

ALCORE Pilot Plant: Initial Operating Conditions Selected

- ❖ Extensive assessments completed on ABx subsidiary ALCORE's specialised laboratory reactor, enabling the initial operating conditions for the pilot plant reactor to be selected
- ❖ Conclusive results received using a range of temperatures, residence times and amounts of acid
- ❖ Selection of initial operating conditions permits the pilot plant reactor engineering design to be completed



Figure 1 - ALCORE specialised laboratory reactor test work

ABx Group (ASX: ABX) (**ABx**) is pleased to confirm its 83%-owned subsidiary ALCORE Limited (**ALCORE**) has selected the initial operating conditions for its planned pilot plant on the NSW Central Coast.

The pilot plant is being designed to recover fluorine from 'excess bath', an aluminium smelter waste product, to produce hydrogen fluoride. In the commercial plant, the hydrogen fluoride will be further reacted to produce aluminium fluoride, a high-value chemical which is essential for aluminium smelting.

ALCORE commissioned three reactors earlier this year (see ASX Announcement dated 18 July 2022) and has since assessed the performance of the specialised laboratory reactor at a range of temperatures, residence times and amounts of acid. The results of this assessment program, combined with literature data and thermodynamic modelling, have allowed the Company to select the initial operating conditions for processing excess bath at scale.

Commenting on the selection of the initial operating conditions, ABx Group CEO Dr Mark Cooksey said:

"This is yet another highly positive step for ALCORE as the business moves forward with its planned facility that is anticipated to process up to 20 kg per hour of bath.

"Scale-up of a new process always involves complexity, and both ALCORE and its engineering partner BFluor Chemicals are satisfied with the clarity and consistency of results obtained.

"The results which have been received during the assessment phase have been conclusive and, with operating conditions finalised, the engineering design for the pilot plant reactor can be completed, which we anticipate to be before the end of the calendar year."

This announcement is approved for release by the board of directors.

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