

12 April 2022

# More Land Staked in Electric Avenue Region of Ontario with Works Programs Finalised

Critical Resources Limited (ASX:CRR) ("Critical Resources" or the "Company"), is pleased to advise that an additional 1,200Ha of land has been staked across the Plaid and Whiteloon Lake Projects, (collectively "the Projects"), in the exciting and emerging, Electric Avenue region of northwest Ontario, Canada which contains Frontier Lithium's Spark project. An aggressive works programs already well underway to identify drilling targets.

### **Highlights**

- An additional 1,200Ha of land staked in the Electric Avenue region of Ontario to expand Critical Resources Plaid Project
- Work program aimed to identify drill targets has already begun with Pegmatite mineralisation observed across both the Plaid and Whiteloon Lake projects <sup>1</sup>
- ¹Previously mapped pegmatites follow the same NW/SE trend of Frontier Lithium's ("TSX.V: FL") PAK, Spark and Bolt deposits
- Frontier Lithium's Pak project is one of North Americas highest-grade, high tonnage hard rock lithium Resources <sup>2, 3</sup>
- Studying and evaluating the observed pegmatites is crucial to the Company's exploration strategy within Ontario, Canada

Finalisation of work programs for the Projects will enable the Company to take advantage of the upcoming summer season, with an on-ground presence to observe outcropping pegmatites. Early exploratory works are critical in the evolution of an exploration campaign, hence having this time to plan the works will pay dividends moving forward. In addition to finalising the work programs, an additional 1,200Ha has been staked, further expanding the Plaid Project. Both projects have a natural synergy with the Company's recently acquired Mavis Lake and Graphic Lake projects in Ontario.

Critical Resources Managing Director Alex Biggs said: "It is positive to be developing work programs in such a prospective region in Ontario. The region's deposits in the locality represent some of the largest hard rock lithium deposits in North America. Our desktop studies have concluded similarities between the Projects and some of the deposits nearby which warrant further studies and exploration, particularly the trend of pegmatites. For now, we are waiting for the snow to melt, and expect to be performing work on the ground throughout the summer months".

<sup>1</sup>Stone, D, Fogal, R, and Fitzsimons, S (1993) "Precambrian geology, northwest Ontario," Ontario Geology Survey, Map P.3224, Scale 1:50,000 <sup>2</sup>Frontier Lithium TSX.V announcement 16 February 2022 <sup>3</sup> Frontier Lithium TSX.V announcement 01 February 2022



Figure 1: Electric Avenue region

Legend Additional Claims Electric Avenue Region -

Claims Map NAD 1983 Zone 15

Scale: 1:125,000

#### **Work Program**

The following work program has been determined as a stage 1 approach with a view to identifying appropriate drill targets.

#### Surface Mapping and Sampling

<sup>1</sup>Previously mapped pegmatites across both projects appear to follow a NW/SE trend, consistent with Frontier Lithium's Pak, Spark and Bolt<sup>2</sup> deposits. Identifying and mapping the pegmatites in detail will provide the Company invaluable information that will assist in identifying drill targets for future campaigns. It is also expected that information regarding pegmatite mineralisation will be gathered at this time through visual examination and rock chip sampling for assaying.

#### **Airborne Survey**

An airborne survey is to be completed as soon as possible to help identify targets for a drill program.

#### **Channel Sampling**

Channel sampling is crucial as it provides greater geological and mineralogical information about pegmatite deposits. Channel sampling was a valuable resource utilised by Frontier Lithium to identify drill targets which eventually led to the delineation of a JORC compliant resource.

#### **Drill Program Design**

Based on the activities outlined above, it is expected a preliminary drill program will be designed to target areas of interest. Drilling will aim to determine the geometries of geological structures and mineralisation constraints.

#### **Permitting**

Enquiries regarding permitting and approvals are underway with a view to begin exploration activities as soon as possible.



#### **Exploration Drilling and Resource Delineation**

The Company plans to complete a diamond drilling program once drill targets are defined across both projects' tenements. The strategy is to develop synergies with the Company's 100% owned Mavis Lake and Graphic Lake projects.

#### **Project Overview**

The Plaid and Whiteloon Lake projects are located 165km north of Red Lake, Ontario, Canada in the highly prospective Electric Avenue region. Both Projects are approximately 5.5km from Frontier Lithium's Pak project, one of North Americas highest-grade, high tonnage hard rock lithium Resources<sup>2</sup>, with

- <sup>2</sup> Measured and Indicated Resource of 10.49 million tonnes averaging 1.78% Li<sub>2</sub>O and
- <sup>2</sup> Inferred resource of 18.48 million tonnes averaging 1.45% Li<sub>2</sub>O.

Project location is shown in Figure 2.



Figure 2: Project location



#### **Mavis Lake Project Overview**

The Mavis Lake Lithium Project is 19 kilometres east of the town of Dryden, Ontario. The Project is in close vicinity to the Trans-Canada highway and railway major transportation arteries linking larger cities such as Thunder Bay, Ontario, to the southeast and Winnipeg, Manitoba, to the west. The region boasts excellent infrastructure with hydro-power located a few kilometres to the south-west of the project. The region is a well-established lithium province with multiple projects located within the vicinity.

Previous drill programs have yielded high-grade Li<sub>2</sub>O intercepts including:

- 55.25m at 1.04% Li<sub>2</sub>O from 80.75m (MF18-53) and
- 26.30m at 1.70% Li<sub>2</sub>O from 111.9m
  - o inc. 7.70m at 2.97% Li<sub>2</sub>O from 130.5m (MF17-491),

presenting significant exploration potential (ASX Announcement 25 October 2021). A future work program has been determined and is discussed in detail in ASX announcement 13 Dec 2021.

#### **Graphic Lake Project Overview**

The Graphic Lake Project is 55km south-east of Kenora, Ontario. The Project is dissected by the Trans-Canadian Highway, providing key links to larger cities such as Thunder Bay, Ontario to the southwest and Winnipeg, Manitoba, to the west. The region is an emerging lithium province with multiple projects across the region.

The Project is situated in the Sioux Lookout Domain of the Wabigoon Terrane in north-west Ontario. The claim's comprise a pegmatite swarm trending NE/SW with a width of 300m and estimated strike of 5.5km. These pegmatites are observed to follow the foliation of the Royal Island group metasedimentary host rocks.

#### The Lithium Industry in Ontario

Ontario's First-Ever Critical Mineral Strategy

In March of 2022 the government of Ontario announced their first-ever critical minerals strategy. The strategy aims to secure Ontario's position as a global leader of responsibly sourced critical minerals. To achieve this, collaboration is dependent between government, industry, Indigenous peoples, communities, and other stakeholders. Working together, this strategy will build a stronger, more resilient economy and revitalise local communities.

The strategy is comprised of six pillars, or areas of government action, which will solidify Ontario's position as a global leader of responsibly sourced critical minerals. The pillars are; Enhancing geoscience information and supporting critical minerals exploration, Growing Domestic processing and creating resilient supply chains, Improving Ontario's regulatory framework, Investing in innovation, research, and development, Building economic development opportunities with Indigenous partners, and Growing labour supply and developing a skilled labour force.

#### Tesla Battery Gear Manufacturing Plant Opens

Tesla has recently announced the opening of a battery gear manufacturing plant in Markham, Ontario demonstrating the significant opportunity for Ontario to become one of the world's leading lithium provinces. The facility will be the first branded Tesla Canada manufacturing facility in Canada.

A significant amount of activity in the lithium exploration sector is currently occurring in Ontario. Due to the quality of lithium assets in the region, the fundamental drivers behind the lithium market and the intent of North American manufacturers to source lithium for battery manufacturing from localised supply-chains, it is an excellent time to be gaining a foothold in Ontario.



#### Thunder Bay Regional Lithium Refinery

Avalon Advanced Materials Inc (TSX:AVL) has recently announced the agreement of a binding letter of intent to develop a regional battery supply chain in Ontario and elsewhere. The first step of this development will be establishing a lithium refinery in Thunder Bay, Ontario, approximately 350km from the Mavis Lake Lithium Project. The plant aims for a production capacity of 20,000 tonnes per annum of lithium hydroxide and/or lithium carbonate. Sources of lithium concentrate will be initially from Avalon's Separation Rapids Lithium Project while other projects begin production.

This announcement has been approved for release by the Managing Director.

-End-



#### FORWARD LOOKING STATEMENTS

Information included in this release constitutes forward-looking statements. Often, but not always, forward looking statements can generally be identified by the use of forward looking words such as "may", "will", "expect", "intend", "plan", "estimate", "anticipate", "continue", and "guidance", or other similar words and may include, without limitation, statements regarding plans, strategies and objectives of management, anticipated production or construction commencement dates and expected costs or production outputs. Forward looking statements inherently involve known and unknown risks, uncertainties and other factors that may cause the Company's actual results, performance and achievements to differ materially from any future results, performance or achievements. Relevant factors may include, but are not limited to, changes in commodity prices, foreign exchange fluctuations and general economic conditions, increased costs and demand for production inputs, the speculative nature of exploration and project development, including the risks of obtaining necessary licences and permits and diminishing quantities or grades of reserves, political and social risks, changes to the regulatory framework within which the Company operates or may in the future operate, environmental conditions including extreme weather conditions, recruitment and retention of personnel, industrial relations issues and litigation.

Forward looking statements are based on the Company and its management's good faith assumptions relating to the financial, market, regulatory and other relevant environments that will exist and affect the Company's business and operations in the future. The Company does not give any assurance that the assumptions on which forward looking statements are based will prove to be correct, or that the Company's business or operations will not be affected in any material manner by these or other factors not foreseen or foreseeable by the Company or management or beyond the Company's control.

Although the Company attempts and has attempted to identify factors that would cause actual actions, events or results to differ materially from those disclosed in forward looking statements, there may be other factors that could cause actual results, performance, achievements or events not to be as anticipated, estimated or intended, and many events are beyond the reasonable control of the Company. Accordingly, readers are cautioned not to place undue reliance on forward looking statements. Forward looking statements in these materials speak only at the date of issue. Subject to any continuing obligations under applicable law or any relevant stock exchange listing rules, in providing this information the Company does not undertake any obligation to publicly update or revise any of the forward-looking statements or to advise of any change in events, conditions or circumstances on which any such statement is based.

#### **NO NEW INFORMATION**

Except where explicitly stated, this announcement contains references to prior exploration results, all of which have been cross-referenced to previous market announcements made by the Company. The Company confirms that it is not aware of any new information or data that materially affects the information included in the relevant market announcements.

#### ABOUT CRITICAL RESOURCES LIMITED

Critical Resources is a base metals and lithium exploration and development focused company headquartered in Perth, Western Australia and is listed on the Australian Securities Exchange (ASX:CRR). The Company has recently been undergoing a structured process of change at the Director and Executive level. These changes mark the commencement of a renewed focus by the Company on providing shareholder value through the exploration, development and advancement of the Company's long held NSW assets, newly acquired Lithium assets in Canada and Copper assets in Oman.



## Appendix 1 - Newly Acquired Mining Claims

| 710995 | Canada Critical Resources                    | 100% |
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