Lithium Universe LIMITED
Building a Lithium Future

ASX ANNOUNCEMENT AND MEDIA RELEASE

17 August 2023

# APOLLO EXPLORATION STRATEGY USING AI TECHNOLOGY

**Highlights**

- Use of Artificial Intelligence (AI) in developing the exploration strategy.
- Working with KorrAI Technologies Limited in Canada.
- Enhance field exploration practices, optimise time spent and cost in the field.
- Predictive AI previously trained and field tested in James Bay.
- Three phases of expedited exploration strategy at Apollo Lithium Project.

Lithium Universe Limited ("Lithium Universe", the "Company" or ASX: "LU7") is pleased to announce the exploration strategy that has been developed for the Apollo Lithium Project. For the first time, the Company has commenced the use of Artificial Intelligence (AI) in developing the exploration strategy. The Company is working with KorrAI Technologies Limited (KorrAI) in Canada.

KorrAI's technology and expertise are utilizing satellite data and Artificial Intelligence (AI) to enhance field exploration practices, optimize time spent in the field, optimise cost, and improve exploration outcomes using data-driven decisions. Their key approach involves using Artificial Intelligence to process and analyse satellite data and images. By using advanced algorithms, KorrAI has created maps that show different geological features like outcrops, pegmatites, and vein formations. The Company has also used spectral data to help identify areas that are more likely to have valuable mineral deposits. This will help guide LU7 field teams to focus on specific locations with high potential. The AI technology improves the accuracy and efficiency of exploration efforts, helping LU7 field teams target their activities and allocate resources more effectively, which reduces the time and cost of exploration. This is especially advantageous given the shorter exploration window in the region due to winter. The successful use of the AI technology would enable LU7 to potentially fast-track exploration activities that may have otherwise only been forecast to occur 12 months from now.

To date, a study has been conducted on the Apollo property to explore for Lithium-Caesium-Tantalum minerals (LCT) bearing pegmatites using advanced technology like remote sensing, airborne and ground based geophysics combined with artificial intelligence. The study used data captured by satellites and airplanes to gather information about the property. Different types of data, like visible and infrared light, microwave signals,

and magnetic readings, were combined to create a detailed picture of the area. AI models were then used to analyse the data and identify areas where valuable minerals might be present. As a result, 448 priority targets were found on the Apollo property.

The targets were further narrowed down to 28 specific areas for field mapping and sampling.

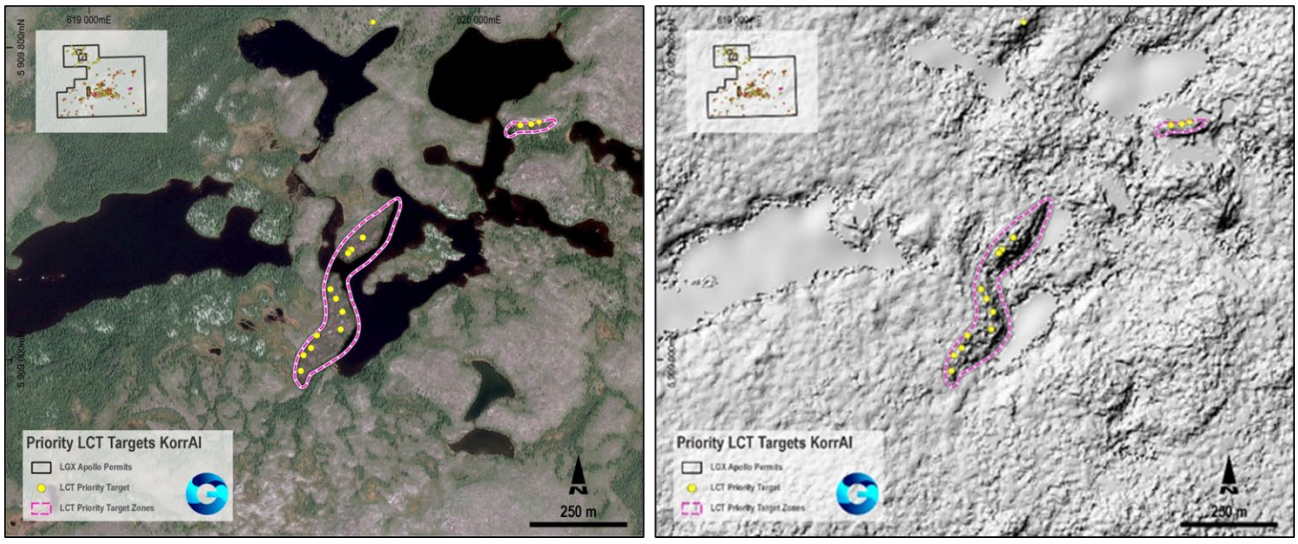



***Figure 1 – Left Image normal satellite data covered with glacial sediments - Right image using AI technology to identify whaleback patterns in topography and target areas***

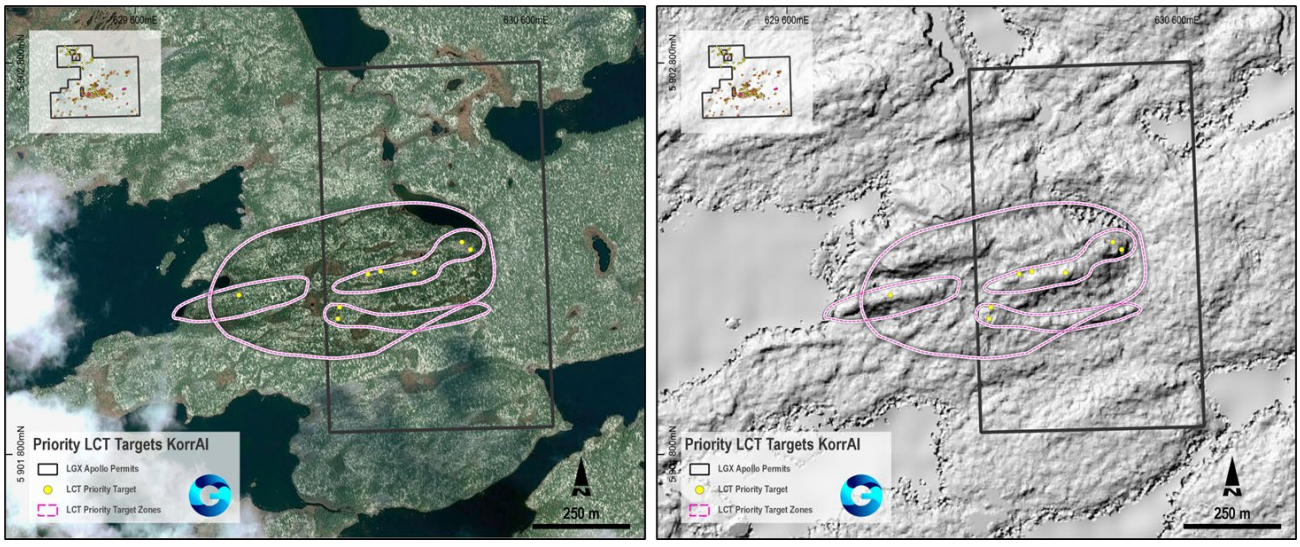


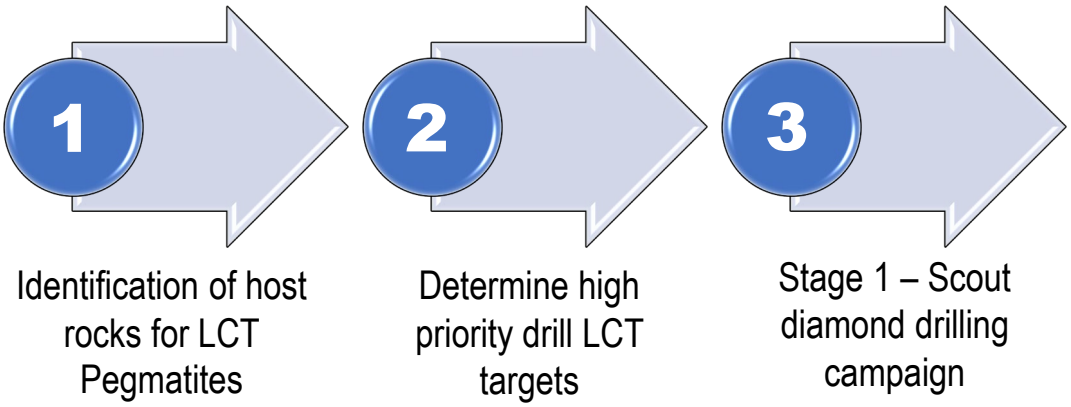

**Figure 2 – Left Image normal satellite data covered with vegetation - Right image using AI technology to identify whaleback patterns in topography and target areas**

Ground truthing the satellite-based targets by geological mapping and collection of field samples and capturing photos with the context of local topography is crucial for correlating geological features, enhancing understanding, and reducing false positives. Field sampling and additional datasets, such as high-resolution

magnetics and hyperspectral data, would serve as a foundation for enhanced AI modeling methodologies, which can be effective for future sampling and drill targeting.

The methodologies applied to the Apollo Project integrate visible, near-infrared, shortwave infrared, microwave (radar), and magnetic datasets from multiple satellite and airborne platforms. The predictive AI models used in this project were previously trained and field tested across various sites within the James Bay region, targeting LCT pegmatites and using convolutional neural networks to digitize predicted features.

AI technology will be used in conjunction with staged ground-truthing activities, and airborne and ground-based Geophysics techniques to further develop our overall Apollo Exploration Strategy, in addition to future work streams designed to improve orebody knowledge and future resource development consisting of:




**PHASE 1**

Regional prospecting and mapping to decipher geological context and identification of host rocks for LCT Pegmatites including:

- High-resolution airborne magnetic survey at 50m line spacing;
- Ground-based gravity survey at 25m and 50 m line spacing;
- Geological mapping campaign; and
- Soil sampling campaign at a nominal 600m × 150m and 300m × 150m spacing respectively.

**PHASE 2**

Follow-up on previous areas of interest discovered and determination of high priority drill ready LCT Pegmatite targets, comprising:

b. Expansion and infill of geological mapping campaign;
c. Infill soil sampling campaign at 100m × 50m spacing; and
d. Pitting and trenching campaigns to increase geological knowledge and for the collection of channel samples for geochemical, mineralogical determination and to support preliminary metallurgical test-work/evaluation studies.

## PHASE 3

Commencement of Stage 1 – Scout diamond drilling campaign targeting highly prospective LCT pegmatite dykes defined from Phases 1 and 2 (leading to potential JORC-compliant Exploration Target definition).

a. Follow-up geological mapping campaign;
b. Infill soil sampling campaign at 100m × 50m spacing;
c. Planning of a larger ground-based gravity survey covering the areas of potential drilling; and
d. Planning and commencement of an initial Stage 1 - scout diamond drilling campaign (up to 5,000 meters).

Chairman, Iggy Tan, said. *"We are pleased to announce the exploration strategy developed for the Apollo Lithium Project, which includes the innovative use of Artificial Intelligence (AI) in collaboration with KorrAI Technologies. KorrAI has been successful at utilizing satellite data and AI technology to optimize field exploration practices in the James Bay area. They have worked for companies such as Patriot Battery Metals nearby. By employing advanced algorithms, KorrAI has created maps that identify geological features like outcrops, pegmatites, and vein formations, using spectral data to locate potential mineral deposits. This AI-driven approach enhances exploration accuracy and efficiency, allowing us to focus our field activities and resources more effectively, reducing exploration timelines and costs".*

Authorised by the Board of Lithium Universe Limited


For more information, please contact:

**Alex Hanly**
Chief Executive Officer
Lithium Universe Limited
Tel: +61 448 418 725
Email: info@lithiumuniverse.com

**Iggy Tan**
Chairman
Lithium Universe Limited
Email: info@lithiumuniverse.com


**Forward-looking Statements**

The Company wishes to remind investors that the presence of pegmatite does not necessarily equate to spodumene mineralization. Also that the presence of pegmatite and spodumene mineralization on nearby tenements does not necessarily equate to the occurrence on Lithium Universe Limited's tenements. This announcement contains forward-looking statements which are identified by words such as 'anticipates', 'forecasts', 'may', 'will', 'could', 'believes', 'estimates', 'targets', 'expects', 'plan' or 'intends' and other similar words that involve risks and uncertainties. Indications of, and guidelines or outlook on, future earnings, distributions or financial position or performance and targets, estimates and assumptions in respect of production, prices, operating costs, results, capital expenditures, reserves and resources are also forward looking statements. These statements are based on an assessment of present economic and operating conditions, and on a number of assumptions and estimates regarding future events and actions that, while considered reasonable as at the date of this announcement and are expected to take place, are inherently subject to significant technical, business, economic, competitive, political and social uncertainties and contingencies. Such forward-looking statements are not guarantees of future performance and involve known and unknown risks, uncertainties, assumptions and other important factors, many of which are beyond the control of our Company, the Directors and management. We cannot and do not give any assurance that the results, performance or achievements expressed or implied by the forward-looking statements contained in this announcement will actually occur and readers are cautioned not to place undue reliance on these forward-looking statements. These forward looking statements are subject to various risk factors that could cause actual events or results to differ materially from the events or results estimated, expressed or anticipated in these statements.

## Competent Person's Statement

The information in this announcement which relates to Exploration Results is based on, and fairly represents, information and supporting documentation prepared by Mr. Hugues Guérin Tremblay, Exploration Manager – Canada and President of Laurentia Exploration Inc and Mr. Justin Rivers, Head of Geology – Lithium Universe Ltd. Mr Tremblay (P.Geo) is duly registered with the Ordres des Géologues du Québec (OGQ) as a geologist, member #1584, and a member of the Quebec Mineral Exploration Association (AEMO) and the Prospectors and Developers Association of Canada (PDAC). Mr. Tremblay has sufficient experience which is relevant to the style of mineralisation and type of deposits under consideration and to the activity which has been undertaken to qualify as a Competent Person (CP) as defined in the JORC, 2012 Edition of the "Australasian Code for Reporting of Exploration Results, Mineral Resources and Ore Reserves" and has read the definition of "qualified person" (QP) set out in National instrument 43-101 ("NI 43-101') and certify that by reason of education, affiliation with a professional association (as defined in NI 43-101) and past relevant work experience, fulfills the requirements to be a "qualified person" for the purposes of NI 43-101'.

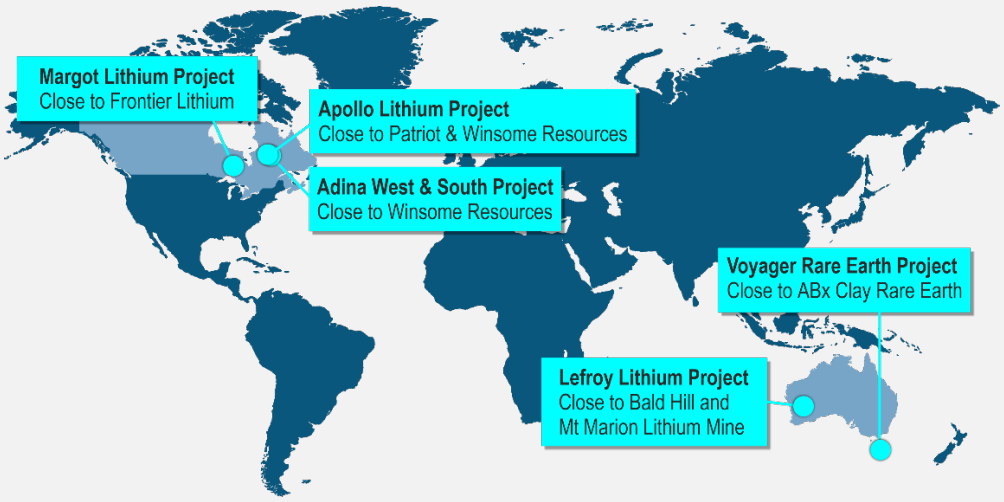
Mr. Rivers is a member of and Chartered Professional with the Australasian Institute of Mining and Metallurgy (AusIMM). Mr. Rivers has sufficient experience which is relevant to the style of mineralisation and type of deposits under consideration and to the activity which has been undertaken to qualify as a Competent Person (CP) as defined in the JORC, 2012 Edition of the "Australasian Code for Reporting of Exploration Results, Mineral Resources and Ore Reserves"

Both Mr Tremblay and Mr. Rivers consent to the inclusion in this release of the matters based on the information in the form and context in which they appear.

## About Lithium Universe Limited (ASX:LU7)

LU7's main objective is to establish itself as a prominent Lithium project builder by prioritizing swift and successful development of Lithium projects. Instead of exploring for the sake of exploration, LU7's mission is to quickly obtain a resource and construct a spodumene-producing mine in Québec, Canada. Unlike many other Lithium exploration companies, LU7 possesses the essential expertise and skill to develop and construct profitable projects. Additionally, Lithium Universe Limited has access to significant Lithium opportunities in Tier 1 mining jurisdictions in Canada and Australia.

## Tier 1 Lithium Inventory




## Apollo Lithium Project (80%)

Commanding a land position spanning over 240 km$^2$, Apollo is located in the same greenstone belt and only 29 kilometres south-east of the Corvette Lithium Project owned by Patriot Battery Metals (market cap of over A$1.4 billion). Patriot's most successful drill result was a remarkable 156 meters at 2.12% $Li_2O$ at CV5. Similarly, 28 kilometres to the east, Winsome Resources Limited (market capitalization of over A$300 million) recently announced drilling hits of 107 meters at 1.34% $Li_2O$ from 2.3 meters (AD-22-005) at their Adina Project. Apollo has 17 pegmatite outcrops reported on the tenement package. Given the exceptional results from these neighbouring projects, the Apollo Lithium Project has the potential to be equally successful.

## Adina South & Adina West Lithium Project (80%)

The project is situated in close proximity to the Adina discovery, which is owned by Winsome Resources, a Company with a Market Capitalisation of over A$300m in the market. The Adina Project has produced a visual pegmatite intersection of over 160m in drills, lying beneath outcropping 4.89% $Li_2O$. Recently, Winsome Resources reported successful drilling results, with AD-22-005 yielding 107m at 1.34% $Li_2O$ from 2.3m at their Adina Project. The Adina South & Adina West Lithium Project boasts one of the largest prospective land holdings near Winsome Resources Limited. Aerial satellite images have revealed similar pegmatite occurrences at the surface.

**Margot Lake Lithium Project (80%)**

The Margot Lake project is located in north-western Ontario, in the premium lithium mineral district of Ontario's Great Lakes region. The project is situated 16km southeast of Frontier Lithium's (TSX-V: FL) PAK Deposit, which contains 9.3Mt at 2.0% $Li_2O$, and 18km away from Frontier's Spark Deposit, which contains 32.5Mt at 1.4% $Li_2O$. The tenement contains nine confirmed and mapped pegmatites and is located in a highly competitive district due to recent major discoveries of lithium. Frontier Lithium, with a market capitalization more than CAD$450 million, is a significant player in the region.

**Lefroy Lithium Project (100%)**

Lefroy is in the mineral-rich Goldfields region of Western Australia. This strategically located project is in close proximity to the Bald Hill Lithium Mine, which has a top-quality spodumene concentrate with low levels of mica and iron, as well as significant tantalum by-product production. The Bald Hill mine has a resource of 26.5 million tonnes at 1.00% $Li_2O$. The Lefroy project is also located near the Mt. Marion Lithium Mine, which is owned by Mineral Resources and has a market capitalization of A$17B. Mt. Marion produces 900,000 tonnes of mixed-grade spodumene concentrate annually and is approximately 60 kilometres from the Lefroy project.

**Voyager Rare Earth Project (80%)**

The Voyager project is north tenements are positioned between ABx Group tenures, where clay-hosted rare earth elements (REE) and niobium have been discovered and hold resources of 21Mt. These areas are analogous with Ionic Adsorption Clay (IAC) deposits that have produced REE in southern China using simple leaching. ABx stated that early testwork indications show their rare earth elements are easily leached and could be concentrated at low cost, with no deleterious elements. Geological mapping of Voyager's tenures indicates the presence of various areas of clay and bauxite, which is the ideal geological environment for the occurrence of rare earth elements.

# JORC Code, 2012 – Table 1

## Section 1 Sampling Techniques and Data – Apollo Lithium Project

(Criteria in this section apply to all succeeding sections.)

| Criteria | JORC Code explanation | Commentary |
|---|---|---|
| ***Sampling techniques*** | • *Nature and quality of sampling (eg cut channels, random chips, or specific industry standard measurement tools appropriate to the minerals under investigation, such as down hole gamma sondes, or handheld XRF instruments, etc). These examples should not be taken as limiting the broad meaning of sampling.*<br>• *Include reference to measures taken to ensure sample representivity and the appropriate calibration of any measurement tools or systems used.*<br>• *Aspects of the determination of mineralisation that are Material to the Public Report.*<br>• *In cases where 'industry standard' work has been done this would be relatively simple (eg 'reverse circulation drilling was used to obtain 1 m samples from which 3 kg was pulverised to produce a 30 g charge for fire assay'). In other cases more explanation may be required, such as where there is coarse gold that has inherent sampling problems. Unusual commodities or mineralisation types (eg submarine nodules) may warrant disclosure of detailed information.* | • In developing an early-stage Exploration strategy for its Apollo Project, LU7 has applied KorrAI's technology utilizing Artificial Intelligence (AI) to process and analyse satellite data and images.<br>• A study was conducted specifically on the Apollo property by KorrAI to explore for Lithium-Caesium-Tantalum minerals (LCT) bearing pegmatites applying remote sensing, airborne and ground based geophysics combined with artificial intelligence (AI).<br>• The methodologies employed integrate visible, near infrared, shortwave infrared, microwave (radar), and magnetic datasets from multiple satellite and airborne platforms. The predictive AI models used were previously trained and field tested across various sites within the James Bay, Canada region, targeting LCT pegmatites and using convolutional neural networks to digitize predicted features.<br>• Four satellite sensors were employed to analyze the study area: Sentinel-1, Sentinel-2, WorldView-3, and SPOT. Each sensor was selected to highlight different aspects of the geology and topography on the property and based on the |

| Criteria | JORC Code explanation | Commentary |
|---|---|---|
| | | availability of coverage. Spectral band ratios and principal component analysis methods were used to delineate mineral signatures and artificial neural networks were used to predict outcrop locations and pegmatite/vein features. Pegmatites and veins are combined in the same classifier because they cannot be independently separated at 30cm pixel resolution.<br><br>• Additional data that was used in processing and interpretation includes bedrock geology and first vertical derivative magnetics from Quebec's SIGEOM database. |
| ***Drilling techniques*** | • *Drill type (eg core, reverse circulation, open-hole hammer, rotary air blast, auger, Bangka, sonic, etc) and details (eg core diameter, triple or standard tube, depth of diamond tails, face-sampling bit or other type, whether core is oriented and if so, by what method, etc).* | • Not applicable as no drilling or sampling has been undertaken to date. |
| ***Drill sample recovery*** | • *Method of recording and assessing core and chip sample recoveries and results assessed.*<br>• *Measures taken to maximise sample recovery and ensure representative nature of the samples.*<br>• *Whether a relationship exists between sample recovery and grade and whether sample bias may have occurred due to preferential loss/gain of fine/coarse material.* | • Not applicable as no drilling or sampling has been undertaken to date. |
| ***Logging*** | • *Whether core and chip samples have been geologically and geotechnically logged to a level of detail to support appropriate Mineral Resource estimation, mining studies and metallurgical studies.*<br>• *Whether logging is qualitative or quantitative in nature. Core (or costean, channel, etc) photography.*<br>• *The total length and percentage of the relevant intersections logged.* | • Not applicable as no drilling, logging or sampling has been undertaken to date. |
| ***Sub-sampling techniques and sample preparation*** | • *If core, whether cut or sawn and whether quarter, half or all core taken.*<br>• *If non-core, whether riffled, tube sampled, rotary split, etc and whether sampled wet or dry.*<br>• *For all sample types, the nature, quality and appropriateness of the sample preparation technique.*<br>• *Quality control procedures adopted for all sub-sampling stages to maximise representivity of samples.*<br>• *Measures taken to ensure that the sampling is representative of the in situ material collected, including for instance results for field duplicate/second-half sampling.*<br>• *Whether sample sizes are appropriate to the grain size of the material being sampled.* | • Not applicable. |

| Criteria | JORC Code explanation | Commentary |
|---|---|---|
| ***Quality of assay data and laboratory tests*** | • *The nature, quality and appropriateness of the assaying and laboratory procedures used and whether the technique is considered partial or total.*<br>• *For geophysical tools, spectrometers, handheld XRF instruments, etc, the parameters used in determining the analysis including instrument make and model, reading times, calibrations factors applied and their derivation, etc.*<br>• *Nature of quality control procedures adopted (eg standards, blanks, duplicates, external laboratory checks) and whether acceptable levels of accuracy (ie lack of bias) and precision have been established.* | • Not applicable. |
| ***Verification of sampling and assaying*** | • *The verification of significant intersections by either independent or alternative company personnel.*<br>• *The use of twinned holes.*<br>• *Documentation of primary data, data entry procedures, data verification, data storage (physical and electronic) protocols.*<br>• *Discuss any adjustment to assay data.* | • Not applicable. |
| ***Location of data points*** | • *Accuracy and quality of surveys used to locate drill holes (collar and down-hole surveys), trenches, mine workings and other locations used in Mineral Resource estimation.*<br>• *Specification of the grid system used.*<br>• *Quality and adequacy of topographic control.* | • The Apollo Property is located in NTS sheets 33H03 and 33H06, NAD83 / UTM Zone 18N.<br>• KorrAI spatial data points derived from Satellite Information, Airborne Platforms interpretation and defined LCT Pegmatite priority targets are reported applying coordinate reference system NAD83 / UTM Zone 18N.<br>• Historical outcrop mapping data was sourced from the Government website (Ministère des Ressources Naturelles et des Forêts of Quebec Sigeom website (https://sigeom.mines.gouv.qc.ca/).<br>• While not reported, it believed that outcrop locations were measured by hand-held GPS.<br>• No detailed field validation has been undertaken. |
| ***Data spacing and distribution*** | • *Data spacing for reporting of Exploration Results.*<br>• *Whether the data spacing and distribution is sufficient to establish the degree of geological and grade continuity appropriate for the Mineral Resource and Ore Reserve estimation procedure(s) and classifications applied.*<br>• *Whether sample compositing has been applied.* | • Not applicable. |
| ***Orientation of data in relation to geological structure*** | • *Whether the orientation of sampling achieves unbiased sampling of possible structures and the extent to which this is known, considering the deposit type.*<br>• *If the relationship between the drilling orientation and the orientation of key 8ineralized structures is considered to have introduced a sampling bias, this should be assessed and reported if material.* | • Not applicable. |
| ***Sample security*** | • *The measures taken to ensure sample security.* | • Not applicable. |

| Criteria | JORC Code explanation | Commentary |
|---|---|---|
| ***Audits or reviews*** | • *The results of any audits or reviews of sampling techniques and data.* | • No audits or review have been undertaken. |

## Section 2 Reporting of Exploration Results – Apollo Lithium Project

(Criteria listed in the preceding section also apply to this section.)

| Criteria | JORC Code explanation | Commentary |
|---|---|---|
| ***Mineral tenement and land tenure status*** | • *Type, reference name/number, location and ownership including agreements or material issues with third parties such as joint ventures, partnerships, overriding royalties, native title interests, historical sites, wilderness or national park and environmental settings.*<br>• *The security of the tenure held at the time of reporting along with any known impediments to obtaining a licence to operate in the area.* | • The Lithium Universe Apollo Lithium Project is 100% owned by Lithium Mining Universe Ltd (Canada) or 80% owned by Lithium Universe Ltd (Australia).<br>• The Apollo Project consists of 466 claims covering an area of 240.2Km2 in the Eeyou Istchee Baie-James Municipality, north-western Quebec.<br>• All claims are in good standing and have been legally validated by a Quebec lawyer specialising in the field. |
| ***Exploration done by other parties*** | • *Acknowledgment and appraisal of exploration by other parties.* | • The Apollo Project is a greenfield project with limited historical exploration. Outcrop mapping by the Ministry of Natural Resources and Forests of Quebec has identified a total of 17 outcrops on the Apollo project as dominantly being pegmatite hosted by the Vieux Comptoir and Intrusion de Kamusaawach 1 – tonalite. |
| ***Geology*** | • *Deposit type, geological setting and style of mineralisation.* | • The property geology consists of Mesoarchean and Neoarchean intrusions. A total of 17 outcrops on the Apollo property have been identified as dominantly being pegmatite hosted by Vieux Comptoir and Intrusion de Kamusaawach 1 – tonalite. |
| ***Drill hole Information*** | • *A summary of all information material to the understanding of the exploration results including a tabulation of the following information for all Material drill holes:*<br>  ○ *easting and northing of the drill hole collar*<br>  ○ *elevation or RL (Reduced Level – elevation above sea level in metres) of the drill hole collar*<br>  ○ *dip and azimuth of the hole*<br>  ○ *down hole length and interception depth*<br>  ○ *hole length.*<br>• *If the exclusion of this information is justified on the basis that the information is not Material and this exclusion does not detract from the understanding of the report, the Competent Person should clearly explain why this is the case.* | • No drilling activities are reported.<br>• The location of all known pegmatite and pegmatoids within the Apollo Lithium Project are outlined on the Sigeom Website (https://sigeom.mines.gouv.qc.ca/). |
| ***Data aggregation methods*** | • *In reporting Exploration Results, weighting averaging techniques, maximum and/or minimum grade truncations (eg cutting of high grades) and cut-off grades are usually Material and should be stated.*<br>• *Where aggregate intercepts incorporate short* | • No drilling activities have been undertaken or reported to date. |

| Criteria | JORC Code explanation | Commentary |
|---|---|---|
| | *lengths of high grade results and longer lengths of low grade results, the procedure used for such aggregation should be stated and some typical examples of such aggregations should be shown in detail.*<br>• *The assumptions used for any reporting of metal equivalent values should be clearly stated.* | |
| ***Relationship between mineralisation widths and intercept lengths*** | • *These relationships are particularly important in the reporting of Exploration Results.*<br>• *If the geometry of the mineralisation with respect to the drill hole angle is known, its nature should be reported.*<br>• *If it is not known and only the down hole lengths are reported, there should be a clear statement to this effect (eg 'down hole length, true width not known').* | • No drilling activities have been undertaken or reported to date. |
| ***Diagrams*** | • *Appropriate maps and sections (with scales) and tabulations of intercepts should be included for any significant discovery being reported These should include, but not be limited to a plan view of drill hole collar locations and appropriate sectional views.* | • Appropriate maps and figures have been included in this announcement. |
| ***Balanced reporting*** | • *Where comprehensive reporting of all Exploration Results is not practicable, representative reporting of both low and high grades and/or widths should be practiced to avoid misleading reporting of Exploration Results.* | • All relevant and material exploration data for the target areas discussed, have been reported or referenced. |
| ***Other substantive exploration data*** | • *Other exploration data, if meaningful and material, should be reported including (but not limited to): geological observations; geophysical survey results; geochemical survey results; bulk samples – size and method of treatment; metallurgical test results; bulk density, groundwater, geotechnical and rock characteristics; potential deleterious or contaminating substances.* | • All relevant and material exploration data for the target areas discussed, have been reported or referenced. |
| ***Further work*** | • *The nature and scale of planned further work (eg tests for lateral extensions or depth extensions or large-scale step-out drilling).*<br>• *Diagrams clearly highlighting the areas of possible extensions, including the main geological interpretations and future drilling areas, provided this information is not commercially sensitive.* | • Further work will include but not limited to systematic geological mapping, rock chip sampling, soil sampling, geophysics, structural interpretation and drilling to identify suitable host rock geology and structural architecture for late state evolved and fertile LCT Pegmatites (known to contain Spodumene mineralisation). |