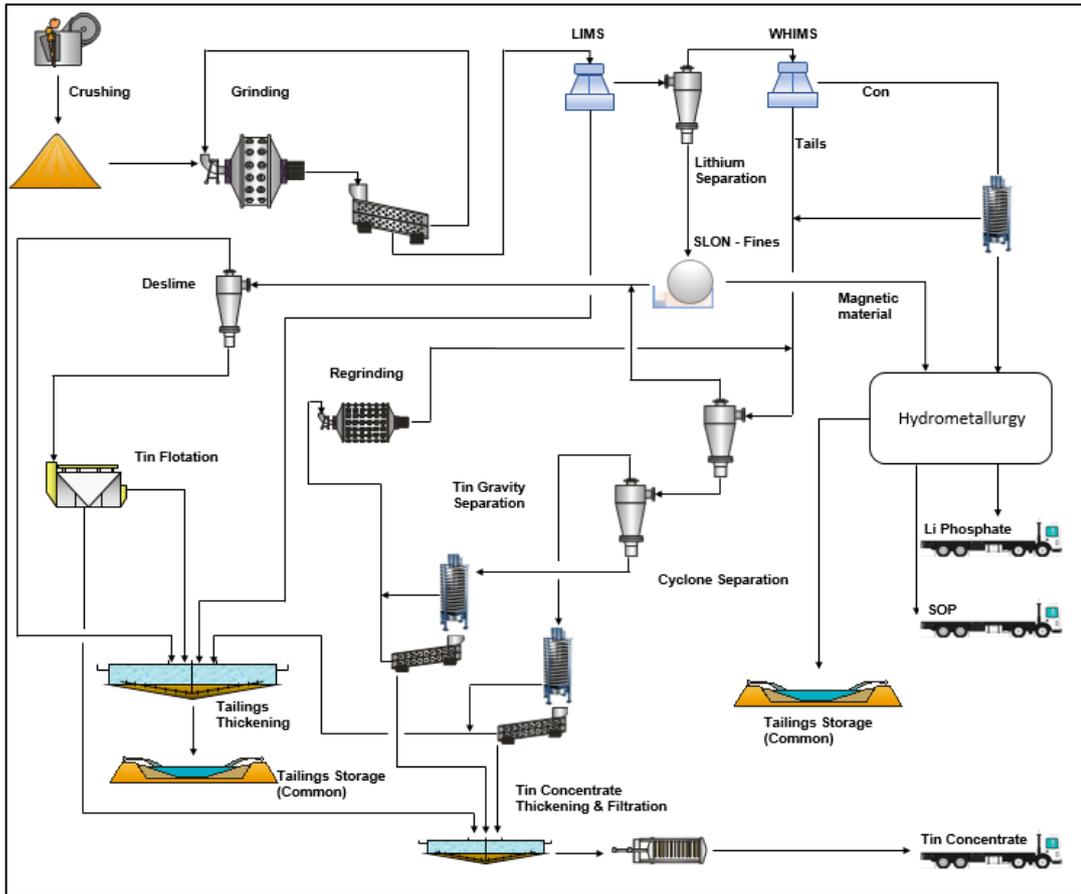


Figure 3. Beneficiation circuit.

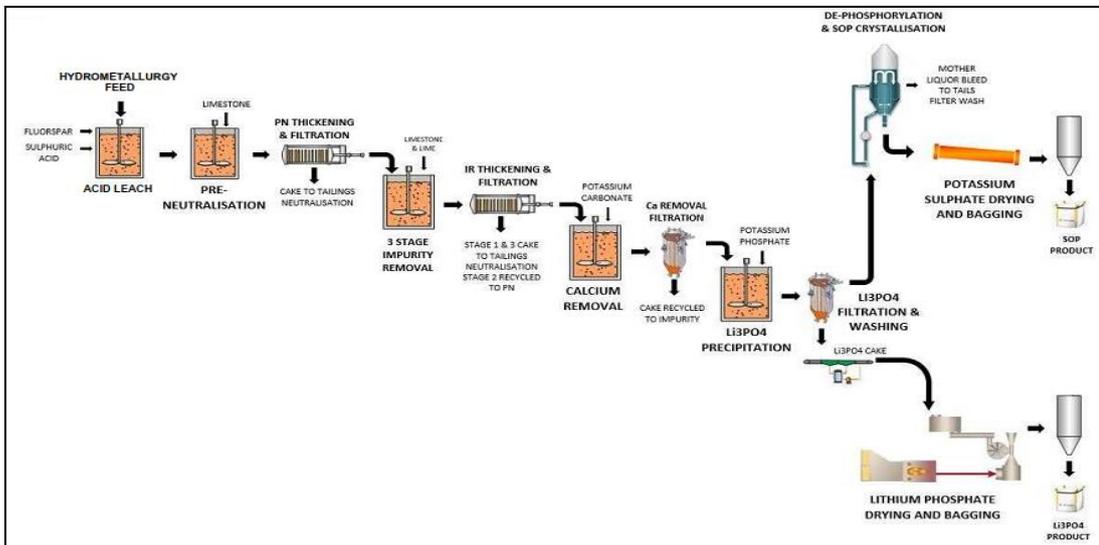


Figure 4. Hydrometallurgical circuit based on SiLeach®.

Positive opportunities being evaluated by Lithium Australia include:

- improvement in value via the conversion of lithium phosphate to a lithium-iron-phosphate cathode precursor material using VSPC Ltd proprietary technology;
- optimisation of cassiterite (the dominant tin mineral), and zinnwaldite (lithium mica) beneficiation and recovery efficiency; and
- performing a SiLeach® Generation 3 pilot-plant trial on a bulk composite sample.

Lithium Australia considers that the Project warrants further investment of funds, with a preliminary feasibility study now approved for implementation. Formal study planning activities will commence in March 2019 with a technical workshop in Germany. Attending will be participants from Trilithium Erzgebirge GmbH, Lithium Australia, VSPC and CSA Global.

COMMENT FROM ADRIAN GRIFFIN, MANAGING DIRECTOR

"Sadisdorf presents a significant opportunity to advance an unconventional lithium resource to the status of a strategic asset. The plan is to downstream-process via our proprietary VSPC technology to produce cathode materials for lithium-ion batteries. This has the potential to provide energy security within the European renewables sector. Lithium Australia is the first company in the world to produce lithium-ion batteries from the types of material available at Sadisdorf, and we look forward to advancing this operation to commercialisation."

Adrian Griffin – Managing Director

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About Lithium Australia NL

Lithium Australia aspires to 'close the loop' on the energy-metal cycle in an ethical and sustainable manner. To that end, it has amassed a portfolio of projects and alliances and developed innovative extraction processes to convert *all* lithium silicates (including mine waste) to lithium chemicals. From these chemicals, the Company plans to produce advanced components for the lithium-ion battery industry. The final step for Lithium Australia involves the recycling of spent batteries and e-waste. By uniting resources and the best available technology, the Company aims to establish a vertically integrated lithium processing business.

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Competent Persons' Statement – Lithium Mineral Resources – Sadisdorf

The information in this announcement that relates to *in situ* lithium Mineral Resources for Sadisdorf is based on and fairly represents information compiled by Mr Thomas Branch under the direction and supervision of Dr Andrew Scogings, in accordance with the requirements of the JORC Code 2012. Dr Scogings is an Associate of CSA Global Pty Ltd and takes overall responsibility for the Mineral Resource estimate and associated report. Dr Scogings is a Member of both the Australian Institute of Geoscientists and Australasian Institute of Mining and Metallurgy and has sufficient experience, which is relevant to the style of mineralisation and type of deposit under consideration, and to the activity he is undertaking, to qualify as a Competent Person in terms of the *Australasian Code for Reporting of Exploration Results, Mineral Resources and Ore Reserves (JORC Code 2012)*. Dr Scogings consents to the inclusion of such information in this announcement in the form and context in which it appears. Lithium Australia confirms that it is not aware of any new information or data that materially affects the information included in this announcement, and in the case of the Sadisdorf Mineral Resource estimate the company confirms that all material assumptions and technical parameters underpinning the estimates in the 7 December 2017 and 1 June 2018 announcements continue to apply and have not materially changed.